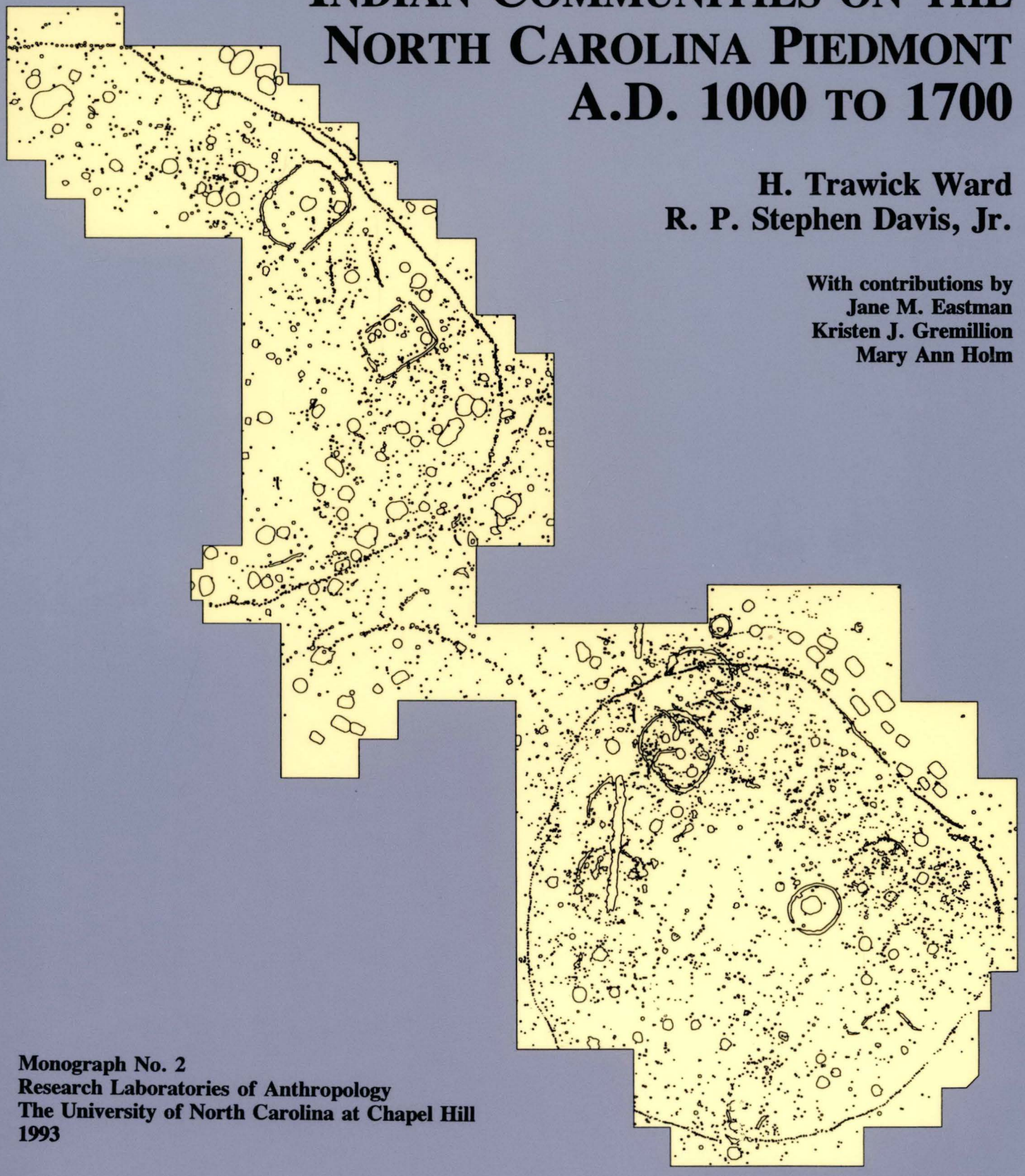
Indian Communities on the North Carolina Piedmont A.D. 1000 to 1700

H. Trawick Ward
R. P. Stephen Davis, Jr.

With contributions by
Jane M. Eastman
Kristen J. Gremillion
Mary Ann Holm



Monograph No. 2
Research Laboratories of Anthropology
The University of North Carolina at Chapel Hill
1993

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Cover: Plans of the Jenrette phase (c. 1670, upper left) and Fredricks phase (c. 1700, lower right) villages at Hillsborough, North Carolina, as revealed by archaeological excavation, 1983–1992.

In memory of

RICHARD PLEASANTS GRAVELY, JR.
1914–1988

A good friend and dedicated scholar

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Acknowledgments

When the Siouan project was formally organized in the spring of 1983, we had no idea that it would be nine years before a "final report" was completed. Obviously during this long period of time, many people have contributed to the project's success. A generation of University of North Carolina graduate students has come and gone. Most of these students were directly involved in the project and their careers were affected by it. In addition, numerous undergraduates gained their first experience in archaeological field research along the banks of the Haw, Dan, and Eno rivers, and their tributaries.

Special thanks are due Jane and Joe Eastman who supervised the field excavations between 1986 and 1989. Jane also contributed directly to this volume with her analysis of lithic artifacts from the 1986, 1987, and 1990 field seasons, her analysis of pottery from the 1986 and 1987 field seasons, and her study of seventeenth-century lithic technologies (Appendix A). We also wish to thank Kristen Gremillion and Mary Ann Holm for their analyses of the paleoethnobotanical and faunal remains, which are reported in Chapters 2 through 13. Kris also contributed a synthesis of piedmont subsistence based on paleoethnobotanical evidence (Appendix B). Randy Daniel supervised field school excavations at the Hogue and Jenrette sites in 1989 and 1990, and he also analyzed the lithic artifacts from the 1988 field season. Although not directly involved in the preparation of this monograph, Linda Carnes-McNaughton and Dan Simpkins deserve recognition for their contributions both in the field and in the lab. We would also like to acknowledge Lydia McCormick and Vicki Saxe who prepared many of the line drawings that appear in the text. Finally, a special word of thanks goes to the dozens of student field assistants who shoveled the plowed soil, shook the sifters, pushed the wheelbarrows, and ran the water-screens.

In terms of staff size and budget, the Research Laboratories of Anthropology are little more than gnats on the bull's horns of the University; however, we certainly have not been treated as such by the administration. Throughout the course of the Siouan project, we have had the unwavering support and encouragement of Stephen Birdsall, Associate Dean of the College of Arts and Sciences (and currently Dean). Without Dean Birdsall's support, this monograph could not have been published. It was his office who provided most of the funds for the first Siouan project monograph, whose receipts are now being used to help produce this volume. But much more important than the financial support has been Dean Birdsall's close friendship and sound advice over the years, particularly during the dark days following the death of our colleague, Roy S. Dickens, Jr.

We would also like to acknowledge the strong commitment of James Murphy, Dean of the Summer School, to the project. Whenever grant monies were running low, Dean Murphy always picked up the tab, whether it was for a new roll of black plastic or to support a student assistant. He also saw to it that we "gnats" got top billing in the summer school catalogs, making it possible for us to recruit interested and dedicated field-school students.

Our colleagues in the Research Labs and the Anthropology Department also provided loyal support, needed advice, and often a forum for developing new ideas and directions. We would especially like to thank Donald Brockington, Carole Crumley, George Holcomb, Vincas Steponaitis, and Richard Yarnell. George and Dick directed the research of the students involved in the paleo-osteological and ethnobotanical studies reported in this volume. We are especially grateful to Vin for his patience in allowing us unlimited time to complete this monograph and for his many helpful suggestions and ideas during the last five years.

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We also wish to recognize Forest Hazel and John Jeffries, who have supported this project from the beginning. Forest and John not only volunteered their labor in the field, but they also contributed much time and energy in making the public aware of the significance of our research and its importance in linking the past with the present.

And, last but not least, we would like to thank Estella Stansbury for running the office, keeping records and reports straight, and generally making sure that personnel matters were handled properly. We would also like to thank Teresa Mays of the UNC Office of Contracts and Grants for her quick smile and kind help in the day-to-day management of the grants that supported this research.

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Chapter 1

An Introduction to Siouan Archaeology

As with any research project of this scope, it is hard to pinpoint exactly when it began. In 1938, Joffre Coe received a grant from the Indiana Historical Society to investigate archaeological sites of the piedmont Siouan tribes. His investigations built upon the earlier work of the Reverend Douglas Rights, who first tied John Lawson's journal to the locations of known archaeological sites in the Piedmont (Rights 1931). Even before Rights, James Mooney (1894) studied the Piedmont tribes and gave them their Siouan affiliation. And no doubt before Mooney, many relic collectors wondered about the people who left their silent traces scattered across the fields of central North Carolina.

But, as with most origins, the origin of this project soon fades into a murky realm where the past has little or no bearing on the present. Realistically speaking, the modern era of Siouan research began in 1972 when Bennie Keel and Keith Egloff—archaeologists with the Research Laboratories of Anthropology (RLA) at The University of North Carolina at Chapel Hill—visited Upper Saratown on the Dan River and salvaged a burial that was being looted by pothunters (Figure 1.1). From that cold January day in 1972, until August 1981, staff and students from the Research Laboratories carried out excavations at this important late seventeenth-century Siouan site. Though conducted without a research design or overall plan, the results of this effort whetted the curiosities of all of us who were associated with the excavations during those years.

Both authors spent many long, hot days working among the tall, thick cornstalks that usually covered Upper Saratown during the summers; however, it was Jack Wilson who spilled the most sweat, and even a little blood, at Upper Saratown. Jack supervised the excavations from 1975 until their end in 1981. Using data from Upper Saratown and other Siouan sites, Jack's dissertation, *A Study of Late Prehistoric, Protohistoric, and Historic Indians of the Carolina and Virginia Piedmont: Structure, Process, and Ecology* (1983), provided a firm foundation for the most recent phase of Siouan research which began in 1983 with excavations at the Wall site (Dickens et al. 1987).

During the latter years at Upper Saratown, those of us who were involved with the excavations began to think about Coe and Robert Wauchope's 1938–1941 investigations at the Wall site near Hillsborough, North Carolina, which they interpreted to be the Occaneechi village visited by John Lawson in 1701 (Lefler 1967). We felt that by comparing the Sara and Occaneechi data, important insights could be gained regarding change and acculturation during this critical time of contact between natives and Europeans. Coe, however, had other interests at the time, and it was not until his retirement in 1982 that the subject was resurrected. Roy Dickens replaced Coe as director of the Research Laboratories and was easily sold on the idea of formally organizing a program of Siouan research around the theme of culture contact and change.

Soon after Roy arrived, we began to look at Coe and Wauchope's "Occaneechi" materials from the Wall site and recognized a need to re-evaluate their connection to the village that Lawson visited. Most peculiar was the fact that there were very few Historic period artifacts, and almost all of the ones that had been recovered came from the plowzone. In addition, the historic materials seemed to date to the late eighteenth and early nineteenth centuries. During the winter of 1983, we decided to return to the Wall site and use fine-grained recovery techniques to see if things such as small glass trade beads had fallen through Coe and Wauchope's screens.

The return to the Wall site was not an easy one. Except for a small-scale map of the site area, none of the original field notes were available, and no permanent reference points for the excavation grid had been established during the earlier work. To exacerbate our problems, the site was covered by a carpet of thick Johnson grass that prevented any assessment of surface artifact distributions. We groped in the dark for the first four weeks of the field season, but finally managed to relocate a corner of one of the earlier excavation units. At about the same time, the original site plan materialized, making it possible to articulate our excavations with those done in 1938, 1940, and 1941.

When waterscreening failed to turn up any traces of historic materials, we became confident that the Wall site predated the Contact period. This conclusion was subsequently corroborated by radiocarbon dating. However, after reviewing Lawson's journal, it seemed likely that Rights (1931:417) was correct in locating the Occaneechi village in the general vicinity of the Wall site. About halfway through the field season, we began to investigate a small garden plot a few hundred feet west of the Wall site. On the plowed surface, a few kaolin pipe stems and aboriginal potsherds were observed. Informal shovel testing in the grassy area adjacent to the garden eventually detected evidence of intact cultural features. These turned out to be cemetery burials associated with an historic Indian village. Between 1983 and 1986, this small palisaded village—designated the Fredricks site—was excavated in its entirety (Dickens et al. 1987; Ward and Davis 1988). The trade goods recovered, along with its location, left little doubt that this was the Occaneechi

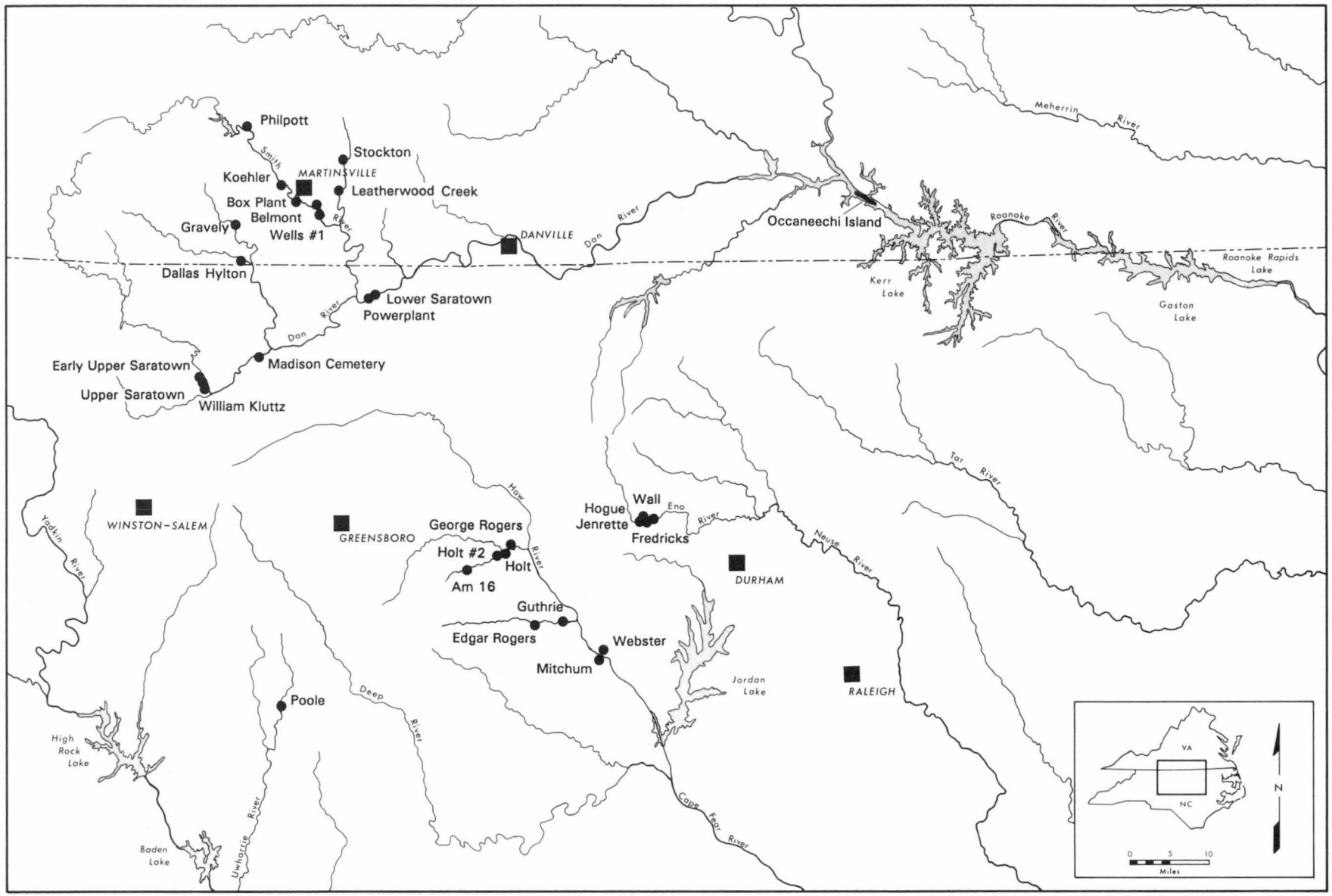

Figure 1.1. Map locating archaeological sites within the Siouan project area.

town that Lawson had visited almost 300 years earlier.

The Fredricks and Wall site excavations, in conjunction with the earlier work, laid the foundation for expanding our investigations into the Haw and Dan river drainages, as well as continuing research on the Eno River. These subsequent investigations, undertaken at 12 separate archaeological sites between 1986 and 1990, are reported in the chapters that follow.

Investigations in the Haw River Drainage

The Haw River drainage was extensively surveyed by archaeologists from the Research Laboratories of Anthropology during the fall and winter of 1984–1985 as part of a National Park Service project administered by the North Carolina Department of Archives and History (Simpkins and Petherick 1985). Additional surveys were carried out during the winter and spring of 1986 along the Haw River and its tributaries in Alamance County. These surveys also were sponsored by the National Park Service under a grant administered by the Department of Archives and History (McManus and Long 1986).

Two goals of these surveys were to identify the sites of towns mentioned in the historical literature and to record other sites that dated to the Late Prehistoric and Contact periods. These formal survey projects followed numerous informal surveys that had been conducted in the area since the early 1930s. By the time the Siouan project excavations began, many potentially significant sites were known and numerous surface collections from these sites had been studied. This background work provided a firm basis for identifying sites that appeared to offer the greatest potential for containing buried, intact archaeological remains. During 1986 and 1987, seven sites containing late prehistoric and historic archaeological components were excavated along the Haw River and its tributaries.

Ethnohistorical research and limited excavations conducted in 1983 indicated that the Mitchum site (31Ch452) represented the best known example of a Contact period Indian village within the Haw River drainage (see Dickens et al. 1987). The Webster site (31Ch463), located directly across the Haw River from Mitchum, also appeared to contain an historic component, based on informant interviews (Figure 1.2). Fieldwork began at the Mitchum site in September 1986, and extensive auger testing and excavations were completed at both sites by the time weather conditions forced a halt to fieldwork in late November. During the remainder of the fall and the following winter, artifacts from these sites were processed and analyzed.

During April and May 1987, auger testing resumed at several other sites within the Haw River drainage. After the results of these tests were evaluated, excavations were planned at five additional sites, all located in Alamance County on tributaries of the Haw River (Figures 1.3 and 1.4). These excavations were begun at the Guthrie site (RLA-Am145) on Cane Creek and continued at the Holt site (RLA-Am163) and the Holt #2 site (RLA-Am172), located on Stinking Quarter Creek near its confluence with Alamance Creek. Excavations were then conducted at the Edgar Rodgers site (RLA-Am162), located on Cane Creek upstream from the Guthrie site. The final site to be investigated—the George Rogers site (RLA-Am236)—was located on Alamance Creek, immediately downstream from the Holt sites. These investigations were completed by the end of July 1987, and the artifacts were cleaned, cataloged, and analyzed during the remainder of the summer and fall of 1987.

Our initial impression of the sites within the Haw River drainage, based on survey data, was that they mostly represented small hamlets rather than large, nucleated villages, and that the entire drainage basin probably was largely abandoned shortly after the initial period of European contact. The results of our excavations did not change this view. With the exception of the Mitchum site, which appears to have been palisaded, all the sites seem to represent dispersed occupations, thinly scattered along the Haw River and its major tributaries. Most were occupied between A.D. 1300 and A.D. 1600. Only the Mitchum site produced definite evidence of European contact, and this consisted of only a sparse assortment of trade artifacts. By the latter half of the seventeenth century, the Haw River basin apparently was occupied by a very small native population.

The archaeology of the Haw drainage suggests that the aboriginal population may have been too small to attract the interest of English traders. The absence of sites—except for Mitchum—directly linking Natives and Europeans certainly suggests a lack of interaction between the two cultures. Perhaps the loosely aligned family networks that formed the basic hamlet-like residential units prior to the Contact period dissolved into smaller social groups that were invisible to the intruders, much as their remains are invisible today to archaeologists. Some of the sites lacking direct evidence of European contact may have been occupied at the same time the larger tribes to the north and south were actively engaged in a lively exchange with the English.

John Lawson, crossing the Haw River in the winter of 1701, showed little interest in the Indians living there, simply noting that the "Sissipahau" dwelled (or had dwelled) along the river bearing their name. In contrast, Lawson visited and described in detail over a dozen other towns and villages during his epic "thousand-mile" voyage from Charleston to the Pamlico River in North Carolina (Lefler 1967). The Haw River

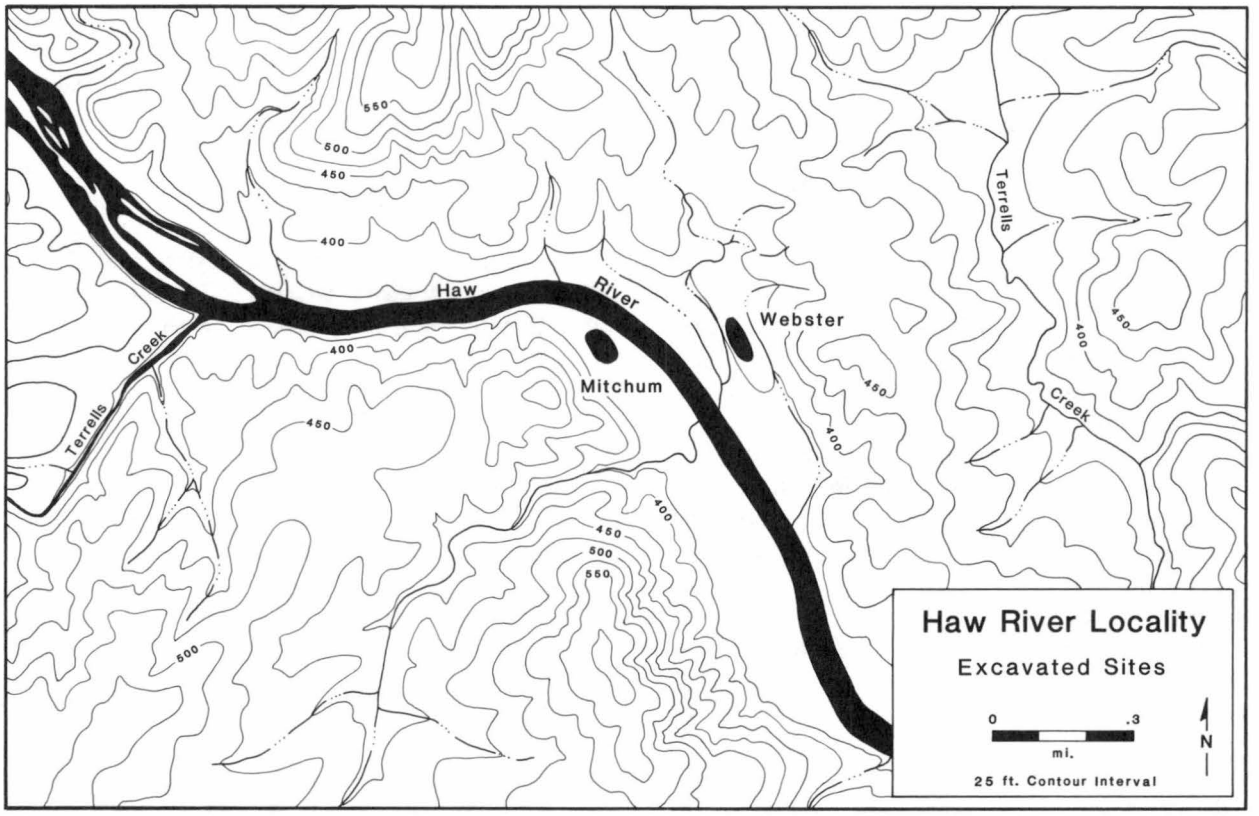

Figure 1.2. Map of the Haw River locality.

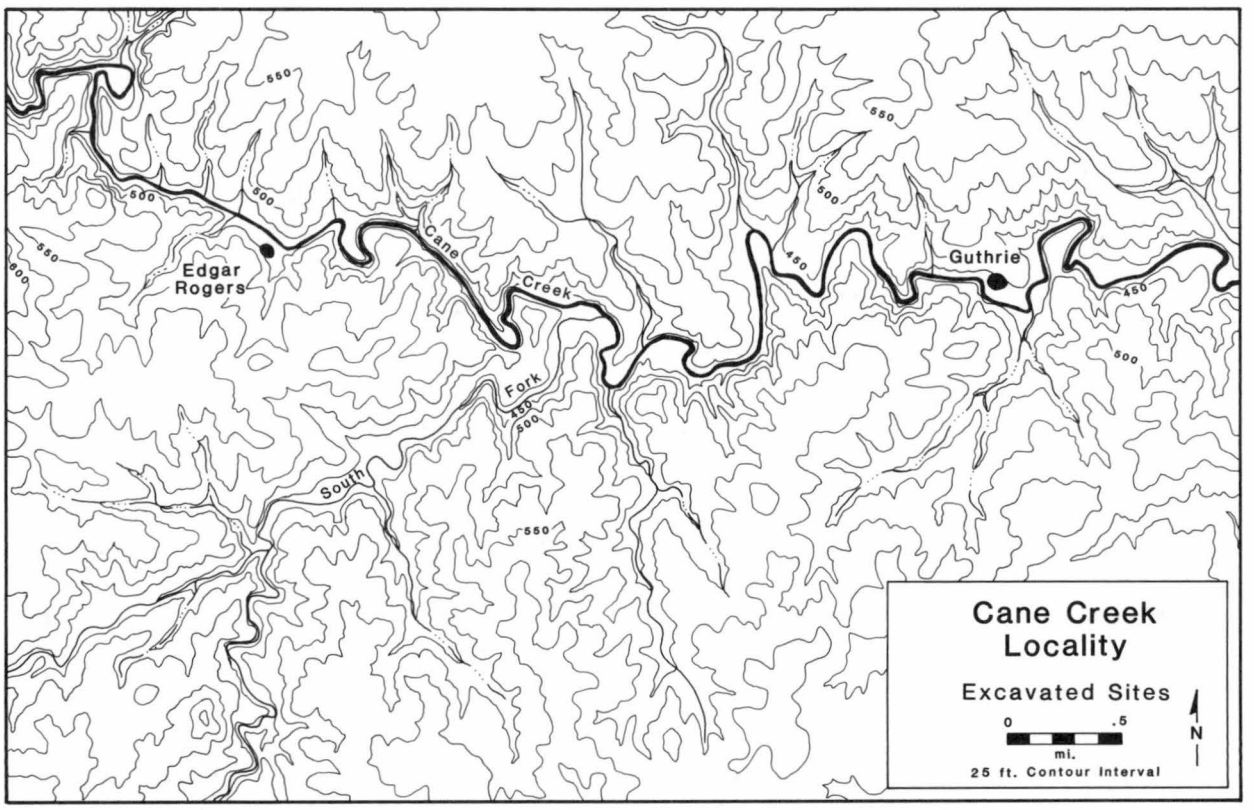

Figure 1.3. Map of the Cane Creek locality.

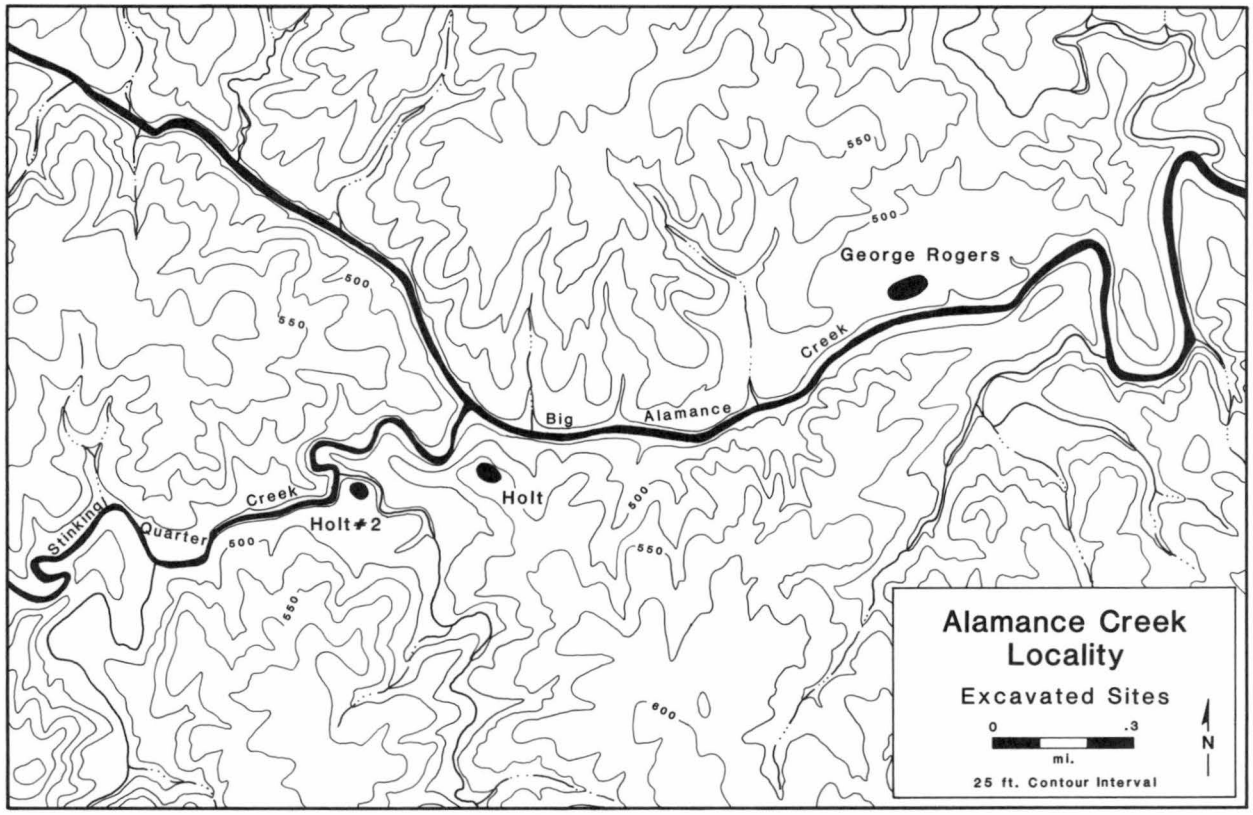

Figure 1.4. Map of the Alamance Creek locality.

area is unique in that only the "Sissipahau" are mentioned in connection with it.

The environment John Lawson observed, the same one that had supported native populations for at least a half dozen millennia, offered a rich cornucopia of natural resources. In fact, Lawson was much impressed with the Haw River area and remarked that:

> This River is much such another as *Sapona*; both seeming to run a vast way up the Country. Here is plenty of good Timber, and especially, of Scaly-bark'd Oak; And as there is Stone enough in both Rivers, and the Land is extraordinary Rich, no Man that will be content within Bounds of Reason, can have any grounds to dislike it. And they that are otherwise, are the best Neighbours, when farthest off [Lefler 1967:60].

One major shortcoming of the Haw River environment, however, is a general lack of broad, well-developed floodplains due to the youthful age of the drainage system. Along the Haw River itself, late prehistoric sites tend to be restricted to natural levees where small expanses of fertile, well-drained soils can be found. Most of these levees and their favorable soils are located along the lower reaches of the river and are generally absent in the upper and middle courses. Upstream, the majority of the later sites are situated along terraces and ridges that overlook the narrow floodplain of the Haw and its tributaries (cf. Simpkins and Petherick 1985:87). This lack of abundant floodplain soils may have been a major factor contributing to the relatively small, dispersed nature of the native settlements during the Late Prehistoric and Contact periods.

Investigations in the Dan River Drainage

The Dan River valley had been the focus of some of the earliest investigations by the Research Laboratories of Anthropology. During the late 1930s, Joffre Coe set out to locate historic Siouan villages located along the Dan and Roanoke rivers. Earlier, Douglas Rights had realized the importance of the Dan River valley in understanding the piedmont Siouans. Responding in November 1936, to Coe's request for information on the location of possible Siouan sites, the Reverend Rights wrote:

> Probably the best Siouan fields are on the Dan River. There the river has not washed out above the high banks with so much damage. Pottery is plentiful in fragments. This is the region of the last settlements of the Saura. Something could

be done there [letter on file, RLA].

In a subsequent letter to Coe, also dated November 1936, Rights described what he thought to be the locations of Upper Saratown, Lower Saratown, and the Occaneechi village on Occaneechi Island near Clarksville, Virginia. Coe used Rights' information to identify sites that were subsequently excavated during the 1938 Siouan research program sponsored by Eli Lilly and the Indiana Historical Society.

Unsatisfied with the results of his initial 1938 excavations at the Wall site on the Eno River, Coe soon moved his operation north into southern Virginia near Clarksville, where he sought evidence for the historic Occaneechi, Saponi, and Tutelo. Fifteen sites on or near Harris, Oak Hill, Occaneechi, Lewis, and Fields islands were identified by survey; test excavations were conducted at four of these sites. Although features were found at two sites, the overall results of the investigations were not particularly informative.

During the fall of 1938, Coe requested additional funds from the Indiana Historical Society, which were granted. He moved upstream on the Dan River to investigate the purported site of Lower Saratown in Rockingham County, North Carolina, and he also investigated the Trading Ford site on the Yadkin River in Rowan County, North Carolina. In the end, Coe continued to be dissatisfied with the results, which to him were "entirely too skimpy" or "not what we are looking for" (letter on file from Joffre Coe to Glenn Black, August 1938, RLA). Except for general summaries of piedmont Siouan archaeology by James Griffin (1945) and Joffre Coe (1952), and a Master's thesis by Ernest Lewis (1951) that focused on the Lower Saratown excavation, the overall results of this early Siouan research were never published.

Although formal excavations on the Dan River ceased in the fall of 1938, informal looting quickly took its place, and by the late 1960s most of the larger sites on the Virginia and North Carolina sides had suffered some damage. As a consequence of this looting, excavations by the Research Laboratories were initiated during the summer of 1972 at the site of seventeenth-century Upper Saratown in Stokes County, North Carolina. Here, numerous burials and rich pit features were being destroyed by relic collectors, and it was felt that if something was not done, the entire site would be destroyed. These excavations continued for 10 years, exposing a large section of the village as well as a portion of an earlier occupation—Early Upper Saratown—situated a few hundred feet to the north. Certain aspects of these investigations have been reported in dissertations by Hogue (1988), Ward (1980), and Wilson (1983), and in theses by Navey (1982) and Wilson (1977).

When the decision was made to expand the Siouan project beyond the Eno River basin, the Dan River drainage was the obvious choice for additional, comparative research. Here, we could build upon an extensive foundation of excavations and surveys; and there was also a large corpus of extant data that needed analysis and reassessment.

Background research in the Dan River drainage began in 1984 with the development of an inventory of Late Prehistoric and suspected Contact period sites (see Simpkins and Petherick 1985, 1986). Because of previous surveys by amateurs as well as professional archaeologists, it was felt that most, if not all, of the major village sites probably were known. The historic villages occupied by the Sara—Upper Saratown, Lower Saratown, Madison Cemetery, and the William Kluttz site—had been known for a number of years, and the locations of numerous late prehistoric sites also were known. As a consequence, extensive surveys were not necessary to locate potential sites for excavation.

Instead of field surveys, preliminary efforts were directed toward examining extant artifact collections at the Research Laboratories of Anthropology, private collections, and collections curated at other institutions that had done research along the Dan River. Many sites were revisited to assess their condition and excavation potential. From this background study, a dozen sites were considered for excavation. During the fall of 1987 and the spring of 1988, the list of sites was shortened to four. Because of wet weather, the discovery of an historic component at Lower Saratown, and the sampling of an extremely rich deposit of late Contact period materials at the William Kluttz site, expanded excavations were ultimately carried out at only three sites.

The first site excavated during the summer of 1988 was the William Kluttz site (31Sk6), located on the Dan River in the vicinity of Upper Saratown (Figure 1.5). Although this site had been collected for many years and looted extensively during the late 1960s, relatively little was known about it. Local collectors had reported European trade artifacts that, in kind and quantity, suggested that the William Kluttz site postdated Upper Saratown; however, pottery from surface collections also indicated the possibility of a late prehistoric Dan River phase occupation. Our 1988 excavations verified the presence of both these components and uncovered perhaps the richest single deposit of late Contact period ceramics yet found in piedmont North Carolina.

Additional excavations originally were planned at nearby Early Upper Saratown (31Sk1), which had been previously excavated in 1981. Because of the richness of the William Kluttz site, wet weather, and the fact that a sizable body of data had already been obtained from Early Upper Saratown, we decided to spend more time at the William Kluttz site and, if possible, return to Early Upper Saratown toward the end of the field season.

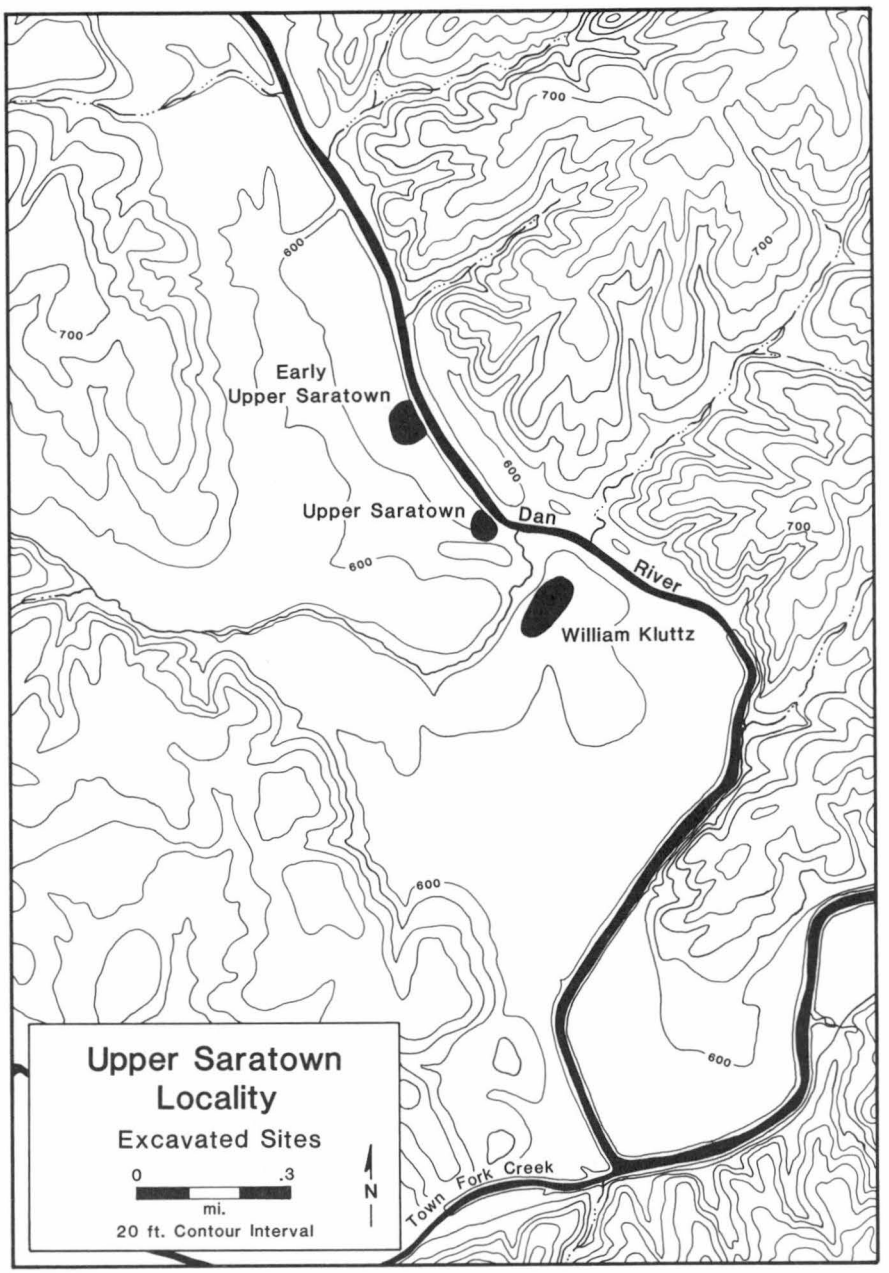

Figure 1.5. Map of the Upper Saratown locality.

After completing the work at William Kluttz, the project was moved some 25 mi downstream to the vicinity of historic Lower Saratown (Figure 1.6). The first site excavated was the Powerplant site (31Rk5), located on the opposite side of the Dan River from a large Duke Power Company generating station. Here, severe erosion had destroyed approximately two-thirds of the site. Pottery and other artifacts collected from the surface and from pits that had eroded out of the bank suggested a small, late prehistoric, Dan River phase settlement.

The final site to be investigated was Lower Saratown (31Rk1), the site that Coe had initially explored in 1938. After reviewing the materials collected by Coe, we concluded that he had not sampled a Contact period village but rather an earlier archaeological component dating to the latter half of the Dan River phase. Despite this, we felt, based on William Byrd II's description in 1733 of the area surrounding Lower Saratown, that Rights and Coe were essentially correct in identifying this site as the probable location of the historic village. Further, based on experience gained from our earlier excavations at Occaneechi, we were confident that if a Contact period occupation was nearby, it probably would exhibit low "visibility" compared to the earlier, more densely occupied village sampled by Coe.

The Dan River valley stands in sharp contrast to the

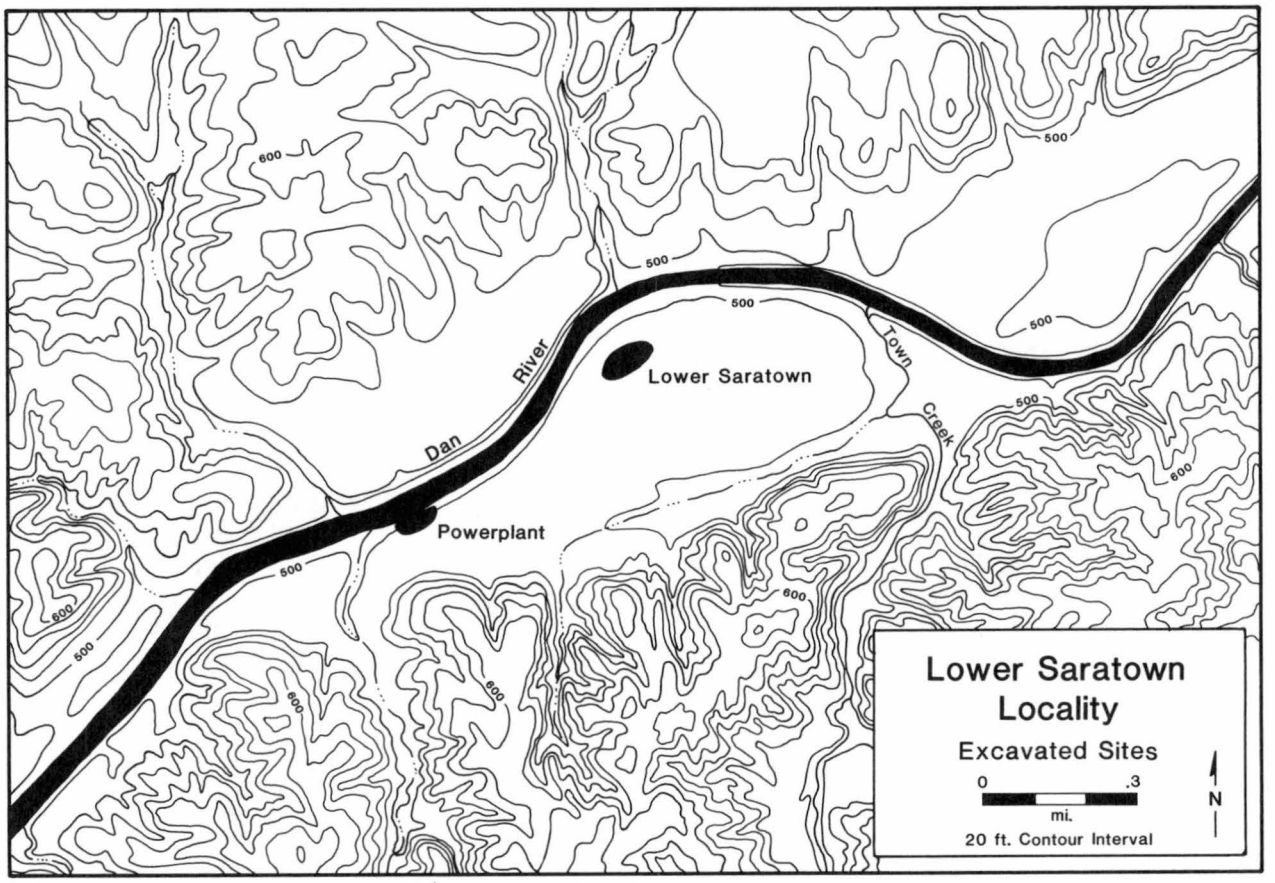

Figure 1.6. Map of the Lower Saratown locality.

Eno and Haw river valleys. Along both sides of the Dan, broad expanses of well-drained floodplain predominate. Contiguous cultivated fields often comprise several hundred acres, and some of the largest expanses of fertile bottoms can be found around the Upper and Lower Saratown vicinities. Only along the lower reaches of the Haw River are comparably-sized bottomlands encountered, and swampy conditions often prevail there behind the narrow levees that parallel the river. From an agricultural standpoint, the potential of the Dan River valley far exceeds that of the central Piedmont drainages to the south. This is true today as it no doubt was in the past. It is no accident that the Late Prehistoric and early Contact period Siouan populations along the Dan River were more numerous and lived in larger, more densely settled communities than their southern cousins.

After completing a survey of the dividing line between Virginia and North Carolina in 1728, William Byrd II was so impressed with the Dan River valley that he purchased 20,000 acres in what is today Rockingham County, North Carolina. In 1733, Byrd conducted a survey of his newly acquired tract which he called the "Land of Eden." In both *The History of the Dividing Line betwixt Virginia and North Carolina, Run in the Year of Our Lord 1728* and *A Journey to the Land of Eden in the Year 1733*, Byrd painted a glowing picture of the richness of the land and the bounty of its natural resources. Upon approaching the abandoned fields at Lower Saratown, Byrd (Wright 1966:398) sympathetically declared that:

> It must have been a great misfortune to them to be obliged to abandon so beautiful a dwelling, where the air is wholesome and the soil equal in fertility to any in the world. The river is about eighty yards wide, always confined within its lofty banks and rolling down its waters, as sweet as mild and as clear as crystal. There runs a charming level of more than a mile square that will bring forth like the lands of Egypt, without being overflowed once a year. There is scarce a shrub in view to intercept your prospect but grass as high as a man on horseback. Toward the woods there is a gentle ascent till your sight is intercepted by an eminence that overlooks the whole landscape. This sweet place is bounded to the east by a fine stream called Sauro Creek, which running out of the Dan and tending westerly, makes the whole a peninsula.

Even taking into consideration Byrd's penchant for

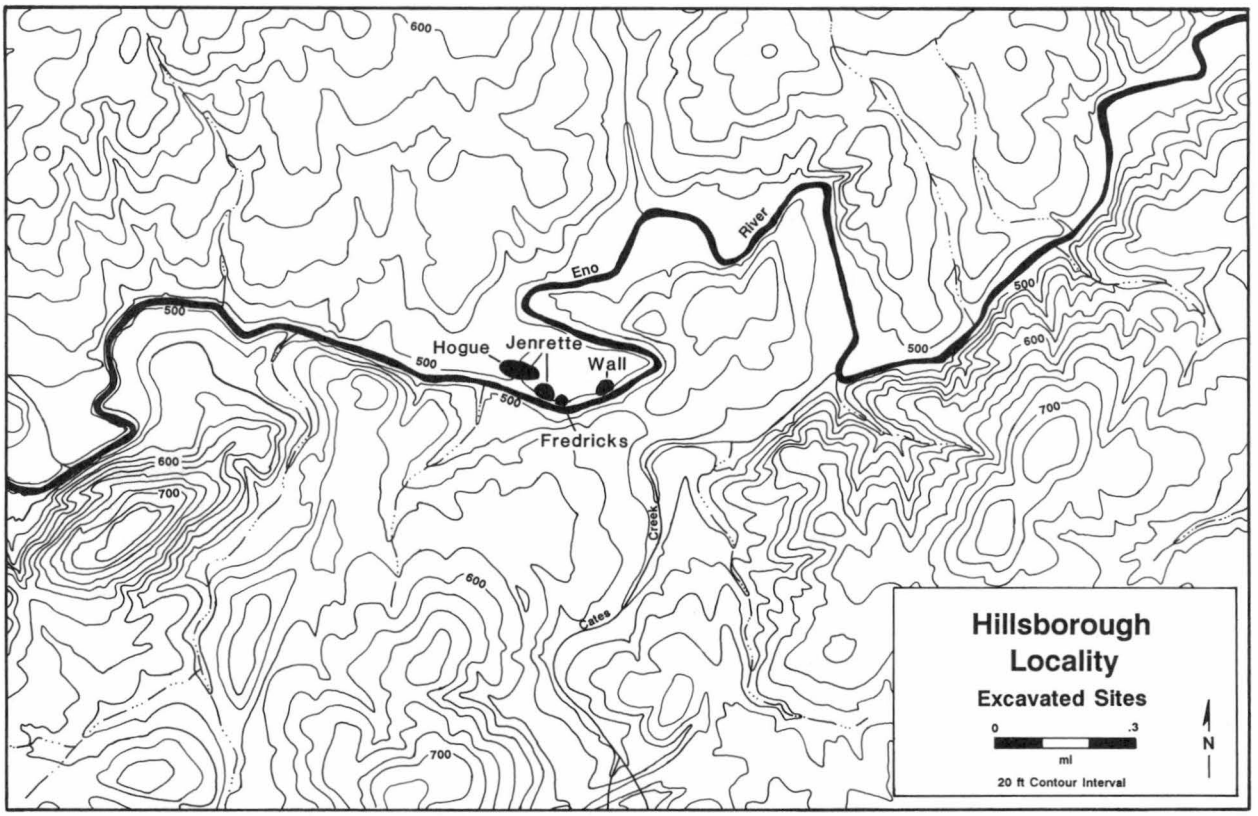

Figure 1.7. Map of the Hillsborough locality.

hyperbole, he was clearly impressed with his "Land of Eden," and today, the area around Lower Saratown and many other stretches along the Dan River still look much as Byrd described them.

Investigations in the Eno River Drainage

As stated earlier, the archaeological investigations reported in this monograph developed out of a research program begun in 1983 at the Wall site (Figure 1.7). This research followed Coe's earlier 1938 test excavation at the site and more extensive excavations by Robert Wauchope in 1940 and 1941. Coe's initial excavations were neither extensive nor conclusive in verifying the Wall site as the historic Occaneechi village. Nevertheless, when Works Progress Administration funds were made available to The University of North Carolina in 1940 for a statewide archaeological program, excavations were resumed at the Wall site under Wauchope's direction. By 1941, Wauchope had uncovered a large portion (12,000 sq ft) of the western half of the palisaded village. Unfortunately, neither Coe's nor Wauchope's research was ever published.

In 1983, after a hiatus of 42 years, excavations were resumed at the Wall site to determine whether or not it did, indeed, represent the 1701 Occaneechi village. Although Coe and others (i.e., Lewis 1951) continued to believe that Rights' (1931) identification was correct, the original excavated materials were never analyzed, and what had been speculation in 1938 grew into unsubstantiated fact during the succeeding years. When Wauchope and Coe's data were examined in 1983, it was clear that very little hard evidence existed to support the interpretation that the Wall site was Lawson's Occaneechi Town of 1701.

During the course of the 1983 excavations, it soon became apparent that although Rights was correct in looking for Occaneechi in the vicinity of the Wall site, subsequent researchers were incorrect in assuming that the site dated to the Contact period. Midway through the 1983 field season, a small palisaded settlement with an accompanying cemetery was discovered a few hundred feet west of the Wall site and named the Fredricks site (31Or231). Burials at the site contained a variety of European trade artifacts dating to the last decade of the seventeenth and early eighteenth centuries. Occaneechi Town had finally been discovered (Dickens et al. 1987; Ward and Davis 1988).

By the end of the 1986 field season, the Fredricks site had been excavated in its entirety, and an early Haw River phase occupation (i.e., the Hogue site) had been discovered a few hundred feet northwest of the Occaneechi village. The number of temporally and

spatially discrete Indian villages in the 25-acre bend on the Eno River was now three, spanning a period from about A.D. 1000 to 1710.

In order to explore the possibility that contemporary households resided outside the palisaded Occaneechi settlement, a large area adjacent to the site was auger tested during the spring of 1989. These tests identified a large number of rich subsurface features just northwest of the Occaneechi palisade and cemetery. Because information from these features would be extremely important in understanding the community structure and overall size of the 1701 Occaneechi population, excavations were resumed in the Eno River bend during the summer of 1989.

Much to our surprise, we quickly realized that the pits detected by augering were not dug by Occaneechis, but by the inhabitants of an earlier town, perhaps the Shakori village of Shakor mentioned by John Lederer in 1670 (Cumming 1958). The 1989 excavations revealed numerous pit features, a rectangular wall-trench house, and a single shaft-and-chamber burial. Excavations at this site, named the Jenrette site, were continued in 1990.

During 1989, the early Haw River phase Hogue site also was investigated. Because artifact concentrations defining the Hogue site were separated by a large wooded gully—perhaps the remnant of an old wagon road—the two halves of the site were investigated separately. Except for a single large pit feature partially excavated in 1984 and completed in 1989, the western portion of the Hogue site produced only scant evidence of *in situ* cultural disturbances. Excavations in the eastern Hogue site area, however, uncovered several burial pits and postholes. When combined with evidence from other sites investigated within the Haw drainage, the Hogue site data permit some insights into early Haw River phase community structure.

The 25-acre floodplain within the U-shaped bend at Hillsborough represents one of the largest expanses of bottomland along the entire Eno River. Unlike the Dan River valley, the Eno is closely flanked by rounded ridges and bluffs. The relatively large acreage of well-drained, friable agricultural land at Hillsborough undoubtedly contributed greatly to its popularity among native populations over the millennia.

Summary

The most recent phase of archaeological study on the North Carolina Piedmont is now completed. In the chapters that follow, we will present detailed analyses of data covering such basic categories of research as settlement, subsistence, mortuary behavior, ceramics, lithics, and trade assemblages. The unifying theme throughout this volume is culture change precipitated by the interaction between Indians and English traders. Before the Siouan project began, we knew from the ethnohistorical records that new tools and trinkets from the traders' packs had a profound influence on the piedmont tribes. We also knew that alien diseases had an even more profound and dramatic effect on native populations.

What we did not know was how new technologies and foreign exchange networks were organized within traditional subsistence and economic systems. We also did not know what new ideas accompanied the guns, cloth, and "edged tools" of the English. For example, how did culture contact influence sociopolitical organization and to what extent did the native peoples incorporate European belief systems into their own? Although it is well known that the indigenous American population had little natural immunity to a variety of Old World diseases, it was not clear when the epidemics first struck the Virginia and North Carolina Piedmont. Nor did we fully understand the mechanisms of their transmission. Moreover, we knew very little of the social, political, and ideological consequences of massive depopulation and tribal amalgamation.

We do not presume now to know the answers to all these questions; however, this study has gleaned a considerable corpus of information from the archaeological record that allows us to reconstruct a picture of the past that is much more focused and detailed than was heretofore possible. The analysis and re-analysis of these data will, no doubt, continue for years to come as new ideas and questions are formulated by future generations of scholars.

In many ways, this research is a continuation of John Lawson's "thousand-mile journey" and, although we are unable to speak to the native people as Lawson did, we can still hear their voices through the buried remains they left behind.

Chapter 2

The Guthrie Site

The Guthrie site (RLA-Am145; 31Am148) is located in a fairly large bottom, approximately 25 acres in extent, on the north side of Cane Creek near the NC 87 bridge in southern Alamance County, North Carolina (Figure 2.1). Here, Cane Creek makes a wide U-shaped bend to the south and encircles the site on three sides. A high-water channel cuts across the mouth of the "U" and, when filled during floods, the site area is surrounded by water. During one such flood several years ago, the landowner remembered a human burial having been washed out of the banks of the flood channel.

On the north side of the high-water channel, the terrain slopes upward forming the flank of a low ridge that runs parallel to the creek. In the recent past, but before UNC archaeologists learned of the site, pot-hunters looted three burials and several trash pits eroding out of the ridge flank. One of the graves was that of a child with a projectile point embedded in the maxilla. Another grave was represented by two skulls that had been plowed out. Shell beads and projectile points were found with the skulls, and one exhibited an area of green (copper?) stain. No information could be obtained concerning the third burial except that it did not contain any grave associations. Apparently, at the request of the landowner, all or most of the skeletal remains were re-buried in the potholes.

Archaeological reconnaissance in the suspected area of the earlier pothunting activities revealed only a sparse scatter of surface artifacts and no evidence of pit features. However, the ridge flank has been plowed for many years, and erosion has exposed the red clay subsoil. Given these conditions, there is a good chance that any subsurface cultural features that existed in this area of the site are now destroyed.

The field that the Guthrie site excavations were located in has been under cultivation for at least a hundred years and had just been planted in corn at the time of our excavations. Prior to planting, a surface survey was conducted over the entire bottom which had been recently plowed and rained on. The survey revealed a moderate surface concentration of artifacts at the west end of the field. This area was extensively auger tested. Over 3,900 borings were placed at 2.5-ft intervals, covering an area of 23,750 sq ft (Figure 2.1). Twelve positive tests (i.e., providing evidence of buried cultural deposits) were recorded. Based on an assessment of the testing results, three individual 10-ft by 10-ft excavation units and a block of nine contiguous 10-ft by 10-ft squares were laid out to encompass what appeared to be the most productive subsurface features (Figure 2.2). The block excavation was planned in the hope that architectural remains might be associated with the pit features (Figures 2.3 and 2.4).

Stratigraphy

The stratigraphy at the Guthrie site is typical of sites in the central Piedmont of North Carolina. A brown, sandy loam plowzone overlay a tan, sandy clay subsoil. The plowzone ranged from 0.7 ft to 1.0 ft in thickness and contained artifacts that date from the Early Archaic (ca. 8,000 B.C.) to the Late Prehistoric (after A.D. 1000) periods. Beneath the plowzone, the subsoil was sterile except for cultural materials contained in the fill of intrusive pits (Figure 2.5). These pit features were dug during the late prehistoric Haw River phase (A.D. 1000–1400) when the most substantial occupation of the site occurred. Earlier Woodland and Archaic cultural components were represented only by artifacts found on the surface and in the plowzone. There was no stratigraphic evidence that a midden formed during the late prehistoric site occupation, and the sparse distribution of artifacts contained in the plowzone indicates that it is highly unlikely that site utilization was ever sufficiently intense to permit a noticeable accumulation of refuse.

Features and Burials

Excavations at the Guthrie site revealed nine pit features beneath the base of plowzone (Table 2.1). One of these was a burial pit that contained human bone; two other features are interpreted as burials based upon pit morphology, although no bone was preserved. The remaining features included three pit hearths, a large shallow basin, a tree disturbance, and an area of dark-stained subsoil. With the exception of the latter two features, which are of indeterminate age, all of these pits are attributed to the Haw River phase occupation of the site.

Feature 1

This large, basin-shaped pit was located at the southeast corner of the excavation area in Sq. 590-R580. At the top of the subsoil, two fill zones were

Figure 2.1. Map of the Guthrie site showing areas of auger testing and excavation.

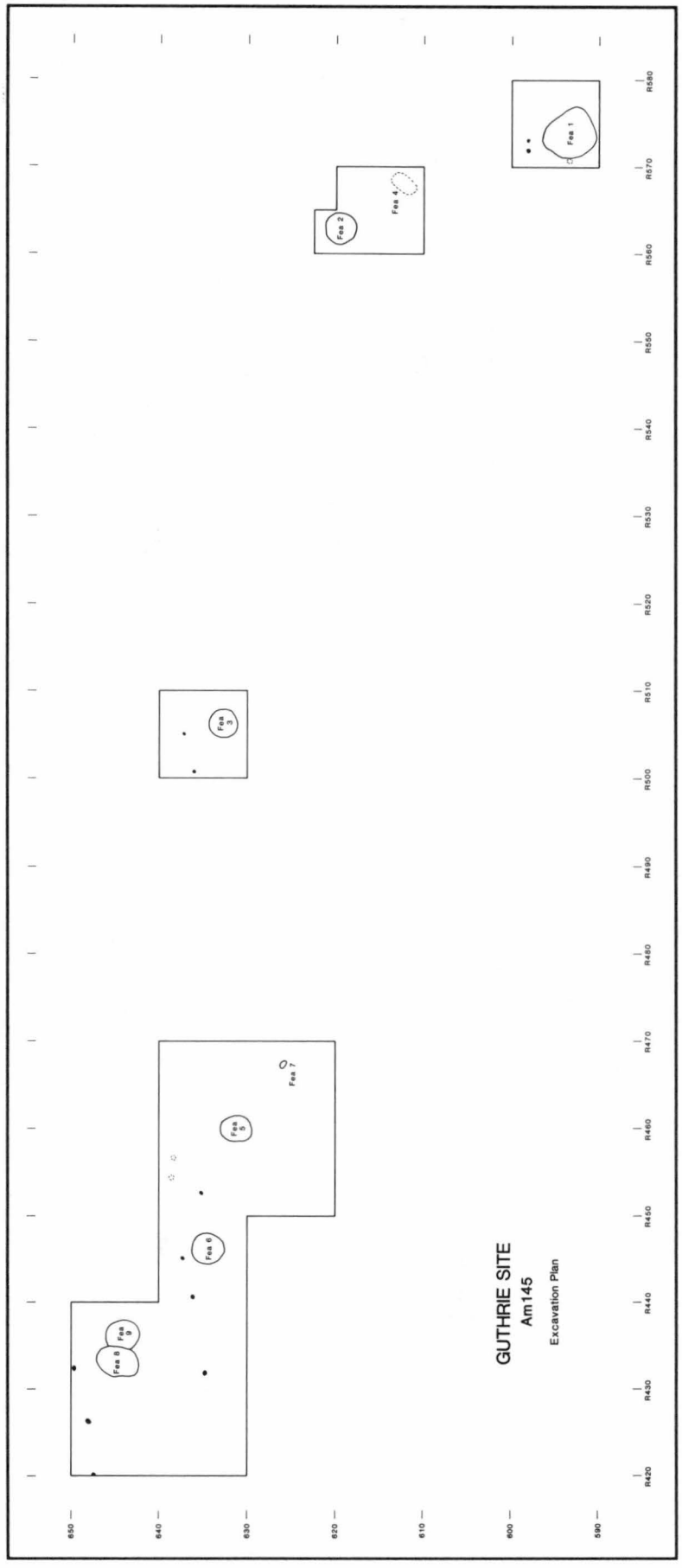

Figure 2.2. Excavation plan at the Guthrie site.

Figure 2.3. Beginning excavations at the Guthrie site.

Figure 2.4. Cleaning the excavation floor and taking elevations.

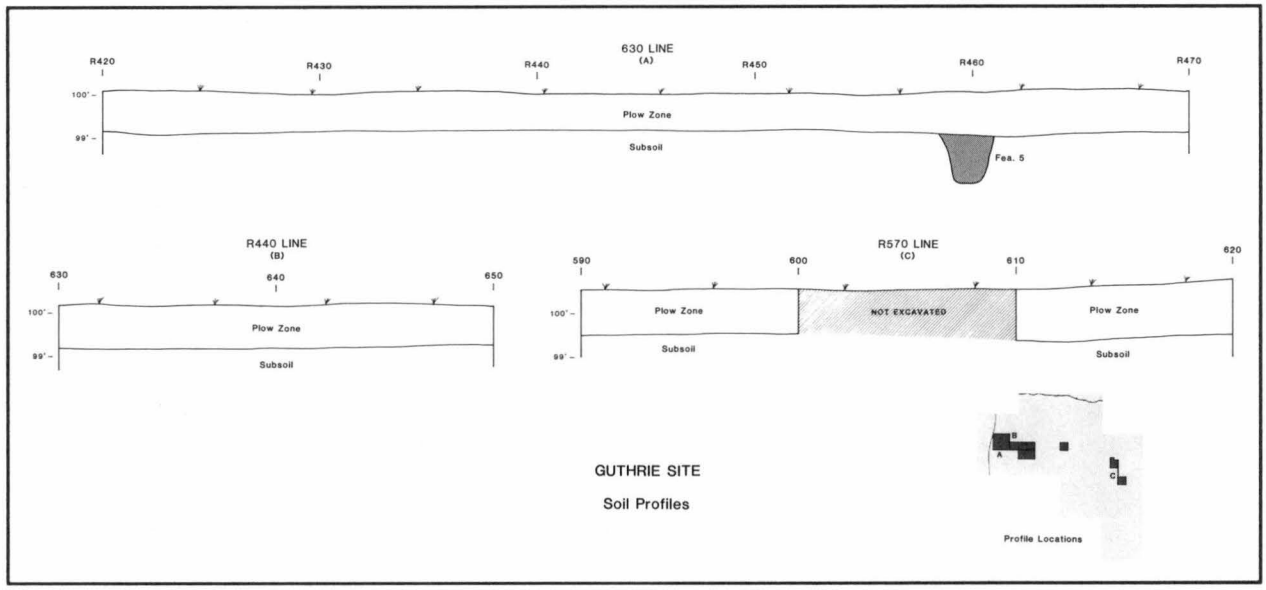

Figure 2.5. Stratigraphic profiles.

Table 2.1. Summary of features identified at the Guthrie site.

Feature No.	Type	Center Location	Dimensions (ft) L	W	D	Phase Association	Comment
Fea. 1	Large Basin	593.3R573.5	6.0	5.8	0.3	Haw River	Excavated
Fea. 2	Hearth	619.5R562.9	3.8	3.8	0.9	Haw River ?	Excavated
Fea. 3	Burial	632.7R506.2	4.1	3.1	1.8	Haw River	Excavated
Fea. 4	Stained Soil	612.0R568.0	3.0	1.8	<0.2	Indeterminate	Trowelled
Fea. 5	Burial	630.1R459.2	3.4	2.9	1.1	Haw River	Excavated
Fea. 6	Hearth	624.4R446.2	3.8	3.8	1.1	Haw River ?	Excavated
Fea. 7	Tree Disturbance ?	626.0R467.0	0.4	0.4	>1.0	—	Excavated
Fea. 8 (Bu. 1)	Burial	644.5R433.5	4.7	3.7	1.4	Haw River ?	Excavated
Fea. 9	Hearth	644.0R436.4	3.8	3.8	1.0	Indeterminate	Mapped & Augered

obvious: Zone 1, a dark grayish brown (Munsell: 10YR 3/2) loam that contained bits of charcoal and fired clay; and Zone 2, a dark brown (10YR 4/3) loam with charcoal and ash (Figure 2.6). Zone 1 fill was restricted to a small oval-shaped area along the southeastern edge of the pit. This material was deposited in the basin first, then the remainder was filled with Zone 2 soil.

Overall, the feature measured 5.8 ft by 6.0 ft but was only 0.3 ft deep. Although both fill zones contained numerous quartz pebbles, artifacts included only a few small sherds and flakes, charcoal, and small fragments of burned clay. It is not possible to determine the original function of this large basin, but the sparse artifact content of the fill suggests a low intensity of cultural activity in the immediate vicinity.

Feature 2

This facility was located northwest of Feature 1 in Sq. 610R560, also placing it along the eastern edge of the excavation area. At the base of the plowzone, the pit was circular in outline and measured 3.8 ft in diameter (Figure 2.7). Three concentric fill zones were observed at this point. Zone 1 was a dark yellowish brown (10YR 4/4), mottled loam with small fragments of charcoal and fired clay, and filled the central portion of the feature surface. This soil was very similar to Zone 2 of Feature 1. A thin band of darker brown (7.5YR 4/6), mottled loam with fired clay fragments encircled Zone 1. The final zone (Zone 3) consisted of an outer band of baked red (2.5YR 4/6) clay.

The bottom and sides of the basin were lined with the baked clay which decreased in hardness toward the bottom of the basin. The other fill zones formed layered deposits above Zone 2. At its deepest point, the pit extended 0.9 ft beneath the subsoil surface. Except for a few fired clay fragments, the fill from

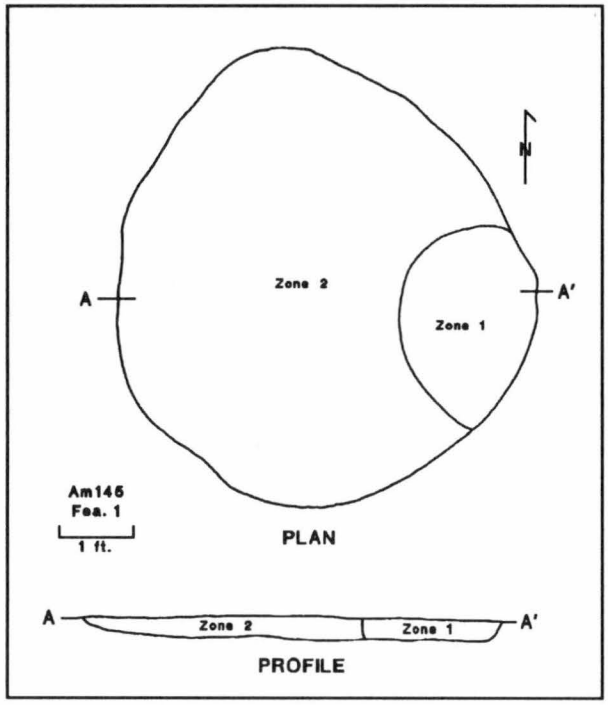

Figure 2.6. Feature 1, plan view and profile drawings.

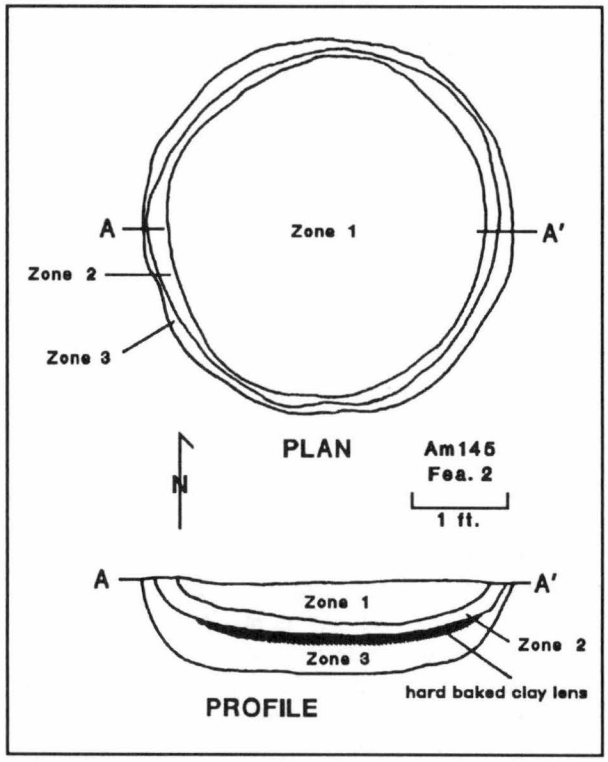

Figure 2.7. Feature 2, plan view and profile drawings.

Feature 2 was sterile. This facility probably originally functioned as a hearth, as suggested by the outer lining of fired clay and the presence of charcoal and fired clay in Zone 1. The absence of artifacts in the fill further suggests that cultural activities in the immediate area were limited.

Feature 3

This feature was located in the central portion of the excavation area in Sq. 630R510. In plan view, it was defined by a roughly circular patch of dark brown (10YR 3/3) loam with flecks of charcoal and ash (Zone 1) (Figure 2.8). This fill was almost identical to Zone 2 in Feature 1 and Zone 1 in Feature 2. Excavation revealed a homogeneous fill contained in a shallow shaft-and-chamber pit (Figure 2.9). This pit type is similar in form to late prehistoric burial pits that occur elsewhere in the Piedmont. No human bone was present; however, a dark gray stain was observed on the floor of the chamber which undercut the southern wall of the shaft. Along the north-south axis, including the undercut portion of the chamber, the pit measured 4.1 ft (Figure 2.10). The top of the shaft was 3.1 ft in diameter. The fill contained only a few small pot-sherds and flakes, and these were restricted primarily to the upper portion of the shaft. Despite the absence of human skeletal remains, this feature no doubt represents a burial facility. The pit conformation and the stained area on the floor of the chamber substantiate this interpretation.

A sample of wood charcoal, recovered from Zone 1 deposits within the shaft area of Feature 3, yielded a radiocarbon age of 620 $\pm$ 70 years: A.D. 1330 (Beta-23507). This was the only radiocarbon date obtained for the Guthrie site and appears to be a reasonable assessment, given the kinds of artifacts found at the site and comparisons with other dated artifact samples within the Haw drainage.

Feature 4

This designation was assigned to a rectangular stain in the southeast corner of Sq. 610R570. The feature area was defined by a dark stain at the base of plow-zone that measured approximately 3.0 ft by 1.8 ft. The stained soil was very thin, and after re-troweling, lost all definition. Given its ephemeral nature, the original function of this facility cannot be determined.

Feature 5

This shaft-and-chamber pit was centered at coordinates 640.1R459.2, in the eastern section of the block excavation. At the base of plowzone, it was observed as an oval area of dark brown (7.5YR 4/4) loam mottled with fragments of orange clay and charcoal (Zone 1). The fill in the northwestern half of the feature contained more clay than the southwestern half. After removing 0.1-0.2 ft from the top of Zone 1, two ashy lenses were exposed: one in the northwestern portion, and the other along the southern wall of the pit. The northwestern lens was comprised almost entirely of ash, whereas the southern pocket was less

Figure 2.8. Feature 3, before excavation.

Figure 2.9. Feature 3, excavated.

well defined and contained ash mixed with the mottled loam from Zone 1. Complete excavation revealed a boat-shaped pit with in-sloping walls and a flat bottom except in the southern area where a shallow chamber had been dug. Feature 5 measured 3.4 ft by 2.9 ft and the shaft was 0.8 ft deep. The chamber area extended 0.2 ft below the shaft floor (Figure 2.11).

Only a few sherds and flakes and one triangular projectile point were recovered from the fill. Because of the size and shaft-and-chamber configuration of the feature, it probably was used as a burial facility, perhaps for a child or infant. The ashy lenses in the upper portion of the fill may be indicative of ritual cleaning or feasting associated with the mortuary complex (cf. Ward 1987).

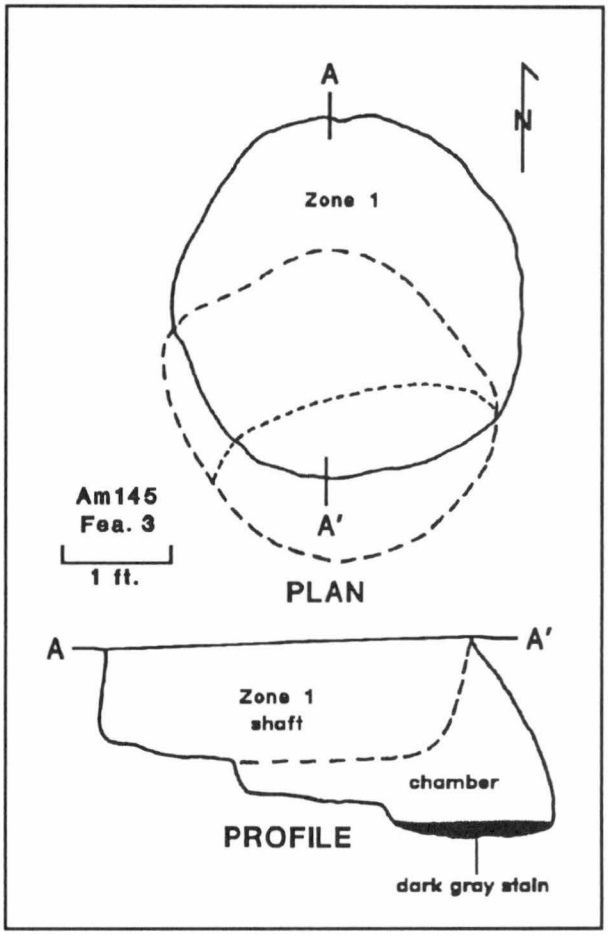

Figure 2.10. Feature 3, plan view and profile drawings.

Feature 6

This circular basin, located in the center of Sq. 640R450, contained four fill zones which appeared as concentric circles at the top of subsoil (Figure 2.12). Zone 1, located in the center of the feature, consisted of a dark brown (7.5YR 4/2) mottled fill with ash. This deposit was nearly encircled by a narrow band of dark brown (7.5YR 4/4) mottled loam without ash (Zone 2). Zone 3 was defined by a ring of dark yellowish brown (10YR 4/4), mottled soil with charcoal that surrounded Zones 1 and 2. The perimeter of the pit was defined by a band of yellowish red (5YR 4/6) fired clay fill (Zone 4).

In profile, each zone defined a basin-shaped layer with Zone 1 on top and Zone 4 on the bottom. After excavation, the pit measured 3.8 ft in diameter and was a little over a foot deep (Figures 2.13 and 2.14). Only a few flakes and several lumps of fired clay were recovered from the pit. In terms of size and fill characteristics, this feature was almost identical to Feature 2, located along the eastern edge of the excava-

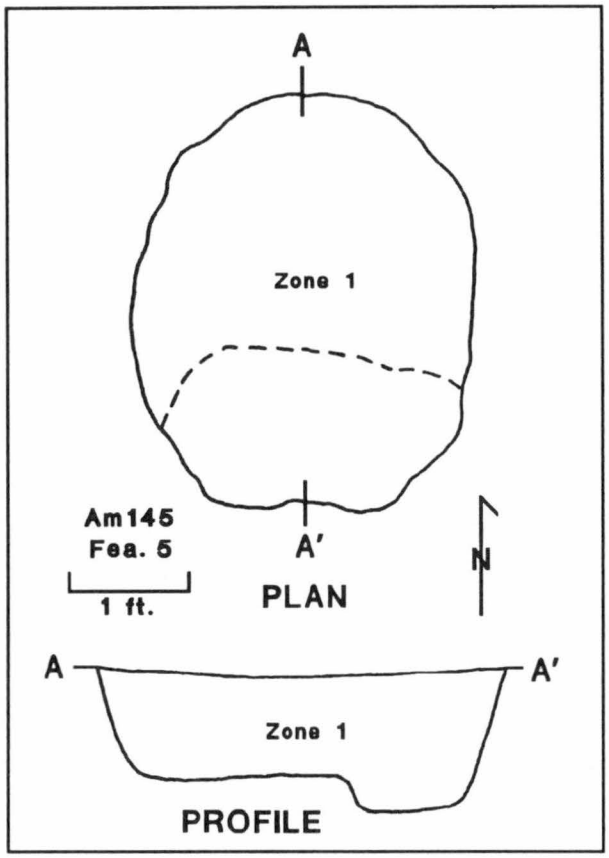

Figure 2.11. Feature 5, plan view and profile drawings.

tion area. The fired clay layer that lined the pit, and the ash and charcoal contained in Zones 1 and 3, suggest that it was used as a hearth. The lack of cultural material in the fill indicates a low level of activity in the vicinity of the feature.

Feature 7

This designation was assigned to a small, conical pit located at coordinates 630R467. It was approximately 0.4 ft in diameter and extended to a depth of a little over a foot. The dark brown (7.5YR 3/2) mottled fill contained no artifacts. The size and shape of the feature suggest that it was a tree root.

Feature 8 (Burial 1)

This was the only pit at the Guthrie site that contained human skeletal remains. It was located in Sq. 640R440 and intruded Feature 9. At the top of the subsoil, it was roughly oval in outline and revealed three distinct fill zones. Zone 1 was an irregularly shaped lens of dark yellowish brown (10YR4/4) fill with charcoal that spread across the center of the pit, separating Zones 2 and 3. Zone 2 was located in the northern half of the pit and consisted of a dark brown (7.5YR 4/6) loam mottled with orange and gray clay. This zone appeared to represent typical burial fill. Zone 3 occupied the southern half of the pit and was

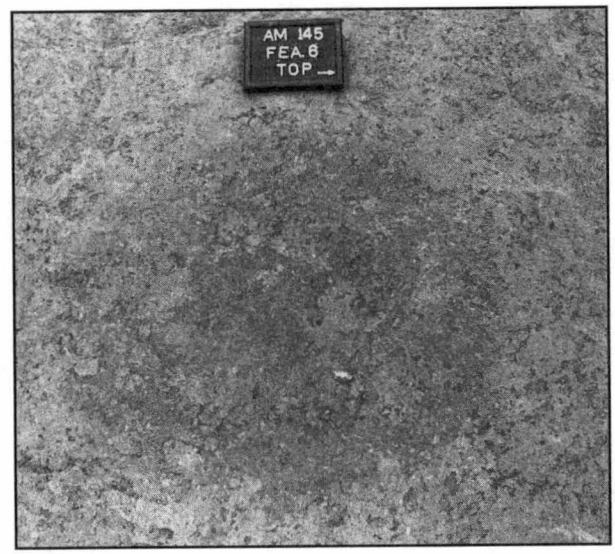

Figure 2.12. Feature 6, before excavation.

Figure 2.13. Feature 6, excavated.

comprised of a tan sandy loam.

Zone 1 was excavated first and probably represents a thin layer of humus that slumped into the burial as the original fill settled. Zone 2 continued to the bottom of the northern half of the pit which stepped down from 0.4 ft to 1.4 ft below the subsoil surface. This portion of the feature represents the grave shaft. Zone 3 filled the southern half—the mortuary chamber—where the skeletal remains rested on the bottom at a depth of 1.4 ft (Figure 2.15). A large stone was placed near the skull.

The overall preservation of the skeletal material was poor, making cleaning and the identification of various elements difficult. It was also impossible to take accurate measurements of most of the bones. Although sex and age could not be determined with any degree

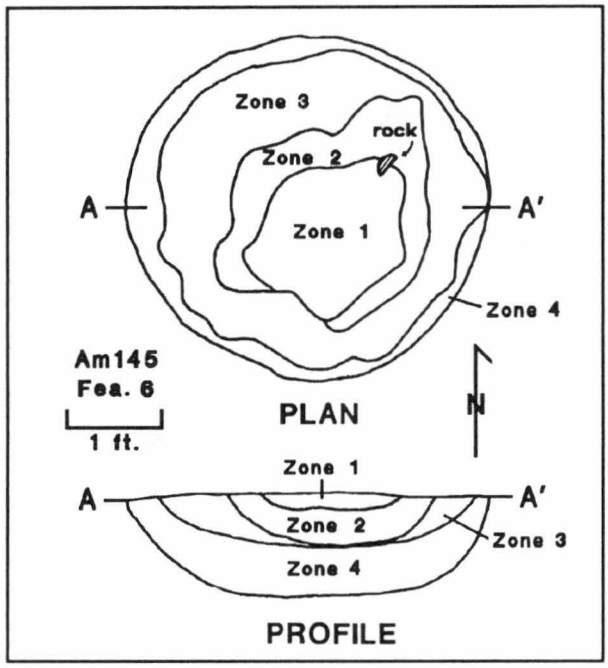

Figure 2.14. Feature 6, plan view and profile drawings.

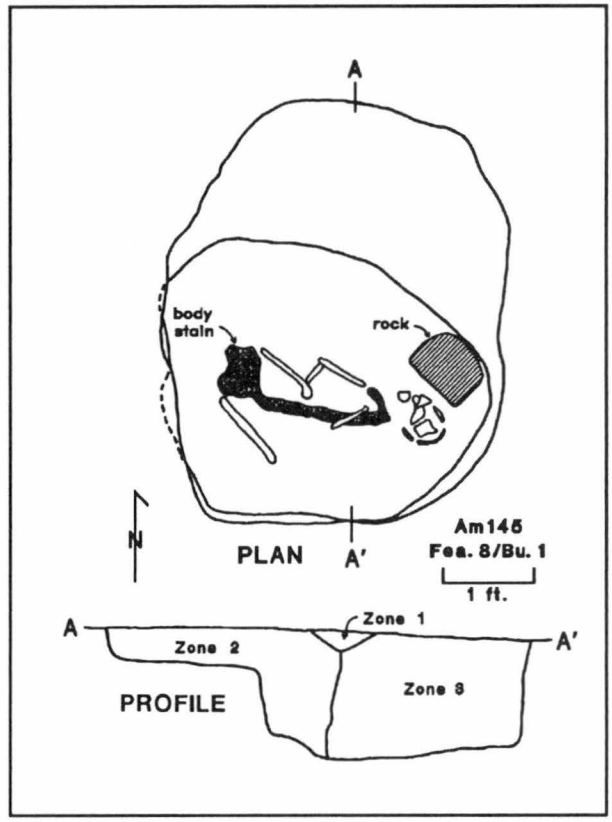

Figure 2.15. Feature 8 (Burial 1), plan view and profile drawings.

of specificity, the individual appeared to be a subadult. Respecting the wishes of the landowner, the skeletal material was left *in situ* and carefully reburied after being photographed and drawn.

Feature 9

Feature 9 was located in Sq. 640R440 and was intruded by Feature 8 (Burial 1). Due to time constraints, it was not excavated; however, auger tests indicated two fill zones. Zone 1 consisted of a mottled sandy clay fill about 0.7 ft thick which lay atop a thin band of fired clay (Zone 2) 0.3 ft in thickness. At the top of the subsoil, the feature was almost 4.0 ft in diameter. This facility is very similar to Features 2 and 6, and probably also functioned as a fire pit or hearth.

Summary

All of the features excavated at the Guthrie site were similar in that they contained very few artifacts or other cultural remains. Except for the two shaft-and-chamber pits that contained no human bones, the only features with an identifiable function were the two pit hearths. These, too, failed to produce any appreciable quantity of cultural materials, indicating that overall activity on the site was not intense. This general absence of artifacts within the feature fill corresponds well with the results of auger testing at the site, and indicates a dispersed, short-term site occupation.

Postholes

Postholes were not frequently encountered at the Guthrie site, and no structural or architectural patterns were discerned. As a consequence, postholes were not excavated. A total of 12 were mapped at the top of subsoil. These averaged roughly 0.4 ft in diameter and contained brown loamy fill which, in some cases, was surrounded by a collar of yellow clay. A similar collared configuration has been noted at other sites in the area, including the historic Fredricks site near Hillsborough. The overall sparsity of postholes again points to a dispersed and short-term occupation.

Pottery

Archaeological excavations at the Guthrie site produced only limited ceramic data. Although 1,124 aboriginal potsherds were recovered, only 239 could be classified by surface treatment and only 19 of those

sherds came from undisturbed feature contexts (Table 2.2). Over 60% of all identifiable potsherds have net impressed exterior surfaces; the remainder have plain, simple stamped, cord marked, check stamped, complicated stamped, or cob impressed exteriors.

The general paucity of ceramic artifacts attests to the diffuse, dispersed, and probably brief character of the settlement at the Guthrie site. Given overall similarities between the plowzone and feature pottery, as well as the close correspondence in frequency distribution to a sherd sample surface collected in 1985 by Simpkins and Petherick from the larger site area, there appears to be no sound basis for recognizing more than a single Late Prehistoric component at this site. This component most likely can be attributed to the late Haw River phase (ca. A.D. 1300–1400) and represents a period during which pottery (i.e., Hillsboro series) of the subsequent Hillsboro phase either developed or was introduced into the Haw River drainage.

Haw River Net Impressed (Figure 2.16*a–j*)

Net impressed pottery, comprising 61.9% (n=148) of all identifiable sherds, was the most common type found at the Guthrie site and generally conforms to the *Haw River Net Impressed* type defined at the Holt site (see Chapter 4). Just over 40% (n=61) of all sherds are tempered with crushed feldspar. The remaining sherds are tempered with either medium-to-fine crushed quartz (n=52) or coarse sand (n=35). However, unlike net impressed pottery found at the Holt site, over 70% of these sherds have smoothed interiors. Given Coe and Lewis' (1952) observation for the Dan River series that interior scraping was gradually replaced by smoothing during the Late Prehistoric period, the pattern observed at the Guthrie site may reflect a relatively late chronological placement for this assemblage. This certainly would seem to be supported by the single radiocarbon date that was obtained from Feature 3.

The 11 rimsherds in the sample indicate that the predominant vessel form was a jar with an everted rim and a rounded lip. Vessel wall thickness ranged from 6–8 mm. The eight decorated net impressed sherds indicate that several of these vessels were modified as follows: V-shaped notches placed along the lip edge (n=1), lip/rim edge (n=1), or neck (n=3); oblique incisions placed along the lip edge (n=1); finger punctations around the vessel neck (n=1); and parallel incisions placed along the vessel neck (n=1). These types of decoration are also reflected in the Holt site pottery sample.

Haw River Cord Marked

Ten cord marked potsherds were recovered. One was from Feature 3; the remainder were from disturbed contexts. These sherds were tempered primarily with medium-to-fine crushed quartz (n=5), followed by sand (n=3) and crushed feldspar (n=2). All but one sherd have smoothed interiors. These sherds are of variable thickness and range from 4 mm to >10 mm thick. No rim or decorated sherds were found. These sherds are generally similar to the *Haw River Cord Marked* type recognized at the Holt site.

Hillsboro Plain

Forty-nine plain potsherds, comprising 20.5% of the identifiable sherd sample, were recovered. Only three of these came from excavated features. All but one have smoothed interiors and are tempered with crushed feldspar (n=21), medium-to-fine crushed quartz (n=14), or sand (n=14). Over half are 6 mm to 8 mm thick.

Of the nine rimsherds in the sample, most are from jars with rounded lips and everted rims. Four rimsherds are decorated as follows: V-shaped notches along the lip, circular punctations along the lip, V-shaped notches along the rim edge, and miscellaneous incising of the rim. One other sherd was from a jar that had circular punctations along the shoulder. All plain sherds from the Guthrie site are generally referable to the *Hillsboro Plain* type (Coe 1952; Davis 1987).

Hillsboro Simple Stamped (Figure 2.16*l–m,p*)

All of the 19 simple stamped sherds found at the Guthrie site conform to the *Hillsboro Simple Stamped* type (Coe 1952; Davis 1987). Significantly, three of these came from Features 3, 5, and 8, and two were found in association with *Haw River Net Impressed* sherds. Temper preference, as with other pottery found at the site, was to use crushed feldspar (n=9), sand (n=7), or medium-to-fine crushed quartz (n=3). All but one sherd have smoothed interiors. Of the five rimsherds found, all represent jar forms with everted rims and rounded (n=4) or thickened-and-flattened (n=1) lips. Vessel decoration, observed on two rimsherds, consisted of notching the lip/rim edge.

Hillsboro Check Stamped (Figure 2.16*n–o,q*)

Seven check stamped sherds were recovered from plowzone excavations and the surface. These sherds mostly have smoothed interiors (n=6) and are tempered with crushed feldspar (n=3), sand (n=2), or fine crushed quartz (n=2). Three of the four rimsherds found have everted profiles and rounded lips; the fourth sherd has a folded rim and a flattened lip. These sherds are all referable to the *Hillsboro Check Stamped* type (Coe 1952; Davis 1987).

Hillsboro Corncob Impressed

Three cob impressed sherds were recovered from the plowzone. All three are tempered with medium-to-fine crushed quartz and have smoothed interiors. These sherds are referable to the *Hillsboro Corncob*

Table 2.2. Distribution of pottery from the Guthrie site.

Context	Haw River: Net Impressed	Haw River: Cord Marked	Hillsboro: Plain	Hillsboro: Simple Stamped	Hillsboro: Check Stamped	Hillsboro: Corncob Impressed	Complicated Stamped Sherds	Indet.	Total
Haw River Phase									
Feature 1	5	-	1	-	-	-	-	3	9
Feature 3	5	1	2	1	-	-	-	11	20
Feature 5	2	-	-	1	-	-	-	3	6
Feature 8 (Burial 1)	-	-	-	1	-	-	-	-	1
Sub-total	12	1	3	3	0	0	0	17	36
Indeterminate Phase									
Plowzone	105	8	43	9	3	3	2	840	1013
Surface	31	1	3	7	4	-	1	28	75
Sub-total	136	9	46	16	7	3	3	868	1088
Total	148	10	49	19	7	3	3	885	1124

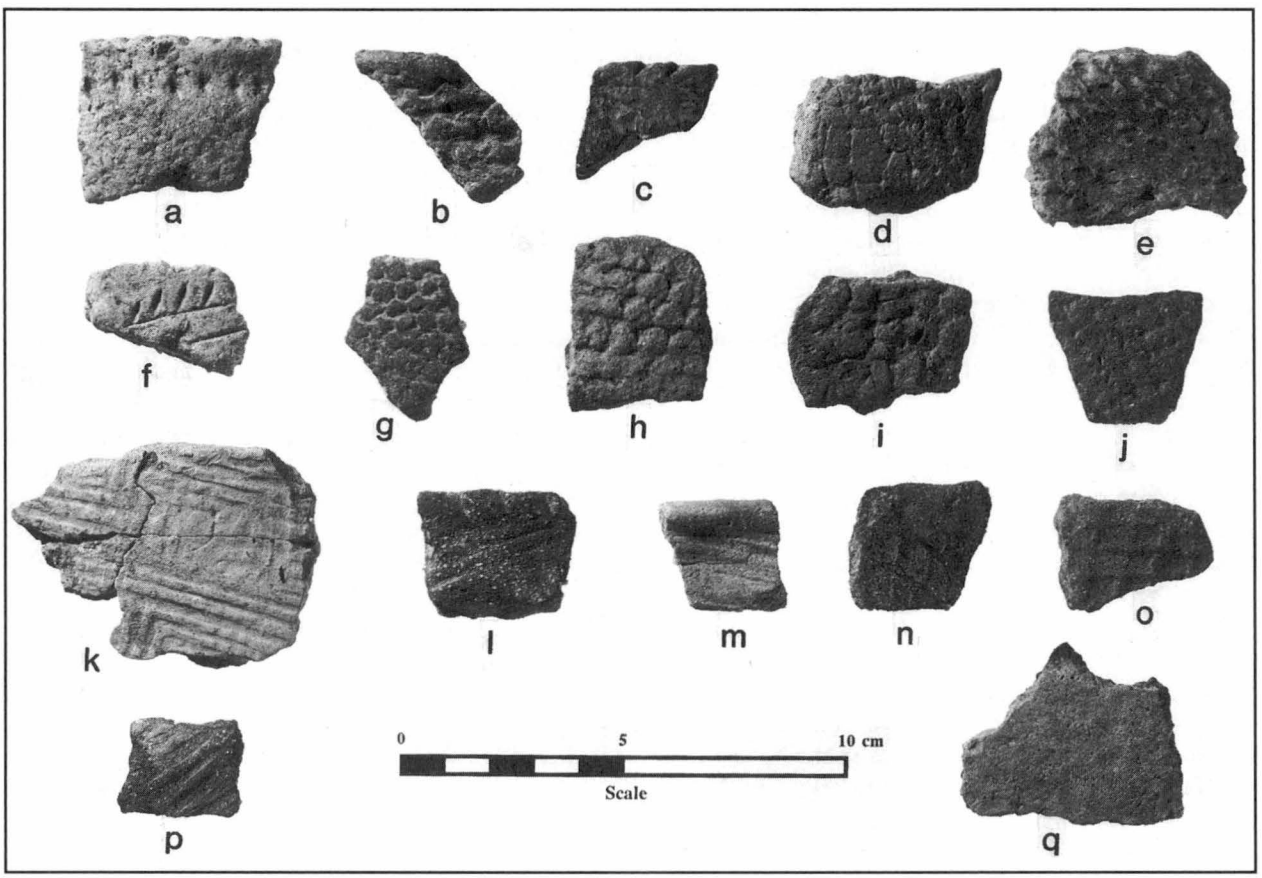

Figure 2.16. Potsherds from the Guthrie site.

Impressed type (Coe 1952; Wilson 1983). This type was defined at the early Hillsboro phase Wall site (31Or11) based on the occurrence of a single corncob impressed jar from Burial 4. Again, the occurrence of this type at the Guthrie site suggests a late Haw River phase association.

Complicated Stamped Sherds (Figure 2.16*k*)

Two complicated stamped body sherds and one rimsherd were recovered from the plowzone and

surface. These sherds had crushed feldspar and sand temper, and smoothed interiors. The rimsherd has an unidentifiable rectilinear stamp design, an everted rim profile with a rounded lip, and oblique incisions along the lip edge. These sherds do not conform to any established pottery types.

Indeterminate Sherds

Over 78% (n=885) of all sherds were classified as indeterminate because of an inability to determine the specific type of surface treatment. The majority of these sherds probably are from net impressed vessels.

Summary

Although the pottery sample from the Guthrie site is comparatively meager (particularly the portion of the sample recovered from features), it is nonetheless interesting in that it appears to represent an early stage in the development of the Hillsboro ceramic series within the Haw drainage. This series, represented by the plain, simple stamped, and check stamped pottery, comprised just over 30% of the identifiable sherd sample. In contrast, similar pottery found at the Holt and Webster sites comprises only about 5% of their ceramic assemblages. At a slightly later point in time, as represented at the Edgar Rogers and George Rogers sites, the Hillsboro series becomes the dominant ceramic series within the region.

Lithic Artifacts

Archaeological investigations at the Guthrie site produced a sample of 1,247 lithic artifacts (Table 2.3). Less than 15% of the sample was recovered from feature contexts; the remainder came from plowzone excavations and the surface. The lithic artifact sample is comprised of debitage and exhausted cores (n=982), chipped stone tools and tool fragments (n=255), ground stone tool fragments (n=2), and large cobble tools (n=8). Unfortunately, most of the artifacts in this sample appear to be associated with earlier Archaic components at the site. This assessment is based upon the number of Archaic projectile points recovered, types of raw material represented, artifact size (for debitage categories), and degree of surface patination. Major artifact categories are described below.

Debitage

Decortication Flakes. Sample Size: 136. Form: This category includes both primary (n=25) and secondary (n=111) decortication flakes. Decortication flakes exhibit a striking platform and bulb of percussion on the ventral surface, and have cortex (primary - >75% cortex; secondary - <75% cortex) remaining on the dorsal surface. Material: Felsic tuff-78, Vitric tuff-25, Other metavolcanic rock-15, Rhyolite-9, Basalt-4, Quartz-3, Slate-2. Comment: These flakes represent initial stages of lithic core reduction and tool manufacture. A majority of these flakes probably are associated with Archaic components at the site.

Interior/Bifacial Thinning Flakes. Sample Size: 717. Form: Interior flakes (n=540) are flat flakes that lack cortex, exhibit flake removal scars on the dorsal surface, and lack a steep platform angle. Bifacial thinning flakes (n=177) are similar to interior flakes but have a steep platform angle that evidences detachment from a biface. Material: Felsic tuff-372, Quartz-148, Vitric tuff-102, Other metavolcanic rock-48, Rhyolite-40, Slate-3, Basalt-3, Chert-1. Comment: Both interior and bifacial thinning flakes are byproducts of intermediate and final stages of bifacial tool production. As with decortication flakes, a majority of interior flakes and most all bifacial thinning flakes are Archaic in origin.

Shatter Fragments. Sample Size: 21. Form: Shatter fragments are angular flakes that, based on morphological characteristics, cannot be specifically classified. Material: Quartz-10, Other metavolcanic rock-5, Felsic tuff-2, Slate-2, Rhyolite-2. Comment: These artifacts result from all stages of stone tool manufacture.

Archaic Flakes. Sample Size: 47. Form: This category includes large, heavily patinated flakes from disturbed contexts. Material: Not classified. Comment: Further classification of these artifacts was not done in order to speed up analysis.

Other Flakes. Sample Size: 2. Form: One of these specimens, a blade, has parallel sides and a length that is twice its width. The other specimen is classified as a core rejuvenation flake and was detached from a core in order to facilitate subsequent flake removals. Material: Felsic tuff-1, Other metavolcanic rock-1. Comment: Both flake types are rare within lithic samples from the Haw drainage.

Cores. Sample Size: 58. Form: All artifacts in this category are amorphous chunks of raw material from which two or more flakes have been detached. Material: Quartz-34, Felsic tuff-8, Rhyolite-5, Vitric tuff-4, Other metavolcanic rock-4, Slate-3. Comment: As with other debitage, most cores appear to be associated with Archaic components.

Raw Material. Sample Size: 1. Form: This specimen is an unmodified piece of utilizable slate. Comment: None.

Projectile Points

Palmer Corner-Notched Projectile Point. Sample Size: 1. Form: Coe (1964:67) describes the *Palmer Corner-Notched* projectile point type as having "a small

Table 2.3. Distribution of lithic artifacts from the Guthrie site.

Category	Context PZ	Fea. 1	Fea. 3	Fea. 5	Fea. 6	Fea. 8	Surface	Total
Debitage								
Decortication Flakes	109	-	13	6	1	2	5	136
Interior/Bif. Thin. Flakes	531	13	91	23	8	13	38	717
Shatter Fragments	19	-	1	-	-	1	-	21
Flakes (Archaic)	35	-	-	-	-	-	12	47
Other Flakes	2	-	-	-	-	-	-	2
Cores	56	1	-	-	-	1	-	58
Raw Material	1	-	-	-	-	-	-	1
Projectile Points								
Palmer Corner-Notched	1	-	-	-	-	-	-	1
Kirk Corner-Notched	1	-	-	-	-	-	-	1
Stanly Stemmed	2	-	-	-	-	-	-	2
Morrow Mountain II Stemmed	1	-	-	-	-	-	1	2
Guilford Lanceolate	1	-	-	-	-	-	1	2
Savannah River Stemmed	1	-	-	-	-	-	3	4
Randolph Stemmed	3	-	-	-	-	-	-	3
Small Triangular Points	14	-	1	1	-	-	7	23
Unidentified Points	6	-	-	-	-	-	4	10
Other Chipped Stone Artifacts								
Preforms	7	-	-	-	-	-	3	10
Bifaces	7	-	1	-	-	-	9	17
Drills	2	-	-	-	-	-	-	2
Chipped Axes	1	-	-	-	-	-	1	2
Pièces Esquillées	2	-	-	-	-	-	-	2
Side Scrapers	2	-	-	-	-	-	-	2
End Scrapers	4	-	-	-	-	-	2	6
Denticulates	2	-	-	-	-	-	1	3
Perforators	2	-	-	-	-	-	-	2
Graver	1	-	-	-	-	-	-	1
Utilized/Retouched Flakes	133	1	2	1	-	3	20	160
Ground Stone Artifacts								
Ground Stone Fragments	2	-	-	-	-	-	-	2
Large Cobble Tools								
Cobble Choppers	2	1	-	-	-	1	-	4
Hammerstones/Manos	3	-	1	-	-	-	-	4
Total	953	16	110	31	9	21	107	1247

corner-notched blade with a straight, ground base and pronounced serrations." The specimen from the Guthrie site is unbroken and fits this description exactly. Material: Vitric tuff–1. Comment: This type projectile point type was recovered stratigraphically above late Paleo-Indian Hardaway material and below an Early Archaic Kirk zone at the Hardaway site (Coe 1964).

Kirk Corner-Notched Projectile Point. Sample Size: 1. Form: The *Kirk Corner-Notched* projectile point type is defined by a large triangular blade, a straight to slightly concave base, and corner notches (Coe 1964:69–70). This specimen, although unbroken, has been extensively reworked. Material: Felsic tuff–1. Comment: This is an Early Archaic projectile point type that has been radiocarbon dated to 8,000–6,800 B.C. in the Little Tennessee River valley (Chapman 1977).

Stanly Stemmed Projectile Points. Sample Size: 2. Form: Coe (1964:35) describes the *Stanly Stemmed* projectile point type as having "a broad triangular blade with a small squared stem and a shallow notched base." Both specimens are basal fragments of points that broke above the haft. Material: Felsic tuff–1,

Rhyolite–1. Comment: This is a Middle Archaic period point type that has been radiocarbon-dated to 5,800–5,500 B.C. in the lower Little Tennessee River valley (Chapman 1979).

Morrow Mountain II Stemmed Projectile Points. Sample Size: 2. Form: The *Morrow Mountain II Stemmed* projectile point type is defined by "a long narrow blade with a long tapered stem" (Coe 1964:37). One specimen is complete except for a broken tip; the other is the basal half of a point that snapped above the haft. Material: Vitric tuff–1, Other metavolcanic rock–1. Comment: This Middle Archaic projectile point type has been radiocarbon-dated to 5,500–5,000 B.C. in the lower Little Tennnessee River valley (Chapman 1977, 1979).

Guilford Lanceolate Projectile Points. Sample Size: 2. Form: According to Coe (1964:43–44), the *Guilford Lanceolate* projectile point type is defined by a long, thick, slender, blade with concave edges and a straight, rounded or convex base. One specimen is a small, complete point whereas the other is a mid-section fragment. Material: Vitric tuff–2. Comment: This point type dates to the Middle Archaic period (ca. 4,500–4,000 B.C.).

Savannah River Stemmed Projectile Points. Sample Size: 4. Form: The *Savannah River Stemmed* projectile point type is defined by a large, heavy triangular blade and a broad stem with a straight or indented base (Coe 1964:44–45). Three of these specimens are bases of points that broke at mid-section; the fourth specimen is complete except for a broken tip. Material: Rhyolite–2, Felsic tuff–1, Other metavolcanic rock–1. Comment: This point type dates to the Late Archaic period (ca. 2,000 B.C.).

Randolph Stemmed Projectile Points (Figure 2.17 *t–v*). Sample Size: 3. Form: The *Randolph Stemmed* projectile point type is defined by a small, narrow, and thick blade, and a roughly tapered stem (Coe 1964:49–50). One of these projectile points is unbroken; the other two are basal halves of broken points. Material: Felsic tuff–2, Vitric tuff–1. Comment: Coe (1964) has attributed this point type to the Historic period (ca. A.D. 1720–1800); however, this association has never been verified archaeologically. It is possible that these artifacts are associated with the Haw River phase component at the Guthrie site.

Small Triangular Projectile Points (Figure 2.17*a–s*). Sample Size: 23. Form: All small triangular projectile points in the sample are generally referable to the *Caraway Triangular* type (Coe 1964:49). Five point fragments are too small to determine edge configuration; the remainder have either incurvate sides and base
(n=6), incurvate sides and a straight base (n=2), incurvate sides and an excurvate base (n=3), straight sides and an excurvate base (n=1), straight sides and base (n=1), or straight sides and an incurvate base (n=4). These points range from 19 mm to 47 mm (mean=26.5, sd=7.3, n=11) in length, 14 mm to 27 mm (mean=18.5, sd=3.1, n=20) in width, and 3 mm to 9 mm (mean=4.6, sd=1.6, n=21) in thickness. Material: Vitric tuff–16, Felsic tuff–4, Other metavolcanic rock–1, Chert–1, Unidentified–1. Comment: All of these specimens probably are associated with the Haw River phase occupation of the site.

Projectile Point Fragments. Sample Size: 9. Form: These are fragments of projectile points that cannot be assigned to a specific point type or category. Eight of these specimens are tips or mid-section fragments from large projectile points. The other specimen is a stem fragment with an indented base. Material: Felsic tuff–4, Vitric tuff–4, Other metavolcanic rock–1. Comment: All of these artifacts probably date to the Middle Archaic or Late Archaic periods.

Other Chipped Stone Artifacts

Preforms. Sample Size: 10. Form: Preforms are bifaces that exhibit final stages of reduction and shaping but lack modification of the haft area. Material: Vitric tuff–6, Felsic tuff–3, Other metavolcanic rock–1. Comment: Eight of these specimens are small flakes that have been retouched into a triangular shape, and are interpreted as Late Prehistoric triangular projectile point preforms. The two remaining specimens are large, patinated bifaces that appear to represent unfinished Archaic stemmed projectile points.

Bifaces. Sample Size: 17. Form: Bifaces are blanks that exhibit flake removal scars, resulting from either percussion or pressure flaking, on both surfaces. Material: Vitric tuff–9, Felsic tuff–6, Rhyolite–1, Quartz–1. Comment: Seven artifacts, including the specimen from Feature 3, are small unpatinated bifaces and biface fragments that apparently represent an early stage of triangular point manufacture. The remaining specimens are large, often patinated bifaces and biface fragments, and probably reflect early stages of Archaic projectile point manufacture.

Drills (Figure 2.17*w*). Sample Size: 2. Form: One specimen is a small flake, modified into a triangle, that has a bifacially reworked, pointed end. The other specimen is a small triangular biface that has a long, parallel-sided, rod-like projection produced by bifacial retouch. Material: Vitric tuff–2. Comment: Both drills, given their small size and triangular form, apparently are associated with the Late Prehistoric occupation of the site. These tools probably were hafted and used on dense materials such as wood, bone, antler, or soft stone.

Chipped Axes. Sample Size: 2. Form: Both specimens are large bifaces with opposing, shallow, chipped notches for hafting along the lateral edge. This type of artifact usually is classified as a *Guilford Axe* (Coe 1952). Material: Rhyolite–1, Other metavolcanic rock–1. Comment: This axe type is associated

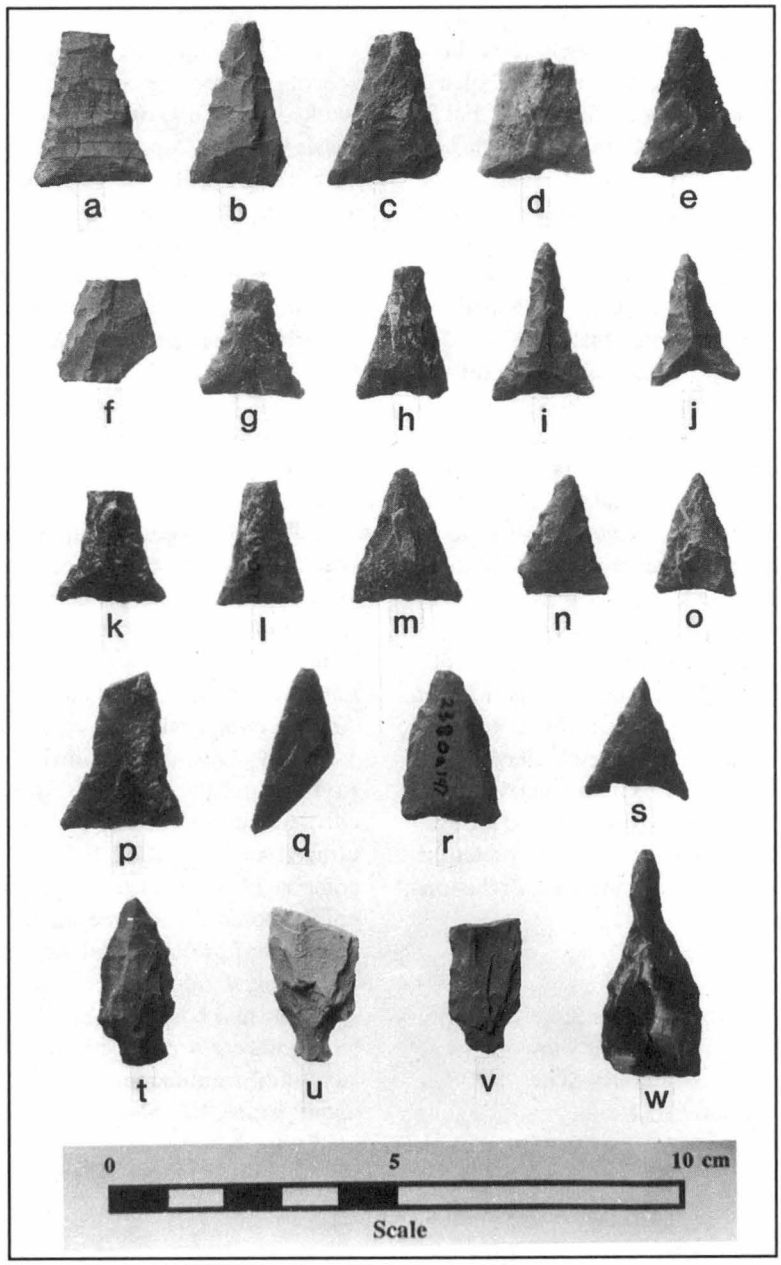

Figure 2.17. Chipped stone projectile points and drills from the Guthrie site.

with *Guilford Lanceolate* projectile points and dates to the Middle Archaic period (ca. 4,500–4,000 B.C.).

Pièces Esquillées. Sample Size: 2. Form: Pièces esquillées are flakes, bifaces, or exhausted cores that exhibit one or more sharp, straight, crushed working edges, produced by repeated blows using a bipolar percussion technique. One of these tools was produced on a decortication flake; the other may actually be an exhausted bipolar core. Material: Vitric tuff–1, Quartz–1. Comment: These are interpreted as slotting or wedging tools.

Side Scrapers. Sample Size: 2. Form: One of these artifacts is a small decortication flake that exhibits continuous retouch along both lateral edges. The other is a large, thick, quartz flake with continuous retouch along both lateral edges and the distal end. Material: Quartz–1, Vitric tuff–1. Comment: The quartz specimen probably represents an Archaic tool while the other scraper may date to the Late Prehistoric period. Side scrapers are interpreted as hide-scraping and cutting tools.

End Scrapers. Sample Size: 6. Form: Four of these artifacts are flakes that exhibit retouch along the distal end. The other two are triangular bifaces that exhibit use-wear along the basal edge. Material: Felsic tuff–2, Vitric tuff–3, Quartz–1. Comment: Most of these artifacts may be associated with the Haw River phase occupation.

Denticulates. Sample Size: 3. Form: Two of these artifacts are large, patinated flakes with retouched, denticulate edges. The third specimen is a small quartz flake with a serrated lateral edge. Material: Felsic tuff–1, Vitric tuff–1, Quartz–1. Comment: Both patinated specimens probably are Archaic whereas the quartz tool may be associated with the Haw River phase component. Denticulates are interpreted as cutting tools.

Perforators. Sample Size: 2. Form: Both artifacts are small flakes with projections that exhibit edge damage resulting from use. Material: Vitric tuff–1, Felsic tuff–1. Comment: Both specimens probably are Late Prehistoric tools.

Graver. Sample Size: 1. Form: This specimen is a small, patinated decortication flake that exhibits recent (Late Prehistoric ?) retouch along one edge to produce a small, sharp, triangular projection. Material: Vitric tuff–1. Comment: Artifacts with graver edges are interpreted as engraving or scoring tools.

Utilized and Retouched Flakes. Sample Size: 160. Form: This category includes flakes that exhibit marginal retouch (n=76) or edge damage (n=84) presumably resulting from use. Material: Felsic tuff–79, Vitric tuff–42, Quartz–25, Other metavolcanic rock–7, Rhyolite–3, Slate–2, Basalt–1, Schist–1. Comment: Utilized and retouched flakes are interpreted as *ad hoc* cutting tools. Both Archaic and Late Prehistoric tools appear to be present.

Ground Stone Artifacts

Ground Stone Fragments. Sample Size: 2. Form: Both are small fragments of stone that show evidence of grinding or polishing. Material: Slate–1, Other metavolcanic rock–1. Comment: None.

Large Cobble Tools

Cobble Choppers. Sample Size: 4. Form: These specimens are large cobbles that have been bifacially worked along one or more edges. Material: Schist–3, Felsic tuff–1. Comment: These implements may have been used for heavy chopping tasks. Their cultural affiliation is uncertain.

Hammerstones/Manos. Sample Size: 4. Form: Hammerstones and manos are cobbles that show signs of grinding or battering along one or more surfaces. Material: Quartzite–2, Quartz–1, Other metavolcanic rock–1. Comment: These artifacts are interpreted as hand-held hammers or grinding tools. Their cultural association is uncertain.

Summary

Culturally diagnostic lithic artifacts from the Guthrie site indicate that it was occupied several times. It is argued, based on the predominance of large, patinated flakes within the debitage sample, that a majority of the lithic artifacts are associated with Archaic rather than Late Prehistoric cultural components at the site. These Archaic components are represented by Palmer, Kirk, Stanly, Morrow Mountain II, Guilford, and Savannah River projectile points, Guilford axes, a side scraper, two denticulates and some of the preforms, bifaces, and utilized and retouched flakes. The Haw River phase component is represented by small triangular projectile points, possibly the three Randolph Stemmed projectile points, and preforms, bifaces, both drills, both pièces esquillées, a side scraper, end scrapers, a denticulate, a graver, and both perforators. These Late Prehistoric tools indicate a range of activities, including chipped stone tool manufacture, weapon repair, non-lithic tool manufacture, butchering, and hideworking.

Clay Artifacts

One clay pipe fragment was recovered from the plowzone. This specimen is a thick (13–14 mm) stem fragment from a crushed feldspar tempered pipe of indeterminate morphology.

Historic Artifacts

Thirty-five Euroamerican artifacts were recovered from the surface and plowzone at the Guthrie site, and include: 17 potsherds, four glass fragments, seven iron nails, one iron knife blade, one horseshoe, and five cinders. All of these artifacts date to the nineteenth and twentieth centuries, and are not associated with the aboriginal occupation of the site.

Botanical Remains

by

Kristen J. Gremillion

Carbonized plant remains from the Guthrie site were recovered from 17 flotation samples comprising 162 liters of feature fill (Tables 2.4, 2.5, and 2.6). Other plant remains from waterscreened fill were not analyzed. A total of 9.35 grams of wood charcoal, charred seeds, and nutshell was recovered from Features 1, 2, 3, 5, 6, and 8.

In general, plant food remains are less abundant and

less diverse than collections from the other sites investigated in the Haw River drainage. Hickory is the most abundant nut type at the site while only minor quantities of walnut and acorn shell were recovered. The only identified seeds were two black gum seeds and one possible grass caryopsis. The most interesting fact about this paleoethnobotanical assemblage is the absence of maize. However, considering the low overall density of plant food remains at the site, no inferences about subsistence should be drawn from this piece of evidence.

Summary

The Guthrie site informs on the later end of the Haw River phase (ca. A.D. 1300–1400) and provides some interesting contrasts to other Haw River phase sites. The most notable difference between Guthrie and sites such as Holt, Webster, and the Hogue site near Hillsborough is the scarcity of remains, both from the plowzone and from feature contexts. Although a high density of pit features is not characteristic of any Haw River phase site, the features that do occur usually contain rich deposits of potsherds, food remains, and other cultural debris. The Guthrie site also contrasts sharply with the late (?) Haw River phase component at the Mitchum site, where a thin midden and numerous artifacts suggest a larger and longer occupation.

The presence of a few rich pit features scattered across the Guthrie site cannot be ruled out entirely, however. Pothunters' reports of pits and burials along the flanks of the ridge north of the excavation area may reflect an area of more intense activity, but features here have been lost to erosion. However, the fact remains that the pits excavated in 1987, in an area of the site with the greatest concentration of surface artifacts, contained very little cultural material and no evidence of maize or other cultigens. The excavated data, in conjunction with extensive auger tests, also support the interpretation of a small, scattered, and comparatively brief settlement. The resident population of the Guthrie site appears to have been considerably smaller and less dense than most contemporary settlements in the Haw drainage, and certainly does not compare with the contemporary Dan River phase settlements to the north.

Table 2.4. Carbonized plant remains from the Guthrie site (weight in grams).

Context	Soil Volume (liters)	Wood Charcoal	Unknown Plant	Plant Food Remains	Total
Feature 1					
Zone 1	10	0.90	0.06	0.08	1.04
Zone 2	10	2.55	0.03	0.86	3.44
Sub-total	20	3.45	0.09	0.94	4.48
Feature 2					
Zone 1	10	0.02	<0.005	-	0.02
Zone 2	10	0.09	<0.005	-	0.09
Zone 3	10	0.01	0.01	<0.005	0.02
Sub-total	30	0.12	0.01	<0.005	0.13
Feature 3					
Zone 1	10	0.45	0.03	0.53	1.01
Feature 5					
Zone 1	20	1.26	0.05	0.40	1.71
Feature 6					
Zone 1	10	0.06	-	-	0.06
Zone 2	22	0.02	<0.005	-	0.02
Zone 3	10	0.07	0.01	-	0.08
Zone 4	10	0.04	0.01	-	0.05
Zone 5	10	0.02	-	0.01	0.03
Sub-total	62	0.21	0.02	0.01	0.24
Feature 8					
Zone 1	10	0.59	0.05	0.19	0.83
Zone 2	10	0.28	0.02	0.10	0.40
Zone 3	10	0.54	-	0.01	0.55
Sub-total	30	1.41	0.07	0.30	1.78
Total	172	6.90	0.27	2.18	9.35

Table 2.5. Summary of plant food remains from the Guthrie site (weight in grams).

Sample	Hickory Shell	Acorn Shell	Walnut Shell	Seeds	Total
Feature 1					
Zone 1	0.02	<0.005	-	0.06	0.08
Zone 2	0.86	<0.005	-	-	0.86
Sub-total	0.88	<0.005	-	0.06	0.94
Feature 2					
Zone 3	<0.005	-	-	-	<0.005
Feature 3					
Zone 1	0.51	<0.005	0.02	<0.005	0.53
Feature 5					
Zone 1	0.18	<0.005	-	<0.005	0.18
Zone 1 (Ash Lens)	0.21	0.01	-	-	0.22
Sub-total	0.39	0.01	-	<0.005	0.40
Feature 6					
Zone 5	0.01	-	-	-	0.01
Feature 8					
Zone 1	0.18	0.01	-	<0.005	0.19
Zone 2	0.10	-	-	-	0.10
Zone 3	0.01	-	-	-	0.01
Sub-total	0.29	0.01	-	<0.005	0.30
Total	2.08	0.02	0.02	0.06	2.18

Table 2.6. Seed and fruit counts from the Guthrie site.

Sample	Black Gum	Unknown	Poaceae ?	Total
Feature 1				
Zone 1	2	-	1	3
Feature 3				
Zone 1	-	1	-	1
Feature 5				
Zone 1	-	3	-	3
Feature 8				
Zone 1	-	1	-	1
Total	2	5	1	8

Chapter 3

The Edgar Rogers Site

The Edgar Rodgers site (RLA-Am162; 31Am167) is located on Cane Creek in Alamance County, North Carolina, approximately three miles upstream from the Guthrie site. The site lies along a terrace at the foot of a steep ridge and overlooks a narrow floodplain paralleling the creek (Figure 3.1). Site information was given to the Research Laboratories of Anthropology by an amateur collector who thought an intact midden might be present. In April 1987, a 50-ft by 100-ft grid was superimposed over the suspected midden area, and auger tests were placed at 2.5-ft intervals. A dark brown zone of buried soil was encountered; however, the auger cores, supplemented by several shovel tests, revealed that this soil was colluvium washed in from the slope of the steep ridge that borders the site to the southwest.

While the initial testing was being carried out, a second area containing scattered mussel shell and aboriginal pottery on the ground surface was observed. Here, a 50-ft by 50-ft block also was auger tested and 12 of the 440 auger tests yielded evidence of buried, sub-plowzone features. Given the clustered distribution of these tests and a general lack of artifacts on the surface in the surrounding area, it was felt that an isolated house might be present. The pottery collected from the site surface, along with a piece of rum-bottle glass, further suggested that the occupation might date to the Contact period (i.e., after the mid-seventeenth century).

A total of nine contiguous 10-ft by 10-ft squares were excavated in the area of the positive auger tests (Figures 3.2 and 3.3). An additional 10-ft by 10-ft unit was taken out 50 ft east of the main excavation, in an area where surface material indicated a possible buried feature. Nine large, shallow features and numerous postholes were uncovered in the block excavation, while a burial was recovered from the isolated excavation unit (Figure 3.4). All of these remains are associated with a late Hillsboro phase (ca. A.D. 1500–1600) occupation of the site.

Stratigraphy

The location of the Edgar Rogers site on a terrace above the floodplain resulted in heavy soil erosion, exacerbated by years of plowing. As a consequence, the features were unusually shallow, seldom more than a few tenths of a foot in depth, and any trace of an old humus or midden zone was completely lacking. The plowzone was less than a foot thick in the southern half of the excavation but increased to almost 1.5 ft in the northern half. Apparently, the soil at the site is being moved down the slope of the terrace by plowing practices and sheet erosion. In all areas of the excavation, a stiff red clay subsoil lay directly beneath the plowzone (Figure 3.5).

Features and Burials

Eleven features, including one human burial, were excavated at the Edgar Rogers site. One feature (Feature 11) represents a cluster of artifacts found at the top of subsoil, probably the remnant of a plowed-out pit. All of the other features and burials were less than 1.0 ft deep and represent the bottoms of pits truncated by the plow and erosion. A summary of these features is presented in Table 3.1.

Although badly eroded, some of these features appear to be very similar to large food preparation facilities identified at other late Hillsboro phase sites and later Contact period sites in the Haw, Eno, and Dan River drainages. These large, shallow features are very different from earlier Haw River and Dan River phase storage pits, as well as later storage facilities that continued to be used until the end of the Contact period. The introduction of this new feature type may reflect important and fundamental changes in domestic and ceremonial behaviors that evolved during the decades just prior to European contact and intensified after sustained interaction between Whites and Indians. However, by the end of the seventeenth century, large food preparation facilities ceased to be used, perhaps indicating a breakdown in some aspects of communal life.

Feature 1

This large, oval-shaped feature was located in the north-central portion of the block excavation at the Edgar Rogers site. Its top revealed two fill zones: Zone 1, a dark brown (7.5YR 4/4) loam with charcoal and fired clay particles located in the center; and Zone 2, a yellowish red (5YR 4/6) loam with charcoal appearing around the perimeter of the feature (Figure 3.6). Due to its large size (i.e., 8.8 ft by 6.5 ft), the pit was excavated in quadrants aligned with its long

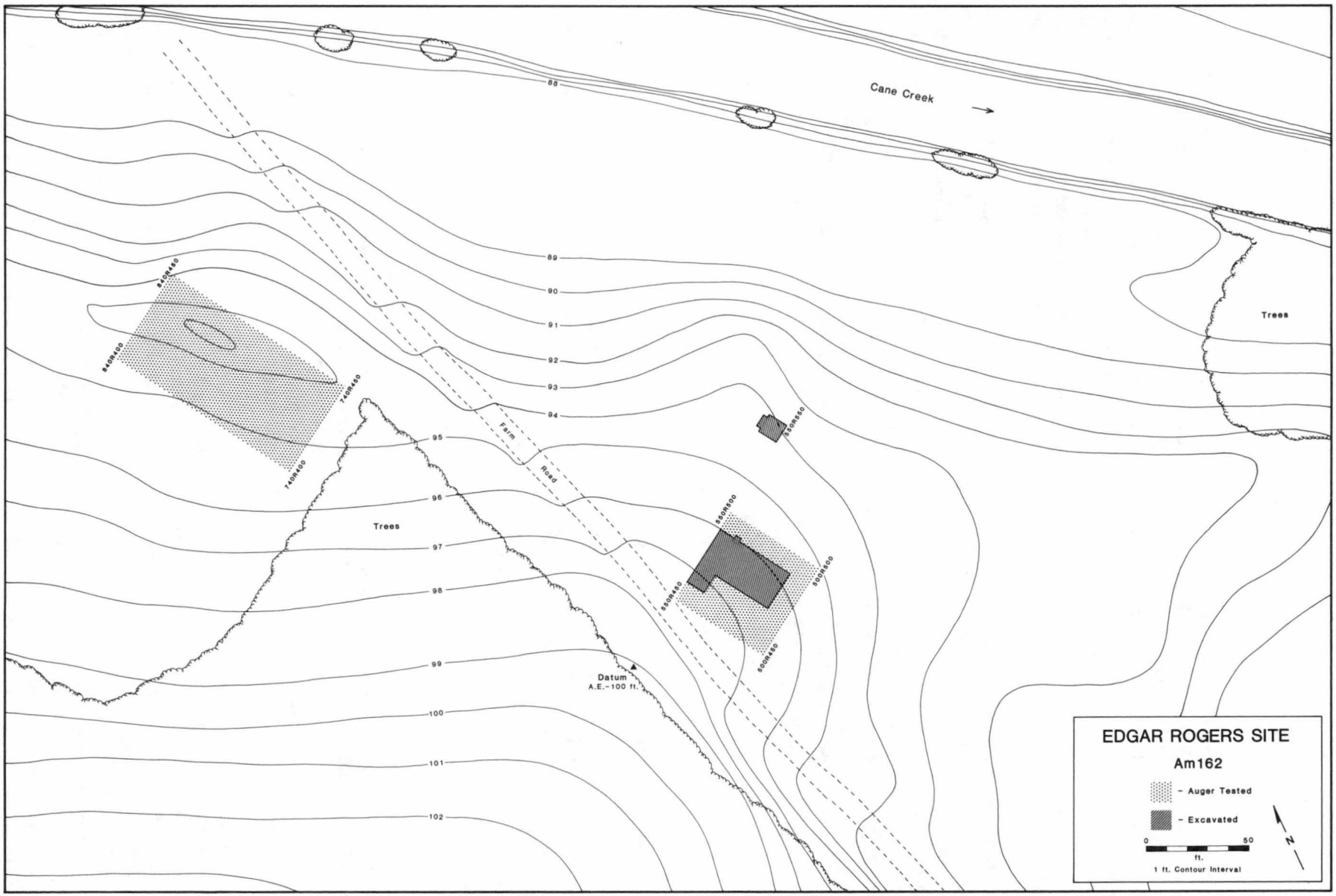

Figure 3.1. Map of the Edgar Rogers site showing areas of auger testing and excavation.

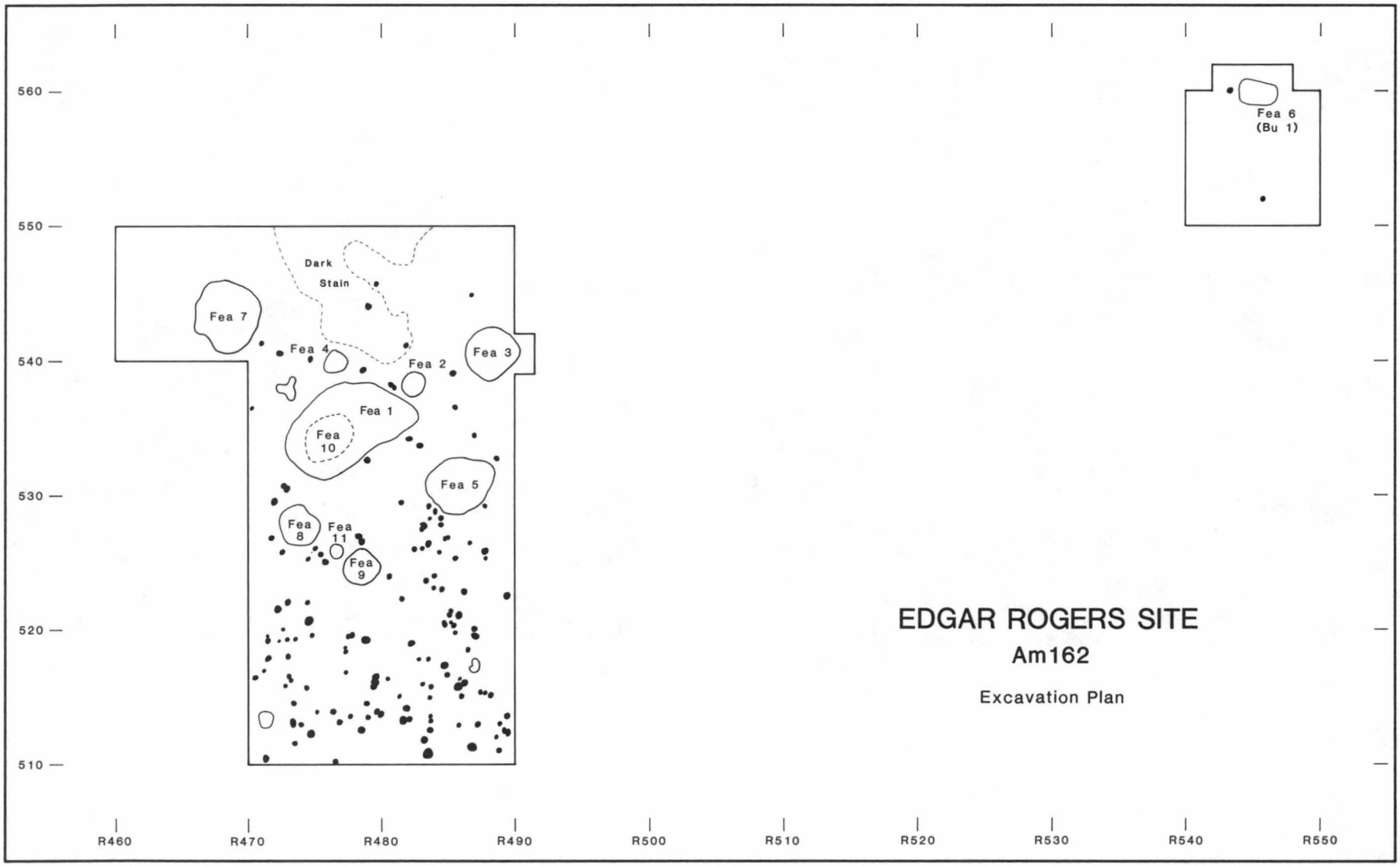

Figure 3.2. Excavation plan at the Edgar Rogers site.

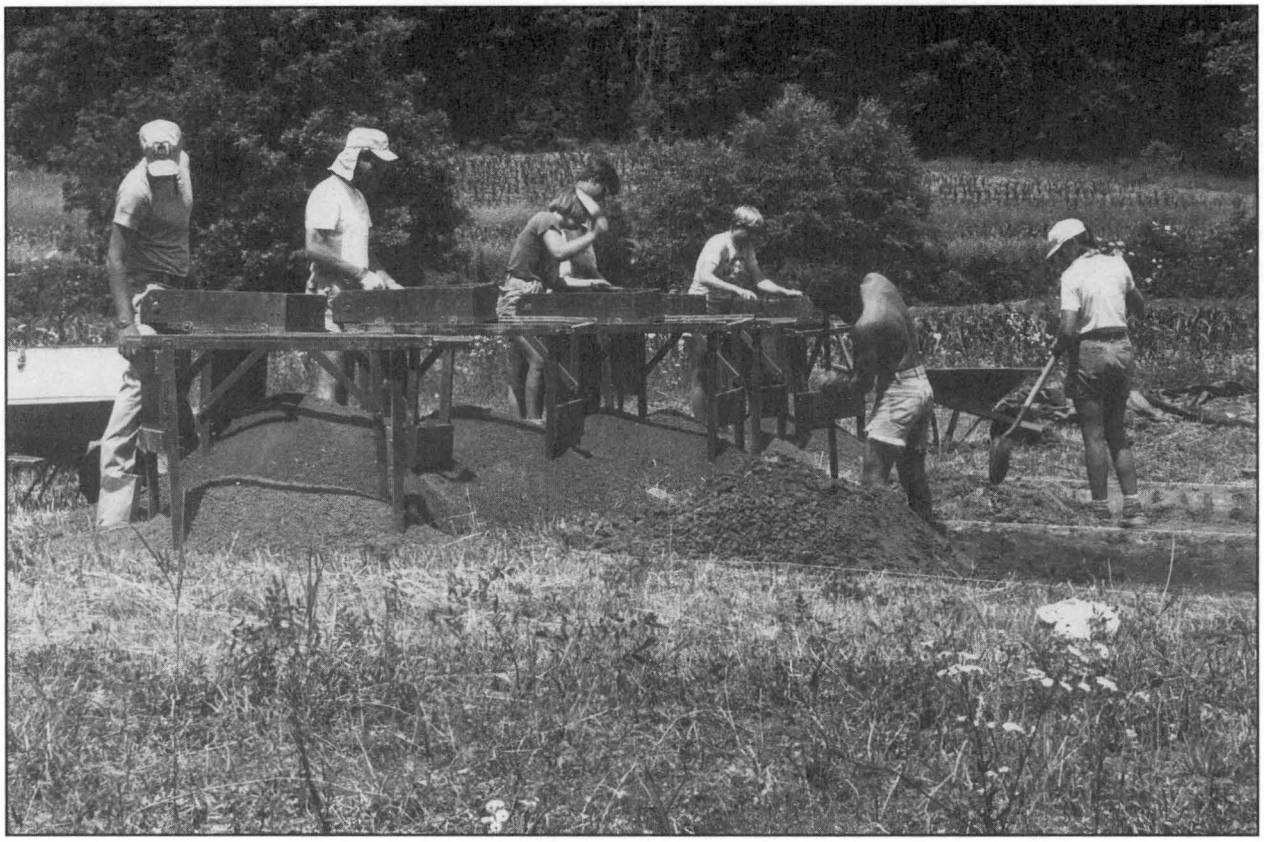

Figure 3.3. Excavating and screening plowed soil at the Edgar Rogers site.

Figure 3.4. Excavating features at the Edgar Rogers site.

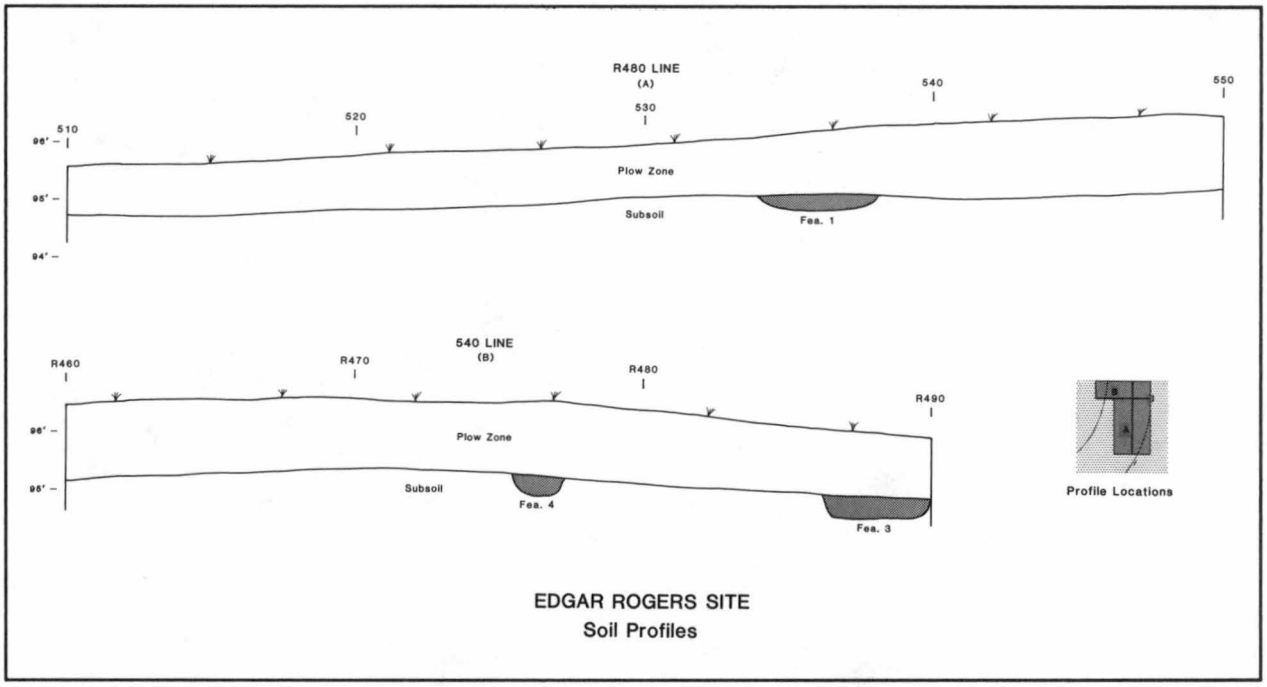

Figure 3.5. Stratigraphic profiles.

Table 3.1. Summary of features identified at the Edgar Rogers site.

Feature No.	Type	Center Location	Dimensions (ft) L	W	D	Phase Association	Comment
Fea. 1	Roasting Facility	535.0R477.0	8.8	6.5	0.8	Hillsboro	Excavated
Fea. 2	Basin	538.2R482.5	1.8	1.3	0.1	Hillsboro	Excavated
Fea. 3	Roasting Facility	540.5R488.5	4.2	3.7	0.4	Hillsboro	Excavated
Fea. 4	Basin	540.0R476.5	1.9	1.9	0.4	Hillsboro ?	Excavated
Fea. 5	Roasting Facility	528.4R485.8	5.1	4.3	0.3	Hillsboro	Excavated
Fea. 6 (Bu. 1)	Burial	557.8R545.3	2.7	2.1	0.6	Hillsboro	Excavated
Fea. 7	Roasting Facility	544.0R468.8	5.7	5.1	0.1	Hillsboro	Excavated
Fea. 8	Basin	527.5R473.8	3.0	3.0	0.3	Hillsboro	Excavated
Fea. 9	Basin	424.7R478.4	3.0	2.8	0.6	Hillsboro	Excavated
Fea. 10	Burial ?	534.3R476.2	3.9	3.0	0.9	Hillsboro	Excavated
Fea. 11	Artifact Cluster	525.7R476.6	1.1	0.8	0.2	Hillsboro	Excavated

axis. Excavation revealed a relatively shallow (0.8 ft), basin-shaped profile, where Zone 1 lay atop Zone 2 which appeared to line the facility. Feature 10 was defined at the bottom of Feature 1, the latter apparently intruding the former (Figures 3.7 and 3.8).

A wide range of cultural materials was recovered from both zones of the feature. Most prevalent were animal bones, pottery sherds, mussel shells, daub, and charcoal. Its size and fill characteristics suggest the feature was used in food preparation activities, perhaps as a large communal roasting facility. Wood charcoal recovered from Zone 1 yielded a radiocarbon age of 350 ± 50 years: A.D. 1600 (Beta-23509). This assessment is consistent with the predominance of Hillsboro series pottery within Feature 1 and indicates a late Hillsboro phase (A.D. 1500–1600) chronological position for the Edgar Rogers site.

Feature 2

This was a very shallow, almost circular stain, measuring 1.8 ft by 1.3 ft. The dark yellowish brown (10YR 3/4) fill was only 0.1 ft deep and contained a simple stamped sherd, lithic debitage, and a few animal bones and mussel shells. This feature probably represents the bottom of a once deeper facility worn down by plowing and erosion. It was located adjacent to the northern edge of Feature 1 and approximately 5 ft east of Feature 4, a shallow feature almost identical to Feature 2.

Figure 3.6. Feature 1, before excavation.

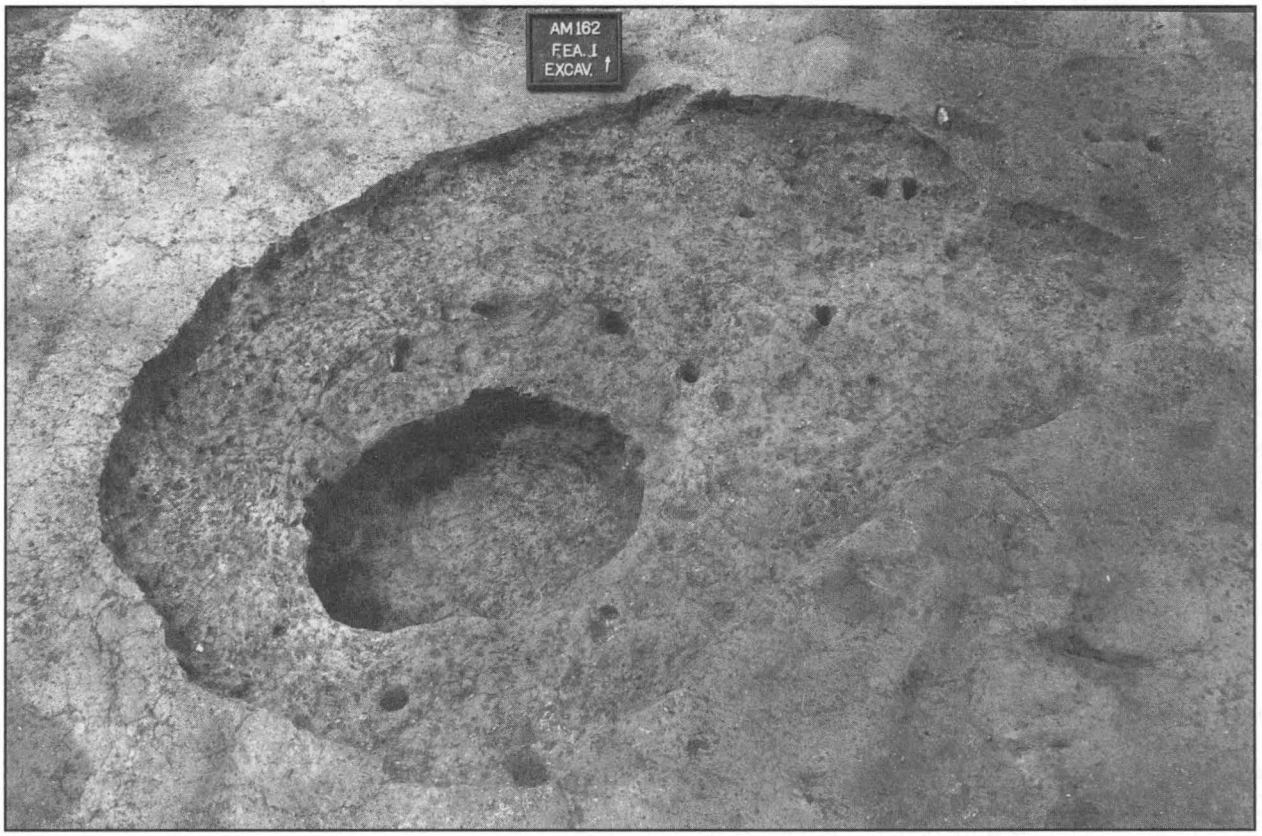

Figure 3.7. Features 1 and 10 (in center), excavated.

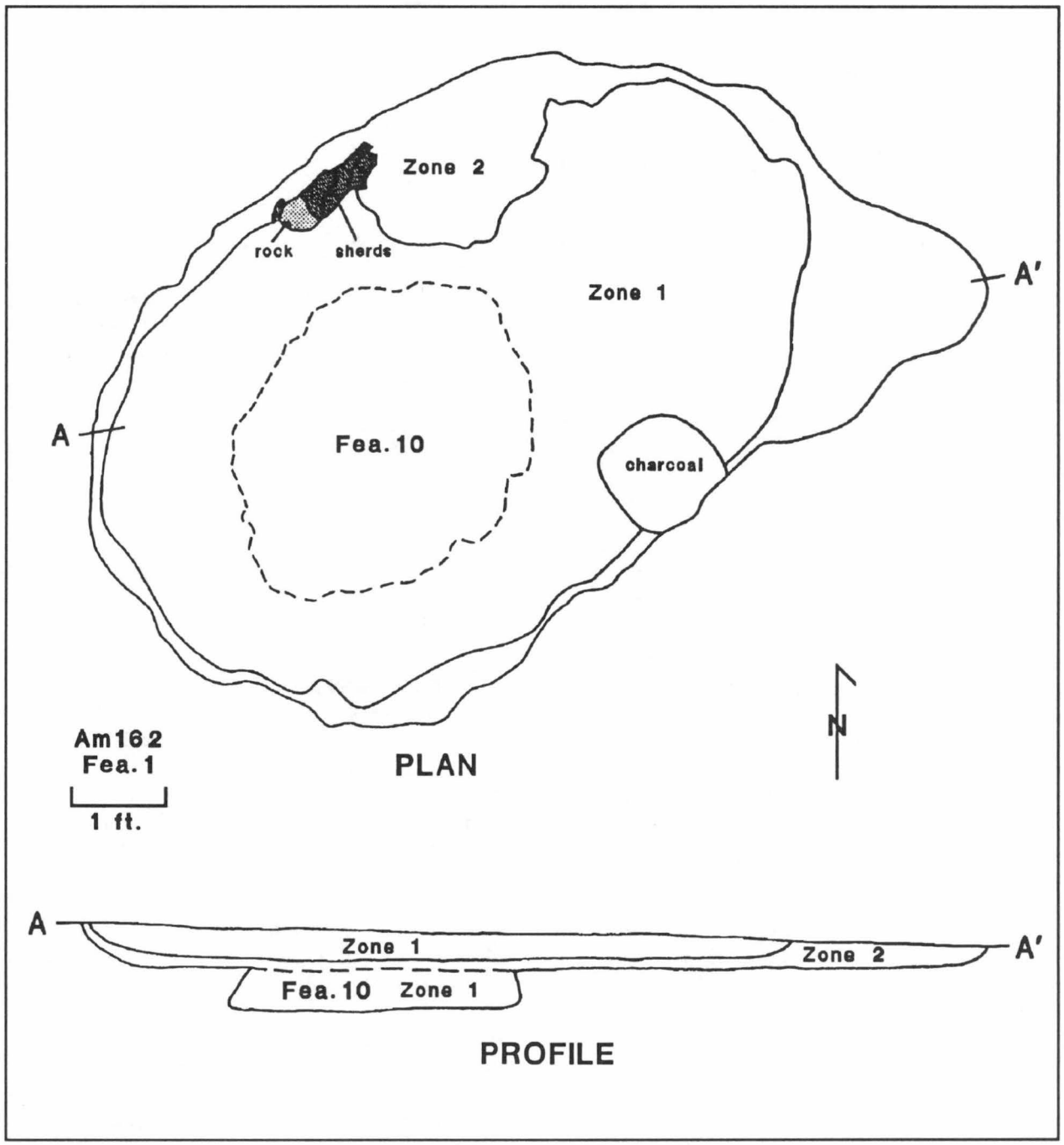

Figure 3.8. Features 1 and 10, plan view and profile drawings.

Feature 3

Feature 3 was uncovered near the northeast corner of the excavation block. At the subsoil surface, a nearly circular stain of dark brown (10YR 3/3) loam containing charcoal and mussel shells contrasted sharply with the surrounding red clay matrix. Although not considered a separate zone, the pit was almost completely surrounded by a narrow band of Zone 1 fill that was mottled with orange clay. In addition, small pockets of orange clay and ash were encountered throughout. A small posthole intruded the eastern edge of the feature (Figure 3.9).

The fill was rich in cultural material, including potsherds, animal bones, serrated and unserrated mussel shells, and debitage. Of particular interest were several large pottery sherds in the upper portion of the fill. Different vessels were represented, and in some cases, the sherds seemed to be layered. After excavation, the basin-shaped pit measured 3.7 ft by 4.2 ft and was 0.4 ft deep. The fill characteristics point to refuse

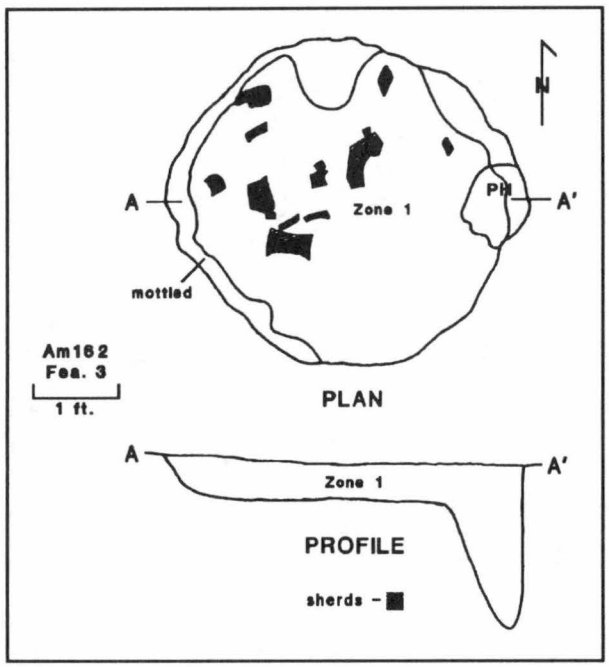

Figure 3.9. Feature 3, plan view and profile drawings.

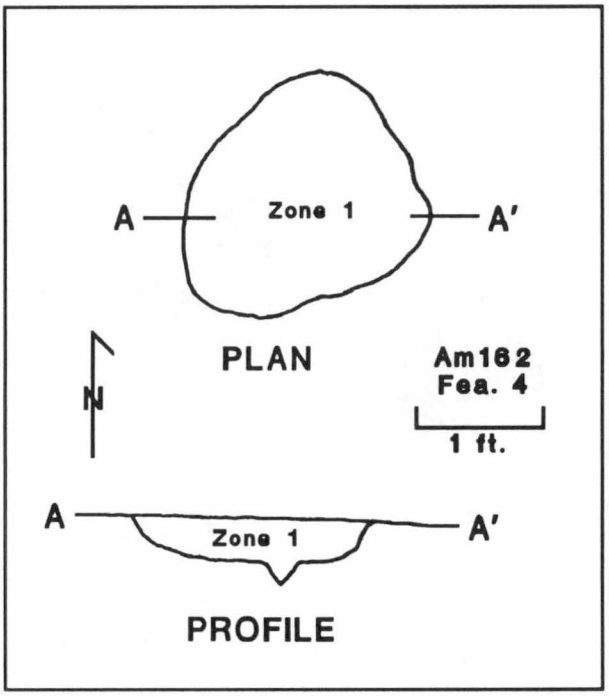

Figure 3.10. Feature 4, plan view and profile drawings.

generated by food preparation and consumption. The pit itself was probably used during the course of these activities.

Feature 4

In terms of size, shape, and fill attributes, this facility was almost identical to Feature 2. It was, however, a little deeper, extending 0.4 ft beneath the subsoil surface. The feature first appeared as a circular patch of dark brown (10YR 4/4) loam containing small fragments of charcoal and fired clay. This fill also produced a few animal bones, mussel shells, and flakes. After excavation, the basin-shaped pit measured 1.9 ft in diameter (Figure 3.10).

Feature 5

This large, slightly irregular feature measured 5.1 ft by 4.3 ft and was located just southeast of Feature 1. The fill consisted of a single zone of dark yellowish brown (10YR 3/4) loam with flecks of charcoal and shell particles. A few pottery sherds, animal bones, flakes, and daub fragments also were recovered. The facility was very shallow, measuring only 0.3 ft at its deepest point. It may have functioned in food preparation activities similar to Feature 1.

Feature 6 (Burial 1)

This feature designation was assigned to a burial (Burial 1) in Sq. 550R550, located 50 ft east of the main excavation block. At the subsoil surface, the burial was defined by a dark brown (10YR 3/2) loam with flecks of charcoal that contained mussel shells, animal bones, and a few pottery sherds. Although Zone 1 fill extended across the top of the pit, it rapidly reduced to a small pocket near its center. This small deposit continued to the bottom of the burial. Surrounding the pocket of dark brown loam was Zone 2, an orange clay mottled with brown loam. This fill resembled typical burial fill, whereas the upper fill was more like that from the other shallow, basin-shaped pits.

The burial pit was rectangular in plan, measuring 2.7 ft east-west by 2.1 ft north-south (Figure 3.11). Like the other features, it was shallow and only extended to a depth of 0.6 ft below the subsoil. The poorly preserved remains of a child, about nine years old, rested on the floor of the grave. The body was apparently flexed with the head pointing to the east. No grave goods were present, although pieces of charred wood lay along the southern wall, in the northwest corner of the pit, and behind the skull. After the burial was photographed and drawn, the pit was carefully refilled without removing any skeletal remains.

The upper fill zone of relatively rich organic soil suggests a pattern of mortuary behavior similar to that described at the Fredricks site where feasting appears to have been an important component of the burial ritual (Ward 1987). The shallow burial pit further illustrates the impact of plowing and erosion on the site.

Feature 7

Feature 7 was located approximately 10 ft northwest of Feature 1. In terms of size and fill characteristics, Feature 7 was almost identical to Feature 5. This

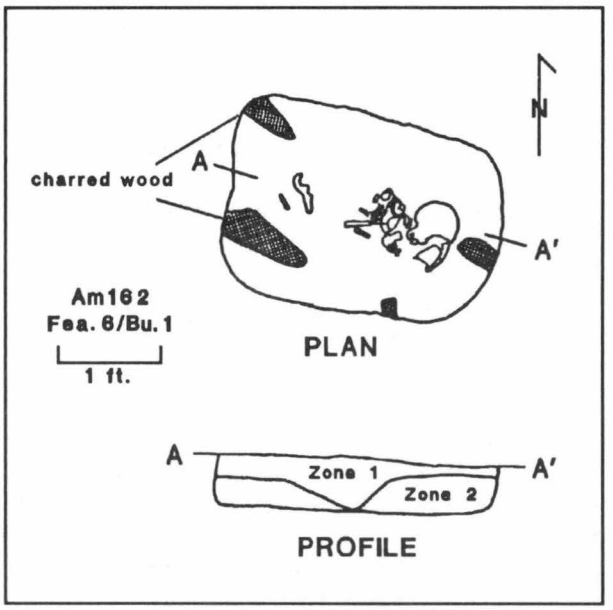

Figure 3.11. Feature 6 (Burial 1), plan view and profile drawings.

shallow, roughly circular, basin contained a thin zone of dark, yellowish brown (10YR 3/3) loam with flecks of charcoal and shell. Numerous pottery sherds, animal bones, mussel shells, lithic debris, and daub also were recovered from the fill. After excavation, Feature 7 measured 5.1 ft by 5.7 ft and was only 0.1 ft thick (Figure 3.12). It resembled a lens or smear of culturally rich soil rather than the remnant of a subterranean pit facility. The behavior responsible for this feature was very similar to that which created Feature 5 and probably Feature 1 as well.

Feature 8

After the removal of the plowzone, this feature was defined by an irregularly-shaped circular deposit of dark, grayish brown (10YR 3/6) loam mottled with fragments of orange clay. Two small concentrations of charcoal and a small ash pocket were observed at the top of the pit. Except for a few mussel shells, flakes, and bone fragments, cultural remains were sparse. After excavation, the basin-shaped pit measured 3 ft in diameter and was 0.3 ft deep. Although not as rich, Feature 8 is similar to the other shallow basins surrounding Feature 1.

Feature 9

This facility was located just southeast of Feature 8 and was similar in size and fill attributes. It contained a single zone of brown loam mottled with orange clay. A pocket of ash was observed on the surface of the feature. Pottery, animal bone, and mussel shell were the dominant artifacts contained in the organically rich fill. Several large, complicated stamped potsherds from the same vessel were recovered in the northeast

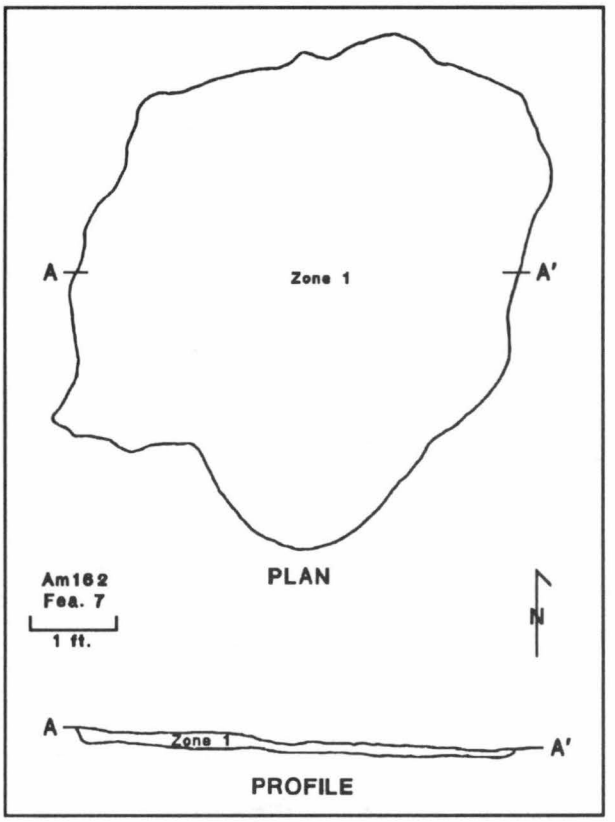

Figure 3.12. Feature 7, plan view and profile drawings.

quadrant. After excavation, the pit measured approximately 3 ft in diameter and was deeper than the other pits, measuring a little over 0.6 ft at its deepest point (Figure 3.13). The fill represents soil collected in the process of cleaning up domestic refuse resulting from food preparation and consumption activities.

Feature 10

Feature 10 was identified at the bottom of Feature 1, which intruded upon it. It consisted of an oval stain of reddish brown (5YR 4/4) mottled loam located in the southern portion of Feature 1. The northern half of the pit was 0.6 ft deep, whereas the southern half extended to a depth of 0.9 ft. A moderate number of potsherds and mussel shells were contained in the fill. The feature measured 3.9 ft by 3.0 ft. It had a stepped profile and resembled a shaft-and-chamber burial pit; however, no human skeletal remains were present (Figures 3.7 and 3.8).

Feature 11

This designation was assigned to a cluster of 60 potsherds found at the base of the plowzone between Features 8 and 9. Two chipped stone hoes, seven projectile points, four cores, and two hammerstones were located in the same area. These artifacts most likely indicate the presence of a plowed-out feature. The lithic artifacts suggest a flintknapper's cache,

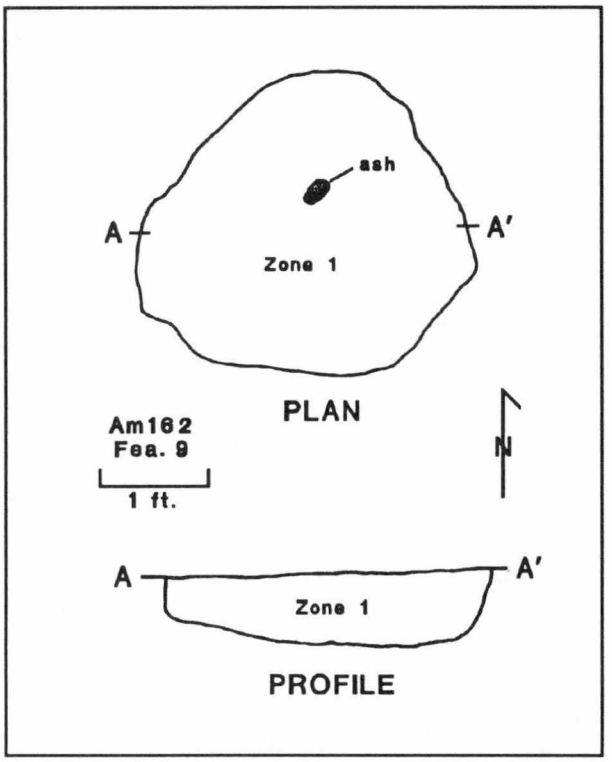

Figure 3.13. Feature 9, plan view and profile drawings.

perhaps concealed in a shallow pit feature.

Summary

It is difficult to determine with certainty the primary functions of all the Edgar Rogers site features. Feature 1 is easily the most striking facility excavated and, given its large areal extent, relatively shallow depth, and rich deposits of food and other domestic refuse, probably served as a food preparation facility similar to the earth ovens or "barbecue" pits described at Upper Saratown and the Warren Wilson site (Ward 1980). Similar features also have been found throughout the Piedmont during the course of the Siouan project. They made their first appearance just prior to the Contact period and persisted until the late 1600s. At the George Rogers, Jenrette, Lower Saratown, and Upper Saratown sites, these large basins are common and often are located near palisades. They are conspicuously absent at late Contact period sites such as Fredricks and the William Kluttz site. More will be said regarding the interpretation and distribution of these facilities after the presentation of all the site-specific data (see Chapter 14).

In addition to Feature 1, at least three other pits (Features 3, 5, and 7) at the Edgar Rogers site can also be interpreted as food preparation facilities. The smaller, circular basins around Feature 1 (Features 2, 4, 8, and 9) may represent eroded basal remnants of larger basins similar to Feature 1. The generally rich fill in these features, laden with domestic refuse and food remains, was derived from the same or similar source(s) that contributed fill for the larger facilities. Feature 11, the cluster of potsherds and lithic artifacts, probably represents the only remaining *in situ* contents of a pit feature eradicated by plowing and erosion.

Postholes

One hundred and forty-seven postholes were mapped at the base of the plowzone. Most of these were small, measuring less than 0.4 ft in diameter, and occurred as circular, dark midden-like stains. No structural configurations were discerned, but the majority of the postholes were restricted to the southern half of the excavation block. The features appeared to lie just outside the area of heaviest posthole concentration. Architectural patterns may have emerged if time had permitted the excavation of a larger area.

Pottery

One thousand and fifty-one aboriginal potsherds, including reconstructed portions of six vessels, were recovered from the Edgar Rogers site (Table 3.2). Because only a portion of the plowzone was screened, most of these sherds (n=726) are from feature contexts (particularly Features 1, 3, 7, and 11). Similarities in sherd samples from these features indicate that they are all associated with a single late Hillsboro phase (ca. A.D. 1500–1600) component at this site. Of the 609 sherds that could be classified by exterior surface treatment, approximately 40% were classified as *Hillsboro Check Stamped*. *Hillsboro Simple Stamped* and *Haw River Net Impressed*, each represented by about 20% of the sample, also were common pottery types. Other types represented at the site, in descending order of frequency, include: *Hillsboro Plain* (11%), *Caraway Complicated Stamped* (5%), *Haw River Cord Marked* (2%), *Hillsboro Corncob Impressed* (<1%), and *Haw River Brushed* (<1%).

Haw River Net Impressed

The 124 net impressed sherds in the sample were classified as *Haw River Net Impressed*. Most of the sherds from undisturbed deposits came from Features 1 and 7. Approximately 63% of the *Haw River Net Impressed* sherds have smoothed interiors, a ceramic

Table 3.2. Distribution of pottery from the Edgar Rogers site.

Context	Haw River			Hillsboro				Caraway		
	Net Impressed	Cord Marked	Brushed	Plain	Simple Stamped	Check Stamped	Corncob Impressed	Complicated Stamped	Indet.	Total
Hillsboro Phase										
Feature 1	36	2	-	11	98	14	1	-	126	288
Feature 2	1	-	-	-	-	7	-	-	-	8
Feature 3	7	-	-	20	5	94	-	-	60	186
Feature 5	1	-	-	-	-	1	-	1	5	8
Feature 6	1	-	-	-	-	-	-	-	-	1
Feature 7	24	8	-	7	3	4	-	3	48	97
Feature 8	-	-	-	-	2	1	-	1	13	17
Feature 9	2	-	-	1	-	9	-	22	4	38
Feature 10	1	-	-	-	-	-	-	-	2	3
Feature 11	-	-	-	-	-	69	-	-	11	80
Sub-total	73	10	0	39	108	199	1	27	269	726
Indeterminate Phase										
Plowzone	30	2	1	20	13	45	1	1	146	259
Surface	21	2	-	6	5	2	-	3	27	66
Sub-total	51	4	1	26	18	47	1	4	173	325
Total	124	14	1	65	126	246	2	31	442	1051

trait thought to be associated with a late chronological context within the North Carolina Piedmont (see Coe and Lewis 1952). These sherds are tempered predominantly with sand (50.0%), followed by fine-to-coarse crushed feldspar (27.5%), medium-to-fine crushed quartz (13.7%), mixed quartz and feldspar (7.3%), and grit (1.5%). Over 90% of all net impressed sherds are 6 mm to 10 mm thick. Of the eight rimsherds in the sample, most have everted profiles (including one with a folded rim) and rounded lips. Only two rimsherds are decorated and have V-shaped notches along the lip.

Although some of the *Haw River Net Impressed* sherds found at the Edgar Rogers site may be associated with an earlier, minor Haw River phase component, most are thought to be attributable to the Hillsboro phase occupation. In this respect, the ceramic assemblage composition at Edgar Rogers is similar to that observed at the roughly contemporaneous George Rogers site (see Chapter 6).

Haw River Cord Marked

Fourteen cord marked potsherds were recovered and have been classified as *Haw River Cord Marked*. Eight of these came from Feature 7 and two came from Feature 1. Most (n=11) have smoothed interiors and are tempered with mixed crushed quartz and feldspar (n=9), sand (n=4), and fine crushed quartz (n=1). The two rimsherds have everted rim profiles, rounded lips, and are notched along the lip edge.

Haw River Brushed

One *Haw River Brushed* potsherd was recovered from the plowzone. It has a smoothed interior, is tempered with coarse sand, and is 6 mm to 8 mm thick.

Hillsboro Plain (Figure 3.14*b–g*)

Sixty-five potsherds have smoothed exterior surfaces and were classified as *Hillsboro Plain* (Coe 1952; Davis 1987). Most plain sherds from undisturbed contexts came from Features 1 and 3. All but one have smoothed interiors and are tempered predominantly with fine crushed feldspar (n=38), followed by sand (n=18), mixed crushed quartz and feldspar (n=7), and fine crushed quartz (n=2). Over 60% of these sherds are 6 mm to 8 mm thick.

The eight rimsherds in the sample have everted (n=4), everted and folded (n=1), inverted (n=2), or straight (n=1) profiles. Flattened and rounded lip forms are equally represented. All of these sherds apparently represent small jars or bowls. Another body sherd, from the shoulder area of a cazuela-form bowl, is also present within the sample. Five of the eight rimsherds are decorated. Three display V-shaped notches along the lip (Figure 3.14*b,g*); one has small circular punctations along the lip (Figure 3.14*c*); and one has a band of circular punctations along the neck. The cazuela bowl represented in the sample was decorated with a single band of circular reed punc-

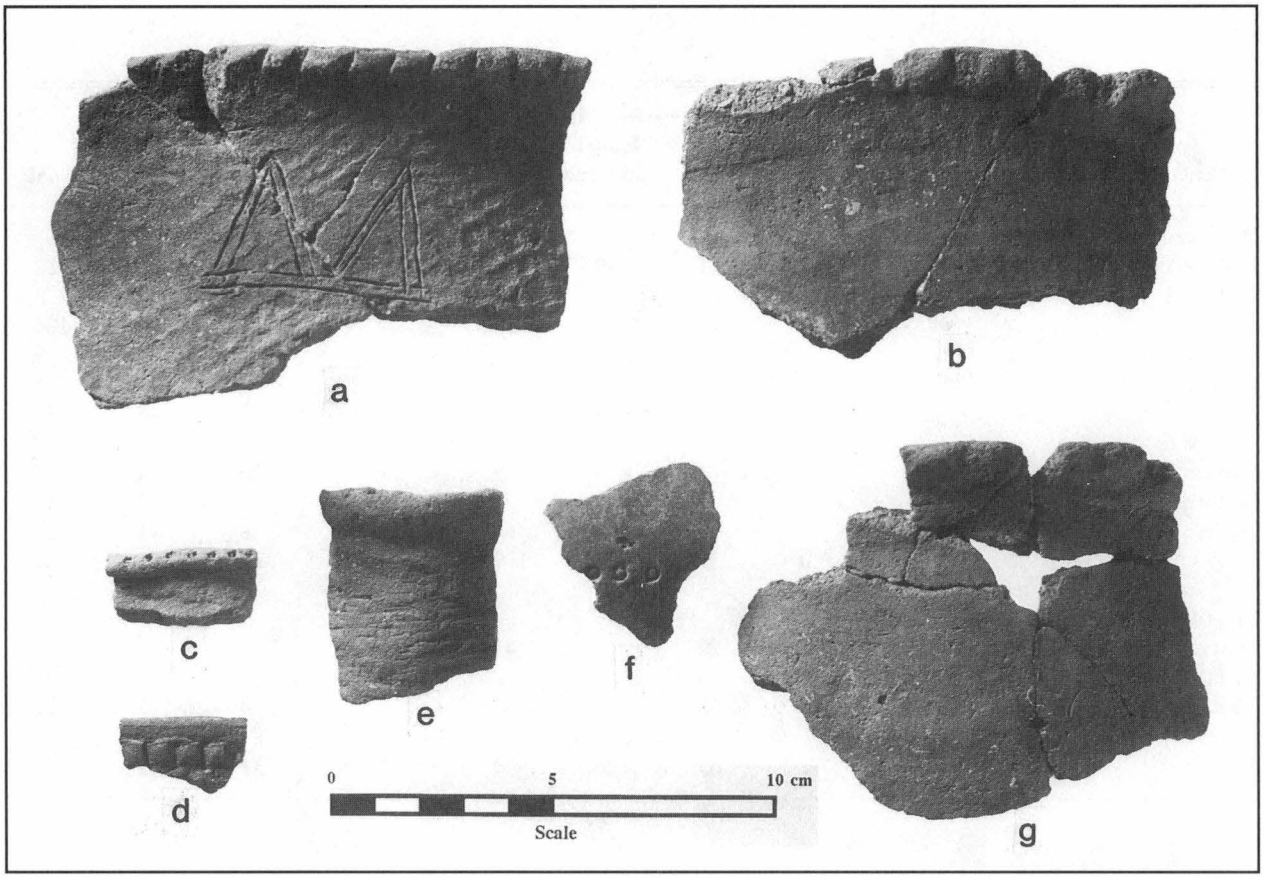

Figure 3.14. *Hillsboro Plain* and decorated sherds from the Edgar Rogers site.

tations along the shoulder (Figure 3.14*f*).

Hillsboro Simple Stamped (Figure 3.15)

One hundred and twenty-six *Hillsboro Simple Stamped* (Coe 1952; Davis 1987) sherds were recovered. A majority of these sherds (n=98) came from Feature 1, and most are from a single large (approximately 34 cm in diameter), undecorated storage jar with a folded, everted rim and a rounded lip (Figure 3.15). A second simple stamped vessel—a small (10–12 cm in diameter) hand-modeled and undecorated jar—is represented by a comparatively large rim fragment found in the plowzone.

In the following summary of sherd attributes, it should be kept in mind that only a few simple stamped vessels appear to be represented in the sample. With a single exception, all simple stamped sherds have smoothed interiors, and most sherds are tempered with sand (82.5%), followed by crushed feldspar (11.1%) and fine crushed quartz (6.3%). Over 80% of all sherds are 6 mm to 8 mm thick. Of the six rimsherds found, most have flattened lips and everted rim profiles. A single rimsherd was decorated with V-shaped notches along the lip.

Although the simple stamped pottery from the Edgar Rogers site conforms reasonably well to the *Hillsboro Simple Stamped* type, some apparent differences should be noted. First, the stamping itself is not as bold, nor as deeply applied, as is usually found on *Hillsboro Simple Stamped* pottery at the type site (i.e., Wall site). Second, there appears to be less rim folding and notching at the Edgar Rogers site. Finally, the Edgar Rogers vessels display significantly less neck constriction. Given these characteristics, the simple stamped pottery from Edgar Rogers can be regarded as representing an intermediate stage in the development of Hillsboro series pottery into the mid-seventeenth century Jenrette series and late seventeenth-early eighteenth century Fredricks series (see Davis 1987, 1988). The developmental position, particularly as it relates to the Fredricks series, is seen even more clearly in the *Hillsboro Check Stamped* pottery from the Edgar Rogers site.

Hillsboro Check Stamped (Figures 3.14*a* and 3.16)

Hillsboro Check Stamped (Coe 1952; Davis 1987), represented by 40.4% (n=246) of all identifiable sherds, was the predominant ceramic type at the Edgar Rogers site. Check stamped sherds were found in all but two features and were especially abundant in Features 3 and 11. Moreover, of the six vessels represented by large rimsherds or reconstructed vessel

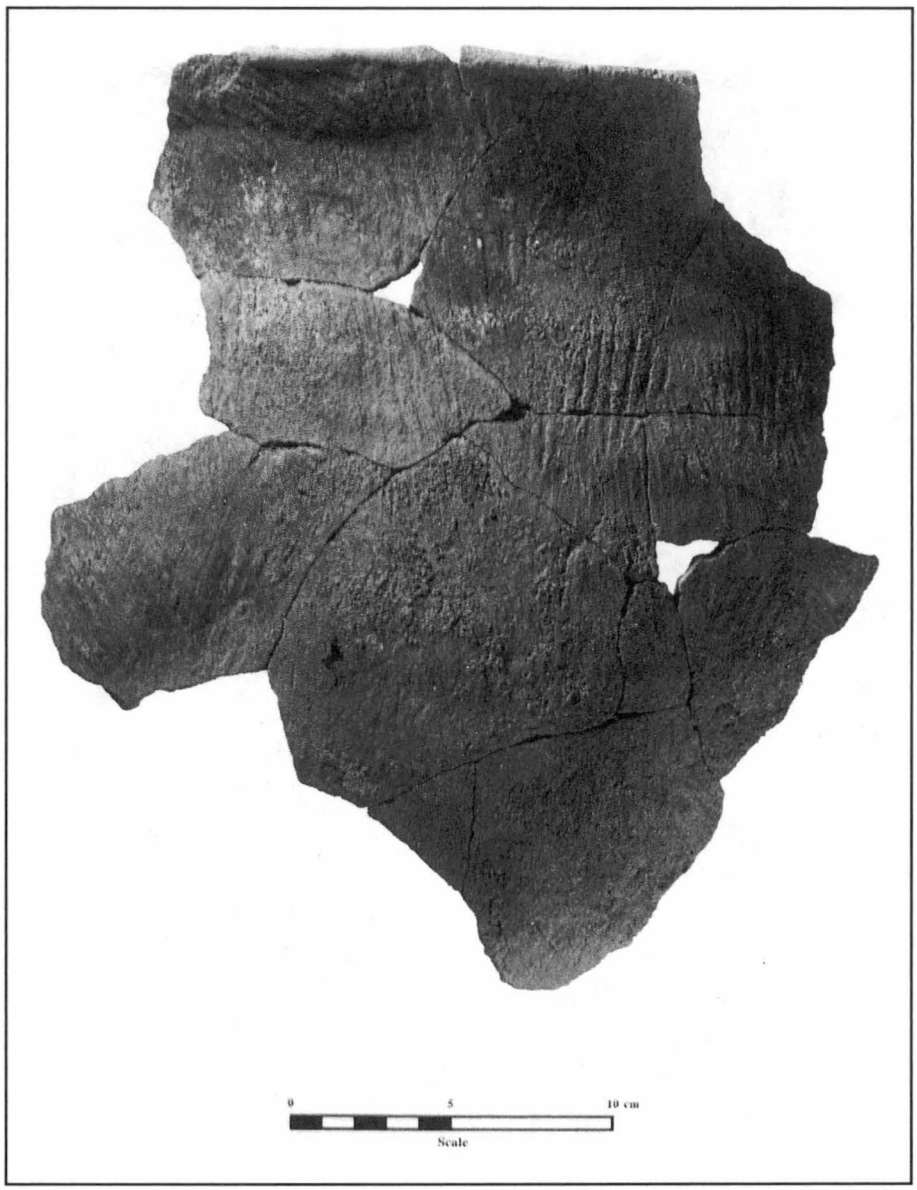

Figure 3.15. Partially reconstructed *Hillsboro Simple Stamped* vessel from the Edgar Rogers site.

sections, three were check stamped. The predominance of check stamping, when compared with the ceramic assemblages documented for the late seventeenth-early eighteenth century Fredricks site (see Davis 1987, 1988), suggests a late chronological position for the cultural component at the Edgar Rogers site.

All *Hillsboro Check Stamped* potsherds have smoothed interiors and are tempered primarily with fine crushed feldspar (n=122) or sand (n=106). A few sherds contain inclusions of mixed crushed quartz and feldspar (n=16) and fine crushed quartz (n=2). Only two sherds were less than 6 mm thick. All of the 20 rimsherds in the sample, including nine folded rims, have everted profiles and most have flattened rather than rounded lips. Fifteen rimsherds were decorated by V-shaped notches along the lip/rim edge (n=14) (Figures 3.14*a* and 3.16) or by circular punctations along the lip (n=1). A reconstructed rim section from Feature 1 has both a notched lip/rim edge and a neck decoration comprised of two adjacent incised triangles (Figure 3.14*a*). This vessel section represents a large storage or cooking jar approximately 20–24 cm in diameter.

Two other reconstructed sections of large *Hillsboro Check Stamped* jars were recovered from Feature 3. One of these has large, broad V-shaped notches along the lip/rim edge and is from a probable storage vessel that was about 22 cm in diameter. The other section is from a cooking pot, as evidenced by extensive soot deposits along the outside shoulder and neck, that was 30–35 cm in diameter (Figure 3.16*a–b*). This vessel had a small, notched rim fold.

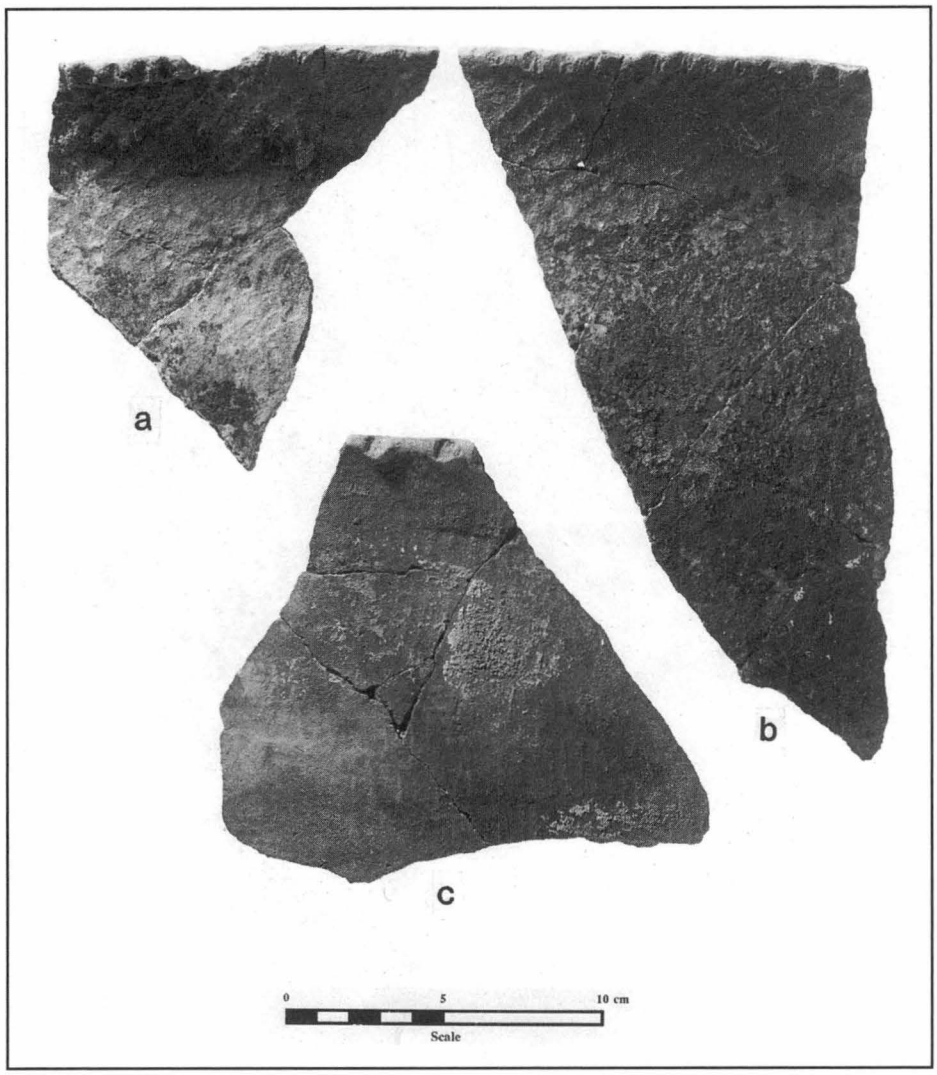

Figure 3.16. *Hillsboro Check Stamped* rimsherds from the Edgar Rogers site.

As with the *Hillsboro Simple Stamped* pottery found at the Edgar Rogers site, the *Hillsboro Check Stamped* potsherds also possess certain attributes that more closely resemble later pottery types recognized within the Haw and Eno drainages, particularly the *Fredricks Check Stamped* type (Davis 1988) associated with the late seventeenth-early eighteenth century Occaneechi. Traits which conform to the Hillsboro series include the typically bold paddle impressions on the exterior surface, the kinds of decoration used, the presence of folded rims, temper, and the general thickness of the vessel walls. Ceramic traits which more closely resemble *Fredricks Check Stamped* include overall vessel shape (with slightly everted rather than strongly everted rims), the presence of very light paddle stamping on a few vessels (Figure 3.16*c*), and the general dominance of check stamping within the overall ceramic assemblage.

Hillsboro Corncob Impressed

Two sherds, from Feature 1 and the plowzone, were classified as *Hillsboro Corncob Impressed*. Both contain sand temper and have smoothed interiors. One of these is an everted rimsherd with a rounded lip.

Caraway Complicated Stamped (Figure 3.17)

Thirty-one curvilinear complicated stamped sherds were recovered from the Edgar Rogers site and are classified as *Caraway Complicated Stamped*, based upon similarities to sherds within the Caraway series type collections at the Research Laboratories of Anthropology. Most (n=22) of these sherds came from Feature 9 and represent a single vessel. This vessel was a large (34 cm diameter), lightly stamped, undecorated storage jar tempered with mixed sand and crushed feldspar. It had an everted, folded rim and a rounded lip. The remaining nine sherds in the sample also are

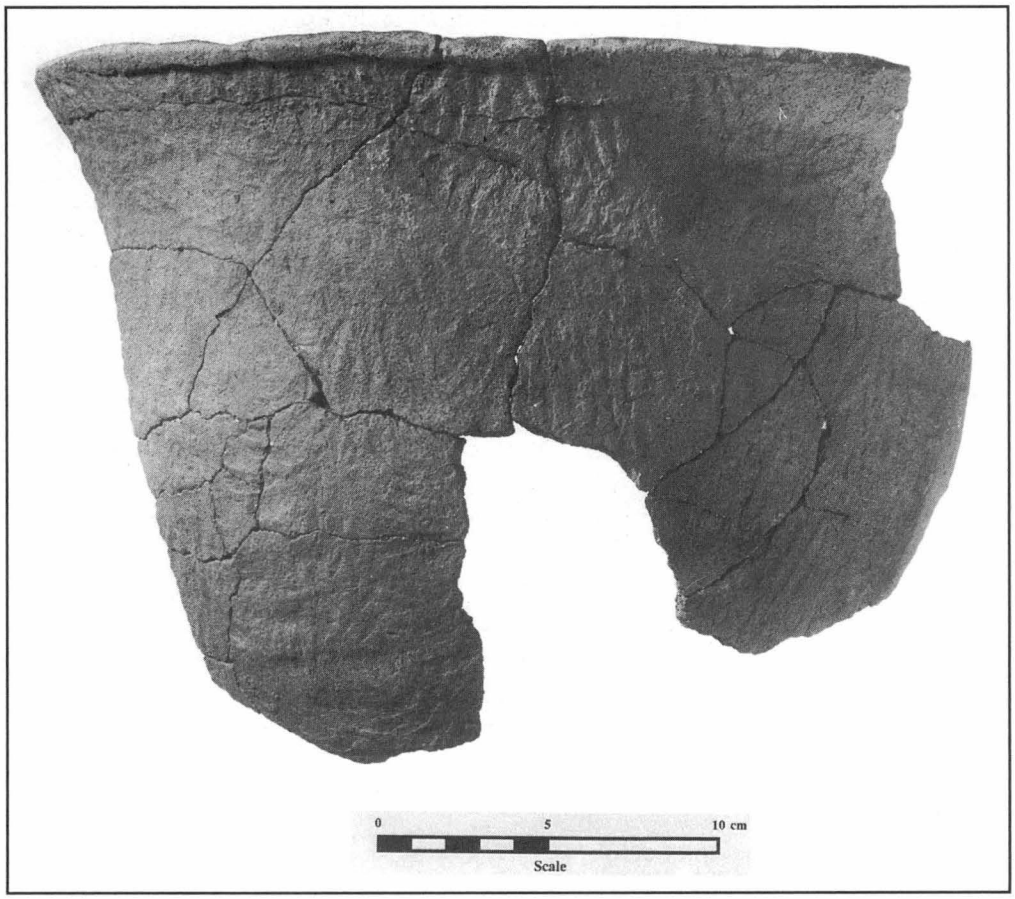

Figure 3.17. Partially reconstructed *Caraway Complicated Stamped* vessel from the Edgar Rogers site.

tempered either with sand (n=5) or fine crushed feldspar (n=4). All sherds, including those from the reconstructed vessel section, have smoothed interiors and most are 6 mm to 8 mm thick. Complicated stamped pottery only rarely occurs within the Haw drainage.

Indeterminate Sherds

Over 40% (n=442) of all sherds from the Edgar Rogers site are too small or too eroded to be classified by exterior surface treatment. Most of these sherds probably are from check stamped, simple stamped, net impressed, or plain vessels.

Summary

Although relatively few vessels appear to be represented by the sherd sample from the Edgar Rogers site, the ceramic data are significant in that they suggest an assemblage dominated by large, check stamped jars. This assemblage characteristic, coupled with the presence of complicated stamped vessels, make the Edgar Rogers site somewhat unique within the Haw River drainage from a ceramic perspective. Pottery from the George Rogers site is generally similar both in terms of surface treatments represented and specific sherd attributes; however, the frequency distribution of sherd types varies considerably. Without a larger sample from Edgar Rogers, this difference is not easily explained; however, it probably is simply a result of sample skewing due to the small number of vessels represented. Ceramically, both the Edgar Rogers and George Rogers sites are regarded as late Hillsboro phase manifestations.

Lithic Artifacts

Archaeological investigations at the Edgar Rogers site produced a sample of 1,235 lithic artifacts (Table 3:3). Almost 87% of these artifacts came from Hillsboro phase features and most were recovered from Feature 1. Only Features 2 and 11 did not contain lithic artifacts. With the exception of two Archaic point fragments surface collected in the general site vicinity and a few identifiable Archaic flakes and flake tools from the plowzone and Feature 1, all lithic artifacts appear to be associated with the Hillsboro phase occupation of the site. These artifacts include: debitage and exhausted cores (n=999), chipped stone

Table 3.3. Distribution of lithic artifacts from the Edgar Rogers site.

		Context										
Category	PZ	Fea 1	Fea 3	Fea 4	Fea 5	Fea 6	Fea 7	Fea 8	Fea 9	Fea 10	Surface	Total
Debitage												
Decortication Flakes	4	12	5	-	1	-	1	-	-	-	2	25
Interior/Bif. Thin. Flakes	51	609	96	1	8	-	103	8	5	2	18	901
Shatter Fragments	-	6	-	-	-	-	-	-	-	-	-	6
Flakes (Archaic)	32	-	-	-	-	-	-	-	-	-	-	32
Other Flakes	-	1	-	-	-	-	-	-	-	-	-	1
Cores	12	13	1	2	1	-	-	-	-	-	3	32
Raw Material	2	-	-	-	-	-	-	-	-	-	-	2
Projectile Points												
Small Triangular Points	4	35	9	-	2	-	4	3	-	2	3	62
Unidentified Points	-	-	-	-	-	-	-	-	-	-	2	2
Other Chipped Stone Artifacts												
Preforms	1	-	-	-	-	-	-	-	-	-	1	2
Bifaces	1	6	3	1	-	-	4	-	1	-	1	17
Drills	1	1	-	1	-	-	-	-	-	-	-	3
Chipped Hoes	1	-	-	-	-	-	-	-	-	-	2	3
Side Scraper	-	1	-	-	-	-	-	-	-	-	-	1
Perforator	-	1	-	-	-	-	-	-	-	-	-	1
Gravers	5	-	-	2	-	-	-	-	-	-	-	7
Utilized/Retouched Flakes	25	44	11	7	7	3	14	-	3	-	12	126
Ground Stone Artifacts												
Ground Stone Fragments	1	4	-	-	-	-	-	-	-	-	-	5
Ground Hematite	-	-	-	-	-	-	-	2	-	-	-	2
Large Cobble Tools												
Cobble Choppers	-	2	-	-	-	-	-	-	-	-	-	2
Hammerstones/Manos	1	-	-	-	-	-	-	-	-	-	2	3
Total	141	735	125	14	19	3	126	13	9	4	46	1235

tools and tool fragments (n=224), ground stone tool fragments (n=7), and large cobble tools (n=5). Major artifact categories are described below.

Debitage

Decortication Flakes. Sample Size: 25. Form: This category includes both primary (n=3) and secondary (n=22) decortication flakes. Decortication flakes exhibit a striking platform and bulb of percussion on the ventral surface, and have cortex (primary - >75% cortex; secondary - <75% cortex) remaining on the dorsal surface. Material: Vitric tuff-18, Felsic tuff-4, Other metavolcanic rock-3. Comment: These flakes are produced by initial stages of core reduction and tool manufacture. The extremely low ratio of decortication flakes to interior and bifacial thinning flakes (1:36) suggests that initial stages of stone tool manufacture may have taken place elsewhere.

Interior/Bifacial Thinning Flakes. Sample Size: 901. Form: Interior flakes (n=775) are flat flakes that lack cortex, exhibit flake removal scars on the dorsal surface, and lack a steep platform angle. Bifacial thinning flakes (n=126), while similar to interior flakes, have a steep platform angle that evidences detachment from a biface. Material: Vitric tuff-404, Quartz-356, Felsic tuff-66, Other metavolcanic rock-57, Rhyolite-8, Slate-5, Schist-2, Basalt-1, Tuff breccia-1, Jasper-1. Comment: Both interior and bifacial thinning flakes are produced by intermediate and final stages of bifacial tool manufacture and flake blank production. The distribution of raw materials indicates that vitric tuffs and quartz were the predominant types of rock used to manufacture stone tools.

Shatter Fragments. Sample Size: 6. Form: Shatter fragments are angular flakes that, based on morphological characteristics, cannot be specifically classified. Material: Quartz-5, Slate-1. Comment: These artifacts result from all stages of stone tool manufacture.

Archaic Flakes. Sample Size: 32. Form: This category includes large, heavily patinated flakes from disturbed contexts. Material: Not classified. Comment: Further classification of these artifacts was not done in order to speed up analysis.

Other Flake. Sample Size: 1. Form: This specimen is a core rejuvenation flake, removed from a core to eliminate step fractures or to produce a new striking platform. Material: Quartz–1. Comment: None.

Cores. Sample Size: 32. Form: Cores are masses of lithic raw material from which two or more flakes have been deliberately detached. All of these specimens have amorphous shapes. Material: Quartz–30, Vitric tuff–1, Felsic tuff–1. Comment: The predominance of quartz cores suggests that this raw material probably was locally available.

Raw Material. Sample Size: 2. Form: Both specimens are tabular chunks of knappable stone that apparently were transported to the site but not used. Material: Felsic tuff–1, Other metavolcanic rock–1. Comment: None.

Projectile Points

Small Triangular Projectile Points (Figure 3.18*a–v*). Sample Size: 62. Form: Triangular projectile points within this category are generally referable to Coe's (1964:49) *Caraway Triangular* type. Forty-three point fragments were too small to determine edge configuration; the remainder have either incurvate sides and base (n=9), incurvate sides and a straight base (n=2), incurvate sides and an excurvate base (n=3), straight sides and base (n=3), or straight sides and an excurvate base (n=2). These triangular points range from 16 mm to 32 mm (mean=23.7, sd=6.2, n=21) in length, 13 mm to 26 mm (mean=15.5, sd=6.2, n=36) in width, and 2 mm to 8 mm (mean=4.0, sd=1.8, n=41) in thickness. Material: Vitric tuff–47, Quartz–8, Felsic tuff–3, Other metavolcanic rock–4. Comment: All of these specimens probably are associated with the Hillsboro phase component at the site.

Projectile Point Fragments. Sample Size: 2. Form: One specimen is a crudely-stemmed Archaic projectile point that does not conform to an established type. The other is a mid-section fragment from a serrated-edged point that may be referable to the Early Archaic *Kirk Serrated* type (Coe 1964:70). Material: Vitric tuff–1, Felsic tuff–1. Comment: Both artifacts were surface collected from the general site vicinity.

Other Chipped Stone Artifacts

Preforms. Sample Size: 2. Form: One specimen is a thin, medium-sized, triangular biface that apparently was discarded because of raw material flaws. The other specimen is a basal fragment from a large lanceolate biface. Material: Felsic tuff–2. Comment: The latter specimen, recovered from plowzone, appears to be an Archaic projectile point preform.

Bifaces. Sample Size: 17. Form: Bifaces are blanks that exhibit flake removal scars, resulting from either percussion or pressure flaking, on both surfaces. Six of these artifacts are small biface fragments that may be from projectile points; the remainder are amorphous in shape and apparently represent aborted attempts to manufacture projectile points and other bifacial tools. Material: Vitric tuff–8, Quartz–5, Felsic tuff–2, Other metavolcanic rock–1, Not classified–1. Comment: All but two heavily patinated specimens probably are associated with the Hillsboro phase component.

Drills (Figure 3.18*w–x*). Sample Size: 3. Form: Drills are hafted bifacial tools that possess a long, parallel-sided, rod-like bit. Two of these specimens were manufactured on elongate flakes; the other is a reworked triangular projectile point. Material: Vitric tuff–3. Comment: All three specimens exhibit polish along the bit edge, probably resulting from use on dense materials such as wood, bone, antler, or soft stone.

Chipped Hoes (Figure 3.19). Sample Size: 3. Form: Chipped hoes are large, hafted tools that have a bifacial convex working edge transverse to the long axis. Two specimens are large (11 cm to 14 cm long and 6.5 cm to 9.0 cm wide), triangular bifaces with evidence of battering along the bit edge. The other specimen is a large (12.5 cm long and 6.5 cm wide), rectangular biface with little evidence of edge wear. Material: Vitric tuff–2, Schist–1. Comment: All three artifacts were recovered from either the plowzone or surface, and are probably attributable to the Hillsboro phase occupation.

Side Scraper. Sample Size: 1. Form: This specimen is a blade-like flake that has been finely retouched along one lateral edge. Material: Other metavolcanic rock–1. Comment: Although recovered from Feature 1, this tool is heavily patinated and probably dates to the Archaic period.

Perforator. Sample Size: 1. Form: This specimen is a large, unifacially retouched, flake fragment with a pointed bit that exhibits heavy edge wear. Material: Felsic tuff–1. Comment: Morphological and use-wear characteristics suggest that this was a hand-held tool used to cut, punch, or bore holes.

Gravers. Sample Size: 7. Form: All of these specimens are amorphous flakes that possess fine retouch along the margin, producing a small, sharp, triangular projection. Material: Quartz–5, Felsic tuff–2. Comment: These artifacts are interpreted as engraving or scoring tools.

Utilized and Retouched Flakes. Sample Size: 126. Form: This category includes marginally-retouched (n=83) and edge-damaged (n=43) flakes. Material: Quartz–66, Vitric tuff–36, Felsic tuff–14, Other metavolcanic rock–4, Rhyolite–1, Unidentified–1, Not classified–4. Comment: Thirteen of these flakes are

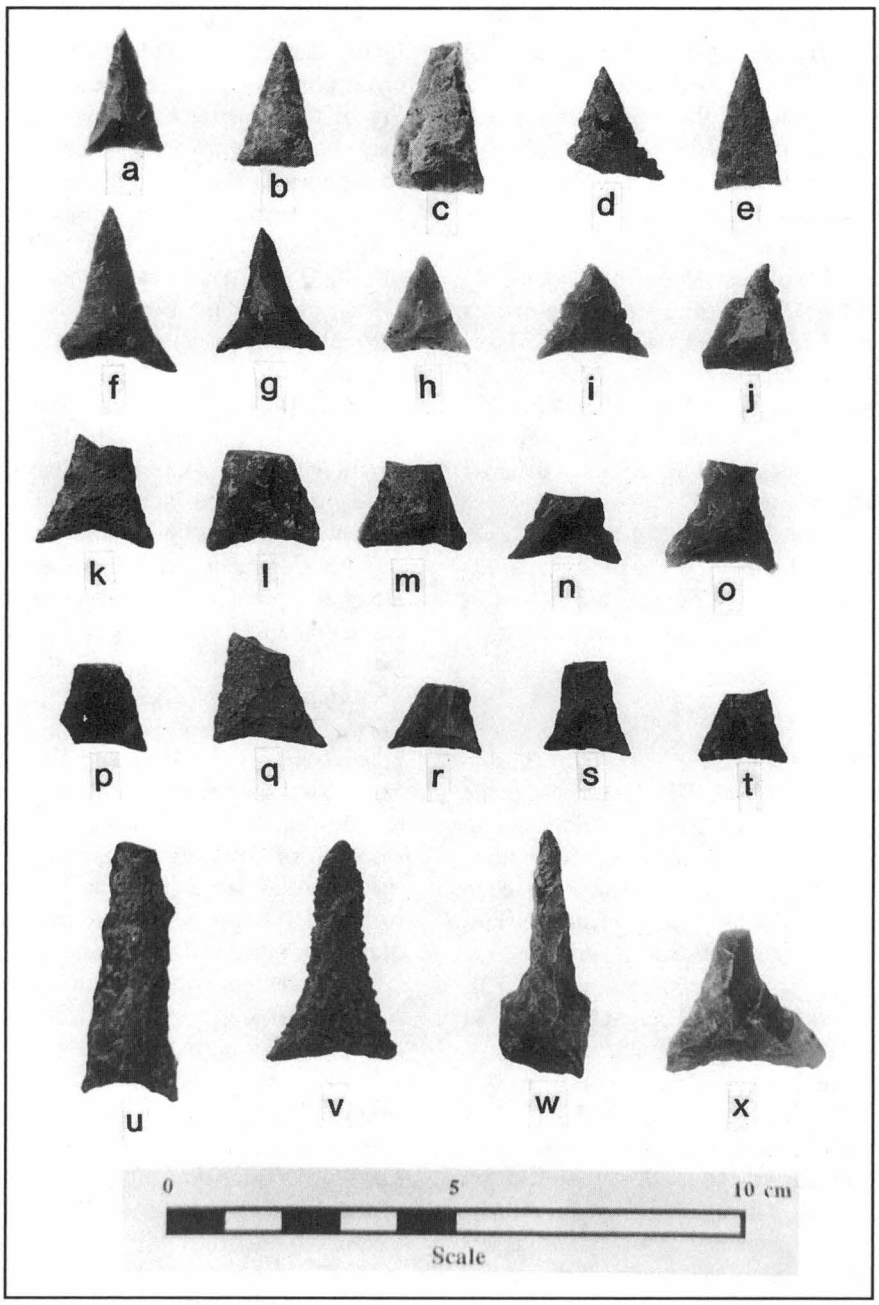

Figure 3.18. Chipped stone projectile points and drills from the Edgar Rogers site.

heavily patinated and probably date to the Archaic period. Utilized and retouched flakes are interpreted as *ad hoc* cutting implements.

Ground Stone Artifacts

Ground Stone Fragments. Sample Size: 5. Form: Four of these specimens are fragments of unidentifiable ground or polished tools. The remaining specimen appears to be from a polished celt. Material: Other metavolcanic rock–3, Basalt–2. Comment: None.

Ground Hematite. Sample Size: 2. Form: Both specimens are fist-sized chunks of burned meteoric iron with multiple V-shaped grooves ground into the surface to produce red paint pigment. Material: Meteoric iron–2. Comment: Both specimens were recovered from Feature 8.

Large Cobble Tools

Cobble Choppers. Sample Size: 2. Form: Both tools are large cobbles that have been flaked along one edge. Material: Other metavolcanic rock–1, Quartz–1. Comment: These specimens are thought to represent hand-held chopping tools.

Hammerstones/Manos. Sample Size: 3. Form: These artifacts are spherical cobbles that exhibit grinding, crushing, or battering along one or more

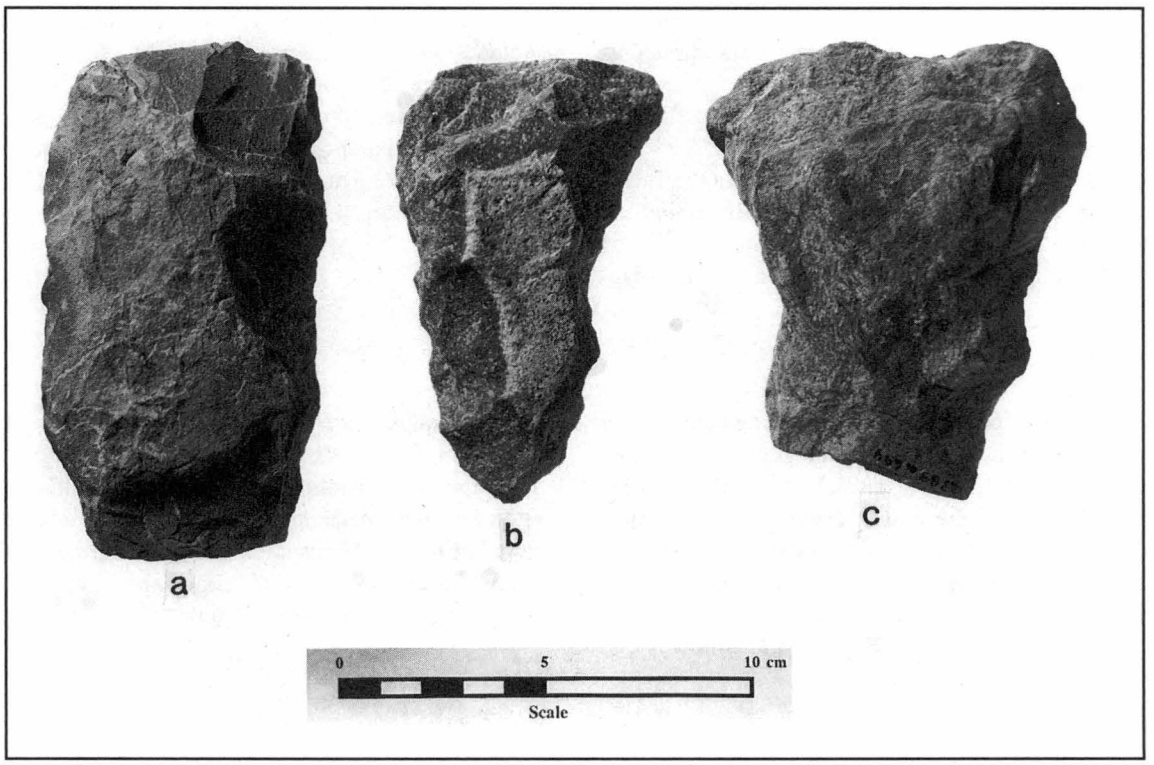

Figure 3.19. Chipped stone hoes from the Edgar Rogers site.

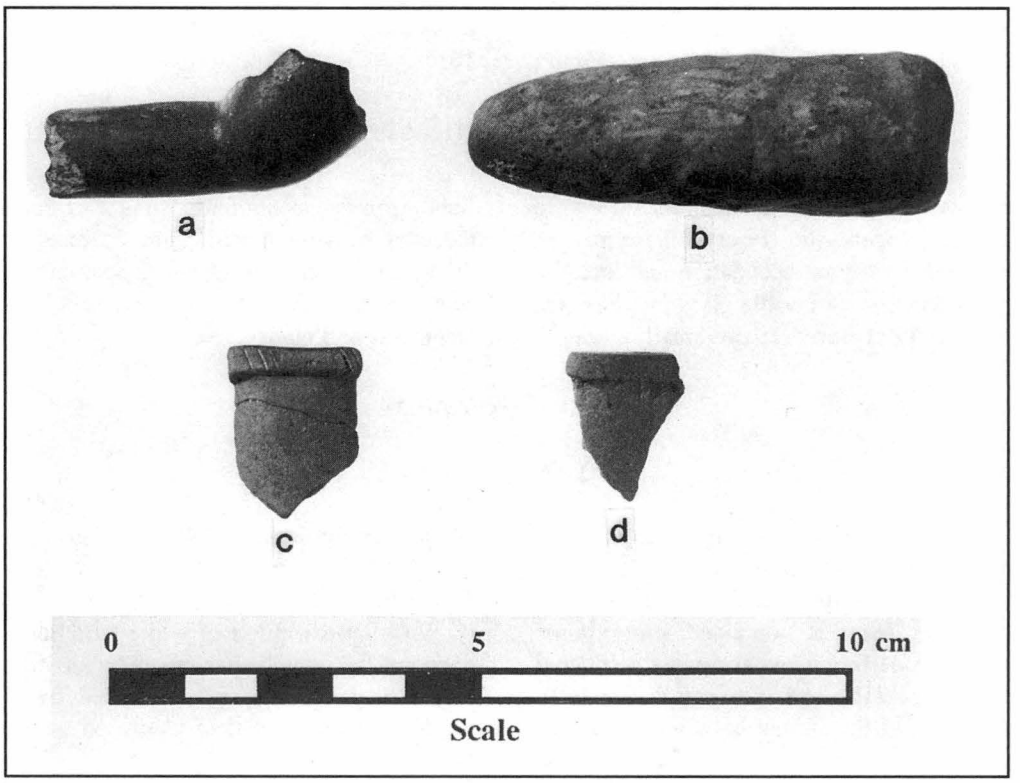

Figure 3.20. Clay pipes and pipe fragments from the Edgar Rogers site.

edges. Material: Quartz–2, Other metavolcanic rock–1. Comment: These specimens are interpreted as hand-held hammers or percussors.

Summary

Most of the lithic artifacts recovered from the Edgar Rogers site can be attributed to a single Hillsboro phase component. Although an overwhelming majority of these artifacts are the by-product of lithic tool manufacture, several other activities also are represented, and include weapon repair, butchering, non-lithic tool manufacture, hideworking, woodworking, digging or gardening, and the production of paint pigments. Overall, the composition of the Edgar Rogers lithic assemblage compares very favorably with Hillsboro phase assemblages from both the George Rogers and Wall sites.

Clay Artifacts

One whole pipe and four pipe fragments were recovered from the Edgar Rogers site. The whole specimen (Figure 3.20*b*) is a small (i.e., 63 mm long and 22 mm wide at the bowl), crudely made, conical pipe that was recovered from plowed soil overlying Feature 1. Three of the pipe fragments (Figure 3.20*a,c–d*) are from Feature 7 and include: a basal stem and bowl segment of a finely-made elbow pipe, and two fragments from a pipe that had a squared bowl and fine incisions along the outside of a thickened lip. The pipes from Feature 7 are generally similar in both style and workmanship to aboriginal pipes that were found at the Fredricks site. The fourth pipe fragment, from Feature 1, is an unidentifiable fragment of a large, coarse sand tempered pipe.

Bone and Shell Artifacts

Eleven bone artifacts were recovered from the Edgar Rogers site (Figure 3.21, bottom row). These include: four small (2.5 mm to 4.0 mm in diameter) bone disk beads, seven bone-splinter awls, and the tip of an antler tine that had been grooved and snapped. With the exception of two awls from Features 3 and 5, all of these artifacts came from Feature 1.

The most common shell artifacts found at the Edgar Rogers site were serrated mussel shells, and include 16 whole shells and 20 serrated edge fragments (Figure 3.21, top three rows). Most (n=28) of these specimens were recovered from Feature 1. The remainder came from Features 2 (n=1), 3 (n=4), 7 (n=2), and 8 (n=1). Although the specific function of these artifacts is uncertain, they probably were used as scrapers to thin clay vessel interiors prior to firing. The only other shell artifacts found at this site were 20 small disk beads (Figure 3.21, third row). Nineteen of these came from Feature 1; the other was from Feature 10.

Historic Artifacts

Seven artifacts of Euroamerican manufacture were found at the Edgar Rogers site. Four of these may be associated with the aboriginal occupation and include: a piece of green wine or rum bottle glass found on the surface in the vicinity of Burial 1; two small, unidentifiable iron fragments from Zone 2 of Feature 1; and a piece of square-cut nail from Feature 7. The other three historic artifacts appear to post-date the aboriginal occupation of the site and include a potsherd, brick fragment, and cinder.

Faunal Remains

by
Mary Ann Holm

The faunal sample from the Edgar Rogers site consists of 1,916 bone fragments (Table 3.4). Most (n=1,214) of these remains came from Feature 1; however, all other features contained some bone. Numerous animal bone fragments also were recovered from Feature 3 (n=215) and Feature 7 (n=169). Approximately 21% of the animal bone was identified beyond the level of class. A minimum of 22 individuals, representing 15 species, was identified. Of these, 50% are mammals, 14% are birds, 23% are reptiles, 4% are amphibians, and 9% are fish.

Mammals

With the exception of white-tailed deer (MNI=5), none of the mammalian species identified from the Edgar Rogers site are represented by more than a single individual. Other identified mammals include rabbit, squirrel, beaver, a member of the Cricetidae family (mice and rats), raccoon, and striped skunk. No domesticated mammals are represented in the sample.

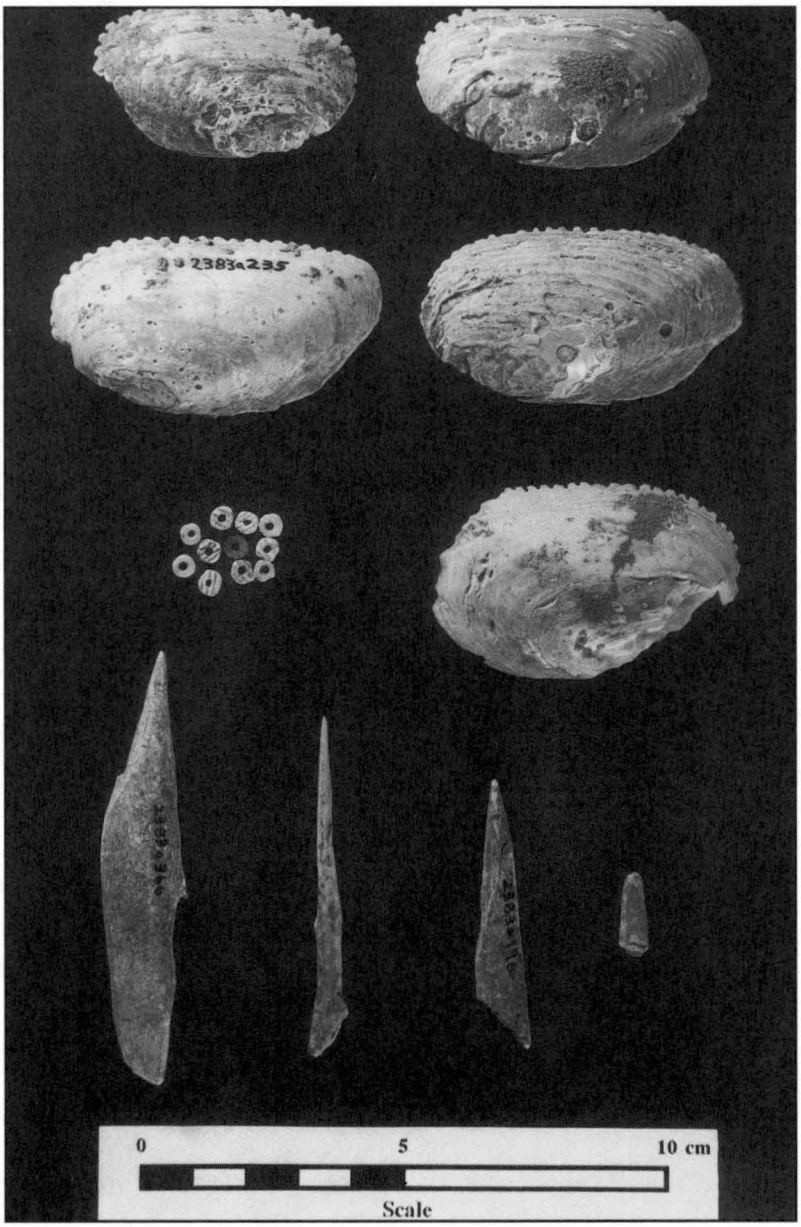

Figure 3.21. Bone and shell artifacts from the Edgar Rogers site.

Birds

Birds, represented by only 23 bone fragments, comprise a very small portion of the faunal sample. The only identified species are passenger pigeon (MNI=1) and turkey (MNI=2).

Reptiles and Amphibians

Box turtle (MNI=3) is second only to white-tailed deer in terms of the number of individuals represented in the sample. Other identified reptiles include a single member of the Colubridae family (non-poisonous snakes) and a single member of the Crotalidae family (poisonous snakes).

Only 11 bone fragments are identified as amphibian. At least one frog of indeterminate species is represented by these fragments.

Fish

Of the 220 fragments identified as fish, only seven can be identified to the level of family. The identified fish are gar (MNI=1) and sunfish (MNI=1).

Modified Bone

Approximately 22% of the fragments recovered from the Edgar Rogers site are burned, and four white-tailed deer bones exhibit cut marks. The placement of these marks is consistent with cut marks made during skinning and butchering. Eight bone fragments, mostly from white-tailed deer, also show evidence of gnawing by dogs or wolves.

Shell

Numerous freshwater mussel and snail shells were

Table 3.4. Faunal remains from the Edgar Rogers site.

Species	Count N	Count %	Weight Grams	Weight %	MNI N	MNI %
Mammals						
Unidentified	952	49.69	719.10	43.51	-	-
Sylvilagus sp., Rabbit	4	0.21	0.71	0.04	1	4.55
Sciurus sp., Squirrel	10	0.52	1.69	0.10	1	4.55
Castor canadensis, Beaver	1	0.05	4.20	0.25	1	4.55
Cricetidae, Mice & Rats	4	0.21	0.13	0.01	1	4.55
Procyon lotor, Raccoon	1	0.05	4.90	0.30	1	4.55
Mephitis mephitis, Striped Skunk	1	0.05	0.80	0.05	1	4.55
Odocoileus virginianus, White-tailed Deer	153	7.99	717.36	43.40	5	22.73
Sub-Total	1126	58.77	1448.89	87.66	11	50.00
Birds						
Unidentified	19	0.99	37.18	2.25	-	-
Ectopistes migratorius, Passenger Pigeon	1	0.05	0.40	0.02	1	4.55
Meleagris gallapavo, Turkey	3	0.16	13.10	0.79	2	9.09
Sub-Total	23	1.20	50.68	3.07	3	13.64
Reptiles						
Turtle, Unidentified	98	5.11	30.47	1.84	-	-
Terrapene carolina, Box Turtle	73	3.81	63.40	3.84	3	13.64
Snake, Unidentified	28	1.46	1.69	0.10	-	-
Colubridae, Non-poisonous Snakes	5	0.26	0.76	0.05	1	4.55
Crotalidae, Poisonous Snakes	11	0.57	2.50	0.15	1	4.55
Sub-Total	215	11.22	98.82	5.98	5	22.73
Amphibians						
Rana/Bufo sp., Frog or Toad	8	0.42	0.35	0.02	-	-
Rana sp., Frog	3	0.16	0.40	0.02	1	4.55
Sub-Total	11	0.57	0.75	0.05	1	4.55
Fish						
Unidentified	220	11.48	3.13	0.19	-	-
Lepisosteus sp., Gar	4	0.21	0.90	0.05	1	4.55
Lepomis sp., Sunfish	3	0.16	0.03	<0.01	1	4.55
Sub-Total	227	11.85	4.06	0.25	2	9.09
Unidentified	314	16.39	49.61	3.00	-	-
Total	1916	100.00	1652.81	100.00	22	100.00

recovered from all features except Features 5 and 11. Mussel shell was particularly abundant within Feature 1. None of these remains have been analyzed beyond preliminary sorting and quantification.

Summary

Although the minimum number of individuals represented by the sample of animal bone from the Edgar Rogers site is small, several species are represented and suggest a diverse range of procurement strategies, including hunting, trapping or snaring, and fishing. White-tailed deer probably was the most important meat source; however, several other mammals as well as birds and fish contributed to the overall diet.

Botanical Remains

by
Kristen J. Gremillion

Carbonized plant remains from the Edgar Rogers site were recovered from 26 flotation samples representing 228 liters of feature fill (Tables 3.5 to 3.10). Other plant remains from waterscreened fill were not analyzed. A total of 301.60 grams of wood charcoal, nutshell, seeds, and other charred plant remains was recovered from all features except Feature 11.

Nutshell

Although hickory shell is the most abundant nutshell

Table 3.5. Carbonized plant remains from the Edgar Rogers site (weight in grams).

Sample	Soil Volume (liters)	Wood Charcoal	Unknown Plant	Root or Tuber	Twigs w/ Buds	Pedicel or Peduncle	Plant Food Remains	Total
Feature 1								
Zone 1	76	133.16	6.83	0.16	0.94	0.02	97.32	238.43
Zone 2	20	8.33	0.59	0.11	0.00	0.00	1.32	10.35
Zone 3	10	6.69	0.19	0.00	0.00	0.00	0.47	7.35
Sub-total	106	148.18	7.61	0.27	0.94	0.02	99.11	256.13
Feature 2								
Zone 1	10	6.02	0.47	0.03	-	-	0.81	7.33
Feature 3								
Zone 1	20	3.43	0.42	-	-	-	0.85	4.70
Feature 4								
Zone 1	10	4.92	0.23	0.06	-	-	1.77	6.98
Feature 5								
Zone 1	10	1.45	0.06	-	-	-	0.03	1.54
Feature 6								
Zone 1	10	4.52	0.48	0.02	-	-	0.99	6.01
Zone 2	10	2.05	0.22	-	-	-	0.93	3.20
Sub-total	20	6.57	0.70	0.02	-	-	1.92	9.21
Feature 7								
Zone 1	10	7.19	0.21	-	-	-	0.40	7.80
Feature 8								
Zone 1	12	3.68	0.24	-	-	<0.005	0.89	4.81
Feature 9								
Zone 1	10	1.06	0.05	-	-	-	0.30	1.41
Feature 10								
Zone 1	20	1.55	0.03	-	-	-	0.11	1.69
Total	228	184.05	10.02	0.38	0.94	0.04	106.19	301.60

type by weight at the Edgar Rogers site, its overall percentage is relatively low in part because the quantity of maize remains at the site is so great. Walnut shell makes up only a small percentage of plant food remains by weight, but was found in six separate 10-liter flotation samples. Acorn shell also is relatively well represented. Although acorn shell amounts to less than half the quantity of hickory shell, acorn shell is thinner and represents more food than an equivalent quantity of hickory shell. Ubiquity values are high for both acorn and hickory. Acorn shell was recovered from 86.4% of all 10-liter flotation samples, while hickory shell was present in 95.5% of those samples. Acorn meat also was found in one feature.

Cultigens

Maize, common bean, and pepo squash are all represented at the Edgar Rogers site. Maize remains, present in 77.3% of all 10-liter flotation samples, have high ubiquity and make up a percentage (23.4%) of plant food remains that is very similar to the historic Fredricks site (28.4%). Starchy grains are represented by only one specimen each of chenopod and maygrass.

Seeds

Of the fleshy fruit seeds found at the Edgar Rogers site (i.e., persimmon, grape, and plum), only plum was not recovered from historic Occaneechi features at the Fredricks site. Black gum seeds were unusually abundant at Edgar Rogers (82.1% of total identified seeds, occurring in 50.0% of 10-liter flotation samples), especially in Feature 1 which included a small pocket of the charred seeds.

Summary

The excavation results, coupled with the small number and tightly clustered distribution of positive auger tests, suggest that a social unit not much larger than a single household occupied the Edgar Rogers site during the late Hillsboro phase (ca. A.D. 1500-1600). Survey data as well as excavations at another late

Table 3.6. Plant food remains from the Edgar Rogers site (weight in grams).

Sample	Hickory Shell	Acorn Shell	Acorn Meat	Walnut Shell	Unid. Nutmeat	Maize Kernels	Maize Cupules	Common Bean	Grape Pedicel	Seeds	Total
Feature 1											
Zone 1	41.65	21.10	0.48	0.32	1.02	0.11	23.89	0.10	0.01	9.63	98.31
Zone 2	0.19	0.01	-	-	-	-	0.12	-	-	0.01	0.33
Zone 3	0.17	0.02	-	-	-	-	0.25	-	-	0.03	0.47
Sub-total	42.01	21.13	0.48	0.32	1.02	0.11	24.26	0.10	0.01	9.67	99.11
Feature 2											
Zone 1	0.53	0.01	-	-	-	-	0.26	0.01	-	-	0.81
Feature 3											
Zone 1	0.05	0.03	-	0.02	-	0.01	0.01	-	-	0.73	0.85
Feature 4											
Zone 1	1.68	0.09	-	-	-	-	-	-	-	<0.005	1.77
Feature 5											
Zone 1	0.02	0.01	-	-	-	-	-	-	-	<0.005	0.03
Feature 6											
Zone 1	0.89	0.03	-	-	-	-	0.03	0.01	-	0.03	0.99
Zone 2	0.84	0.02	-	0.07	-	-	<0.005	-	-	-	0.93
Sub-total	1.73	0.05	-	0.07	-	-	0.03	0.01	-	0.03	1.92
Feature 7											
Zone 1	0.38	0.02	-	-	-	-	<0.005	-	-	<0.005	0.40
Feature 8											
Zone 1	0.23	-	-	-	-	0.01	0.14	-	0.25	0.26	0.89
Feature 9											
Zone 1	0.17	-	-	0.11	-	-	<0.005	-	-	0.02	0.30
Feature 10											
Zone 1	0.07	<0.005	-	-	-	<0.005	0.01	-	-	0.03	0.11
Total	46.87	21.34	0.48	0.52	1.02	0.13	24.71	0.12	0.26	10.74	106.19

Table 3.7. Percentages of plant food remains from the Edgar Rogers site.

	Context									
Seed Type	Fea. 1	Fea. 2	Fea. 3	Fea. 4	Fea. 5	Fea. 6	Fea. 7	Fea. 8	Fea. 9	Fea. 10
Hickory Shell	42.4	65.4	5.9	94.9	66.7	90.1	95.0	25.8	56.7	63.6
Acorn Shell	21.3	1.2	3.5	5.1	33.3	2.6	5.0	-	-	<0.05
Acorn Meat	0.5	-	-	-	-	-	-	-	-	-
Walnut Shell	0.3	-	2.4	-	-	3.6	-	-	36.7	-
Unknown Nutmeat	1.0	-	-	-	-	-	-	-	-	-
Maize	24.6	32.0	2.4	-	-	1.6	<0.05	16.9	<0.05	9.1
Common Bean	0.1	1.2	-	-	-	0.5	-	-	-	-
Seeds	9.8	-	85.9	<0.05	-	1.6	<0.05	57.3	6.7	27.3
Total Percent	100.0	99.8	100.1	100.0	100.0	100.0	100.0	100.0	100.1	100.0
Weight (grams)	99.11	0.81	0.85	1.77	0.03	1.92	0.40	25.80	0.30	0.11

Table 3.8. Seed and fruit counts from the Edgar Rogers site.

Sample	Chenopod	Maygrass	Persimmon	Black Gum	Grape	Plum	Bearsfoot	Horse Gentian	Pepo	Common Bean	Maize Kernels	Poaceae	Fabaceae	Unknown	Total
Feature 1															
Zone 1	1	-	22	218	5	1	-	-	1	5	4	2	8	41	308
Zone 2	1	-	4	2	-	-	-	-	-	-	-	-	-	4	11
Sub-total	2	-	26	220	5	1	-	-	1	5	4	2	8	45	319
Feature 2															
Zone 1	-	-	-	-	-	-	-	-	-	1	-	-	-	-	1
Feature 3															
Zone 1	-	-	7	1	1	-	-	-	-	-	1	-	-	11	21
Feature 4															
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1
Feature 5															
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1
Feature 6															
Zone 1	-	1	1	-	-	-	-	-	-	1	-	-	-	1	4
Feature 7															
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1
Feature 8															
Zone 1	-	-	-	3	25	-	1	-	-	-	2	-	1	-	32
Feature 9															
Zone 1	-	-	1	-	-	-	-	1	-	-	-	-	-	-	2
Feature 10															
Zone 1	-	-	-	1	-	-	-	-	-	-	1	-	-	1	3
Total	2	1	35	225	31	1	1	1	1	7	8	2	9	61	385

Table 3.9. Percentages of seeds recovered from the Edgar Rogers site.

Seed Type	Context Fea. 1	Fea. 2	Fea. 3	Fea. 6	Fea. 8	Fea. 9	Fea. 10
Chenopod	0.7	-	-	-	-	-	-
Maygrass	-	-	-	33.3	-	-	-
Persimmon	9.5	-	70.0	33.3	-	50.0	-
Black Gum	80.3	-	10.0	-	9.4	-	50.0
Grape	1.8	-	10.0	-	78.1	-	-
Plum	0.4	-	-	-	-	-	-
Bearsfoot	-	-	-	-	3.1	-	-
Horse Gentian	-	-	-	-	-	50.0	-
Pepo	0.4	-	-	-	-	-	-
Common Bean	1.8	100.0	-	33.3	-	-	-
Maize Kernels	1.5	-	10.0	-	6.3	-	50.0
Poaceae	0.7	-	-	-	-	-	-
Fabaceae	2.9	-	-	-	3.1	-	-
Total	100.0	100.0	100.0	99.9	100.0	100.0	100.0
N	274	1	10	3	32	2	2

Table 3.10. Ubiquity of plant food remains from the Edgar Rogers site.

Plant Food	Features		10-Liter Samples	
	N	%	N	%
Hickory	10	100.0	21	95.5
Acorn	8	80.0	19	86.4
Walnut	4	40.0	6	27.3
Maize	8	80.0	17	77.3
Common Bean	3	30.0	5	22.7
Pepo	1	10.0	1	4.5
Persimmon	4	40.0	13	59.1
Black Gum	4	40.0	11	50.0
Grape	3	30.0	6	27.3
Plum	1	10.0	1	4.5
Chenopod	1	10.0	2	9.1
Maygrass	1	10.0	1	4.5
Bearsfoot	1	10.0	1	4.5
Horse Gentian	1	10.0	1	4.5
Poaceae	1	10.0	2	9.1
Fabaceae	1	10.0	3	13.6
Total	10	100.0	22	100.0

Hillsboro phase site—the George Rogers site—further suggest that such settlement units did not exist alone but were components of hamlet-like communities scattered along the valley margins of tributaries of the Haw River. These small farming communities also exploited a wide variety of wild plant and animal foods, reflecting a mixed subsistence economy that persisted with little change well into the Contact period. Given that earlier Hillsboro phase sites such as Wall and possibly RLA-Am16 (located on Stinking Quarter Creek) represent substantially larger, nucleated and palisaded settlements, both the Edgar Rogers and George Rogers sites can be viewed as products of a process of population dispersion that immediately preceded the period of sustained White-Indian contact within the Haw drainage.

Chapter 4

The Holt Site

The Holt site (RLA-Am163; 31Am168) is located in a small, upland field or garden plot adjacent to the Roy B. Holt residence, just south of Big Alamance Creek in central Alamance County, North Carolina (Figure 4.1). It was discovered in 1985 by UNC archaeologists conducting surveys within the Alamance Creek drainage (Simpkins and Petherick 1986). Topographically, it sits atop a narrow ridge overlooking the confluence of Stinking Quarter and Big Alamance creeks. The confluence is approximately 600 ft north of the Holt site, down a moderately steep slope. The nearest source of water, however, is not the creeks but a small spring adjacent to the site near the top of the ridge.

There is very little floodplain along the south side of Stinking Quarter or Big Alamance creeks, and given the ridge top location of the site, a permanent or at least semi-permanent Late Prehistoric settlement was unexpected. Experience in the North Carolina Piedmont has shown such areas to be favorite loci for Archaic camps, particularly during the Middle and Late Archaic periods. In fact, a sizeable collection of Archaic lithic remains was collected from the surface of the Holt site. Experience also has shown that sites located in similar topographic settings usually are badly eroded with little chance of containing buried, intact cultural deposits.

It was with some surprise, and not a little skepticism, that the authors listened to the survey team's report of a relatively intact storage-refuse pit that had recently been exposed by plowing. However, a field inspection quickly verified their observations, and a very rich storage facility that had been refilled with refuse (Feature 1) was salvaged on March 14 1985. The potsherds from the feature suggested a Haw River phase occupation. The unique environmental setting of the site, the period of site occupation, and the presence of intact, sub-plowzone features made the Holt site a prime candidate for excavations in 1987.

During the spring of 1987, the site was re-collected after it had been plowed and rained on to determine the extent of the occupation. It was found that the artifacts (Late Prehistoric and Archaic) were restricted to the small garden plot along the crest of the ridge. The potsherds were small and thinly scattered among numerous large, mostly Archaic flakes. Systematic auger tests were then conducted over an area measuring 150 ft by 50 ft, which encompassed all but the eastern end of the garden plot (Figure 4.1). Because of extremely dry and hard soil conditions, it was not possible to auger the eastern area. A total of 1,281 auger probes revealed the probable presence of seven additional pit features. Two of these later turned out to be postholes. The site probably extends southward beneath the Holt's house and lawn; however, we did not attempt to evaluate this possibility.

The excavation units at the Holt site consisted of three 5-ft by 5-ft squares and three 10-ft by 10-ft squares laid out over the areas where positive auger tests indicated intact features (Figures 4.2, 4.3, and 4.4). None of the squares were contiguous except for two 10-ft by 10-ft units at the eastern edge of the augered area. These contiguous squares were excavated first, and the original intent was to continue using 10-ft by 10-ft squares. However, it became virtually impossible to screen the dry, hard clay loam that comprised the plowzone. Because of these soil conditions, smaller 5-ft by 5-ft units centered directly over the suspected locations of pit features were subsequently used. Furthermore, it became counterproductive to continue trying to screen the plowed soil.

Stratigraphy

The Holt site lacked any significant stratigraphy. A foot of rocky clay loam, stirred by the plow for at least 100 years, overlay a bright orange to red clay subsoil (Figure 4.5). As expected, the Archaic remains consisted only of lithic artifacts swirled together in the plowzone. The 6,000 or more years of periodic camping on the site by Archaic peoples left no preserved "living floors," midden deposits, or other traces discernible in the soil itself. The relatively deep storage facilities laboriously dug into the stiff orange clay subsoil by their Woodland successors, however, did survive the farmer's plow and nature's scouring.

Features

Six features, including the one found when the site was discovered, were excavated at the Holt site. All represent cylindrical storage pits dug to varying depths into the subsoil clay. These features are summarized in Table 4.1 and are described below.

Two things are striking about the Holt site features: 1) their similarity to one another, and 2) the fact that they were dug into a very stiff, almost impenetrable,

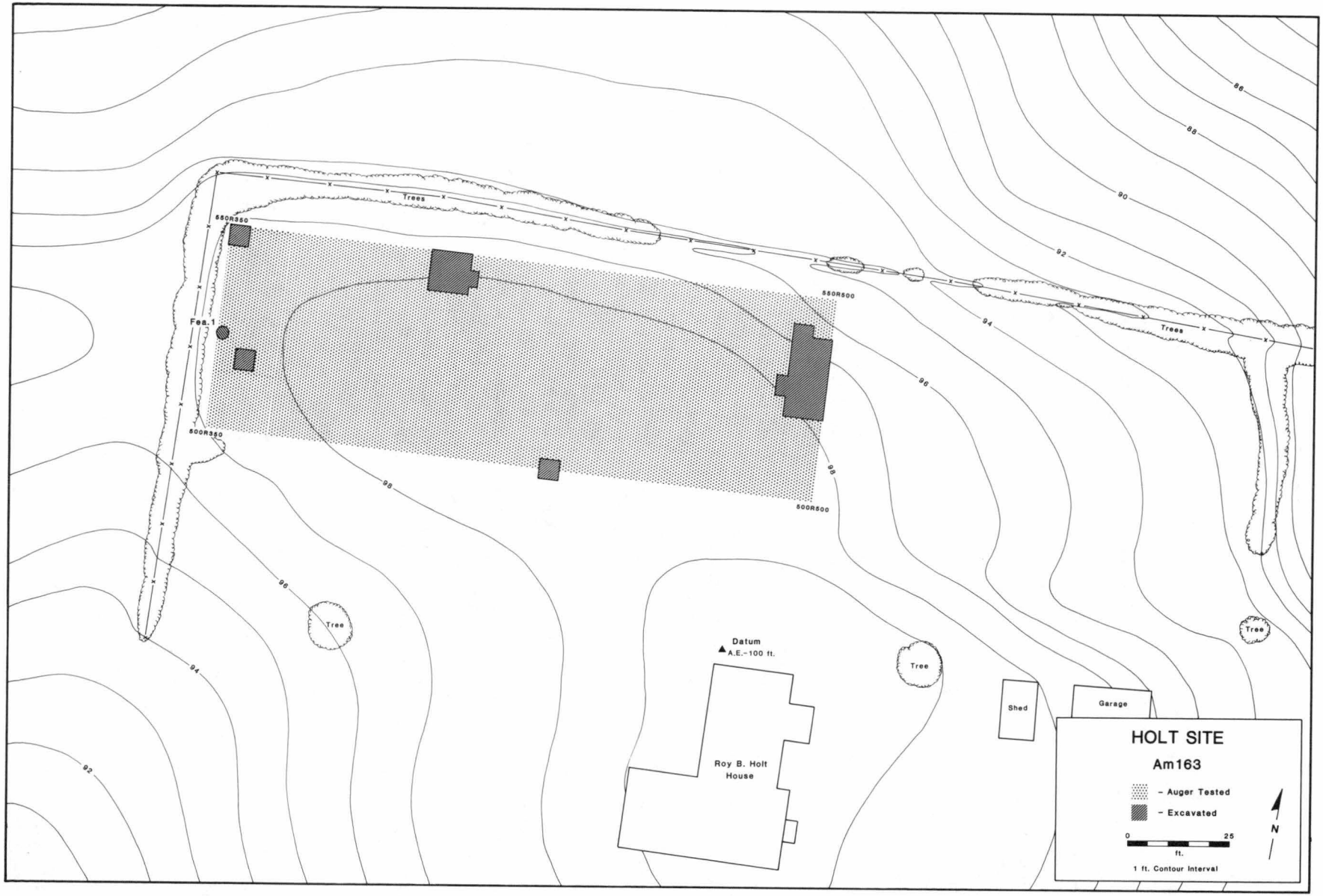

Figure 4.1. Map of the Holt site showing areas of auger testing and excavation.

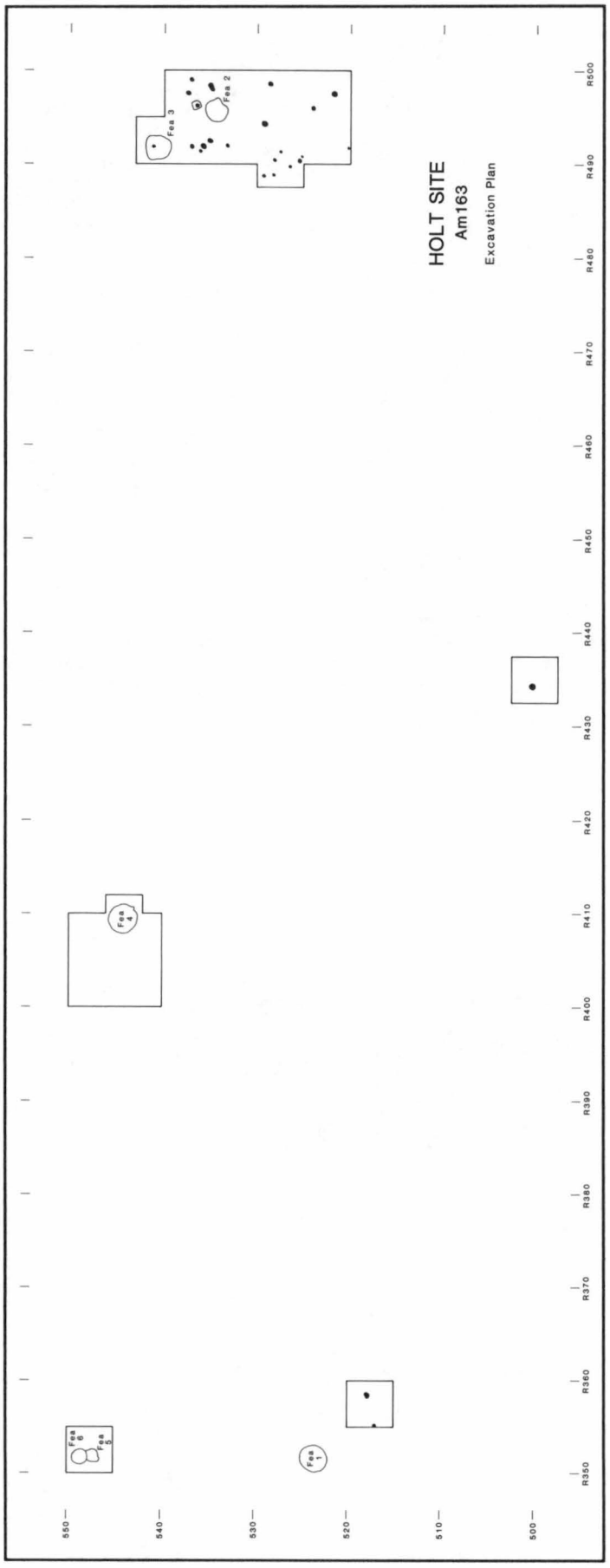

Figure 4.2. Excavation plan at the Holt site.

Figure 4.3. View of the Holt site showing feature excavation in progress.

Figure 4.4. Troweling Sq. 540R500 at the Holt site.

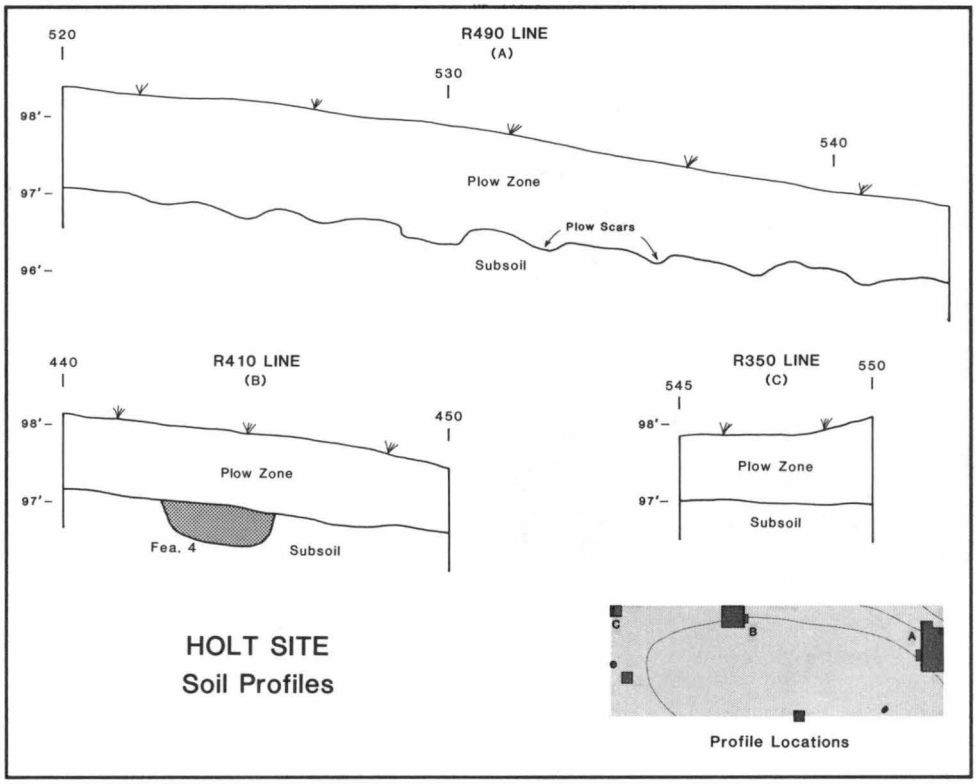

Figure 4.5. Stratigraphic profiles.

Table 4.1. Summary of features identified at the Holt site.

Feature No.	Type	Center Location	Dimensions (ft) L	W	D	Phase Association	Comment
Fea. 1	Storage Pit	523.5R351.5	3.0	3.0	1.4	Haw River	Excavated in 1985
Fea. 2	Storage Pit	534.4R495.7	2.4	2.3	2.0	Haw River	Excavated
Fea. 3	Storage Pit	540.7R491.8	2.9	2.9	1.4	Haw River	Excavated
Fea. 4	Shallow Storage Pit	544.0R409.5	3.0	3.0	0.5	Haw River	Excavated
Fea. 5	Shallow Storage Pit	547.3R351.9	1.7	1.4	0.2	Haw River	Excavated
Fea. 6	Storage Pit	548.6R351.8	1.7	1.7	0.8	Haw River	Excavated

clay subsoil without the aid of metal tools. In addition to similarities in size and shape, the pits also shared fill matrices that appear to reflect analogous behaviors. The first two characteristics are indicative of the primary function of the features, whereas the filling episodes indirectly express activities not related to the pits themselves.

The field crew experienced extreme difficulty excavating the site with steel shovels and mattocks, and upon discovering the relatively large, deep, symmetrical pits created with the more primitive tools of the natives, we could not help but be impressed. The difficult task of digging these facilities with implements of wood, stone, or bone attests to their importance to the Holt site inhabitants.

Feature 1

This rich pit was excavated in 1985 when the Holt site was first discovered by UNC archaeologists. It had been exposed by a deep plow furrow and was located at the western edge of a garden plot adjacent to an old fence row. The gray-brown ashy loam fill containing numerous sherds, animal bones, charcoal, and mussel shell contrasted markedly with the surrounding red clay subsoil. Once the exposed pit surface was cleaned, a circular stain 3.0 ft in diameter was clearly defined (Figure 4.6). The upper fill was labeled Zone 1. Excavation revealed this lens to be basin-shaped in profile and relatively shallow, 0.4 ft at its thickest point near the center of the feature. Beneath Zone 1 lay a thick stratum of homogeneous tan

Figure 4.6. Feature 1, before excavation.

Figure 4.7. Feature 1, excavated.

clay loam (Zone 2). This soil was very wet and contained fewer artifacts and less organic material than the upper fill zone. After the pit was excavated, it measured 1.4 ft deep and had straight sides that curved inward near their intersection with a flat bottom (Figures 4.7 and 4.8).

The size and shape of the feature suggest that it originally was dug to serve as a storage facility. Subsequently, it was filled first with surrounding topsoil and then with organically rich soil that may have been collected from around a hearth or other domestic area where food preparation took place.

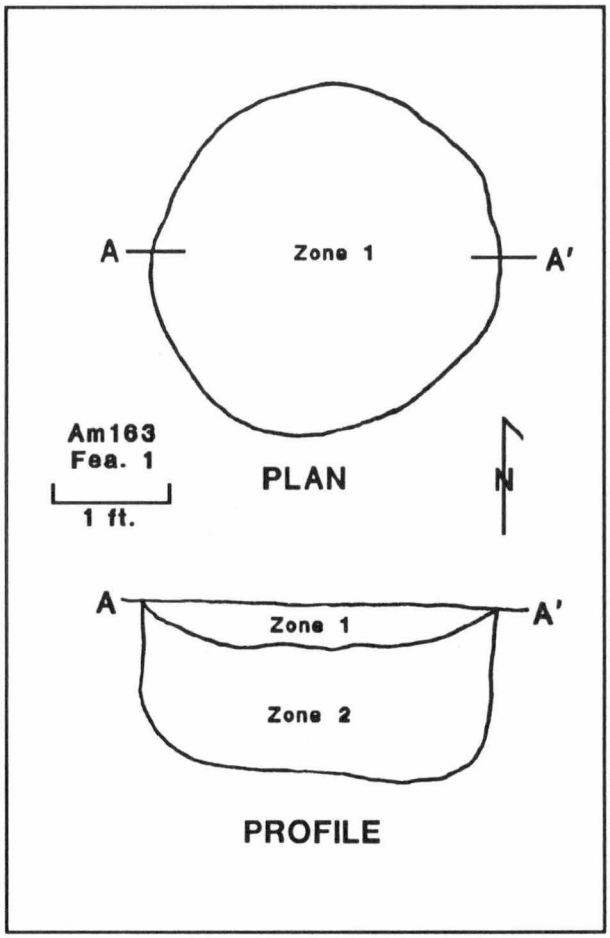

Figure 4.8. Feature 1, plan view and profile drawings.

A radiocarbon age of 900 ± 100 years: A.D. 1050 (Beta-20379) was obtained from charred plant remains from Zone 1. This charcoal sample was small (0.3 gram of carbon) and required an extended counting time.

Feature 2

This facility was located approximately 145 ft east of Feature 1 at eastern edge of the Holt site excavations. At the top of subsoil it appeared circular in shape and contained a dark gray to black loam (2.5YR 3/2) with pieces of charcoal and small fragments of clay and bone (Zone 1) (Figure 4.9). At a depth of 0.4 ft below the surface, several large rocks extended northeast-to-southwest across the pit. A large net-impressed sherd lay along the northeast edge of the pit, adjacent to the rocks.

Beneath the rocks at a depth of 0.8 ft, a gray ash lens or pocket was encountered. It did not extend across the feature and appears to represent a single dumping episode. A large basal sherd and a bone awl were recovered from the ash. The soil surrounding the ash was more mottled to a depth of 1.2 ft, and the overall artifact content decreased. However, beneath the mottled ashy layer, typical Zone 1 fill (designated

Figure 4.9. Feature 2, before excavation.

Figure 4.10. Feature 2, excavated.

Zone 1a) again was encountered, and the amount of cultural remains increased to the concentration earlier noted in the upper portion of Zone 1. The bottom of the feature was reached at a depth of 2.0 ft beneath the top of subsoil (Figure 4.10). Morphologically, the pit was bell-shaped in profile and had a slightly depressed bottom (Figure 4.11).

No doubt this facility originally functioned as a storage container. After it was no longer suited for this purpose, it was refilled with domestic refuse. The ash pocket apparently represents a single dumping episode when debris from a hearth or similar facility

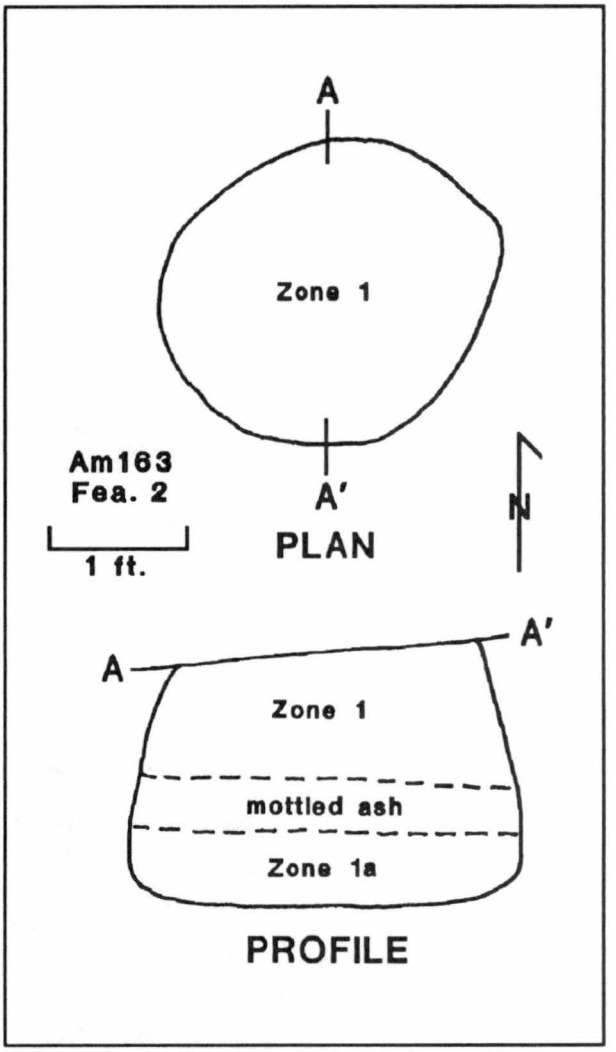

Figure 4.11. Feature 2, plan view and profile drawings.

was deposited during the middle of the refilling process.

A second radiocarbon date was obtained from wood charcoal collected within Zone 1a fill. This sample produced a radiocarbon age of 480 ± 50 years: A.D. 1470 (Beta-23508), which differs significantly from the A.D. 1050 ± 100 date obtained from Feature 1 charcoal. Calibration of these two assessments, following Stuiver and Becker (1986), does not resolve this difference. The Feature 1 assessment, when calibrated, yields multiple intercepts of A.D. 1133, A.D. 1136, and A.D. 1156 and a one-sigma range of A.D. 1003 to A.D. 1256. The calibrated Feature 2 assessment gives an intercept of A.D. 1429 and a one-sigma range of A.D. 1411 to A.D. 1442. Given similarities in fill, pit morphology, and artifact content between these two features, it is unlikely that they resulted from separate occupations two centuries apart. Instead, the Feature 2 radiocarbon date is regarded as the probable correct age estimate for the Holt site. This conclusion is based on three factors. First, the

Figure 4.12. Feature 3, before excavation.

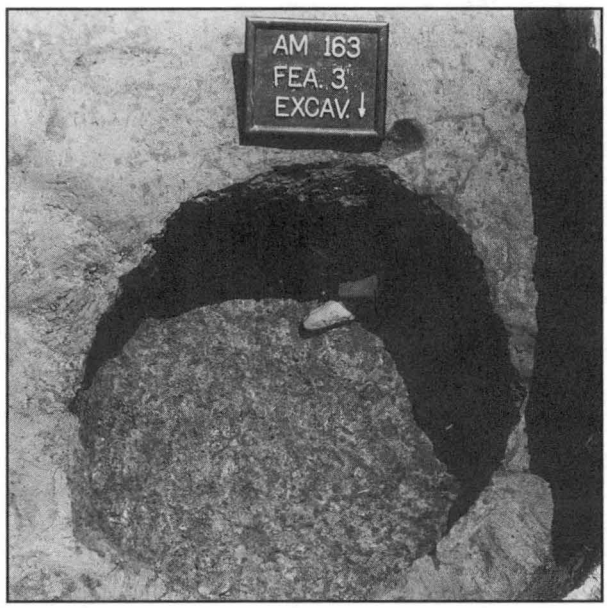

Figure 4.13. Feature 3, excavated.

artifact assemblage (particularly pottery) from the Holt site is very similar to that obtained from the Webster site which also has been radiocarbon dated to the fifteenth century. Second, the Holt ceramic assemblage is dissimilar to the Uwharrie series pottery found at the Hogue site, occupied sometime between A.D. 1000 and A.D. 1200. Third, the charcoal sample from Feature 1 was very small and thus may be regarded as problematic.

Feature 3

This feature appeared at the base of the subsoil as a

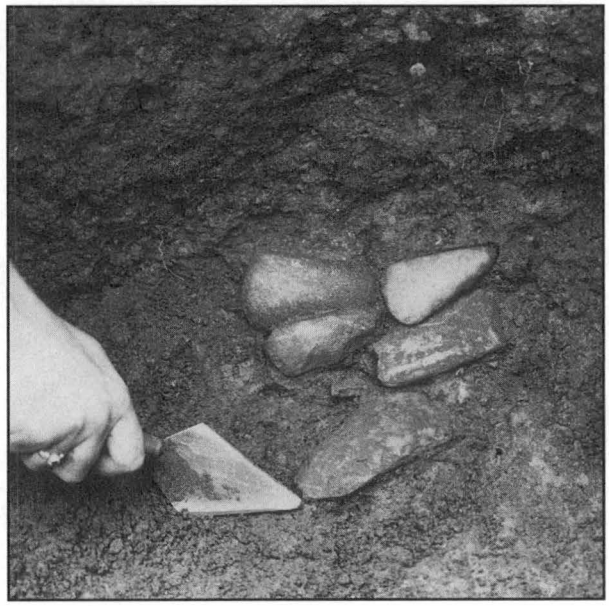

Figure 4.14. Feature 3, close-up of celts.

circular area of dark brown loam (10YR 4/3) with fragments of charcoal and fired clay (Zone 1) (Figure 4.12). The perimeter of this zone was somewhat darker than the central area, and the southern third of the feature's surface was covered by a thin lens of gray ash. Zone 1 contained numerous potsherds, animal bones, and over 300 fractured quartz fragments. Near the bottom of the pit, Zone 1 graded into a dark yellowish brown loam (10YR 3/4) with charcoal and clay inclusions, designated Zone 2. This layer also was rich in cultural material. After excavation, the feature measured 2.9 ft in diameter and was 1.4 ft deep (Figures 4.13 and 4.14). Its profile presented a barrel-shaped outline with a slightly uneven bottom. The most interesting aspect of Feature 3 was the presence of four stone celts, in various stages of manufacture, and a chipped chisel neatly stacked at the bottom of the pit against the southern wall (Figure 4.15).

Ordinarily, this facility would be interpreted as another storage unit that was eventually refilled with domestic refuse. And this no doubt was the case. However, the presence of the stone tools adds another dimension to this interpretation. The tools certainly were not intentionally discarded as refuse, and it is hard to imagine how they could have unintentionally found their way into the pit. The fact that they were bundled together suggests that they were originally placed in a bag or some other container.

Do they represent ritual behavior surrounding the activities responsible for filling the pit? Were they "cached" or hidden in the garbage—or did their owner throw them away in frustration when they failed to meet his expectations? Obviously we can never know with certainty how or why the celts were placed in the

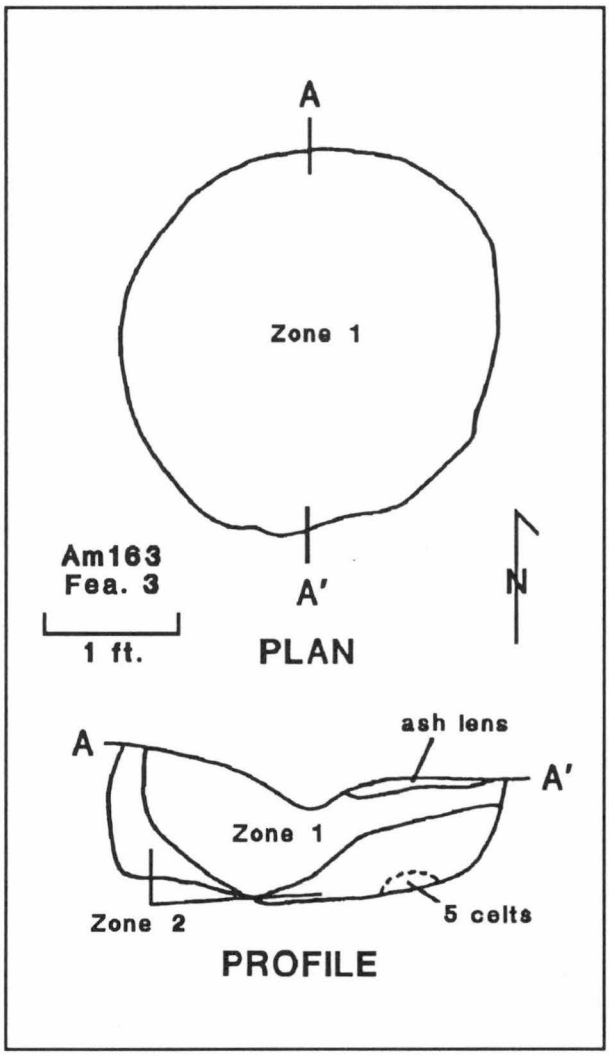

Figure 4.15. Feature 3, plan view and profile drawings.

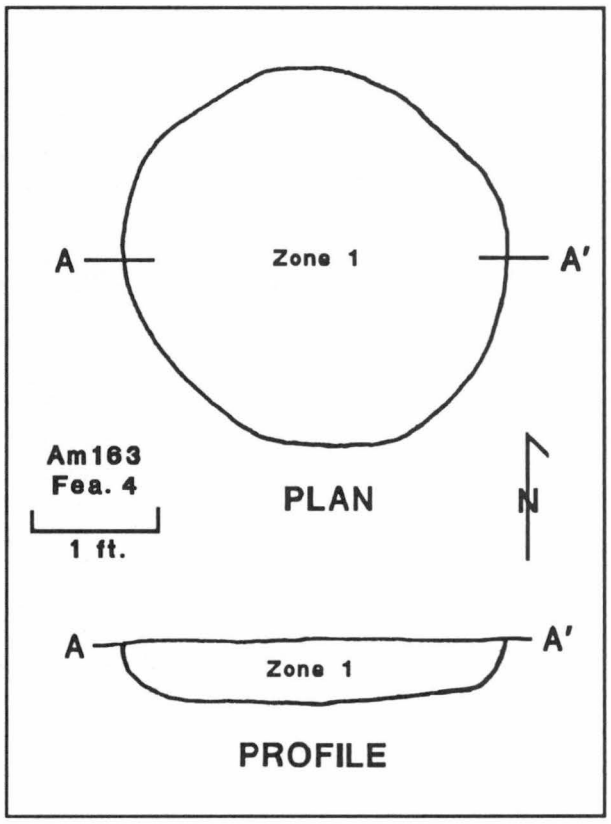

Figure 4.16. Feature 4, plan view and profile drawings.

bottom of Feature 3; however, they seem to reflect a more general disposal pattern where serviceable artifacts are placed or discarded with obvious refuse. More will be said concerning this pattern in subsequent chapters.

Feature 4

This shallow pit was located at 544R409.5, in the center of the investigated area of the site. At the top of subsoil it appeared as a circular patch of dark brown (10YR 3/3) mottled loam that contained charcoal, animal bones, mussel shells, and sherds. Several rocks also were scattered throughout the fill. The soil around the perimeter of the pit was somewhat darker than that in the center. After excavation the feature measured 3.0 ft in diameter but was only 0.5 ft deep. The profile was basin-shaped and looked very much like the lower portions of Features 1, 2, and 3 (Figure 4.16). This configuration and the similarities in fill and diameter between these facilities suggest they all may have served a similar function as storage or cache pits refilled with refuse. Plowing and erosion undoubtedly had drastically reduced the original depth and volume of Feature 4.

Feature 5

This feature was located in the northwest corner of the site and was intruded by Feature 6. The fill consisted of a dark brown (7.5YR 3/2) loam containing numerous potsherds, animal bones, and charcoal fragments. A few rocks also were present, and small pockets of ash were intermixed with the fill. The pit measured almost 2.0 ft in diameter but was only 0.2 ft deep. Like Feature 4, it was probably considerable deeper before plowing and erosion erased the upper portion.

Feature 6

The soil in this feature was identical to that of Feature 5, indicating that both facilities probably were refilled at the same time. The two pits also were very similar in terms of surface diameter. Feature 6 measured almost 2.0 ft in diameter but was deeper, extending 0.8 ft beneath the subsoil surface (Figure 4.17). Although deeper than Feature 5, the upper portion of this facility likewise had probably been destroyed by plowing and erosion.

Summary

Given the shared characteristics of the features at the Holt site, we conclude that these facilities served a similar primary purpose (storage or caching) and were refilled at about the same time. The fill seems to represent soil and refuse collected from areas where food preparation and consumption took place; however, the precise behavioral context in which refilling occurred is unknown. The rapid, episodic refilling of the pits suggests something other than their being recycled as everyday garbage receptacles. Perhaps storage facilities were inspected on a cyclical basis as part of renewal ceremonies, and those found to be in poor repair were taken out of service and filled with refuse generated by feasting or general domestic cleaning activities that also were components of the renewal ritual. This explanation of the final configuration of the Holt site pits must, of course, be presented only as an hypothesis. Nevertheless, it is obvious that they were not left open for any appreciable length of time as would be expected if the pits were casually filled with daily deposits of household refuse.

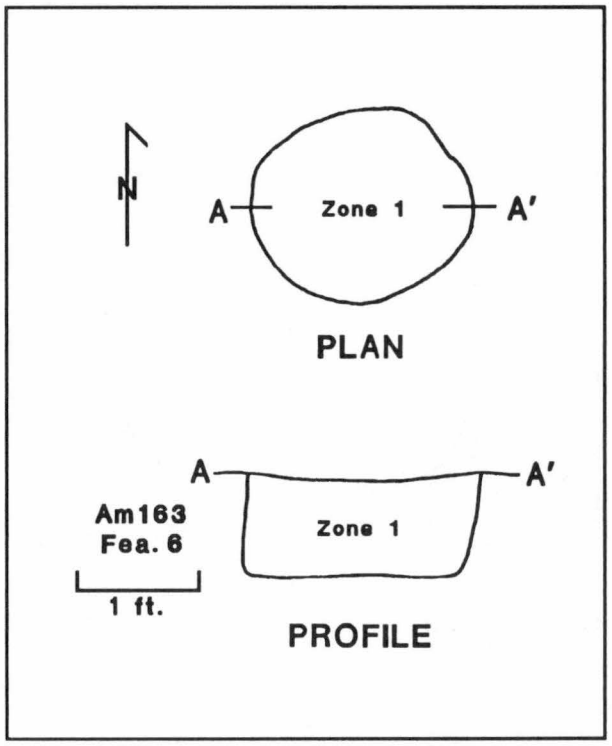

Figure 4.17. Feature 6, plan view and profile drawings.

Postholes

Because of the dispersed nature of the Holt site excavation units, no structural patterns could be discerned. However, in the vicinity of Features 2 and 3 several distinct posthole stains were recognized and may indicate the presence of a structure associated with these features. The postholes measured between 0.3 ft and 0.4 ft in diameter and contained a dark brown fill similar to that of the features. A square posthole surrounding a charred circular postmold, located immediately north of Feature 2, probably represents the remains of a modern fence. None of the postholes were excavated.

Pottery

The sample of aboriginal pottery recovered from the 1987 excavations at the Holt site consists of 2,579 potsherds and includes reconstructed portions of at least six separate vessels (Table 4.2). Potsherds recovered in 1985 from Feature 1 excavations were not included in the analysis. With the exception of Features 5 and 6 which yielded only 55 sherds, most features contained abundant ceramic remains. In all, about 40% of the ceramic sample from the Holt site came from undisturbed feature contexts. The comparatively small amount of plowzone pottery reflects the fact that plowed soil was only partially screened. Similarities between sherd samples from both feature and plowzone contexts indicate that only a single Late Prehistoric cultural component, attributed to the Haw River phase, is represented by these artifacts. Of the 885 sherds in the sample that could be classified by exterior surface treatment, almost 92% are net impressed. Other surface treatments represented, in descending order of frequency, include: plain, brushed, cord marked, and simple stamped.

With the exception of a single simple stamped sherd and four shell tempered, net impressed sherds, all of the pottery from the Holt site is attributable to a single ceramic series, defined here as the *Haw River series*. This series consists primarily of net impressed pottery with scraped interior surfaces and crushed quartz, crushed feldspar, or coarse sand temper (often mixed). The most common vessel form is a medium-sized (10 cm to 20 cm in diameter ?) jar with a slightly constricted neck and a conoidal or sub-conoidal base. Most vessels were simply decorated by notching the lip with a sharp stick or fingernail. Some vessels also were decorated with a broad incised band or band of fingernail notches around the neck. The Haw River series is closely related to the preceding Uwharrie series and

Table 4.2. Distribution of pottery from the Holt site.

Context	Haw River: Net Impressed	Haw River: Cord Marked	Haw River: Brushed	Haw River: Plain	New River: Net Impressed	Hillsboro: Simple Stamped	Indet.	Total
Haw River Phase								
Feature 2	160	2	14	8	4	-	191	379
Feature 3	140	1	-	10	-	-	224	375
Feature 4	90	-	1	3	-	-	136	230
Feature 5	4	-	-	-	-	-	-	4
Feature 6	16	-	-	3	-	1	31	51
Sub-total	410	3	15	24	4	1	582	1039
Indeterminate Phase								
Plowzone	372	1	11	16	-	-	1058	1458
Surface	27	-	-	1	-	-	54	82
Sub-total	399	1	11	17	0	0	1112	1540
Total	809	4	26	41	4	1	1694	2579

shows greatest similarity in terms of temper and overall vessel morphology. The kinds of decorations seen on Haw River pottery, as well as the predominance of net impressing, also indicate a close similarity to the Dan River series. This series occupies a similar chronological position within the Dan River drainage to the north and undoubtedly had some influence upon Haw River potters. Haw River series pottery is ubiquitous on late prehistoric Haw River phase (ca. A.D. 1000–1400) sites in Alamance, Orange, and northern Chatham counties.

Haw River Net Impressed (Figure 4.18)

Sample Size: N=813.

Paste: Vessels were built by applying annular clay coils to a cup-shaped basal plate. Adjacent coils were then welded together by pinching and stamping the exterior with a net-wrapped malleating paddle. Vessel walls apparently were thinned by scraping the interior with a serrated mussel shell. Temper added to the potter's clay consists of crushed quartz, crushed feldspar, coarse sand, or a mixture of these three materials. Within the *Haw River Net Impressed* sample from the Holt site, 52.1% of the sherds contained medium-to-fine crushed quartz, followed by mixed quartz and feldspar (23.4%), fine crushed feldspar (15.3%), and coarse sand (9.2%). The amount of temper added to the clay varies considerably within the sample. Exterior sherd color ranges from brown (7.5YR 5/4) to dark reddish brown (5YR 3/4) to very dark gray (7.5N 3/0). Sherd interiors exhibit a similar range of colors.

Surface Finish (Exterior): The exterior surface has been stamped with a net-wrapped paddle. Coarse, knotted net impressions predominate.

Surface Finish (Interior): Almost 90% of the potsherds in the sample had heavily scraped interiors; the remainder were smoothed.

Decoration: The relatively high frequency of decorated sherds (i.e., 60% of all rimsherds and 41% of all neck/shoulder sherds) indicates that most net impressed jars at the Holt site were decorated in some manner. Rim decorations consist of: V-shaped notches along the lip (n=6) (Figure 4.18*c–d,f–g*), oblique incisions along the lip (n=6) (Figure 4.18*a,k*), V-shaped notches along the lip/rim edge (n=22) (Figure 4.18*b,h–i,l*), oblique incisions along the lip/rim edge (n=3) (Figure 4.18*e,j*), parallel brushed bands around the rim (n=3), and a band of perpendicular-to-oblique incised lines around the rim (n=1). Neck and shoulder decorations consist of: smoothed or brushed bands around the neck (n=19) (Figure 4.18*i,k,o–p*), a band of perpendicular-to-oblique incised lines around the neck or shoulder (n=5) (Figure 4.18*q*), and U-shaped, fingertip or circular (n=7) punctations around the neck (Figure 4.18*c,e,j,m–o*).

Form: All of the rimsherds in the sample (n=46) represent jars with straight or slightly everted rim profiles and most have rounded lips. Interestingly, five of the six reconstructed vessel sections represent lower body portions or bases. The sixth net impressed vessel is comprised of several non-conjoining body sections and three non-conjoining rim sections. The apparent bias against preserved rim sections within the feature sherd sample, whether due to depositional factors, post-depositional factors (e.g., plowing away of feature tops), or simply random chance, is unexplained at present.

Comments: *Haw River Net Impressed* is the predominant type within the Haw River series and therefore the primary pottery type used during the Haw River phase. Given general similarities in paste and

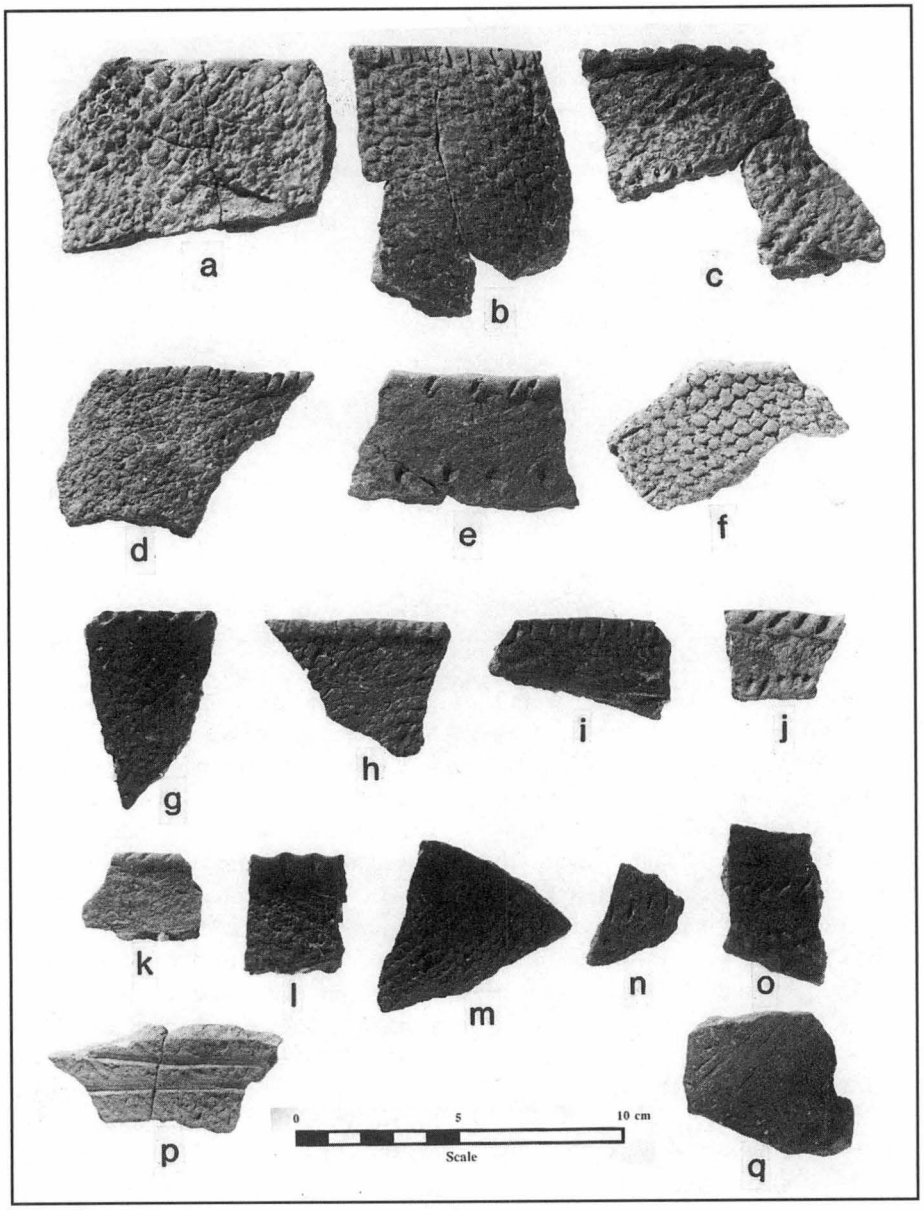

Figure 4.18. Haw River series pottery from the Holt site.

vessel form, it clearly is derived from *Uwharrie Net Impressed* (Coe 1952). Many vessels have either straight or very slightly constricted necks, and crushed quartz continues to be a principal temper type. The frequency and variety of decoration, however, distinguish this type from Uwharrie series pottery which only rarely was decorated. Instead, the types of decoration seen at the Holt site (as well as other Haw River phase sites) are much more similar to those found within the Dan River series (Coe and Lewis 1952). Decoration was restricted to the lip and neck areas of a vessel and involved the use of a stick, fingernail, or fingertip to produce notches or simple linear-incised designs.

Haw River Net Impressed sherds were recovered from all excavated features, as well as from the plowzone and surface.

Haw River Plain

Sample Size: N=41.

Paste: The paste is the same as that described for *Haw River Net Impressed* except for the frequency distribution of temper types. Temper consisted of coarse sand (n=14), crushed quartz (n=14), mixed quartz and feldspar (n=9), and fine crushed feldspar (n=4).

Surface Finish (Exterior): The exterior surface has been roughly smoothed. It is possible that some of these sherds are from net impressed vessels that were partially smoothed.

Surface Finish (Interior): Almost two thirds of these sherds have smoothed interiors; the remainder have heavily scraped interiors.

Decoration: Decorations were observed on only two sherds and consisted of U-shaped punctations along the rim and a band of finger punctations placed around the vessel neck.

Form: Of the nine rimsherds recovered, most have everted profiles and rounded lips. Over half (n=21) of these sherds are 6 mm to 8 mm thick, a pattern that was also observed for *Haw River Net Impressed* pottery from the site.

Comments: This type is a minor constituent of the Haw River series. At present, it is unclear whether these sherds are derived largely from smoothed-over portions of other (particularly net impressed) vessels or constitute a distinct vessel type. *Haw River Plain* sherds were recovered from all features except Feature 5.

Haw River Brushed

Sample Size: N=26.

Paste: Paste and temper is similar to that observed for *Haw River Net Impressed.*

Surface Finish (Exterior): The exterior surface has been brushed or scraped with a twig brush or other rough-edged tool.

Surface Finish (Interior): All of these sherds have scraped interiors.

Decoration: None observed.

Form: No rimsherds were recovered. All sherds probably are from jars.

Comments: Given that several large net impressed sherds and reconstructed vessel sections displayed some exterior scraping, particularly near the base, many of the sherds classified as *Haw River Brushed* may be from brushed areas of vessels with other surface treatments. *Haw River Brushed* sherds were recovered from Features 2 and 4, and from the plowzone.

Haw River Cord Marked

Sample Size: N=4.

Paste: Two sherds contained crushed quartz; the others contained coarse sand.

Surface Finish (Exterior): The exterior surface has been stamped with a cord-wrapped paddle.

Surface Finish (Interior): All four sherds had scraped interiors.

Decoration: None observed.

Form: No rimsherds were recovered.

Comments: The four *Haw River Cord Marked* body sherds were recovered from Feature 2, Feature 3, and the plowzone.

New River Knot Roughened and Net Impressed

The four conjoining, shell tempered basal sherds were recovered from Zone 1 of Feature 2. These sherds conform to the type *New River Knot Roughened and Net Impressed* (Evans 1955; Holland 1970), a Late Woodland type recognized in southwest Virginia.

Hillsboro Simple Stamped

One simple stamped body sherd was recovered from Feature 6. It has a scraped interior and is tempered with mixed quartz and feldspar. This sherd is probably referable to the *Hillsboro Simple Stamped* type (Coe 1952).

Indeterminate Sherds

Over 65% (n=1,694) of all sherds recovered could not be classified by surface treatment because of either small sherd size or eroded surface. Most of these sherds probably are from *Haw River Net Impressed* vessels.

Summary

Aside from certain differences in temper preference and specific types of vessel decoration, the Holt ceramic assemblage is very similar to Haw River phase assemblages at the Guthrie, Webster, and Mitchum sites. The predominance of medium-to-fine crushed quartz temper, in contrast to the dominance of crushed feldspar and coarse sand temper at the other three sites, probably reflects chronological or spatial variability within the Haw River series. Other ceramic attributes, particularly types of surface treatment, methods of decoration, and vessel form, are sufficiently similar to warrant the inclusion of all of these assemblages within the same ceramic series.

Lithic Artifacts

The sample (n=1,572) of lithic artifacts recovered during 1986 archaeological testing at the Holt site consists of debitage and exhausted cores (n=1,264), chipped stone tools and fragments (n=289), ground stone tools and fragments (n=7), and large cobble tools (n=12) (Table 4.3). Included within this sample are 331 flakes and at least 60 projectile points and chipped stone tools which, based on degree of patination and morphological characteristics, can be attributed to late Paleo-Indian, Archaic, and Early-Middle Woodland occupations of the site. This indicates that at least 25%, and possibly as much as 50%, of the lithic artifact sample is not associated with the Late Prehistoric Haw River phase component, and thus severely limits the degree of interpretation that is possible for this artifact class. Although approximately 56% of the artifact sample is derived from Haw River phase features (due to limited screening of plowed soil), it is

Table 4.3. Distribution of lithic artifacts from the Holt site.

Category	Context PZ	Fea. 2	Fea. 3	Fea. 4	Fea. 5	Fea. 6	Surface	Total
Debitage								
Decortication Flakes	21	18	15	1	-	-	3	58
Interior/Bif. Thin. Flakes	137	233	351	53	1	54	9	838
Shatter Fragments	1	4	5	-	-	1	-	11
Flakes (Archaic)	310	10	-	-	-	-	11	331
Other Flakes	3	-	-	-	-	-	-	3
Cores	4	8	7	3	-	-	-	22
Raw Material	-	-	1	-	-	-	-	1
Projectile Points								
Hardaway Side-Notched	1	-	-	-	-	-	-	1
Hardaway-Dalton	1	-	-	-	-	-	-	1
Kirk Corner-Notched	4	-	-	-	-	-	1	5
Guilford Lanceolate	1	-	-	-	-	-	-	1
Savannah River Stemmed	-	1	1	1	-	-	-	3
Small Triangular Points	29	7	2	1	-	1	6	46
Unidentified Points	8	1	-	1	-	-	-	10
Other Chipped Stone Artifacts								
Preforms	1	-	-	-	-	1	1	3
Bifaces	18	-	3	-	-	-	4	25
Drill	-	-	1	-	-	-	-	1
Chipped Chisel	-	-	1	-	-	-	-	1
Pièces Esquillées	-	2	-	-	-	-	-	2
Side Scrapers	8	1	-	-	-	-	1	10
End Scrapers	9	-	4	1	-	-	-	14
Spokeshave	1	-	-	-	-	-	-	1
Perforators	4	-	-	-	-	1	-	5
Gravers	6	1	-	-	-	-	2	9
Utilized/Retouched Flakes	61	32	35	7	-	5	10	150
Ground Stone Artifacts								
Ground Celts	-	-	4	-	-	-	-	4
Ground Stone Fragments	2	2	-	-	-	-	-	4
Large Cobble Tools								
Cobble Choppers	5	-	-	-	-	-	-	5
Hammerstones/Manos	3	3	-	-	-	-	-	6
Anvil/Milling Stone	-	1	-	-	-	-	-	1
Total	638	324	430	68	1	63	48	1572

likely that these features contain several lithic artifacts produced by earlier site occupants. Major artifact categories are described below.

Debitage

Decortication Flakes. Sample Size: 58. Form: This category includes flakes classified as primary and secondary decortication flakes. Primary decortication flakes (n=9) exhibit a striking platform and bulb of percussion on the ventral surface, and have more than 75% of cortex remaining on the dorsal surface. Secondary decortication flakes (n=49) are similar but have cortex on less than 75% of the dorsal surface. Material: Vitric tuff–45, Felsic tuff–10, Other metavolcanic rock–3. Comment: These flakes represent initial stages of lithic reduction and tool manufacture. The low ratio (1:14.4) of decortication flakes to interior/bifacial thinning flakes suggests either the presence of specialized tool production (e.g., final tool modification and resharpening) at the site or, more likely, a general absence of raw materials (particularly metavolcanic rock) in the immediate site vicinity. Given the

high frequency of quartz interior flakes and cores, it is likely that this material type *was* locally available.

Interior/Bifacial Thinning Flakes. Sample Size: 838. Form: Interior flakes (n=750) are flat flakes that have no remaining cortex, have flake removal scars on the dorsal surface, and lack a steep platform angle. Bifacial thinning flakes (n=88) are similar to interior flakes but possess a steep platform angle that evidences detachment from a biface. Material: Quartz–535, Vitric tuff–164, Felsic tuff–81, Rhyolite–38, Other metavolcanic rock–17, Slate–2, Granite–1. Comment: Both interior and bifacial thinning flakes result from intermediate and final stages of bifacial tool production.

Shatter Fragments. Sample Size: 11. Form: These are angular flakes that, based on morphological characteristics, cannot be specifically classified. Material: Quartz–8, Vitric tuff–1, Felsic tuff–1, Other metavolcanic rock–1. Comment: None.

Archaic Flakes. Sample Size: 331. Form: This category includes large, heavily patinated flakes that, in all likelihood, date to the Archaic or late Paleo-Indian periods. Material: Not classified. Comment: Specimens placed into this category received only minimal analytical treatment.

Other Flakes. Sample Size: 3. Form: These three specimens are core rejuvenation flakes—flakes removed from a core to remove step fractures or to produce a new striking platform. Material: Vitric tuff–2, Slate–1. Comment: None.

Cores. Sample Size: 22. Form: These artifacts are amorphous chunks of raw material from which two or more flakes have been detached. Many are exhausted. Material: Quartz–17, Vitric tuff–3, Felsic tuff–2. Comment: None.

Raw Material. Sample Size: 1. Form: This specimen is a nodule that was "tested" by removing a single flake. Material: Felsic tuff–1. Comment: None.

Projectile Points

Hardaway-Dalton Projectile Point. Sample Size: 1. Form: The *Hardaway-Dalton* projectile point type is described by Coe (1964:64) as having "a broad, thin blade with deeply concave bases and shallow side-notches. Bases and side-notches were ground and edges were frequently serrated." This specimen is a basal fragment from a point that broke just above the haft. Material: Welded tuff–1. Comment: This point type occurred in the lower zones at the Hardaway site in North Carolina and is attributed to the late Paleo-Indian period (before 8,000 B.C.) (Coe 1964; Ward 1983).

Hardaway Side Notched Projectile Point. Sample Size: 1. Form: The *Hardaway Side-Notched* projectile point type is defined by "a small, broad, thin blade with narrow side-notches and a recurved, concave base" (Coe 1964:67). This specimen is the basal portion of a well-made projectile point that broke just above the notches. Material: Other metavolcanic rock–1. Comment: This point type also occurred in the lower zones at the Hardaway site, in association with *Hardaway-Dalton* points, and is attributed to the late Paleo-Indian period (Coe 1964; Ward 1983).

Kirk Corner Notched Projectile Points. Sample Size: 5. Form: The *Kirk Corner-Notched* projectile point type is defined by a large triangular blade, a straight to slightly concave base, and corner notches (Coe 1964:69–70). Four specimens are basal fragments from heavily reworked points; the fifth point has a reworked tip. Material: Other metavolcanic rock–4, Vitric tuff–1. Comment: This point type is associated with the Early Archaic period and has been radiocarbon dated to 8,000–6,800 B.C. in the Little Tennessee River valley (Chapman 1977).

Guilford Lanceolate Projectile Point. Sample Size: 1. Form: Coe (1964:43) describes the *Guilford Lanceolate* projectile point type as having "a long, slender, but thick blade with straight, rounded or convex base." The one specimen in the sample is a thick basal fragment. Material: Vitric tuff–1. Comment: This point type dates to the Middle Archaic period (ca. 4,500–4,000 B.C.).

Savannah River Stemmed Projectile Point. Sample Size: 3. Form: The *Savannah River Stemmed* projectile point type is defined by a large, heavy triangular blade and a broad stem with a straight or indented base (Coe 1964:44–45). All specimens are basal fragments. Material: Rhyolite–1, Felsic tuff–1, Quartz–1. Comment: This point type dates to the Late Archaic period (ca. 2,000 B.C.).

Small Triangular Projectile Points (Figure 4.19). Sample Size: 46. Form: These specimens are generally referable to the *Caraway Triangular* type (Coe 1964:49). Twenty-six point fragments could not be classified by lateral and basal edge configuration. The remainder have either incurvate sides and base (n=11), incurvate sides and a straight base (n=1), incurvate sides and an excurvate base (n=3), or straight sides and incurvate base (n=5). These points range from 19 mm to 37 mm (mean=26.4, sd=6.6, n=24) in length, 13 mm to 27 mm (mean=18.6, sd=4.7, n=36) in width, and 4 mm to 8 mm (mean=5.5, sd=1.5, n=40) in thickness. Material: Vitric tuff–33, Felsic tuff–7, Other metavolcanic rock–5, Welded tuff–1. Comment: All of these projectile points probably are associated with the Haw River phase occupation of the site and are remarkably similar in size and edge configuration to small triangular points from the Webster site.

Projectile Point Fragments. Sample Size: 10. Form: This category includes fragments of projectile points that cannot be assigned to a specific category. Material: Vitric tuff–7, Felsic tuff–2, Welded tuff–1. Comment: Eight of these specimens are from stemmed Archaic points. The other two are from Woodland triangular points.

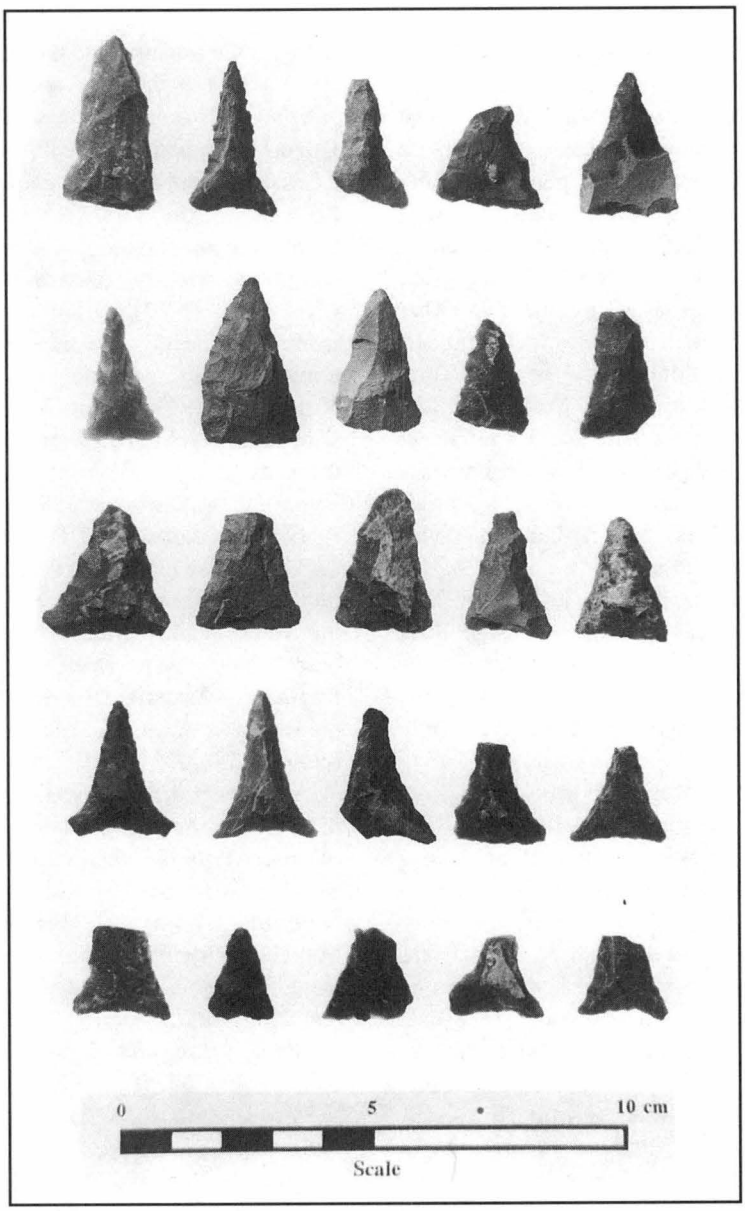

Figure 4.19. Chipped stone projectile points from the Holt site.

Other Chipped Stone Artifacts

Preforms. Sample Size: 3. Form: All three specimens are triangular in form and appear to represent unfinished triangular projectile points. Material: Vitric tuff–2, Felsic tuff–1. Comment: These specimens probably are associated with the Haw River phase occupation of the site.

Bifaces. Sample Size: 25. Form: This category includes specimens exhibiting flake removal scars on both surfaces, excluding preforms and projectile points. Material: Felsic tuff–6, Vitric tuff–4, Other metavolcanic rock–2, Quartz–1, Not classified–12. Comment: Twelve bifaces and biface fragments, not classified by raw material, are heavily patinated and predate the Woodland occupation at the site. Eleven specimens are small triangular bifaces that probably represent unfinished Woodland projectile points. The remaining two large biface fragments may be from broken bifacial knives.

Drill. Sample Size: 1. Form: This specimen is a small tip fragment from a bifacially worked drill. Material: Vitric tuff–1. Comment: The lack of patination suggests that this is probably a Woodland artifact.

Chipped Chisel (Figure 4.20*f*). Sample Size: 1. Form: This specimen is a small (85 mm long x 37 mm wide x 18 mm thick), roughly chipped biface with a subrectangular shape, a tapered poll, and a flaked, plano-convex working edge. Both faces exhibit polishing, presumably from hafting. Material: Vitric tuff–1. Comment: This artifact is one of five woodworking tools that were apparently cached in Feature 3.

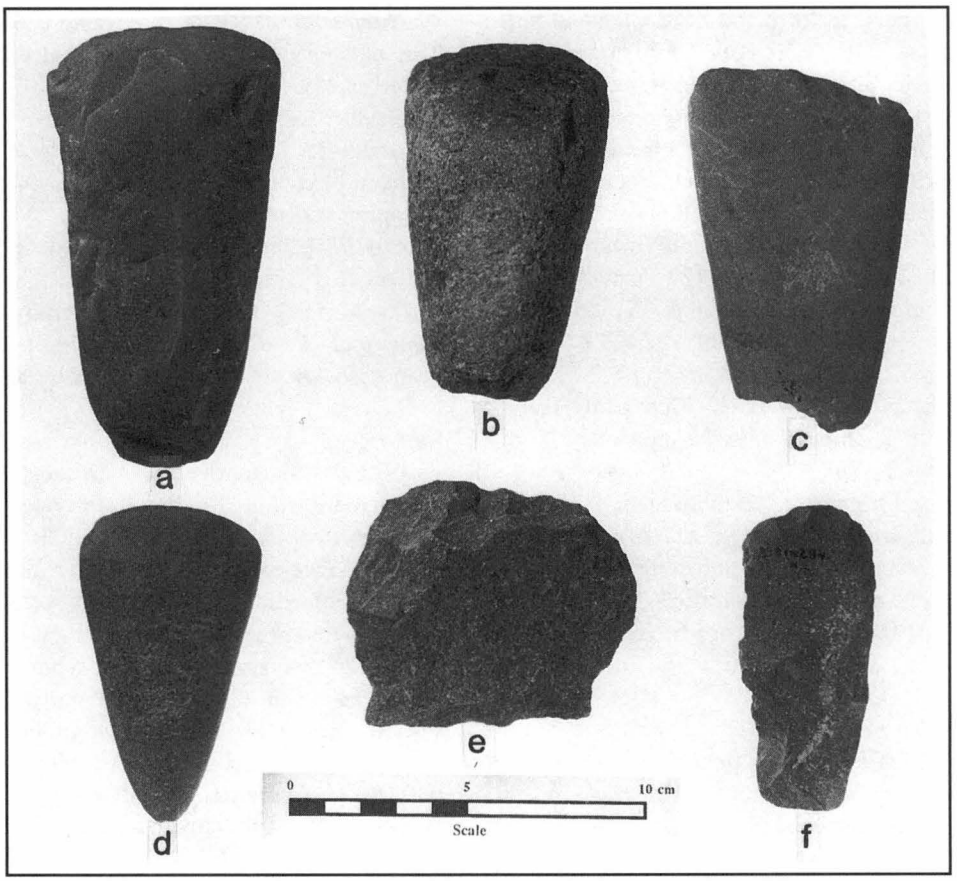

Figure 4.20. Celts and large chipped stone tools from the Holt site.

Pièces Esquillées. Sample Size: 2. Form: Both specimens are small flakes that exhibit sharp, straight working edges on opposing ends, produced by a bipolar percussion technique. Material: Vitric tuff–1, Quartz–1. Comment: These are interpreted as slotting or wedging tools (see Chapman 1975; Keeley 1980; MacDonald 1968).

Side Scrapers. Sample Size: 10. Form: These specimens are flakes that exhibit continuous unifacial retouch along one or both lateral margins. Material: Quartz–5, Vitric tuff–4, Felsic tuff–1. Comment: Most of these tools are made on amorphous flakes and exhibit retouch along a single edge. Side scrapers are interpreted as cutting or hide scraping tools.

End Scrapers. Sample Size: 14. Form: These specimens are flakes that exhibit steep, continuous retouch along the distal margin. Material: Quartz–6, Vitric tuff–4, Felsic tuff–3, Jasper–1. Comment: End scrapers are interpreted as hide scraping tools.

Spokeshave. Sample Size: 1. Form: This specimen is a heavily patinated decortication flake that exhibits recent (i.e., unpatinated) flake scars, forming a shallow concavity, along one edge. Material: Vitric tuff–1. Comment: Spokeshaves are interpreted as woodworking tools.

Perforators. Sample Size: 5. Form: These specimens are amorphous flakes that have been finely retouched along one edge to produce a pointed tool bit. Material: Quartz–3, Vitric tuff–1, Granite–1. Comment: Morphological characteristics of these tools suggest that they were used to cut or punch holes, and are interpreted as probable hideworking tools.

Gravers. Sample Size: 9. Form: These specimens are amorphous flakes that possess fine retouch along the margin, producing a small, sharp, triangular projection. Material: Felsic tuff–6, Quartz–2, Vitric tuff–1. Comment: Morphological characteristics of gravers indicate that they may have been used for engraving or scoring dense materials such as soft stone, bone, or antler.

Utilized and Retouched Flakes. Sample Size: 150. Form: This category includes flakes that exhibit marginal retouch (n=81) or edge damage (n=69) presumably resulting from use. Material: Quartz–76, Vitric tuff–33, Felsic tuff–25, Other metavolcanic rock–4, Chalcedony–1, Not classified–11. Comment: These specimens are interpreted as *ad hoc* cutting implements.

Ground Stone Artifacts

Ground Celts (Figure 4.20*a–d*). Sample Size: 4. Form: These specimens are large, heavily ground tools

that are sub-triangular in form and have a tapered poll end. Two of these artifacts are completely ground with polished, bi-convex bits. A third artifact is completely ground but has a plano-convex working edge resulting from re-sharpening. The fourth artifact has a polished, bi-convex working edge but shows evidence of chipping along the lateral margins and poll end. Summary size measurements are as follows: length (mean=103.0 mm, sd=12.3 mm, range=88–122 mm), width (mean=58.8 mm, sd=5.6 mm, range=51–65 mm), and thickness (mean=22.8 mm, sd=6.8 mm, range=16–34 mm). Material: Vitric tuff–2, Felsic tuff–1, Other metavolcanic rock–1. Comment: These tools, along with a chipped chisel, apparently were cached in Feature 3.

Ground Stone Fragments. Sample Size: 4. Form: These specimens are small fragments of stone that show evidence of grinding or polishing. Material: Other metavolcanic rock–3, Unidentified–1. Comment: Most of these artifacts probably are broken pieces of ground stone celts.

Large Cobble Tools

Cobble Choppers (Figure 4.20*e*). Sample Size: 5. Form: This category includes both cobbles (n=2) and tabular pieces of raw material (n=3) that exhibit rough flaking along one or more edges. Material: Quartz–3, Other metavolcanic rock–2. Comment: These artifacts are interpreted as heavy butchering implements.

Hammerstones/Manos. Sample Size: 6. Form: This category includes cobbles that exhibit crushing, battering, or abrasion along one or more edges. Material: Other metavolcanic rock–4, Quartz–1, Quartzite–1. Comment: These artifacts are interpreted as hand-held hammers or percussors used for flintknapping and other tasks.

Anvil/Milling Stone. Sample Size: 1. Form: This artifact is a tabular slab that shows signs of abrasion and wear along one surface. Material: Other metavolcanic rock–1. Comment: This implement may have been used for processing plant materials.

Summary

With few exceptions, most artifacts discussed above cannot be attributed with certainty to the Haw River phase occupation of the Holt site. However, given the predominance of small triangular points within the overall projectile point sample, it seems reasonable to conclude that at least half of the total lithic sample is a product of this occupation. The types of lithic artifacts recovered from the Holt site indicate a variety of activities involving stone tools, ranging from cutting tasks employing *ad hoc* flake tools to working wood with heavily curated ground stone axes and chipped chisels. Most other maintenance tasks expected at a residential site, such as weapon repair, hideworking, and non-lithic tool manufacture, are well represented in the stone tool sample.

Clay Artifacts

Three aboriginal clay pipe fragments were recovered from the Holt site. Two of these specimens, from the plowzone and Feature 2, are pieces of thick stemmed (21 mm to 23 mm in diameter), feldspar tempered pipes. The third specimen is a bowl section of a pipe that is triangular in cross-section and has only a slight curvature from the stem to the bowl. This pipe appears to be stylistically identical to one found at the Webster site.

Bone Artifacts

Ten bone artifacts were recovered from the Holt site and include: two bone-splinter awls from Feature 2 (Figure 4.21, middle row, right side), a broken deer ulna awl from Feature 2 (Figure 4.21, middle row, second from left), a probable deer-ulna awl tip from Feature 4 (Figure 4.21, bottom right), a turkey tarsometatarsus awl from Feature 4 (Figure 4.21, middle row, left), three grooved-and-snapped antler tine fragments from Features 4 and 6 (Figure 4.21, bottom row), a probable bone pin fragment from Feature 2, and a polished long-bone fragment from Feature 3 (Figure 4.21, top).

Historic Artifacts

Numerous artifacts of Euroamerican manufacture were recovered at the Holt site; however, none are related to the site's aboriginal occupation. Instead, they are associated with the Holt house, a nineteenth century structure located immediately adjacent to the site. All historic artifacts were recovered from either the surface, plowzone, or while cleaning the tops of features prior to excavation, and include: 207 potsherds, 99 glass fragments, 86 unidentifiable metal fragments, 79 brick fragments, 53 cinders, six iron nails, two molded earthenware pipe fragments, one small medicine bottle, one marble, and one brass button.

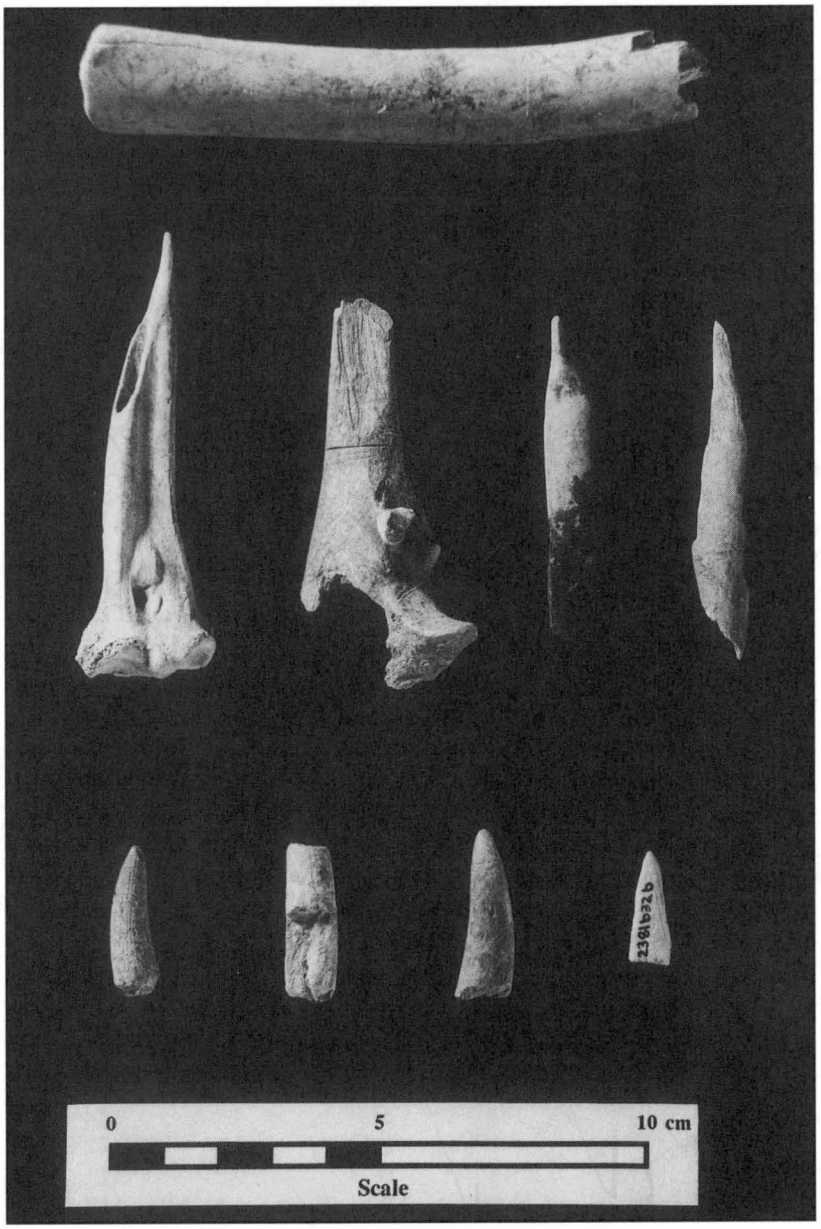

Figure 4.21. Bone artifacts from the Holt site.

Faunal Remains

by

Mary Ann Holm

A total of 3,701 animal bone fragments was recovered from Features 2, 3, 4, and 6 at the Holt site (Table 4.4). Faunal remains from Feature 1 were not analyzed. Almost half (n=1,830) of the sample came from Feature 2. Approximately 34% of the fragments could be identified beyond the level of class and represent a minimum of 51 individuals belonging to at least 20 species. About 39% of these individuals are mammals, 10% are birds, 8% are reptiles, 22% are amphibians, and 22% are fish.

Mammals

White-tailed deer (MNI=7) is the most numerous mammalian species represented in the faunal sample. The only other taxa represented by more than a single individual are gray squirrel (MNI=2) and members of the family Cricetidae (mice and rats, MNI=3). Rabbit, fox squirrel, white-footed mouse, black bear, raccoon, long-tailed weasel, and striped skunk are each represented by a single individual.

Table 4.4. Faunal remains from the Holt site.

Species	Count N	Count %	Weight Grams	Weight %	MNI N	MNI %
Mammals						
Unidentified	1215	32.83	910.70	29.40	-	-
Sylvilagus sp., Rabbit	3	0.08	0.90	0.03	1	1.96
Sciurus sp., Squirrel	32	0.86	4.23	0.14	1	1.96
Sciurus carolinensis, Gray Squirrel	6	0.16	3.60	0.12	2	3.92
Sciurus niger, Fox Squirrel	2	0.05	0.74	0.02	1	1.96
Cricetidae, Mice & Rats	33	0.89	0.39	0.01	3	5.88
Peromycus leucopus, White-footed Mouse	2	0.05	0.05	<0.01	1	1.96
Ursus americanus, Black Bear	1	0.03	1.40	0.05	1	1.96
Procyon lotor, Raccoon	15	0.41	16.27	0.53	1	1.96
Mustela frenata, Long-tailed Weasel	1	0.03	0.40	0.01	1	1.96
Mephitis mephitis, Striped Skunk	7	0.19	0.60	0.02	1	1.96
Artiodactyla, Even-toed Ungulates	8	0.22	3.05	0.10	-	-
Odocoileus virginianus, White-tailed Deer	176	4.76	1428.55	46.11	7	13.73
Sub-Total	1501	40.56	2370.88	76.53	20	39.22
Birds						
Unidentified	265	7.16	135.43	4.37	-	-
Ectopistes migratorius, Passenger Pigeon	8	0.22	1.00	0.03	2	3.92
Meleagris gallapavo, Turkey	24	0.65	95.27	3.08	3	5.88
Sub-Total	297	8.02	231.70	7.48	5	9.80
Reptiles						
Turtle, Unidentified	343	9.27	104.45	3.37	-	-
Terrapene carolina, Box Turtle	115	3.11	204.70	6.61	2	3.92
Chelydra serpentina, Snapping Turtle	14	0.38	58.40	1.89	1	1.96
Snake, Unidentified	80	2.16	2.25	0.07	-	-
Colubridae, Non-poisonous Snakes	95	2.57	4.08	0.13	1	1.96
Sub-Total	647	17.48	373.88	12.07	4	7.84
Amphibians						
Rana/Bufo sp., Frog or Toad	194	5.24	4.34	0.14	-	-
Rana sp., Frog	9	0.24	0.70	0.02	2	3.92
Bufo sp., Toad	13	0.35	0.31	0.01	8	15.69
Scaphiopus holbrooki, Spadefoot Toad	1	0.03	0.01	<0.01	1	1.96
Sub-Total	217	5.86	5.36	0.17	11	21.57
Fish						
Unidentified	339	9.16	6.77	0.22	-	-
Lepisosteus sp., Gar	4	0.11	0.17	0.01	1	1.96
Ictalurus sp., Catfish	6	0.16	0.33	0.01	6	11.76
Catastomus sp., Suckers	52	1.41	1.33	0.04	2	3.92
Centrarchidae, Sunfish	1	0.03	0.02	<0.01	1	1.96
Lepomis sp., Sunfish	2	0.05	0.02	<0.01	1	1.96
Sub-Total	404	10.92	8.64	0.28	11	21.57
Unidentified	635	17.16	107.60	3.47	-	-
Total	3701	100.00	3098.06	100.00	51	100.00

Birds

Of the 297 fragments of bird bones recovered, only 32 (11%) could be identified. The fragments represent passenger pigeon (MNI=2) and turkey (MNI=3).

Reptiles and Amphibians

Reptiles and amphibians make up 30% of the individuals identified from the Holt site. Reptiles include box turtle (MNI =2), snapping turtle

(MNI=1), and a single non-poisonous snake. Amphibians represented in the faunal sample include spadefoot toad (MNI=1), unidentified toad (MNI=8), and unidentified frog (MNI=1). Ninety percent of the fragments and 91% of the individuals identified as amphibians came from Feature 2. The large number of small animals (10 amphibians and three mice) recovered from this feature may represent animals that became trapped in the pit before it was filled with refuse.

Fish

Gar (MNI=1), catfish (MNI=1), suckers (MNI=2), and sunfish (MNI=2) comprise 22% of the individuals identified from the Holt site faunal sample.

Modified Bone

More than 30% of the bone fragments recovered from the Holt site are burned. Twelve deer bone fragments and one turkey long bone also display evidence of canine gnawing, and one unidentified mammal fragment appears to have been gnawed by a rodent. The majority of modified bone came from Feature 2. In addition, two distal ends of deer humeri, two antler fragments, one bear canine, and four fragments of unidentified mammal long bones displayed cut marks, possibly from butchering.

Shell

Small quantities of freshwater mussel shell, probably from species living in Alamance Creek, were recovered from Features 1, 2, 3, and 4. These specimens have not been analyzed.

Summary

The faunal sample from the Holt site represents a diverse range of species that were exploited by the site's inhabitants as well as several other animals (e.g., mice, rats, toads, etc.) that probably also lived at the site. Based upon both the number of bones recovered and the minimum number of individuals represented, white-tailed deer was the predominant meat source, though various other large and small mammals also were taken for meat or for skins and pelts. Although the Holt site is located in an upland setting, the faunal sample further indicates that fish and other aquatic species probably were being taken from nearby Alamance Creek.

Botanical Remains

by
Kristen J. Gremillion

Carbonized plant remains from the Holt site were recovered from 15 flotation samples comprising 150 liters of feature fill (Tables 4.5, 4.6, and 4.7). Two 10-liter flotation samples from the earlier excavation of Feature 1 also were analyzed. Other plant remains from waterscreened feature fill were not analyzed. A total of 220.05 grams of wood charcoal, seeds, nutshell, and other charred plant remains was recovered from all features.

Nutshell

Hickory nutshell is the most abundant of nutshell types by weight at the Holt site; however, acorn shell, comprising 19.3% of plant food remains, also is well represented. Considering the greater meat-to-shell ratio of acorn, acorn probably is better represented than hickory in terms of edible portions. Acorn meat also was present in two features. Walnut shell is abundant compared to the historic Fredricks site samples and was found in 86.7% of all 10-liter flotation samples. In general, these three nut types seem to be more equitably represented at Holt than they are at Fredricks.

Cultigens

A fragment of pepo squash rind was recovered from the Holt site, while larger quantities of common bean and maize also were found. Common bean was recovered from three features. Maize is poorly represented by weight (3.2% of plant food remains) but occurred in every flotation sample. Additionally, maize kernels make up an unusually large percentage of identified seeds.

Two sunflower seeds of cultigen size were recovered from Feature 2. Using size conversion factors suggested by Yarnell (1978), their dimensions of 7.6 mm x 5.2 mm and 4.6 mm x 3.8 mm yield estimated uncarbonized achene dimensions of 9.9 mm x 7.5 mm and 6.0 mm x 5.5 mm, respectively. Other grains present at the Holt site that have been documented as cultigens elsewhere in the East include chenopod, maygrass, knotweed, and little barley (all represented by only one seed or caryopsis each). Maygrass and little barley, which ripen in late spring and early summer, were both found at the Mitchum site during the 1983 excavations (Gremillion 1987). At that site, large numbers of maygrass caryopses indicated harvesting and possible cultivation.

Seeds

Five types of fleshy fruit seeds, including persimmon, black gum, sumac, bramble, and hawthorn, are represented in the Holt site botanical sample; however, none are abundant.

Table 4.5. Carbonized plant remains from the Holt site (weight in grams).

Context	Soil Volume (liters)	Wood Charcoal	Unknown Plant	Tuber	Plant Food Remains	Total
Feature 1						
Zone 1	10	14.32	2.24	-	2.05	18.61
Zone 2	10	9.85	1.34	-	1.50	12.69
Sub-total	20	24.17	3.58	-	3.55	31.30
Feature 2						
Zone 1	40	71.28	3.02	0.01	22.96	97.27
Zone 1a	10	11.59	0.56	-	5.59	17.74
Sub-total	50	82.87	3.58	0.01	28.55	115.01
Feature 3						
Zone 2	20	14.24	1.23	-	4.54	20.01
Zone 3	20	11.30	0.38	-	1.20	12.88
Sub-total	40	25.54	1.61	-	5.74	32.89
Feature 4						
Zone 1	20	23.24	0.61	-	1.10	24.95
Feature 5						
Zone 1	10	2.58	0.13	-	0.74	3.45
Feature 6						
Zone 1	10	10.73	0.08	-	1.62	12.43
Total	150	169.13	9.59	0.01	41.30	220.03

Table 4.6. Plant food remains from the Holt site (weight in grams).

Context	Hickory Shell	Acorn Shell	Acorn Meat	Walnut Shell	*Cucurbita* Rind	Maize Kernels	Maize Cupules	Common Bean	Seeds	Total
Feature 1										
Zone 1	1.15	0.54	0.00	0.02	-	0.11	0.02	0.01	0.20	2.05
Zone 2	0.77	0.13	0.48	0.00	-	0.08	0.02	0.00	0.02	1.50
Sub-total	1.92	0.67	0.48	0.02	-	0.19	0.04	0.01	0.22	3.55
Feature 2										
Zone 1	15.99	3.27	-	2.70	-	0.30	0.58	0.06	0.06	22.96
Zone 1a	4.33	0.73	-	0.48	<0.005	0.02	0.02	-	0.01	5.59
Sub-total	20.32	4.00	-	3.18	<0.005	0.32	0.60	0.06	0.07	28.55
Feature 3										
Zone 2	0.86	2.21	1.00	0.45	-	<0.005	0.02	-	<0.005	4.54
Zone 3	0.19	0.63	-	0.27	-	0.04	0.03	0.04	<0.005	1.20
Sub-total	1.05	2.84	1.00	0.72	-	0.04	0.05	0.04	<0.005	5.74
Feature 4										
Zone 1	0.38	0.41	-	0.22	-	0.03	0.02	-	0.04	1.10
Feature 5										
Zone 1	0.67	0.03	-	-	-	0.03	0.01	-	-	0.74
Feature 6										
Zone 1	1.31	0.03	-	0.27	-	0.01	<0.005	-	<0.005	1.62
Total	25.65	7.98	1.48	4.41	<0.005	0.62	0.72	0.11	0.33	41.30

Table 4.7. Seed and fruit counts from the Holt site.

Sample	Chenopod	Maygrass	Knotweed	Little Barley	Persimmon	Black Gum	Sumac	Bramble	Hawthorn	Bedstraw
Feature 1										
Zone 1	2	1	-	-	2	-	-	-	-	-
Zone 2	3	-	1	-	-	-	1	-	-	1
Sub-total	5	1	1	-	2	-	1	-	-	1
Feature 2										
Zone 1	21	-	-	-	-	-	-	1	-	-
Zone 1a	2	-	-	-	-	-	-	-	1	-
Sub-total	23	-	-	-	-	-	-	1	1	-
Feature 3										
Zone 2	2	-	-	-	-	-	1	-	-	-
Zone 3	2	-	-	1	-	-	-	-	-	-
Sub-total	4	-	-	1	-	-	1	-	-	-
Feature 4										
Zone 1	-	-	-	-	1	1	-	1	-	-
Feature 5										
Zone 1	-	-	-	-	-	-	-	-	-	-
Feature 6										
Zone 1	-	-	-	-	-	-	-	-	-	-
Total	32	1	1	1	3	1	2	2	1	1

Table 4.7 Continued.

Sample	Sunflower	Common Bean	Maize Kernels	Poaceae	Rosaceae ?	Solanaceae	Fabaceae	Unknown	Total
Feature 1									
Zone 1	-	1	3	-	-	-	1	7	17
Zone 2	-	-	2	-	-	-	-	4	12
Sub-total	-	1	5	-	-	-	1	11	29
Feature 2									
Zone 1	2	3	10	-	-	2	8	10	57
Zone 1a	-	-	1	-	-	-	-	1	5
Sub-total	2	3	11	-	-	2	8	11	62
Feature 3									
Zone 2	-	-	2	-	1	-	-	1	7
Zone 3	-	2	4	-	-	-	-	-	9
Sub-total	-	2	6	-	1	-	-	1	16
Feature 4									
Zone 1	-	-	2	-	-	-	-	1	6
Feature 5									
Zone 1	-	-	1	-	-	-	-	-	1
Feature 6									
Zone 1	-	-	2	1	-	-	-	-	3
Total	2	6	27	1	1	2	9	24	117

Summary

The discovery of intact pit features at the Holt site came as somewhat of a surprise. This was because upland environments in the Piedmont traditionally have been seen as the loci of temporary Archaic period encampments. During Late Prehistoric times, these upland areas may have continued to be exploited on a temporary, seasonal basis, but the camps of these later groups were usually masked by the more intense Archaic occupations (Coe 1964; House and Wogaman 1978; Goodyear et al. 1979; Ward 1983). The Late Prehistoric component at the Holt site was neither temporary nor masked. The large number of potsherds, the variety of lithic tools, extensive evidence of cultigens such as maize, beans, squash, and sunflower, and the arduously prepared storage facilities provide ample evidence of a permanent or semi-permanent habitation site.

The Holt site has played a significant role in the definition of the late prehistoric Haw River phase. Unlike other Haw River sites such as Guthrie, Webster, Mitchum, and Hogue, the Holt site provided a comparatively rich assemblage of artifacts and subsistence remains. Furthermore, it contained a single post-Archaic cultural component and thus lacked the mixture of unrelated pottery types often found on multi-component piedmont sites. For this reason, the Holt pottery sample was used to define the ceramic series (i.e., Haw River series) associated with the Haw River phase.

The overall population at the Holt site was no doubt small, probably no larger than that of preceding Archaic groups. However, it does not appear to be out of line with populations postulated for other Haw River phase settlements in the Haw and Eno river drainages. Although overall population sizes may be comparable among these sites, Holt apparently represents a more compact community than most other Haw River phase settlements. At the Guthrie site a little over a half acre was systematically auger tested, and evidence of only seven subsurface pits was found. Similarly, features containing early Haw River phase materials at the Hogue site near Hillsborough and at the Webster site are few in number and widely scattered. The compactness of the Holt settlement might be regarded as a late Haw River phase phenomenon, since this site is thought to have been occupied during the early fifteenth century at the end of the phase; however, it also may simply reflect variability inherent in the overall Haw River settlement system. Clearly, more research is needed at additional Haw River sites before we will be able to address this problem.

Of the Haw River phase sites investigated by the Siouan project, only the Mitchum site appears to vary from the typical settlement pattern of small or dispersed communities scattered throughout the Haw River and Eno River drainages. Here, a thin midden and a relatively dense concentration of widely scattered artifacts suggest a larger and more long-term settlement. But even at Mitchum, the Haw River phase occupation indicates a population size and concentration that does not compare with the much larger, contemporary Dan River phase villages along the Dan and its tributaries in North Carolina and Virginia (Davis and Ward 1989).

Chapter 5

The Holt #2 Site

The Holt #2 site (RLA-Am172; 31Am171) is located in central Alamance County, North Carolina, on a small, isolated expanse of bottomland on the south side of Moccasin Branch at its confluence with Stinking Quarter Creek (Figure 5.1). The site is about 0.3 miles southwest of Stinking Quarter Creek's junction with Big Alamance Creek. When the Holt #2 site (formerly designated RLA-Am166) was initially surveyed and surface collected in 1985, it produced a small but varied sample of artifacts including a few late prehistoric pottery sherds that appeared to have been recently plowed out of a subsurface feature (Simpkins and Petherick 1985). A fragment of a gunflint also was recovered. Surface artifacts were concentrated in an oval area measuring 200 ft by 100 ft near the back edge of the floodplain and at the base of a steep ridge slope to the south. The small size of the floodplain (about five acres in extent), its protected location, and the presence of a gunflint suggested that the Holt #2 site might represent a small historic component, perhaps an early eighteenth-century Indian homestead.

During April 1987, an area of 12,500 sq ft covering most of the recorded site area was auger tested. Sampling consisted of approximately 2,200 auger bores placed at 2.5-ft intervals. This work located three possible pit features as well as two areas of possible buried midden. In order to investigate the auger findings, four widely dispersed 10-ft by 10-ft squares were excavated (Figures 5.2). Two units were positioned along the southern edge of the site to investigate the possible midden deposit, while the other two excavation units were placed near the middle and in the northwest corner of the field to explore the possibility of buried features. Unfortunately, the "midden," which extended over most of the field, turned out to be colluvium that had eroded from the north slope of the ridge. One of the suspected pit features represented a mottled area in the colluvium, whereas the other two features were disturbances that resulted from tree-falls.

Stratigraphy

Holt #2 site stratigraphy consisted of about 1.0 ft of light brown silt loam plowed soil that overlay a darker brown colluvial deposit washed over the site from the adjacent ridges (Figure 5.3). This latter soil zone averaged about 0.3 ft in thickness and appeared to extend over the entire site. It rested upon a yellow sandy subsoil. The plowzone and the colluvium contained a few small pottery sherds and flakes; the subsoil was sterile.

Features

Except for two tree disturbances (designated Features 1 and 2), no features were recorded (Table 5.1). The excavations were designed primarily to investigate the nature of the dark brown, sub-plowzone layer that contained a light scattering of artifacts. Testing indicated that this stratum was not cultural in origin but rather colluvium washed in from the flanks of a ridge bordering the south side of the site.

Postholes

Each of the squares at the Holt #2 site contained two or three small circular disturbances that were interpreted as postholes. The larger of these may be postholes, but the smaller disturbances are no doubt the result of root action. Regardless, the sparse and dispersed nature of the possible postholes, in conjunction with the other excavation results, indicate a very short-term and small occupation.

Pottery

Ninety-two aboriginal potsherds were recovered from test excavations at the Holt #2 site (Table 5.2). Although a majority came from the plowzone, 31 sherds were recovered from Zone 2 (i.e., colluvium) and two came from Feature 2 fill. Most sherds are heavily eroded and therefore cannot be classified as to surface treatment type. All identifiable sherds were classified into the Haw River series and are associated with the Late Prehistoric Haw River phase (A.D. 1000–1400).

Figure 5.1. Map of the Holt #2 site showing areas of auger testing and excavation.

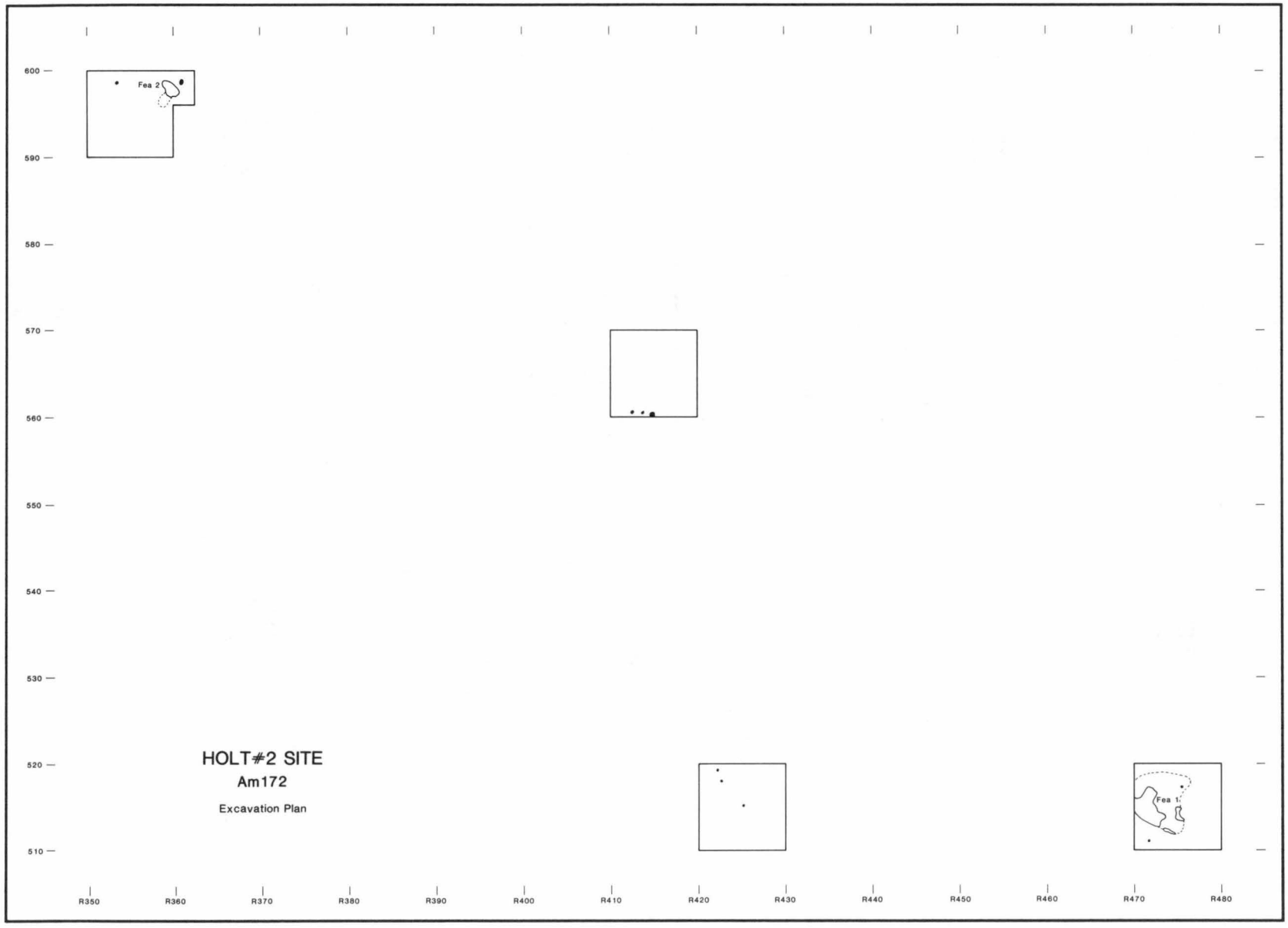

Figure 5.2. Excavation plan at the Holt #2 site.

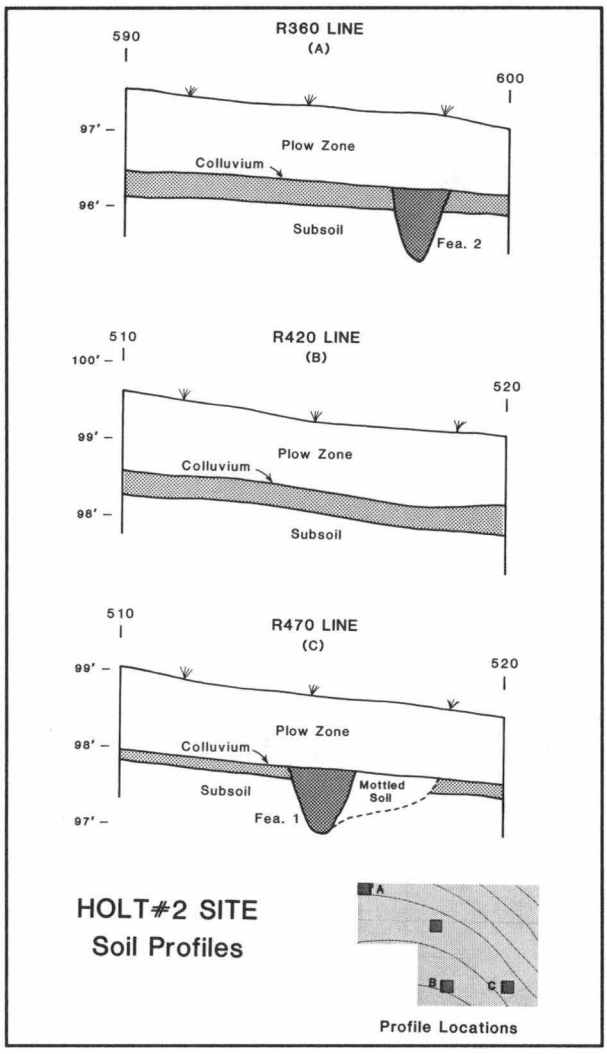

Figure 5.3. Stratigraphic profiles.

Haw River Net Impressed

Fifteen *Haw River Net Impressed* sherds were recovered. Thirteen came from the plowzone; the other two were from Zone 2. These sherds are tempered with either crushed feldspar, medium-to-fine crushed quartz, or coarse sand. Most are 6 mm to 8 mm thick and have scraped interior surfaces. The two rimsherds in the sample are undecorated with everted profiles and rounded lips.

Haw River Plain

Three *Haw River Plain* body sherds were recovered from the plowzone. All are relatively thick (6–8 mm), have smoothed interiors, and are tempered with either medium crushed quartz or coarse sand.

Indeterminate Sherds

The majority (n=74) of the sherds recovered from the Holt #2 site had exterior surfaces that were too eroded to be identified. As with the plain and net impressed sherds from the site, these sherds are variously tempered with crushed feldspar, crushed quartz, or coarse sand.

Summary

The ceramic sample from the Holt #2 site, while too small to be meaningfully compared with samples from other sites investigated within the Haw drainage, is attributed to a Haw River phase occupation at the site. Similar pottery also was found at other Haw River phase sites investigated during the Siouan project, including both the Holt and Webster sites. The small number of sherds recovered suggests only a minimal level of cultural activity at the Holt #2 site.

Table 5.1. Summary of features identified at the Holt #2 site.

Feature No.	Type	Center Location	Dimensions (ft) L	W	D	Phase Association	Comment
Fea. 1	Tree Disturbance	515.8R473.5	7.3	6.7	1.0	—	Excavated
Fea. 2	Tree Disturbance	597.8R599.6	2.4	1.3	0.8	—	Excavated

Table 5.2. Distribution of pottery from the Holt #2 site.

	Haw River			
Context	Net Impressed	Plain	Indeterminate	Total
Plowzone	13	3	43	59
Zone 2	2	-	29	31
Fea. 2	-	-	2	2
Total	15	3	74	92

Table 5.3. Distribution of lithic artifacts from the Holt #2 site.

Category	PZ	Context Old Humus	Fea. 1	Fea. 2	Surface	Total
Debitage						
Decortication Flakes	4	-	-	-	-	4
Interior/Bif. Thin. Flakes	23	8	3	1	-	35
Cores	3	-	-	-	-	3
Projectile Points						
Small Triangular Points	2	1	-	-	1	4
Other Chipped Stone Artifacts						
Biface	1	1	-	-	-	2
Utilized/Retouched Flakes	12	1	1	-	-	14
Total	45	11	4	1	1	62

Lithic Artifacts

Sixty-two chipped stone artifacts were recovered from the Holt #2 site (Table 5.3). Two-thirds of these specimens, including decortication flakes, interior/bifacial thinning flakes, and cores, represent debitage or manufacturing waste. The remainder of the sample, made up of utilized and retouched flakes, bifaces, and triangular projectile points, represent chipped stone tools. Major categories of lithic artifacts are described below.

Debitage

Decortication Flakes. Sample Size: 4. Form: All are secondary decortication flakes. These specimens exhibit a striking platform and bulb of percussion on the ventral surface, and have less than 75% of cortex remaining on the dorsal surface. Material: Vitric tuff–4. Comment: These specimens represent an initial stage in chipped stone tool manufacture.

Interior/Bifacial Thinning Flakes. Sample Size: 35. Form: Interior flakes are flat flakes that have no remaining cortex, have flake removal scars on the dorsal surface, and lack a steep platform angle. Bifacial thinning flakes are similar to interior flakes but possess a steep platform angle that evidences detachment from a biface. Material: Quartz–18, Vitric tuff–7, Fine-grained basalt–6, Other metavolcanic rock–2, Felsic tuff–1, Rhyolite–1. Comment: These flakes represent intermediate and final stages of bifacial tool manufacture.

Cores. Sample Size: 3. Form: These specimens are amorphous masses of lithic raw material from which flakes have been deliberately removed. Material: Quartz–2, Felsic tuff–1. Comment: All three cores reflect random flake removal.

Projectile Points

Small Triangular Projectile Points. Sample Size: 4. Form: All four specimens represent flakes that were bifacially worked into a triangular shape. Two have excurvate sides and a straight base; one has excurvate sides and an incurvate base; and one has incurvate sides and an incurvate base. Material: Felsic tuff–1, Vitric tuff–1, Other metavolcanic rock–1, Quartz–1. Comment: These projectile points are similar in size and form to points recovered from Late Prehistoric and Historic period sites elsewhere in the region and conform to the *Caraway Triangular* type (Coe 1964:49).

Other Chipped Stone Artifacts

Bifaces. Sample Size: 2. Form: Bifaces are lithic blanks that exhibit flake scars on both surfaces, removed by either percussion or pressure flaking. Material: Quartz–1, Vitric tuff–1. Comment: Both specimens are small bifaces that appear to represent an early stage in the process of manufacturing small triangular projectile points.

Utilized and Retouched Flakes. Sample Size: 14. Form: These specimens are flakes that exhibit edge damage (utilized) or flake removal scars (retouched) along one or more edges. Material: Quartz–9, Vitric tuff–3, Felsic tuff–1, Unidentified–1. Comment: One large, utilized flake is patinated and apparently represents an Archaic tool; the remainder probably are associated with the Haw River phase component. These artifacts are interpreted as *ad hoc* cutting tools.

Summary

With the exception of one Archaic utilized flake, most of the lithic artifacts from the Holt #2 site probably are associated with a Late Prehistoric Haw River phase occupation at the site. As with the pottery, the low frequency of lithic artifacts indicates only minor cultural activity at this site.

Historic Artifacts

Three Euroamerican artifacts were recovered from plowzone excavations at the Holt #2 site. Two of these artifacts are unidentifiable iron fragments; the third is a flattened piece of lead shot. A gunflint fragment also was found when the site was initially surveyed.

Summary

The Holt #2 site produced very little in terms of artifacts or subsurface feature information. The ceramic sample, primarily from the surface and plowzone, indicates a small Haw River phase component rather than the Contact period occupation originally suspected. What the Holt #2 site investigation does do is reinforce the picture of Haw River phase settlements as small, scattered, hamlet-like communities comprised of loose aggregates of households.

Chapter 6

The George Rogers Site

The George Rogers site (RLA-Am236; 31Am220) is located in central Alamance County, North Carolina, on an elevated alluvial terrace along the north side of Big Alamance Creek, 1.1 mi below the mouth of Stinking Quarter Creek (Figure 6.1). The site, elevated about 25 ft above the creek, is well out of the active floodplain and is positioned approximately 250 ft back from the creek channel. Although potsherds and stone artifacts are widely scattered across the site surface over a six-acre area, they are more concentrated in the eastern third of the area of scatter, across the top and northern flank of a low rise. This area was investigated during the 1987 field season.

The site was discovered by an archaeological survey crew from the Research Laboratories of Anthropology during the summer of 1986. At that time, fragments of animal bone and freshwater mussel shell were observed on the surface within the artifact concentration. A 20-ft by 30-ft section was subsequently auger tested at 2.5-ft intervals. Five of the auger tests were positive. The plowzone was then removed from a 10-ft by 10-ft square in the area of the positive tests. At the base of the plowzone, two large pit features (designated Features 1 and 2) were mapped and one (Feature 1) was excavated (McManus and Long 1986:71–81).

Feature 1 was clearly defined at the base of plowzone and contained a rich deposit of well-preserved artifacts and subsistence remains. The analysis of artifacts from this large shallow basin indicated a late prehistoric or protohistoric occupation associated with the Hillsboro phase (A.D. 1400–1600). Given the results of this test excavation, the George Rogers site was given high priority when archaeological investigations in the Haw River basin resumed in 1987.

Initially, a large area covering 10,250 sq ft was systematically augered tested at 2.5-ft intervals. Over 20 of these tests were positive. In order to expose the areas of positive auger tests, 10 additional 10-ft by 10-ft squares were excavated. These were placed in areas of the site where the richest features were indicated. Four individual squares were dug across the middle of the site. The remaining six squares, along with the square dug in 1986, comprised two separate excavation blocks of 300 sq ft and 400 sq ft each (not including insets to expose features that extended beyond the square excavations). In all, eight rich pit features were excavated at the George Rogers site (Figures 6.2, 6.3, and 6.4).

Stratigraphy

The stratigraphy at the George Rogers site is simple and straightforward. Being situated on a low rise well away from the floodplain, erosion has been more prevalent than deposition. No midden, old humus, or living floors have been preserved. The only intact deposits remaining are the pits and postholes that intrude the orange clay subsoil. A plowzone, consisting of a dark brown silt loam that averages 0.8 ft in thickness, rests directly on the subsoil (Figure 6.5).

Features

Eight features were excavated at the George Rogers site during the 1986 and 1987 investigations (Table 6.1). All but two are interpreted as cooking or roasting facilities and most contained fill deposits rich in food remains, ash, and charcoal. These facilities are very similar to features found at the Edgar Rogers site and at Contact period sites such as Jenrette, Lower Saratown, and Upper Saratown, and are thought to have been used as "barbeque" pits or earth ovens. The presence of large food preparation facilities at these sites may reflect community-wide activities that celebrated ceremonial occasions. The remaining two pits excavated at the George Rogers site appear to represent storage facilities.

Feature 1

This large, basin-shaped pit, initially sampled in 1986, was located in the block of squares excavated in the north-central area of the site. It measured 8.4 ft by 6.3 ft and was 0.4 deep. The fill consisted of a dark mottled brown soil (Zone 1) that contained pockets of charcoal and ash. A thin layer of fine yellow sand covered the floor of the basin along the southwestern edge. The fill contained a variety of artifacts, including a ceramic spoon, numerous mussel shells and serrated shell scrapers, potsherds, charred nutshells, and animal bones. The size of the feature and the nature of the fill suggest that it was prepared as a cooking or roasting pit.

Figure 6.1. Map of the George Rogers site showing areas of auger testing and excavation.

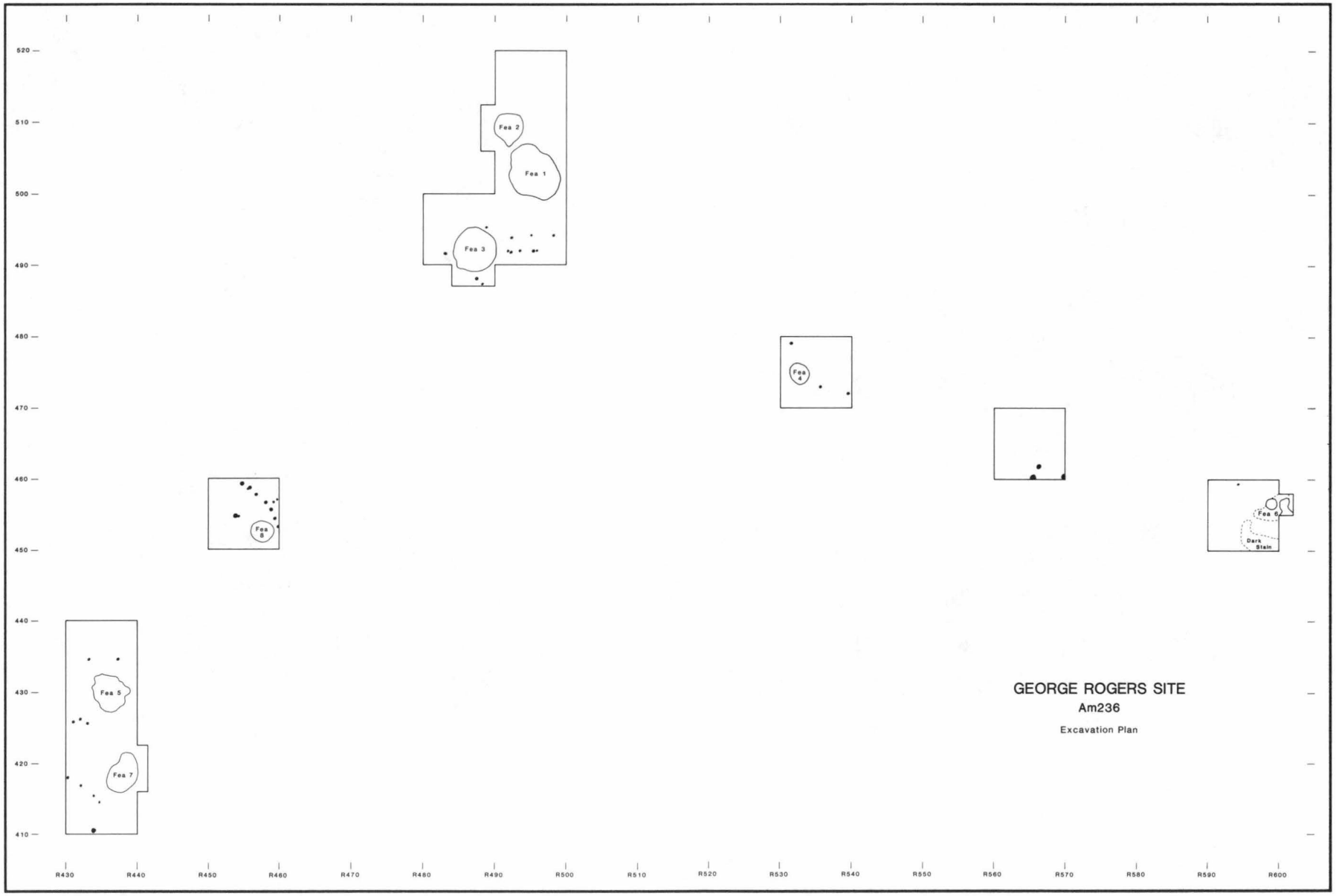

Figure 6.2. Excavation plan at the George Rogers site.

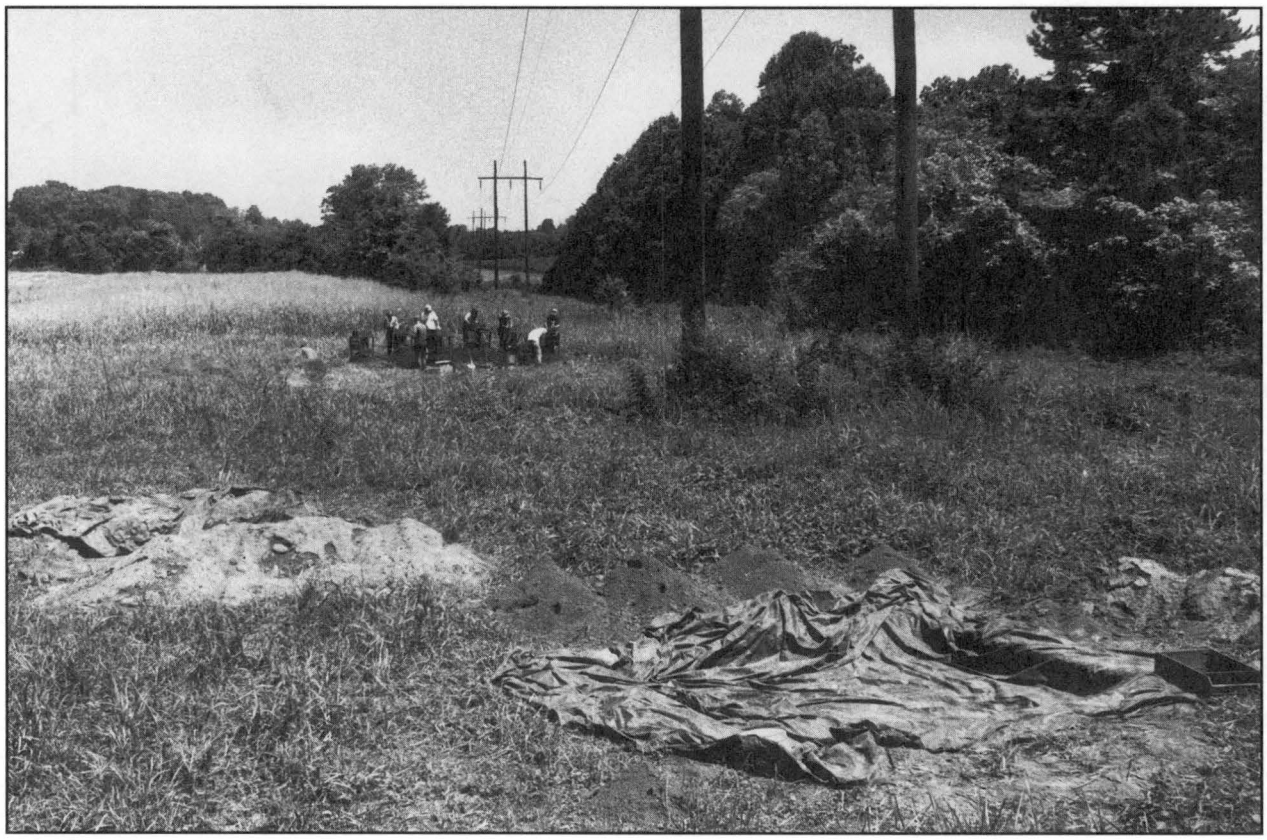

Figure 6.3. General view of the George Rogers site.

Figure 6.4. Excavating and screening plowed soil at the George Rogers site.

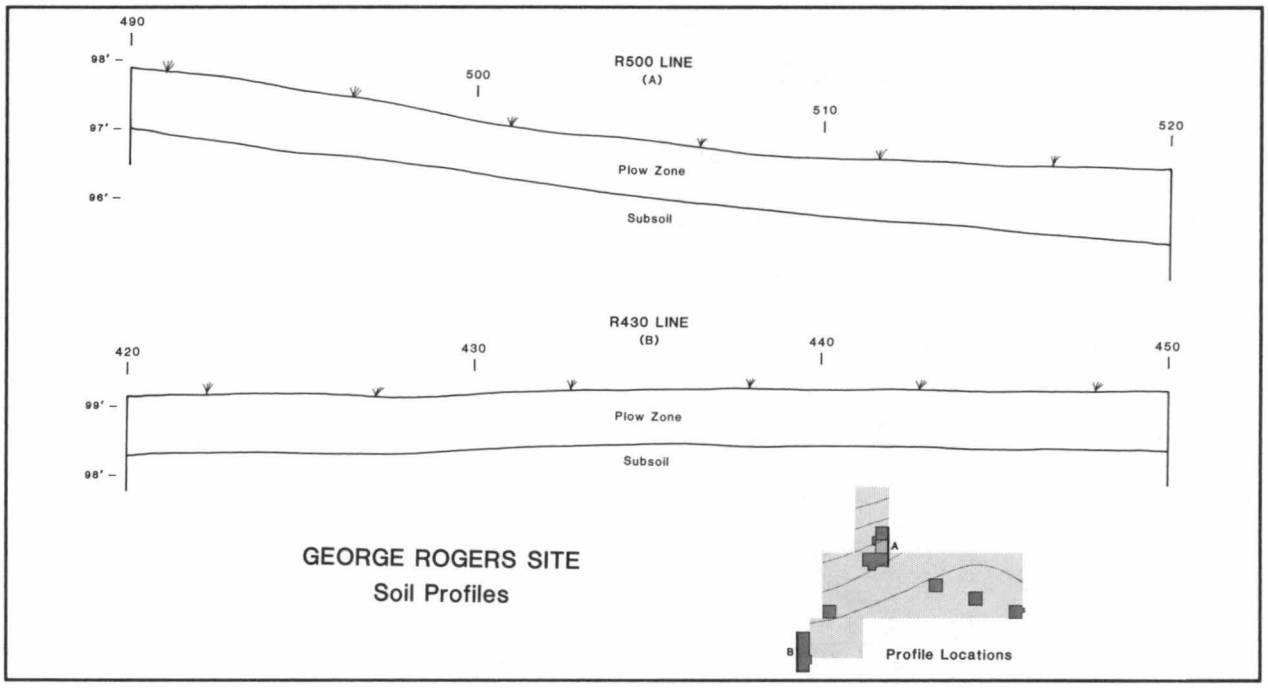

Figure 6.5. Stratigraphic profiles.

Table 6.1. Summary of features identified at the George Rogers site.

Feature No.	Type	Center Location	Dimensions (ft) L	W	D	Phase Association	Comment
Fea. 1	Roasting Facility	503.0R495.5	8.4	6.3	0.4	Hillsboro	Excavated in 1986
Fea. 2	Roasting Facility	509.0R491.9	4.6	3.9	0.7	Hillsboro	Excavated
Fea. 3	Roasting Facility	492.1R487.4	6.0	6.0	0.4	Hillsboro	Excavated
Fea. 4	Storage Pit ?	474.5R532.5	2.8	2.8	0.7	Hillsboro	Excavated
Fea. 5	Roasting Facility	429.8R436.4	5.2	4.7	0.1	Hillsboro	Excavated
Fea. 6	Roasting Facility	456.5R600.0	3.3	2.4	0.2	Hillsboro	Excavated
Fea. 7	Roasting Facility	418.5R438.3	5.9	4.0	1.0	Hillsboro	Excavated
Fea. 8	Storage Pit ?	453.0R457.8	3.6	2.8	1.5	Hillsboro	Excavated

A charcoal sample obtained from Feature 1 fill in 1986 provided a radiocarbon age of 230 $\pm$ 60 years: A.D. 1720 (Beta-20381). Following Stuiver and Becker (1986), this yields a calibrated intercept of A.D. 1656 and a one-sigma range of A.D. 1639 to A.D. 1955. Given the associated Hillsboro phase cultural material, the lack of European trade artifacts, and the high potential for sample contamination within this shallow feature, this age estimate probably is too recent. A second radiocarbon date from Feature 7, which places the George Rogers site within the sixteenth century, is considered to be more reasonable (see below).

Feature 2

Located immediately north of Feature 1 was another large, basin-shaped facility. This feature appeared at the top of the subsoil as an roughly circular area of dark brown loam (10YR 3/3) with ash and charcoal, very similar to the fill in Feature 1 (Figure 6.6). This fill, designated Zone 1, also contained numerous potsherds, animal bones, and mussel shells. Beneath it was a gray ashy layer (Zone 2) that extended to the bottom of the pit where a thin layer of charcoal was encountered. The artifact content of Zone 2 was similar to that of Zone 1. The final zone (Zone 3) consisted of a mottled, dark yellowish brown (10YR 4/6), sandy clay that extended around the sides of the pit but not across the bottom. Zone 3 was devoid of artifacts. When excavated, this basin measured approximately 4.0 ft in diameter and 0.7 ft in depth (Figures 6.7 and 6.8). Feature 2, like Feature 1, apparently was used as a food preparation facility.

Feature 3

This large circular feature was located approximate-

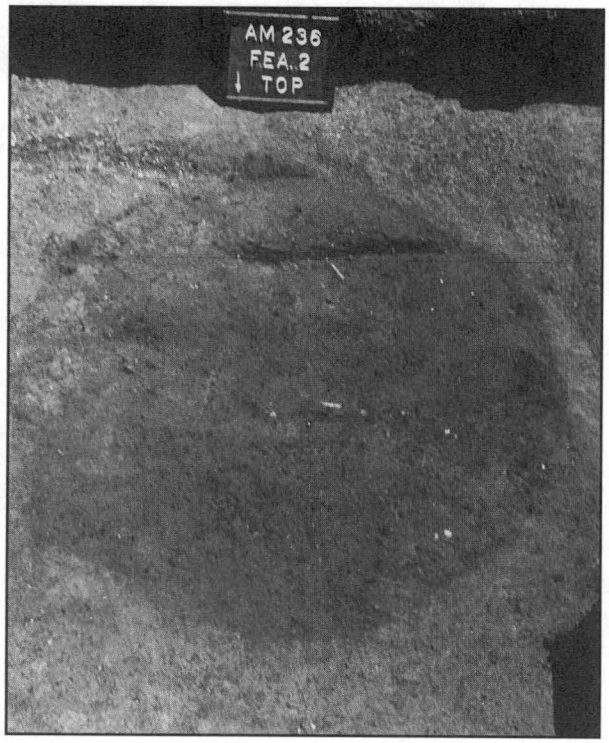

Figure 6.6. Feature 2, before excavation.

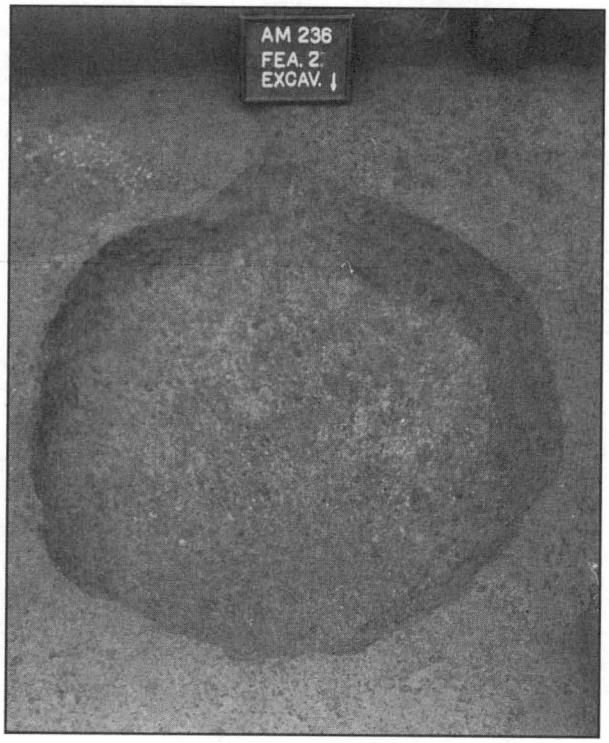

Figure 6.7. Feature 2, excavated.

ly 5 ft southwest of Feature 1 and contained fill (Zone 1) very similar to Features 1 and 2 (Figures 6.9, 6.10, and 6.11). This dark brown loam (10YR 3/3) was rich in artifacts and partially ringed by a thin lens of gray

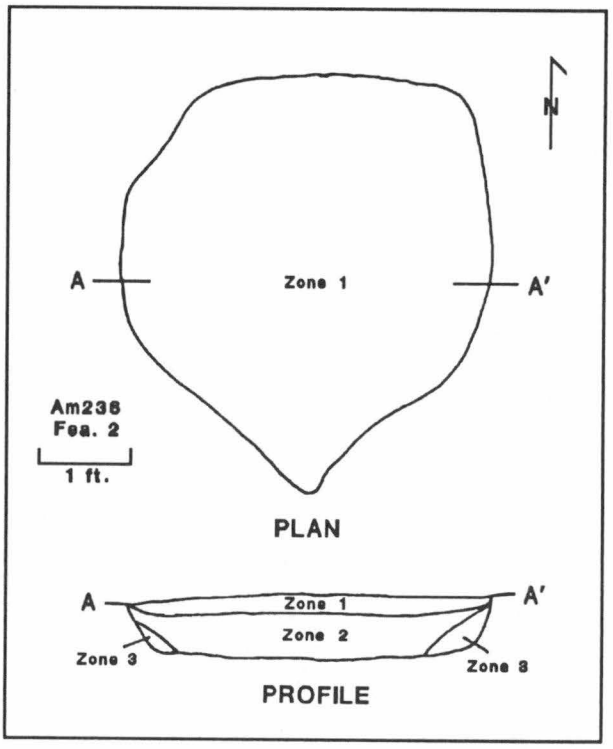

Figure 6.8. Feature 2, plan view and profile drawings.

ash around the eastern edge of the pit. After excavation, Feature 3 measured 6.0 ft in diameter but only 0.4 ft deep at its deepest point. Again, cooking and food preparation are activities most likely to have been associated with this facility.

Feature 4

This relatively small circular pit was located in Sq. 470R540, 30 ft southeast of the central excavation block. At the base of plowzone, it appeared as a stain of mottled dark brown (7.5YR 3/4) loam with charcoal and fired clay particles (Zone 1). Zone 1 fill contained almost no artifacts, and the clay content (not the fired clay particles) of the soil increased noticeably in the lower half of the zone. Beneath Zone 1 was a lens of dark reddish brown (5YR 2.5/2) clay loam with charcoal (Zone 2). During excavation, several charred beans were observed in Zone 2, along with pieces of mottled fired clay that appeared to have been part of a lining for a pit. A small compact pocket of ash also was located near the center of Zone 2.

After excavation, Feature 4 averaged 2.8 ft in diameter and was 0.7 ft deep in the center (Figure 6.12). The sides sloped inward to intersect a flat bottom. The function of this feature is not obvious. It could represent the bottom of a shallow storage pit that had been filled with soil from around a food preparation facility. The absence of a significant amount of food and other refuse is enigmatic, particularly when compared with the other features thought to have been used in food preparation activities.

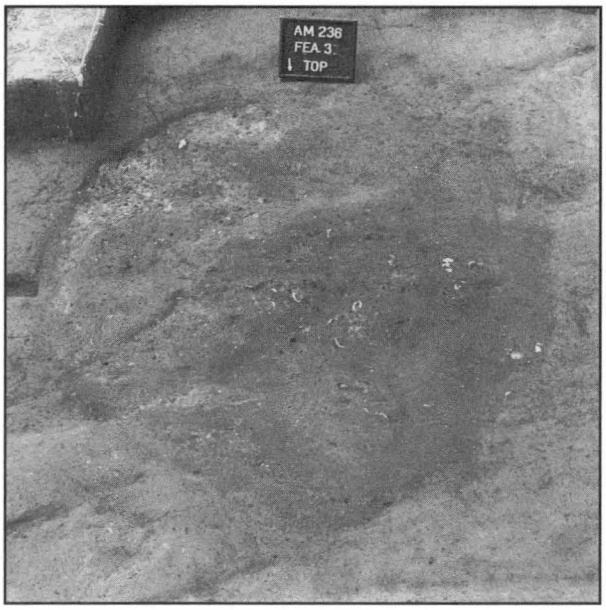

Figure 6.9. Feature 3, before excavation.

Figure 6.10. Feature 3, excavated.

Feature 5

This large shallow basin was located in the southwestern excavation block at 429.8R436.4. The fill consisted of a mottled brown (10YR 4/3) sand with charcoal and fired clay particles (Zone 1). The north central area of the feature was somewhat darker (10YR 3/3) and more loamy. However, the distinction was not sufficient to warrant a separate zone designation. Zone 1 contained pottery sherds, animal bones, flakes, charcoal, and several mussel shells. After excavation, the basin measured 4.7 ft by 5.2 ft but was only 0.1 ft

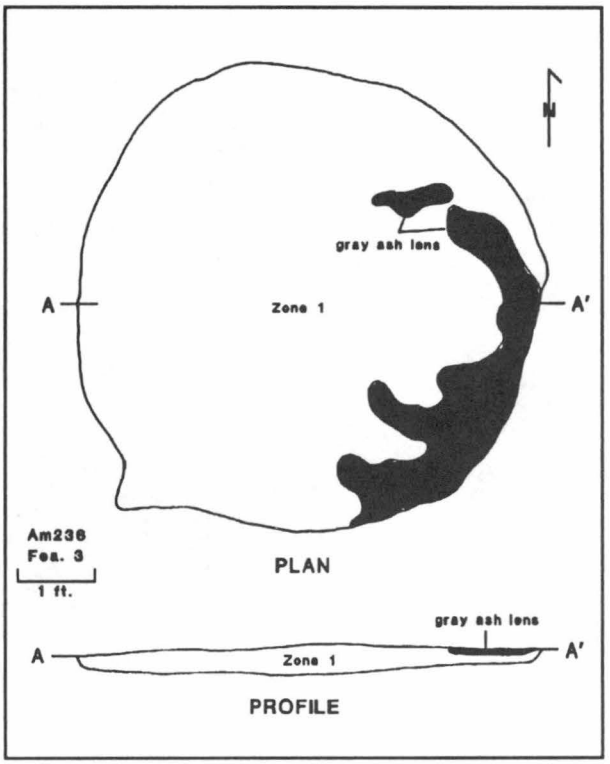

Figure 6.11. Feature 3, plan view and profile drawings.

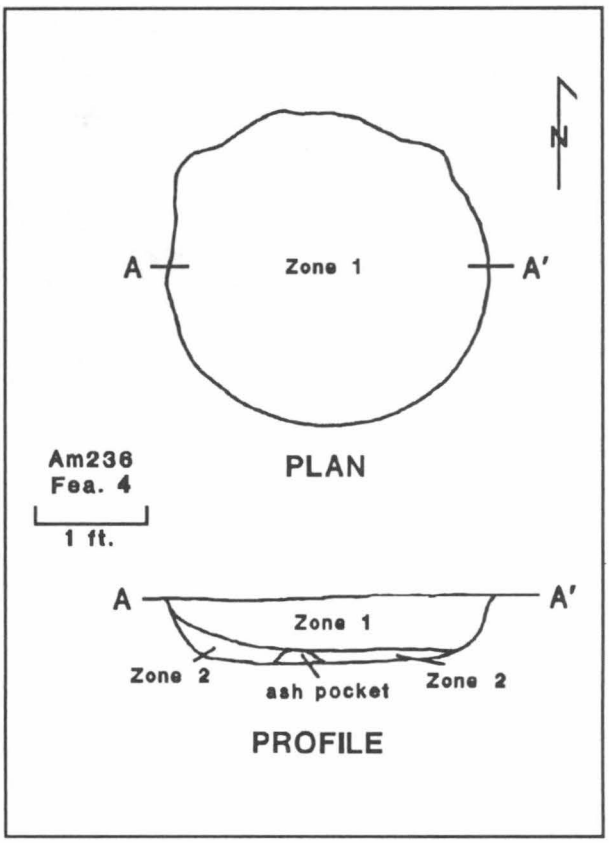

Figure 6.12. Feature 4, plan view and profile drawings.

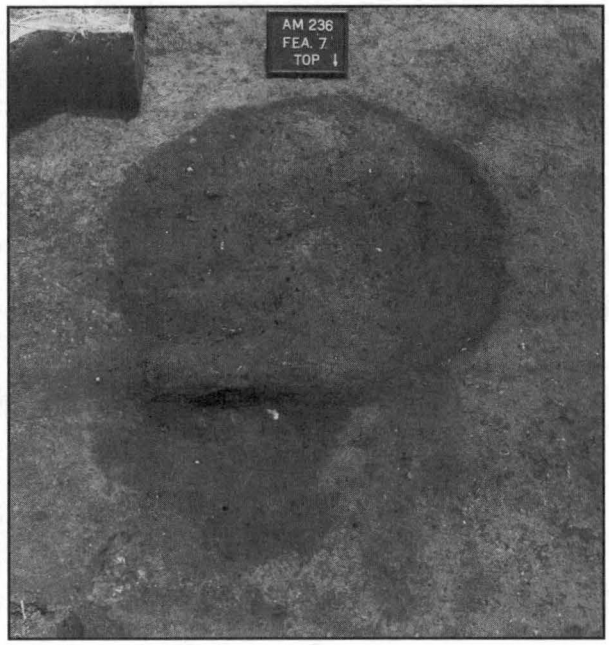

Figure 6.13. Feature 7, before excavation.

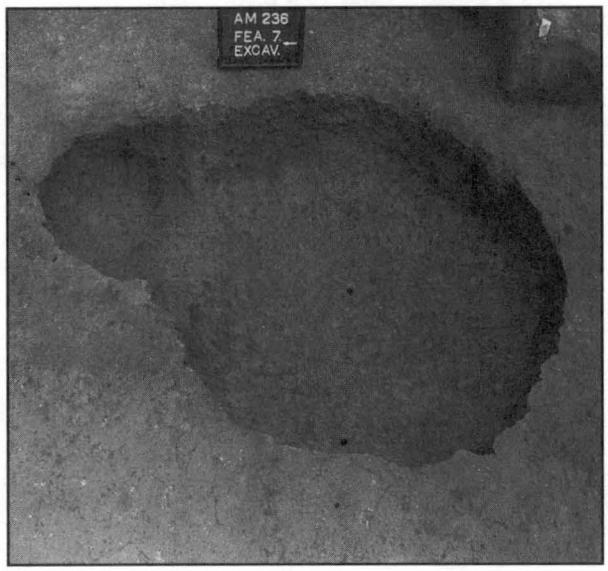

Figure 6.14. Feature 7, excavated.

deep. Feature 5 probably functioned as a cooking or roasting facility.

Feature 6

This feature was indicated by two shallow pockets of dark brown (10YR 3/3) mottled loam within a larger area of mottled, stained subsoil. It was located in the eastern most excavation unit, Sq. 450R600. Only a small amount of cultural material was recovered. The pockets may represent the remnants of a large shallow basin that had been eroded and plowed away.

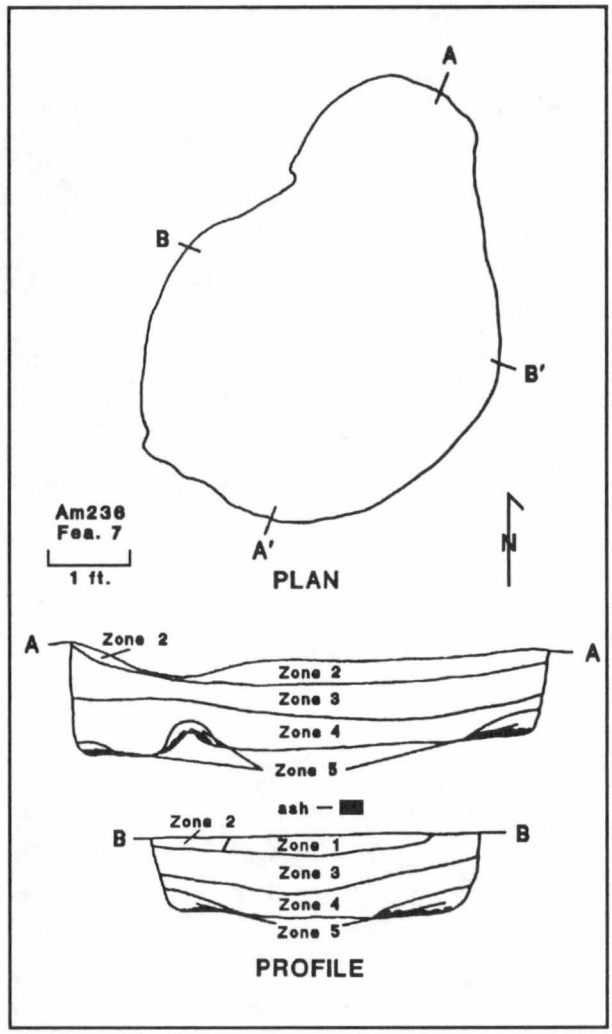

Figure 6.15. Feature 7, plan view and profile drawings.

Feature 7

This large, complex facility was located just south of Feature 5 and appeared at the top of the subsoil as three distinct fill zones (Figure 6.13). Zone 1 consisted of a gray (10YR 5/1) charcoal and ash layer located in the southern half of the feature. Zone 2, a brown (10YR 4/3) loam mottled with orange clay, ran along the western and northern edges of the pit but did not continue beneath Zone 1. Zone 3, a dark grayish brown (10YR 3/2) fill, appeared along the eastern edge at the surface of the feature and continued beneath Zones 1 and 2. Beneath Zone 3 was a band of fill (Zone 4) very similar to Zone 1. It also contained large quantities of gray ash and charcoal. The final deposit, Zone 5, was a strong brown (7.5YR 4/6), mottled clay band that ran around the perimeter of the pit at the bottom. A very thin lens of ashy soil separated Zone 5 from the pit bottom (Figure 6.14).

All fill zones, except Zone 5, were rich in artifacts; however, Zones 3 and 4 produced the most material. Potsherds, animal bones, mussel shells, and charcoal dominated. A large number of small rocks also were

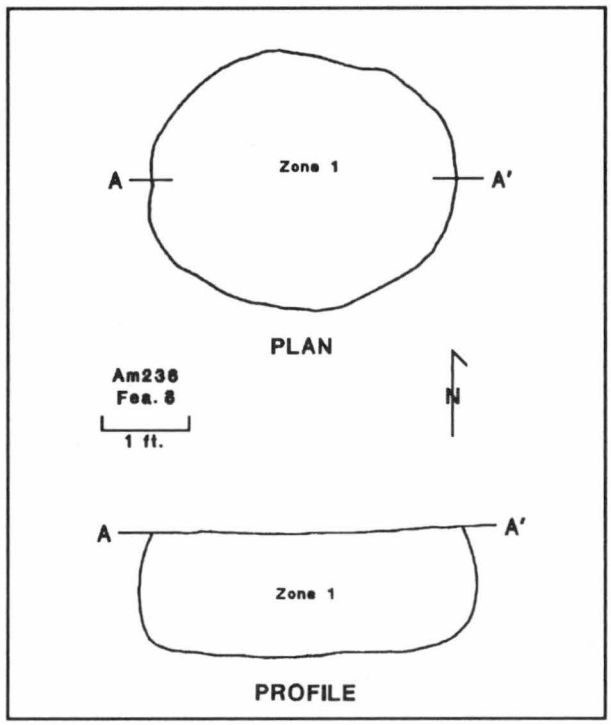

Figure 6.16. Feature 8, plan view and profile drawings.

noted throughout the feature. After excavation, the pit measured 5.9 ft by 4.0 ft and averaged 1.0 ft in depth (Figure 6.15). The sides sloped slightly inward at the bottom, which was flat. Feature 7 is the deepest of the large pit features that apparently were used in cooking and food preparation activities.

A charcoal sample from Zone 4 yielded a radiocarbon age of 350 ± 50 years: A.D. 1600 (Beta-23510). This assay was identical to the one obtained at the Edgar Rogers site and, when calibrated (see Stuiver and Becker 1986), provided multiple intercepts of A.D. 1491, A.D. 1502, A.D. 1506, and A.D. 1605, and a one-sigma range of A.D. 1450 to A.D. 1637. These dates suggest that both of these Hillsboro phase sites were occupied during the sixteenth century.

Feature 8

This oval-shaped pit contained a loose, homogeneous, dark yellowish brown (10YR 3/4) soil that resembled burial fill. This interpretation was further supported by the presence of numerous air pockets throughout the fill. However, only a few fragments of badly decayed, unidentifiable bone were found, and these were found within the fill, which contained only a small quantity of artifacts. No bones or stains were observed at the bottom of the pit. After excavation, it measured 3.6 ft by 2.8 ft and was 1.5 ft deep (Figure 6.16). The sides bowed out in the middle, creating a barrel-shaped profile. Feature 8 probably represents a storage pit that was refilled with soil excavated from another similar facility. However, it also may represent a burial pit that was excavated but not used. Feature 8 was located in Sq. 450R450, just inside an arc of postholes attributed to a probable house structure.

Summary

Large shallow basins, interpreted as the remains of roasting or barbeque pits, were the predominant feature class at George Rogers. Only Feature 4 and Feature 8 seem to represent other types of facilities. The small size and depth of Feature 4 suggest that it probably represents a shallow storage facility. Feature 8 also may have been prepared as a storage pit, but the mottled yellow soil more resembled the fill of a burial. Neither of these produced large numbers of artifacts. In contrast, all the large roasting pits contained fill deposits rich in food remains and other domestic refuse.

Postholes

Postholes were generally sparse across the George Rogers site, indicating a small dispersed occupation of limited duration. However, a probable structural pattern was indicated at the western edge of the excavation area in Sq. 450R460 (see Figure 6.4). Here, a clear arc of postholes cut across the northeast quadrant of the square. The posts were of a uniform size, 0.5 ft in diameter, and evenly spaced approximately 1 ft apart. By extending the radius of the arc, a house structure roughly 20 ft in diameter is indicated. Our excavations apparently just missed the postholes forming the southwest wall of the house.

Pottery

The ceramic sample from the 1987 excavations at the George Rogers site consists of 3,468 potsherds (Table 6.2). Of these, 1,932 (55.7%) were classifiable by exterior surface treatment. Seven reconstructed vessel sections, representing 106 sherds, were identified in the sample. Although over 75% of the pottery was recovered from the plowzone, the feature sherd sample (n=842) is large compared with most of the other sites investigated within the Haw drainage. Pottery was recovered from all excavated features; however, most sherds from undisturbed contexts came from Features 3 and 7. While the sample of pottery

Table 6.2. Distribution of pottery from the George Rogers site.

Context	Yadkin	Haw River			Hillsboro				Caraway		
	Fabric Marked	Net Impressed	Cord Marked	Brushed	Plain	Simple Stamped	Check Stamped	Corncob Impressed	Complicated Stamped	Indet.	Total
Hillsboro Phase											
Fea. 1	-	-	-	-	-	2	-	-	-	3	5
Fea. 2	-	16	-	-	7	9	6	-	-	19	57
Fea. 3	-	31	-	-	32	39	10	-	-	78	190
Fea. 4	-	2	-	-	-	2	-	-	-	14	18
Fea. 5	-	18	-	14	12	8	1	1	-	34	88
Fea. 6	-	4	-	-	1	-	-	-	-	1	6
Fea. 7	1	125	5	-	62	82	9	1	3	141	429
Fea. 8	-	10	-	-	1	6	-	-	-	32	49
Sub-total	1	206	5	14	115	148	26	2	3	322	842
Indeterminate Phase											
Plowzone	-	403	5	7	316	557	115	4	2	1214	2623
Surface	-	-	-	-	2	-	1	-	-	-	3
Sub-total	0	403	5	7	318	557	116	4	2	1214	2626
Total	1	609	10	21	433	705	142	6	5	1536	3468

found in Feature 1 during 1986 testing was not analyzed, a few sherds were recovered in 1987 from the edge of this feature.

Similarities in sherd attributes between feature and plowzone samples suggest that most of the pottery is the product of a single occupation that occurred during the late Hillsboro phase (ca. A.D. 1500–1600). The predominant types recognized in the George Rogers ceramic sample, in descending order of frequency, include: *Hillsboro Simple Stamped* (36.5%), *Haw River Net Impressed* (31.5%), *Hillsboro Plain* (22.4%), and *Hillsboro Check Stamped* (7.3%). Other minority types make up the remaining 2.3% of the sample and include *Haw River Brushed* (n=21), *Haw River Cord Marked* (n=10), *Hillsboro Corncob Impressed* (n=6), *Caraway Complicated Stamped* (n=5), and *Yadkin Fabric-Marked* (n=1).

Yadkin Fabric-Marked

One *Yadkin Fabric-Marked* (Coe 1964) rimsherd with an everted profile and rounded lip was recovered from Feature 7. It has a scraped interior and is tempered with mixed crushed quartz and feldspar. This sherd may be associated with an earlier, minor Woodland occupation at the site.

Haw River Net Impressed (Figure 6.17*a*)

Six hundred and nine net impressed sherds were recovered from the George Rogers site. Chronologically, these sherds appear to represent the final manifestation of the *Haw River Net Impressed* type and its persistence into the Hillsboro phase within the Haw drainage. Although two-thirds came from plowzone excavations, *Haw River Net Impressed* pottery was present in all excavated features except Feature 1 (see discussion below of *Hillsboro Plain*). A relatively large (n=125) sample of net impressed sherds was collected from Feature 7 and a large vessel section was found in Feature 2 in direct association with large sections of *Hillsboro Simple Stamped* and *Hillsboro Check Stamped* jars. This association provides clear evidence that both net impressed and carved paddle stamped vessels were used by the George Rogers site inhabitants.

Haw River Net Impressed sherds at the George Rogers site are tempered primarily with sand (54.4%) and fine crushed feldspar (36.2%). Other minor temper types include fine crushed quartz (5.9%), mixed crushed quartz and feldspar (2.5%), and fine grit (1.0%). Just over half of the sherds in the sample have smoothed rather than scraped interiors, and most (87.3%) are 6 mm to 10 mm thick. The predominance of sand and fine crushed feldspar temper, as well as the prevalence of interior vessel smoothing, contrast sharply with the crushed quartz tempered and scraped-interior pottery from the Holt site, and are seen as characteristics of late Haw River series pottery. The transition between these two forms of Haw River pottery are at least partly reflected in ceramic samples from the Webster, Guthrie, and Mitchum sites.

All but one of the 48 rimsherds are from jars with straight-to-everted rims; a single rimsherd has an inverted profile that is more suggestive of a bowl form. Both rounded and flattened lips are equally represented in the sample. The large vessel section from Feature 2 (see Figure 6.17*a*) is from a jar 24 cm in diameter

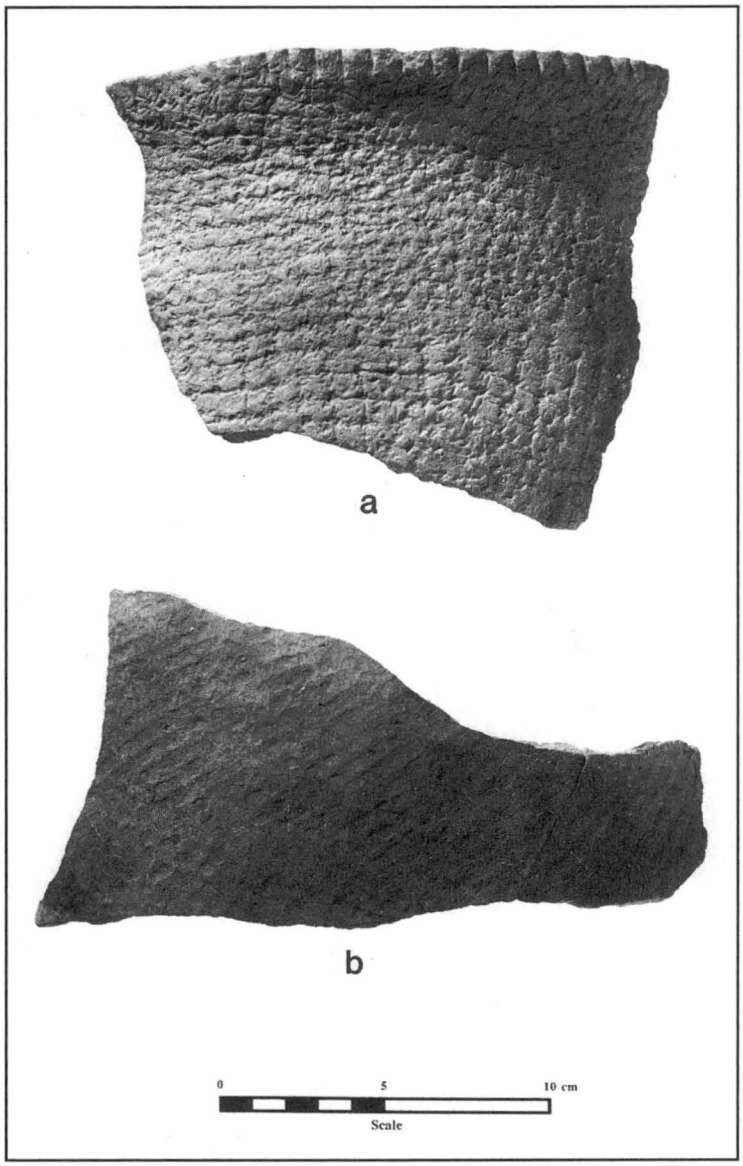

Figure 6.17. *Haw River Net Impressed* and *Hillsboro Check Stamped* sherds from the George Rogers site.

that had a notched rim and, because of soot deposits along the interior neck area, is interpreted as a probable cooking pot. As with the *Hillsboro Plain* pottery, these *Haw River Net Impressed* vessels often were decorated. The most common type of decoration was V-shaped notches placed along the vessel lip (n=10) or lip/rim edge (n=11). The only other type of rim treatment, observed on a single sherd, was the application of small, circular stick punctations to the lip edge. Vessel necks and shoulders also were decorated though less frequently. Neck decorations consist of circular punctations (n=3), parallel incised lines (n=2), and a band of incised "V"s (n=1). Shoulder decorations consist of a band of fingernail punctations (n=1) and parallel incised lines (n=1).

Haw River Cord Marked

Ten cord marked sherds, including five from Feature 7, were recovered from the George Rogers site and are classified as *Haw River Cord Marked*. These sherds are tempered with sand (n=5), fine feldspar (n=4), and mixed crushed quartz and feldspar (n=1), and have both smoothed (n=6) and scraped (n=4) interiors. The one rimsherd is everted, has a rounded lip, and is undecorated.

Haw River Brushed

Twenty-one brushed body sherds, apparently from the same vessel, were recovered from Feature 5 and the overlying plowzone. All are tempered with medium crushed quartz, have scraped interiors, and are

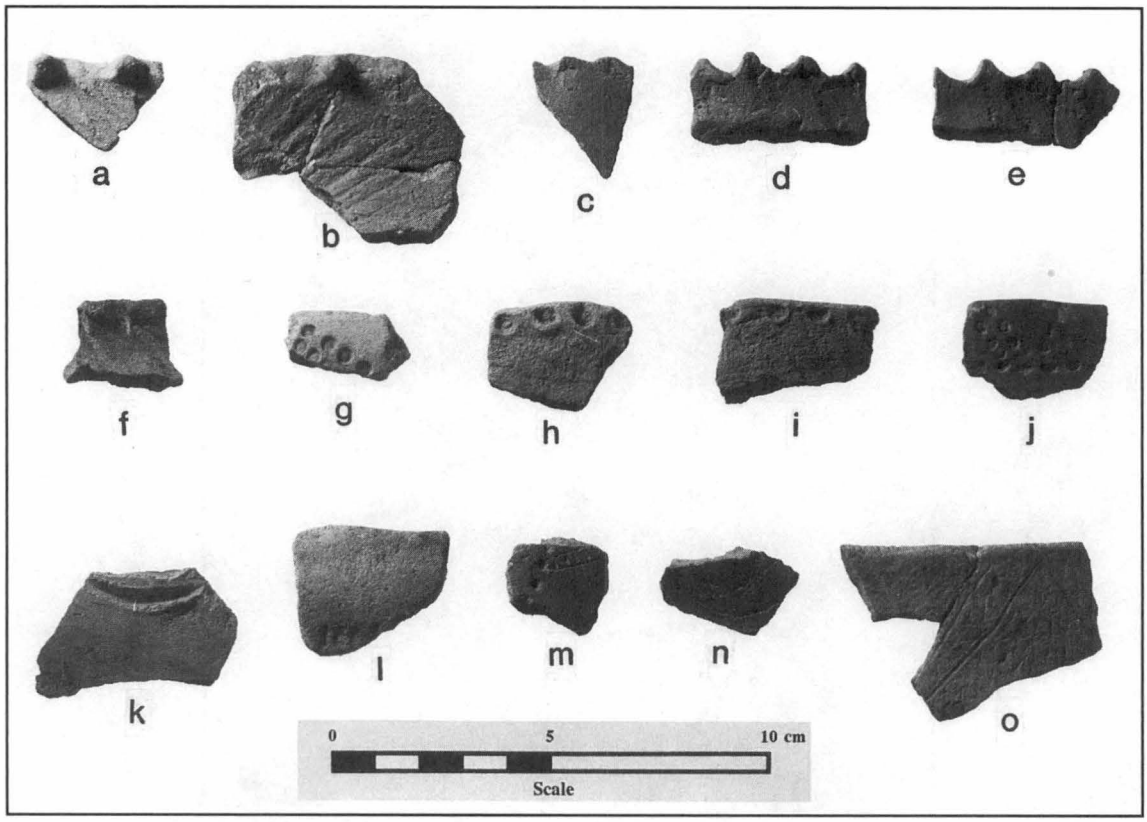

Figure 6.18. Decorated sherds from the George Rogers site.

moderately thick (eg., 8–10 mm). Although similar in paste and surface treatment to Haw River phase brushed pottery found elsewhere within the Haw drainage, these sherds probably represent a vessel that was contemporaneous with the other pottery from the site.

Hillsboro Plain (Figures 6.18*c–e,g–n* and 6.19*d*)

Four hundred and thirty-three potsherds have smoothed exteriors and were classified as *Hillsboro Plain* (Coe 1952; Davis 1987). Plain pottery occurred in all features except Feature 4. Although no plain sherds are reported from Feature 1, numerous plain sherds were found when the majority of that feature was excavated in 1986. All but 15 of these sherds also have smoothed interior surfaces and are tempered primarily with fine crushed feldspar (58.5%) or sand (35.3%). Other minor temper types include: fine crushed quartz (3.4%), mixed crushed quartz and feldspar (2.1%), and fine grit (0.7%). Two-thirds of all plain sherds are 6 mm to 8 mm thick.

A variety of vessel forms are indicated by the 69 *Hillsboro Plain* rimsherds (including one large vessel section) in the sample. Most of these vessels appear to have been substantially smaller than those represented by other sherd types found at the site. Twenty-four rimsherds, including one carinated rim from a cazuela-form vessel, are from bowls that had inverted rims. Seven sherds are from straight-rimmed jars while 38 rimsherds, including one with a rim fold, are from jars with everted rims. Approximately 63% of the rimsherds have rounded lips; the remainder are flattened (28%) or pointed (9%).

A higher proportion of *Hillsboro Plain* sherds than any other sherd type at the George Rogers site are decorated. Twenty-seven (39.1%) rimsherds are decorated and suggest a wide variety of decoration techniques that were used by the George Rogers potters. The most commonly observed rim treatment was the incision of V-shaped notches into the lip (n=1) or lip/rim edge (n=8) (Figure 6.18*c*). Circular reed or stick punctations also were commonly applied along the lip (n=1) and rim (n=7) (Figure 6.18*h–i*). Other rare decorative rim treatments were: hand-modeled scalloping of the lip (observed on eight sherds from a single vessel) (Figure 6.18*d–e*); finger punctations placed along the rim (n=1); and parallel lines incised along the rim. Decoration below the rim apparently also was common. Of the 24 decorated non-rimsherds found, 19 have circular reed or stick punctations that were applied in linear or triangular patterns to the vessel neck (n=2), shoulder (n=8), or body (n=9) (Figure 6.18*g,j,l*). Included in this category is the one large plain vessel section, found in Feature 7, which is from a medium-sized (22 cm diameter), sand tempered cooking jar (as evidenced by the presence of soot

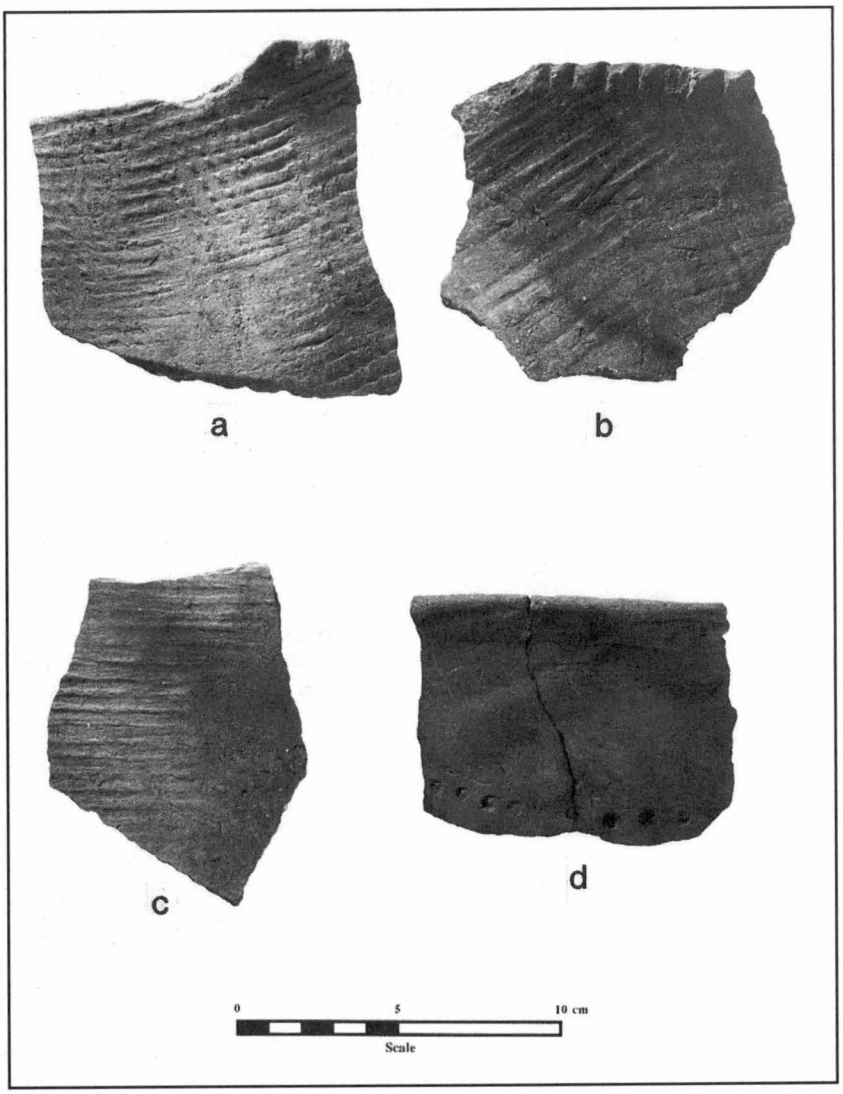

Figure 6.19. *Hillsboro Plain* and *Hillsboro Simple Stamped* sherds from the George Rogers site.

deposits along the vessel interior) (Figure 6.19*d*). This jar was decorated with a band of reed punctations along the shoulder. Other non-rim decorations represented in the plain sherd sample include: incised arcs along the vessel shoulder (n=1) and below the shoulder (n=1) (Figure 6.18*k,n*); multiple inverted "V"s incised below the shoulder (n=1); and fingernail punctations below the shoulder (n=2). These kinds of decoration, along with vessel morphologies and paste attributes, indicate a close similarity between the George Rogers sample and plain pottery from the Wall site (31Or11)—the type site for the Hillsboro ceramic series.

Hillsboro Simple Stamped (Figures 6.18*a–b,f* and 6.19*a–c*)

Simple stamping, recognized on 705 sherds, was the most frequently observed surface treatment at the George Rogers site. All of these sherds conform closely to the *Hillsboro Simple Stamped* type (Coe 1952; Davis 1987). A majority (n=557) of the simple stamped pottery came from the plowzone; however, simple stamped sherds also were recovered from all excavated features except Feature 6 (which produced only six sherds). All but 13 sherds have smoothed interiors and almost 75% are 6 mm to 8 mm thick. As with other predominant sherd types found at the site, fine crushed quartz (63.2%) and sand (26.2%) were the most frequently observed temper types. Other temper categories include mixed crushed feldspar and sand (8.8%) and fine crushed quartz (1.8%).

Forty-eight *Hillsboro Simple Stamped* rimsherds were recovered. All are from jars with everted (n=34), everted and folded (n=7), straight (n=5), and everted and rolled (n=2) rims. Lips are predominantly rounded (n=26) but also are flattened (n=16) or pointed (n=6). Simple stamped jars often were decorated; however, unlike plain and net impressed vessels, decoration was restricted to the rim. Forty

(83%) of the 48 rimsherds found are decorated. These decorations consist of: V-shaped notches applied to the lip (n=1) and lip/rim edge (n=30) (Figures 6.18*f* and 6.19*a–b*); small nodes attached to the rim just below the lip (observed on six sherds from a single vessel) (Figure 6.18*a–b*); and circular stick punctations along the rim (n=3).

Substantial portions of three *Hillsboro Simple Stamped* vessels, including one large rimsherd, are present within the sample. The large rimsherd, recovered from Feature 2, is from a 25–30 cm diameter jar with a notched lip/rim edge. One of the other vessels—a large (30–34 cm in diameter) jar from Feature 7—is represented by several large body sections and one large rimsherd with broad, V-shaped notches along the lip/rim edge. A third vessel is represented by portions of the rim and body of a jar which was decorated with small, pointed nodes applied just below the rim. Sherds from this vessel were recovered from the plowzone in the vicinity of Feature 7.

Hillsboro Check Stamped (Figure 6.17)

One hundred and forty-two check stamped sherds, including five large body sherds from a single vessel (from Feature 2), were recovered and are classified as *Hillsboro Check Stamped* (Coe 1952; Davis 1987). Check stamped pottery also was found in Features 3, 5, and 7. All but one of the *Hillsboro Check Stamped* sherds have smoothed interiors and are tempered with fine feldspar (n=97), sand (n=40), and mixed crushed quartz and feldspar (n=5). As with other pottery found at the site, most (73.2%) sherds are 6 mm to 8 mm thick and appear to represent large cooking or storage jars with everted rims. Three of the 14 rimsherds are folded. Both flattened and rounded lips are common. Nine rimsherds are decorated with V-shaped notches along the lip (n=1) or lip/rim edge (n=8). Both the high incidence of rim decoration and type of decoration also are similar to the *Hillsboro Simple Stamped* sherds in the sample. In addition to rim decorations, two body sherds were decorated by parallel incised lines.

Hillsboro Corncob Impressed

Six corncob impressed sherds, including one rim sherd with a straight profile and pointed lip, were recovered. Two of these came from Features 5 and 7. All have smoothed interiors and are tempered with sand (n=3), fine feldspar (n=2), and mixed quartz and feldspar (n=1). These sherds conform to the *Hillsboro Corncob Impressed* type defined at the Wall site (31Or11) (Coe 1952; Wilson 1983).

Caraway Complicated Stamped

Five curvilinear complicated stamped sherds, including three sherds from Feature 7, were recovered. All are undecorated body sherds, 6 mm to 8 mm thick, that are tempered with fine feldspar. As with the complicated stamped pottery found at the Edgar Rogers site, these sherds appear to be referable to the unpublished *Caraway Complicated Stamped* type defined at the Poole site (31Rd1) in Randolph County, North Carolina.

Indeterminate Sherds

Forty-four percent (n=1,536) of the sherds from the George Rogers site could not be classified by exterior surface treatment.

Summary

The pottery recovered from the George Rogers site reflects a vessel assemblage dominated by large simple stamped, check stamped, and net impressed storage and cooking jars, and smaller smoothed jars and bowls. In all respects, except for the presence of net impressed vessels, this assemblage is very similar to the pottery from the fifteenth-century Wall site—the type site for the Hillsboro ceramic series. A close stylistic relationship also exists with the assemblage identified at the Edgar Rogers site, despite relative frequency differences in exterior surface treatments. As was suggested in the discussion of pottery from Edgar Rogers, and supported by radiocarbon dates, the ceramic assemblages from both sites appear to represent late manifestations of the Hillsboro ceramic series that post-date the occupation of the Wall site. The inclusion of net impressed and complicated stamped pottery within these assemblages may reflect increased community diversity or greater extra-regional interaction.

Lithic Artifacts

Archaeological excavations during 1987 at the George Rogers site produced a sample of 1,421 lithic artifacts (Table 6.3). Just over half came from archaeological features attributed to the Hillsboro phase; the remaining artifacts were recovered from the plowzone and surface. All features, including a small portion of Feature 1 not removed during test excavations in 1986, contained lithic artifacts. Approximately 90% of the lithic artifact sample can be attributed to the site's Hillsboro phase cultural component. The remaining 10%, consisting of four projectile points, one soapstone sherd, a few heavily patinated chipped stone tools, and 133 large, patinated flakes, is associated with earlier Archaic occupations of the site. General categories of lithic artifacts include: debitage and exhausted cores (n=1,080), chipped stone tools and tool fragments (n=331), ground stone tool fragments (n=3), and large cobble tools (n=7).

Table 6.3. Distribution of lithic artifacts from the George Rogers site.

Category	PZ	Context Fea 1	Fea 2	Fea 3	Fea 4	Fea 5	Fea 6	Fea 7	Fea 8	Surface	Total
Debitage											
Decortication Flakes	5	1	5	2	-	-	-	21	1	-	35
Interior/Bif. Thin. Flakes	271	61	95	91	9	29	7	245	30	2	840
Shatter Fragments	3	1	-	3	-	-	-	1	-	-	8
Flakes (Archaic)	133	-	-	-	-	-	-	-	-	-	133
Other Flakes	2	-	-	-	-	-	-	-	-	-	2
Cores	48	-	2	2	3	1	-	3	1	1	61
Raw Material	1	-	-	-	-	-	-	-	-	-	1
Projectile Points											
Stanly Stemmed	1	-	-	-	-	-	-	-	-	-	1
Morrow Mountain II Stemmed	1	-	-	-	-	-	-	1	-	-	2
Small Triangular Points	20	1	3	2	-	1	-	9	1	2	39
Unidentified Points	3	-	2	-	-	-	-	-	-	-	5
Other Chipped Stone Artifacts											
Preforms	4	-	-	-	-	1	-	1	-	-	6
Bifaces	17	1	-	2	-	-	2	4	2	-	28
Chipped Hoes	1	-	-	-	-	-	-	1	-	-	2
Perforator	1	-	-	-	-	-	-	-	-	-	1
Graver	1	-	-	-	-	-	-	-	-	-	1
Utilized/Retouched Flakes	170	3	10	15	-	8	-	30	9	1	246
Ground Stone Artifacts											
Ground Disk	1	-	-	-	-	-	-	-	-	-	1
Soapstone Sherd	1	-	-	-	-	-	-	-	-	-	1
Ground Stone Fragment	-	-	-	-	-	-	-	1	-	-	1
Large Cobble Tools											
Hammerstones/Manos	7	-	-	-	-	-	-	-	-	-	7
Total	691	68	117	117	12	40	9	317	44	6	1421

Debitage

Decortication Flakes. Sample Size: 35. Form: These flakes exhibit a striking platform and bulb of percussion on the ventral surface, and have cortex (primary - >75% cortex; secondary - <75% cortex) remaining on the dorsal surface. Both primary (n=4) and secondary (n=31) decortication flakes are represented in the sample. Material: Vitric tuff–21, Other metavolcanic rock–8, Felsic tuff–4, Slate–1, Chert–1. Comment: These flakes represent initial stages of core reduction and chipped stone tool manufacture. The very low ratio of decortication flakes to interior and bifacial thinning flakes (1:24) suggests that these activities may have largely taken place elsewhere. A similar pattern also was noted for the Hillsboro phase assemblage at the Edgar Rogers site.

Interior/Bifacial Thinning Flakes. Sample Size: 840. Form: Interior flakes (n=763) are defined as flat flakes that lack cortex, lack a steep platform angle, and have flake removal scars on the dorsal surface. Bifacial thinning flakes (n=77) are similar but possess a steep platform angle resulting from detachment from a biface. Material: Quartz–580, Vitric tuff–138, Felsic tuff–67, Other metavolcanic rock–34, Rhyolite–13, Chert–3, Jasper–2, Slate–1, Schist–1, Quartzite–1. Comment: These flakes represent intermediate and final stages of biface manufacture and flake blank production. The distribution of raw material types indicates that quartz and vitric tuff were used most often for manufacturing stone tools.

Shatter Fragments. Sample Size: 8. Form: These are angular flakes that lack sufficient morphological characteristics for more specific classification. Material: Quartz–5, Vitric tuff–2, Felsic tuff–1. Comment: None.

Archaic Flakes. Sample Size: 133. Form: This category includes large, heavily patinated flakes of all types from undisturbed contexts. Material: Not classified. Comment: None.

Other Flakes. Sample Size: 2. Form: One of these

specimens, a blade, has parallel sides and a length that is twice its width. The other specimen is classified as a core rejuvenation flake and probably was detached from a core in order to facilitate subsequent flake removals. Material: Vitric tuff–1, Quartz–1. Comment: Both flake types are rare within lithic samples from the Haw drainage.

Cores. Sample Size: 61. Form: A core is a mass of lithic raw material from which two or more flakes have been deliberately removed. Material: Quartz–57, Vitric tuff–4. Comment: A predominance of quartz cores also was observed at the Edgar Rogers site.

Raw Material. Sample Size: 1. Form: This specimen is an amorphous piece of metavolcanic rock that was "tested" by removing a single flake. Material: Vitric tuff–1. Comment: None.

Projectile Points

Stanly Stemmed Projectile Point. Sample Size: 1. Form: The *Stanly Stemmed* projectile point type is morphologically defined by "a broad triangular blade with a small squared stem and a shallow notched base" (Coe 1964:35). This specimen is the basal two-thirds of a point that broke at the tip. Material: Other metavolcanic rock–1. Comment: This is a Middle Archaic (ca. 5,800–5,500 B.C.) projectile point type.

Morrow Mountain II Stemmed Projectile Points. Sample Size: 2. Form: The *Morrow Mountain II Stemmed* projectile point type is defined by "a long narrow blade with a long tapered stem" (Coe 1964:37). Both specimens are basal fragments. Material: Vitric tuff–2. Comment: *Morrow Mountain II* projectile points are associated with the Middle Archaic period (ca. 5,500–5,000 B.C.).

Small Triangular Projectile Points (Figure 6.20*a–w*). Sample Size: 39. Form: All of these projectile points are referable to Coe's (1964:49) *Caraway Triangular* type. Twenty-four point fragments are too small to determine edge configuration. The remaining 15 points and point fragments have either incurvate sides and base (n=4), incurvate sides and a straight base (n=3), incurvate sides and an excurvate base (n=3), straight sides and base (n=1), or straight sides and an excurvate base (n=4). These triangular points range from 13 mm to 39 mm (mean=23.0, sd=5.7, n=20) in length, 12 mm to 24 mm (mean=16.6, sd=3.0, n=30) in width, and 3 mm to 12 mm (mean=5.0, sd=2.1, n=29) in thickness. Material: Vitric tuff–21, Quartz–12, Felsic tuff–4, Other metavolcanic rock–1, Chert–1. Comment: All of these projectile points probably are associated with the Hillsboro phase component at the site.

Projectile Point Fragments. Sample Size: 5. Form: This category includes projectile point fragments that cannot be specifically classified. One specimen with a broken stem, and recovered from plowzone, probably represents a re-worked *Stanly Stemmed* point. The other specimens are small tip fragments. Material: Vitric tuff–2, Felsic tuff–1, Rhyolite–1, Quartz–1. Comment: None.

Other Chipped Stone Artifacts

Preforms. Sample Size: 6. Form: These specimens are small triangular bifaces that could not be thinned due to raw material flaws, and are interpreted as unfinished triangular projectile points. Material: Quartz–3, Vitric tuff–2, Other metavolcanic rock–1. Comment: All of these artifacts apparently are associated with the Hillsboro phase component.

Bifaces. Sample Size: 28. Form: Bifaces are blanks that exhibit flake removal scars, resulting from either percussion or pressure flaking, on both surfaces. Artifacts within this category include both small biface fragments that may be from finished tools (e.g., projectile points) and large amorphous bifaces. Material: Quartz–13, Vitric tuff–7, Felsic tuff–4, Other metavolcanic rock–2, Not classified–2. Comment: Four of these specimens, including three from the plowzone and one from Feature 6, are heavily patinated and probably date to the Archaic period. The remainder are attributed to the Hillsboro phase.

Chipped Hoe (Figure 6.21:a,c). Sample Size: 2. Form: Chipped hoes are large, hafted tools that are usually sub-triangular in shape and have a bifacial convex working edge transverse to the long axis. One specimen is unbroken but heavily reworked; the other is a basal fragment that broke above the haft. Material: Schist–1, Other metavolcanic rock–1. Comment: Chipped hoes probably were used both for digging and cultivating crops. Both specimens are attributed to the Hillsboro phase component.

Perforator (Figure 6.20*x*). Sample Size: 1. Form: This artifact is a decortication flake that has been unifacially retouched along one edge to produce a pointed tool bit. Material: Felsic tuff–1. Comment: The morphology of this tool and apparent use-wear along the bit edges suggest that it may have been used in a twisting motion to punch or bore holes.

Graver. Sample Size: 1. Form: This artifact is a quartz crystal flake that was finely retouched along one margin to produce a small, sharp, triangular projection. Material: Quartz–1. Comment: The morphology of the working edge suggests that it may have been used as an engraving or scoring tool.

Utilized and Retouched Flakes. Sample Size: 246. Form: Included within this category are 151 marginally-retouched and 95 edge-damaged flakes. Material: Quartz–171, Vitric tuff–50, Felsic tuff–16, Other metavolcanic rock–5, Schist–1, Not classified–3. Comment: Eleven of these flakes are heavily patinated and apparently date to the Archaic period; the remainder are attributed to the Hillsboro phase component. These specimens are interpreted as probable *ad hoc* cutting implements.

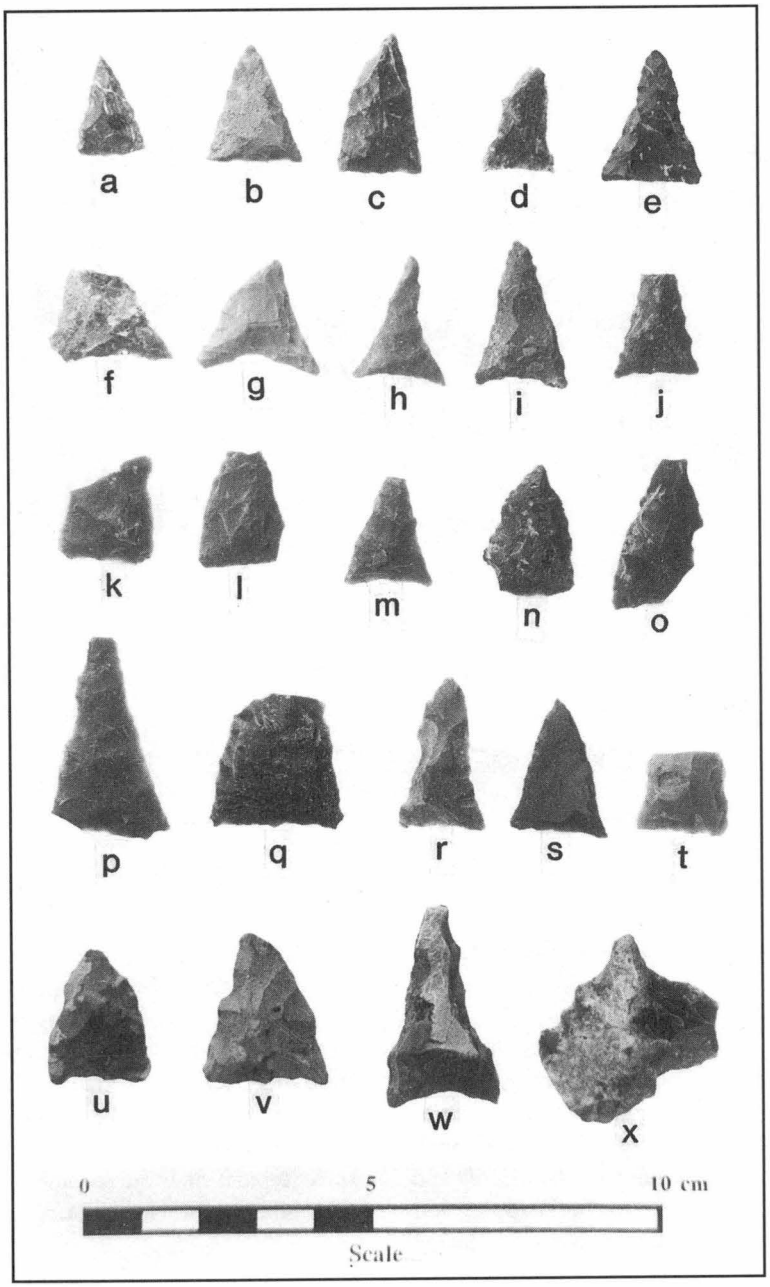

Figure 6.20. Chipped stone projectile points, drills, and perforators from the George Rogers site.

Ground Stone Artifacts

Ground Disk (Figure 6.21*b*). Sample Size: 1. Form: This artifact, recovered from plowzone, is a flat piece of schist approximately 43 mm in diameter that has been heavily ground along the edge to form a circular disk. Material: Schist–1. Comment: Although both stone and pottery disks are common on late prehistoric sites in the North Carolina Piedmont, their function is uncertain.

Soapstone Sherd. Sample Size: 1. Form: This specimen is a small fragment from a carved soapstone bowl. Material: Soapstone–1. Comment: Soapstone sherds are largely attributable to the Late Archaic period (ca. 3,000–1,000 B.C.).

Ground Stone Fragment. Sample Size: 1. Form: This specimen is a small fragment of an unidentified ground stone tool. Material: Other metavolcanic rock–1. Comment: None.

Large Cobble Tools

Hammerstones/Manos. Sample Size: 7. Form: All of these specimens are spherical cobbles that show evidence of battering and abrasion along their margins. Material: Quartz–7. Comment: These artifacts repre-

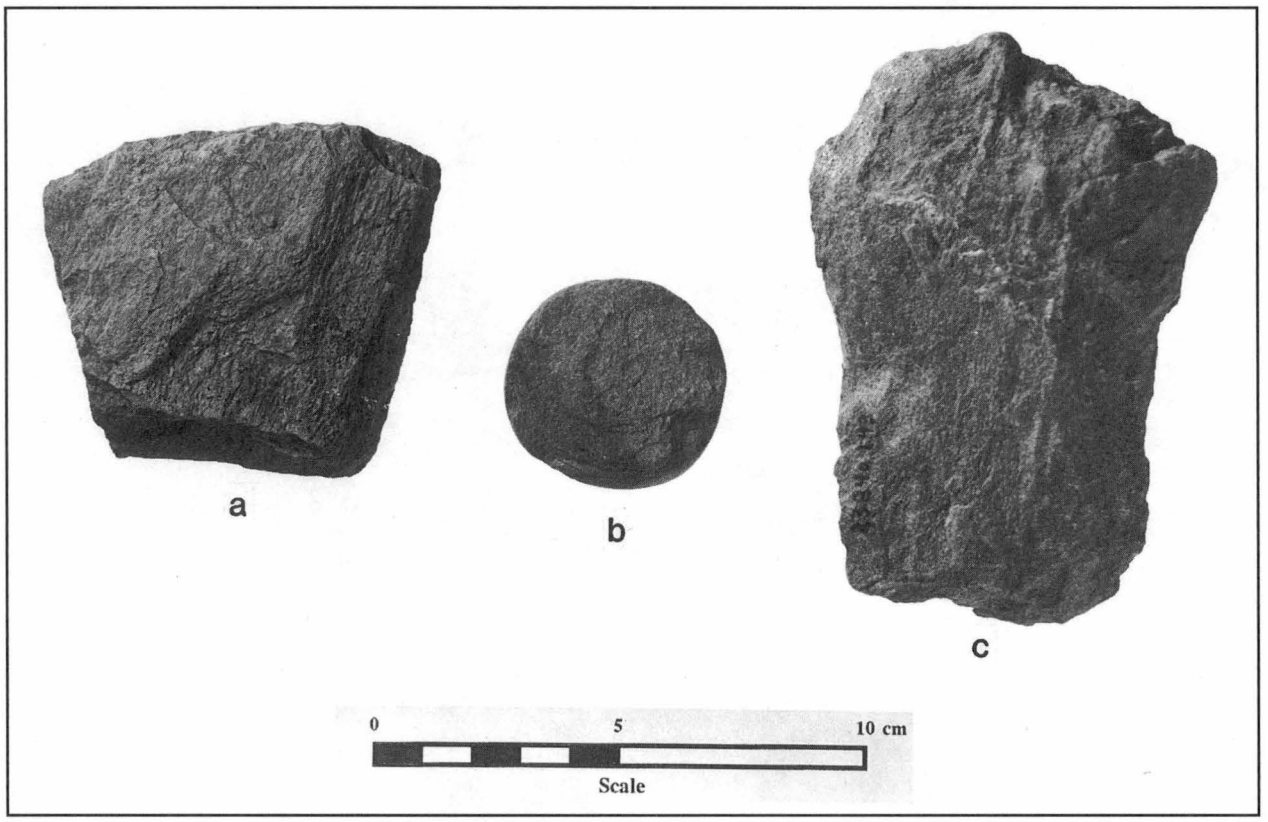

Figure 6.21. Ground stone and large chipped stone artifacts from the George Rogers site.

sent hand-held hammers and possibly grinding stones.

Summary

As with the Edgar Rogers site, most of the lithic artifacts recovered from the George Rogers site can be attributed to a single Hillsboro phase cultural component. Only a few artifacts were found that document earlier, sporadic site occupations during the Middle and Late Archaic periods. In addition to flintknapping and chipped stone tool production, other activities reflected by the Hillsboro phase lithic assemblage include butchering and hideworking, weapon repair, non-lithic tool manufacture, and digging or plant cultivation. Most small stone tools were made on flakes with very little modification; formalized tools are generally rare. This pattern also has been observed at other Hillsboro phase sites (i.e., Edgar Rogers and Wall) and appears to be typical of lithic assemblages at most late prehistoric sites in the North Carolina Piedmont.

Clay Artifacts

Four potsherds were recovered that had been chipped or ground into disks (Figure 6.22*a–e*). These specimens range from 25 mm to 46 mm in diameter (mean=36.0, sd=7.3) and, with one exception, are only roughly worked. Disks were recovered from the plowzone, Feature 2, Feature 3 (n=2), and Feature 8.

A single clay pipe fragment was recovered from Feature 7. This specimen is a stem segment from a pipe of indeterminate morphology and is tempered with crushed feldspar.

Two other modeled clay objects were found at the George Rogers site. One of these, recovered from the plowzone, is a small piece of either a coil segment or pottery loop handle. The other specimen, found in Feature 2, also may represent a large pottery handle (Figure 6.22*f*).

Bone and Shell Artifacts

Eleven bone artifacts were recovered from the George Rogers site. These include: two bone-splinter awls from Feature 7 and the plowzone (Figure 6.23, bottom row, middle specimens), a deer ulna awl from Feature 7 (Figure 6.23, bottom, right), two polished bone pin or needle fragments from Feature 3 (Figure

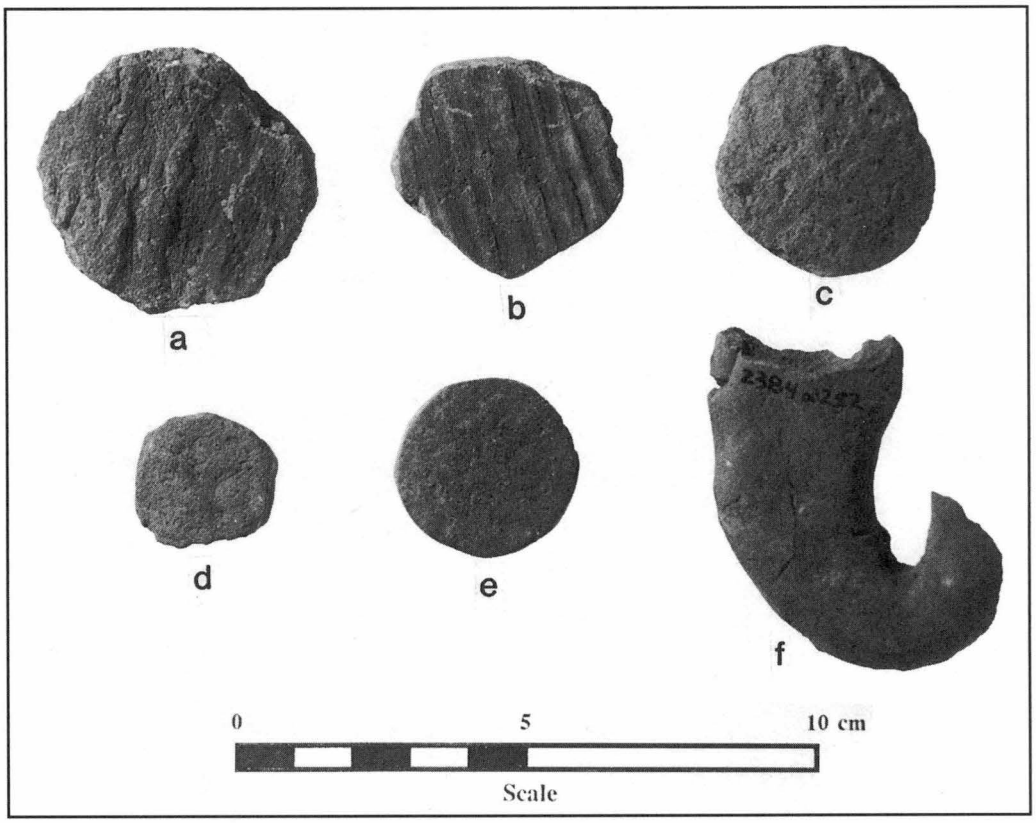

Figure 6.22. Clay artifacts from the George Rogers site.

6.23, bottom, left), a deer metatarsal beamer fragment from Feature 3, two small (3.5–5.0 mm in diameter) barrel-shaped bone beads from Feature 7, and three unidentifiable worked bone fragments.

Twenty-three shell artifacts, including 22 serrated mussel shells and one small disk bead, also were found. The serrated shells, thought to represent potter's tools for thinning vessel interiors, were recovered from Features 2 (n=7), 3 (n=4), and 7 (n=9), and from the plowzone (n=2) (Figure 6.23, top). Several additional specimens, not analyzed and reported here, were recovered from Feature 1 in 1986. The one shell bead, found in Feature 7, is similar to beads recovered at the Edgar Rogers site.

Historic Artifacts

Twenty-two artifacts of Euroamerican manufacture were recovered during excavations at the George Rogers site. With the exception of a small unidentifiable iron fragment that was found while flatshoveling the top of Feature 3, all of these artifacts came from the plowzone and probably are not associated with the aboriginal occupation of the site. The specimen from Feature 3 also was contained within plow-disturbed fill. Historic artifacts from the site include: 11 glass fragments, six unidentifiable iron fragments, four potsherds, and one brick fragment.

Faunal Remains
by
Mary Ann Holm

The sample of animal bone from the George Rogers site consists of 9,985 fragments recovered from all excavated features (excluding the 1986 sampling of Feature 1) (Table 6.4). Over 75% (n=7,509) of these fragments came from Feature 7; however, sizable samples also were recovered from Features 2 (n=863), 3 (n=1173), and 5 (n=248). Unfortunately, very few (9%) of these fragments can be identified beyond the level of class. Approximately 65% of the unidentifiable fragments are fish scales. The identifiable bone fragments represent a minimum of 36 individuals belonging to 20 species. Approximately 36% of these

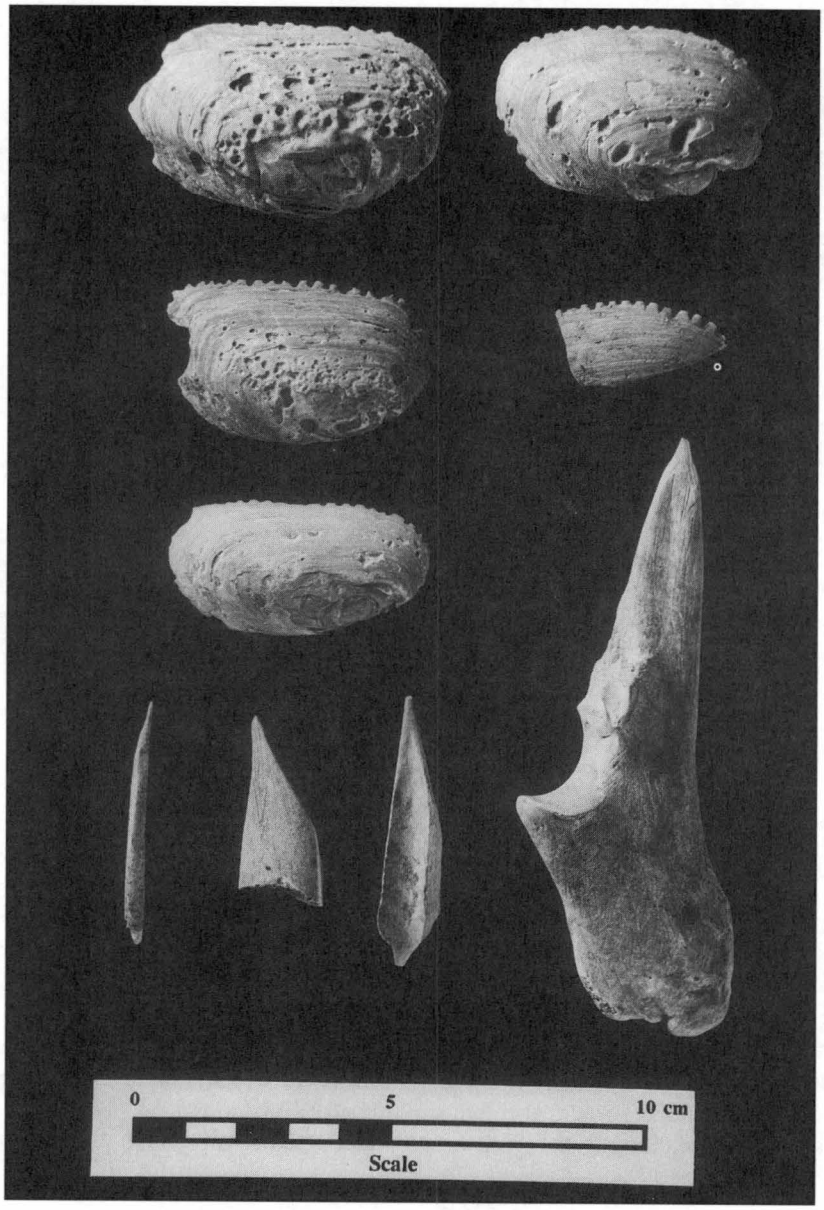

Figure 6.23. Bone and shell artifacts from the George Rogers site.

individuals are mammals, 3% are birds, 28% are reptiles, 3% are amphibians, and 31% are fish.

Mammals

White-tailed deer (MNI=3) and three members of the family Cricetidae (mice and rats) are the only mammals represented by more than one individual. Other identified mammals are opossum, short-tailed shrew, rabbit, fox squirrel, beaver, black bear, and raccoon. No remains of domesticated mammals are represented in the sample.

Birds

Turkey (MNI=1) was the only bird identified at the George Rogers site. Bird remains make up an unusually small percentage (less than one percent) of the faunal material recovered from the George Rogers site.

Reptiles and Amphibians

Reptiles identified in the faunal assemblage include a minimum of five box turtles, two snapping turtles, and one painted turtle. Other reptiles in the assemblage include one member of the family Colubridae (non-poisonous snakes) and one member of the family Crotalidae (poisonous snakes). Amphibians are represented by a single individual which could only be identified as either a frog or a toad.

Fish

The remains of fish comprise nearly 60% of all the bone fragments recovered from the George Rogers site. As noted above, most of these are fish scales. A

Table 6.4. Faunal remains from the George Rogers site.

Species	Count N	Count %	Weight Grams	Weight %	MNI N	MNI %
Mammals						
Unidentified	2100	21.03	1562.00	44.02	-	-
Didelphus virginiana, Opossum	10	0.10	13.01	0.37	1	2.78
Blarina brevicauda, Short-tailed Shrew	1	0.01	0.01	<0.01	1	2.78
Sylvilagus sp., Rabbit	2	0.02	0.17	0.00	1	2.78
Sciurus sp., Squirrel	65	0.65	6.93	0.20	-	-
Sciurus niger, Fox Squirrel	1	0.01	0.50	0.01	1	2.78
Castor canadensis, Beaver	1	0.01	5.30	0.15	1	2.78
Cricetidae, Mice & Rats	21	0.21	0.26	0.01	3	8.33
Ursus americanus, Black Bear	1	0.01	5.60	0.16	1	2.78
Procyon lotor, Raccoon	1	0.01	2.80	0.08	1	2.78
Artiodactyla, Even-toed Ungulates	4	0.04	0.40	0.01	-	-
Odocoileus virginianus, White-tailed Deer	273	2.73	1525.42	42.99	3	8.33
Sub-Total	2480	24.84	3122.40	87.99	13	36.11
Birds						
Unidentified	11	0.11	2.86	0.08	-	-
Meleagris gallapavo, Turkey	3	0.03	4.90	0.14	1	2.78
Sub-Total	14	0.14	7.76	0.22	1	2.78
Reptiles						
Turtle, Unidentified	219	2.19	62.71	1.77	-	-
Terrapene carolina, Box Turtle	138	1.38	124.20	3.50	5	13.89
Chrysemis picta, Painted Turtle	2	0.02	2.00	0.06	1	2.78
Chelydra serpentina, Snapping Turtle	18	0.18	28.40	0.80	2	5.56
Snake, Unidentified	91	0.91	1.99	0.06	-	-
Colubridae, Non-poisonous Snakes	5	0.05	1.06	0.03	1	2.78
Crotalidae, Poisonous Snakes	5	0.05	0.42	0.01	1	2.78
Sub-Total	478	4.79	220.78	6.22	10	27.78
Amphibians						
Rana/Bufo sp., Frog or Toad	15	0.15	0.28	0.01	1	2.78
Fish						
Unidentified	5915	59.24	41.18	1.16	-	-
Lepisosteus sp., Gar	21	0.21	0.59	0.02	1	2.78
Ictalurus sp., Catfish	10	0.10	2.12	0.06	8	22.22
Catastomus sp., Suckers	12	0.12	0.49	0.01	1	2.78
Lepomis sp., Sunfish	11	0.11	0.52	0.01	1	2.78
Sub-Total	5969	59.78	44.90	1.27	11	30.56
Unidentified	1029	10.31	152.31	4.29	-	-
Total	9985	100.00	3548.43	100.00	36	100.00

minimum of eight catfish, one gar, one sucker, and one sunfish are represented by these fragments.

Modified Bone

Approximately 18% of the bone fragments are burned. Eight fragments of deer bone and four unidentified mammal bone fragments show signs of having been gnawed by dogs. Three other deer bone fragments exhibit rodent tooth marks. Only two bone fragments (one deer and one unidentified mammal) display cut marks, presumably from butchering.

Shell

Numerous freshwater mussel and snail shells were recovered from Features 1, 2, 3, 5, and 7. Minor quantities of mussel shell were collected from Features 4, 6, and 8. Mollusks probably were taken from nearby Alamance Creek. These specimens have not

been analyzed beyond preliminary sorting and quantification.

Summary

The faunal sample from the George Rogers site, though small, is similar to the sample recovered from the Edgar Rogers site and indicates the exploitation of a diverse range of terrestrial and aquatic species. White-tailed deer was the most important meat source; however, various other large and small mammals were taken for meat and pelts, and fishing also appears to have been a significant subsistence pursuit. At least some of the identified species (e.g., mice and rats, shrew, frogs, and toads) may represent "site dwellers" rather than exploited animals.

Botanical Remains

by

Kristen J. Gremillion

Carbonized plant remains from the George Rogers site were recovered from 27 flotation samples representing 261 liters of feature fill (Tables 6.5, 6.6, and 6.7). Other plant remains from waterscreened fill were not analyzed. A total of 202.03 grams of wood charcoal, nutshell, seeds, and other charred plant remains was recovered from all excavated features.

Nutshell

Of the three nutshell types found at the George Rogers site, hickory is highest by weight, followed by walnut and acorn. Percentage of walnut shell (7.5%) is somewhat higher than at the historic Fredricks site (1.0%). Hickory also ranks highest of the three nut types based upon ubiquity, but acorn is a close second.

Cultigens

Crop plants at George Rogers are represented primarily by maize and common bean; however, neither of these plants occurs in abundance. Maize cupules and kernels comprise only 3.5% of total plant food remains, compared to 28.4% at the Fredricks site. A single common bean cotyledon was recovered from Feature 7. (Beans also were recovered from Feature 4 but were not part of analyzed flotation sample.) In addition to these Mesoamerican crops, one seed of the native Eastern cultigen sunfower was found in each of three features. Using size conversion factors suggested by Yarnell (1978), the two measurable specimens (10.0 mm by 4.8 mm and 6.1 mm by 3.2 mm) produce estimated uncarbonized achene dimensions of 13.0 mm by 7.0 mm and 7.9 mm by 4.6 mm, respectively.

Two starchy grains, knotweed and chenopod, were found in small numbers at the George Rogers site. Although species of both of these indigenous genera were crop plants in some parts of the East, their limited representation here does not argue convincingly for husbandry.

Seeds

All fleshy fruits recovered from George Rogers (i.e., strawberry, persimmon, grape, sumac, and hawthorn) also were found at the Fredricks site. Of these, persimmon and grape had both the largest numbers and highest ubiquity values.

Summary

The George Rogers site appears to represent a dispersed community comprised of a relatively small number of households. Though larger than the Edgar Rogers site, the distribution and types of features indicate a similar site structure. The pottery and radiocarbon dates also suggest that both were occupied at about the same time during the late Hillsboro phase, just prior to the advent of European contact. Apparently these communities were more dispersed than earlier palisaded communities such as the Wall site but less so than many Haw River phase settlements.

Food remains indicate a varied and mixed diet of wild and domesticated species. White-tailed deer, opossums, rabbits, squirrels, and other mammals were hunted while fish were taken from Great Alamance Creek. Hickory nuts, walnuts, and acorns provided a seasonally available supply of wild plant foods, and corn, beans, and sunflowers were cultivated in small garden plots probably scattered among the households.

The partial posthole pattern suggests that the inhabitants lived in circular houses similar to those at the Wall site and later sites such as Upper Saratown. If the structure is circular, it stands in contrast to later structures within the Haw and Eno river drainages. At the Mitchum, Fredricks, and Jenrette sites, the typical domestic structures were oval in outline and, at Jenrette and Fredricks, usually were constructed using wall trenches rather than individually-set posts.

Although the site area at George Rogers covers less than an acre, Hillsboro phase artifacts are widely scattered both upstream and downstream from the site and suggest that a series of small, related communities were situated along Alamance Creek. Some of these probably were contemporary and may have been loosely organized along lines of kinship—sharing spouses, language, resources, and rituals.

Table 6.5. Carbonized plant remains from the George Rogers site (weight in grams).

Context	Soil Volume (liters)	Wood Charcoal	Unknown Plant	Unidentified Bud	Root or Tuber	Plant Food Remains	Total
Feature 1							
Zone 1	50	34.07	2.93	<0.005	0.03	20.32	57.35
Feature 2							
Zone 1	20	15.92	0.61	-	-	4.58	21.11
Zone 2	20	34.27	0.70	-	0.02	2.52	37.51
Zone 3	20	0.44	0.09	-	0.01	0.32	0.86
Sub-total	60	50.63	1.40	-	0.03	7.42	59.48
Feature 3							
Ash Lens	20	2.63	0.20	-	-	6.88	9.71
Zone 1	20	2.00	0.38	-	-	3.40	5.78
Sub-total	40	4.63	0.58	-	-	10.28	15.49
Feature 4							
Ash Lens	1	0.14	0.03	-	-	0.22	0.39
Zone 2	20	9.15	0.57	-	-	4.89	14.61
Sub-total	21	9.29	0.60	-	-	5.11	15.00
Feature 5							
Zone 1	10	0.17	0.05	0.08	-	-	0.30
Feature 6							
Zone 1	10	0.10	-	-	-	0.07	0.17
Feature 7							
Zone 1	10	16.74	0.71	-	-	8.45	25.90
Zone 2	10	1.43	0.03	-	0.01	0.25	1.72
Zone 3	10	5.95	0.44	-	-	0.60	6.99
Zone 4	10	15.61	1.09	-	-	0.31	17.01
Zone 5	10	0.39	0.02	-	-	0.01	0.42
Ash Lens	10	1.35	0.10	-	-	0.28	1.73
Sub-total	60	41.47	2.39	-	0.01	9.90	53.77
Feature 8							
Zone 1	10	0.51	0.02	-	-	0.04	0.57
Total	261	140.87	7.97	<0.005	0.07	53.22	202.13

Table 6.6. Plant food remains from the George Rogers site (weight in grams).

Context	Hickory Shell	Hickory Nutmeat	Acorn Shell	Acorn Meat	Walnut Shell	Maize Kernels	Maize Cupules	Common Bean	Seeds	Total
Feature 1										
Zone 1	14.46	2.82	1.03	0.09	-	0.02	0.04	-	1.86	20.32
Feature 2										
Zone 1	4.41	-	0.14	-	0.01	0.01	-	-	0.01	4.58
Zone 2	2.10	-	0.19	-	0.15	-	-	-	0.08	2.52
Zone 3	0.22	-	0.04	-	0.02	-	0.01	-	0.03	0.32
Sub-total	6.73	-	0.37	-	0.18	0.01	0.01	-	0.12	7.42
Feature 3										
Ash Lens	6.48	-	0.07	-	0.04	0.03	0.01	-	0.25	6.88
Zone 1	2.76	-	0.03	-	0.06	0.01	0.41	-	0.13	3.40
Sub-total	9.24	-	0.10	-	0.10	0.04	0.42	-	0.38	10.28
Feature 4										
Ash Lens	-	-	0.01	-	0.21	-	-	-	-	0.22
Zone 2	-	-	0.05	-	3.38	0.27	-	-	1.19	4.89
Sub-total	-	-	0.06	-	3.59	0.27	-	-	1.19	5.11

Table 6.6 Continued.

Context	Hickory Shell	Hickory Nutmeat	Acorn Shell	Acorn Meat	Walnut Shell	Maize Kernels	Maize Cupules	Common Bean	Seeds	Total
Feature 5										
Zone 1	0.08	-	-	-	-	-	-	-	-	0.08
Feature 6										
Zone 1	0.07	-	-	-	-	-	-	-	-	0.07
Feature 7										
Zone 1	7.34	-	0.16	-	-	0.13	0.73	-	0.09	8.45
Zone 2	0.17	-	-	-	-	0.08	-	-	-	0.25
Zone 3	0.24	-	0.18	-	0.12	0.03	0.02	-	0.01	0.60
Zone 4	0.07	-	0.20	-	-	0.03	-	-	0.01	0.31
Zone 5	0.01	-	-	-	-	-	-	-	-	0.01
Ash Lens	0.10	-	0.12	-	-	-	-	0.06	-	0.28
Sub-total	7.93	-	0.66	-	0.12	0.27	0.75	0.06	0.11	9.90
Feature 8										
Zone 1	-	-	0.02	-	0.01	-	0.01	-	<0.005	0.04
Total	38.51	2.82	2.24	0.09	4.00	0.61	1.23	0.06	3.66	53.22

Table 6.7. Seed and fruit counts from the George Rogers site.

Context	Cheno-pod	Knot-weed	Straw-berry	Persim-mon	Grape	Sumac	Haw-thorn	Bed-straw	Sun-flower	Common Bean	Maize Kernels	Fab-aceae	Solan-aceae	Unknown	Total
Feature 1															
Zone 1	1	-	-	5	-	1	2	-	1	-	1	5	-	12	28
Feature 2															
Zone 1	-	-	-	-	-	-	-	-	-	-	1	1	-	-	2
Zone 2	-	-	-	1	1	-	-	-	-	-	-	1	-	-	3
Zone 3	-	-	-	1	-	-	-	-	-	-	-	1	-	2	5
Sub-total	-	-	-	2	1	-	-	-	-	-	1	3	-	2	9
Feature 3															
Ash Lens	-	-	1	4	1	-	-	1	-	-	4	4	-	9	24
Zone 1	-	-	-	3	-	-	-	-	-	-	1	3	-	3	10
Sub-total	-	-	1	7	1	-	-	1	-	-	5	7	-	12	34
Feature 4															
Zone 2	-	-	-	20	-	-	-	-	1	-	9	-	-	6	36
Feature 7															
Zone 1	-	-	-	2	2	-	-	-	1	-	5	2	-	6	18
Zone 2	-	-	-	-	-	-	-	-	-	-	2	-	-	1	3
Zone 3	-	-	-	1	-	-	-	-	-	-	2	-	2	2	7
Zone 4	-	-	-	1	-	-	-	-	-	-	1	-	-	2	4
Zone 5	-	-	-	-	-	-	-	-	-	-	1	-	-	-	1
Ash Lens	-	1	-	-	-	-	-	-	-	1	1	-	-	-	3
Sub-total	-	1	-	4	2	-	-	-	1	1	12	2	2	11	36
Feature 8															
Zone 1	-	-	-	-	1	-	-	-	-	-	-	-	-	-	1
Total	1	1	1	38	5	1	2	1	3	1	28	17	2	43	144

Chapter 7

The Mitchum Site

The Mitchum site (RLA-Ch452; 31Ch452) is located along the right descending bank of the Haw River in northern Chatham County, North Carolina, almost directly across the river from the Webster site (Figures 7.1 and 7.2). The Mitchum site is situated near the northern end of a low alluvial terrace, between the Haw River and a steep ridge to the west that is broken only by a small, unnamed tributary to the south of the site. Although the floodplain here is not as wide as at the Webster site, it extends along the river for a distance almost twice that of the Webster site bottomland. Local collectors reported the Mitchum site to the Research Laboratories of Anthropology in 1982, after it had been looted for several years.

The site was initially tested during the summer of 1983 when an 800-sq-ft area was excavated (Dickens et al. 1987). This earlier work exposed a single subrectangular house (Structure 1), a human burial, and 14 other associated features. Most of the features, as well as the burial, contained glass trade beads. The burial also produced two brass or copper ear ornaments (Petherick 1987; Ward 1987). After the excavations in 1983, the Mitchum site was interpreted as a mid-seventeenth-century historic, nucleated village. Ethnohistoric accounts of Indian peoples in piedmont North Carolina during this period further suggested that the site probably was a Sissipahaw village (see Lefler 1967:60).

During the fall of 1986, fieldwork was directed toward sampling the areas adjacent to Structure 1 in order to locate additional features and determine the structure's placement within the village. The identification of features initially involved systematic auger testing (approximately 300 auger tests) at 2.5-ft intervals within two 25-ft by 50-ft and 10-ft by 30-ft areas adjacent to the 1983 excavation. Numerous features were encountered in these areas, and 25 contiguous 10-ft by 10-ft squares were subsequently excavated here (Figure 7.3).

These excavations exposed 20 additional features, a human burial, a 20-ft segment of the village palisade, and numerous other postholes. Two squares (Sq. 340R660 and Sq. 350R660) within this excavation block, located just outside the palisade, contained a buried midden that ranged from 0.2-2.0 ft in thickness. Approximately 200 cu ft of this deposit were sampled stratigraphically (Figure 7.4).

Near the center of the site, an additional 10-ft by 10-ft square was excavated which exposed four pit features (Figure 7.5). The burial and all the features were mapped and excavated (Figures 7.6 and 7.7). All feature fill was carefully waterscreened through 1/2-inch, 1/4-inch, and 1/16-inch mesh (Figure 7.8). Standard-sized flotation samples also were retrieved and processed. In all, the 1986 excavations at Mitchum exposed 2,643 sq ft and sampled 24 archaeological features.

Stratigraphy

The uppermost stratigraphic unit at the Mitchum site was a medium brown, sandy loam plowzone that contained a variety of artifacts dating to the prehistoric and historic periods (Figure 7.9). This zone varied in depth from a little over 0.5 ft at the eastern end of the excavated area to 1.2 ft in the southern half of the block excavation. Beneath the plowzone lay a light brown, organically enriched sand that has been interpreted as the lower portion of a humic topsoil that developed while the site was occupied during the Contact period (Petherick 1987:49).

Over most of the site, this humus or midden zone was thin, averaging less than 0.2 ft in thickness; however, at the northern end of the excavation, it dipped rapidly and increased in thickness to over 1.6 ft. Still, the upper level contained most of the artifacts and rather than being homogeneous, this humus or midden graded into the subsoil stratum. Augering revealed that the thick humus zone extended no more than 50 ft on either side of the excavation trench. Apparently, this area represents an old washout created during a flood at some point prior to the site's major occupation.

The final stratigraphic zone identified at the Mitchum site was a yellow sandy subsoil. This stratum was culturally sterile except for the postholes and pits that intruded into it from the humus/midden zone. The interface between the humus/midden and subsoil was not sharply demarcated but more often appeared as a transitional band with decreased organic staining as depth increased. Often, the bottoms of excavation units needed to be flat-shoveled more than once to clearly reveal feature stains and postholes on the subsoil surface.

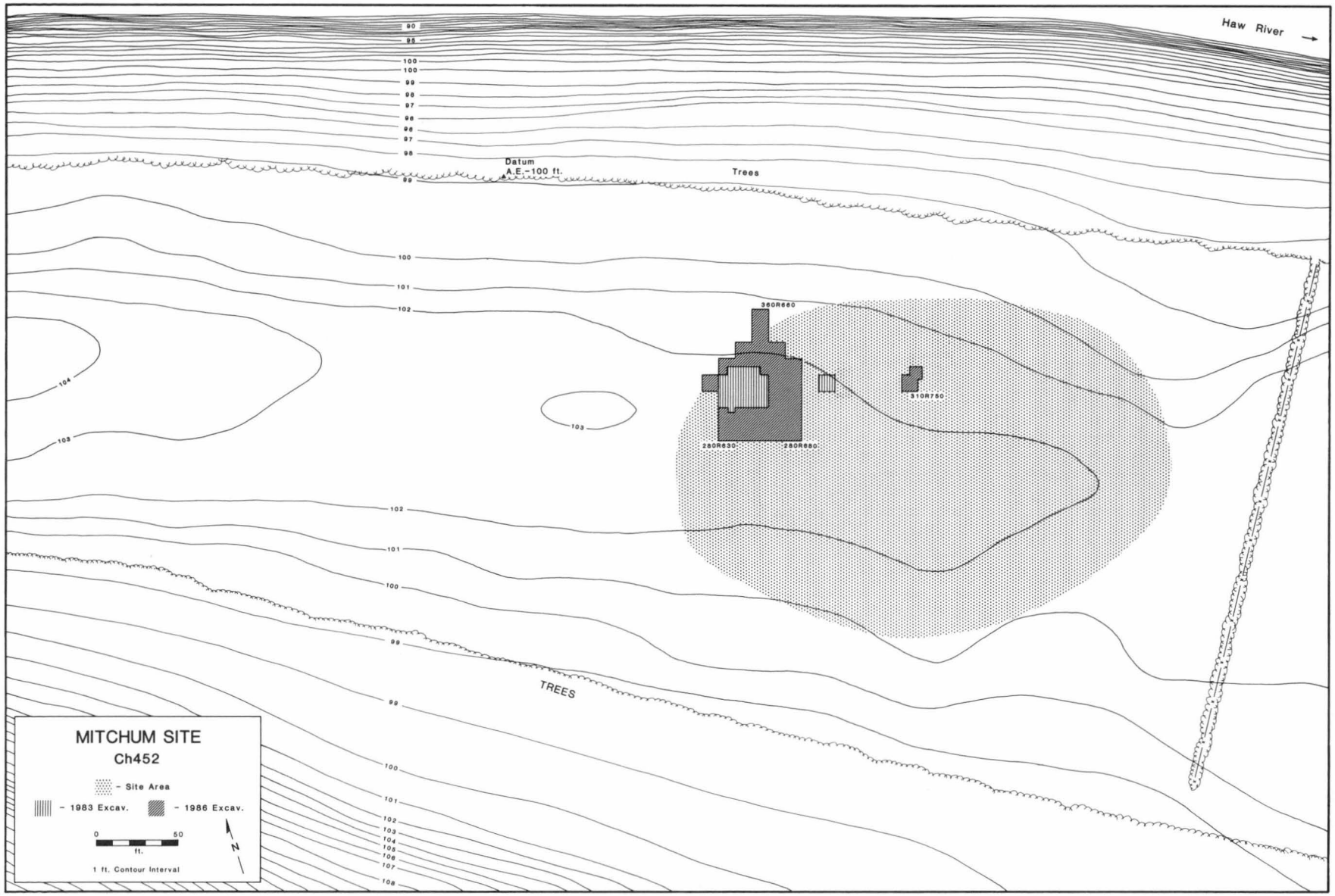

Figure 7.1. Map of the Mitchum site showing excavated areas.

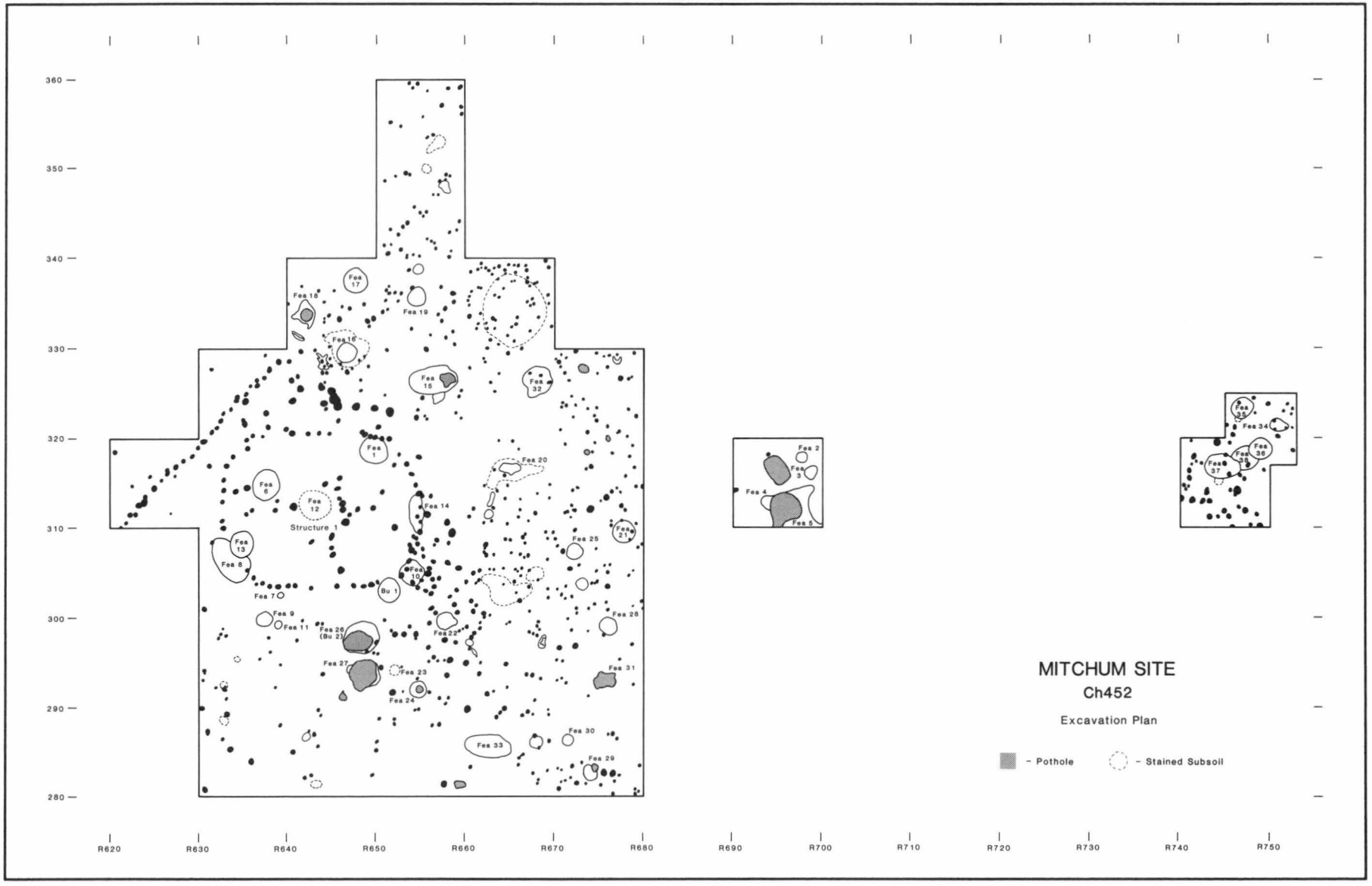

Figure 7.2. Excavation plan at the Mitchum site.

Figure 7.3. General view of excavation at the Mitchum site.

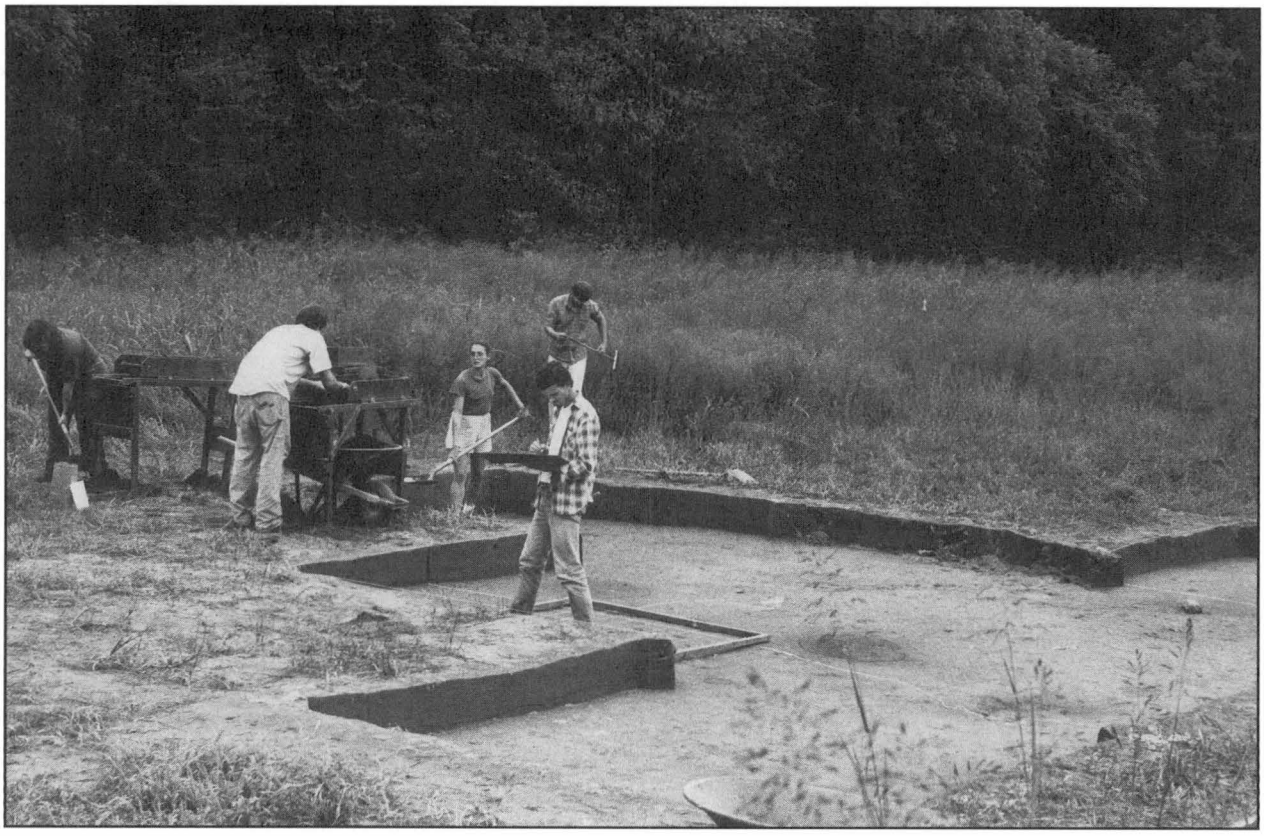

Figure 7.4. Excavating the old humus at the Mitchum site.

Figure 7.5. Plotting an excavated square at the Mitchum site.

Figure 7.6. Excavating Feature 15 at the Mitchum site.

Figure 7.7. Plotting Feature 16 after excavation.

Figure 7.8. Waterscreening feature fill.

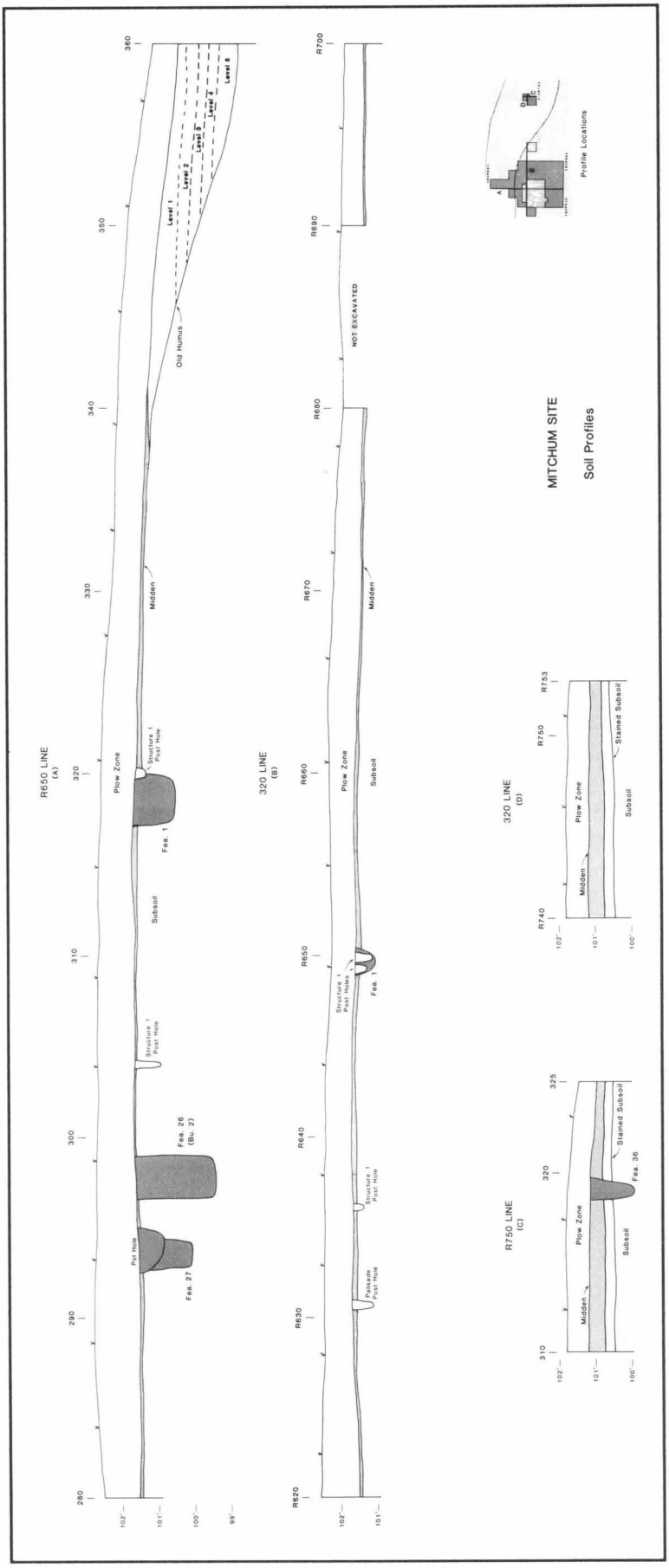

Figure 7.9. Stratigraphic profiles.

Table 7.1. Summary of features identified at the Mitchum site.

Feature No.	Type	Center Location	Dimensions (ft) L	W	D	Phase Association	Comment
Fea. 1	Pit	318.8R649.8	3.2	2.9	0.9	Mitchum	Excavated in 1983
Fea. 2	Large Posthole	317.9R697.7	1.1	1.0	0.8	Mitchum	Excavated in 1983
Fea. 3	Small Pit	316.1R698.7	1.6	1.6	0.9	Mitchum	Excavated in 1983
Fea. 4	Shallow Basin	313.0R694.0	1.7	1.1	0.2	Mitchum	Excavated in 1983
Fea. 5	Large Basin	312.0R697.5	4.7	4.5	0.2	Mitchum	Excavated in 1983
Fea. 6	Deep Pit	314.7R637.7	3.6	3.1	2.0	Mitchum	Excavated in 1983
Fea. 7	Smudge Pit	302.6R639.4	0.7	0.7	0.3	Mitchum	Excavated in 1983
Fea. 8	Large Basin	306.5R633.5	5.6	2.9	0.6	Mitchum	Excavated in 1983
Fea. 9	Deep Basin	299.8R637.5	2.0	1.7	0.6	Mitchum	Excavated in 1983
Fea. 10	Deep Pit	305.0R654.0	2.5	2.5	1.2	Mitchum	Excavated in 1983
Fea. 11	Smudge Pit	296.3R639.0	0.9	0.9	0.4	Mitchum	Excavated in 1983
Fea. 12	Hearth	312.5R643.0	4.0	3.8	-	Mitchum	Excavated in 1983
Fea. 13	Deep Pit	308.2R634.9	2.9	2.7	2.8	Mitchum	Excavated in 1983
Fea. 14	Shallow Basin	311.7R654.5	4.0	1.7	0.4	Mitchum	Excavated in 1983
Fea. 15	Large Basin	326.8R656.5	5.4	4.2	0.8	Mitchum ?	Excavated
Fea. 16	Storage Pit	329.5R648.0	2.5	2.5	1.7	Mitchum ?	Excavated
Fea. 17	Storage Pit	337.5R647.8	2.9	2.7	2.0	Mitchum	Excavated
Fea. 18	Tree Disturbance	333.8R642.0	3.3	2.5	0.9	—	Excavated
Fea. 19	Shallow Basin	336.5R654.6	2.5	2.0	0.4	Mitchum ?	Excavated
Fea. 20	Tree Disturbance	306.6R664.9	4.5	2.0	1.0	—	Excavated
Fea. 21	Pit	309.5R677.8	2.7	2.5	1.0	Mitchum	Excavated
Fea. 22	Tree Disturbance	299.7R657.8	2.0	2.0	2.8	—	Excavated
Fea. 23	Smudge Pit	294.3R652.1	1.2	1.1	0.3	Mitchum ?	Excavated
Fea. 24	Storage Pit	292.0R654.8	2.0	1.9	1.7	Mitchum ?	Excavated
Fea. 25	Large Posthole	307.3R672.3	1.7	1.6	1.7	Mitchum ?	Excavated
Fea. 26 (Bu. 2)	Burial	297.8R648.5	4.2	3.7	2.4	Mitchum	Excavated
Fea. 27	Storage Pit	293.8R649.5	1.9	1.5	1.7	Mitchum	Excavated
Fea. 28	Pit	299.0R376.0	2.1	2.0	1.1	Mitchum ?	Excavated
Fea. 29	Pit	282.8R674.0	1.8	1.7	1.1	Mitchum	Excavated
Fea. 30	Large Posthole	286.3R671.4	1.5	1.4	1.5	Mitchum ?	Excavated
Fea. 31	Pot Hole	293.0R675.7	2.8	1.8	1.8	—	Excavated
Fea. 32	Shallow Basin	326.3R688.0	3.7	3.1	1.1	Mitchum	Excavated
Fea. 33	Basin	285.8R622.5	5.1	2.5	1.5	Mitchum ?	Excavated
Fea. 34	Hearth	321.4R750.9	2.0	1.4	0.4	Mitchum ?	Excavated
Fea. 35	Basin	323.3R747.9	2.5	2.5	0.6	Mitchum ?	Excavated
Fea. 36	Storage Pit	319.8R749.9	2.7	2.5	1.3	Mitchum	Excavated
Fea. 37	Large Basin	316.7R744.9	4.1	2.6	1.6	Mitchum	Excavated
Fea. 38	Storage Pit	317.8R747.3	3.7	3.7	2.9	Mitchum	Excavated
Bu. 1	Burial	303.2R651.5	2.9	2.5	2.8	Mitchum	Excavated in 1983

Features and Burials

Fourteen features and one burial were excavated in 1983 and have been reported elsewhere (Petherick 1987). During the 1986 investigations (reported herein), 23 additional features (Features 15 to 25 and 27 to 38) and one burial (Feature 26/Burial 2) were excavated (Table 7.1). Considerable variety exists in the Mitchum site features. Several of the features can be classed as storage facilities. Although these were of varying size, they all tended to be circular, relatively deep, and had cylindrical or bell-shaped profiles. More enigmatic are a series of relatively shallow, basin-shaped pits that contained comparatively little cultural material. Most of these were less than 3 ft in diameter and less than 1 ft deep. Some of the larger basin-like depressions may represent unconformities in the original site surface that collected humus and subsequently were protected from modern plowing.

In contrast to most sites excavated in the Piedmont, the subsoil at Mitchum is very sandy, which sometimes made feature excavation and interpretation difficult. Regardless of the primary function of the Mitchum site pits, the deeper ones were rapidly filled with topsoil

once they were not longer suited for their primary purposes. The sandy character of the soil would have caused rapid slumping if the pits had been left open for any appreciable length of time. There was no evidence of such slumping even in the deepest features.

Features excavated during the 1986 investigations at the Mitchum site are described below.

Feature 15

This feature, located northeast of Structure 1, was observed at the top of subsoil as a large oval stain of dark brown (10YR 3/3) mottled fill that contained bits of fired clay and charcoal (Zone 1) (Figure 7.10). A relatively small, irregularly-shaped pothole intruded the east end of the feature. The pothole fill contained several large, angular, granitic rocks within a matrix of yellowish brown (10YR 4/4) soil (Zone 2). Given the fact that the rock cluster was restricted to the area of the pothole and the distinct characteristics of the fill surrounding the rocks, a separate pit feature that was subsequently potted may have intruded Feature 15. Aside from the rocks associated with Zone 2 and a few fragments of animal bone from Zone 1, the feature contained little cultural material. After excavation, it measured 5.4 ft by 4.2 ft and had an average depth of 0.8 ft.

Feature 15 apparently represents a natural depression that collected humic topsoil associated with the site's occupation. The pothole at the east end of the feature probably obliterated a small intrusive pit of indeterminate function.

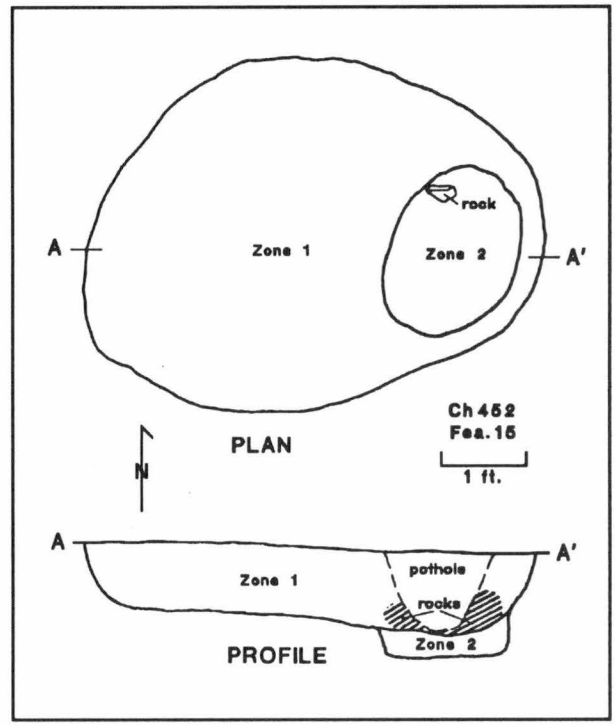

Figure 7.10. Feature 15, plan view and profile drawings.

Feature 16

This pit feature was centered at 329.5R648. At the subsoil surface, it was represented by three fill zones. Zone 1 contained a dark reddish brown (5YR 3/3) fill with fired clay and charcoal particles that covered over half of the pit's surface. This fill partially surrounded Zone 2 which was characterized by a very distinct, ashy, dark brown (10YR 3/3) stain containing well-preserved animal bones and shell. Zones 1 and 2 were surrounded by a collar of more diffuse dark brown (10YR 2/3) mottled fill.

Zone 1 averaged a little less than 0.1 ft in thickness and contained very little cultural material. Zone 2, on the other hand, produced several animal bones, mussel shells, and a cut-shell scraper. This zone extended to a depth of 0.8 ft below the subsoil and lay atop Zone 3. Zone 3 contained a few fragments of animal bone and daub. Beneath Zone 3 and resting on the pit bottom was a 0.3-ft thick lens of virtually sterile, yellowish brown (10YR 5/4) clay.

The feature was circular in outline with a diameter of 2.5 ft. It reached a depth of 1.7 ft below the subsoil surface. The sides sloped slightly inward to intersect a flat bottom. Its dimensions and configuration suggest a storage facility that was perhaps lined with clay, at least on the bottom. The pit appears initially to have been filled with village humus (Zone 2) that slumped as it settled. The resulting depression was filled with soil (Zones 1 and 2) collected during the process of cleaning around domestic hearth areas.

Feature 17

Located northeast of Feature 18 was another circular pit. It was defined at the base of the plowzone by a circular patch of dark brown (7.5YR 4/4) mottled sand that contained flecks of fired clay and charcoal (Zone 1) (Figure 7.11). This zone yielded several potsherds and animal bone fragments, and was very similar to Zone 2 of Feature 16. Zone 1, at its thickest point, measured a little over 0.6 ft. Beneath this zone was a layer of yellowish brown (10YR 3/4) sandy soil with bits of charcoal (Zone 2). Although not as rich as Zone 1, Zone 2 also produced pottery and animal bone, including an intact turtle carapace. Zone 2 averaged a little over a foot in thickness and rested on a thin (0.3 ft) layer of lighter colored, yellowish brown (10YR 5/4) mottled sand. Except for a few rocks and flecks of charcoal, this zone was relatively sterile and probably represents a transitional layer between the pit bottom and subsoil (Figure 7.12).

After excavation the pit measured 2.9 ft by 2.7 ft and was 2.0 ft deep (Figure 7.13). The sides of the pit were generally straight and the bottom was flat. Apparently, this pit was initially excavated to serve as a storage facility. Based on fill attributes such as color and artifact content, the pit was later filled with village

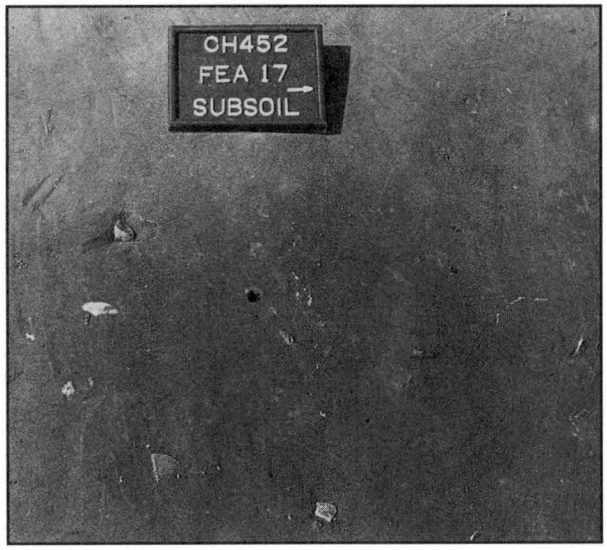

Figure 7.11. Feature 17, before excavation.

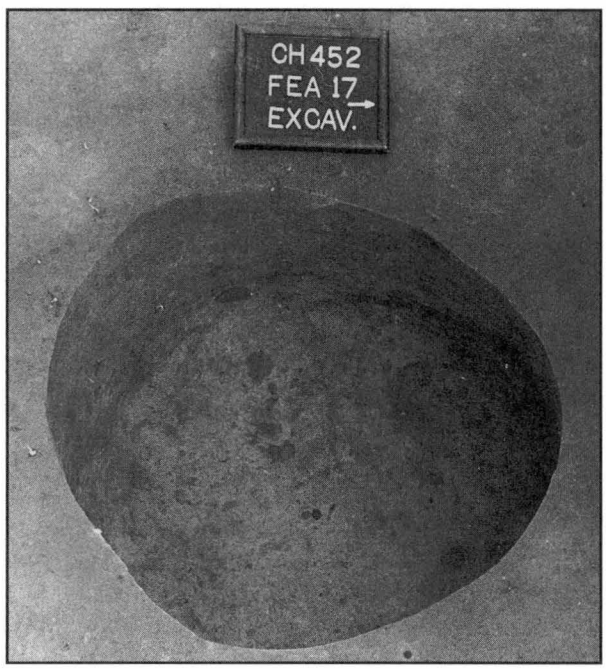

Figure 7.12. Feature 17, excavated.

humus which eventually slumped, creating a basin-like depression. This cavity provided a receptacle for soil collected during the course of domestic cleaning activities.

Feature 18

This designation was assigned to an amorphous charcoal-flecked stain located at 333.7R642. A pothole 1.5 ft in diameter and 0.5 ft deep had been dug into the center of this stain. Excavation revealed an uneven bottom with a maximum depth of 0.9 ft. Small pockets of concentrated wood charcoal occurred throughout the

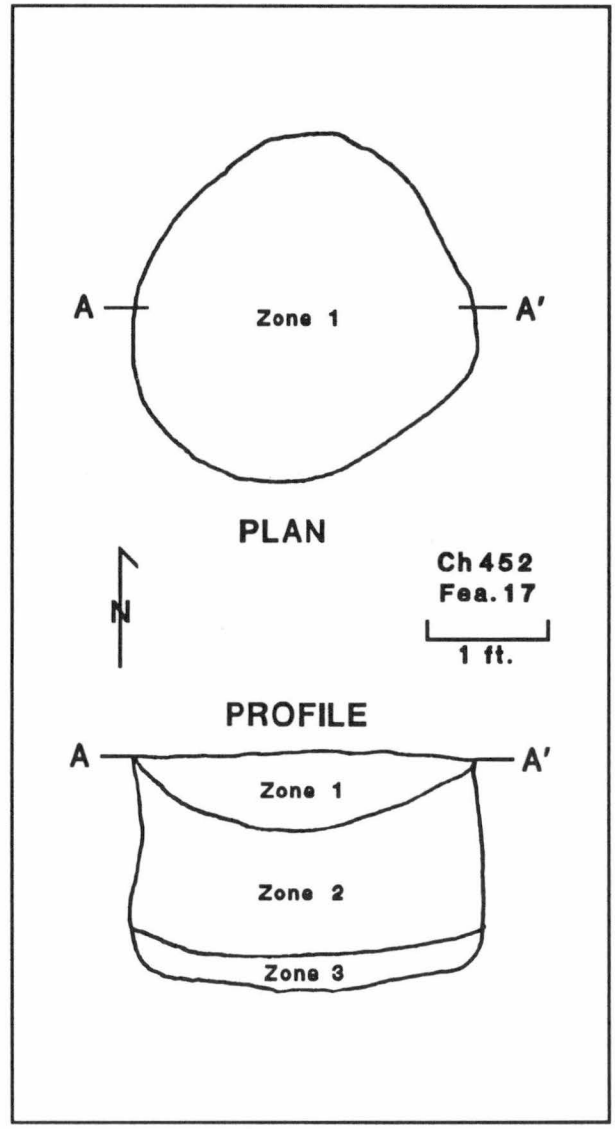

Figure 7.13. Feature 17, plan view and profile drawings.

fill; however, only a single potsherd was recovered. This feature's irregular outline and uneven bottom, in conjunction with fill attributes, suggest that it probably represents a burned tree disturbance.

Feature 19

This feature appeared on the subsoil surface as an oblong stain of dark reddish brown (5YR 3/4) fill, designated Zone 1. Excavation uncovered a very shallow pit with a basin-shaped profile. The feature extended only 0.4 ft into the subsoil, and contained no artifacts. In plan, the feature measured 2.5 ft by 2.0 ft. Feature 19 probably represents an old surface unconformity or depression where village humus collected and was protected from the plow.

Feature 20

This designation was assigned to an oval stain of dark brown (10YR 3/3) mottled fill (Zone 1) that was

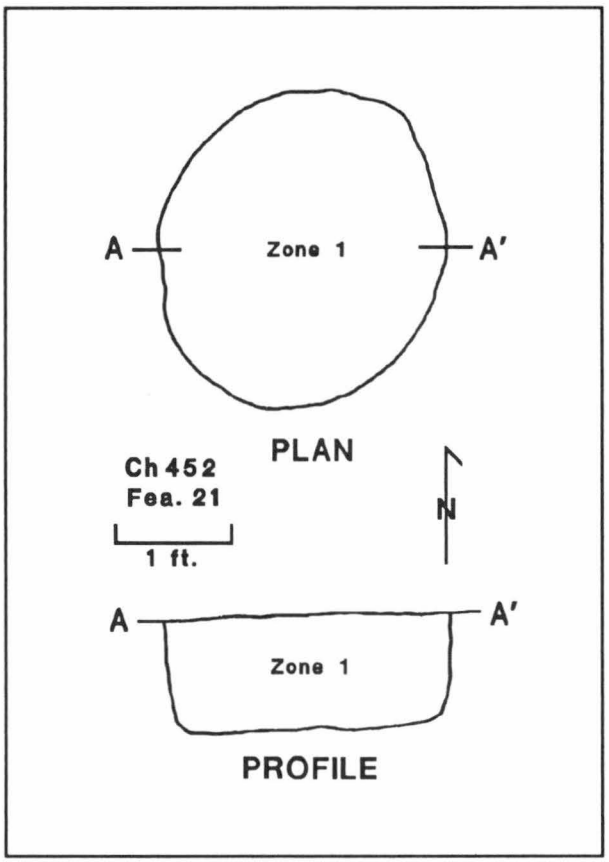

Figure 7.14. Feature 21, plan view and profile drawings.

surrounded by a vague irregular collar of yellowish brown (10YR 4/4) fill (Zone 2). Zone 1 produced a few small fragments of charcoal and animal bone but no artifacts. Zone 2 was sterile and quickly disappeared after re-troweling. The slightly darker fill was contained within a relatively small pit with a cone-shaped bottom and irregular sides. Overall measurements (including Zone 2) in plan view were 4.5 ft by 2.0 ft. It is suspected that this feature represents another tree disturbance where village humus was deposited through natural processes.

Feature 21

At the subsoil surface this pit was described as a small (1 ft in diameter), circular patch of dark brown (7.5YR 4/4) fill with flecks of charcoal and fired clay (Zone 1), surrounded by a vague irregular-shaped mottled area. However, as excavation proceeded, the central zone expanded into a fairly large, circular, well-defined deposit. The mottling originally described resulted from the blending of plowed soil with the upper feature fill. Artifacts recovered from the pit included a few potsherds, small animal bone fragments, three projectile points, and several daub fragments. Most of the cultural remains were concentrated in the upper portion of Zone 1. After excavation, the pit measured 2.7 ft by 2.5 ft and had an interior depth of 1.0 ft. The sides sloped slightly inward and the bottom was flat (Figure 7.14).

The configuration of Feature 21 suggests that it served as a storage facility; however, its shallow depth would seem to preclude such a function. The homogeneous nature of the deposit indicates that the pit was quickly re-filled with village humus. The slight concentration of remains in the upper portion of Zone 1 may have resulted from an additional surface accumulation of remains embedded by trampling.

Feature 22

This designation was given to a circular stain of mottled brown (7.5YR 4/4) sand (Zone 2) that surrounded an irregularly-shaped patch of very dark grayish brown (10YR 3/2) sand containing small charcoal and bone fragments (Zone 1). A few potsherds also were recovered from both zones.

Excavation revealed a fairly deep, U-shaped pit with a small cone-like projection penetrating the bottom. The pit measured 2.0 ft in diameter and had a total depth of 2.8 ft beneath the subsoil surface. This feature is interpreted as a burned tree disturbance. The soil comprising Zone 1 probably represents village humus that filled the depression after the tree was destroyed. The small projection at the bottom may have been made by a tap root, perhaps from a pine tree.

Feature 23

This small, circular concentration of charcoal and ash was observed wholly within the flatshoveling level of Sq. 290R660. The area of concentration measured a little over 1.0 ft in diameter and was 0.3 ft thick. No artifacts were recovered. This feature may have been a small firepit or smudge pit that was recently disturbed by plowing.

Feature 24

This feature was observed at the top of the subsoil in Sq. 290R660 as a nearly circular stain of dark yellowish brown (10YR 3/4) fill with charcoal flecks (Zone 1). A small (0.8 ft in diameter) pothole had been dug into the center of the feature. Neither the pothole nor the Zone 1 fill contained many artifacts.

After excavation, the pit measured 2.0 ft by 1.9 ft and had a depth of 1.7 ft (Figure 7.15). The sides of the pit were straight and the bottom was flat. The pothole left a conical disturbance that extended almost to the pit bottom. The size and shape of Feature 24 suggests that it was used as a storage facility, and the fill attributes suggest that it was quickly filled with village humus after it was no longer useful for storage or caching. The pothole may have been dug to recover a richer zone of refuse deposited after the initial fill slumped. The original depositional sequence may have been much like that described for Feature 16.

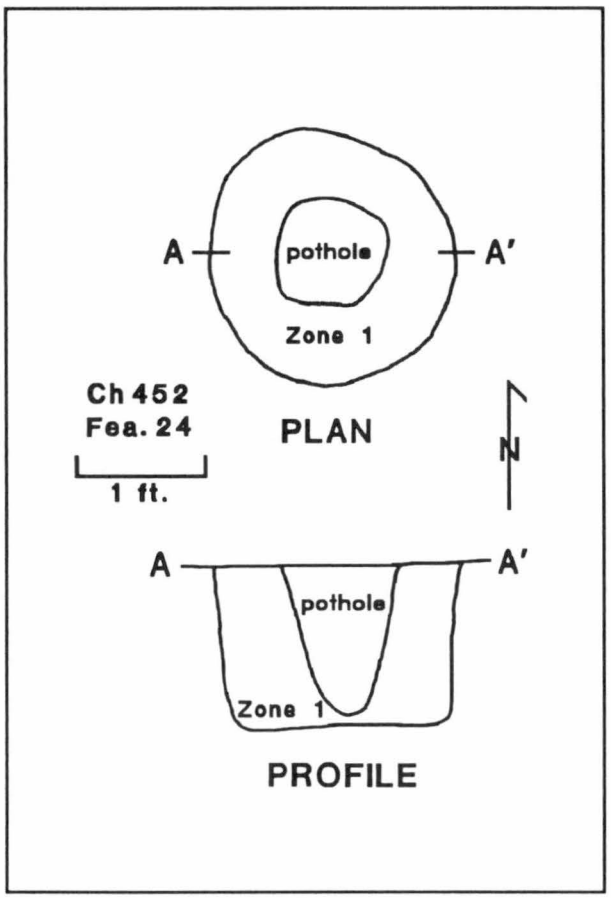

Figure 7.15. Feature 24, plan view and profile drawings.

Feature 25

This nearly circular pit was located in Sq. 300R680 and contained a homogeneous dark brown (7.5YR 4/4) sandy fill. Following excavation, it measured 1.6 ft by 1.7 ft and extended 1.7 ft beneath the subsoil surface. Its cone-shaped profile suggests that it probably represents a large posthole. Other than a few flakes and charcoal fragments, no artifacts were recovered.

Feature 26 (Burial 2)

This feature, the second human burial excavated by UNC archaeologists at the Mitchum site, had been extensively disturbed by pothunters. The other, Burial 1, was excavated in 1983 and has been reported on elsewhere (Ward 1987:107). Burial 2 was located just south of Burial 1 and Structure 1. Only a small portion of the original pit was recognizable at the subsoil surface. The undisturbed fill consisted of a yellowish brown (10YR 5/4) mottled sand with small particles of charcoal and fired clay. Several fragments of adult cranium were found stacked together in a pile in the upper level of the disturbed fill, just beneath the subsoil surface. Less than 0.5 ft beneath the skull fragments were two subadult ulnas, both of which were stained green from contact with brass or copper grave goods. In the same vicinity were five phalanges, also stained green, and four rolled copper beads. At this point, it was difficult to discern the disturbed fill from the original pit fill. As a consequence, the remainder of the pit was excavated as a single zone.

Near the bottom of the pit, a subadult skull, mandible, and long bone fragments were encountered, and several brass bells were scattered across the pit approximately 0.1 ft above the pit floor. The long bone fragments also were stained green, although none of the bones were in direct contact with any metal artifacts. Small glass seed beads also occurred within the fill. After excavation, the looted burial pit measured 4.2 ft by 3.7 ft and extended to a maximum depth of 2.4 ft.

Apparently, the shaft-and-chamber burial of a child had been looted and refilled. The presence of adult cranium in the upper level of the disturbed fill suggests that an additional burial in the near vicinity was disturbed during the same episode of looting.

Feature 27

This feature represents a small pit, located in Sq. 290R650, that also had been disturbed by pothunters. At the base of the plowzone, only the pothole, defined by an irregular stain of mottled brown sand 3.3 ft in diameter, was visible (Figure 7.16). The pothole fill contained numerous large granite cobbles along with a few potsherds and several glass trade beads.

A portion of the undisturbed pit was recognized at the bottom of the pothole at a depth of 1.1 ft below the subsoil surface. The pit measured 1.9 ft by 1.5 ft and contained a uniform dark brown (10YR 3/3) sand with bits of charcoal and burned bone fragments (Zone 1). Other artifacts consisted of a few potsherds and glass trade beads. Only 0.6 ft of undisturbed fill remained.

As was the case with Features 16 and 24, the pothole probably was dug through a zone of relatively rich fill originally contained in the upper portion of the pit. The depth and diameter of the feature indicate that it served as a storage facility.

Feature 28

This small pit was located southeast of Feature 25 in Sq. 290R680. At the subsoil surface, it was nearly circular in outline and measured 2.0 ft by 2.1 ft (Figure 7.17). Two fill zones were observed at this point. Zone 1 was a central pocket of dark reddish brown (5YR 3/4) sand with flecks of charcoal and fired clay inclusions. It was surrounded by Zone 2, a mottled dark yellowish brown (10YR 4.4) sand that contained small amounts of shell, fired clay, charcoal, and flakes. Zone 1 was relatively shallow, extending to a maximum depth of only 0.5 ft. Zone 2 fill comprised the main volume of the pit and reached a depth of 1.1 ft below the top of the subsoil.

In cross-section, this feature was cone-shaped with insloping sides and a rounded bottom. The shape does

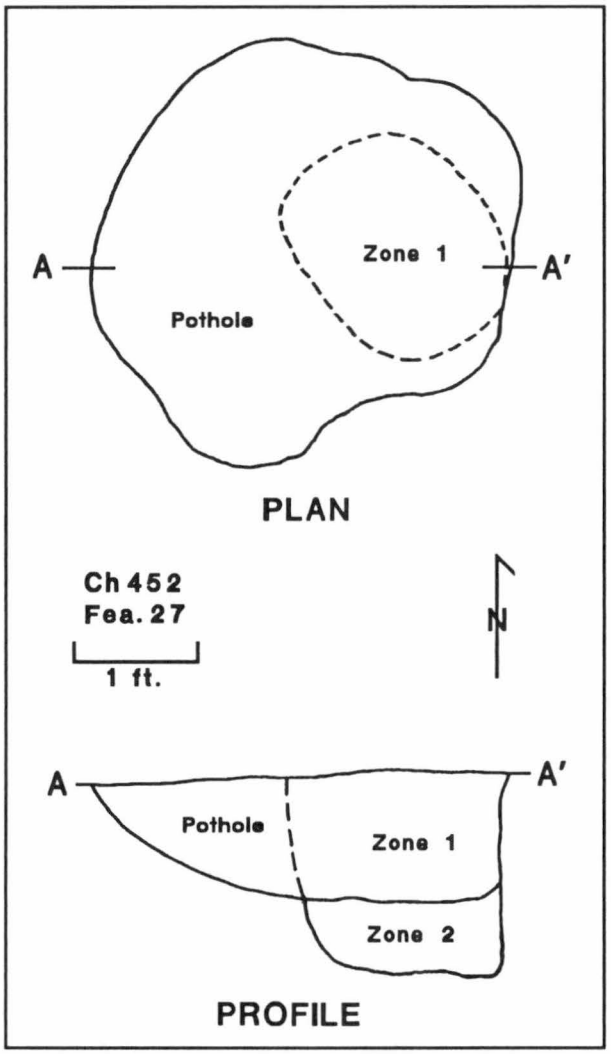

Figure 7.16. Feature 27, plan view and profile drawings.

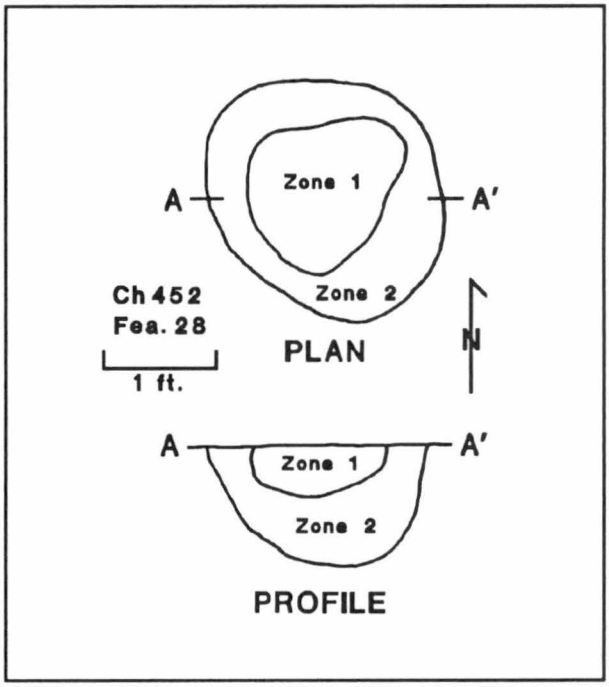

Figure 7.17. Feature 28, plan view and profile drawings.

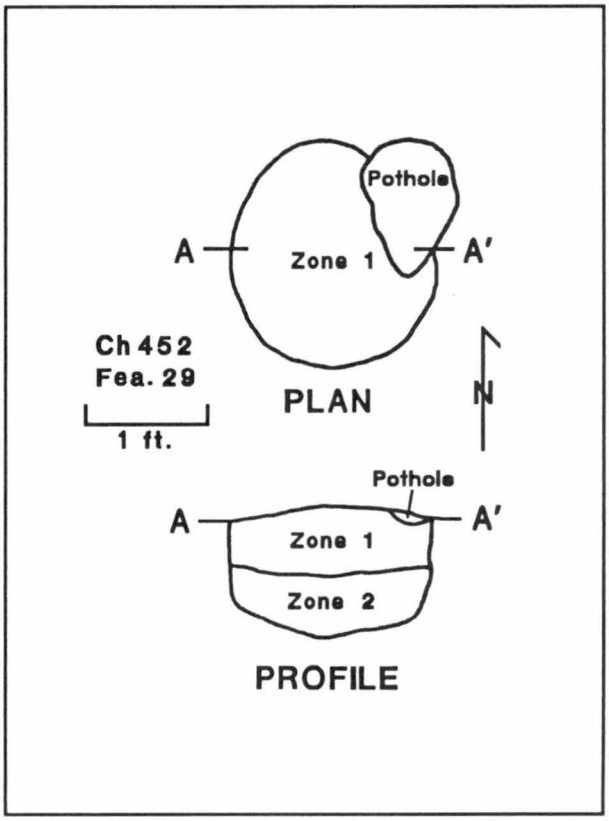

Figure 7.18. Feature 29, plan view and profile drawings.

not conform to the straight sides and flat bottoms normally associated with subterranean storage facilities. Feature 28 also is relatively shallow compared with most storage pits. Given the presence of fired clay and charcoal particles, and the reddish brown color of Zone 1 soil, the pit may have been used in some kind of cooking or food preparation activities.

Feature 29

This small pit was very similar to Feature 28, located 15 ft to the north. At the top of the subsoil, the pit appeared as a nearly circular stain of dark reddish brown sand with bone and charcoal (Zone 1). A small pothole intruded its northeast edge (Figure 7.18). Zone 1 (similar in fill characteristics to Zone 1 in Feature 28) lay atop a layer of dark yellowish brown (10YR 4/4) fill identical to Zone 2 of Feature 28. Both fill zones contained potsherds, animal bones, and charcoal. Zone 2 also produced a clay pipe stem. Given its similarity to Feature 28, it is interesting to note that no glass beads or other trade artifacts were found.

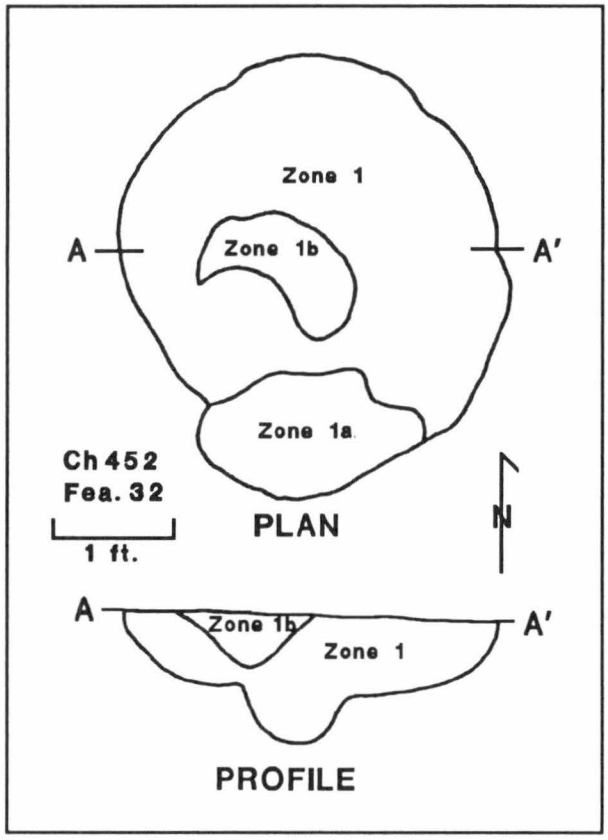

Figure 7.19. Feature 32, plan view and profile drawings.

After excavation, Feature 29 measured 1.8 ft by 1.7 ft and was 1.1 ft deep. The walls sloped inward to intersect a rounded bottom. The similarities in shape, size, and fill characteristics suggest this facility served a similar function as Feature 28, perhaps in cooking and food preparation activities.

Feature 30

This small circular pit was located in Sq. 280R680 and was defined at the base of plowzone by a smear of dark yellowish brown (10YR 4/4) fill with specks of charcoal (Zone 1). The pit was 1.5 ft deep and contained no artifacts. The sides of the feature sloped inward to form a cone-shaped profile. The size and shape of the pit indicate that it may have been a large posthole.

Feature 31

This designation was assigned to an irregular pothole in Sq. 300R680 that measured 2.8 ft by 1.8 ft. Depth varied along an uneven bottom from 1.0 ft to 1.8 ft below the subsoil surface. A few artifacts and animal bones, including a turtle carapace, were recovered from the potfill. Nothing, however, was left of the original pit that it intruded.

Feature 32

This nearly circular feature was originally suspected

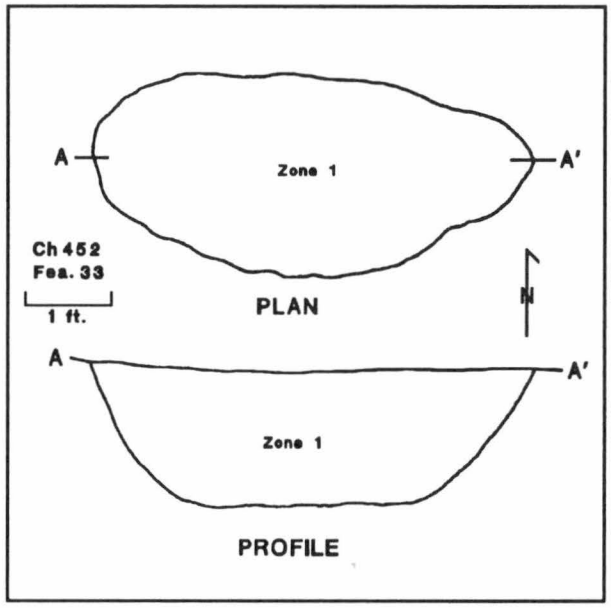

Figure 7.20. Feature 33, plan view and profile drawings.

to be a burial because of its size and somewhat diffuse, mottled, yellowish brown (10YR 5/4) fill (Zone 1) visible at the top of subsoil. Also observed at this point was a small pocket of very dark grayish brown (10YR 3/2) sand with charcoal and bone fragments (Zone 1a) and a small patch of mottled dark brown (10YR 4/3) sand (Zone 1b). Zone 1a was located at the southern edge of the pit, whereas Zone 1b was located near the pit center. Only a few potsherds and small fragments of animal bone were recovered from the pit fill.

Excavation revealed not a burial but a shallow basin-shaped feature measuring 3.7 ft by 3.1 ft and 1.1 ft deep (Figure 7.19). The pit bottom was flat except for a cone-shaped cavity near the center that may represent a posthole. It was not possible to determine if the pit had intruded the posthole. These feature attributes offer few clues as to its original function.

Feature 33

This basin-shaped feature was located in Sq. 280R670. In plan, it was observed as a large oval area of dark brown (10YR 3/3) sand with small particles of charcoal (Zone 1). This fill zone continued to the bottom of the feature. After excavation, the pit measured 5.1 ft by 2.5 ft and was 1.5 ft deep (Figure 7.20). Only a few small rocks and a small piece of burned bone were found. As with the other basins, it is unclear what function this facility originally served.

Feature 34

While flatshoveling the base of the plowzone in the inset north of Sq. 320R750, an area of reddish brown (7.5YR 5/6) mottled fill with fired clay was exposed. After removing the flatshoveling level, only a fire-

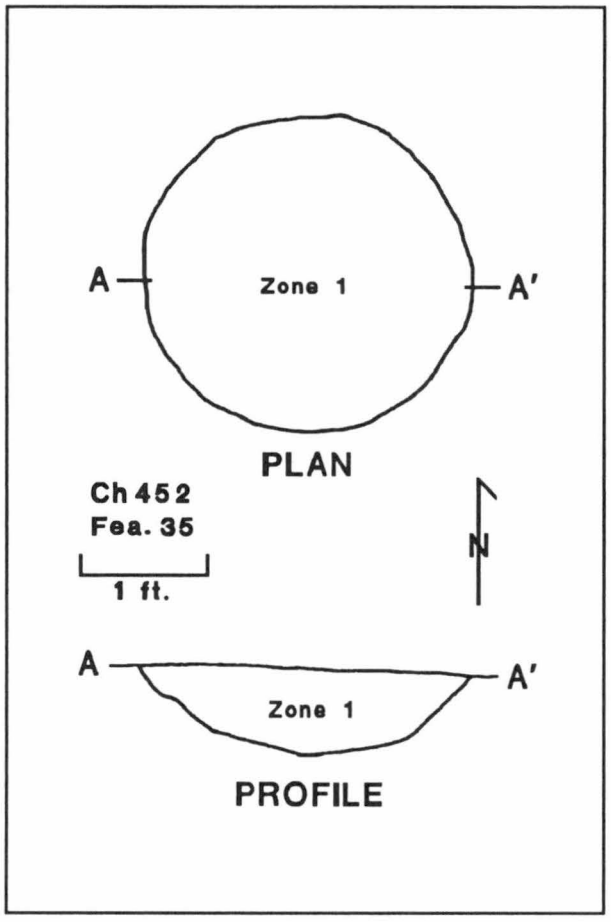

Figure 7.21. Feature 35, plan view and profile drawings.

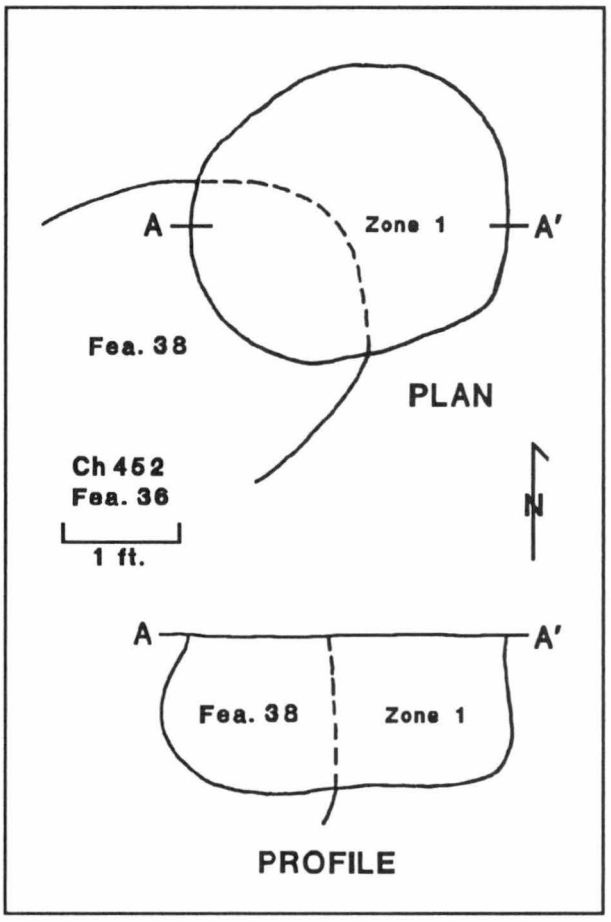

Figure 7.22. Feature 36, plan view and profile drawings.

reddened (10R 4/8) stain remained at the top of the subsoil. The feature measured 2.0 ft by 1.4 ft and was 0.4 ft thick.

Apparently the concentration of fired clay represents the remains of a hearth recently disturbed by plowing. The fire-reddened subsoil beneath the burned clay indicates that the hearth had not been displaced significantly by plow action.

Feature 35

This basin-shaped pit was located just northwest of Feature 34. It appeared at the top of the subsoil as a circular patch of dark yellowish brown (10YR 3/4) fill with small fragments of charcoal and animal bone (Zone 1). After excavation, the feature measured 2.5 ft in diameter and was 0.6 ft deep at its deepest point (Figure 7.21). Except for an aboriginal gunflint and a few fragments of animal bone, the fill was devoid of cultural material.

Feature 36

This feature was located in the northeast corner of Sq. 310R750 and intruded Feature 38. At the top of the subsoil, the pit appeared as a nearly circular stain of dark yellowish brown (10YR 3/4) fill with bits of charcoal and fired clay (Zone 1). This fill zone continued to the bottom of the pit which was 1.3 ft beneath the base of the plowzone. After excavation, the feature measured 2.5 ft by 2.7 ft (Figure 7.22). The sides bowed outward at the bottom to create a bell-shaped profile. The pit bottom was flat, darkly stained, and compact.

Feature 36 proved to be one of the richest features excavated at the Mitchum site, particularly in terms of animal bones which were scattered throughout the fill. Two clay pipe stems, several potsherds, mussel shells, and daub fragments also were recovered. A single charred peach pit and 43 glass trade beads attest to its use during the Contact period.

Given the size of the pit and its bell-shaped configuration, it undoubtedly was used initially as a storage receptacle. The organically rich fill, containing numerous food remains, point to the pit ultimately being abandoned and filled with subsistence refuse.

Feature 37

This designation was assigned to a large oval-shaped stain also located in Sq. 310R750. This feature intruded Feature 38 and was itself intruded by four postholes. These postholes contained fragments of

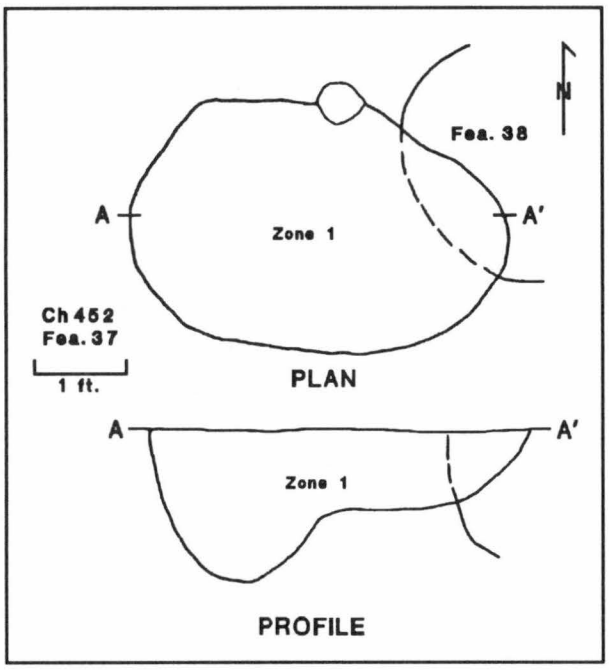

Figure 7.23. Feature 37, plan view and profile drawings.

animal bone, and two produced a few glass trade beads. The feature fill consisted of a single zone (designated Zone 1) of dark yellowish brown (10YR 4/4) sand with small particles of charcoal and fired clay. This fill was very similar to that found in Feature 35. Except for a single potsherd and a few animal bone fragments, very few cultural remains were recovered from the feature fill.

After excavation, the pit measured 4.1 ft by 2.6 ft and the slides sloped inward to form a basin shape (Figure 7.23). The bottom was uneven and dipped noticeably to form a cone-shaped depression in the western half of the feature. As with most of the other basin-shaped pits, the original function of Feature 37 remains elusive.

Feature 38

This final feature was one of the largest excavated at the Mitchum site. It, too, was located in Sq. 310R750 and was intruded by Features 36 and 37 (Figure 7.24). Unlike the other pits, Feature 38 initially was not detected at the base of the plowzone. The fill at this point was very similar to that of the subsoil except for bone inclusions. It was only after Features 36 and 37 were excavated that Feature 38 was clearly defined (Figures 7.25).

The pit was circular in outline with a diameter of 3.7 ft. Excavation revealed a classic bell-shaped profile with a flat bottom that extended to a depth of 2.9 ft below the subsoil surface (Figures 7.26). The fill (Zone 1) was comprised of a dark yellowish brown (ranging from 10YR 4/4 to 10YR 3/3) mottled sand that contained abundant charcoal, animal bone, and

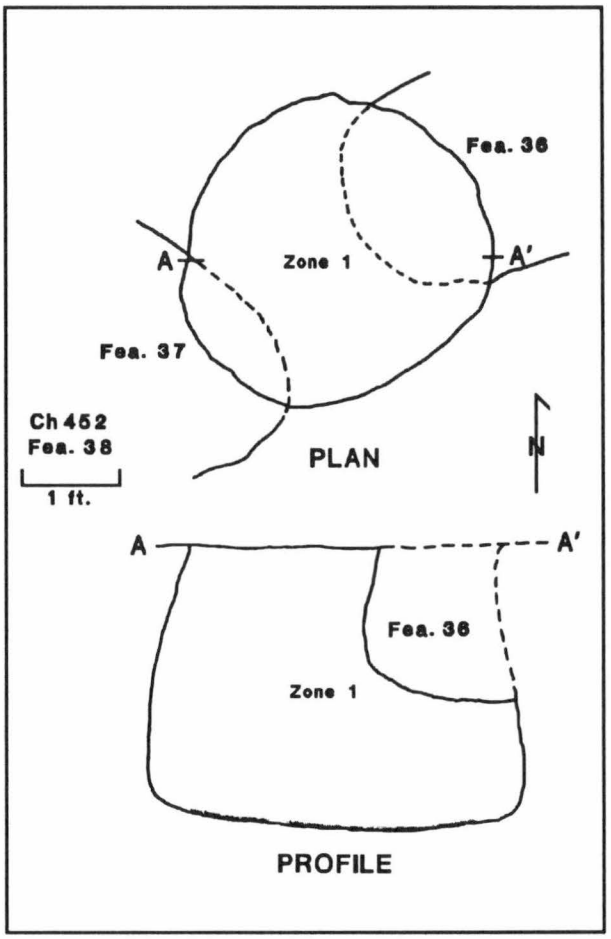

Figure 7.24. Feature 38, plan view and profile drawings.

glass trade beads. It also contained a large fragment from a *Jenrette Simple Stamped* jar as well as several other *Jenrette Plain* and *Jenrette Simple Stamped* sherds. Like Feature 36, the pit bottom was darkly stained and compact.

This large pit initially was used to store or cache various commodities. After no longer being suited for this purpose, it was filled with soil and food refuse, particularly animal bones and/or undesirable cuts of fleshy meat. The large amount of charcoal suggests food preparation or cooking areas were also cleaned and the debris tossed into the large pit. The compact and stained nature of the pit bottom may indicate an illuvial horizon or perhaps that the pit was lined.

Summary

Following the 1983 and 1986 excavations, four types of features were represented at the Mitchum site (excluding the vague stains, large postholes, and tree throws). These include: hearths, shallow basins or depressions, deep cylindrical storage pits, and burials. Three small conical fire-pits, including one in the plowzone and the remains of two hearths, represent heating or food preparation facilities. Eleven basins or depressions, some over 4 ft in diameter or length, also

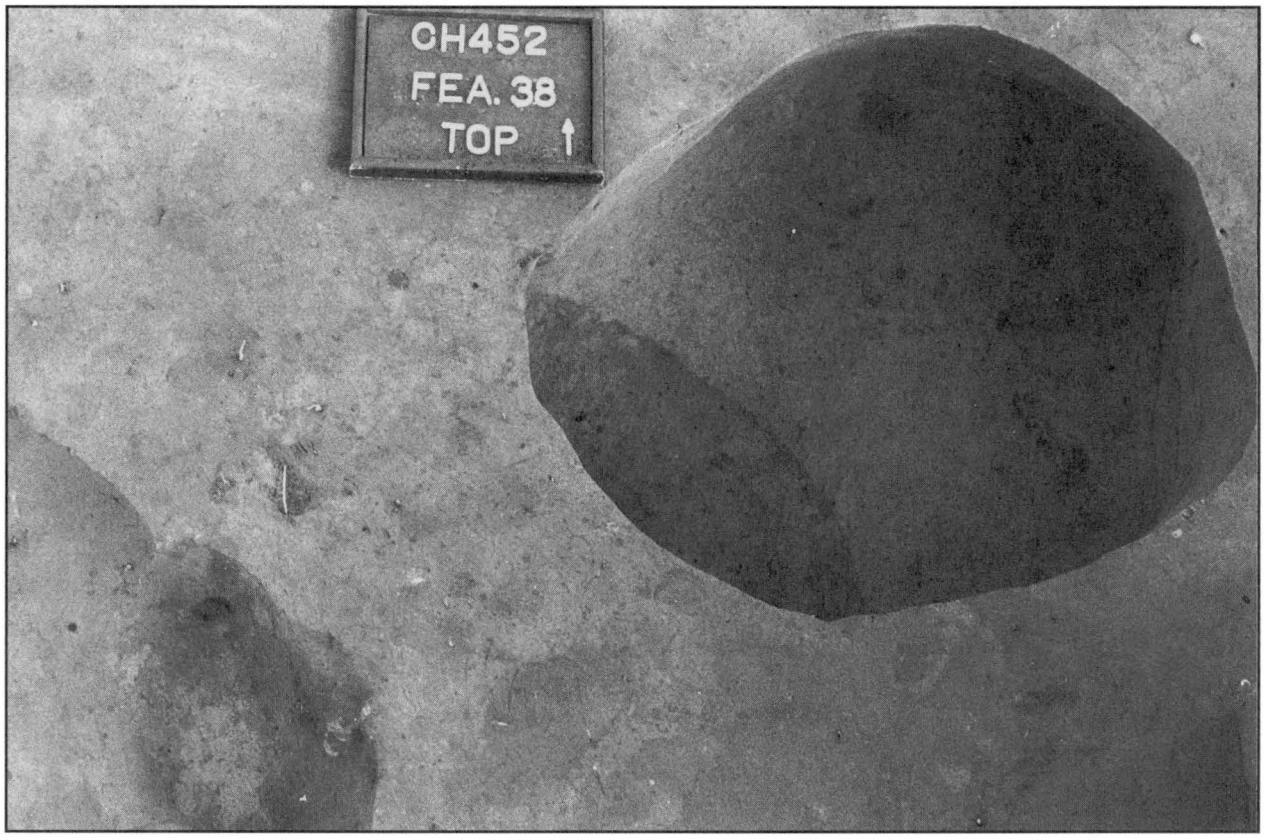

Figure 7.25. Feature 38, before excavation.

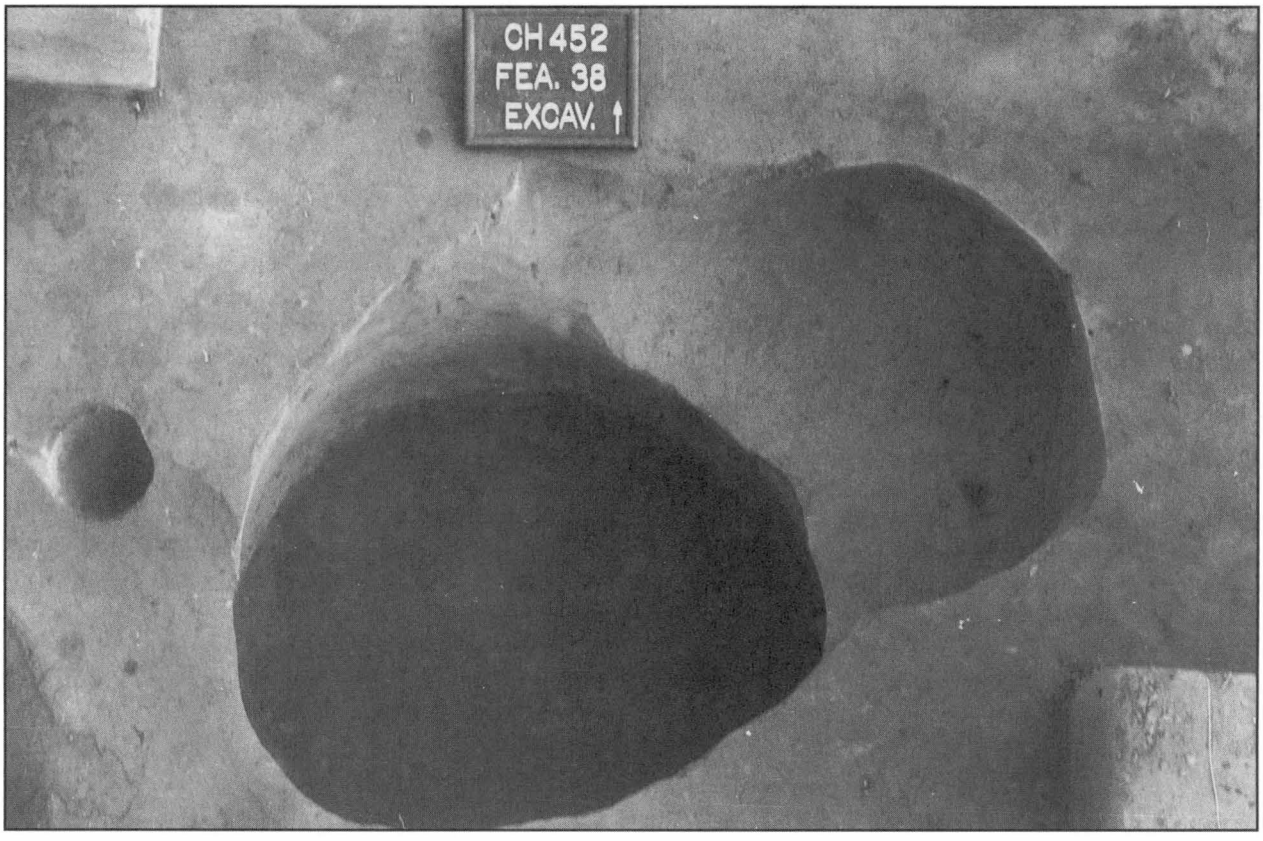

Figure 7.26. Feature 38, excavated.

were recorded. These features were shallow, rarely over one foot deep, and tended to be somewhat amorphous in shape with irregular bottoms. In terms of soil color and texture, their fill suggests village humus rather than intentional deposits of refuse. Many of these features appeared at the base of excavation as stains with small flecks of charcoal and were only slightly darker than the surrounding subsoil. Although better defined than the vague stains mentioned above, their boundaries often were arbitrarily delimited as the feature edges faded gradually into the undisturbed subsoil matrix. The better-defined basins tended to be smaller.

The behavioral referent of these features is difficult to decipher. Similar examples from other sites in North Carolina have been described as "borrow pits" where clay was mined to use in the construction of hearths or as daubing over house walls (Dickens 1976; Ward 1980). Because of the sandy nature of the subsoil at the Mitchum site, this explanation is untenable. These features may simply represent depressions and unconformities in the original living surface where patches of humus have been trapped and protected from the plow.

Features 36 and 38, both deep storage facilities, produced substantial cultural remains and fill zones different from the other storage pits. Most were rapidly filled with village topsoil once they were no longer needed for their original purposes. After this fill slumped, the resulting cavity was topped off with domestic debris. This suggests that after the pits were initially filled and no longer posed a hazard, the shallower depressions created as the fill settled were leveled out with domestic refuse. Features 36 and 38 reflect a somewhat different filling history. Both were rapidly filled, but with soil that contained large amounts of refuse, particularly animal bones. Perhaps the abandonment of these pits coincided with butchering and animal-processing activities.

The disturbed burial from the Mitchum site contained an array of ornamental trade goods—glass beads, rolled copper beads, and brass bells—similar to those found at other mid-seventeenth century sites in the region. The Jenrette site on the Eno River, and Lower Saratown and Upper Saratown on the Dan River, have all produced burials with similar grave offerings. Although it was impossible to determine the pit morphology and body disposition of this disturbed burial, it was probably flexed and placed in a shaft-and-chamber pit in the same fashion as Burial 1 (Ward 1987:107–108). This mortuary complex is chronologically intermediate between the Hillsboro phase Wall and Edgar Rogers site burials and the cemetery graves at the Fredricks site.

Postholes

Numerous postholes occurred throughout the Mitchum site, but only two architectural features—Structure 1 and the village palisade—have been identified. The excavations in 1983 uncovered an oval-shaped domestic structure that measured 18 ft by 24 ft. The wall posts were uniformly sized and averaged 0.5 ft in diameter. The interior posts were slightly larger, averaging 0.6 ft in diameter. There is very little evidence of rebuilding. This structure was probably dome-shaped, with the saplings forming the wall being pulled over and tied to create the roof. Because of an absence of daub except in the vicinity of Feature 12—a hearth remnant in the center of the house—it is likely that the walls and roof were covered with bark or skins (Petherick 1987:55). This structure is similar to others found in the region during the seventeenth century. At the Jenrette and Fredricks sites, houses typically were oval or subrectangular in plan and probably were not occupied long enough to require extensive repair. In contrast, earlier Hillsboro phase houses such as those at the Wall site were circular and often showed signs of extensive rebuilding (Petherick 1987). Although some houses at Fredricks and both houses identified so far at the Jenrette site employed wall trenches, this method of house construction apparently was not used at the Mitchum site.

A segment of the village's palisade was identified in 1986. It consisted of a line of approximately 40 postholes that ran in a northeast-southwest direction just outside the northwest corner of Structure 1. The posts were about 0.5 ft in diameter and were closely spaced, never more than a foot apart. The palisade was easily traced for approximately 30 ft from the southwestern edge of the excavation to point northeast of the Structure 1. From here, it was hard to follow because the posts were spaced further apart and the alignment was intruded by two fairly large pits, Features 17 and 18.

Another house structure was suggested in the small excavation block (Sq. 310R750) 60 ft east of the main excavation. Here an arc of closely-spaced postholes, similar in size to those of Structure 1, may represent a segment of a house wall. The rich domestic refuse in Features 36 and 38 also suggests a dwelling in the near vicinity.

Pottery

The ceramic sample from the 1986 excavations at the Mitchum site consists of 9,845 potsherds and one large vessel section (Table 7.2). Analysis of pottery from the 1983 excavations has already been reported (see Davis 1987). Despite the large size of the 1986 sample, comparatively little new information was obtained regarding the overall vessel assemblage or the specific composition of that assemblage. This was because: 1) very few potsherds were recovered from excavated features; and 2) only one sherd was of sufficient size to provide information about vessel morphology beyond rim attributes. Although 24 features were excavated, only 2.5% (n=245) of the sherd sample came from those features and only 128 of those potsherds could be identified by exterior surface treatment. The prevalent method of refuse disposal practiced at the site clearly did not rely heavily upon the use of pits as trash receptacles. Fragments of broken pottery, however, were common within the overlying plowzone and midden deposits.

The predominant pottery types recognized at the Mitchum site are *Haw River Net Impressed* (42.5%), *Jenrette Plain* (32.4%), and *Jenrette Simple Stamped* (22.7%). The remaining 2.4% of identifiable sherds were classified as *Hillsboro Check Stamped* (n=54), *Haw River Cord Marked* (n=44), *Yadkin Fabric Marked* (n=21), *Jenrette Cob Impressed* (n=15), and *Caraway Complicated Stamped* (n=1).

Characterization of the Mitchum ceramic assemblage is complicated by the fact that more than a single occupation is represented at this site. Although the possibility of multiple components was recognized during the analysis of pottery from the 1983 excavations (Davis 1987), the data necessary to fully assess that possibility were lacking. It was suggested then that the historic occupation of the Mitchum site was represented largely by plain and simple stamped pottery and that an earlier component was represented by most of the net impressed pottery. This tentative conclusion was based on two primary lines of evidence. First, there was a statistically significant difference in the distribution of simple stamped and net impressed pottery between the plowzone/sub-plowzone midden and excavated features (most of which also contained historic artifacts). Simple stamped pottery, along with plain pottery, comprised a substantial portion of the feature sherd sample while net impressed pottery occurred mostly within non-feature contexts. Second, a substantial difference in specific sherd attributes (eg., portion of vessel represented, interior surface treatment, rim and lip form, methods of decoration) between net impressed and other pottery was also evident. These differences indicated that the net impressed pottery was produced by a ceramic tradition distinctly different from the one that produced either the simple stamped or plain pottery found at Mitchum. (This latter line of reasoning has been weakened by the clear association of net impressed and carved paddle stamped pottery at the George Rogers site.)

We hoped that additional, more expansive excavation at the site would provide new data (i.e., Haw River phase features with pottery) that could be used to address this problem. This unfortunately was not the case; however, a sub-plowzone midden and pre-midden humus were sampled and provide an alternate, though not conclusive, means of evaluating this problem further.

To assess the relationship of the *Haw River Net Impressed* pottery to the *Jenrette Plain* and *Jenrette Simple Stamped* sherds, totals were calculated for these types by features (all), sub-plowzone midden, and pre-midden humus (Table 7.3). As was the case with the 1983 ceramic sample, the associations of these treatment types by context are significantly different ($X^2=49.49$, df=4, $p<.001$) and support the likelihood that at least some of the *Haw River Net Impressed* pottery pre-dates the historic occupation. Despite this, the data are not sufficient to demonstrate that net impressed pottery was not in use at this site during the Contact period. Moreover, the dominance of net impressed pottery within the overall sherd sample, in the absence of features containing only net impressed sherds, suggests that some of these sherds may be associated with the remainder of the ceramic assemblage. If this is the case, it would reflect a greater degree of diversity (at least among potters) than was previously thought.

Individual pottery types represented within the Mitchum ceramic sample are described below.

Yadkin Fabric Marked

Twenty-one fabric marked sherds were recovered from the plowzone and midden. These sherds are variously tempered with sand (n=10), mixed crushed quartz and feldspar (n=5), crushed feldspar (n=3), grit (n=2), and fine crushed quartz (n=1). Interior surfaces are mostly smoothed. The six rimsherds, all of which have fabric impressions that extend to the interior rim surface, are from jars with slightly everted rims and rounded lips. With the exception of paste, these sherds are similar to the Early-Middle Woodland *Yadkin Fabric-Marked* type (Coe 1964) and almost certainly pre-date the historic occupation of the site.

Haw River Net Impressed (Figure 7.27)

Net impressing was the most frequently observed exterior surface treatment at the Mitchum site and occurred on 42.5% (n=2,418) of all identified sherds. All of these specimens were classified as *Haw River Net Impressed*. Only 23.4% (n=30) of all potsherds

Table 7.2. Distribution of pottery from the Mitchum site.

Context	Yadkin Fabric Marked	— Haw River — Net Impressed	Cord Marked	Hillsboro Check Stamped	Jenrette Plain	Simple Stamped	Cob Impressed	Caraway Complicated Stamped	Indet.	Total
Mitchum Phase										
Fea. 15	-	3	-	-	-	-	-	-	2	5
Fea. 15 (Pothole)	-	1	-	-	-	-	-	-	-	1
Fea. 16	-	-	-	-	-	-	-	-	1	1
Fea. 17	-	2	1	-	10	13	-	-	6	32
Fea. 18	-	1	-	-	-	-	-	-	-	1
Fea. 21	-	3	-	-	3	1	-	-	2	9
Fea. 22	-	1	-	-	-	-	-	-	6	7
Fea. 24 (Pothole)	-	-	-	-	-	-	-	-	1	1
Fea. 26	-	4	-	-	-	-	-	-	3	7
Fea. 26 (Pothole)	-	4	-	-	4	-	-	-	3	11
Fea. 27	-	-	-	-	-	1	1	-	2	4
Fea. 27 (Pothole)	-	-	-	-	-	5	-	-	13	18
Fea. 29	-	2	-	-	1	1	1	-	10	15
Fea. 31	-	-	-	-	-	-	-	-	1	1
Fea. 31 (Pothole)	-	-	1	1	3	3	-	-	2	10
Fea. 32	-	-	-	-	-	1	-	-	-	1
Fea. 33	-	-	-	-	-	-	-	-	1	1
Fea. 35	-	-	-	-	-	-	-	-	2	2
Fea. 36	-	2	-	-	3	10	1	-	23	39
Fea. 37	-	-	-	-	-	1	-	-	-	1
Fea. 38	-	7	-	-	10	22	-	-	39	78
Sub-total	0	30	2	1	34	58	3	0	117	245
Indeterminate Phase										
Plowzone	17	2141	35	50	1715	1139	12	1	3876	8986
Zone 2	4	109	2	1	56	38	-	-	74	284
Zone 3	-	27	-	-	5	7	-	-	9	48
Zone 4	-	5	-	-	-	1	-	-	5	11
Zone 5	-	1	2	-	-	-	-	-	-	3
Misc.	-	75	1	2	31	45	-	-	60	214
Surface	-	30	2	-	6	5	-	-	12	55
Sub-total	21	2388	42	53	1813	1235	12	1	4036	9601
Total	21	2418	44	54	1847	1293	15	1	4153	9846

Table 7.3. Distribution of predominant pottery types by selected contexts at the Mitchum site.

Pottery Type	Features (Total) n	%	Midden (Zone 2) n	%	Humus (Zones 3-5) n	%
Jenrette Plain	34	27.9	56	27.6	5	10.9
Jenrette Simple Stamped	58	47.5	38	18.7	8	17.4
Haw River Net Impressed	30	24.6	109	53.7	33	71.7
Total	122	100.0	203	100.0	46	100.0

recovered from features, however, were net impressed. Features containing net impressed pottery include Features 15, 17, 18, 21, 22, 26, 29, 36, and 38.

Haw River Net Impressed sherds were tempered primarily with coarse-to-fine crushed feldspar (36.8%) and coarse sand (23.7%); however, substantial numbers

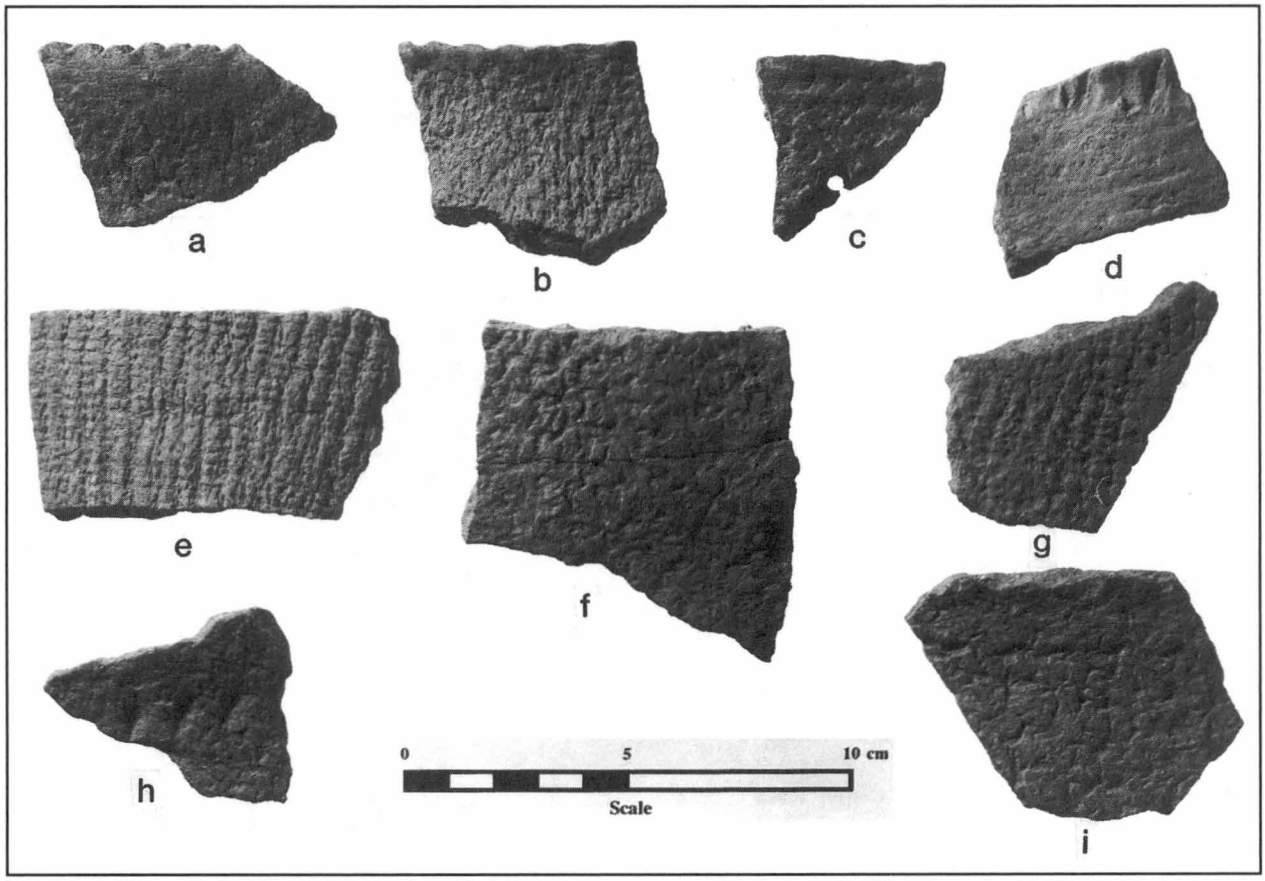

Figure 7.27. *Haw River Net Impressed* sherds from the Mitchum site.

of sherds also contained grit (18.0%) and mixed crushed quartz and feldspar (15.5%). The remaining 6.0% of the sample were tempered with medium-to-fine crushed quartz. Both smoothed and scraped interior surfaces were almost equally represented. (This pattern is similar to the one observed at the nearby Webster site. Smoothed interiors were more common among net impressed sherds at both the Edgar Rogers and George Rogers sites.) Almost 85% of all net impressed sherds were 6 mm to 10 mm thick, a pattern which is consistent with that observed for simple stamped pottery from the site.

Although no reconstructible vessel sections were recovered, the 166 rimsherds in the sample indicate the predominance of large jars with straight to slightly everted rims. Both flattened and rounded lips are equally represented. Vessel lips, seen on 30 rimsherds, often were decorated with V-shaped notches (Figure 7.27*a–b*). A similar but minor decorative technique observed on two sherds involved fine incisions, placed oblique to the rim, along the vessel lip. Neck decorations consist of incised lines (n=4), a single band of fingernail punctations (n=3) (Figure 7.27*d,h–i*), incised "V"s (n=2), and circular stick punctations (n=1). Miscellaneous incised lines (n=2) and incised "V"s (n=1) also were observed on a few body sherds.

The *Haw River Net Impressed* sherds found at the Mitchum site are very similar to the net impressed pottery from the Webster site, thought to have been occupied during the late fourteenth or early fifteenth centuries (see Chapter 8). If the net impressed pottery at the Mitchum site is from an earlier occupation coeval with the Webster site, then the absence of associated pit features at Mitchum should not be surprising since only a single pit was identified at Webster following extensive auger testing. Although the cultural association of the net impressed pottery from Mitchum must remain in doubt for now, it still seems more reasonable, given the present facts, to exclude the Haw River series pottery from the Contact period ceramic assemblage recognized at the site and assign it instead to an earlier, Late Prehistoric cultural component.

Haw River Cord Marked

Forty-four cord marked potsherds, including two sherds from Features 17 and a pothole intrusive into Feature 31, were recovered. Most (n=31) of these sherds have smoothed interiors and are tempered with fine-to-coarse crushed feldspar (n=27), sand (n=6), medium crushed quartz (n=6), and mixed crushed

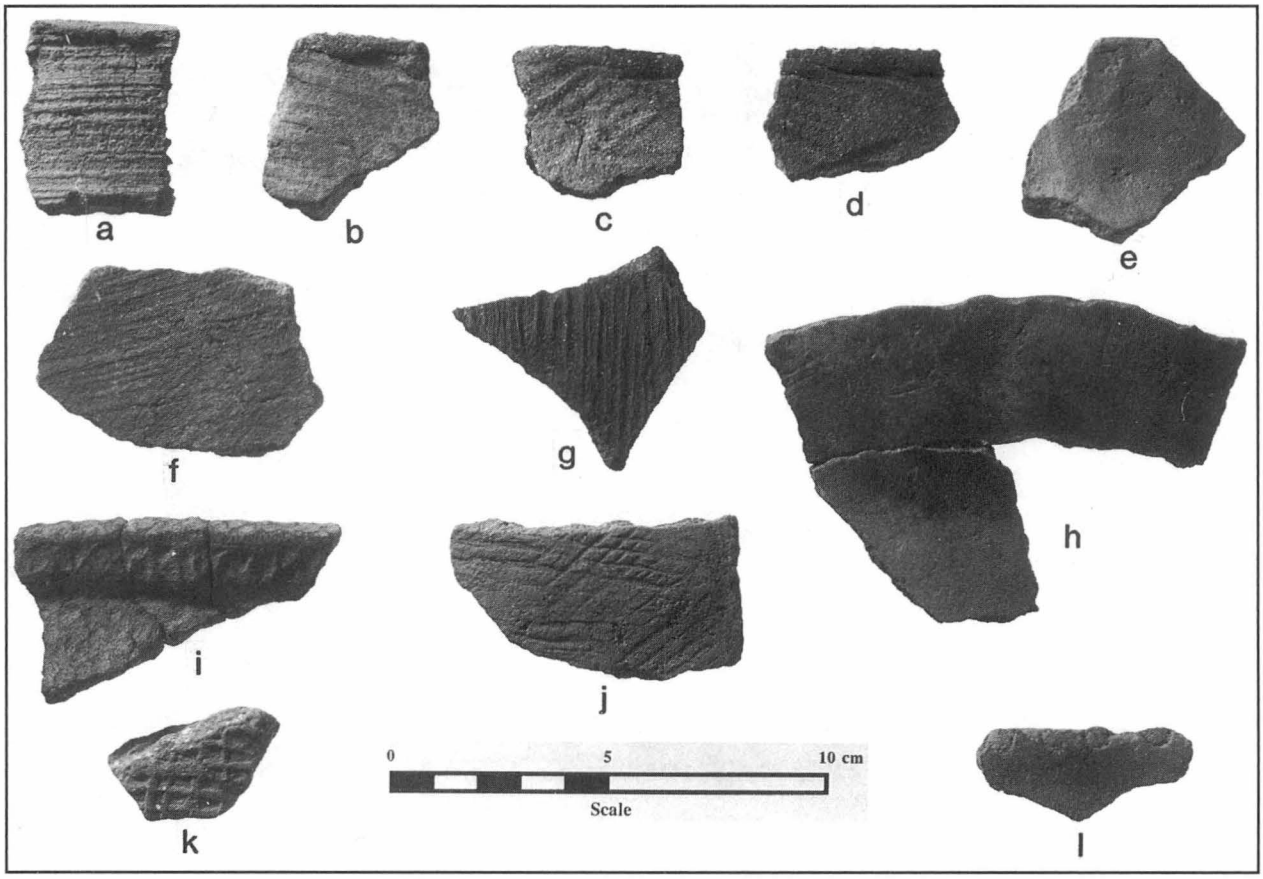

Figure 7.28. Jenrette and Hillsboro series sherds from the Mitchum site.

quartz and feldspar (n=5). Sherd thickness is similar to that observed for *Haw River Net Impressed* sherds. The four rimsherds indicate jar forms with straight to slightly everted rims and rounded lips. One body sherd was decorated with fingernail punctations. All of these sherds probably are associated with the *Haw River Net Impressed* pottery found at the site.

Hillsboro Check Stamped (Figure 7.28*i,k*)

Fifty-four *Hillsboro Check Stamped* sherds (Coe 1952; Davis 1987) were recovered from disturbed contexts. All but three of these sherds have smoothed interiors and are tempered with: crushed feldspar (n=30), sand (n=9), medium-to-fine crushed quartz (n=7), mixed crushed quartz and feldspar (n=6), and grit (n=2). The six rimsherds in the sample, all undecorated, have everted and folded rim profiles and flattened lips.

Jenrette Plain (Figure 7.28*e,h,l*)

One thousand eight hundred and forty-seven *Jenrette Plain* potsherds, including 27% (n=34) of all identifiable sherds from excavated features, were recovered from the Mitchum site. Plain sherds were recovered from Features 17, 21, 26, 29, 31, 36, and 38. Almost all of these potsherds have smoothed interiors and are tempered primarily with coarse-to-fine crushed feldspar (65.4%) and sand (19.4%). Other observed temper types include: mixed crushed quartz and feldspar (9.0%), medium-to-fine crushed quartz (5.5%), and grit (0.8%). Over 81% of the sherds examined are 6 mm to 8 mm thick.

The 143 rimsherds in the sample indicate a variety of vessel shapes that include jars with simple (n=101) or folded (n=1) rims, jars or bowls with straight rims (n=25), and bowls with inverted rims (n=16). Although none of the rimsherds are large enough to obtain specific estimates of vessel size, most appear to be from small to medium-sized vessels (eg., 12 cm to 24 cm in diameter). Lip forms are mostly flattened (n=72) or rounded (n=47). Twenty-five (17.5%) of the *Jenrette Plain* rimsherds are decorated, a substantially lower frequency than was observed for plain pottery from the Edgar Rogers (62.5%) or George Rogers (39.1%) sites. Rim decorations were limited to notching of the lip (n=16) or lip/rim edge (n=1) and circular stick punctations along the lip (n=8). Circular punctations also occur on the vessel neck (n=1), shoulder (n=5), and body (n=2) (Figure 7.28:l). Other types of decoration include incising below the vessel shoulder (n=5), rectangular punctations along the vessel neck (n=1), and node applique. A single

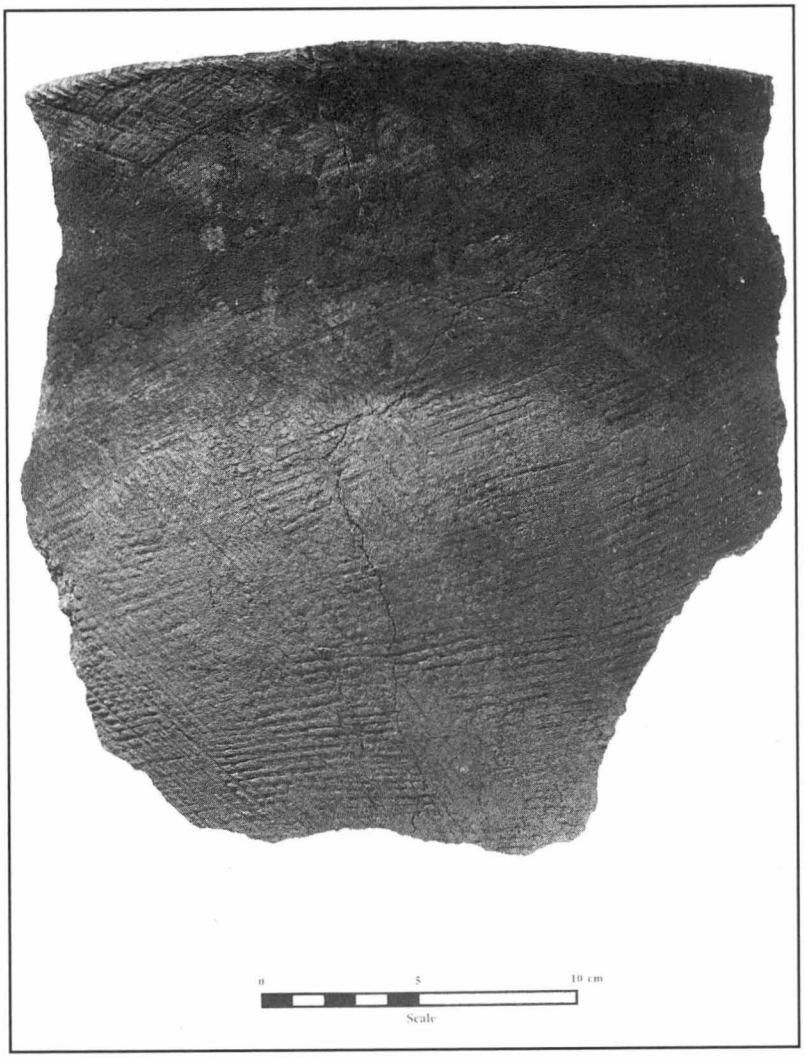

Figure 7.29. Large *Jenrette Simple Stamped* vessel section from Feature 38.

strap handle from a *Jenrette Plain* vessel also was recovered.

Previously, plain pottery found along the Haw River valley in northern Chatham County and tempered with crushed feldspar or sand had been classified as *New Hope Smooth Plain* or *New Hope Rough Plain* (Smith 1965; McCormick 1970) and *Hillsboro Plain* (Wilson 1976), respectively. This typological distinction, however, has little meaning for the Mitchum ceramic assemblage as both temper types apparently were used by the same potters to make essentially similar vessels. This pattern also was observed within the Jenrette site assemblage, used to define the Jenrette ceramic series.

Jenrette Simple Stamped (Figures 7.28*a–d f–g j* and 7.29)

Twelve hundred and ninety-three simple stamped sherds, including one large vessel section, were classified as *Jenrette Simple Stamped*. Although only 4.5% of these were from features, over 45% of all feature sherds were simple stamped. Features 17, 21, 27, 29, 31, 32, 36, 37, and 38 contained *Jenrette Simple Stamped* sherds. Paste characteristics are similar to *Jenrette Plain* pottery from the site, with coarse-to-fine crushed feldspar (58.5%) and sand (19.7%) being the predominant temper types. Other temper types include: mixed crushed quartz and feldspar (11.2%), medium-to-fine crushed quartz (7.4%), and grit (3.2%). All but 20 simple stamped sherds have smoothed interior surfaces. As with the plain pottery, over 80% of all sherds are 6 mm to 8 mm thick; however, substantially more sherds are 8 mm to 10 mm thick. This suggests that *Jenrette Simple Stamped* vessels had slightly thicker walls than plain vessels.

The 97 rimsherds in the sample are mostly from medium-sized to large (ca. 20 cm to 34 cm in diameter) jars with straight to slightly everted rims and flattened lips. Decoration of simple stamped vessels was restricted to the lip and consisted of impressing the lip with the surface of a simple-stamp paddle to produce small, shallow, closely-spaced notches (Figure 7.28*b–d*). Over half (n=55) of all rimsherds were

treated in this manner. The one large vessel section, recovered from Feature 38, represents a large, 34 cm diameter cooking jar (as evidenced by heavy soot deposits along the outside shoulder and neck area), and has a slightly everted rim and a flat, paddle-notched lip (Figure 7.29). Morphologically, this vessel is very similar to Jenrette series jars associated with the roughly contemporary Shakori occupation at the Jenrette site. With the exception of paste, it also is virtually identical to a large jar (Vessel 11) recovered from Feature 18 at the Fredricks site (Davis 1988) and another vessel section contained within Feature 10 at the William Kluttz site along the Dan River.

Jenrette Simple Stamped pottery found at the Mitchum site differs from earlier *Hillsboro Simple Stamped* pottery from the Edgar Rogers and George Rogers sites in several respects. First, the Mitchum pottery represents jars with substantially straighter rims that are seldom folded and are decorated by notching with a paddle rather than by incising or impressing with a sharp instrument. Second, although similar temper types are represented, the simple stamped pottery from Mitchum was predominantly tempered with coarse crushed feldspar, whereas most *Hillsboro Simple Stamped* pottery from the other two sites was tempered primarily with fine feldspar or sand. Finally, the simple-stamp impressions associated with the Hillsboro series are both bolder and more deeply applied than the stamp impressions on any of the Mitchum site sherds.

Jenrette Cob Impressed

Fifteen corncob impressed sherds from the Mitchum site were classified as *Jenrette Cob Impressed*. Twelve came from the plowzone; the remainder were from Features 27, 29, and 36. All have smoothed interiors and are tempered with coarse crushed feldspar (n=9), sand (n=3), and fine crushed quartz (n=3). The two rimsherds are from jars with everted rims and rounded lips. None of the sherds are decorated. These potsherds probably are associated with the historic occupation of the Mitchum site.

Caraway Complicated Stamped

One curvilinear complicated stamped body sherd was recovered from the plowzone. It is tempered with sand and has a smoothed interior. This sherd is generally similar to *Caraway Complicated Stamped* sherds in the type collections of the Research Laboratories of Anthropology (Coe 1964:33–34).

Indeterminate Sherds

A majority (n=4,153) of all sherds recovered from the Mitchum site could not be reliably identified as to exterior surface treatment. Indeterminate sherds comprise about 43% of all plowzone sherds and almost 48% of all feature sherds.

Summary

Although a sizable collection of aboriginal pottery was recovered from the Mitchum site, the resulting data have not been sufficient to determine conclusively either the composition of the historic Mitchum phase ceramic assemblage or the possibility of multiple site occupations. All new ceramic data support earlier arguments for the existence of two separate components—an historic component represented by the plain and simple stamped pottery and an earlier Late Prehistoric component represented by net impressed pottery; however, the evidence upon which these arguments are based remains circumstantial. Because of this, the following interpretation must be considered tentative.

The majority, though not all, of the pottery from the Mitchum site can be assigned to an historic occupation which, based on the type and frequency of associated trade artifacts, probably dates to the mid-seventeenth century. This occupation has been placed within the Mitchum phase (A.D. 1600–1670). Mitchum phase ceramics include *Jenrette Plain*, *Jenrette Simple Stamped*, *Jenrette Cob Impressed*, *Hillsboro Check Stamped*, and *Caraway Complicated Stamped*, and reflect an assemblage dominated by large simple stamped jars and smaller jars and bowls with smoothed exteriors. General similarities in surface treatment, paste, vessel form, and decoration suggest that this assemblage is largely referable to the Jenrette ceramic series and developed out of the preceding Hillsboro series. Its similarity to pottery from the Jenrette site, interpreted as a roughly contemporaneous Shakori village, suggests a close cultural relationship between this group and the historic Sissipahaw. In all likelihood, the historic pottery assemblage from the Mitchum represents the terminal ceramic complex within the Haw drainage.

An earlier Late Prehistoric occupation, attributed to the latter part of the Haw River phase (ca. A.D. 1300 to A.D. 1400 ?), is tentatively identified by the presence of a substantial amount of net impressed pottery, classified as *Haw River Net Impressed*, within the plowzone, midden, and pre-midden humus. This pottery, along with most cord marked sherds, is very similar in all respects (e.g., exterior surface treatment, paste, vessel form, interior vessel treatment, decoration) to pottery recovered from the nearby Webster site and radiocarbon-dated to the early fifteenth century. The absence of associated pit features at Mitchum, while possibly viewed as an argument against recognizing an earlier Late Prehistoric component, is wholly consistent with our present knowledge about the content and spatial structure of the Webster site.

Finally, the small number of fabric marked sherds and possibly some of the cord marked sherds most likely are attributable to a minor site occupation during the late Early Woodland or early Middle Woodland period.

Lithic Artifacts

Archaeological investigations at the Mitchum site during 1986 produced a sample of 1,858 lithic artifacts (Table 7.4). Over 80% of these artifacts were recovered from disturbed contexts (i.e., plowzone, pothole fill, and surface); the remainder came from midden, old humus, and feature fill. Of the 24 features that were excavated, only six yielded more than 20 lithic artifacts.

Temporally diagnostic projectile points recovered from the site, as well as the occurrence of specific pottery types, indicate that the lithic artifact sample contains specimens attributable to Early Archaic, Middle Archaic, Middle Woodland, Late Prehistoric, and Contact period cultural components. Most artifacts in the sample probably are associated with the latter two components. Unfortunately, the lack of sufficient samples from feature contexts prevents the characterization of either Late Prehistoric or Contact period lithic tool assemblages at the site.

Lithic artifacts recovered from the Mitchum site include debitage and exhausted cores (n=1,252), chipped stone tools and tool fragments (n=572), ground stone tool fragments (n=7), and large cobble tools (n=27). Major artifact categories are described below.

Debitage

Decortication Flakes. Sample Size: 445. Form: This category includes both primary (n=89) and secondary (n=356) decortication flakes. Decortication flakes exhibit a striking platform and bulb of percussion on the ventral surface, and have cortex (primary - >75% cortex; secondary - <75% cortex) remaining on the dorsal surface. Material: Vitric tuff–371, Other metavolcanic rock–55, Quartz–5, Slate–4, Felsic tuff–3, Rhyolite–3, Quartzite–2, Basalt–1, Chalcedony–1. Comment: Decortication flakes are the by-products of initial stages of core reduction and chipped stone tool manufacture. The high ratio of decortication flakes to interior and bifacial thinning flakes (1:1.5) contrasts sharply with ratios observed at both the Edgar Rogers and George Rogers sites, and indicates that all stages of lithic tool production were performed at the site. Vitric tuff, the predominant raw material type recorded for decortication, interior, and bifacial thinning flakes, crops out along Haw River less than 0.5 mi upstream, and probably was also available along the valley slopes adjacent to the site.

Interior/Bifacial Thinning Flakes. Sample Size: 647. Form: Specimens classified as interior flakes (n=498) are flat flakes without a steep platform angle that exhibit flake removal scars on the dorsal surface and lack cortex. Bifacial thinning flakes (n=149) are similar but have a steep platform angle that indicates detachment from a biface. Material: Vitric tuff–367, Quartz–218, Other metavolcanic rock–48, Rhyolite–5, Felsic tuff–4, Basalt–2, Slate–1, Chert–1, Quartzite–1. Comment: These flakes are by-products of intermediate and final stages of core reduction and bifacial tool production.

Shatter Fragments. Sample Size: 30. Form: This category includes angular flakes that, based on morphological characteristics, cannot be specifically classified. Material: Vitric tuff–15, Other metavolcanic rock–8, Quartz–6, Slate–1. Comment: Shatter fragments result from all stages of lithic reduction.

Other Flakes. Sample Size: 7. Form: This category includes five bipolar flakes, one blade, and one core rejuvenation flake. Material: Quartz–4, Vitric tuff–3. Comment: The paucity of bipolar flakes and blades indicates that these flake production techniques were only rarely used at the Mitchum site.

Cores. Sample Size: 109. Form: These specimens are amorphous chunks or nodules of utilizable lithic raw material from which two or more flakes have been removed. Material: Vitric tuff–51, Quartz–48, Rhyolite–5, Other metavolcanic rock–4, Chalcedony–1. Comment: The large number of cores supports the earlier conclusion that all stages of lithic tool manufacture were performed at the site.

Raw Material. Sample Size: 14. Form: Ten of these specimens are chunks of utilizable rock that have been "tested" by removing a single flake. The other four specimens are utilizable rocks that were transported to the site but not physically altered. Material: Vitric tuff–13, Other metavolcanic rock–1. Comment: None.

Projectile Points

Palmer Corner-Notched Projectile Points. Sample Size: 2. Form: The *Palmer Corner-Notched* projectile point type is morphologically defined by "a small corner-notched blade with a straight, ground base and pronounced serrations" (Coe 1964:67); however, both of these specimens have slightly incurvate bases. Material: Vitric tuff–2. Comment: This is an Early Archaic (ca. 8,000 B.C.) projectile point type.

Morrow Mountain II Stemmed Projectile Points. Sample Size: 3. Form: This projectile point type is defined by "a long narrow blade with a long tapered stem" (Coe 1964:37). All three points are unbroken. Material: Vitric tuff–2, Rhyolite–1. Comment: The *Morrow Mountain II Stemmed* type is associated with the Middle Archaic period (ca. 5,500–5,000 B.C.).

Yadkin Large Triangular Projectile Points (Figure 7.30*a–d*). Sample Size: 5. Form: This projectile point type is defined as "a large, symmetrical, and well-made triangular point" (Coe 1964:45). Four of these points have strongly incurvate bases; the other point conforms more closely to Coe's (1964:47) "A-typical eared

Table 7.4. Distribution of lithic artifacts from the Mitchum site.

Category	PZ	Context: Midden	Old Humus	Fea 15	Fea 15 Pothole	Fea 16	Fea 17	Fea 20	Fea 21	Fea 22	Fea 24	Fea 25	Fea 26	Fea 26 Pothole
Debitage														
Decortication Flakes	304	36	33	2	-	13	1	-	9	1	-	-	1	7
Interior/Bif. Thin. Flakes	431	28	36	12	-	9	7	-	10	3	1	4	4	16
Shatter Fragments	23	-	-	-	-	-	-	-	1	-	-	-	-	2
Other Flakes	5	1	-	-	-	-	-	-	-	-	-	-	-	-
Cores	92	5	-	-	-	-	-	-	-	1	-	-	1	1
Raw Material	12	-	2	-	-	-	-	-	-	-	-	-	-	-
Projectile Points														
Palmer Corner-Notched	1	1	-	-	-	-	-	-	-	-	-	-	-	-
Morrow Mtn. II Stemmed	1	2	-	-	-	-	-	-	-	-	-	-	-	-
Yadkin Large Triangular	3	1	-	-	-	-	-	1	-	-	-	-	-	-
Small Triangular Points	93	7	2	1	-	-	-	-	3	-	-	-	-	-
Unidentified Points	8	-	-	-	-	-	1	1	-	-	-	-	-	-
Other Chipped Stone Artifacts														
Preforms	14	-	1	-	-	-	-	-	-	-	-	-	-	-
Bifaces	12	-	-	1	-	-	-	-	-	-	-	-	-	-
Drills	6	-	-	-	-	-	-	-	-	-	-	-	-	-
Chipped Hoes	3	1	-	1	-	-	-	-	-	-	-	-	-	-
Pièces Esquillées	10	1	-	-	-	-	-	-	-	-	-	-	-	-
End Scrapers	12	-	-	-	-	-	-	-	-	1	-	-	-	-
Denticulates	9	2	-	-	-	-	-	-	-	-	-	-	-	-
Spokeshaves	3	-	-	-	-	-	-	-	-	-	-	-	-	-
Perforators	7	-	2	-	-	-	-	-	-	-	-	-	-	-
Gravers	20	1	-	-	-	-	-	-	-	-	-	-	-	-
Utilized/Retouched Flakes	265	12	1	2	-	5	-	-	1	-	-	3	-	-
Ground Stone Artifacts														
Ground Celt	1	-	-	-	-	-	-	-	-	-	-	-	-	-
Ground Stone Fragments	4	2	-	-	-	-	-	-	-	-	-	-	-	-
Large Cobble Tools														
Hammerstones/Manos	6	-	-	-	-	-	-	-	-	-	-	-	-	-
Anvils/Milling Stones	2	1	-	-	3	-	-	-	-	-	-	-	-	-
Total	1347	101	77	19	3	27	9	2	24	6	1	7	6	26

variety." Material: Rhyolite–3, Vitric tuff–1, Felsic tuff–1. Comment: The *Yadkin Large Triangular* type is associated with the Early to Middle Woodland period (ca. A.D. 100–500).

Small Triangular Projectile Points (Figure 7.31). Sample Size: 120. Form: These projectile points are largely referable to Coe's (1964:49) *Caraway Triangular* type. Forty-seven point fragments are too small to determine edge configuration. The remaining 73 points and point fragments have either incurvate sides and base (n=24), incurvate sides and a straight base (n=3), incurvate sides and an excurvate base (n=26), straight sides and base (n=1), straight sides and an excurvate base (n=10), or straight sides and an incurvate base (n=9). These triangular points range from 13 mm to 33 mm (mean=22.4, sd=4.7, n=73) in length, 6 mm to 30 mm (mean=18.3, sd=4.4, n=107) in width, and 1 mm to 11 mm (mean=4.4, sd=1.6, n=111) in thickness. Material: Vitric tuff–96, Quartz–9, Felsic tuff–6, Rhyolite–5, Other metavolcanic rock–2, Welded tuff–1, Basalt–1. Comment: These projectile points probably are associated with both the Haw River and Mitchum phase occupations of the site.

Projectile Point Fragments. Sample Size: 10. Form: These specimens are projectile point fragments that could not be assigned to a specific type. Material: Vitric tuff–7, Felsic tuff–1, Rhyolite–1, Quartz–1. Comment: Both stemmed and triangular projectile point types probably are represented.

Other Chipped Stone Artifacts

Preforms. Sample Size: 16. Form: All of these specimens are triangular, bifacially-worked projectile point preforms that were discarded during the final stage of manufacture. Material: Vitric tuff–15, Rhyolite–1. Comment: These artifacts probably are

Table 7.4 Continued.

Category	Context												
	Fea 27	Fea 27 Pothole	Fea 28	Fea 31 Pothole	Fea 32	Fea 33	Fea 35	Fea 36	Fea 37	Fea 38	Surface	Misc.	Total
Debitage													
Decortication Flakes	1	2	1	-	-	-	-	6	1	12	13	2	445
Interior/Bif. Thin. Flakes	-	8	8	1	-	-	3	13	1	22	24	6	647
Shatter Fragments	-	2	1	-	-	-	-	-	-	-	1	-	30
Other Flakes	-	-	-	-	-	-	-	-	-	-	-	1	7
Cores	-	-	-	-	-	1	-	-	1	1	4	2	109
Raw Material	-	-	-	-	-	-	-	-	-	-	-	-	14
Projectile Points													
Palmer Corner-Notched	-	-	-	-	-	-	-	-	-	-	-	-	2
Morrow Mtn. II Stemmed	-	-	-	-	-	-	-	-	-	-	-	-	3
Yadkin Large Triangular	-	-	-	-	-	-	-	-	-	-	-	-	5
Small Triangular Points	-	-	-	-	1	-	1	1	-	1	8	2	120
Unidentified Points	-	-	-	-	-	-	-	-	-	-	-	-	10
Other Lithic Artifacts													
Preforms	-	-	-	-	-	-	-	-	-	-	1	-	16
Bifaces	-	-	-	-	-	-	-	-	-	-	3	2	18
Drills	-	-	-	-	-	-	-	1	-	-	-	1	8
Chipped Hoes	-	-	-	-	-	-	-	-	-	-	-	-	5
Pièces Esquillées	-	-	-	-	-	-	-	1	-	-	-	-	12
End Scrapers	-	1	-	-	-	-	-	-	-	-	-	1	15
Denticulates	-	-	-	-	-	-	-	-	-	1	-	1	13
Spokeshaves	-	-	-	-	-	-	-	-	-	-	-	-	3
Perforators	-	-	-	-	-	-	-	-	-	-	-	-	9
Gravers	-	-	-	-	-	-	-	-	-	-	-	-	21
Utilized/Retouched Flakes	1	2	-	-	-	-	-	3	-	3	7	7	312
Ground Stone Artifacts													
Ground Celt	-	-	-	-	-	-	-	-	-	-	-	-	1
Ground Stone Fragments	-	-	-	-	-	-	-	-	-	-	-	-	6
Large Cobble Tools													
Hammerstones/Manos	-	2	-	-	-	-	-	1	-	3	2	1	15
Anvils/Milling Stones	-	3	1	-	-	-	-	-	2	-	-	-	12
Total	2	20	11	1	1	1	4	26	5	43	63	26	1858

associated with the site's Haw River and Mitchum phase components.

Bifaces. Sample Size: 18. Form: Bifaces are blanks that exhibit flake removal scars, resulting from either percussion or pressure flaking, on both surfaces. Material: Vitric tuff–11, Quartz–3, Felsic tuff–1, Rhyolite–3. Comment: Although some of these specimens may be fragments of crudely-manufactured projectile points, most appear to represent early stages of tool manufacture. One heavily patinated biface apparently dates to the Archaic period.

Drills (Figure 7.30*e–i*). Sample Size: 8. Form: A drill is defined as a bifacial tool that has a long, parallel-sided, rod-like projection produced by bifacial retouch. Three of these tools are reworked triangular projectile points, four are manufactured on large flakes, and one is an unidentifiable bit fragment. Material: Vitric tuff–6, Rhyolite–2. Comment: All of these artifacts appear to be associated with the Haw River or Mitchum phases. These tools probably were hafted and used on dense materials such as wood, bone, or antler.

Chipped Hoes (Figure 7.32*b–c*). Sample Size: 5. Form: Chipped hoes are defined as large, hafted tools, usually sub-triangular in shape, that have a bifacial convex working edge transverse to the long axis. One specimen is an unbroken but heavily reworked; the remaining four are distal end (i.e., working edge or bit) fragments. Material: Other metavolcanic rock–5. Comment: These tools probably were used both for digging and cultivating crops.

Pièces Esquillées. Sample Size: 12. Form: Pièces esquillées are flakes, bifaces, or exhausted cores that display one or more sharp, straight, crushed working edges, produced by repeated blows using a bipolar percussion technique. Material: Vitric tuff–8, Quartz–

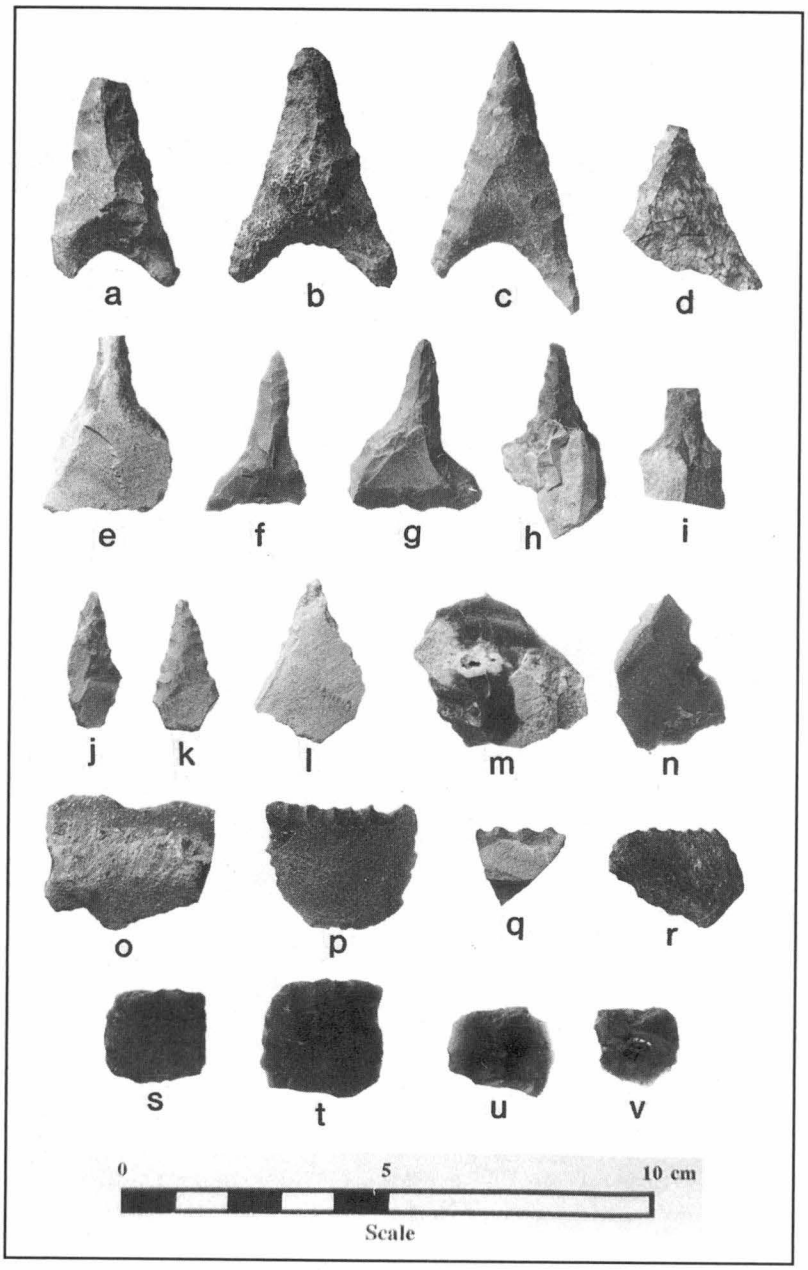

Figure 7.30. Miscellaneous chipped stone artifacts from the Mitchum site.

4. Comment: These specimens are interpreted as slotting tools or wedges used in bone working or woodworking.

End Scrapers. Sample Size: 15. Form: End scrapers are flakes or bifaces that exhibit steep, continuous retouch along the distal margin. One of these specimens is a reworked *Kirk Corner-Notched* projectile point. Material: Vitric tuff–9, Quartz–5, Felsic tuff–1. Comment: At least four of these tools, including the reworked point, are probably attributable to Archaic period occupations of the site. End scrapers are interpreted as probable hideworking implements.

Denticulates (Figure 7.30*p–r*). Sample Size: 13. Form: These specimens are flakes that have been unifacially or bifacially retouched along the margins to produce a sharp, serrated edge. Material: Vitric tuff–6, Quartz–3, Other metavolcanic rock–2, Rhyolite–1, Basalt–1. Comment: All of these artifacts, interpreted as cutting tools, appear to be associated with the Haw River or Mitchum phase components.

Spokeshaves (Figure 7.30*o*). Sample Size: 3. Form: These specimens are flakes that have been retouched along one edge to produce a broad, shallow concavity. Material: Vitric tuff–1, Felsic tuff–1, Quartz–1. Comment: Spokeshaves are interpreted as probable woodworking tools.

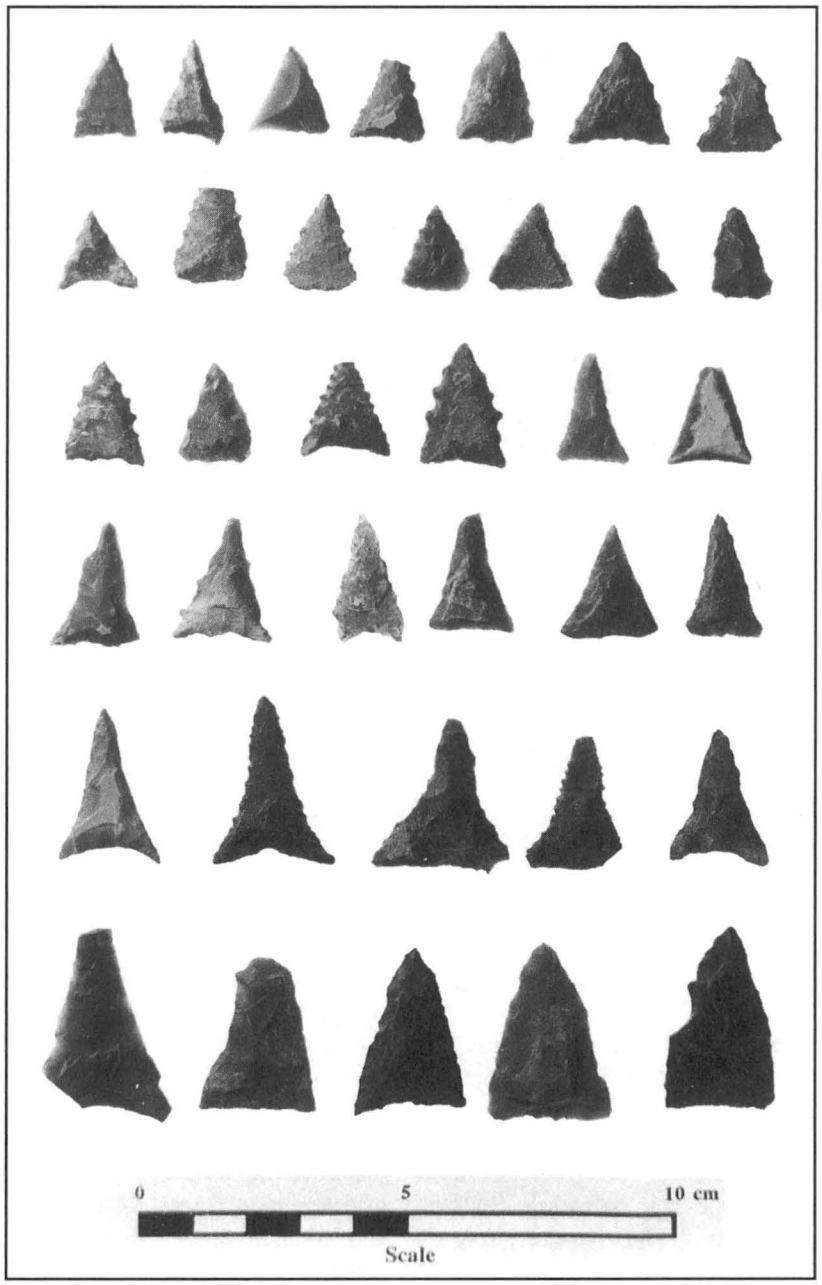

Figure 7.31. Chipped stone projectile points from the Mitchum site.

Perforators (Figure 7.30*j–l*). Sample Size: 9. Form: These specimens are small, amorphous flakes that have been finely retouched to produce a pointed tool bit. Material: Vitric tuff–5, Quartz–3, Rhyolite–1. Comment: The working edge characteristics of these tools suggest that they were used as punching or boring tools on soft materials.

Gravers (Figure 7.30*m–n*). Sample Size: 21. Form: These tools are amorphous flakes that possess fine retouch along the edge, producing a small, sharp, triangular projection. Material: Vitric tuff–13, Quartz–7, Rhyolite–1. Comment: Gravers most likely were used engraving or scoring tools. All of these specimens appear to be associated with the Haw River phase or Mitchum phase.

Utilized and Retouched Flakes. Sample Size: 312. Form: This category includes flakes that exhibit marginal retouch (n=110) or edge-damage (n=193) presumably resulting from use. Material: Vitric tuff–192, Quartz–81, Rhyolite–15, Felsic tuff–13, Other metavolcanic rock–4, Chalcedony–4, Basalt–1, Slate–1, Welded tuff–1. Comment: These are interpreted as *ad hoc* cutting implements.

Ground Stone Artifacts

Ground Celt (Figure 7.32*a*). Sample Size: 1. Form: This specimen is a water-worn cobble that was ground into a sub-triangular form and has a tapered

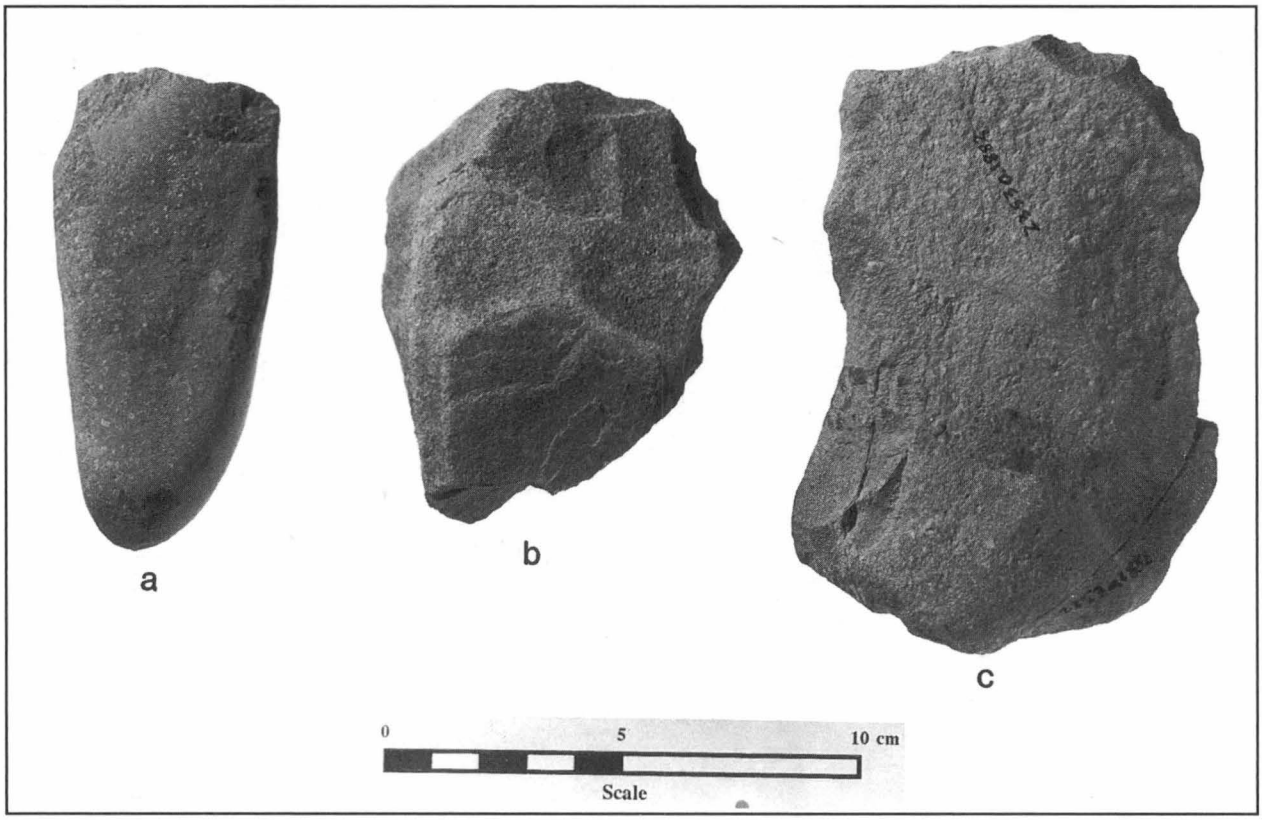

Figure 7.32. Ground stone and large chipped stone artifacts from the Mitchum site.

poll end. Although the bit originally was polished, it was subsequently resharpened by bifacial chipping. This celt measures 98 mm long by 46 mm wide by 24 mm thick. Material: Rhyolite–1. Comment: None.

Ground Stone Fragments. Sample Size: 6. Form: These specimens are unidentifiable fragments from ground stone tools. Material: Rhyolite–3, Other metavolcanic rock–1, Soapstone–1, Schist–1. Comment: The schist fragment appears to be from a small, unfinished, bi-pointed pendant. The soapstone fragment may be from a stone bowl.

Large Cobble Tools

Hammerstones/Manos. Sample Size: 15. Form: This category includes cobbles that exhibit crushing, battering, or abrasion on one or more surfaces. Material: Other metavolcanic rock–11, Quartz–2, Quartzite–1, Rhyolite–1. Comment: These specimens are interpreted as hand-held hammers and most likely were used primarily in flintknapping.

Anvils/Milling Stones. Sample Size: 12. Form: The specimens are large, flat cobbles or tabular slabs that show signs of abrasion or wear on one surface. Material: Other metavolcanic rock–10, Rhyolite–1, Basalt–1. Comment: These implements may have been used to mill seeds or process other kinds of plant foods.

Summary

Although a sizable collection of lithic artifacts was recovered from the Mitchum site, their interpretative potential is limited due the presence of multiple site occupations and the likelihood that most artifacts are the product of two separate but temporally proximate occupations. Since most artifacts were recovered from disturbed contexts, it is not possible to determine differences in lithic tool use between the Haw River and Mitchum phase components identified through the ceramic analysis. We still know far too little about the aboriginal occupation of the Haw River drainage during the Contact period; however, the variety of lithic tool types recovered contrasts sharply with the lithic assemblage from the late seventeenth-century Fredricks site along Eno River, and suggests either: 1) a much greater reliance upon stone tool technology at the Mitchum site during the Contact period; or 2) that much of the lithic artifact sample predates the historic site occupation.

Collectively, the lithic artifacts associated with the Haw River and Mitchum phase components suggest a wide range of activities including: the acquisition of lithic resources, all stages of lithic reduction and tool manufacture, weapons repair, butchering, woodworking, hideworking, bone working, digging or gardening, and possibly plant food processing.

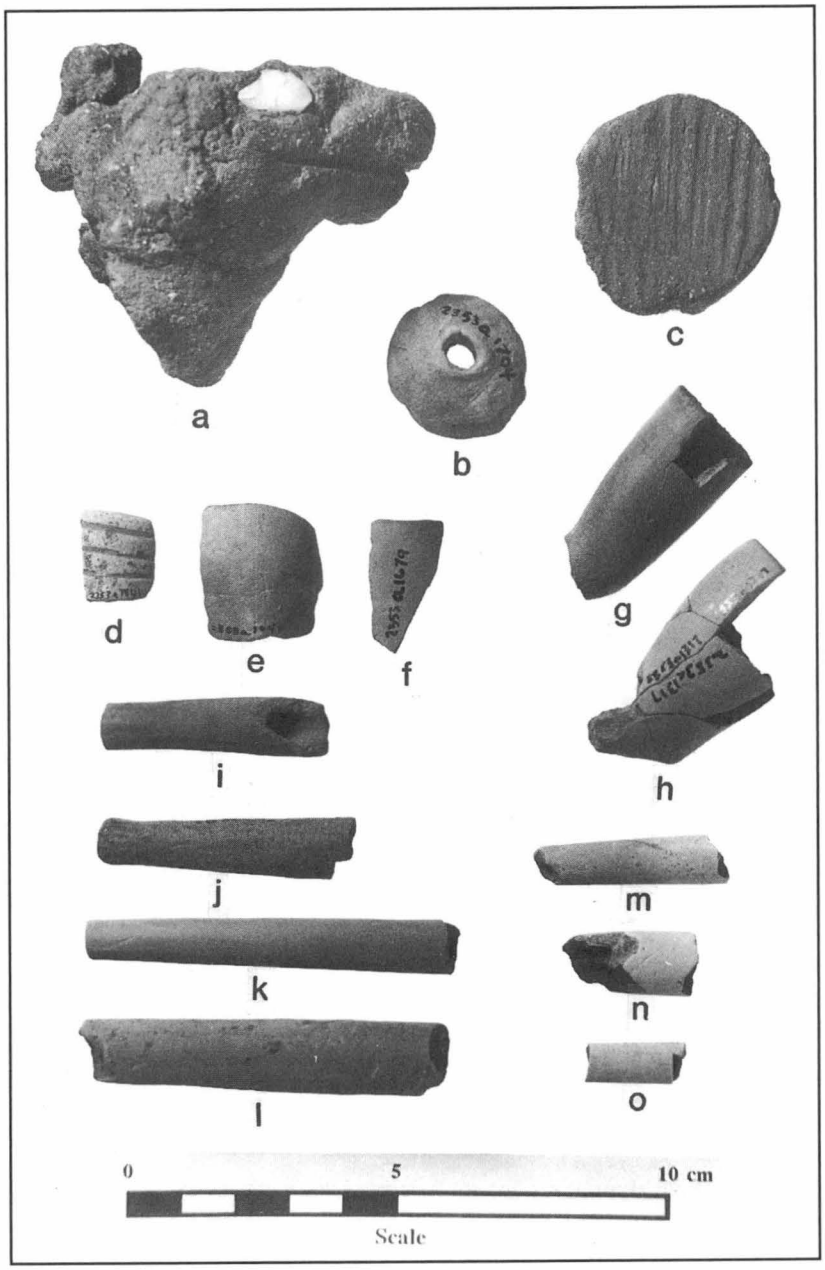

Figure 7.33. Clay artifacts from the Mitchum site.

Clay Artifacts

Sixty-nine aboriginal clay pipe fragments were recovered from plowzone (n=53), sub-plowzone midden (n=5), and Features 26 (n=1), 29 (n=1), 36 (n=2), and 38 (n=7) (Figure 7.33*d–l*). All but 14 of these specimens are stem fragments. The bowl fragments, including two reconstructed bowls from Feature 38, mostly represent finely-made elbow pipes with undecorated rims (Figure 7.33*f–h*). One other bowl fragment appears to be from a tubular "onion-form" pipe (Figure 7.33*e*). Both kinds of pipes have been recovered from both Upper Saratown and the Fredricks site and represent Contact period pipe styles.

Three other fired clay artifacts were recovered from the plowzone at the Mitchum site and include: a pottery disk (40 mm diameter), a hemispherical clay bead (27 mm diameter), and three adjoining fragments of a crudely modeled dog's head effigy made of feldspar tempered potter's clay with quartz imbedded in the clay to represent an eye (Figure 7.33:*a–c*). This latter object appears to represent a child's toy.

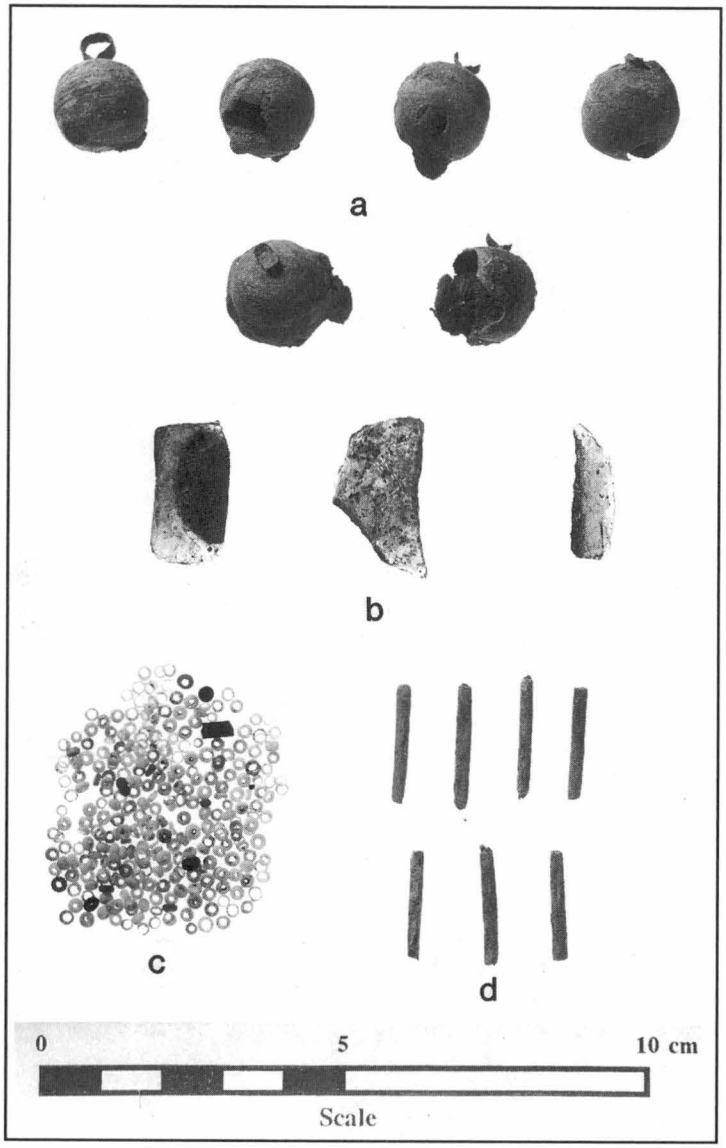

Figure 7.34. European trade artifacts from the Mitchum site.

Bone and Shell Artifacts

The only bone artifacts found at the Mitchum site were a drilled turtle plastron fragment from Feature 36 and a possible deer metatarsal beamer fragment from Feature 38.

One fragmented mussel shell scraper with a serrated edge was recovered from Feature 16. No other shell artifacts were found.

Historic Artifacts

Kaolin Pipe Fragments

Three kaolin pipe stem fragments, all with 7/64-inch bore diameters, were recovered from the plowzone (Figure 7.33*m–o*). Kaolin pipes were a common artifact type at the historic Fredricks site.

Glass Beads

A total of 1,351 glass beads were recovered from Features 26 (Burial 2), 27, 36, 37, and 38, as well as from potholes intrusive into Features 26 and 27 (Table 7.5; Figure 7.34*c*). All but two of these were small (2–4 mm) seed beads. Most (n=1,244) were white but blue (n=100), black (n=4), and red (n=1) seed beads also were present. The remaining two specimens were a small, bright navy blue, tubular bead (Type Ia19) and a large (8 mm diameter), simple, turquoise bead (Type

Table 7.5. Summary of glass beads from the Mitchum site.

Context	Seed Beads (2–4 mm) White	Blue	Black	Red	Small Blue Tubular Bead	Large Turquoise Bead	Total
Fea. 26	11	5	-	-	-	-	16
Fea. 26 (Pothole)	636	40	3	-	1	-	680
Fea. 27	471	19	-	-	-	-	490
Fea. 27 (Pothole)	47	22	1	1	-	-	71
Fea. 36	38	4	-	-	-	1	43
Fea. 37	2	1	-	-	-	-	3
Fea. 38	39	9	-	-	-	-	48
Total	1244	100	4	1	1	1	1351
Percent	92.08%	7.40%	0.30%	0.07%	0.07%	0.07%	100.00%

IIa31) (see Kidd and Kidd 1970). White and blue seed beads also were the most common bead types found at Upper Saratown, a late seventeenth-century Sara village on the upper Dan River.

Bottle Glass

Four pieces of pitted green wine or rum bottle glass were recovered from the plowzone (Figure 7.34*b*). One of these pieces has been retouched into a perforator. Numerous fragments of bottle glass have been found in aboriginal contexts at the Fredricks site, Jenrette site, and other late seventeenth-century Indian village sites in piedmont North Carolina.

Metal Artifacts

Forty-five metal artifacts were recovered from the Mitchum site. A majority of these, including 29 iron fragments, a shotgun shell, and a brass button from plowzone, probably are associated with nineteenth-century and twentieth-century activities in the site vicinity. Fourteen other artifacts, however, can be attributed to the Indian occupation of the site. One of these artifacts, a frizzen spring fragment recovered from plowzone, is attributed to this occupation based upon similarities to artifacts found at the Fredricks site. The remaining artifacts are from Feature 26 and a pothole intruding that feature. These specimens appear to represent ornaments associated with Burial 2 and include: six sheet brass bells (ca. 15 mm diameter) and seven rolled brass or copper beads (2 mm diameter and 20 mm long) (Figure 7.34*a,d*). Similar bells were recovered as burial associations at the Fredricks and Jenrette sites.

Gunflints

Six gunflints were found at the Mitchum site (Figure 7.30*s–v*). Two fragments of exhausted, spall-type, European gunflints were recovered from the plowzone near Features 36 and 38. The other four specimens, made on thin flakes of locally-available vitric tuff, were recovered from the plowzone and the top of Feature 34 (n=1).

Other Artifacts

In addition to the historic artifacts described above, 31 brick fragments, 13 historic potsherds, and three pieces of window glass also were recovered. All of these specimens came from the plowzone and post-date the aboriginal occupation of the site.

Faunal Remains

by

Mary Ann Holm

The sample of animal bone recovered during 1986 excavations at the Mitchum site is relatively small and comprised of bones that are, in general, poorly preserved (Table 7.6). Because of this, the faunal remains from 1983 test excavations at the site also were analyzed. Eight hundred animal bones and bone fragments were recovered from features in 1983 while 1,433 specimens were recovered from features excavated in 1986. Almost 80% of the sample was recovered from Features 6 (n=600), 13 (n=103), 16 (n=412), 17 (n=178), 36 (n=287), and 38 (n=193). Most of the other features contained very few or no preserved animal bones.

Approximately 32% of the faunal sample could be identified beyond the level of class. A minimum of 20 individuals, representing 15 different species, was identified. Of these individuals, 50% are mammals, 10% are birds, 20% are reptiles, and 20% are fish.

Table 7.6. Faunal remains from the Mitchum site.

Species	Count N	Count %	Weight Grams	Weight %	MNI N	MNI %
Mammals						
Unidentified	561	25.12	353.20	19.53	-	-
Sylvilagus sp., Rabbit	5	0.22	2.40	0.13	1	5.00
Sciurus sp., Squirrel	7	0.31	0.66	0.04	1	5.00
Castor canadensis, Beaver	5	0.22	0.50	0.03	1	5.00
Sigmodon hispidus, Hispid Cotton Rat	1	0.04	0.10	0.01	1	5.00
Microtus pennsylvanicus, Meadow Vole	5	0.22	0.13	0.01	1	5.00
Ursus americanus, Black Bear	5	0.22	33.80	1.87	1	5.00
Procyon lotor, Raccoon	2	0.09	6.10	0.34	1	5.00
Artiodactyla, Even-toed Ungulates	3	0.13	0.85	0.05	-	-
Odocoileus virginianus, White-tailed Deer	203	9.09	1151.77	63.69	3	15.00
Sub-Total	797	35.69	1549.51	85.68	10	50.00
Birds						
Unidentified	2	0.09	0.50	0.03	-	-
Meleagris gallapavo, Turkey	8	0.36	12.90	0.71	1	5.00
Passeriformes, Perching Birds	1	0.04	0.07	<0.01	1	5.00
Sub-Total	11	0.49	13.47	0.74	2	10.00
Reptiles						
Turtle, Unidentified	209	9.36	47.01	2.60	-	-
Terrapene carolina, Box Turtle	121	5.42	87.50	4.84	3	15.00
Snake, Unidentified	16	0.72	0.79	0.04	-	-
Colubridae, Non-poisonous Snakes	16	0.72	0.70	0.04	1	5.00
Sub-Total	362	16.21	136.00	7.52	4	20.00
Fish						
Unidentified	252	11.29	3.28	0.18	-	-
Lepisosteus sp., Gar	88	3.94	6.85	0.38	1	5.00
Ictalurus sp., Catfish	1	0.04	0.03	<0.01	1	5.00
Catastomus sp., Suckers	12	0.54	0.27	0.01	2	10.00
Sub-Total	353	15.81	10.43	0.58	4	20.00
Unidentified	710	31.80	99.05	5.48	-	-
Total	2233	100.00	1808.46	100.00	20	100.00

Mammals

With the exception of white-tailed deer (MNI=3), none of the mammalian species is represented by more than a single individual. Other identified mammals include rabbit, squirrel, beaver, hispid cotton rat, meadow vole, black bear, and raccoon. Although European trade artifacts were recovered from several features at the Mitchum site, no evidence of domesticated mammals was found.

Birds

The remains of birds form only a very small portion of the faunal sample from the Mitchum site (0.49% of the total number of bone fragments). One turkey and the remains of an unidentified member of the family Passeriformes (perching birds) were identified.

Reptiles and Amphibians

A minimum of three box turtles and one unidentified non-poisonous snake are the only reptiles represented in the sample. No amphibians were identified.

Fish

Two suckers, one catfish, and one gar are represented in the faunal sample from this site. Only 29% of the fish remains could be identified to the level of family.

Modified Bone

Approximately 31% of the bone fragments in the sample are burned. In addition, three deer bone fragments exhibit gnawing marks.

Shell

Small quantities of freshwater mussel shell were recovered from Features 15, 16, 28, 36, and 38. These specimens have not been analyzed beyond preliminary sorting and quantification.

Summary

As with the other sites investigated within the Haw drainage, the small size of the faunal sample permits only limited interpretation of faunal resource exploitation. White-tailed deer was the dominant meat source, although other mammals such as black bear, raccoon, beaver, rabbit, and squirrel probably also contributed significantly to the overall diet. It is likely that other animals such as turkey, box turtle, and a variety of fish also were taken on a regular basis. Hispid cotton rat and meadow vole bones probably represent some of the small rodents that lived at the site. In general, a fairly broad-based faunal exploitation strategy is indicated by the sample of animal bone at the Mitchum site. This pattern also appears to characterize the faunal collections that were recovered from earlier Haw River phase and Hillsboro phase sites within the region.

Botanical Remains

by
Kristen J. Gremillion

Carbonized plant remains from the 1986 excavations at the Mitchum site were recovered from 34 flotation samples representing 333.5 liters of feature fill (Tables 7.7, 7.8, and 7.9). Other plant remains from water-screened feature fill were not analyzed. A total of 85.04 grams of wood charcoal, seeds, nutshell, and other charred plant remains was recovered from all features except Features 23, 27, and 31.

Nutshell

The 1986 investigations at Mitchum produced an assemblage of plant food remains similar in composition to that collected from Features 1 through 14 in 1983 (Gremillion 1987). Hickory, acorn, and walnut shell were all represented in the 1986 sample, with hickory shell comprising the bulk of plant food remains.

Cultigens

Maize cupules or kernels were found in half of all 10-liter flotation samples and comprised a relatively low 7.6% of plant food remains. Common bean occurred in three 10-liter samples (10.7%) from Features 22, 26, and 28. No cucurbit remains were found. A single sunflower seed (9.9 mm by 4.1 mm) also was recovered from Feature 26. Estimated dimensions of the uncarbonized achene are 12.9 mm by 6.0 mm using the conversion factors recommended by Yarnell (1978).

Both knotweed (one seed) and maygrass (one caryopsis) were present in the 1986 sample. Maygrass was abundant (total of 440 caryopses) in one feature excavated in 1983.

Peach, an Old World domesticate first introduced to North America by the Spanish, was represented by pit fragments in Features 29, 36, and 38. Peach pits also were recovered during 1983.

Seeds

Other fleshy fruits represented by charred seeds include black gum, grape, hawthorn, and maypops. Maypops, the most common seed found at Mitchum, did not occur at any of the other sites investigated in the Haw River drainage.

Summary

The Mitchum site represents the only Contact period village found in the Haw River drainage. Though it was probably occupied at about the same time as the Jenrette site on the Eno River and shares certain traits with Jenrette, we chose to define a separate Mitchum phase because of ethnohistoric evidence that suggests Jenrette was inhabited by the Shakori tribe visited by John Lederer in 1670, whereas Mitchum was probably the home of the historic Sissipahaw Indians briefly mentioned by John Lawson in 1701. The fact that Lawson never actually visited the village and only mentioned the Sissipahaw in passing may mean that they no longer constituted a viable social entity by the time of his journey (Lefler 1967:60). It seems odd that Lawson and his party would have spent the night under the cold January stars on the north bank of the Haw, if they could have enjoyed the comforts of a nearby village. Lawson was not one to show timidity or hesitancy when it came to taking advantage of native hospitality. The apparent early disintegration of the Sissipahaw may also explain the absence of other Contact period villages in the Haw drainage and the near absence of utilitarian trade goods (characteristic of later contact sites) from the Mitchum site.

Although ceramic evidence indicates the presence of an earlier Haw River phase occupation at Mitchum, our excavations did not extensively sample this component. The subsequent, mid-seventeenth century Mitchum

Table 7.7. Carbonized plant remains from the Mitchum site (weight in grams).

Context	Soil Volume (liters)	Wood Charcoal	Unknown Plant	Root or Tuber	Plant Food Remains	Total
Feature 15						
Zone 1	14.5	1.30	0.09	-	0.91	2.30
Feature 16						
Zone 1	6	2.21	0.45	-	0.66	3.32
Zone 2	10	4.49	0.16	-	0.58	5.23
Zone 4	10	0.22	-	-	-	0.22
Total	26	6.92	0.61	-	1.24	8.77
Feature 17						
Zone 1	10	3.67	0.10	-	0.34	4.11
Zone 2	20	0.95	0.27	-	0.53	1.75
Total	30	4.62	0.37	-	0.87	5.86
Feature 18						
Zone 1	10	18.71	0.12	-	0.11	18.94
Feature 19						
Zone 1	8	0.86	0.31	-	0.10	1.27
Feature 20						
Zone 1	10	2.67	0.40	-	0.12	3.19
Feature 21						
Zone 1	10	0.17	0.13	-	0.64	0.94
Feature 22						
Zone 1	10	2.64	0.20	-	0.67	3.51
Zone 2	10	0.22	0.07	-	0.06	0.35
Total	20	2.86	0.27	-	0.73	3.86
Feature 24						
Zone 1	10	6.68	-	-	0.04	6.72
Zone 2	10	1.95	-	-	-	1.95
Total	20	8.63	-	-	0.04	8.67
Feature 25						
Zone 1	10	2.29	0.03	-	0.01	2.33
Feature 26						
Pothole	10	0.66	0.04	-	0.29	0.99
Zone 1	10	0.42	0.18	-	0.42	1.02
Total	20	1.08	0.22	-	0.71	2.01
Feature 28						
Zone 1	7.5	1.54	0.10	-	0.09	1.73
Zone 2	5	0.56	<0.005	-	0.08	0.64
Total	12.5	2.10	0.10	-	0.17	2.37
Feature 29						
Zone 1	10	4.71	0.63	-	1.78	7.12
Zone 2	10	0.55	0.02	-	0.13	0.70
Total	20	5.26	0.65	-	1.91	7.82
Feature 30						
Zone 1	10	1.10	0.01	-	0.03	1.14
Feature 32						
Zone 1	28	3.90	0.16	-	0.62	4.68
Feature 33						
Zone 1	10	0.48	<0.005	-	-	0.48
Feature 34						
Zone 1	10	0.09	0.06	-	0.01	0.16
Feature 35						
Zone 1	10	1.64	0.16	0.02	0.21	2.03
Feature 36						
Zone 1	10	4.19	0.17	-	0.24	4.60
Feature 37						
Zone 1	10	0.25	0.07	-	0.04	0.36
Feature 38						
Zone 1	20	2.49	0.15	-	0.62	3.26
Total	333.5	71.61	4.08	0.02	9.33	85.04

Table 7.8. Plant food remains from the Mitchum site (weight in grams).

Context	Hickory Shell	Acorn Shell	Walnut Shell	Peach Pit	Maize Kernels	Maize Cupules	Common Bean	Seeds	Total
Feature 15									
Zone 1	0.89	0.01	-	-	-	-	-	0.01	0.91
Feature 16									
Zone 1	0.65	<0.005	-	-	-	0.01	-	<0.005	0.66
Zone 2	0.55	-	0.01	-	-	0.01	-	0.01	0.58
Sub-total	1.20	<0.005	0.01	-	-	0.02	-	0.01	1.24
Feature 17									
Zone 1	0.33	<0.005	-	-	-	-	-	0.01	0.34
Zone 2	0.49	-	0.01	-	-	0.03	-	<0.005	0.53
Sub-total	0.82	<0.005	0.01	-	-	0.03	-	0.01	0.87
Feature 18									
Zone 1	0.11	-	-	-	-	-	-	-	0.11
Feature 19									
Zone 1	0.10	-	-	-	-	-	-	-	0.10
Feature 20									
Zone 1	0.03	0.02	-	-	0.06	-	-	0.01	0.12
Feature 21									
Zone 1	0.55	-	0.09	-	-	-	-	-	0.64
Feature 22									
Zone 1	0.51	0.03	0.11	-	-	-	0.02	-	0.67
Zone 2	0.06	-	-	-	-	-	-	<0.005	0.06
Sub-total	0.57	0.03	0.11	-	-	-	0.02	<0.005	0.73
Feature 24									
Zone 1	0.03	-	-	-	-	-	-	0.01	0.04
Feature 26									
Pothole	0.28	<0.005	0.01	-	-	-	-	-	0.29
Zone 1	0.24	0.02	-	-	0.02	0.01	0.05	0.08	0.42
Sub-total	0.52	0.02	0.01	-	0.02	0.01	0.05	0.08	0.71
Feature 28									
Zone 1	0.04	0.04	-	-	-	-	-	0.01	0.09
Zone 2	-	0.02	0.01	-	<0.005	-	0.05	-	0.08
Sub-total	0.04	0.06	0.01	-	<0.005	-	0.05	0.01	0.17
Feature 29									
Zone 1	1.13	0.06	0.04	0.47	-	0.08	-	<0.005	1.78
Zone 2	0.13	<0.005	-	-	<0.005	<0.005	-	<0.005	0.13
Sub-total	1.26	0.06	0.04	0.47	<0.005	0.08	-	<0.005	1.91
Feature 30									
Zone 1	0.03	<0.005	-	-	-	-	-	-	0.03
Feature 32									
Zone 1	0.33	<0.005	0.21	-	0.01	0.06	-	0.01	0.62
Feature 34									
Zone 1	0.01	<0.005	-	-	-	<0.005	-	-	0.01
Feature 35									
Zone 1	0.10	0.03	0.07	-	-	0.01	-	<0.005	0.21
Feature 36									
Zone 1	0.10	0.03	-	0.02	0.02	0.07	-	<0.005	0.24
Feature 37									
Zone 1	0.03	-	-	-	-	-	-	0.01	0.04
Feature 38									
Zone 1	0.17	0.04	0.06	0.02	-	0.31	-	0.02	0.62
Total	6.89	0.30	0.62	0.51	0.11	0.60	0.12	0.18	9.33

Table 7.9. Seed and fruit counts from the Mitchum site.

Context	Knot-weed	May-grass	May-pops	Black Gum	Haw-thorn	Grape	Sun-flower	Common Bean	Maize Kernels	Unknown	Total
Feature 15											
Zone 1	-	-	-	-	-	-	-	-	-	2	2
Feature 16											
Zone 1	-	-	-	1	-	-	-	-	-	-	1
Zone 2	-	-	2	-	-	-	-	-	-	-	2
Sub-total	-	-	2	1	-	-	-	-	-	-	3
Feature 17											
Zone 1	-	-	-	-	-	1	-	-	-	-	1
Zone 2	-	-	-	-	-	-	-	-	-	1	1
Sub-total	-	-	-	-	-	1	-	-	-	1	2
Feature 20											
Zone 1	-	-	-	-	-	-	-	-	1	1	2
Feature 22											
Zone 1	-	-	-	-	-	-	-	1	-	-	1
Zone 2	-	-	-	-	-	-	-	-	-	1	1
Sub-total	-	-	-	-	-	-	-	1	-	1	2
Feature 24											
Zone 1	-	-	1	-	-	1	-	-	-	-	2
Feature 26											
Zone 1	-	-	-	1	-	-	1	1	-	1	4
Feature 28											
Zone 1	-	-	-	-	-	-	-	-	-	5	5
Zone 2	-	-	-	-	-	-	-	-	1	-	2
Sub-total	-	-	-	-	-	-	-	1	1	5	7
Feature 29											
Zone 1	-	-	1	-	-	-	-	-	-	-	1
Zone 2	-	-	-	-	-	-	-	-	1	1	2
Sub-total	-	-	1	-	-	-	-	-	1	1	3
Feature 32											
Zone 1	-	-	2	-	1	-	-	-	1	-	4
Feature 35											
Zone 1	-	1	-	-	-	-	-	-	-	-	1
Feature 36											
Zone 1	-	-	1	-	-	-	-	-	1	-	2
Feature 37											
Zone 1	1	-	-	-	-	-	-	-	-	1	2
Feature 38											
Zone 1	-	-	-	1	-	-	-	-	-	-	1
Total	1	1	7	3	1	2	1	3	5	13	37

phase village appears to have been less than 1.5 acres in extent. The subrectangular, wigwam-like houses and associated storage pits were surrounded by a palisade. The intrasite structure at Mitchum coincides to a large degree with that of the Jenrette site. The one noticeable difference is the absence of large, artifact-rich earth ovens or "barbeque" pits similar to those found at Jenrette. Their absence at the Mitchum site is somewhat puzzling since they also were present at the earlier George Rogers and Edgar Rogers sites.

Although the ethnobotanical and faunal samples were limited, they do indicate the exploitation of a wide range of wild plant and animal resources. Deer and turtle were important to the native diet as were rabbits, squirrels, raccoons, and other small mammals. Corn, beans, and sunflowers were cultivated in small plots around the village, and peaches were harvested from trees probably derived from Spanish stock.

Chapter 8

The Webster Site

The Webster site (RLA-Ch463; 31Ch463) is located on the north side of Haw River in northern Chatham County, North Carolina (Figure 8.1). It was first visited by archaeologists from the Research Laboratories of Anthropology in the fall of 1977. At that time, it was being looted by pothunters, and the residue from their backdirt piles indicated the presence of human burials as well as trash pits and other intact features. With the support of the landowner, the looting of the site was stopped. Subsequent conversations with some of the relic hunters revealed that historic trade goods, as well as a shallow "midden," had been found. When the site was re-visited in 1980, only a few artifacts were observed on the surface, and there was nothing to indicate the rich deposits that had fueled the pothunters' greed.

Because the looting activity had uncovered intact cultural deposits as well as trade materials, it was felt that the Webster site could provide important information concerning European-Indian interaction and culture change. Its location, directly across the Haw River from the Mitchum site, also was deemed significant from a comparative standpoint.

The Webster site is surrounded by one of the few broad expanses of bottomland along the lower reaches of the Haw River. It is situated on a low terrace some 300 ft northeast of the main channel of the river. The site lies protected, tucked against the steep slope of a pronounced bluff bordering the edge of the valley, and is separated from the main channel by an intermittent stream. On the opposite bank of this stream is another low terrace. This topography suggests that the Haw River may have changed courses and once flowed through a channel whose course is today marked by the intermittent tributary. The landowner reported that the river floods periodically, covering the bottoms with water except for the high ground upon which the Webster site is located.

During the fall of 1983, three 5-ft by 5-ft test squares and one 10-ft by 10-ft square were excavated in the western area of the site where the pothunting activities had taken place in 1977. The smaller test pits were excavated along a north-south baseline at 100-ft intervals. The 10-ft by 10-ft square was laid out 100 ft south and 100 ft east of the southernmost test pit. Except for a few artifacts in the plowzone, these tests were sterile.

Because of the thin and widely dispersed distribution of surface artifacts, the failure of the previous tests to locate subsurface features, and the fact that more than one cultural component seemed to be represented, two local collectors were asked to point out the area where the buried deposits containing historic artifacts were located. The area they identified was in the south-central portion of the site, just west of the 10-ft by 10-ft square excavated earlier.

Initially, a 20-ft by 50-ft strip was auger tested at 2.5-ft intervals where the collectors had indicated the main component of the site was located. All of these tests were negative. Believing the main occupation to be further to the east, a 20-ft by 50-ft block was laid out 50 ft east of the initial strip and tested at 5-ft intervals. A single pit feature was located. This area was expanded to a 9,000-sq-ft block and the test interval was decreased again to 2.5 ft.

Eventually, over 1,600 auger tests were conducted at the Webster site, resulting in the identification of the aforementioned feature, a second feature that later turned out to be a tree disturbance, and a thin 30-ft by 30-ft midden or humus deposit located at the northern end of the second test block. Seven 10-ft by 10-ft squares were excavated to expose the features and to remove 75 cu ft of the midden. Four contiguous units formed an L-shaped excavation in the vicinity of Feature 1 and shared a corner with the 10-ft by 10-ft square excavated in 1983. The midden was sampled with three 10-ft square units comprising a 10-ft by 30-ft trench (Figures 8.2 and 8.3).

Stratigraphy

The test squares excavated in 1983 revealed a straightforward stratigraphy. The upper layer consisted of a plowzone, roughly one foot thick, comprised of a light brown sandy loam. This disturbed layer overlay a yellowish brown sandy subsoil. Several Archaic lithic artifacts were recovered from the plowzone, as well as from the upper portion of the subsoil, suggesting the presence of an intact Archaic component. The southernmost block excavated in 1986 uncovered a similar profile; however, the frequency of Archaic specimens dropped considerably (Figure 8.4).

In the midden area, the plowzone lay atop an undisturbed deposit of dark brown soil that contained numerous potsherds and fragments of animal bone, fired clay, and freshwater mussel shells. This zone averaged approximately 0.2 ft in thickness and did not extend into the western and eastern profiles of the trench. It's north-south limits are unknown.

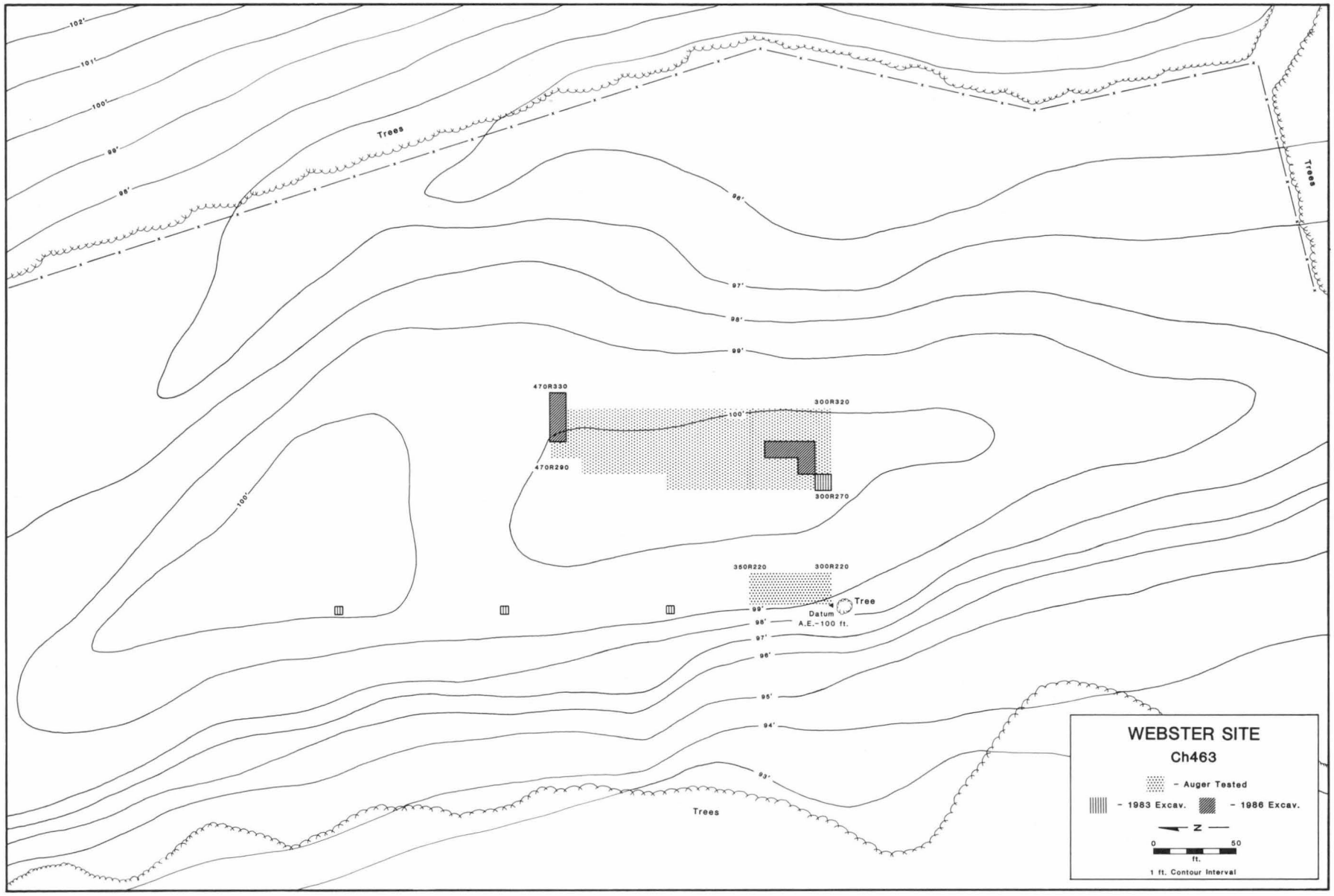

Figure 8.1. Map of the Webster site showing areas of auger testing and excavation.

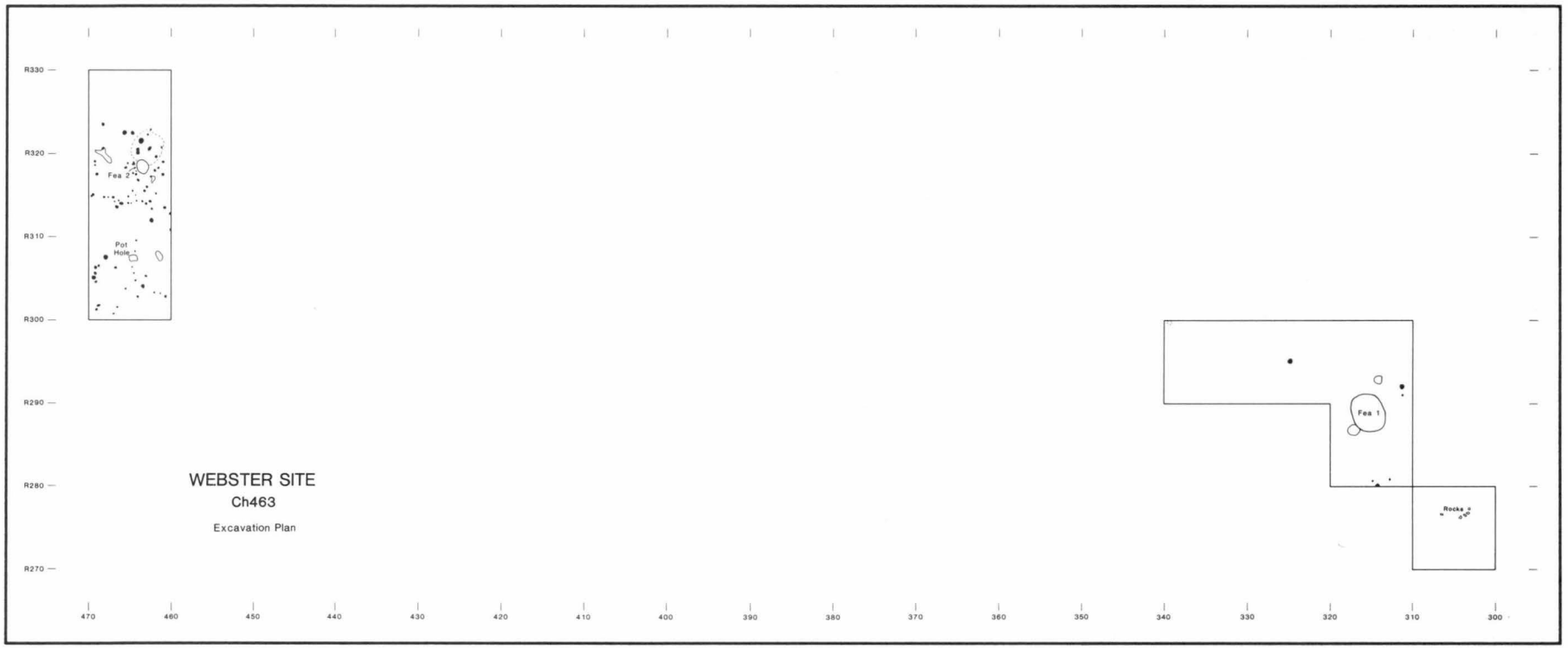

Figure 8.2. Excavation plan at the Webster site.

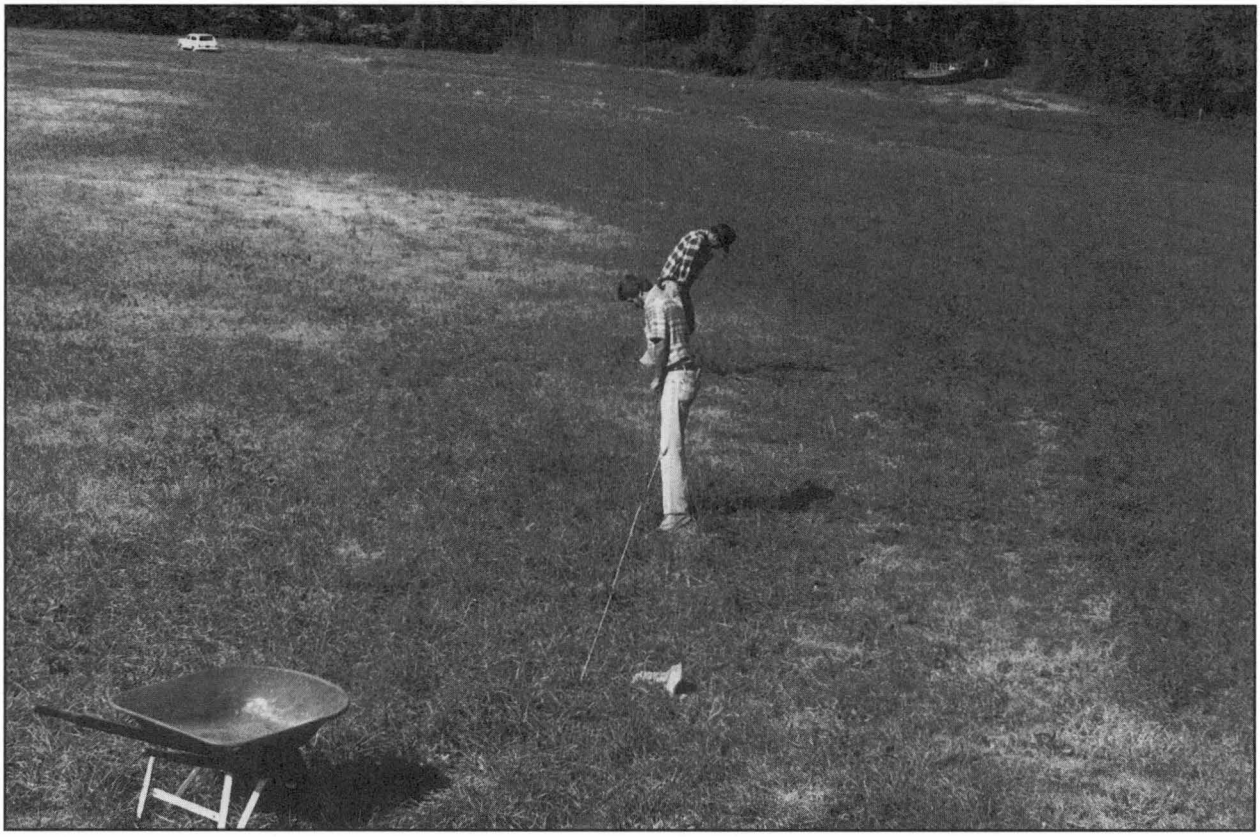

Figure 8.3. Systematic auger testing at the Webster site.

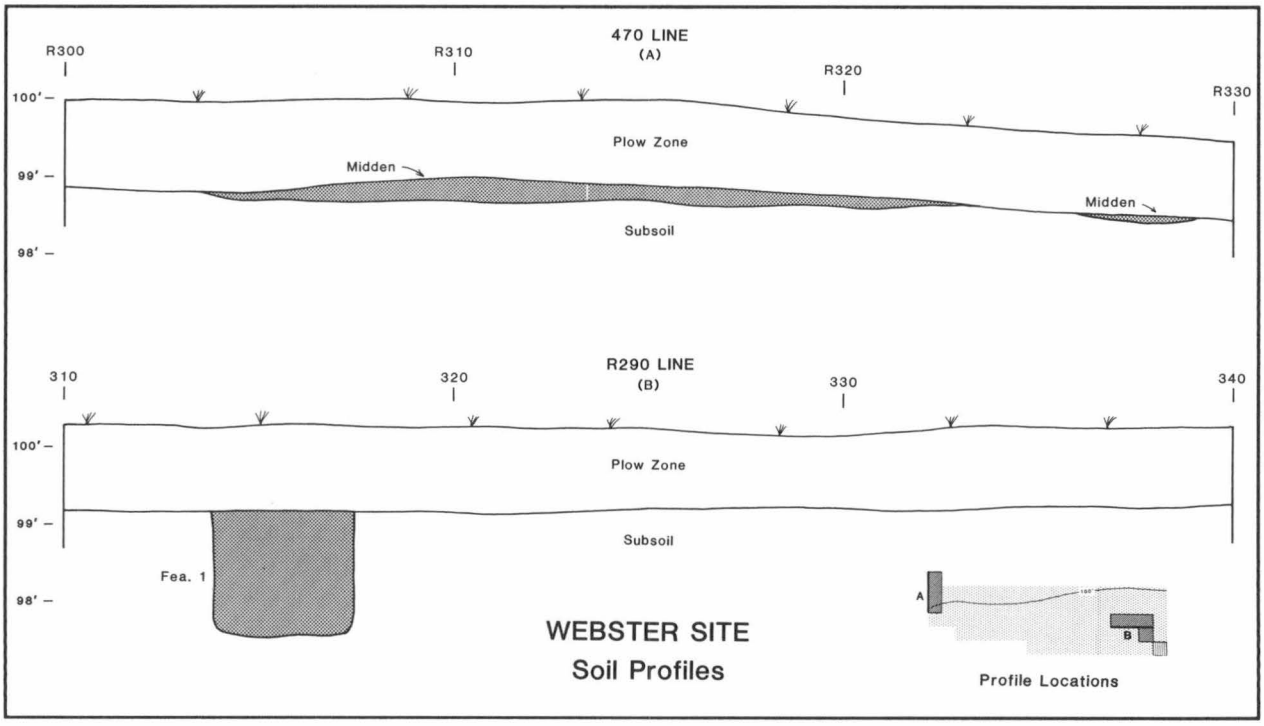

Figure 8.4. Stratigraphic profiles.

Table 8.1. Summary of features identified at the Webster site.

Feature No.	Type	Center Location	Dimensions (ft) L	W	D	Phase Association	Comment
Fea. 1	Storage Pit	315.5R288.9	5.0	4.2	1.6	Haw River	Excavated
Fea. 2	Tree Disturbance	463.3R318.4	1.7	1.7	2.2	—	Excavated

Features

Despite extensive auger testing at the Webster site, only two features were identified. One of these (Feature 1) was a large storage pit and the other (Feature 2) was a tree disturbance (Table 8.1). These features are described below.

Feature 1

This feature was uncovered in the southernmost excavation block at the Webster site. At the base of plowzone, the feature consisted of three concentric bands of fill measuring 4 ft by 5 ft (Figure 8.5). The innermost zone (Zone 2) contained a dark brown (10YR 3/3) fill with fired clay, charcoal, animal bone, and mussel shell fragments. This fill layer was basin-shaped in profile and had a maximum thickness of 0.8 ft. Zone 2 was surrounded by a thin collar of dark reddish brown (5YR 3/3) soil containing particles of fired clay, charcoal, and animal bones (Zone 1). A dark yellowish brown (10YR 4/4) mottled fill with small flecks of charcoal (Zone 3) formed a perimeter band around the top of the pit. Zone 3 extended across the pit, under Zones 1 and 2, to a depth of 1.6 ft beneath the subsoil surface (Figures 8.6 and 8.7).

After excavation the circular pit displayed nearly vertical sides and a flat bottom. The configuration of the feature suggests that it was dug for storage purposes and ultimately filled with topsoil from the surrounding village area. Apparently, this fill slumped and the resulting depression was capped off with soil very similar to that of the midden located to the north.

Wood charcoal recovered from Zone 2 provided a radiocarbon age of 510 ± 70 years: A.D. 1380 (Beta-23506). This yields a calibrated date of A.D. 1418 and a one-sigma age range of A.D. 1329 to A.D. 1440 (following Stuiver and Becker 1986). If this single radiocarbon date is reasonably accurate, it indicates that the Webster site was occupied at the close of the Haw River phase.

Feature 2

This designation was assigned to a tree disturbance in the east-central section the northern trench excavation.

Summary

At the time of investigations at the Webster site—during the first year of the project—the presence of a pit without other subsurface facilities in the near vicinity was considered to be very odd. Although isolated Haw River phase features had been located earlier at the Fredricks and Hogue sites near Hillsborough, it was believed that their isolation was the result of inadequate testing rather than the reflection of a cultural pattern. At the Webster site, we began to understand that these pits, surrounded by nothing more than a few scattered postholes, informed more on a community settlement pattern than on our sampling strategy. In short, the isolated storage pit found at the Webster site reflects a dispersed intra-site settlement plan that is typical of many Haw River phase sites.

Postholes

Several postholes were recorded in the trench excavated to expose the midden. Most were small, averaging around 0.2 ft in diameter, and did not provide any definite structure evidence. However, a series of larger postholes, 0.4 ft to 0.5 ft in diameter, formed an arch across the eastern end of the trench (Figure 8.2). All were similar in size and fill characteristics and may indicate the presence of a circular house structure. Unfortunately, time did not permit the excavation of any of the postholes. The area around Feature 1 contained a few scattered postholes, but the density here was considerably less than the posthole density in the midden area, reinforcing the idea that Feature 1 was a relatively isolated facility.

Pottery

Three thousand and ninety-seven aboriginal potsherds were recovered from the 1986 excavations at the Webster site (Table 8.2). Although most (n=2,416) came from the plowzone, substantial sherd samples

Figure 8.5. Feature 1, before excavation.

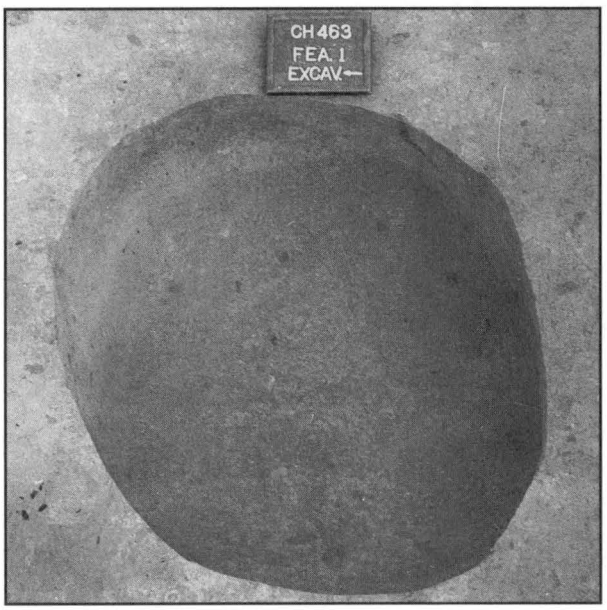

Figure 8.6 Feature 1, excavated.

were recovered from sub-plowzone midden deposits (designated Zone 2) in Squares 460R310, 460R320, and 460R330 (n=543), and from Feature 1 (n=100). Over 90% of all identifiable sherds are net impressed. Other surface treatments represented in the sherd sample, in descending order of frequency, include: plain, simple stamped, cord marked, complicated stamped, fabric marked, and brushed.

Yadkin Fabric-Marked

Four fabric marked sherds, classified as *Yadkin Fabric-Marked* (Coe 1964), were recovered from the

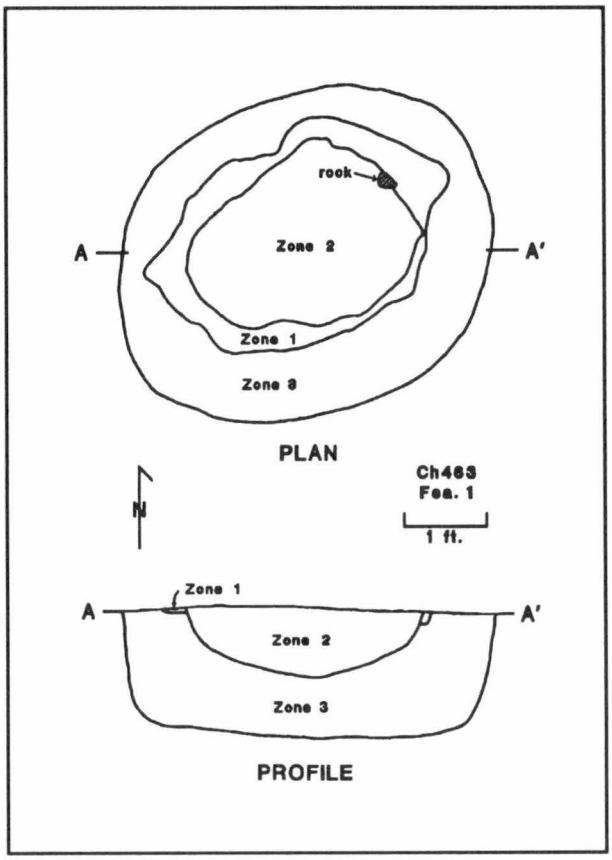

Figure 8.7. Feature 1, plan view and profile drawings.

plowzone. All are tempered with crushed feldspar, are relatively thick (8–10 mm), and have smoothed interior surfaces. These sherds also are similar to sherds classified by Smith (1965) as *New Hope Coarse Fabric-Marked*, and probably are attributable to a minor Early Woodland or Middle Woodland occupation at the site.

Haw River Plain (Figure 8.8*e,k*)

Forty-eight plain sherds were recovered and are classified as *Haw River Plain*. Forty-three of these came from the plowzone; the remainder are from Zone 2 and Feature 1. All but three have smoothed interior surfaces and are variously tempered with crushed feldspar (46%), quartz and feldspar (27%), and coarse sand (27%). A majority of these sherds are 6 mm to 10 mm thick and are body sherds. Of the six rimsherds in the sample, five have rounded lips and four are everted. Decorations include: oblique incising of the lip (n=1), finger punctations along the vessel neck (n=1) (Figure 8.8*k*), and an incised band around the neck (n=1). These methods of decoration are well represented within the type collections for the Haw River series from the Holt site.

Haw River Net Impressed (Figure 8.8*a–d,f,h*)

Eleven hundred and one net impressed sherds were recovered from the Webster site excavations and were

Table 8.2. Distribution of pottery from the Webster site.

Context	Yadkin Fabric Marked	Haw River Plain	Haw River Net Impressed	Haw River Cord Marked	Haw River Brushed	Hillsboro Simple Stamped	Complicated Stamped Sherds	Indet.	Total
Haw River Phase									
Fea. 1	-	3	44	-	-	5	-	48	100
Fea. 2	-	-	4	-	-	-	-	8	12
Sub-total	0	3	48	0	0	5	0	56	112
Indeterminate Phase									
Plowzone	4	43	784	7	1	20	3	1554	2416
Zone 2	-	2	259	3	-	1	-	278	543
Misc.	-	-	10	-	-	1	1	14	26
Sub-total	4	45	1053	10	1	22	4	1846	2985
Total	4	48	1101	10	1	27	4	1902	3097

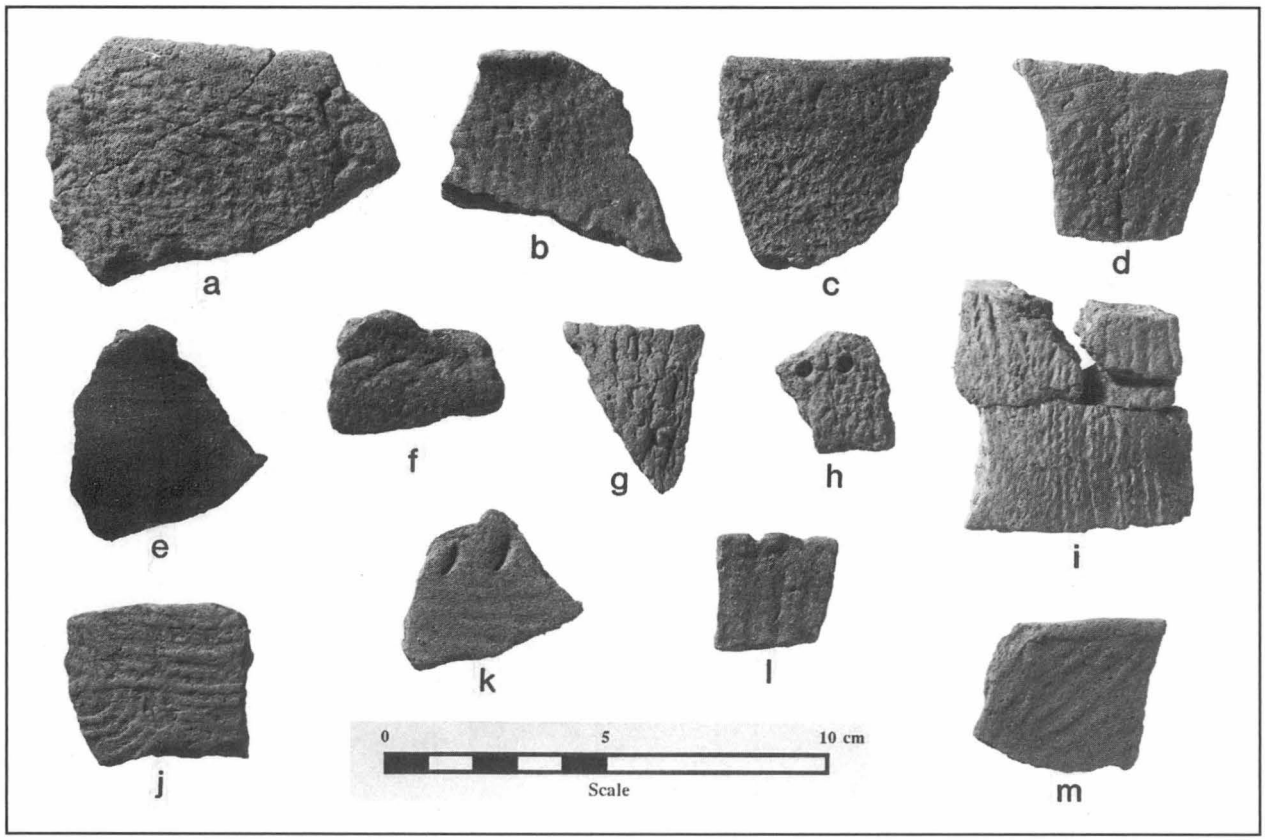

Figure 8.8. Potsherds from the Webster site.

classified into the Haw River series based primarily on surface treatment, temper, and decoration. A majority of these sherds came from the plowzone (n=784), Zone 2 (n=259), and Feature 1 (n=44). Comparisons of sherd attributes between these three contexts indicate no significant differences; consequently, they are described here as a single assemblage.

The majority of *Haw River Net Impressed* sherds are tempered with crushed feldspar (63%). Other temper types include: coarse sand (17%), mixed crushed quartz and feldspar (12%), and crushed quartz (8%). Although these temper types are well represented in the Haw River pottery sample from the Holt site, the Webster sample reflects a much greater use of crushed

feldspar. This difference most likely reflects either chronological or spatial variability in pottery-making during the Haw River phase.

Just over half of all sherds classified as *Haw River Net Impressed* have smoothed interiors. The remainder have scraped interiors. Most of these sherds (90%) range from 6 mm to 10 mm in thickness. Rim profiles represented by the 94 rimsherds in the sample include: everted (n=50), everted/folded (n=1), and straight (n=43). Lip edges are either rounded (n=51), flattened (n=37), or pointed (n=6). Twenty-four sherds are decorated. Lip decorations include: oblique incisions (n=4), V-shaped notches (n=2), and circular punctations (n=1). Neck decorations include: finger punctations (n=7) (Figure 8.8*b,f*), circular or rectangular punctations (n=2) (Figure 8.8*h*), and incised V's (n=1). Decoration of the vessel body consisted of: incised lines (n=6) and finger punctations (n=1).

Haw River Cord Marked (Figure 8.8*i,l*)

Ten cord marked sherds were recovered from the plowzone and Zone 2. All are classified as *Haw River Cord Marked*. Four of the seven plowzone sherds are conjoining fragments from a single vessel. Most of the sherds have smoothed interiors and are tempered with crushed feldspar (n=7), mixed crushed quartz and feldspar (n=1), crushed quartz (n=1), or coarse sand (n=1). The one rimsherd in the sample has a V-notched rounded lip and a straight rim profile (Figure 8.8*l*). No other sherds are decorated.

Haw River Brushed

One brushed body sherd, classified as *Haw River Brushed*, was recovered from the plowzone. It has a scraped interior and is tempered with crushed feldspar.

Hillsboro Simple Stamped (Figure 8.8*m*)

Twenty-seven sherds from the Webster site were classified as *Hillsboro Simple Stamped* (Coe 1952). Twenty of these came from the plowzone and five were recovered from Feature 1. These sherds are tempered with crushed feldspar (48%), quartz and feldspar (37%), or sand (15%), and most have smoothed interiors. The one rimsherd in the sample has a flat lip and an inverted rim profile. None of the simple stamped sherds are decorated.

Complicated Stamped Sherds (Figure 8.8*j*)

Four complicated stamped body sherds were recovered from plowzone or other disturbed contexts. Three of these sherds have scraped interiors, and are tempered with crushed feldspar (n=3) or quartz and feldspar (n=1). These sherds do not conform to any established pottery type.

Indeterminate Sherds

The majority (n=1,902) of the sherds recovered from the Webster site excavations were either too small or too eroded to be classified by surface treatment.

Summary

The pottery assemblage represented at the Webster site conforms reasonably well to the Haw River ceramic series defined at the Holt site, except for differences in the relative frequency of temper types noted above. Similarities between plowzone, Zone 2, and Feature 1 ceramic samples argue strongly that most of the pottery found is probably a result of the same Haw River phase site occupation.

Other minor occupations of the Webster site that may be reflected within the pottery sample include: 1) an Early to Middle Woodland occupation represented by the four fabric marked sherds; and 2) a Late Prehistoric/Protohistoric occupation represented by *Hillsboro Simple Stamped*, complicated stamped, and some of the *Haw River Plain* sherds from the site. Conversely, it seems equally possible that these latter sherds simply constitute minor types within the overall assemblage associated with the Haw River phase. Whichever is the case, there is no strong ceramic basis for identifying an historic Indian occupation at the site purportedly found by local artifact collectors.

Lithic Artifacts

Eight hundred and seventeen lithic artifacts were recovered from the 1986 test excavations at the Webster site (Table 8.3). Eighty percent (n=660) of these artifacts represent debitage or exhausted cores; the remainder are chipped stone tools and tool fragments (n=142), ground stone tool fragments (n=2), and large cobble tools (n=13). Over 40% were recovered from either Feature 1 or the buried midden deposit associated with the Late Prehistoric Haw River phase occupation. Earlier Middle Woodland, Late Archaic, and Middle Archaic occupations of the site are also indicated by small numbers of temporally diagnostic projectile points; however, the contribution of these occupations to the total sample of lithic artifacts appears minimal. Major categories of lithic artifacts are described below.

Debitage

Decortication Flakes. Sample Size: 161. Form: Both primary (n=25) and secondary (n=136) decortication flakes are present in the sample. Primary decortication flakes exhibit a striking platform and bulb of percussion on the ventral surface, and have more than 75% of cortex remaining on the dorsal surface. Secondary decortication flakes are similar but have cortex on less than 75% of the dorsal surface. Material: Vitric tuff-109, Other metavolcanic rock-37,

Table 8.3. Distribution of lithic artifacts from the Webster site.

Category	Context PZ	Midden	Fea. 1	Fea. 2	Pothole	Misc.	Total
Debitage							
Decortication Flakes	77	12	57	15	-	-	161
Interior/Bif. Thin. Flakes	235	20	179	20	-	5	459
Shatter Fragments	3	1	-	-	-	-	4
Cores	26	4	2	-	-	-	32
Raw Material	4	-	-	-	-	-	4
Projectile Points							
Guilford Lanceolate	2	-	-	-	-	-	2
Savannah River Stemmed	1	-	-	-	-	-	1
Yadkin Large Triangular	1	-	-	-	-	-	1
Randolph Stemmed	1	-	-	-	-	-	1
Small Triangular Points	18	5	8	-	1	-	32
Unidentified Points	5	-	1	1	-	-	7
Other Chipped Stone Artifacts							
Preform	1	-	-	-	-	-	1
Bifaces	3	-	1	-	-	-	4
Drills	1	-	1	-	-	-	2
Perforators	1	-	1	-	-	-	2
Pièces Esquillées	1	1	1	-	-	-	3
Side Scrapers	2	-	1	-	-	-	3
Utilized/Retouched Flakes	52	10	21	-	-	-	82
Ground Stone Artifacts							
Ground Stone Fragments	1	1	-	-	-	-	2
Large Cobble Tools							
Cobble Choppers	7	-	-	-	-	-	7
Hammerstones	5	-	1	-	-	-	6
Total	447	54	274	36	1	5	817

Quartz–9, Rhyolite–2, Basalt–2, Jasper–2. Comment: These artifacts are by-products of chipped stone tool manufacture. As with interior/bifacial thinning flakes, these artifacts reflect a raw material preference for locally-available vitric tuffs. Local lithic resource utilization is also evidenced by the high ratio (1:2.9) of decortication flakes to interior/bifacial thinning flakes at the site.

Interior/Bifacial Thinning Flakes. Sample Size: 459. Form: Interior flakes (n=341) are flat flakes that have no remaining cortex, have flake removal scars on the dorsal surface, and lack a steep platform angle. Bifacial thinning flakes (n=118) are similar to interior flakes but possess a steep platform angle that evidences detachment from a biface. Material: Other metavolcanic rock–184, Vitric tuff–165, Quartz–94, Rhyolite–4, Welded tuff–4, Slate–3, Chert–2, Jasper–1, Quartzite–1, Schist–1. Comment: Interior and bifacial thinning flakes are by-products of intermediate and final stages of bifacial tool manufacture.

Shatter Fragments. Sample Size: 4. Form: Shatter fragments are irregular flakes, resulting from lithic reduction, that lack distinguishing characteristics such as striking platform and bulb of percussion. Material: Vitric tuff–2, Other metavolcanic rock–1, Quartz–1. Comment: None.

Cores. Sample Size: 32. Form: Cores are masses of lithic raw material from which two or more flakes have been deliberately detached. All have amorphous shapes. Material: Quartz–26, Vitric tuff–5, Other metavolcanic rock–1. Comment: The predominance of quartz cores, as opposed to cores made of vitric tuff or other metavolcanic rock, probably reflects the occurrence of this resource in the immediate site vicinity. Outcrops of metavolcanic rock, including vitric tuff, occur along Haw River approximately 0.6 mi west of the site.

Raw Material. Sample Size: 4. Form: This category includes two tested nodules and two unmodified chunks of usable lithic material. Material: Vitric

tuff–2, Rhyolite–1, Other metavolcanic rock–1. Comment: These specimens represent utilizable stone that was collected but apparently never used.

Projectile Points

Guilford Lanceolate Projectile Points. Sample Size: 2. Form: The *Guilford Lanceolate* projectile point type is defined by a long, thick, slender, blade with concave edges and a straight, rounded or convex base (Coe 1964:43–44). Material: Vitric tuff–2. Comment: Both specimens are mid-sections from broken points. This point type dates to the Middle Archaic period (ca. 4,500–4,000 B.C.).

Savannah River Stemmed Projectile Point. Sample Size: 1. Form: The *Savannah River Stemmed* projectile point type is defined by a large, heavy triangular blade and a broad stem with a straight or indented base (Coe 1964:44–45). Material: Rhyolite–1. Comment: The one specimen in the sample is crudely manufactured and has a rounded stem. This point type dates to the Late Archaic period (ca. 2,000 B.C.).

Yadkin Large Triangular Projectile Point. Sample Size: 1. Form: The *Yadkin Large Triangular* projectile point type is defined by Coe (1964:45) as "a large, symmetrical, and well-made triangular point." Material: Vitric tuff–1. Comment: This projectile point is similar to Coe's (1964:47) "A-typical eared variety." The Yadkin point type dates to the Early-Middle Woodland period (ca. A.D. 100–500).

Randolph Stemmed Projectile Point. Sample Size: 1. Form: The *Randolph Stemmed* projectile point type is defined by a small, narrow, and thick blade, and a roughly tapered stem (Coe 1964:49–50). Material: Vitric tuff–1. Comment: Coe (1964) attributes this point type to the Historic period (ca. A.D. 1720–1800); however, this association has never been verified archaeologically.

Small Triangular Projectile Points (Figure 8.9*a–w*). Sample Size: 32. Form: All small triangular projectile points in the sample are generally referable to the *Caraway Triangular* type (Coe 1964:49). Eighteen point fragments are too small to determine edge configuration; the remainder have either incurvate sides and base (n=10), incurvate sides and an excurvate base (n=2), straight sides and excurvate base (n=1), or straight sides and an incurvate base (n=1). These points range from 20 mm to 37 mm (mean=24.6, sd=4.1, n=14) in length, 15 mm to 28 mm (mean=19.8, sd=3.3, n=22) in width, and 3 mm to 8 mm (mean=4.8, sd=1.4, n=28) in thickness. Material: Vitric tuff–27, Rhyolite–3, Felsic tuff–1, Chert–1. Comment: All of these specimens probably are associated with the Late Prehistoric Haw River occupation of the site.

Projectile Point Fragments. Sample Size: 7. Form: These are fragments of projectile points that cannot be assigned to a specific point type or category. Material: Other metavolcanic rock–4, Vitric tuff–2, Rhyolite–1. Comment: Four fragments probably are from Archaic point types and two appear to represent triangular points.

Other Chipped Stone Artifacts

Preform. Sample Size: 1. Form: A preform is a biface that exhibits final stages of reduction and shaping, but lacks modification of the haft area. Material: Vitric tuff–1. Comment: This specimen is a small flake that was partly trimmed to produce a triangular point but never finished.

Bifaces. Sample Size: 4. Form: A biface is a blank that exhibits flake removal scars, resulting from either percussion or pressure flaking, on both surfaces. Material: Vitric tuff–3, Other metavolcanic rock–1. Comment: All four specimens apparently represent early stages of bifacial tool (e.g., projectile point) manufacture.

Drills (Figure 8.9*x–y*). Sample Size: 2. Form: A drill is a bifacial tool that has a long, parallel-sided, rod-like projection produced by bifacial retouch. One specimen is a re-worked small triangular projectile point; the other drill was manufactured on a long, thick decortication flake. Material: Vitric tuff–2. Comment: These tools probably were hafted and used on dense materials such as wood, bone, antler, or soft stone.

Perforators (Figure 8.9*z*). Sample Size: 2. Form: A perforator is a flake or bifacial tool that has been finely retouched to produce a pointed tool bit. Material: Vitric tuff–2. Comment: Both specimens are bifaces that have small retouched projections. These tools may have been used in hideworking to cut or punch holes.

Pièces Esquillées. Sample Size: 3. Form: Pièces esquillées are flakes, bifaces, or exhausted cores that exhibit one or more sharp, straight, crushed working edges, produced by repeated blows using a bipolar percussion technique. Material: Quartz–2, Vitric tuff–1. Comment: Pièces esquillées are thought to have been used as wedging or slotting tools for working bone or wood (see Chapman 1975; Keeley 1980; MacDonald 1968).

Side Scrapers. Sample Size: 3. Form: Side scrapers are flake tools that exhibit steep and regular retouch along one or both lateral margins. Material: Vitric tuff–1, Other metavolcanic rock–1, Chert–1. Comment: All three side scrapers from the Webster site are thick flakes that were steeply retouched along a single edge and are interpreted as hide scraping tools.

Utilized and Retouched Flakes. Sample Size: 83. Form: This category includes flakes that exhibit marginal retouch (n=49) or edge damage (n=31) presumably resulting from use. Material: Vitric tuff–44, Quartz–27, Other metavolcanic rock–4, Felsic tuff–3, Slate–2, Chert–2, Rhyolite–1. Comment: These specimens are interpreted as *ad hoc* cutting tools.

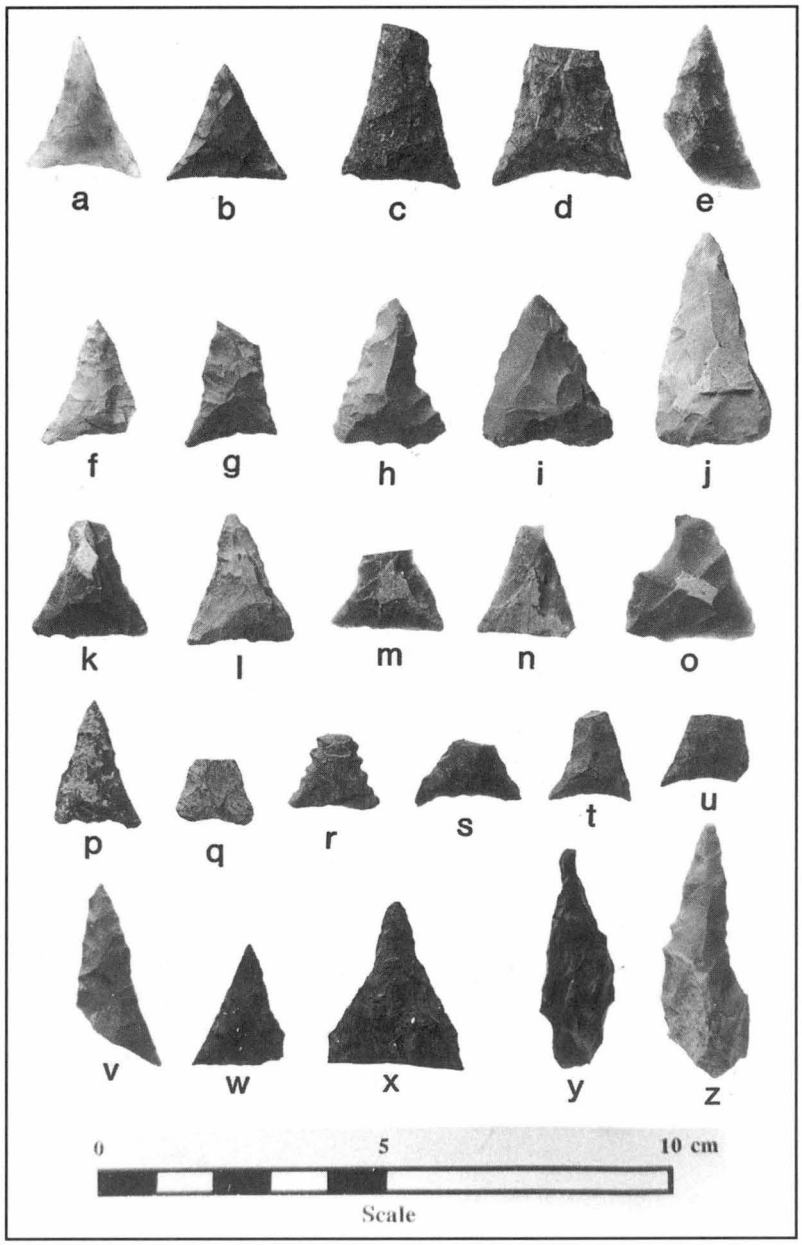

Figure 8.9. Chipped stone projectile points and drills from the Webster site.

Ground Stone Artifacts

Ground Stone Fragments. Sample Size: 2. Form: These are fragments of ground stone tools that cannot be classified by specific tool type. Material: Felsic tuff–1, Other metavolcanic rock–1. Comment: One specimen is a small cobble fragment with a ground, faceted end that displays numerous small, parallel striations. The other specimen may be a spall from the face of a ground stone celt.

Large Cobble Tools

Cobble Choppers. Sample Size: 7. Form: This category includes both cobbles and large pieces of utilizable raw material that exhibit rough flaking along one or more margins. Material: Schist–3, Granite–2, Other metavolcanic rock–2. Comment: One of the granitic specimens also exhibits polishing on one face. Such implements are thought to have been used for heavy chopping tasks.

Hammerstones. Sample Size: 6. Form: Hammerstones are cobbles or nodules that exhibit crushing, battering, or abrasion one or more surfaces. Material: Quartz–5, Quartzite–1. Comment: These tools are interpreted as hand-held percussors used for flintknapping and other tasks.

Summary

The sample of lithic artifacts from the Webster site, largely associated with a Haw River phase occupation, suggests a variety of tasks including stone tool manu-

facture, hideworking, bone working, woodworking, and refurbishing of hunting equipment. Undoubtedly, this represents only a few of the kinds of tasks performed at the site that would have required stone tools. Earlier occupations of the site from Middle Archaic to Middle Woodland times, evidenced by the presence of *Guilford Lanceolate*, *Savannah River Stemmed*, and *Yadkin Large Triangular* projectile points, probably were both limited and sporadic.

Clay Artifacts

Three aboriginal clay pipe fragments were recovered from the Webster site. Two of these are small, unidentifiable fragments that were recovered while flatshoveling plowed soil from the top of Feature 1. The third specimen, from the plowzone, is a mid-section fragment from a large, thick-stemmed clay pipe that was triangular in cross-section. This pipe is very similar in style to one recovered from the Holt site.

Four other fired clay artifacts also were recovered. Three of these are coil segments—presumably waste from pottery manufacture. The fourth specimen, from the plowzone, appears to be a portion of a centrally-perforated clay disk.

Bone and Shell Artifacts

A small bone disk bead from Feature 1 was the only bone artifact recovered from the Webster site. Only two shell artifacts were recovered at the Webster site. Both were fragments of serrated mussel shell scrapers found in Feature 1.

Historic Artifacts

A single kaolin pipe fragment was recovered from plowed soil overlying the midden in Sq. 460R310. This specimen, representing the base of a pipe bowl, has a 6/64-inch bore diameter and is similar to English kaolin pipes that were recovered in aboriginal contexts at the late seventeenth-century Fredricks site. Its cultural association at the Webster site is unknown.

Fifteen other artifacts of Euroamerican manufacture were recovered from the plowzone at the Webster site and include: seven potsherds, four glass fragments, two unidentifiable iron fragments, one piece of wire, and one cinder. All of these artifacts appear to post-date the eighteenth century.

Faunal Remains

by

Mary Ann Holm

The sample of animal bone from the Webster site is comprised of 1,194 fragments recovered from Feature 1 (n=1,015), Feature 2 (n=132), and the sub-plowzone midden (n=47) (Table 8.4). Just over 46% of these specimens could be identified beyond the level of class. Approximately 50% of these are mammals, 25% are reptiles, 8% are amphibians, and 17% are fish. Although six fragments of bird bone were recovered, none of them could be specifically identified.

Only 12 taxa, each represented by a single individual, were identified in this sample. Identified mammals include white-tailed deer, opossum, short-tailed shrew, gray squirrel, raccoon, and one member of the family Mustelidae (weasels and skunks). Box turtle, snapping turtle, and a non-poisonous snake are the only reptiles identified. Amphibians are represented by remains of a single unidentified toad, and the only fish represented in the sample are gar and sucker.

Approximately 35% of the bone fragments recovered are burned. None of the bones exhibit signs of gnawing or cut marks.

Numerous fresh-water mussel and snail shells were recovered from Features 1 and 2. These specimens have not been analyzed beyond preliminary sorting and quantification.

The faunal remains from the Webster site, though sparse and recovered from only three separate contexts, indicate that white-tailed deer and several other small mammals were exploited along with a variety of reptiles, birds, fish, and shellfish.

Table 8.4. Faunal remains from the Webster site.

Species	Count N	Count %	Weight Grams	Weight %	MNI N	MNI %
Mammals						
Unidentified	311	27.11	168.50	36.99	-	-
Didelphus virginiana, Opossum	1	0.09	0.50	0.11	1	8.33
Blarina brevicauda, Short-tailed Shrew	1	0.09	0.03	0.01	1	8.33
Sciurus sp., Squirrel	15	1.31	2.39	0.52	-	-
Sciurus carolinensis, Gray Squirrel	1	0.09	0.50	0.11	1	8.33
Procyon lotor, Raccoon	2	0.17	0.39	0.09	1	8.33
Mustelidae, Weasels & Skunks	1	0.09	0.20	0.04	1	8.33
Odocoileus virginianus, White-tailed Deer	23	2.01	83.29	18.29	1	8.33
Sub-Total	355	30.95	255.80	56.16	6	50.00
Birds						
Unidentified	6	0.52	1.70	0.37	-	-
Reptiles						
Turtle, Unidentified	359	31.30	96.50	21.19	-	-
Terrapene carolina, Box Turtle	15	1.31	18.90	4.15	1	8.33
Chelydra serpentina, Snapping Turtle	20	1.74	38.60	8.47	1	8.33
Snake, Unidentified	6	0.52	0.16	0.04	-	-
Colubridae, Non-poisonous Snakes	3	0.26	0.17	0.04	1	8.33
Sub-Total	403	35.14	154.33	33.88	3	25.00
Amphibians						
Rana/Bufo sp., Frog or Toad	4	0.35	0.02	<0.01	-	-
Bufo sp., Toad	1	0.09	0.10	0.02	1	8.33
Sub-Total	5	0.44	0.12	0.03	1	8.33
Fish						
Unidentified	90	7.85	3.86	0.85	-	-
Lepisosteus sp., Gar	72	6.28	3.66	0.80	1	8.33
Centrarchidae	1	0.09	0.02	<0.01	1	8.33
Sub-Total	163	14.21	7.54	1.66	2	16.67
Unidentified	215	18.74	36.00	7.90	-	-
Total	1147	100.00	455.49	100.00	12	100.00

Botanical Remains

by

Kristen J. Gremillion

Six flotation samples (representing 45 liters of feature fill) from the two features at the Webster site were analyzed. Because only a small quantity of carbonized plant remains was recovered, the resulting data are in general uninformative. Thus, only quantities and not percentages are presented in Tables 8.5, 8.6, and 8.7. Hickory and acorn shell (but not walnut shell) were present in the samples analyzed. Both maize kernels and cupules also were found in both features, but no identifiable seeds were recovered.

Summary

The fact that we were never able to locate precisely the area of the Webster site that was looted by relic collectors prior to our investigation illustrates the dispersed nature of Haw River phase settlements. The absence of settlement clustering is further indicated by the identification of a single feature within a 9,000-sq-

Table 8.5. Carbonized plant remains from the Webster site (weight in grams).

Context	Soil Volume (liters)	Wood Charcoal	Unknown Plant	Plant Food Remains	Total
Feature 1					
Zone 1	5	0.42	0.06	2.90	3.38
Zone 2	10	3.38	0.08	13.40	16.86
Zone 3	10	2.28	0.07	0.18	2.53
Zone 4	10	0.58	0.00	0.02	0.60
Sub-total	35	6.66	0.21	16.50	23.37
Feature 2					
Zone 1	10	1.30	0.24	0.86	2.40
Total	45	7.96	0.45	17.36	25.77

Table 8.6. Plant food remains from the Webster site (weight in grams).

Context	Hickory Shell	Acorn Shell	Maize Kernels	Maize Cupules	Seeds	Total
Feature 1						
Zone 1	2.90	<0.005	-	-	-	2.90
Zone 2	13.39	0.01	<0.005	-	-	13.40
Zone 3	0.17	0.01	-	<0.005	-	0.18
Zone 4	0.02	-	-	-	<0.005	0.02
Sub-total	16.48	0.02	<0.005	<0.005	<0.005	16.50
Feature 2						
Zone 1	0.74	0.10	0.01	0.01	-	0.86
Total	17.22	0.12	0.01	0.01	<0.005	17.36

Table 8.7. Seed and fruit counts from the Webster site.

Context	Maize Kernels	Unknown	Total
Feature 1			
Zone 2	1	-	1
Zone 4	-	1	1
Sub-total	1	1	2
Feature 2			
Zone 1	1	-	1
Total	2	1	3

ft area that was systematically auger tested. The "midden" soil identified in the northern excavation block could more properly be called an old humus or topsoil. Although it contained several potsherds and small fragments of bone and shell, the density of refuse is not comparable to true middens such as the rich deposit along the palisades at the Wall site (see Petherick 1987). The undisturbed sub-plowzone layer at Webster probably resulted as a consequence of undulations on the original ground surface. The deeper valleys were not completely plowed out, whereas the higher areas were. Given the similarities between this soil and some of the fill contained in Feature 1, a similar surface soil probably also was present in the

vicinity of the feature but has since been cut away by modern plowing.

The projectile point and ceramic assemblages from the Webster site verify a long period of aboriginal presence, from the Middle Archaic until the Late Prehistoric period. However, except for the Haw River phase artifacts, evidence for this presence was restricted to the plowzone and suggests only sporadic and temporary occupations. The Euroamerican artifacts were deposited much later than the latest aboriginal materials, and most seem to date no earlier than the middle eighteenth century. In the Piedmont, relic collectors as well as professional archaeologists have frequently, and incorrectly, assumed an association between late prehistoric and eighteenth-century artifacts.

Although the ethnobotanical and faunal remains from Webster were not abundant, they point to the same variety found at other Haw River phase sites. Deer and other smaller mammals were hunted and trapped; mussels and fish were collected from the nearby Haw River; and the surrounding hardwood forest provided a seasonally abundant supply of acorns and hickory nuts. Except for the addition of maize, resource utilization probably did not change drastically during the 4,000 years the site was visited and occupied by Native Americans.

Chapter 9

Lower Saratown

Lower Saratown (RLA-Rk1; 31Rk1) is located on the south side of the Dan River in Rockingham County, North Carolina, about 0.75 miles east of the town of Eden and some three miles downstream from the mouth of Smith River. It is situated within a large expanse of bottomland that is bounded on the east by Town Creek and on the south by a 100-ft high ridge that rises abruptly out of the level floodplain.

The Reverend Douglas Rights, a Moravian minister from Winston-Salem, North Carolina, carried out the first excavations in the vicinity of Lower Saratown sometime before 1936. Responding to a request from Joffre Coe concerning the locations of various historic Siouan towns, Rights wrote:

> The town location further east was in the neighborhood of Leaksville. I have located a number of kitchen middens somewhat similar to the ones westward on the Dan. The largest town I have not had time to locate, but Byrd's description is easy to follow, and I hope to have it located exactly some day [letter from Rights to Coe, November 1936].

Coe followed Rights' advice and in 1938, with funds from the Indiana Historical Society, excavated a 550-sq-ft area in what was believed to be the historic Sara village. The results of this excavation were written up a dozen years later by Ernest Lewis (1951) and used, along with extensive ethnohistoric research, to characterize historic Sara culture at the turn of the eighteenth century.

Coe's excavation revealed seven pit features, two large artificial clay deposits, and numerous postholes. The site's stratigraphy consisted of a plowzone overlying an "undisturbed refuse deposit" which lay atop an "original humus layer." Coe was disappointed with the results of the work, because he didn't find what he was looking for—namely, European trade materials. Still, over the years this site retained its reputation as historic Lower Saratown, and with good reason.

William Byrd's description of the environs around the Sara village, and his 1733 map of the immediate area, leave little doubt that Rights and Coe were correct in looking for Lower Saratown in these bottoms on the south side of the Dan River.

> We steered south from thence about a mile and then came upon the Dan, which thereabouts makes but narrow low grounds. We forded it about a mile and a half to the westward of the place where the Irvin [Smith River] runs into it. When we were over, we determined to ride down the river on that side and for three miles found the high land come close down to it, pretty barren and uneven.
>
> But then on a sudden the scene changed, and we were surprised with an opening of large extent where the Sauro Indians once lived, who had been a considerable nation. But the frequent inroads of the Senecas annoyed them incessantly and obliged them to remove from this fine situation about thirty years ago. They then retired more southerly as far as Pee Dee River and incorporated with the Keyauwees, where a remnant of them is still surviving [Wright 1966:398].

Here, indeed, the narrow floodplain flanked by steep bluffs suddenly opens up into a broad, well-drained bottom covering over one thousand acres.

In November 1987 an effort was made to re-locate the site of Coe's 1938 excavations, not an easy task since the trees used for datum points had long since disappeared. However, the 1938 fence-row situated east of the site was still present, and we assumed the river had not drastically changed course. Using these two markers and Coe's original site map, we were able to fix the location of the old excavation area with a fair degree of accuracy (Figures 9.1 and 9.2).

Although the bottoms containing the site had been in permanent pasture for many years, the fall growth was sparse and artifacts were visible on the ground surface. After establishing the general site location, we carefully searched the surface for artifacts and other signs of occupation. Numerous potsherds, small fragments of animal bone, and several concentrations of mussel shell fragments were noted.

Because past experience suggested a strong correlation between surface concentrations of shell or bone and subsurface features, a 50-ft by 50-ft auger-test block was established over the area containing the highest density of these materials. Although not known at the time, this block overlapped the northern third of Coe's eastern excavation trench. Within the block, auger tests were conducted at 2.5-ft intervals.

The auger bores revealed a stratigraphy identical to that described in 1938. We also verified the location of Coe's excavation trench during the course of the augering. It was immediately apparent that this area was extremely rich in subsurface pits. When the augering was completed, a total of 51 positive tests had been recorded. Most of these revealed sub-plowzone archaeological features that contained rich deposits of

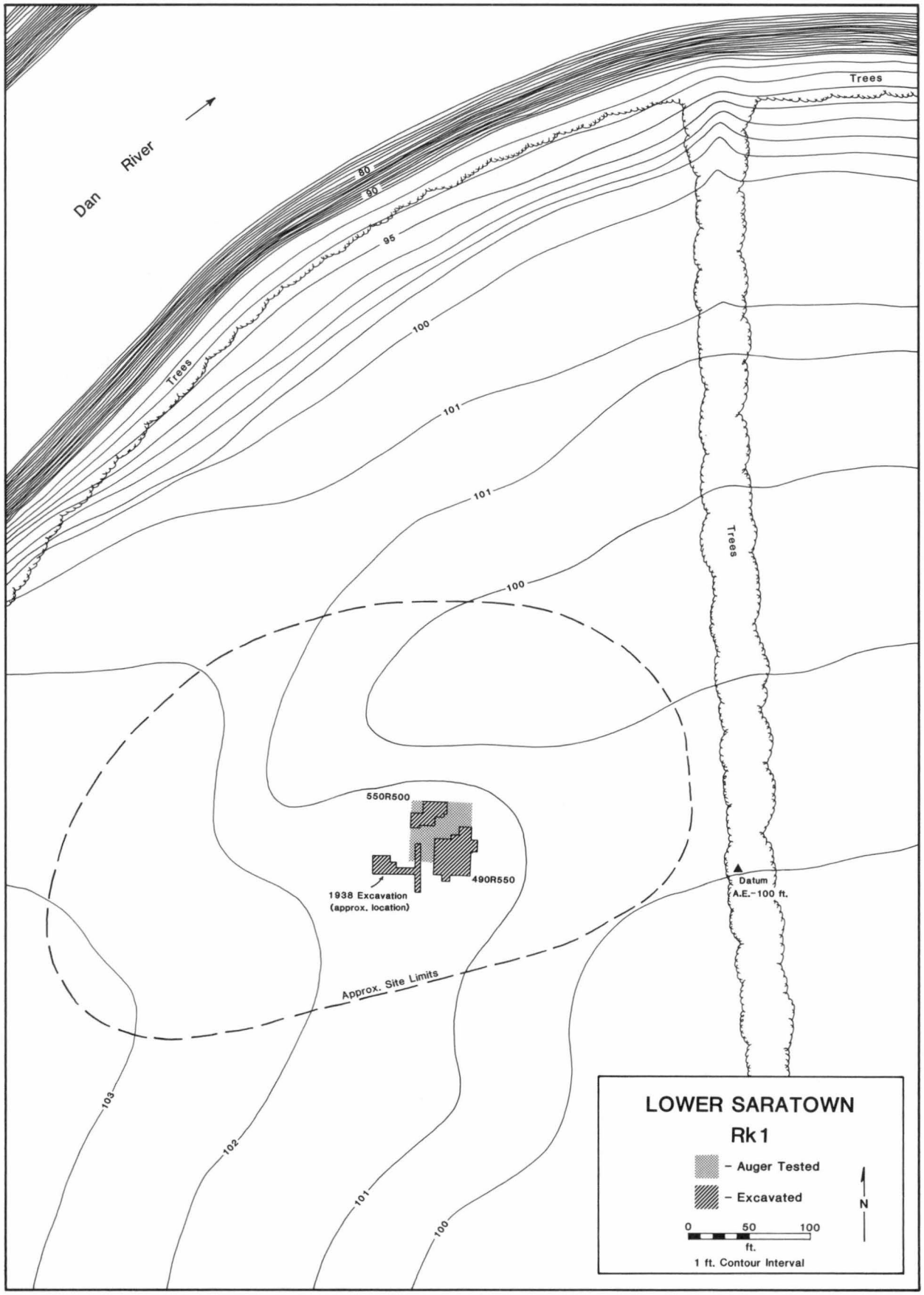

Figure 9.1. Map of Lower Saratown showing the area of auger testing and excavation.

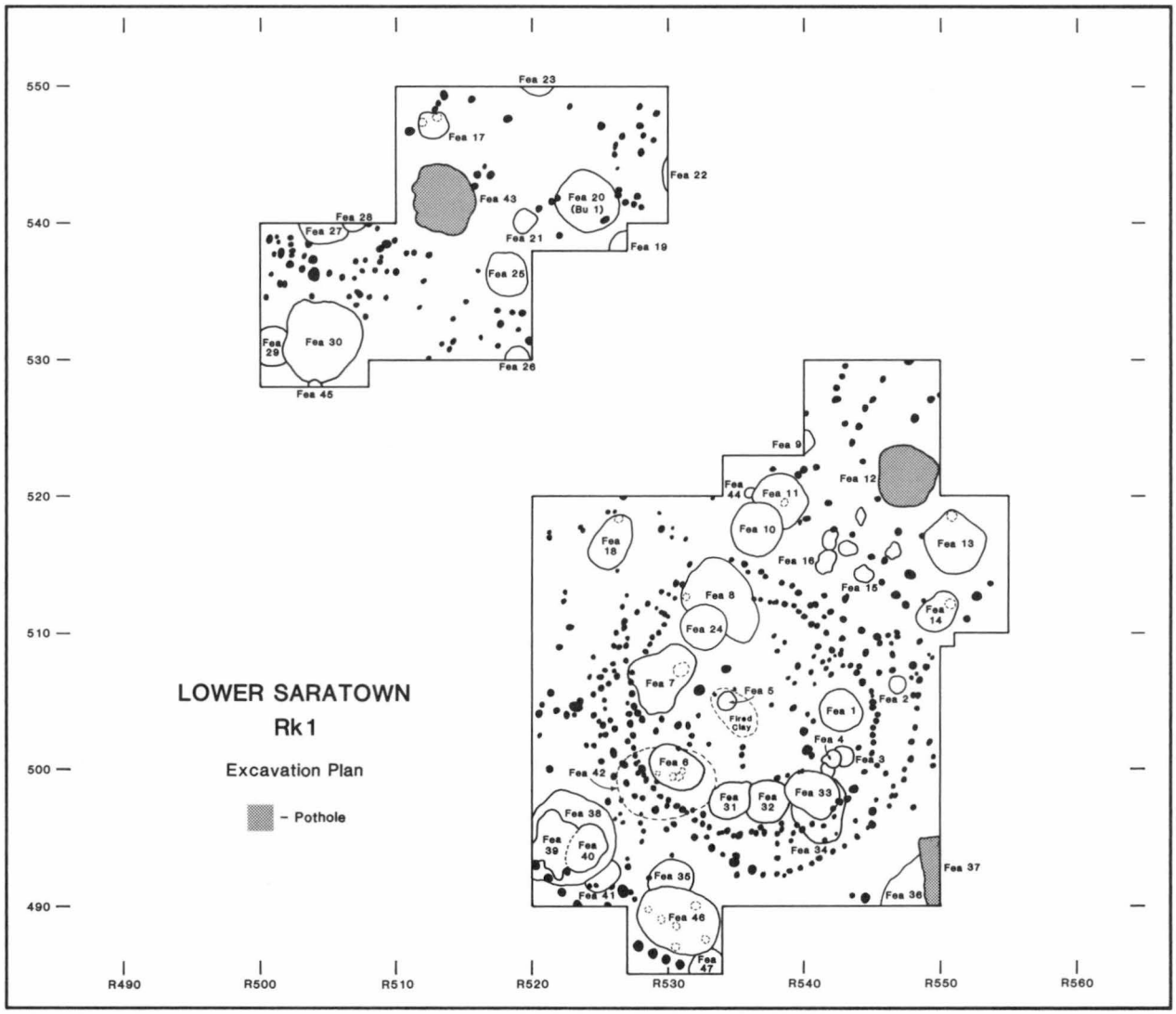

Figure 9.2. Excavation plan at Lower Saratown.

animal bone, shell, charcoal, and other cultural debris.

The richest features were concentrated in the northwestern and southeastern quadrants of the 50-ft square test block, immediately north and east of Coe's earlier excavation. Four 10-ft by 10-ft excavation units, along with insets to expose pit features, were excavated in the northwestern quadrant, while 10 units and insets were dug in the southeastern quadrant. As indicated by the auger tests, these excavations uncovered a large number of extremely rich pit features, most of which contained European glass trade beads. One burial was also found and two concentric house structures were excavated in their entirely (Figures 9.2, 9.3, and 9.4).

Perhaps the most interesting discovery was a short segment of a palisade line in the southwest corner of the larger excavation block. This palisade separates Coe's 1938 excavation unit from the 1988 excavation, but more importantly, it also separates the prehistoric Dan River phase (A.D. 1000–1450) occupation Coe uncovered from the historic middle Saratown phase (A.D. 1620–1670) component we found, and encircles this later village. Coe's 1938 search for Lower Saratown was less than 10 ft off the mark.

Stratigraphy

Unlike the nearby Powerplant site, Lower Saratown is located well away from the river and is situated in the middle of one of the largest expanses of floodplain along the Dan. The plowzone, averaging 0.8 ft in thickness, was comprised of a brown, friable, fine sandy loam. This disturbed soil lay atop a darker brown, compact zone of undisturbed village humus that averaged about 0.4 ft in thickness. A lighter, tan silty clay subsoil was reached at a depth of approximately 1.0 ft (Figure 9.5).

The plowzone and the humus layer contained numerous animal bones, potsherds, shell, and other artifacts associated with both the Dan River phase and historic Sara occupations of the site. In many instances, it was possible to define features at the top of the undisturbed humus and to keep material from these features separate as the humus was flatshoveled down to the top of the subsoil. At the subsoil surface, all intrusive pits and postholes were clearly visible, and it was at this point that normal feature excavations began. Sometimes features such as burned hearth areas were restricted to the humus zone and faded at the subsoil surface. An effort was made to recognize these shallow facilities and to document all cultural disturbances at the highest point possible within the stratified deposits.

Features and Burial

Forty-seven archaeological features were mapped at Lower Saratown; 33 of these, including one human burial, were subsequently excavated (Table 9.1). All feature fill was processed by waterscreening through 1/2-inch, 1/4-inch, and 1/16-inch mesh to recover artifacts and subsistence remains. Standard-sized flotation samples also were systematically taken and processed to obtain carbonized plant remains. Of the 14 features that were not excavated, 11 were pits that extended beyond the edges of the excavations and three were potholes. All of these were augered to determine their depths. The highest densities of features occurred within Structures 1 and 2, and along the inside of the palisade. Using artifact content (namely, pottery and the presence of European trade goods) as a criterion for determining cultural association, four features (Features 14, 18, 32, and 41) can be attributed to the site's late prehistoric Dan River occupation. All other excavated features, with the exception of three smudge pits (Features 15, 44, and 45) and one natural depression (Feature 2) which contained no pottery, are attributed to the middle Saratown phase occupation of the site.

Feature 1

This circular pit was located inside Structure 1, along the east wall. On the excavation surface, it was clearly visible as a dark brown (7.5YR 4/4) patch of loam (Zone 1) that contained concentrations of fired clay particles, fragments of animal bone, and charcoal (Figure 9.6). A wedge-shaped pothole sliced into a small area of the pit. A rich area of bone, including a turtle carapace, deer, small mammal, and fish elements, was encountered in the upper southwest portion of the fill. Large pieces of charcoal and daub and a few potsherds also were found scattered throughout Zone 1, which extended to a depth of 0.7 ft and rested on a dark yellowish brown (10YR 4/4) loam, designated Zone 2. This zone was only 0.2 ft thick and yielded relatively few artifacts. A single glass trade bead was found in each of the zones. After excavation, Feature 1 measured a little over 3 ft in diameter and was 0.9 ft deep (Figures 9.7 and 9.8). The walls sloped slightly inward near the bottom which was generally flat. The configuration of this feature suggests a small interior storage facility that was ultimately filled with refuse from food preparation activities around the hearth area. The lighter Zone 2 soil probably represents nothing more than a transitional zone of organic leaching between Zone 1 and the subsoil.

Figure 9.3. Excavating the plowzone at Lower Saratown.

Figure 9.4 Troweling over Feature 1 and Structure 1 wall posts.

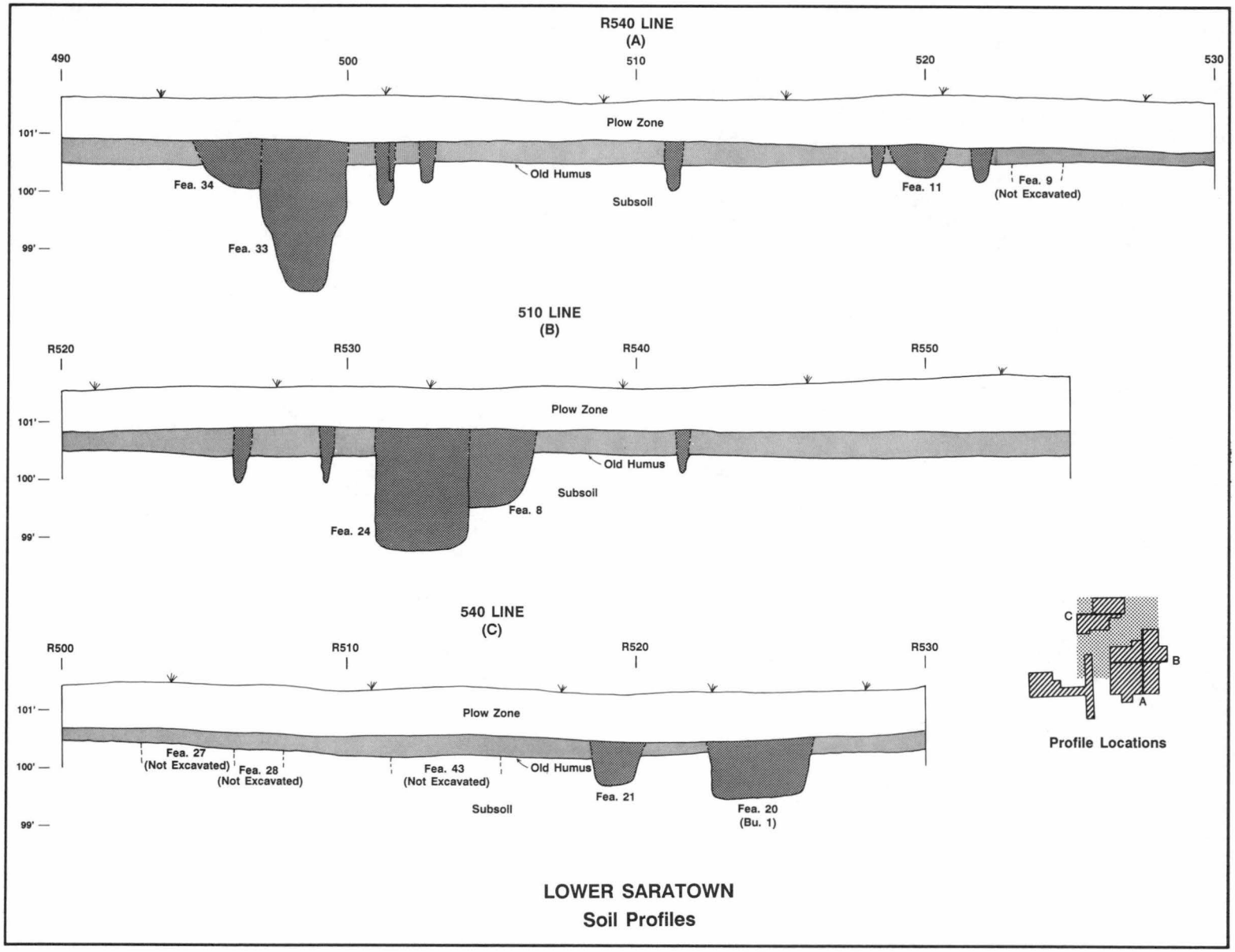

Figure 9.5. Stratigraphic profiles.

Table 9.1. Summary of features identified at Lower Saratown.

Feature No.	Type	Center Location	Dimensions (ft) L	W	D	Phase Association	Comment
Fea. 1	Storage Pit	504.2R542.7	3.2	3.0	0.9	Middle Saratown	Excavated
Fea. 2	Depression	506.2R546.7	1.3	1.2	0.2	Indeterminate	Excavated
Fea. 3	Depression	501.0R542.8	1.4	1.3	0.2	Middle Saratown	Excavated
Fea. 4	Pit	500.7R542.1	1.1	1.0	0.8	Middle Saratown	Excavated
Fea. 5	Hearth	505.0R534.3	1.5	1.5	0.3	Middle Saratown	Excavated
Fea. 6	Basin	500.0R530.5	4.3	3.0	0.5	Middle Saratown	Excavated
Fea. 7	Basin	506.5R529.5	5.4	4.1	0.9	Middle Saratown	Excavated
Fea. 8	Food Prep. Facility	512.5R533.5	6.7	5.1	1.0	Middle Saratown	Excavated
Fea. 9	Basin	524.0R540.0	1.8	1.8	0.4	Indeterminate	Mapped & Augered
Fea. 10	Storage Pit	517.5R536.5	4.0	3.8	1.7	Middle Saratown	Excavated
Fea. 11	Food Prep. Facility	519.7R538.0	3.9	3.9	0.7	Middle Saratown	Excavated
Fea. 12	Pot Hole	521.5R547.5	4.5	4.4	1.6	Indeterminate	Mapped & Augered
Fea. 13	Food Prep. Facility	516.5R551.0	4.2	4.1	0.4	Middle Saratown	Excavated
Fea. 14	Depression	511.5R549.7	3.3	2.6	0.4	Dan River	Excavated
Fea. 15	Smudge Pit	514.3R543.4	1.3	1.2	0.4	Indeterminate	Excavated
Fea. 16	Posthole	515.2R541.5	1.6	1.5	0.4	Middle Saratown	Excavated
Fea. 17	Storage Pit	547.0R512.7	2.3	2.1	1.1	Middle Saratown	Excavated
Fea. 18	Depression	516.8R526.0	3.8	2.4	0.5	Dan River	Excavated
Fea. 19	Smudge Pit	538.2R530.0	2.5	2.5	0.8	Indeterminate	Mapped & Augered
Fea.20/Bu. 1	Burial	541.5R534.0	4.9	4.2	2.1	Middle Saratown	Excavated
Fea. 21	Depression	540.2R519.5	1.8	1.6	0.7	Middle Saratown	Excavated
Fea. 22	Pit ?	543.5R531.5	-	-	0.8	Indeterminate	Mapped & Augered
Fea. 23	Basin ?	550.5R520.5	-	-	0.2	Indeterminate	Mapped & Augered
Fea. 24	Storage Pit	510.2R532.6	3.5	3.1	1.6	Middle Saratown	Excavated
Fea. 25	Storage Pit	536.3R518.0	3.0	2.7	1.6	Middle Saratown	Excavated
Fea. 26	Pit ?	530.0R519.0	2.0	2.0	1.0	Indeterminate	Mapped & Augered
Fea. 27	Pit ?	540.5R505.0	3.5	3.5	0.9	Indeterminate	Mapped & Augered
Fea. 28	Pit ?	540.5R507.0	2.0	2.0	0.9	Indeterminate	Mapped & Augered
Fea. 29	Pit ?	531.0R500.7	3.0	3.0	1.3	Indeterminate	Mapped & Augered
Fea. 30	Food Prep. Facility	531.2R504.5	6.0	5.9	0.8	Middle Saratown	Excavated
Fea. 31	Storage Pit	497.7R534.5	3.0	2.8	1.3	Middle Saratown	Excavated
Fea. 32	Basin	475.0R537.2	3.6	3.5	0.7	Dan River	Excavated
Fea. 33	Storage Pit	498.0R540.7	4.0	3.9	2.4	Middle Saratown	Excavated
Fea. 34	Basin	497.5R541.0	4.0	1.8	0.4	Middle Saratown	Excavated
Fea. 35	Storage Pit	491.7R530.2	3.3	3.1	1.2	Middle Saratown	Excavated
Fea. 36	Large Basin ?	491.0R548.0	-	-	0.2	Indeterminate	Mapped & Augered
Fea. 37	Pot Hole	492.5R549.5	-	-	0.5	Indeterminate	Mapped & Augered
Fea. 38	Food Prep. Facility	495.0R522.5	7.2	6.2	0.9	Middle Saratown	Excavated
Fea. 39	Basin	494.5R521.5	5.0	2.7	0.6	Middle Saratown	Excavated
Fea. 40	Pot Holes	494.2R524.2	3.3	2.3	0.5	Middle Saratown	Excavated
Fea. 41	Storage Pit	492.2R525.0	2.8	2.8	1.1	Dan River	Excavated
Fea. 42	Stained Area	499.0R529.5	7.0	5.0	0.3	Indeterminate	Mapped & Augered
Fea. 43	Pot Hole	541.5R513.5	5.0	4.5	0.7	Indeterminate	Mapped & Augered
Fea. 44	Smudge Pit	520.1R536.1	0.8	0.7	0.2	Indeterminate	Excavated
Fea. 45	Smudge Pit	528.3R504.0	0.8	0.6	0.2	Indeterminate	Excavated
Fea. 46	Food Prep. Facility	488.5R530.7	6.3	4.6	0.7	Middle Saratown	Excavated
Fea. 47	Pit ?	485.5R533.0	2.5	2.5	0.9	Indeterminate	Mapped & Augered

Feature 2

This number was assigned to a small natural depression adjacent to the east wall of Structure 2. It measured 1.3 ft in diameter and was only 0.2 ft deep. The brown (7.5YR 5/4) fill contained flecks of ash and charcoal, and small particles of shell and animal bone. The small depression probably collected soil from the floor of the structure and protected it from the plow.

Feature 3

This small depression was identical to Feature 2 in size, shape, and fill. This raises the possibility that both were associated with activities resulting from the occupation of Structure 2, although Feature 3 also is

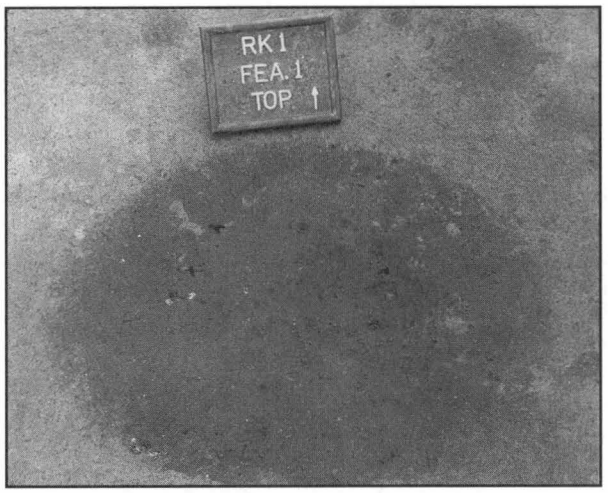

Figure 9.6. Feature 1, before excavation.

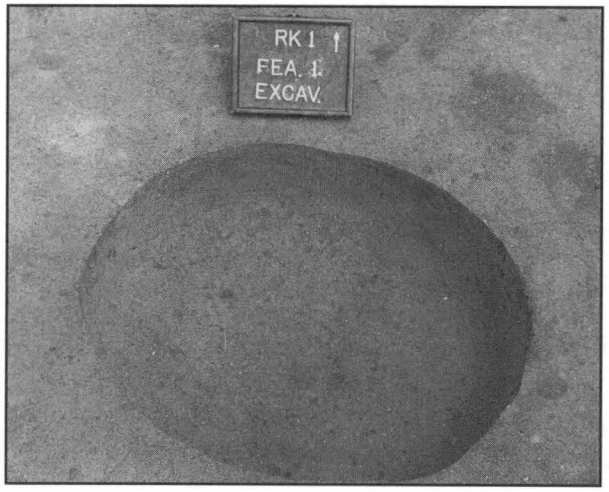

Figure 9.7. Feature 1, excavated.

located inside the walls of Structure 1.

Feature 4

The fill of Feature 4 also was identical to that of Features 2 and 3, and in plan, this pit was similar in size, measuring approximately 1.0 ft in diameter. In profile, however, it was conical and 0.8 ft deep. If not natural, all three features may represent the bottoms of once deeper and larger pit facilities.

Feature 5

This feature was contained entirely within the thin humus layer beneath the plowzone and consisted of a profusion of ash and charcoal, as well as some burned bone and fired clay fragments. It extended over an oval area some 4.0 ft by 2.0 ft and was located in the approximate center of both structures. Feature 5, in all likelihood, was all that remained of the hearth(s)

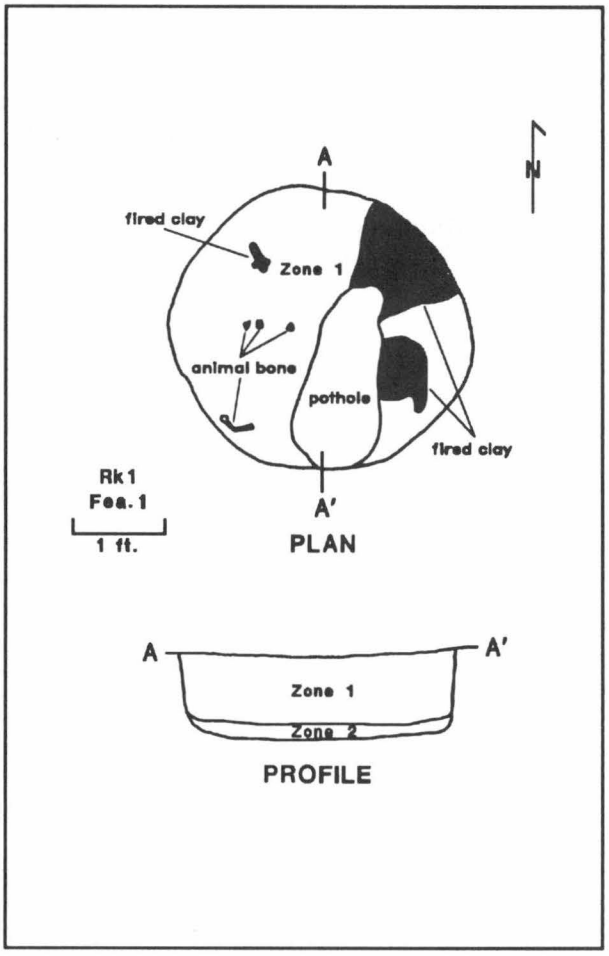

Figure 9.8. Feature 1, plan view and profile drawings.

associated with one or both of the structures.

Feature 6

This shallow, oval-shaped pit measured 2.8 ft by 4.0 ft and was located adjacent to the west wall of Structure 1. Excavation revealed a single zone of dark yellowish brown (10YR 3/4) mottled loam that contained a rich assortment of animal bones, mussel shells, and pottery sherds. The bone was concentrated in the northwest quadrant, whereas a charcoal concentration was observed in the northeast portion of the pit. Two hammerstones or manos were retrieved from its western edge. After removing the fill, the pit measured 0.5 ft in depth with a flat bottom and slightly insloping walls (Figure 9.9). The feature could be associated with either Structure 1 or Structure 2. It is tempting to interpret Feature 6 as a food preparation facility similar to the large barbecue pits found on other Siouan sites in piedmont North Carolina; however, its location inside a domestic structure would seem to gainsay such an interpretation.

Feature 7

This large, oval feature was located just north of

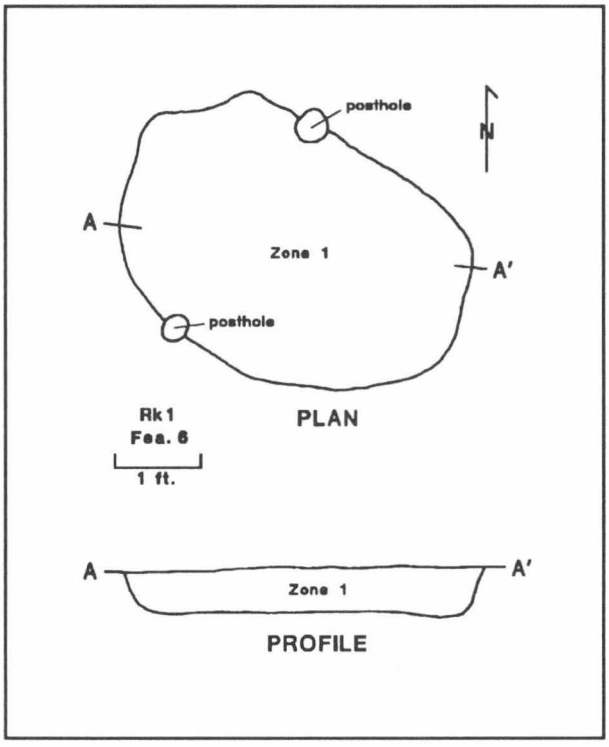

Figure 9.9. Feature 6, plan view and profile drawings.

Feature 6, inside the wall of Structure 1, and may represent two separate pits (Figures 9.10 and 9.11). In the field, however, it was not possible to determine whether two distinct fill zones or two separate pits were indicated. Zone 1 consisted of a dark yellowish brown (10YR 4/4) loam that extended over the northern half of the area designated as Feature 7. Zone 2 occupied the southern half of the feature and was defined by a yellowish brown (10YR 5/4), loamy fill similar to Zone 1 but more mottled with yellowish clay. Zone 1 fill was moderately rich in potsherds, animal bones, and other refuse. Of particular note was a cluster of quartz cobbles in the southeast corner of Zone 1 that also extended into the northeast corner of Zone 2. Two well-worked hammerstones also were found in the same vicinity within Zones 1 and 2. Zone 2 soil yielded fewer artifacts and extended to a deeper depth than Zone 1. The overall dimensions of the feature were 4.8 ft by 4.4 ft in plan and, in the area of Zone 2, it was 0.9 ft deep (Figure 9.12). Zone 1 fill extended to a depth of only 0.5 ft, creating a stepped profile.

The question of whether or not two pits were present can still not be answered with certainty. But the fact that the cluster of quartz cobbles apparently straddled the two fill zones suggests that Zone 1 represents a distinct facility that was disturbed by the digging and filling of a later pit that received the Zone 2 fill. This later disturbance is evidenced by the presence of cobbles in both Zones, the differences in depth between the zones, and the intrusive configuration of the Zone

Figure 9.10. Feature 7, before excavation.

Figure 9.11. Feature 7, excavated.

2 fill in plan view. The original function of the basin(s) is unclear.

Feature 8

This feature was very similar to Feature 7, and after excavation was begun, the decision was made to assign a separate designation (i.e., Feature 24) to what was initially thought to be a zone within Feature 8 (Figures 9.13 and 9.14). The zone which formed the top of Feature 8 was a dark brown (7.5YR 3/4) loam that was rich in food remains, particularly animal bone, and pottery. It extended over an area 6.5 ft by 5.4 ft and was nearly a foot thick in some places. Beneath this layer was a zone of dark brown (10YR 3/3) loam that contained relatively little cultural material and averaged only 0.3 ft in thickness. This large pit was boat-shaped

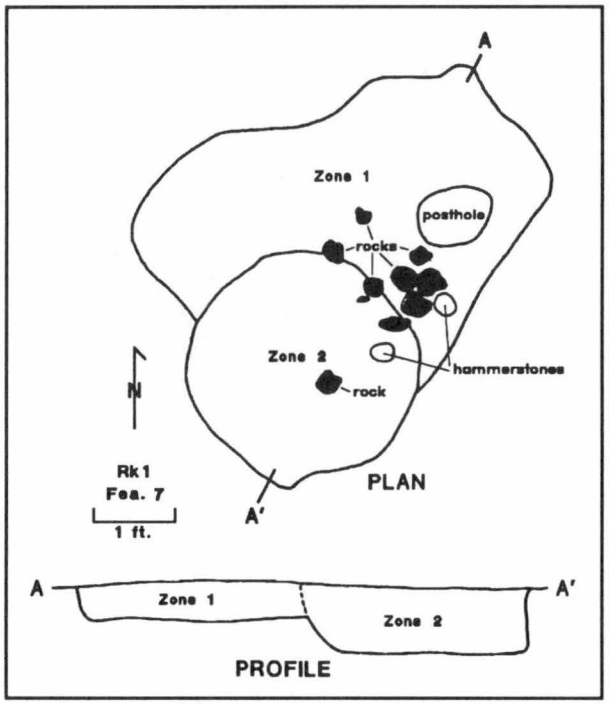

Figure 9.12. Feature 7, plan view and profile drawings.

Figure 9.13. Features 8 and 24, before excavation.

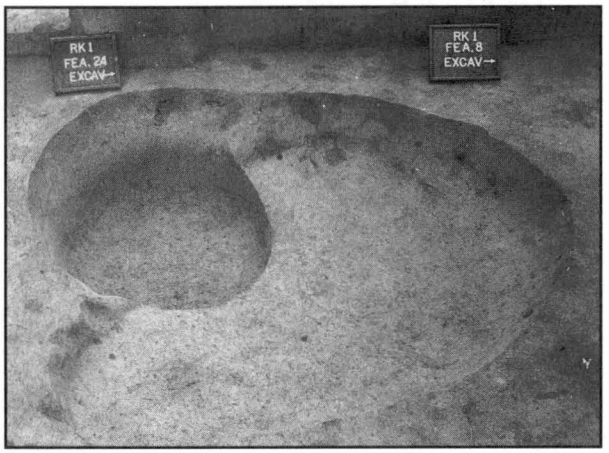

Figure 9.14. Features 8 and 24, excavated.

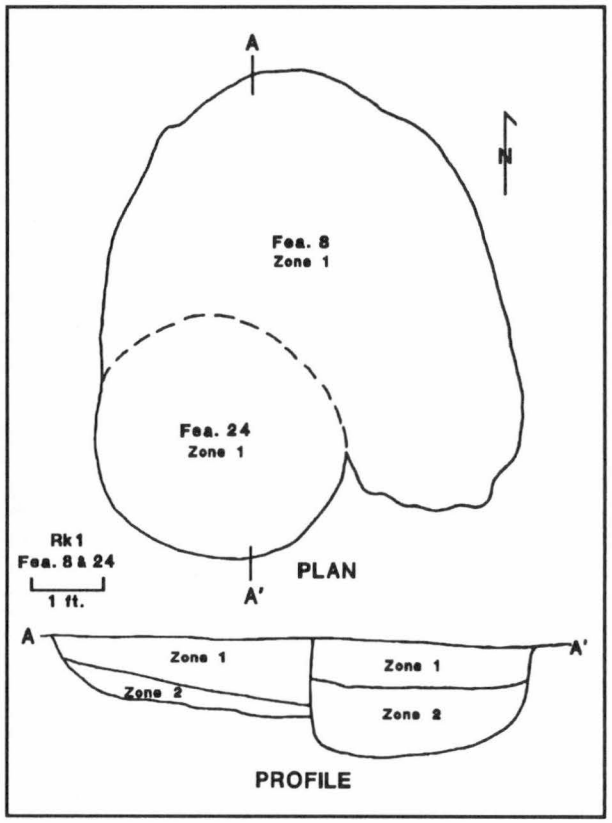

Figure 9.15. Features 8 and 24, plan view and profile drawings.

in profile (Figure 9.15). Since Feature 8 intrudes Structures 1 and 2, it is obviously later than both. It, in turn, is intruded by Feature 24. The overall size, configuration, and rich fill of Feature 8 point to it being a food preparation pit similar to the earth ovens described for other Siouan sites.

Feature 9

This designation was assigned to a pit that extended beneath the R540 profile and was not excavated.

Feature 10

This roughly circular pit, located just north of Structure 2, averaged 4.0 ft in diameter and was 1.7 ft deep after excavation. On the subsoil surface, two fill zones were evident (Figure 9.16). A circle of very dark brown (10YR 2/2) loam (Zone 1) was surrounded by a dark brown (7.5YR 3/2) loam flecked with

Figure 9.16. Feature 10, before excavation.

Figure 9.17. Excavating Feature 10.

charcoal and subsoil clay (Zone 2). Zone 1 formed a shallow (0.6 ft deep) basin in the center of the pit and produced numerous animal bones, including a deer skull, and potsherds (Figure 9.17). The remainder of the pit contained Zone 2 fill, also rich in animal bones (primarily turtle and deer) and pottery. Numerous fist-sized, fire-cracked rock also were present in Zone 2. The excavated pit had walls that sloped inward slightly near the relatively flat bottom (Figures 9.18 and 9.19). This feature probably originally served as a storage unit that was subsequently filled with debris containing a concentration of animal food remains, perhaps from

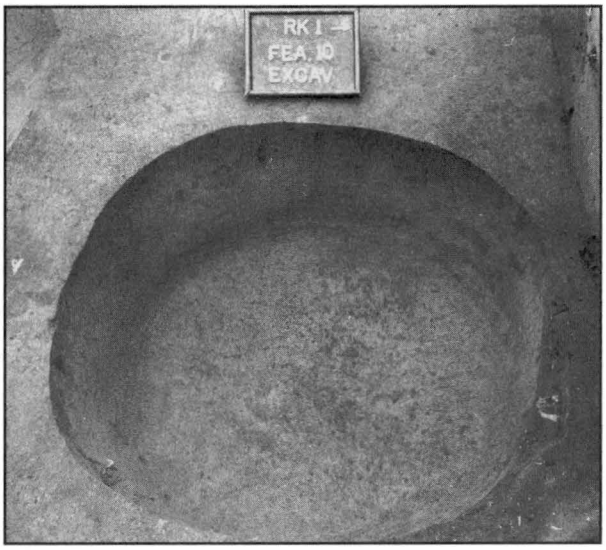

Figure 9.18. Feature 10, excavated.

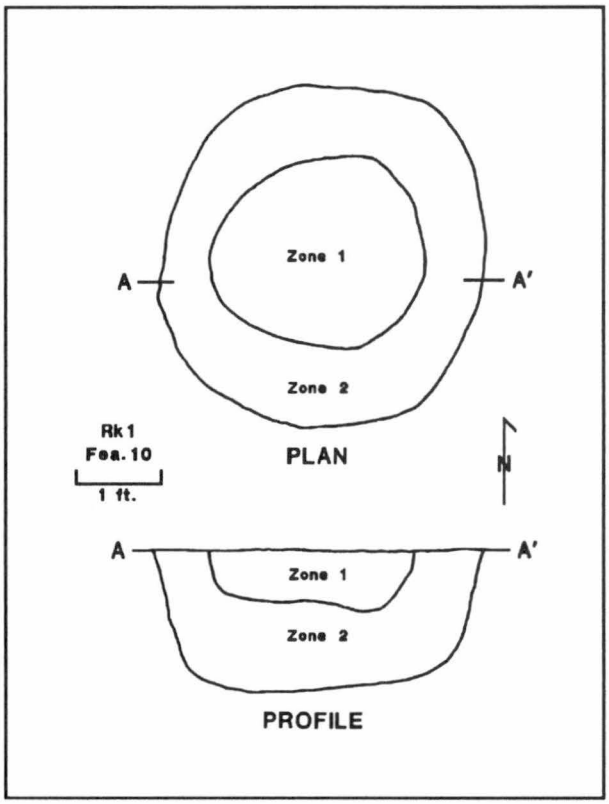

Figure 9.19. Feature 10, plan view and profile drawings.

cleaning one of the large earth ovens. Zone 1 represents a subsequent episode of filling after the initial fill slumped.

Feature 11

This circular, basin-shaped feature was intruded by Feature 10 to the southwest and intruded a small smudge pit (Feature 44) to the west. At the top of

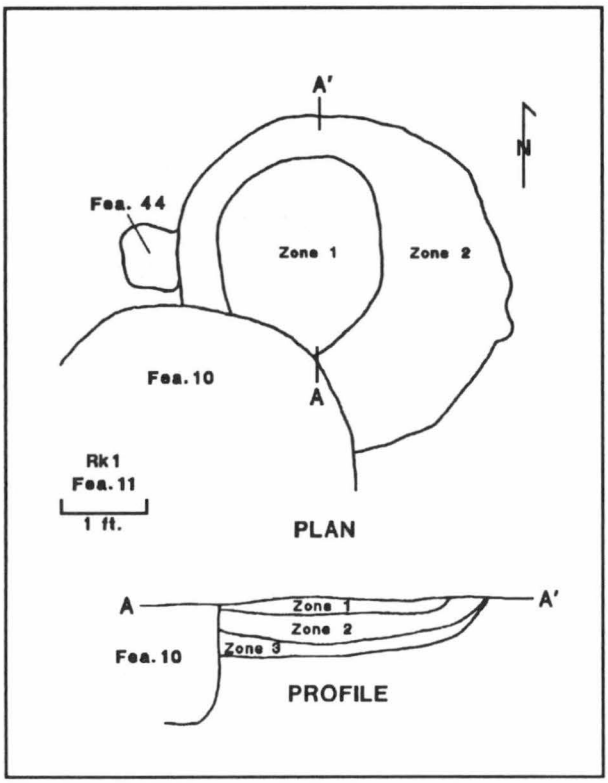

Figure 9.20. Feature 11, plan view and profile drawings.

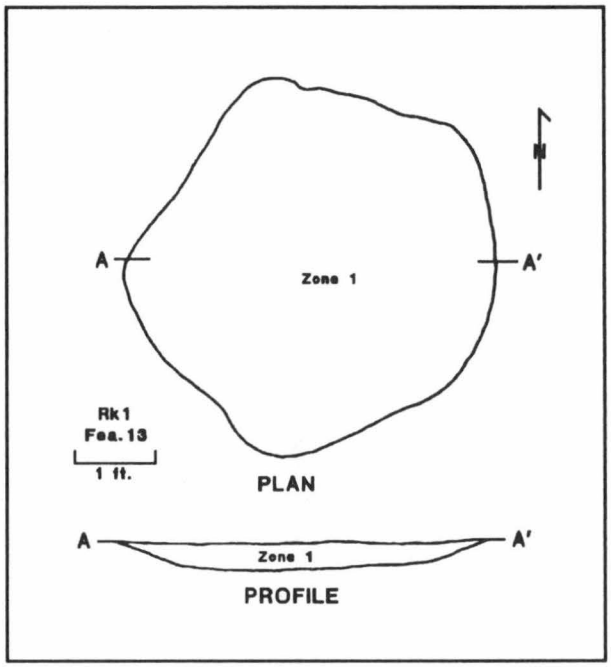

Figure 9.21. Feature 13, plan view and profile drawings.

subsoil, two zones were present. Zone 1, a dark brown (10YR 4/3) clay loam with ash pockets, was surrounded by a brown (10YR 5/3) ashy loam designated Zone 2 (Figure 9.20). Zone 1 was a shallow lens, less than 0.2 ft thick, that contained relatively little cultural material, except for animal bones. The ashy soil comprising Zone 2 was particularly rich in animal bones, some of which were burned, and also contained much fire-cracked rock and pottery. This layer averaged 0.3 ft thick and rested atop Zone 3, a dark brown (10YR 4/3) sandy layer with flecks of charcoal but few artifacts. After excavation, the basin-shaped pit measured 3.9 ft in diameter and had a maximum interior depth of 0.7 ft. Feature 11 probably also represents a food preparation facility or earth oven.

Feature 12

This designation was assigned to a large pothole, not excavated, located northeast of Structures 1 and 2.

Feature 13

This large, circular, shallow, basin-shaped pit also was located northeast of the structures. It contained a single zone of dark brown (7.5YR 3/2) loam which was moderately rich in artifact content. Pottery sherds (including a crushed vessel), animal bones, mussel shells, and fire-cracked rocks were present, but not in the concentrations found in some of the other pits such as Feature 11. After excavation, Feature 13 measured 4.2 ft in diameter and reached a maximum depth of 0.4 ft (Figure 9.21). It may also represent an earth oven.

Feature 14

Feature 14 was located just south of Feature 13 and appeared as a relatively small, oval-shaped stain at the top of subsoil. Excavation revealed a single zone of dark brown (10YR 3/3) loam within a shallow, 0.4-ft deep depression (Figure 9.22). The few artifacts recovered from this feature indicate that it formed during the Dan River phase occupation at the site. Feature 14 may represent a natural unconformity that filled with village humus.

Feature 15

This small, circular basin was situated midway between Features 10 and 14, and north of Structures 1 and 2. It measured 1.3 ft in diameter and was 0.4 ft deep (Figures 9.23 and 9.24). Although it contained few artifacts, it was rich in charcoal. In fact, the excavators observed that the pit contained more charcoal than soil. A piece of charred cane was identified in the field. Feature 15 probably served as a smudge pit used in the hide-curing process.

Feature 16

This feature designates a large, stepped posthole rich in charcoal and fire-cracked rocks but little else. On the subsoil surface, it measured 1.5 ft in diameter but quickly narrowed to a 0.5-ft diameter posthole.

Feature 17

Feature 17 was located in Sq. 540R520, at the

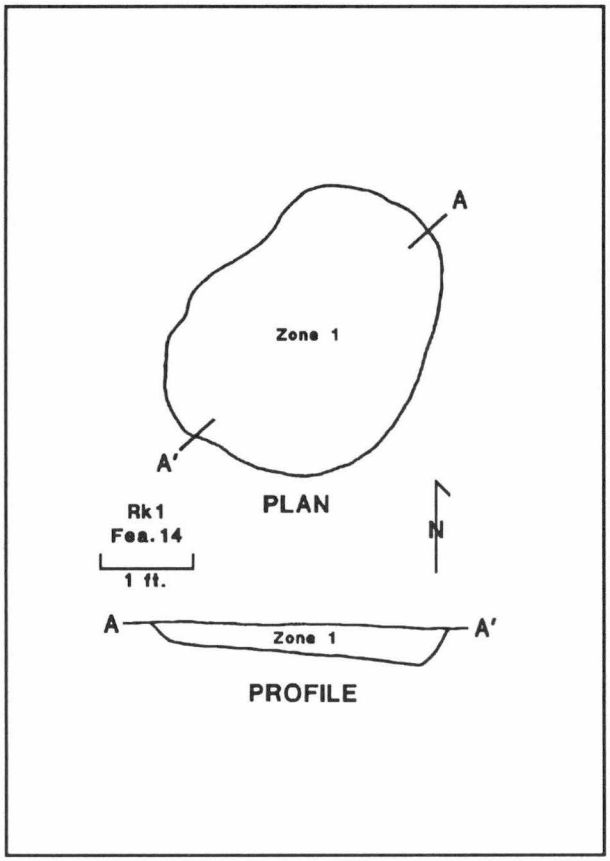

Figure 9.22. Feature 14, plan view and profile drawings.

Figure 9.23. Feature 15, before excavation.

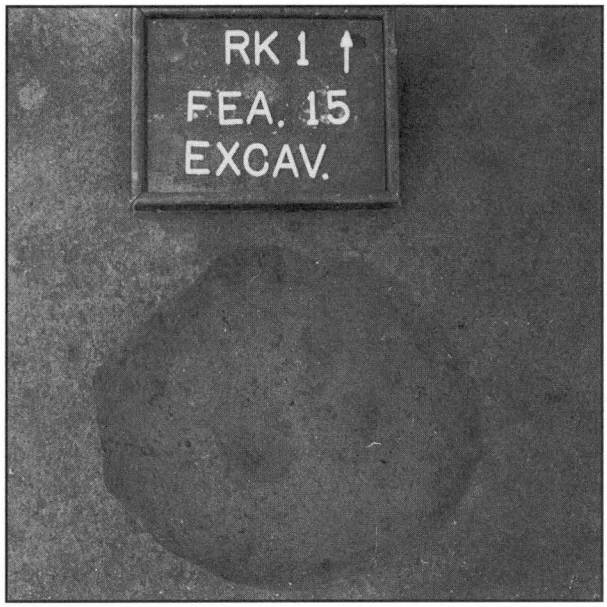

Figure 9.24. Feature 15, excavated.

northern end of the excavations. It was roughly circular in plan and filled with a single zone of very dark brown (10YR 2/2) loam that contained a moderate amount of animal bones, potsherds, and mussel shells. Excavation revealed a straight-sided pit with a flat bottom (Figure 9.25). It measured 2.3 ft by 2.1 ft and was 1.1 ft deep. This feature originally may have been dug to create a small storage facility. It was filled with general domestic refuse that appears to lack any specific behavior referents.

Feature 18

Feature 18 was an ovoid depression, similar to Feature 14, located just northwest of Structures 1 and 2. The upper fill, designated Zone 1, consisted of a very dark grayish brown (10YR 3/2) loam that contained relatively few artifacts. It lay over a dark yellowish brown (10YR 4/4) loam that was even less rich. Zone 1 was approximately 0.3 ft thick while Zone 2 was 0.2 ft thick, making the basin-shaped feature 0.5 ft deep (Figure 9.26). Zone 2 probably represents a transition band between the upper fill and the subsoil. Feature 18 also may represent a natural depression that collected village humus and, like Feature 14, is attributed to the Dan River phase.

Feature 19

Feature 19 probably represents a smudge pit that undercut the southeast corner of the northern excavation block. Time constraints did not permit its excavation.

Feature 20 (Burial 1)

This burial was recognized in the northern excavation block as a large, oval stain consisting of two very similar fill zones. Zone 1, comprising the western half of the pit, was defined as a dark brown (10YR 4/3) loam containing ash, small animal bone fragments, and

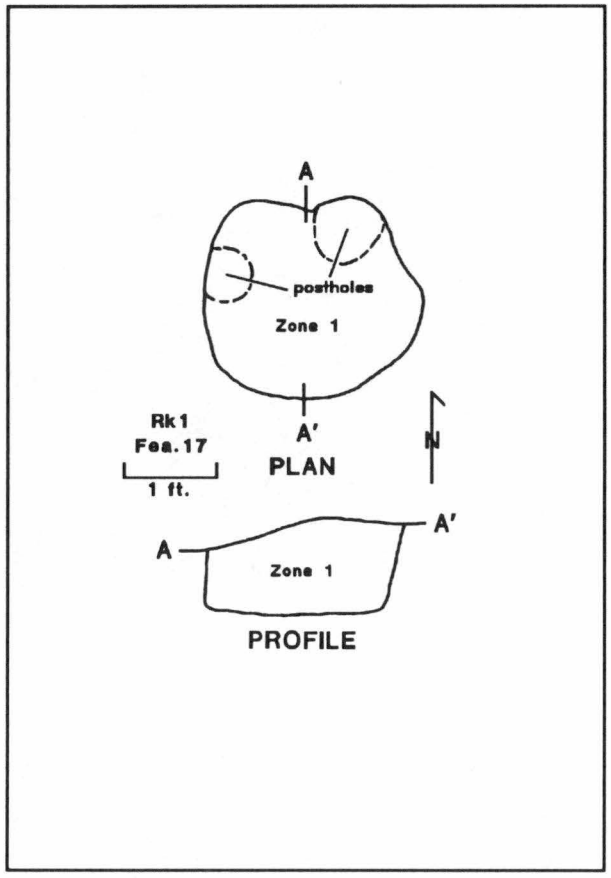

Figure 9.25. Feature 17, plan view and profile drawings.

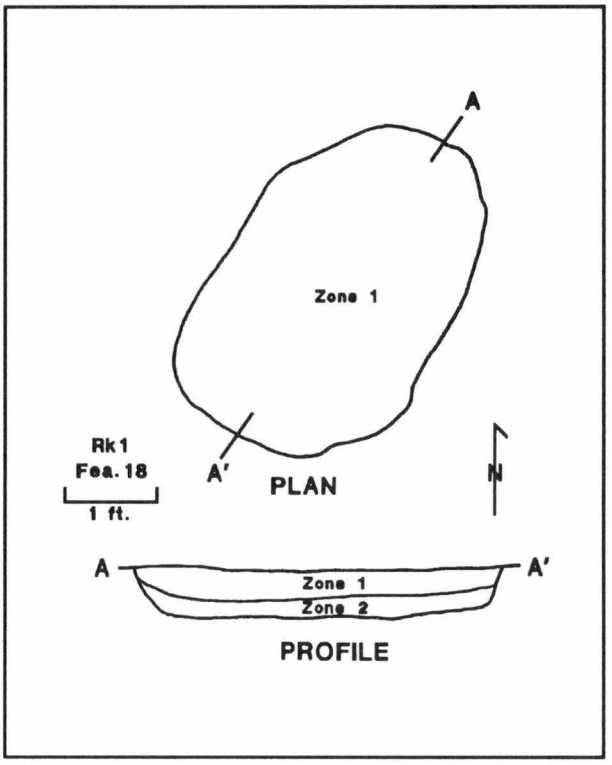

Figure 9.26. Feature 18, plan view and profile drawings.

particles of fired clay. Except for very small pieces of animal bone and a few small potsherds, this fill was virtually sterile. Zone 2, covering the eastern half of the feature, was comprised of a similar loamy soil but with more clay mottling and some small shell fragments. Pockets of wood charcoal, ash, and a few burned corncobs were noted in both zones.

The upper two fill zones extended to a depth of 0.8 ft and lay atop a very distinct third zone. This soil was a yellowish brown (10YR 5/4), mottled clay typical of burial fill at piedmont sites in North Carolina. It was devoid of artifacts other than those associated with the burial itself. The interface between the bottom of Zones 1 and 2 and the top of Zone 3 was marked by a subsoil shelf, almost 1.0 ft wide in places, that surrounded the central area of the pit containing Zone 3 fill. After excavation, the pit measured 5.8 ft by 4.5 ft at the top and was 2.1 ft deep. The central chamber was 2.7 ft by 2.4 ft and extended a little over a foot below the surrounding shelf (Figure 9.27).

The removal of Zone 3 revealed the moderately flexed skeleton of a child approximately six years old at the time of death. The body was lying on its back with the legs flexed along the right side. The head was pointing eastward and the arms extended along either side. A row of seven small (5 mm in diameter),

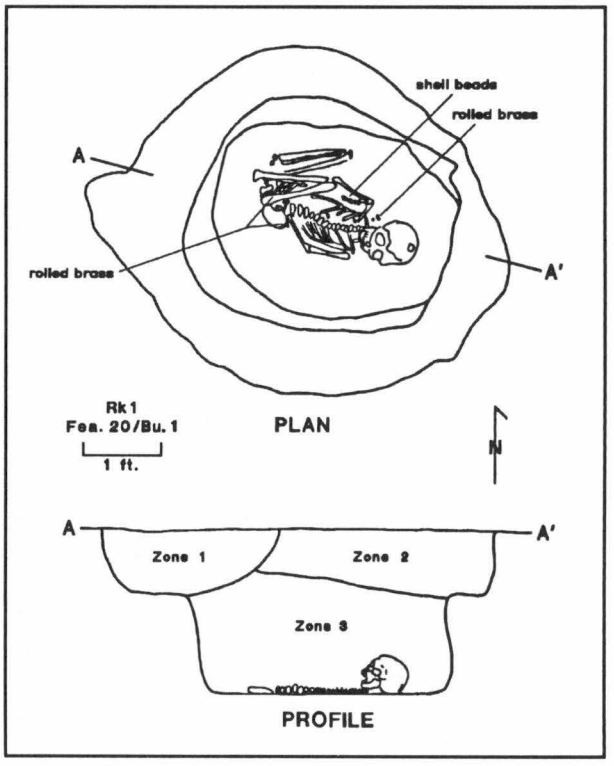

Figure 9.27. Feature 20 (Burial 1), plan view and profile drawings.

roughly spherical, columella shell beads lay beside the right rib cage, between the ribs and the lower arm. Seven small, rolled brass or copper trade beads also were found. Three of these were located in the area of the right wrist; two were in the area of the left wrist; and two were positioned on the right side of the neck. These rod-like specimens ranged from 5 mm to 14 mm in length and were roughly 2 mm in diameter.

This shaft-and-chamber pit is typical of burials found along the Dan River, and was particularly common at Upper Saratown (31Sk1a). The upper dark, organic fill is more characteristic of the burials from the Occaneechi village (31Or231) on the Eno River. However, the Occaneechi burial pits usually contained rich deposits of refuse in the upper fill zones in contrast to the relatively sterile fill of Burial 1. Even without a rich array of artifacts and food remains, the charred wood fragments, ash, and corncobs still suggest that Zones 1 and 2 probably reflect soil from areas of food preparation or possibly ritual activities conducted as part of the mortuary ceremony.

Feature 21

This small, shallow basin was located between Features 20 and 43. After excavation, it measured 1.6 ft by 1.8 ft and was 0.7 ft deep. It contained very little material and may represent a large, shallow posthole or natural disturbance.

Features 22 and 23

These numbers were assigned to stains that extended under the profiles in the northern block excavation. Because of time constraints, they were not excavated.

Feature 24

This circular storage facility intruded Feature 8. The upper portion of the fill, Zone 1, was comprised of a strong brown (7.5YR 5/6) mottled clay that contained a moderate amount of potsherds, animal bones, and other artifacts. At a depth of approximately 0.5 ft, this soil changed to a dark brown (7.5YR 3/4) loam filled with animal bones, particular deer and turtle. This rich zone continued to the bottom of the pit at a depth of 1.6 ft. The facility measured a little over 3.0 ft in plan and had sides that sloped slightly inward to intersect a flat bottom. The size and configuration of Feature 24 suggest a storage facility that was refilled with refuse from intense food preparation and consumption activities, perhaps feasting associated with the large earth ovens or barbecue pits (see Figures 9.13, 9.14, and 9.15).

Feature 25

This was another storage facility, similar to Feature 24, located in the northern excavation block. In plan, it appeared as a nearly circular stain of dark brown (7.5YR 3/4) loam (Figure 9.28). This single fill zone

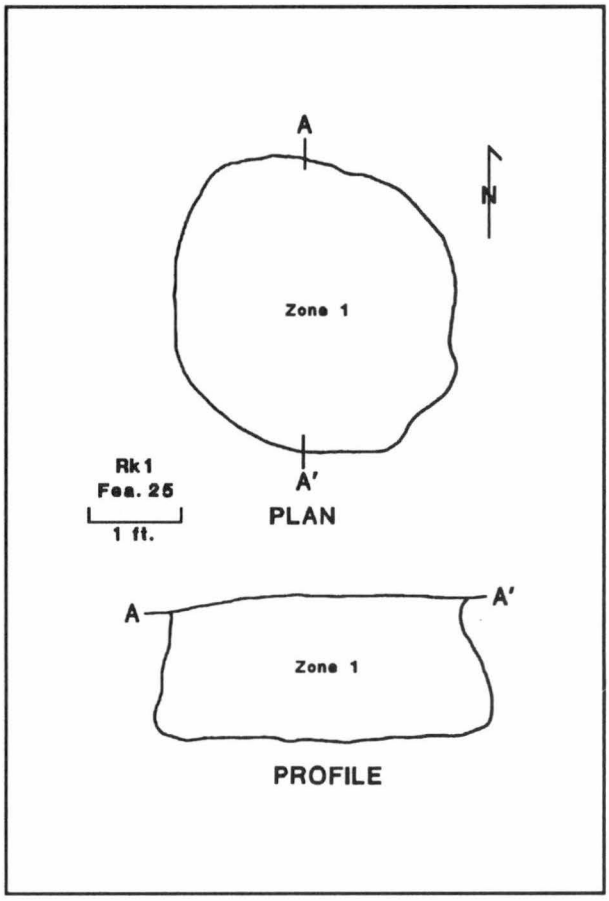

Figure 9.28. Feature 25, plan view and profile drawings.

yielded numerous animal bones, potsherds, mussel shells, and charcoal fragments. After excavation, the pit measured 2.7 ft by 3.0 ft and was 1.6 ft deep (the same as Feature 24). It had a bell-shaped profile with the lower sides sloping outward to intersect a flat bottom. As with Feature 24, this pit also probably served as a storage facility and was later filled with refuse from food preparation and consumption activities.

Features 26, 27, 28, and 29

These pits undercut various profiles in the northern excavation block, and because of time constraints, they could not be excavated.

Feature 30

This large, rich, basin-shaped pit also was located in the northern excavation block and intruded Feature 29. Given the alignment of the palisade postholes through the southern excavation block (see Figure 9.4), it is likely that this feature flanks the inside of the palisade in much the same manner as Features 38 and 46. At the subsoil level, two distinct zones were recognized (Figure 9.29). The most recent zone, Zone 1, was a dark brown (7.5YR 3/2) sandy loam that contained ash, charcoal, and fire-cracked rocks. Zone

Figure 9.29. Feature 30, before excavation.

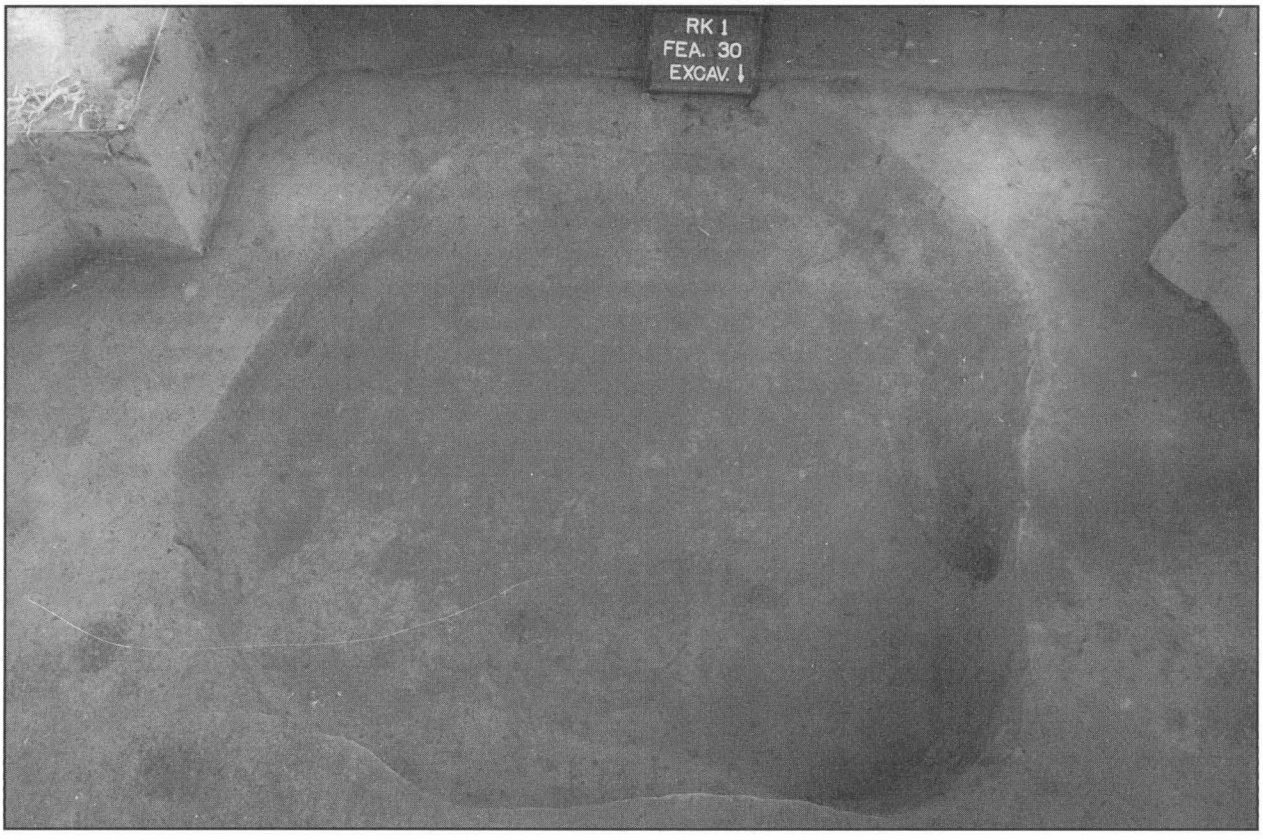

Figure 9.30. Feature 30, excavated.

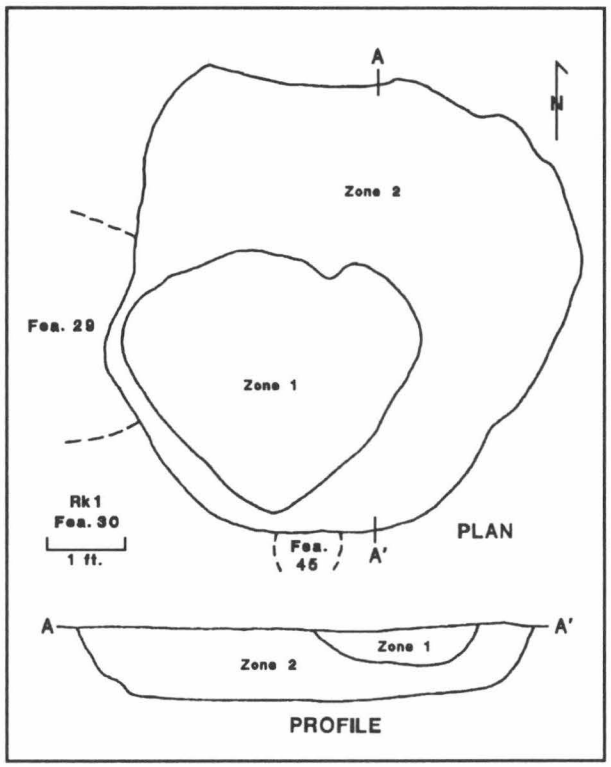

Figure 9.31. Feature 30, plan view and profile drawings.

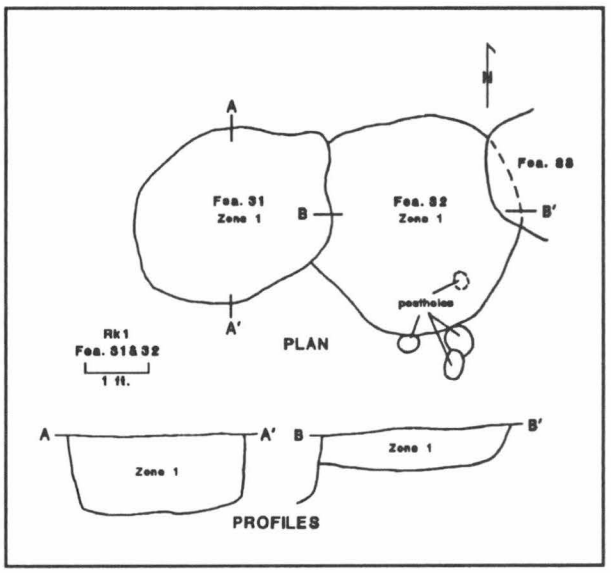

Figure 9.32. Features 31 and 32, plan view and profile drawings.

2 was a dark yellowish brown (10YR 3/4), sandy loam with charcoal, fire-cracked rocks, and fired clay particles. Zone 1 comprised a pocket occupying the southwestern one-third of the pit and was only 0.5 ft thick at its deepest point. This soil contained numerous animal bones, mussel shells, fire-cracked rocks, and charcoal. Zone 2 was even richer in animal bone, shells, and other food remains. White-tailed deer, represented by numerous whole scapulae, mandibles, maxillas, and crania, was the predominant species. Numerous turtle shells also were noted. After excavation, Feature 30 measured 6.0 ft by 5.9 ft and was 0.8 ft deep (Figures 9.30 and 9.31). The shallow sides sloped inward slightly and the bottom was flat, creating a boat-shaped profile. There is little doubt that this was a food preparation facility or earth oven. Ceremonial feasting may have created the rich refuse deposit contained in the pit.

Feature 31

This circular storage pit was located inside Structures 1 and 2 along the south walls. A single zone of dark yellowish brown (10YR 3/4) loam filled the cylindrical pit which measured 2.8 ft by 3.0 ft and was 1.3 ft deep (Figure 9.32). Artifact output was moderate compared with the earth ovens at the site, but numerous animal bones and potsherds were recovered. Fish bones, as well as deer and turtle bones, were particularly abundant. The pit wall sloped inward slightly and the bottom was generally flat. Feature 31 may have been associated with either structure and perhaps filled after the structure was abandoned. The food remains in the fill suggest they were generated by preparation and consumption activities not nearly as intense as the feasting behavior suggested by the earth ovens or roasting pits.

Feature 32

Feature 32 designates a shallow basin intruded by Feature 31. The upper portion of the dark yellowish brown (10YR 4/4) loam contained animal bones and potsherds, while artifact content decreased markedly below 0.2 ft. Artifacts found within the pit suggest that it was used and filled during the Dan River phase. Feature 32 measured 3.5 ft in diameter and was 0.7 ft deep (Figure 9.32).

Feature 33

This pit intruded Features 32 and 34, and appeared as a patch of yellowish brown (10YR 5/8) clay over the northern half of the Feature 34. This zone was relatively sterile but was underlain and surrounded by a rich layer, designated Zone 2, of dark brown (7.5YR 3/2) loam that yielded numerous animal bones, shell, potsherds, and other refuse. Zone 2 lay atop Zone 3, a dark brown (10YR 4/3) mottled sand that contained relatively little cultural material. Completely excavated, the pit measured 3.9 by 4.0 ft and extended to a depth of 2.4 ft (Figure 9.33). This refilled storage facility postdates Features 32 and 34 and may be associated with Structure 2.

Feature 34

This shallow basin was intruded by Feature 33 and Structure 1. The dark brown (10YR 3/3) loam filling

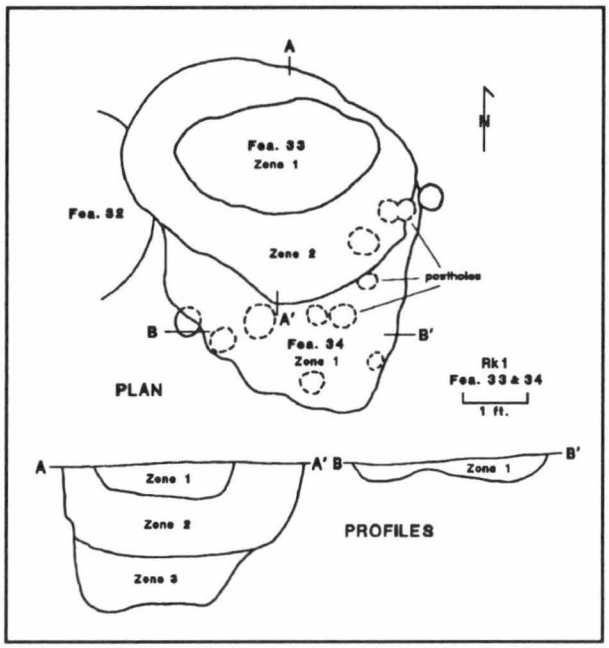

Figure 9.33. Features 33 and 34, plan view and profile drawings.

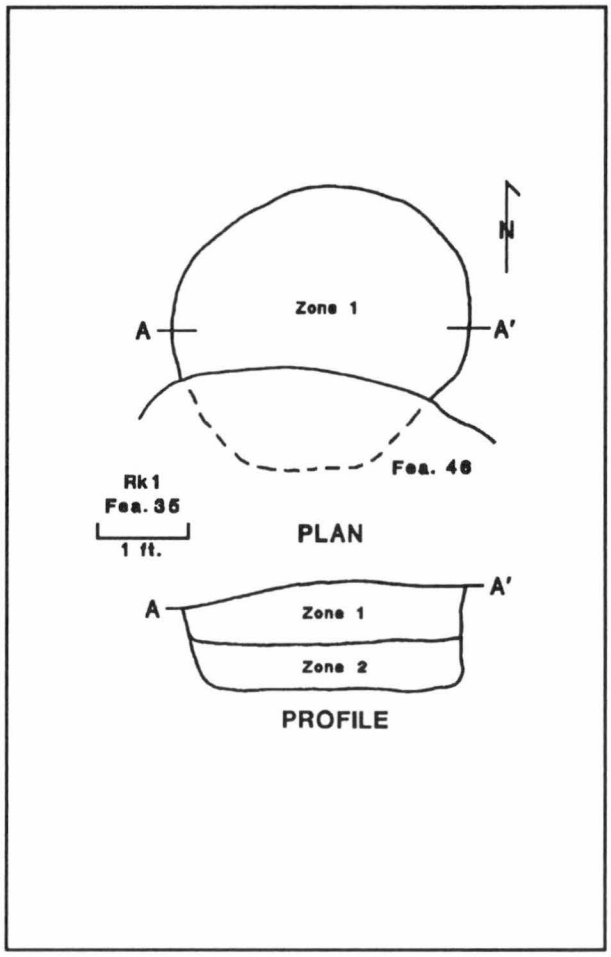

Figure 9.34. Feature 35, plan view and profile drawings.

this feature was not nearly as rich as Zone 2 of Feature 33. However, during the course of the excavation, the two fill zones were initially confused and some Zone 2 material from Feature 33 was included with Zone 1 artifacts from Feature 34. After excavation, Feature 34 measured 4.0 ft by 1.8 ft and was only 0.4 ft deep (Figure 9.33).

Feature 35

This circular storage pit was intruded by Feature 46. It contained two fill zones: Zone 1, a very dark brown (10YR 2/2), sandy loam that contained numerous animal bones, potsherds, and other refuse; and Zone 2, a dark yellowish brown (10YR 4/6) loam that produced markedly fewer artifacts (Figure 9.34). Both zones were about 0.5 ft thick and extended across the entire pit. After excavation, Feature 35 was a little over 3.0 ft in diameter and 1.2 ft deep. When no longer suited for storage, the pit was rapidly filled, first with soil containing light debris and lastly with refuse-laden soil that probably was collected from an area of food preparation and consumption.

Features 36 and 37

These numbers were assigned to a large circular (?) pit (Feature 36) in the southeast corner of the southern excavation block and a pothole (Feature 37) dug into the pit. Both features continued under the profiles. Auger tests showed both to be shallow, less than 0.5 ft deep. A lack of time prevented their excavation.

Feature 38

This large, rich, basin-shaped pit was located in the southwest corner of the southern excavation block and appears to intrude the palisade. As with other similar features at the site, the artifact content was not only rich but also varied. A large number of diverse animal species were represented including the ubiquitous deer and turtle, as well as turkey, racoon, and others. A single fragment of a human ulna also was identified from Feature 38. In addition, three turtle shell bowls were found along with numerous mussel shells, potsherds, fire-cracked rock, and glass and shell beads. All were mixed in a matrix of dark brown (7.5YR 3/2) loam with flecks of charcoal and burned clay. The palisade postholes were identified at the bottom of the pit, after it had been cleaned for photographing. It measured 7.2 ft by 6.2 ft in plan and reached a maximum depth of 0.9 ft. Feature 38 represents another of the large earth ovens, perhaps used to prepare feasts that celebrated communal ceremonial occasions (Figure 9.35).

Features 39 and 40

These two numbers were assigned to the western and eastern halves of what is probably nothing more than a pocket of slightly different fill resulting from

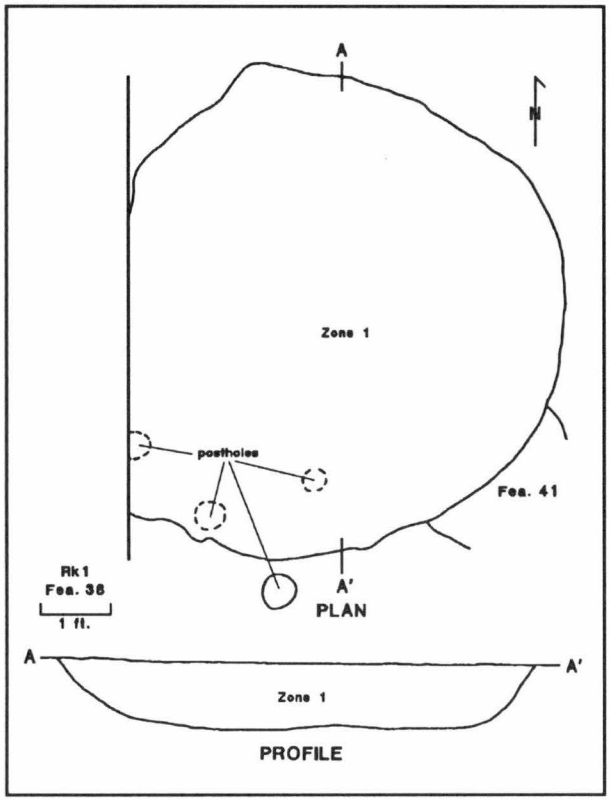

Figure 9.35. Feature 38, plan view and profile drawings.

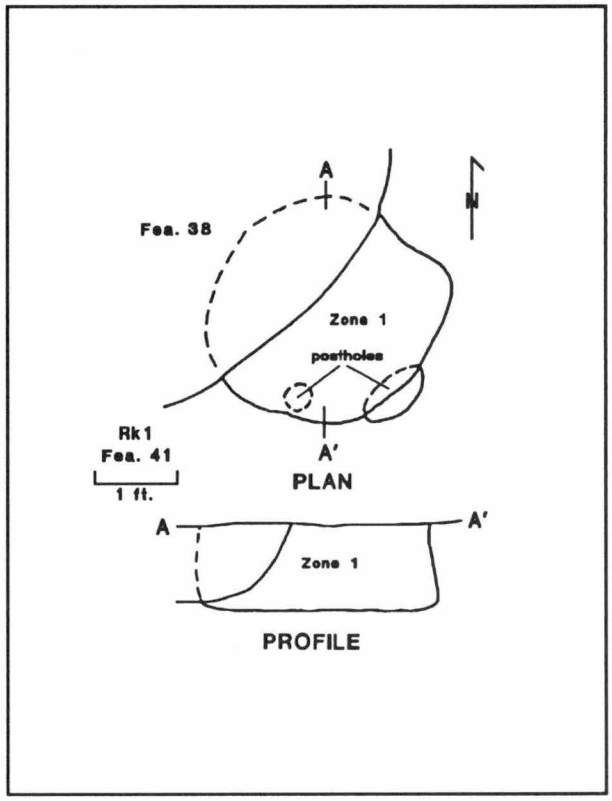

Figure 9.36. Feature 41, plan view and profile drawings.

activities associated with Feature 38. This pocket was defined as a dark brown (7.5YR 4/4) sandy clay with no artifacts showing on the surface. Several potsherds and animal bones, however, were recovered from the bottom of this deposit. Two small potholes also were recognized in the eastern lobe, labeled Feature 40 (see Figure 9.4).

Feature 41

This circular storage pit was intruded by Feature 38. It measured 2.8 ft in diameter, extended to a depth of 1.1 ft, and had been refilled with a single zone of homogeneous dark brown (10YR 3/3) loam that produced relatively little cultural material in comparison with the large food preparation facilities (Figure 9.36). The sides of the feature that had not been destroyed by Feature 38 bowed out slightly at the bottom which was flat. The pit was rapidly refilled when no longer needed for storage. The fill appears to have been collected from general village topsoil. All of the identifiable potsherds found in the fill were classified into the Dan River series and indicate that this feature is associated with the late prehistoric Dan River phase.

Wood charcoal recovered near the bottom of Feature 41 yielded a radiocarbon age of 750 $\pm$ 60 years: A.D. 1200 (Beta-36092). When calibrated (Stuiver and Becker 1986), this provides a one-sigma age range of A.D. 1222 to A.D. 1282 with multiple intercepts at A.D. 1264, A.D. 1268, and A.D. 1276. This date is consistent with radiocarbon assessments of other Dan River phase contexts in North Carolina and southern Virginia and is thought to be a reasonable estimate of when the Dan River village at Lower Saratown was occupied.

Features 42 and 43

Feature 42 turned out to be a stain or smear of old humus, whereas Feature 43 was a large pothole in the northern excavation block. Because of limited time, it was not excavated.

Features 44 and 45

These small, corncob-filled smudge pits were both approximately 0.8 ft in diameter and only 0.2 ft deep. Other than whole and fragmented corncobs, only a single mussel shell was recovered from Feature 44.

Feature 46

This large, oval-shaped basin was located adjacent to the palisade and intruded Feature 35. It measured 4.6 ft by 6.3 ft and had a maximum depth of 0.7 ft (Figure 9.37). As with the other large basins, Feature 46 was rich with food refuse, particularly animal bone and mussel shell. Several complete turtle shells were found along with deer and small mammal remains. Most of the refuse was contained within Zone 1, a highly mottled, very dark brown (10YR 2/2) loam.

This zone was a little over 0.3 ft thick and rested atop Zone 2, a dark yellowish brown (10YR 4/4) loam that contained less food refuse but a considerable number of fire-cracked rocks and a dense concentration of charcoal in the center. A thin layer of sand covered the bottom of Feature 46. There is little doubt that this large basin served as an outdoor food preparation facility, perhaps used during village-wide celebrations.

Feature 47

This unexcavated feature was intruded by Feature 46 and extended beyond the limits of excavation.

Summary

Those features whose functions could be determined with reasonable accuracy fell into three categories: 1) storage pits; 2) food preparation facilities; and 3) smudge pits. The nine storage pits were generally circular and usually over a foot deep. They averaged approximately 3.0 ft in diameter, had straight sides, and flat bottoms. All were filled rapidly after being abandoned as storage facilities. Most contained soil rich in animal bones, pottery, and other refuse normally associated with food preparation and consumption activities. Many appeared to have been filled with debris collected from around the large, basin-shaped pits thought to represent earth ovens.

These ovens or roasting pits (n=6) were oval in outline, large (sometimes over 6.0 ft across), and shallow (less than one foot deep). Food refuse, charcoal, and large potsherds typically were incorporated in the fill. Similar features occur on other sites in the Dan River drainage (e.g., Early Upper Saratown and Upper Saratown) and the Eno and Haw drainages (e.g., the Jenrette, George Rogers, and Edgar Rogers sites). They seem to be associated primarily with the first half of the Contact period. We believe they represent earth ovens or roasting pits associated with communal feasting activities, perhaps corresponding with seasonal celebrations.

The large, basin-shaped holes were dug, probably lined with vegetable materials, and then filled with various cuts of meat, fish, and fowl. The food was covered over and a fire built on top, much like pit barbeque is prepared today. After being cooked, the food was removed, eaten, and the refuse from preparing and consuming the meal was simply tossed or kicked back into the large depression. These facilities do not appear to have been recycled. New ones were prepared for each occasion of communal feasting. At

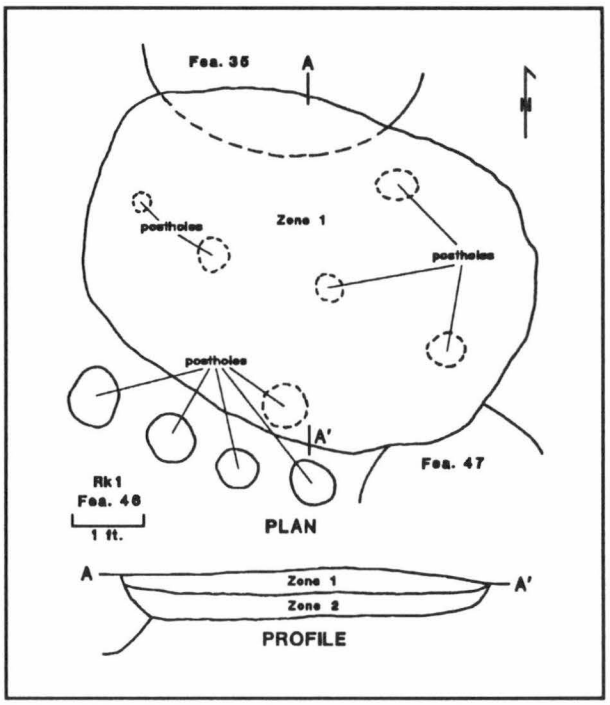

Figure 9.37. Feature 46, plan view and profile drawings.

sites such as Upper Saratown (31Sk1a) where large village areas have been opened, similar facilities usually were dug adjacent to the palisades, placing them away from the central plaza and domestic areas of the village.

Of the four features associated with the Dan River phase occupation at Lower Saratown, none contained rich cultural deposits, and only one was clearly defined. Most seemed to represent natural depressions or "dips" in the original surface where village humus or topsoil collected and escaped the plow. One storage pit also was assigned to the Dan River phase, but it, too, contained fill with few artifacts or food refuse. The Dan River features stand in marked contrast to the refuse-laden pits assigned to the later Middle Saratown phase.

The smudge pits (n=4) were small, conical in outline, and filled with wood charcoal or burned corncobs. As with similar facilities found throughout the eastern United States, they were probably used to smoke and process animal hides. Finally, only the base of a single hearth was uncovered in the center of the concentric house structures. Restricted to the humus zone, the upper collar, if it existed, would have been truncated by plowing.

Structures

The southern excavation block at Lower Saratown uncovered the wall outlines of two concentric structures associated with a cluster of large pit features (see Figure 9.4). All postholes comprising these structures were excavated and their fill waterscreened through 1/16-inch mesh (Figures 9.38 and 9.39). These structures were located just inside the palisade. The smaller inner structure, Structure 1, was defined by

Figure 9.38. Cleaning Structures 1 and 2, and associated features.

Figure 9.39 Structures 1 and 2, excavated.

tightly-spaced postholes aligned in an oval configuration. Its long axis measured almost 19 ft, whereas the smaller diameter measured 16 ft. The total roofed area was a little over 200 sq ft.

The Structure 1 wall posts were nearly adjacent to one another and rarely more than 0.5 ft apart. The posthole density was 1.3 posts per linear ft (circumference=54 ft; n=69 postholes). This density is low and misleading, however, because the postholes of a sizable segment of the Structure 1 wall were obliterated by the intrusion of Feature 8. The posts themselves averaged a little over 0.4 ft in diameter, although a few were as large as 0.8 ft in diameter. Depth below the subsoil surface ranged from 0.2 ft to 0.8 ft.

A vague, oval-shaped area (Feature 5) of slightly reddened subsoil clay, located in the middle of the structure, may indicate that a hearth was once present. Because of the concentric nature of Structures 1 and 2, the location of the hearth area in the center of Structure 1 does not preclude its association with Structure 2.

Although considerably larger, Structure 2 was similar in outline to Structure 1. Structure 2 measured approximately 25 ft by 17.5 ft with an interior floor area of 320 sq ft. The posts used in the construction of the wall were roughly the same size as those of Structure 1 but were not as closely spaced. Structure 2 posthole density was 0.9 per linear ft (circumference=62.8 ft; postholes=67) compared with 1.3 for Structure 1. Feature 8 disturbed both structures but had a greater impact on Structure 1, making the difference between the wall post densities more marked than the calculated figures indicate. This suggests that the smaller structure had considerably more rebuilding and repair work and was used for a longer period of time. The size difference further suggests that a smaller number of people occupied Structure 1.

Because the walls of the two structures did not overlap and intrude one another, it cannot be determined with certainty which was built first. However, given their concentric relationship and the fact that the wall post density of Structure 1 indicates considerable re-building, we suspect that it is the older of the two. On the other hand, if Feature 33 was associated with Structure 2, as suggested earlier, then Structure 1 would have to have been built last. This temporal placement results from the fact that Structure 1 intruded the edge of Feature 33.

Except for Features 2, 8, 24, and 33, any of the interior features could be associated with either structure. Obviously, Features 8 and 24 were constructed after both structures were abandoned as Feature 8 destroyed sections of both walls and in turn was intruded by Feature 24. Feature 2 was located outside the wall of Structure 1 and may be associated with Structure 2, whereas Feature 33 was intruded by Structure 1 but may date to the Structure 2 occupation.

The postholes themselves offer no unambiguous clues as to which is older. The fill from Structure 1 postholes produced a single brass bead compared with a single glass bead retrieved from the fill of Structure 2 postholes. The demographic and social implications of structural priority are obvious but, without additional data, it is simply not possible to determine with certainty which house was built first. However, the non-overlapping nature of the two structures strongly suggests that the location of one was known when the other was built and that a relatively short span of time was involved in their construction and occupation.

The sizes of the structures are comparable to those of domestic structures uncovered at other village sites in North Carolina. Structure 1, with a 200-sq-ft area, is similar to the average roofed area of houses at the Fredricks site (232 sq ft), and Structure 2 is only a little smaller than the average-sized house at the Wall site (368 sq ft). Probably between four and eight individuals occupied these structures at any given time.

The lack of interior supports suggests that the structures were built "wigwam-fashion" with the saplings or small trees being stripped of their branches to make posts. These were then set in the ground and the limber tops pulled together and tied to create a frame. The absence of large quantities of daub may indicate that the frame was covered with bark or hides or other perishable materials rather than wattled clay plaster. This follows the pattern recognized at other sites, although Petherick (1987:45) has argued that the absence of daub may be the result of preservation factors.

John Lawson, traveling through the Piedmont during the winter of 1701, provides a detailed description of house construction that almost perfectly fits the current archaeological data, including the Lower Saratown structures.

> These Savages live in *Wigwams*, or Cabins built of Bark, which are made round like an Oven, to prevent any Damage by hard Gales of Wind. They make the Fire in the middle of the House, and have a Hole at the Top of the Roof right above the Fire, to let out the Smoke. These Dwellings are as hot as Stoves, where the *Indians* sleep and sweat all Night. The Floors thereof are never paved nor swept, so that they have always loose Earth on them . . . .
>
> The Bark they make their Cabins withal, is generally Cyprus, or red or white Cedar; and sometimes, when they are a great way from any of these Woods, they make use of Pine-Bark, which is the worser sort. In building these Fabricks, they get very long Poles, of Pine, Cedar, Hiccory, or any Wood that will bend; these are the Thickness of the Small of a Man's Leg, at the thickest end, which they generally strip of the Bark, and warm them well in the

> Fire, which makes them tough and fit to bend; afterwards, they stick the thickest ends of them in the Ground, about two Yards asunder, in a Circular Form, the distance they design the Cabin to be, (which is not always round, but sometimes oval) then they bend the Tops and bring them together, and bind their ends with Bark of Trees, that is proper for that use, as Elm is, or sometimes the Moss that grows on the Trees, and is a Yard or two long, and never rots; then they brace them with other Poles, to make them strong; afterwards, cover them all over with Bark, so that they are very warm and tight, and will keep firm against all the Weathers that blow [Lefler 1967:180–182].

Except for the spacing of the wall posts—which is considerably closer than Lawson describes—this detailed picture fits the archaeological data to a remarkable degree. And the fact that Lawson is referring to new house construction rather than older existing structures may explain the discrepancy in the spacing of the wall posts. What we see in the archaeological record may be a consequence of repairs and replacement of rotted posts in older structures rather than a different construction technique.

Postholes

Four hundred and seventy-six postholes (or postmolds) were mapped; 144 of these, comprising wall alignments associated with Structure 1 (n=69), Structure 2 (n=67), and the palisade (n=8), were excavated. Aside from Structures 1 and 2, the most significant architectural evidence uncovered was an alignment of eight large postholes along the southwestern edge of Features 38, 39, 40, and 46. Given the size of these postholes, the slight curvature of the alignment, and their position relative to the adjacent features and Structures 1 and 2, they are interpreted as part of a palisade or stockade line that encompassed the middle Saratown phase village. From an archaeological standpoint, the position of this palisade segment is particularly significant since it explains why the 1938 excavation, located immediately southwest of the present excavations (and outside the circumscribed village area), produced no clear evidence for an historic component. Also, it indicates that only a third of the site area, as delineated from the surface distribution of artifacts (see Figure 9.1), contains evidence for the seventeenth-century village.

Pottery

Archaeological excavations at Lower Saratown produced 27,863 potsherds, including 15 large or reconstructible vessel sections. Approximately 64% (n=17,813) of these potsherds came from the plowzone, postholes, and miscellaneous site contexts; 5,275 sherds (18.9%) were recovered from the sub-plowzone midden; and the remaining sherds were recovered from archaeological features associated with the Dan River phase (n=236) and middle Saratown phase (n=4,539) occupations (Table 9.2). Almost two-thirds of the sherds from features and over 95% of the sherds from other contexts either were too small (i.e., less than four centimeters in diameter) or too eroded to be reliably identified, and were classified as indeterminate. Of the remaining 2,775 sherds, 47.1% were plain and 42.2% were net impressed. Other surface treatments represented in the sample, in descending order, were corncob impressed, brushed, check stamped, cord marked, simple stamped, burnished, fabric marked, and complicated stamped.

Three site occupations are represented by the pottery sample. The three fabric marked sherds were classified as *Yadkin Fabric-Marked* (Coe 1964) and indicate a minor Middle Woodland occupation. Thirteen hundred and eighty-nine sherds with net impressed, corncob impressed, cord marked, and plain surfaces, and mostly crushed quartz to coarse sand tempered pastes, are referable to the Dan River series (Coe and Lewis 1952) and reflect a substantial late prehistoric occupation during the Dan River phase (A.D. 1000–1450). Although only four Dan River phase features were excavated, most of the artifacts from the midden and overlying plowzone can be attributed to this occupation. Finally, 1,383 potsherds tempered mostly with fine sand and with plain, brushed, check stamped, simple stamped, burnished, and complicated stamped surfaces are referable to the Oldtown series (Wilson 1983). These artifacts, including most of the large and reconstructible vessel sections, are associated with the middle Saratown phase (A.D. 1620–1670) occupation and document Sara pottery-making during the mid-seventeenth century. This occupation was responsible for most of the archaeological features found within the 1988 excavation area.

Yadkin Fabric-Marked

Three *Yadkin Fabric-Marked* (Coe 1964) sherds were recovered from the midden and Feature 10. The exterior surfaces of these sherds have been impressed with a simple-plaited or wicker fabric-wrapped paddle; the interior surfaces are smoothed. These sherds are tempered with coarse crushed quartz or sand. The one

Table 9.2. Distribution of pottery from Lower Saratown.

Context	Yadkin Series Fabric Marked	Dan River Series Net Impressed	Cord Marked	Corncob Impressed	Plain	New River Series Net Impressed	Cord Marked
Dan River Phase							
Fea. 14	-	11	-	-	3	-	-
Fea. 18	-	10	-	5	-	-	-
Fea. 32	-	26	-	3	2	-	-
Fea. 41	-	24	-	4	2	-	-
Sub-total	0	71	0	12	7	0	0
Middle Saratown Phase							
Fea. 1	-	15	-	-	2	-	-
Fea. 3	-	-	-	-	-	-	-
Fea. 4	-	3	-	-	-	-	-
Fea. 5	-	8	-	-	-	-	-
Fea. 6	-	10	-	-	2	-	-
Fea. 7	-	19	-	-	1	-	-
Fea. 8	-	69	1	4	5	-	1
Fea. 10	1	38	1	9	-	-	-
Fea. 11	-	6	-	3	2	-	-
Fea. 13	-	18	-	2	-	-	-
Fea. 16	-	3	1	-	-	-	-
Fea. 17	-	6	-	-	-	-	-
Fea. 20 (Bu. 1)	-	5	-	1	2	-	-
Fea. 21	-	-	-	-	-	-	-
Fea. 24	-	7	-	-	1	-	-
Fea. 25	-	10	-	-	1	-	-
Fea. 30	-	26	-	2	-	-	-
Fea. 31	-	21	1	4	1	-	-
Fea. 33	-	22	-	3	1	-	-
Fea. 34	-	22	-	-	-	-	-
Fea. 35	-	70	1	6	1	-	-
Fea. 38	-	104	1	9	1	-	-
Fea. 39	-	6	-	-	-	-	-
Fea. 40	-	-	-	-	1	-	-
Fea. 43	-	-	-	-	-	-	-
Fea. 46	-	11	-	5	-	-	-
Str. 1	-	15	3	2	-	-	-
Sub-total	1	514	9	50	21	0	1
Indeterminate Phase							
Plowzone	-	254	3	19	19	1	-
Midden	2	323	17	23	35	-	-
Postholes	-	1	-	-	-	-	-
Misc.	-	8	-	-	1	-	-
Sub-total	2	586	20	42	55	1	0
Total	3	1171	29	104	83	1	1

rimsherd in the sample is everted and has a rounded, notched lip. These potsherds probably represent a minor Yadkin phase occupation of the site during the Middle Woodland period (ca. A.D. 100–500).

Dan River Net Impressed (Figure 9:40)

Lower Saratown is the type site for the Dan River ceramic series and its various types, including *Dan River Net Impressed* (Lewis 1951; Coe and Lewis 1952). The definition of this series was based upon the analysis of 5,181 potsherds recovered in 1938 from a 550-sq-ft excavation located just west of the 1988 excavations. At that time, all pottery from the site was attributed to an historic (ca. A.D. 1625–1675) Sara occupation of the site despite the fact that a hand-forged nail from the plowzone was the only historic

Table 9.2 Continued.

Context	Oldtown Series							
	Plain	Brushed	Burnished	Simple Stamped	Check Stamped	Complicated Stamped	Indet.	Total
Dan River Phase								
Fea. 14	-	-	-	-	-	-	10	24
Fea. 18	-	-	-	-	-	-	11	26
Fea. 32	-	-	-	-	-	-	96	127
Fea. 41	-	-	-	-	-	-	29	59
Sub-total	0	0	0	0	0	0	146	236
Middle Saratown Phase								
Fea. 1	5	1	-	-	-	-	53	76
Fea. 3	1	-	-	-	-	-	3	4
Fea. 4	1	-	-	-	-	-	16	20
Fea. 5	-	-	-	-	-	-	13	21
Fea. 6	6	-	-	-	-	-	55	73
Fea. 7	32	6	-	-	2	1	89	150
Fea. 8	93	6	-	8	-	-	282	469
Fea. 10	45	4	-	-	1	-	145	244
Fea. 11	24	-	-	1	-	-	50	86
Fea. 13	19	-	-	-	-	-	64	103
Fea. 16	1	-	-	-	-	-	7	12
Fea. 17	8	-	-	-	-	-	21	35
Fea. 20 (Bu. 1)	5	-	-	-	-	-	25	38
Fea. 21	5	-	-	-	-	-	5	10
Fea. 24	9	2	-	1	-	-	40	60
Fea. 25	84	-	-	1	-	-	115	211
Fea. 30	65	3	3	-	-	-	258	357
Fea. 31	20	6	-	-	-	-	72	125
Fea. 33	20	1	-	-	1	-	116	164
Fea. 34	36	2	-	-	-	-	72	132
Fea. 35	52	2	1	-	2	-	475	610
Fea. 38	318	31	-	-	17	-	433	914
Fea. 39	3	9	-	-	-	-	20	38
Fea. 40	1	3	-	-	-	-	8	13
Fea. 43	3	-	-	-	-	-	1	4
Fea. 46	35	2	-	-	5	-	392	450
Str. 1	5	-	-	-	1	-	94	120
Sub-total	896	78	4	11	29	1	2924	4539
Indeterminate Phase								
Plowzone	156	11	-	-	8	-	17046	17517
Midden	154	11	1	-	2	-	4707	5275
Postholes	8	2	-	-	1	-	60	72
Misc.	10	-	-	-	-	-	205	224
Sub-total	328	24	1	0	11	0	22018	23088
Total	1224	102	5	11	40	1	25088	27863

artifact found. The historic association of the assemblage rested largely with the observation (and accompanying plat) made by William Byrd II in 1733 that the Sara once resided in the site's vicinity (Wright 1966:398, 413). The Dan River series, as originally defined, included the following surface treatments: net impressed, plain, corncob impressed, cord marked, brushed, and complicated stamped. Other potsherds with plain, burnished, simple stamped, and complicated stamped surfaces also were found in small quantities but were regarded as trade imports due to paste differences.

Although strongly suspected by earlier researchers (see Wilson 1983:238–240), the 1988 excavations demonstrated for the first time that the Dan River series from Lower Saratown was not associated with a

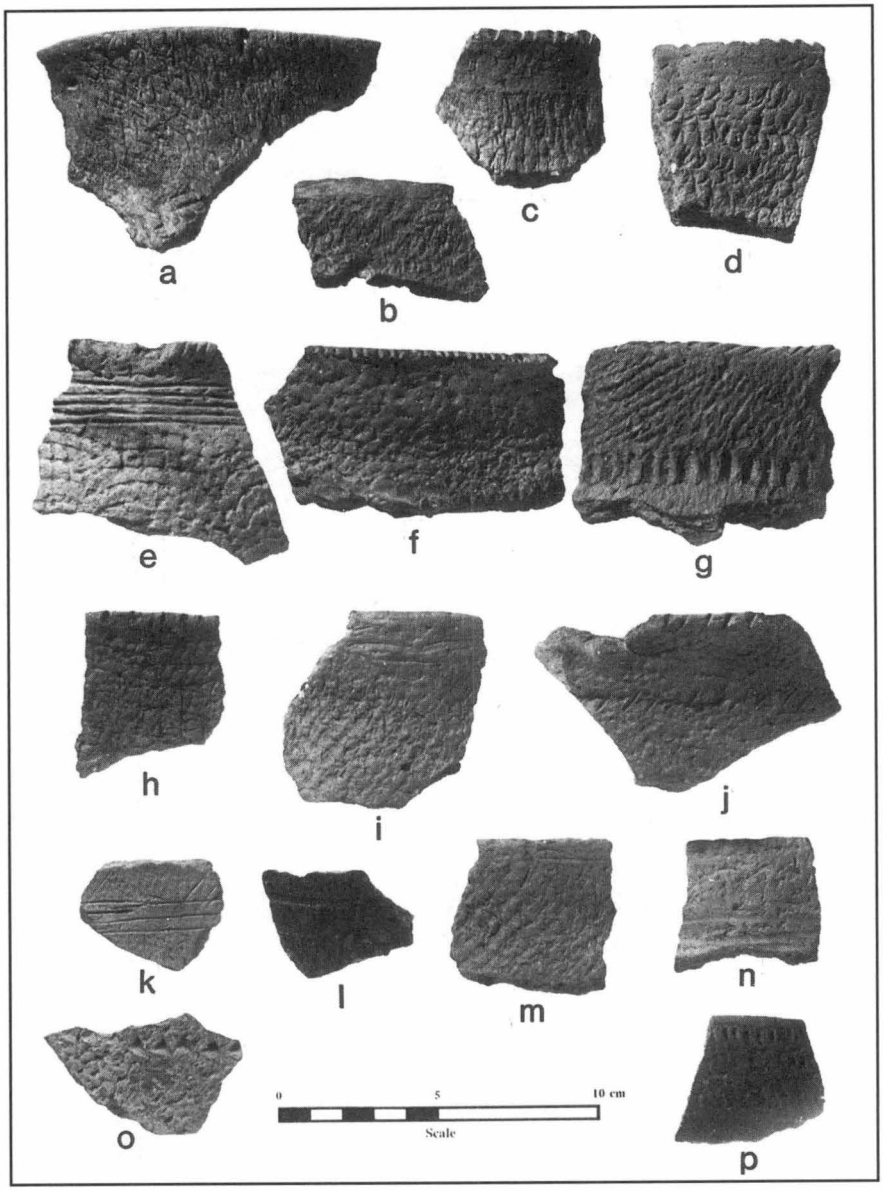

Figure 9.40. Dan River series pottery from Lower Saratown.

seventeenth-century Sara occupation but instead dated to the preceding Late Prehistoric period. In addition, it now appears that some of the pottery originally subsumed within this series, particularly some of the plain, brushed, and complicated stamped sherds, should be classified into the Oldtown series. The most significant implication of this re-evaluation is that net impressing can no longer be regarded as a dominant characteristic of historic Sara or even historic Siouan pottery in piedmont North Carolina and southern Virginia.

Eleven hundred and seventy-one sherds were classified as *Dan River Net Impressed* (Coe and Lewis 1952). These sherds comprised 42.2% of all identified specimens and were recovered from the plowzone, midden, all but four pottery-producing features, and miscellaneous contexts. Because an appreciable Dan River phase midden underlay Lower Saratown, most ceramic assemblages from historic Sara features that intruded it were "contaminated" with Dan River series pottery, particularly net impressed sherds.

Dan River Net Impressed sherds from the 1988 excavations at Lower Saratown, as expected, closely conformed to the published type description (Coe and Lewis 1952). Most exterior sherd surfaces exhibited coarse-to-medium, knotted-net impressions. Simple loop net impressions were observed on only nine sherds. Approximately two-thirds of all net impressed sherds had scraped interiors; the rest were smoothed. The amount and type of temper varied; however, most sherds were tempered with moderate amounts of either coarse-to-fine sand (67.2%) or medium crushed quartz (22.2%). Other temper types included: fine crushed

quartz (5.3%), mixed crushed quartz and feldspar (2.5%), coarse quartz (2.1%), crushed feldspar (0.5%), and fine sand (0.2%).

Over 85% of all *Dan River Net Impressed* sherds exceeded six centimeters in thickness, and all appear to be from large storage or cooking jars. All of the 55 rimsherds large enough to determine rim profile were everted; over two-thirds had a rounded lip. One hundred and thirty-one sherds, including all but seven rimsherds, were decorated. Twelve of these sherds also exhibited secondary decorations. Although vessel decoration was quite varied with respect to both type and location, most decorations involved lip and neck modifications. Methods used to decorate vessels included notching, incising, punctation, finger pinching or impressing, and smoothing or scraping. All but eight rimsherds were notched along the lip (n=18) or lip/rim edge (n=29) (Figure 9.40*e–h,j,n*). Another rimsherd was decorated with stick punctations along the lip. Thirty-nine sherds were from vessels with one or more brushed or incised bands around the vessel neck (Figure 9.40*e,k,n,p*). Eight more sherds exhibited brushing along the body exterior. Vessel necks also were commonly decorated with a band of finger pinches or impressions (n=19), stick punctations (n=16), and short perpendicular-to-oblique incised lines (n=7) (Figure 9.40*f–g,j,o*). Other types of decoration included rectilinear (n=7) and curvilinear (n=1) incised designs along the vessel shoulder and body (Figure 9.40*k,l*), miscellaneous punctations along the rim (n=1), and smoothing of the rim and neck area (n=8) (Figure 9.40*i*).

Dan River Cord Marked

Twenty-nine potsherds were classified as *Dan River Cord Marked* (Coe and Lewis 1952). Twenty of these came from midden or plowzone deposits; the remainder occurred as small, isolated sherds in middle Saratown phase features. Sherd exteriors were impressed with a cord-wrapped paddle. Over 70% of the sherds had Z-twisted cord impressions; the remainder had S-twisted impressions. Three-fourth of the sherds had smoothed interiors. Two sherds were tempered with medium crushed quartz while the remainder were tempered with coarse-to-fine sand. Although no rimsherds were found, four neck and body sherds were decorated. Three of these sherds displayed a band of short, perpendicular, incised lines along the neck; the other sherd had a brushed band along the neck. These types of decoration are similar to those observed on *Dan River Net Impressed* sherds.

Dan River Corncob Impressed (Figures 9.40 and 9.41)

One hundred and four potsherds were classified as *Dan River Corncob Impressed* (Coe and Lewis 1952). These sherds were recovered from the plowzone, midden, and numerous Dan River and middle Saratown phase features. Almost 85% were tempered with coarse-to-fine sand; the remainder were tempered with crushed quartz (n=9), crushed feldspar (n=4), and mixed quartz and feldspar (n=1). All but eight sherds were between 4 mm and 8 mm thick. The 33 rimsherds in the sample represent both small and large jars with everted rims and rounded lips. Two fitting rimsherds found in Feature 38 were from a large jar approximately 26 cm in diameter (Figure 9.40*a*).

Twenty of these sherds were decorated and eight possessed multiple decorations. The most common type of decoration, seen on 16 rimsherds, was notching of the lip (Figures 9.40*c–d* and 9.41*b*). Other kinds of decoration included smoothing of the rim (n=8) (Figures 9.40*b,d* and 9.41*a–b*), smoothed parallel bands around the neck (n=2) (Figure 9.40*c*), incised curvilinear lines around the neck (n=1), and a band of circular reed punctations around the neck (n=1). Finally, two sherds exhibited drill holes along the neck and rim (Figure 9.40*a*).

Although most of the *Dan River Corncob Impressed* sherds from Lower Saratown are thought to be associated with the Dan River component, several almost certainly date to the subsequent middle Saratown phase.

Dan River Plain

Eighty-three sherds were classified as *Dan River Plain* (Coe and Lewis 1952), based upon paste similarities with other Dan River series sherds. These sherds occurred in all Dan River phase features except Feature 14 and in small quantities within several middle Saratown phase features; however, almost two-thirds were found in the plowzone or midden. Most (88%) of these sherds had roughly smoothed exterior surfaces and almost 80% had scraped interiors. Temper types represented by the sample included coarse-to-fine sand (57.1%) medium crushed quartz (32.5%), and other crushed quartz (10.4%). Most of these sherds appear to be from large storage or cooking jars with relatively thick walls.

In their original statement of the Dan River series, Coe and Lewis (1952) reported that *Dan River Plain* pottery made up 22.7% of all Dan River sherds analyzed from Lower Saratown. In the present study, only about six percent of the Dan River pottery had plain surfaces. The explanation for this apparent discrepancy is that most plain potsherds from the 1988 excavations were classified into the Oldtown series, based on Wilson's (1983) analysis of protohistoric and historic Sara pottery from the Upper Saratown site complex. A cursory reexamination of the plain pottery from the 1938 excavations at Lower Saratown strongly suggests that many of those sherds are probably *Oldtown Plain* specimens as well.

New River Knot Roughened and Net Impressed

One heavily weathered body sherd, recovered from

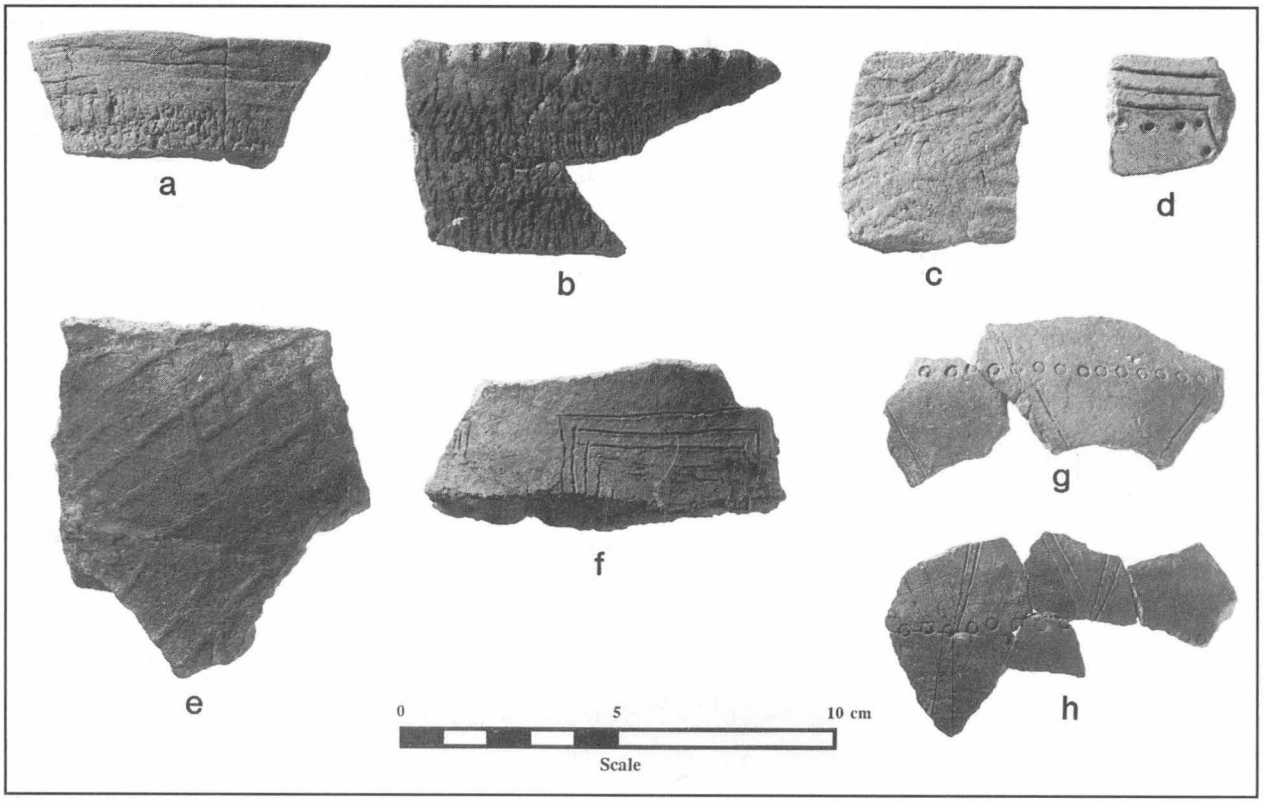

Figure 9.41. Miscellaneous Oldtown series potsherds from Lower Saratown.

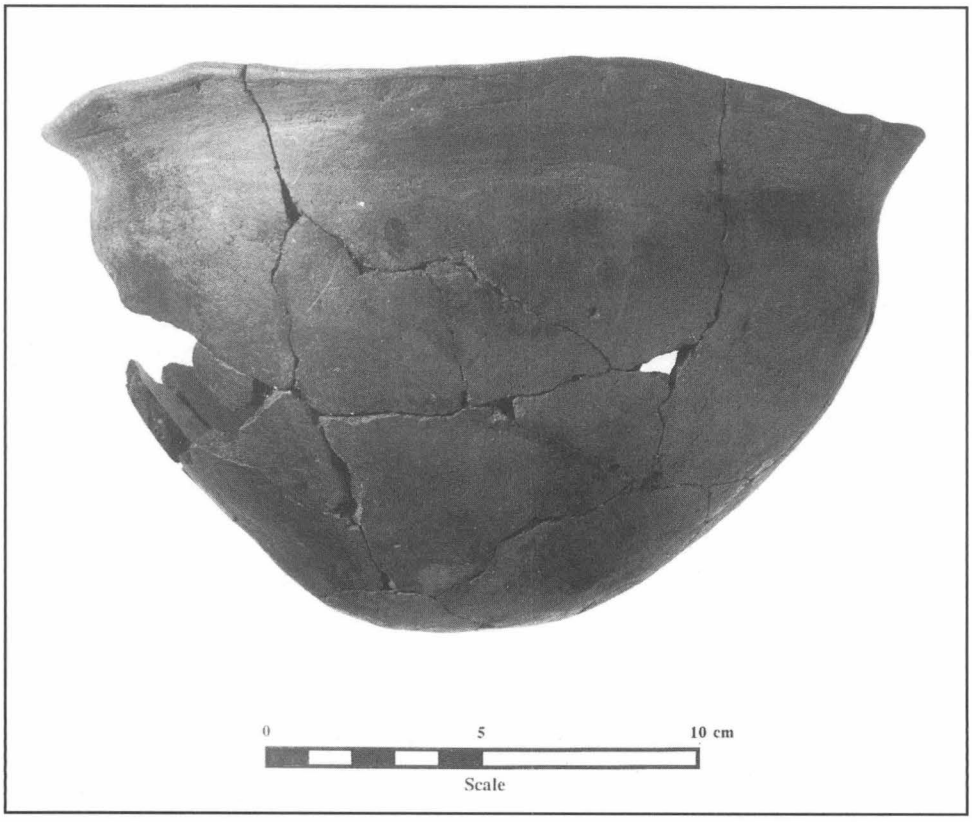

Figure 9.42. *Oldtown Plain* bowl from Feature 13.

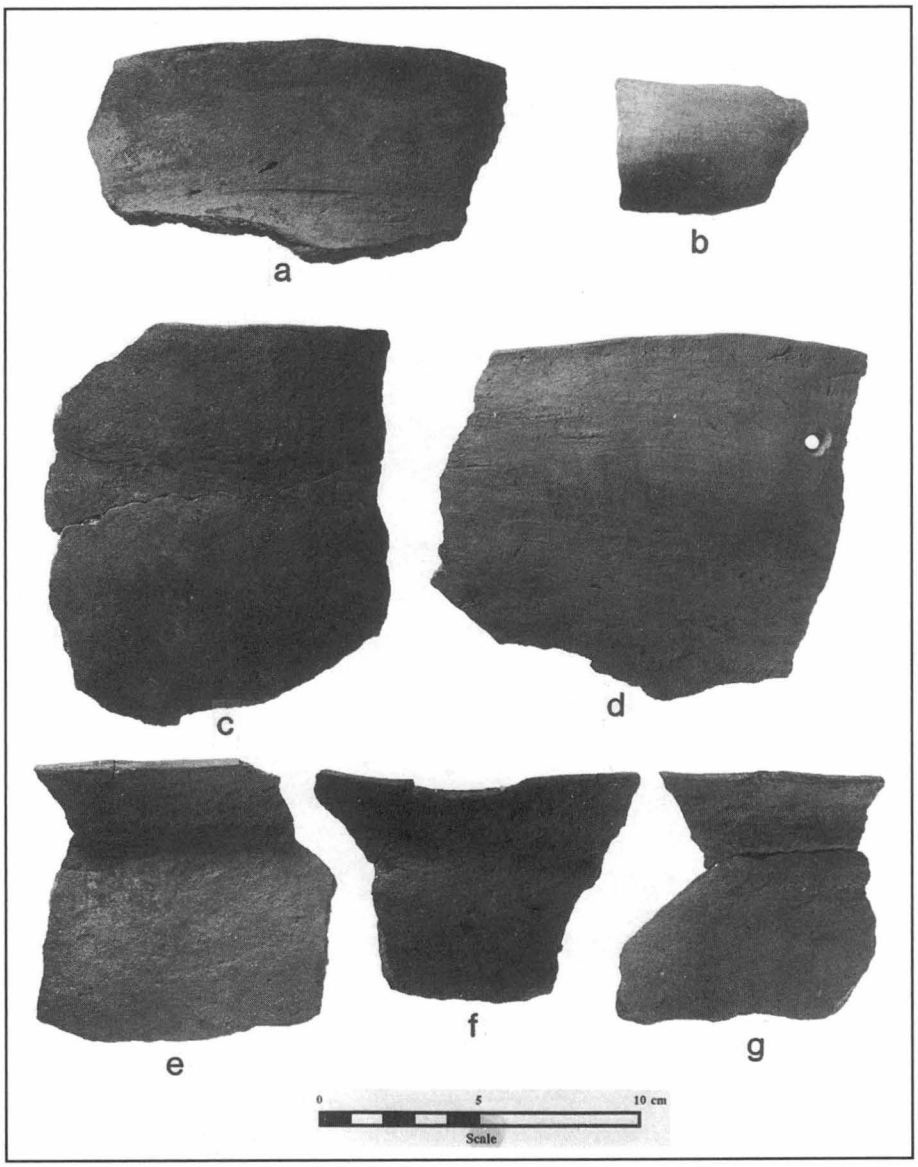

Figure 9.43. *Oldtown Plain* rimsherds from Lower Saratown.

the plowzone, was classified as *New River Knot Roughened and Net Impressed* (Evans 1955; Holland 1970). This sherd contained crushed shell temper and possessed faint net impressions on the outer surface. This type is more common within the New River drainage to the northwest where it is occurs within a late prehistoric context. This sherd probably is associated with the Dan River component at Lower Saratown.

New River Cordmarked

One shell-tempered body sherd with Z-twisted cord impressions on the outer surface was classified as *New River Cordmarked* (Evans 1955; Holland 1970). As with *New River Knot Roughened and Net Impressed*, this is a late prehistoric pottery type found in the New River valley of southwest Virginia and is probably associated with the Dan River occupation.

Oldtown Plain (Figures 9.41 to 9.45)

Twelve hundred and twenty-four sherds, including 120 sherds from 13 separate vessels, were classified as *Oldtown Plain* (Wilson 1983:615–618). This type is associated with the Sara occupation of the Dan River drainage during the late fifteenth (?) through early eighteenth centuries and was the predominant pottery type recovered from middle Saratown phase features at Lower Saratown. In fact, only one such feature (Feature 5), a hearth, did not contain *Oldtown Plain* sherds. Of the 13 reconstructed vessel sections, five were from features located inside Structures 1 and 2, and six were from large, basin-like features flanking the palisade. The other two vessels were from middle Saratown phase features situated just outside Structures 1 and 2.

Many of these sherds have incompletely smoothed

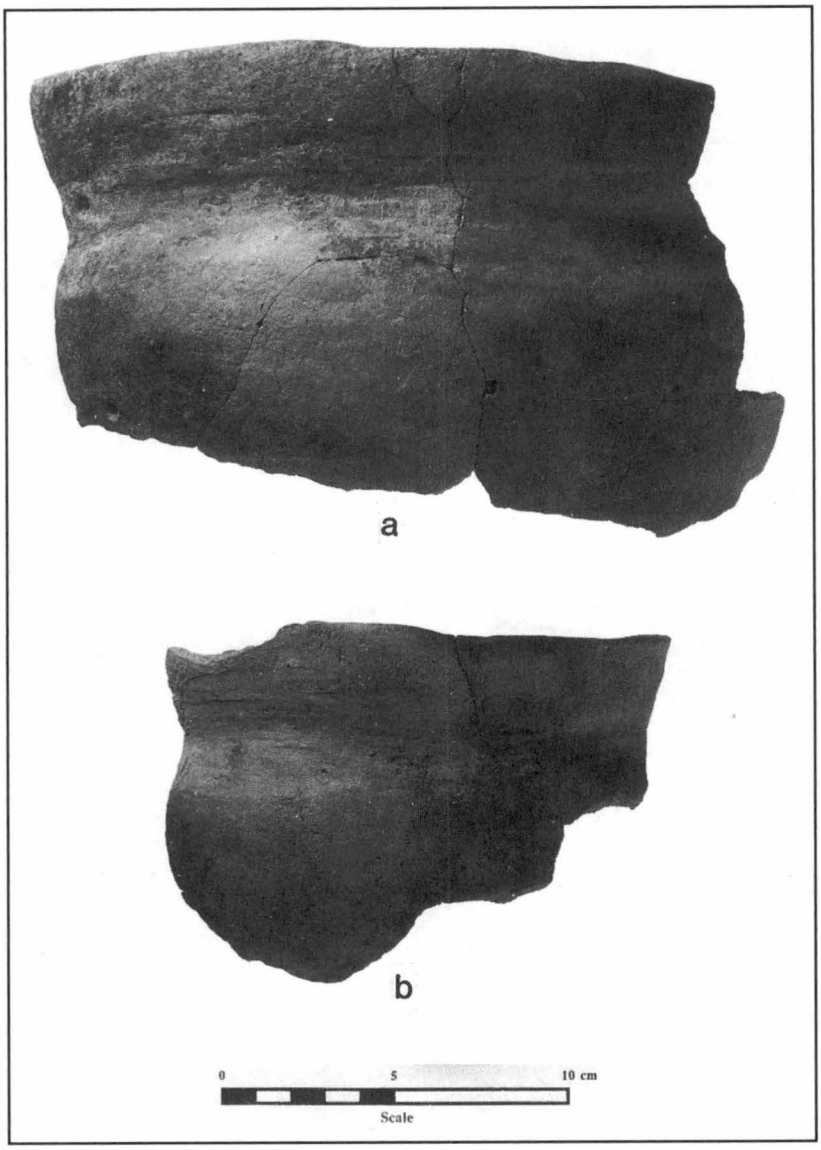

Figure 9.44. Reconstructed *Oldtown Plain* vessels.

exterior surfaces and often exhibit tool or paddle marks. All have smoothed interiors. Although various temper types are represented, over 85% contained fine-to-very fine sand. Other temper types, in descending order of frequency, were fine crushed feldspar, medium-to-fine crushed quartz, and mixed quartz and feldspar.

Oldtown Plain sherds were substantially thinner than Dan River series sherds, with almost 60% being four-to-six millimeters thick. Of the 162 rimsherds found, 113 (69.8%) are from jars or bowls that have either an everted or everted and recurved rim, five (3.1%) are from bowls with inverted rims, one (0.6%) is from a carinated bowl, and 43 (26.5%) could not be classified. Approximately 80% had rounded lips; the remainder were flattened. Of the 13 reconstructible vessel sections in the sample, 10 are from jars with everted (and often recurved) rims and sub-conoidal bases. One of these, from Feature 8, was from a medium-sized vessel approximately 18 cm in diameter at the rim (Figure 9.44*b*). The other sections, from Features 6, 8, 10, 11, 30, 34, 35, and 38, were from large storage or cooking jars that ranged from 28 cm to 36 cm in rim diameter (Figures 9.43*a,c,e–g* and 9.44*a*). Several of these had soot deposits on the exterior as well as interior surfaces above the shoulder.

The remaining three vessel sections were from bowls. One of these was a crushed bowl, about two-thirds complete, from Feature 13 (Figure 9.42). This undecorated vessel has a slightly everted rim, a sub-conoidal profile, and measures 23 cm in diameter at the rim and 12 cm in height. Another bowl, represented by one large rimsherd, is from a large (about 32 cm in rim diameter), shallow, undecorated vessel with a

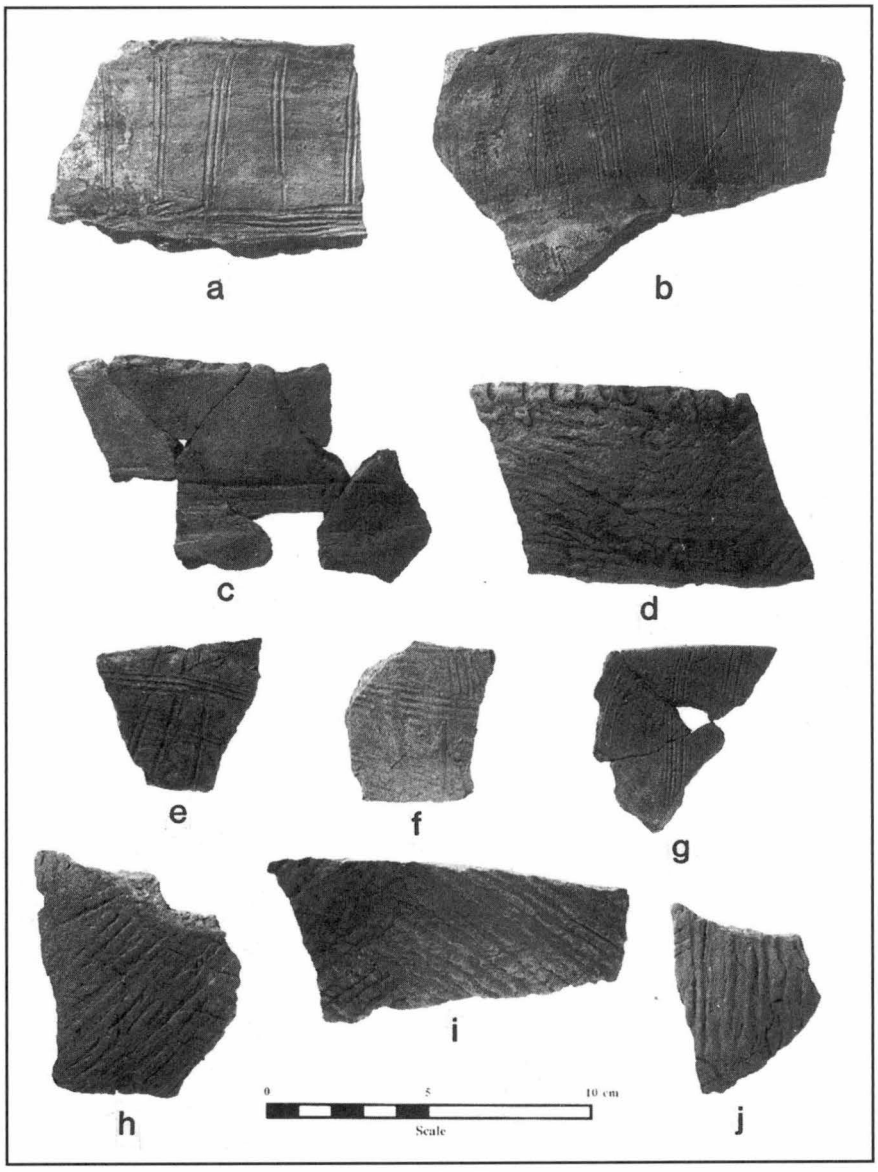

Figure 9.45. *Oldtown Simple Stamped* and decorated *Oldtown Plain* potsherds from Lower Saratown.

slightly inverted rim profile (Figure 9.43*d*). A drill hole along one edge suggests that this vessel had been mended (see below). This sherd was recovered from Feature 38. Finally, several sherds from a small, crushed, carinated (or cazuela) bowl also were recovered from Feature 38 (Figure 9.41*g–h*). This bowl measures approximately 16 cm at the shoulder and was decorated by incising and punctation (see below).

One hundred and ninety-five *Oldtown Plain* sherds were decorated or modified in some manner, and 19 of these exhibited more than one type of decoration. Predominant methods of decoration consisted of brushing, incising, notching, and punctation. The most common decoration consisted of vertical, brushed bands extending from the vessel rim to below the shoulder (Figure 9.45*a–b,e–g*). On most examples, these finely brushed bands were five to ten millimeters wide and spaced from 15-to-25 millimeters apart. This decoration type occurred only on sherds from medium-sized or large jars.

Forty-five potsherds were incised; however, 40 of these were from two vessels. Thirty-three sherds, found in Feature 38, were from a single, small carinated bowl that had been decorated with finely incised, double-banded triangles extending above and below a punctated band along the vessel shoulder (Figure 9.41*g–h*). The other seven sherds, found in Feature 8, were from a large jar that had been decorated below the neck with rectangular arches (approximately 50 mm wide by 30 mm high and spaced about 35 mm apart) formed by four-to-five concentric, incised lines (Figure 9.41*f*). Sherds with curvilinear incised designs along

the rim (n=1) and a band of multiple incised lines around the neck (n=4) also were recovered.

Thirty-one sherds were decorated with punctations. Seventeen of these were from the small carinated bowl discussed above. This type of decoration almost always was applied using a small reed. Eight rimsherds displayed reed punctations along the flattened lip (Figure 9.45*a*) whereas the remaining six sherds had punctated bands along the rim or neck (Figure 9.41*d*).

Notching, the final predominant decoration type, was limited to the vessel rim and was observed on 36 rimsherds (Figure 9.45*c*). V-shaped notches, applied perpendicular to the rim axis, were most common and occurred along the lip (n=10), lip/rim (n=7), and rim (n=1) edges. Finely incised notches, applied oblique to the rim axis, were observed both along the lip (n=13) and rim (n=1) edges. U-shaped notches, probably applied with a small stick, were observed on four rimsherds.

Eleven other sherds exhibited forms of vessel decoration or modification not discussed above. Eight of these were rim, neck, or body sherds with one or more holes that had been drilled adjacent to a vessel crack to facilitate mending. Evidence for "stitching together" cracked pots can be found in virtually all seventeenth century ceramic assemblages from piedmont North Carolina. The remaining sherds include a rimsherd with a peak or rim castellation, a loop handle fragment, and a body sherd with ground edges.

Oldtown Brushed

One hundred and two potsherds from Lower Saratown were classified as *Oldtown Brushed* (Wilson 1983:615–618). These sherds were recovered mostly from middle Saratown phase features and exhibited exterior surfaces which had been scraped with either a stiff twig brush or some other type of irregular-edged tool. In several instances, it was difficult to distinguish between *Oldtown Brushed* and poorly smoothed *Oldtown Plain* sherds. Although most sherd interiors were smoothed, six were scraped, two were burnished, and one had been painted with a red pigment. Fine sand was the predominant temper type (n=87), though some sherds were tempered with fine crushed feldspar (n=7) and mixed crushed quartz and feldspar (n=8). A majority of sherds (n=70) were from vessels with relatively thin (less than 6 mm thick) walls. The five rimsherds found are all from jars with everted rims. Three of these sherds had notched lips.

Oldtown Burnished

Five burnished sherds, classified as *Oldtown Burnished* (Wilson 1983:615–618), were recovered during the 1988 excavations at Lower Saratown. The exterior surfaces of these sherds appeared to have been rubbed with a hard, blunt instrument, producing a compact and lustrous surface. *Oldtown Burnished* sherds were recovered from middle Saratown phase Features 30 (n=3) and 35 (n=1), and from the midden (n=1). All were tempered with very fine sand and had smoothed interiors. The three sherds from Feature 30, including a rimsherd, are from a small bowl with an inverted rim and a plain, rounded lip. *Oldtown Burnished* pottery was much more common at Early Upper Saratown and Upper Saratown where it comprised 21.8% and 18.6% of the samples, respectively (Wilson 1983:391, 430).

Oldtown Simple Stamped (Figure 9.45*d,h–j*)

Eleven sherds from middle Saratown phase contexts, including eight from Feature 8 and single examples from Features 11, 24, and 25, were classified as *Oldtown Simple Stamped* (Wilson 1983:615–618). All but one of these sherds exhibit bold, deeply applied paddle impressions, and all have uniformly smoothed interiors. Fine sand was the only temper type recognized in the sample. The eight sherds from Feature 8, including a large rimsherd (Figure 9.45*d*), appear to be from a single, large jar with an everted, recurvate rim and U-shaped stick notches along the rounded lip/rim edge. This rim form also was common among *Oldtown Plain* pottery from the site.

Oldtown Check Stamped (Figure 9.41*e*)

Forty potsherds were classified as *Oldtown Check Stamped* (Wilson 1983:615–618). With the exception of 11 sherds from plowzone, midden, and unidentified postholes, all were recovered from middle Saratown features and are attributed to that phase. All exhibit exterior surfaces that were lightly stamped and subsequently smoothed, and most have uniformly smoothed interiors. The paddles used in manufacturing this pottery typically had narrow, widely-spaced grooves that produced relatively large checks. One sherd was tempered with fine crushed quartz; the remainder contained fine sand. All but two of the sherds were from 4 mm to 8 mm thick. Of the six rimsherds found, all are from medium-sized or large jars with everted rim profiles. Only one rimsherd did not have a rounded lip and none were decorated.

Oldtown Complicated Stamped (Figure 9.41*c*)

One curvilinear complicated body stamped sherd was recovered from Feature 7 and has been classified as *Oldtown Complicated Stamped* (Wilson 1983:615–618). This sherd has a paddle stamp design composed of concentric circles and is similar to pottery found at both Early Upper Saratown and Upper Saratown (Wilson 1983:413, 453). It has a smoothed interior, is tempered with fine sand, and is 6 mm thick.

Indeterminate Sherds

Ninety percent (n=25,088) of the potsherds from the 1988 excavations at Lower Saratown, including 22,018 from plowzone, midden, and other miscella-

neous contexts, were not classified because of either eroded surfaces or small size.

Summary

Lower Saratown has long been important in piedmont North Carolina archaeology as the type station for the Dan River ceramic series. Although this series was originally thought to be associated with the Sara tribe of the seventeenth century (Coe and Lewis 1952), more recent investigations at other seventeenth-century sites along the Dan River, most notably at Upper Saratown, have caused several researchers to question this interpretation (Wilson 1983:240; Davis 1988:57). Given the results of the present analysis, it can now be stated unequivocally that the Dan River series, as originally defined, is attributable largely to the late prehistoric occupation of the Dan River drainage. This conclusion is based upon the careful analysis of pottery from the site by excavated contexts and three separate lines of evidence.

First, distinct typological differences can be shown to exist between sherds classified into the Dan River series and those classified into the Oldtown series. These involve differences in paste, exterior and interior surface treatments, vessel form, and methods of vessel decoration.

Second, the Oldtown series pottery is very similar in most respects to pottery from Upper Saratown which occurs in clear association with seventeenth-century European trade artifacts. At Lower Saratown, features containing Oldtown pottery, including some with large reconstructible vessel sections, also consistently contained European glass trade beads of types similar to those found at Upper Saratown. Consequently, the Oldtown pottery from Lower Saratown can be clearly placed within the Contact period.

Third, although Dan River sherds also were found in smaller quantities in most middle Saratown phase features (and are regarded as contamination from the earlier Dan River midden), a few features contained only Dan River pottery and lacked trade artifacts. One of these features, Feature 41, contained a reconstructible *Dan River Net Impressed* vessel section as well as sufficient amounts of wood charcoal for obtaining a radiocarbon determination. This charcoal sample yielded an uncalibrated date of A.D. 1200 ± 60. Other radiocarbon samples from features containing only Dan River pottery at the William Kluttz site (Feature 15) and Upper Saratown (Feature 18) also yielded uncalibrated dates of 780 ± 70 years: A.D. 1170 (Beta-36091) and 590 ± 60 years: A.D. 1360 (Beta-36089), respectively. These data strongly indicate a late prehistoric age for the Dan River series. In fact, none of the radiocarbon dates that exist for the Dan River series are later than A.D. 1400.

These results indicate that while some Dan River types such as *Dan River Net Impressed* and *Dan River Corncob Impressed* probably persisted into the historic period as minority types, most pottery of the Dan River series should be placed solely within a late prehistoric context. Given this conclusion, the sample of pottery from features, plowzone, and midden at Lower Saratown is best regarded as largely the product of two separate occupations—one in the thirteenth century during the Dan River phase and the other in the seventeenth century during the middle Saratown phase. The fact that pottery from both occupations co-occurs in most post-Dan River phase contexts is wholly expected given the spatially overlapping nature of these two occupations.

Lithic Artifacts

Archaeological testing at Lower Saratown produced a sample of 2,853 lithic artifacts (Table 9.3). Almost half of these artifacts were recovered from pit features associated with the Dan River phase and middle Saratown phase components; the remainder came from the plowzone and undisturbed midden deposits. The sample consists of debitage and exhausted cores (n=2,274), chipped stone tools and tool fragments (n=520), ground stone tools and tool fragments (n=22), and large cobble tools (n=37). The small number of recovered Archaic projectile points and lack of earlier Woodland period projectile point types suggest that most of these artifacts are associated with Late Prehistoric and Contact period occupations. Whereas most of the pit features containing lithic artifacts can be attributed to the historic middle Saratown occupation, those artifacts recovered from the sub-plowzone midden are believed to be associated largely with the preceding Dan River occupation.

Because of the relatively large number of lithic artifacts that were found, no attempt was made during analysis to classify metavolcanic materials (except rhyolites) by specific rock type. Major artifact categories are described below.

Debitage

Decortication Flakes. Sample Size: 469. Form: This category includes both primary (n=439) and secondary (n=30) decortication flakes. Decortication flakes are flakes that exhibit a striking platform and bulb of percussion on the ventral surface, and have cortex (primary - >75% cortex; secondary - <75% cortex) remaining on the dorsal surface. Material: Vein quartz–349, Rhyolite–81, Quartzite–36, Other metavolcanic rock–3. Comment: Decortication flakes are the by-products of core reduction during the early stages of stone tool manufacture. The raw material distribution indicates a heavy reliance upon vein quartz.

Table 9.3. Distribution of lithic artifacts from the Lower Saratown site.

			Context													
Category	PZ	Midden	Fea 1	Fea 3	Fea 4	Fea 5	Fea 6	Fea 7	Fea 8	Fea 10	Fea 11	Fea 13	Fea 14	Fea 17	Fea 18	Fea.20 (Bu.1)
Debitage																
Decortication Flakes	231	68	1	-	-	-	2	1	6	15	24	2	1	1	1	2
Interior/Bif. Thin. Flakes	497	159	13	1	2	1	25	41	70	28	47	21	2	11	6	4
Shatter Fragments	-	2	-	-	-	-	-	-	2	-	-	1	-	-	-	-
Cores	50	12	-	-	-	-	2	-	1	2	-	-	-	-	-	-
Raw Material	2	5	1	-	-	-	-	-	-	-	-	-	-	-	-	-
Projectile Points																
Hardaway-Dalton	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Palmer Corner-Notched	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Kirk Stemmed	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stanly Stemmed	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Morrow Mtn. II Stemmed	1	-	-	-	-	-	-	-	1	-	-	-	-	-	-	-
Small Stemmed Points	1	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Small Triangular Points	47	12	2	-	-	-	5	5	10	3	4	1	-	-	-	-
Unidentified Points	11	4	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Chipped Stone Artifacts																
Preforms	1	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bifaces	22	8	-	-	-	-	-	-	1	-	-	-	-	-	-	-
Drills	9	1	-	-	-	-	-	-	1	1	1	-	-	-	-	-
Chipped Disks	-	-	-	-	-	-	-	-	1	1	-	-	-	-	-	-
Chipped Hoes	2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pièce Esquillée	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Side Scrapers	-	1	-	-	-	-	1	-	-	-	-	-	-	-	-	-
End Scrapers	3	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Spokeshaves	2	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-
Perforators	4	4	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Gravers	7	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Denticulates	2	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Utilized/Retouched Flakes	156	39	-	-	-	-	1	-	7	2	1	1	-	-	-	3
Ground Stone Artifacts																
Ground Celts	1	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Soapstone Sherds	1	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ground Stone Fragments	10	3	-	-	-	-	-	-	-	-	-	1	-	-	-	-
Large Cobble Tools																
Cobble Choppers	2	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hammerstones/Manos	10	5	-	-	-	-	3	3	3	1	-	-	-	-	-	-
Milling Stones	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total	1074	332	17	1	2	1	39	50	103	54	77	27	3	12	7	9

Interior/Bifacial Thinning Flakes. Sample Size: 1,691. Form: Lithic artifacts classified as interior flakes are flat flakes without a steep platform angle that exhibit flake removal scars on the dorsal surface and lack cortex. Bifacial thinning flakes are similar but have a steep platform angle that indicates detachment from a biface. No attempt was made during the analysis to differentiate between these two flake types. Material: Vein quartz–928, Rhyolite–653, Other metavolcanic rock–66, Quartzite–23, Crystal quartz–17, Chert–4. Comment: These flakes are by-products of intermediate and final stages of core reduction and bifacial tool production. The much higher frequency of rhyolite and other metavolcanic flakes, when compared with decortication flakes, suggests a different procurement strategy for metavolcanic and quartz raw materials. It is likely that vein quartz was obtained locally from the river bed and surrounding hills while metavolcanic rock probably was transported a greater distance in the form of flake blanks or quarry blades.

Table 9.3 Continued.

Category	Context															
	Fea 24	Fea 25	Fea 30	Fea 31	Fea 32	Fea 33	Fea 34	Fea 35	Fea 38	Fea 39	Fea 40	Fea 41	Fea 46	Str 1	Surf./ Misc.	Total
Debitage																
Decortication Flakes	-	4	36	2	-	6	1	20	23	2	-	2	8	4	6	469
Interior/Bif. Thin. Flakes	14	29	154	31	-	56	29	161	127	9	3	8	88	47	7	1691
Shatter Fragments	-	4	3	2	-	-	1	3	-	-	-	-	-	-	-	18
Cores	1	-	3	2	-	2	1	3	8	-	-	-	-	1	-	88
Raw Material	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	8
Projectile Points																
Hardaway-Dalton	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Palmer Corner-Notched	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Kirk Stemmed	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Stanly Stemmed	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	1
Morrow Mtn. II Stemmed	-	-	1	-	1	-	-	1	-	-	-	-	-	-	-	5
Small Stemmed Points	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	3
Small Triangular Points	1	7	12	5	1	17	5	8	7	0	2	-	7	4	2	167
Unidentified Points	-	-	2	-	-	-	-	-	-	-	-	-	-	-	-	17
Other Chipped Stone Artifacts																
Preforms	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2
Bifaces	-	-	-	-	-	-	-	-	1	-	-	-	1	1	-	34
Drills	1	-	-	-	-	-	1	-	1	-	-	-	-	1	-	17
Chipped Disks	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	3
Chipped Hoes	-	-	-	-	-	-	-	1	-	-	-	-	-	-	-	3
Pièce Esquillée	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Side Scrapers	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2
End Scrapers	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4
Spokeshaves	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3
Perforators	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	9
Gravers	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7
Denticulates	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3
Utilized/Retouched Flakes	-	2	4	5	-	3	3	1	2	-	1	-	4	-	2	237
Ground Stone Artifacts																
Ground Celts	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2
Soapstone Sherds	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2
Ground Stone Fragments	-	-	-	-	-	-	-	-	3	-	-	-	-	-	-	17
Large Cobble Tools																
Cobble Choppers	-	-	-	1	-	1	-	-	-	-	-	-	-	-	-	5
Hammerstones/Manos	2	2	1	-	-	-	-	-	-	-	-	-	-	-	-	30
Milling Stones	-	-	2	-	-	-	-	-	-	-	-	-	-	-	-	2
Total	19	48	219	49	2	86	41	198	172	11	6	10	109	58	17	2853

Shatter Fragments. Sample Size: 18. Form: This category includes angular flakes that, based on formal characteristics, cannot be specifically classified. Material: Vein quartz–17, Crystal quartz–1. Comment: Shatter fragments are a general by-product of stone tool manufacture.

Cores. Sample Size: 88. Form: Cores are defined as amorphous chunks or nodules of utilizable lithic raw material from which two or more flakes have been removed. Material: Vein quartz–75, Rhyolite–6, Quartzite–3, Crystal quartz–3, Other metavolcanic rock–1. Comment: The very high ratio of vein quartz cores to metavolcanic cores supports the earlier suggestion, stated above, that vein quartz was a much more accessible raw material than rhyolite.

Raw Material. Sample Size: 8. Form: These specimens are utilizable rocks that were transported to the site but not physically altered. Material: Crystal quartz–5, Quartzite–1, Shale–1, Soapstone–1. Comment: None.

Projectile Points

Hardaway-Dalton Projectile Point. Sample Size: 1. Form: Coe (1964:64) describes the *Hardaway-Dalton* projectile point type as having a "broad, thin blade with deeply concave bases and shallow side-notches. Bases and side-notches were ground and edges were frequently serrated." This specimen, recovered from the plowzone, is heavily patinated and is broken at the tip and at the base. Material: Other metavolcanic rock–1. Comment: This projectile point type is associated with the late Paleo-Indian period in Piedmont North Carolina (before 8,000 B.C.) (Coe 1964; Ward 1983).

Palmer Corner-Notched Projectile Point. Sample Size: 1. Form: Coe (1964:67) describes the *Palmer Corner-Notched* projectile point type as having "a small corner-notched blade with a straight, ground base and pronounced serrations." Material: Rhyolite–1. Comment: This is an Early Archaic (ca. 8,000 B.C.) projectile point type and was recovered from the subplowzone midden.

Kirk Stemmed Projectile Point. Sample Size: 1. Form: This projectile point type is characterized by Coe (1964:70) as having "a long daggerlike blade with deep serrations and a broad stem." The base typically is straight or slightly rounded. This specimen, though heavily reworked, is unbroken. Material: Rhyolite–1. Comment: This type is associated with the Early Archaic period (ca. 6,000–7,000 B.C.) and was found in the plowzone.

Stanly Stemmed Projectile Point. Sample Size: 1. Form: This projectile point type is characterized by a broad, triangular blade and a small, squared stem with an indented base (Coe 1964:35). The recovered specimen has a reworked tip and a broken shoulder. Material: Rhyolite–1. Comment: This specimen was recovered from Feature 33 and is associated with the early Middle Archaic period (ca. 5,800–5,500 B.C.).

Morrow Mountain II Stemmed Projectile Points. Sample Size: 5. Form: The *Morrow Mountain II* type is defined by a long, narrow blade and a tapered stem (Coe 1964:37). All three specimens have broken tips. Material: Rhyolite–4, Vein quartz–1. Comment: These specimens were recovered from the plowzone and Features 8, 30, 32, and 35. This projectile point type has been radiocarbon-dated elsewhere to the Middle Archaic period (ca. 5,500–5,000 B.C.) (Chapman 1977, 1979).

Small Stemmed Projectile Points. Sample Size: 3. Form: Two of these specimens have a wide, triangular blade and a broad, straight base; the other has a long, narrow blade and a small squared stem. Material: Rhyolite–2, Chalcedony–1. Comment: These artifacts, recovered from the plowzone, midden, and Feature 31, are generally similar to Oliver's (1985) *Gypsy Stemmed* type and probably date to the Late Archaic or Early Woodland periods (ca. 2,000 B.C. to A.D. 1).

Small Triangular Projectile Points (Figure 9.46). Sample Size: 167. Form: All but one of these specimens conforms to the *Caraway Triangular* and *Clarksville Small Triangular* types (Coe 1964:49, 112); the remaining projectile point has corner notches and does not conform to an established type. Although the edge configuration of these projectile points is variable, most have straight lateral edges and either incurvate (n=31) or straight (n=39) bases. Some specimens had incurvate edges and either incurvate (n=7) or straight (n=4) bases, and two points had an incurvate base and excurvate lateral edges. Edge configuration could not be determined for 83 specimens. These points range from 13 mm to 38 mm (mean=21.7, sd=5.6, n=69) in length, 10 mm to 27 mm (mean=16.7, sd=3.1, n=117) in width, and 2 mm to 10 mm (mean=4.0, sd=1.3, n=146) in thickness. Material: Rhyolite–141, Quartz–16, Chert–4, Other metavolcanic rock–3, Crystal quartz–3. Comment: Small triangular projectile points were found in most excavated contexts. All of these specimens appear to be associated with either the Dan River or middle Saratown phase occupations.

Unidentified Projectile Points. Sample Size: 17. Form: This category includes projectile point fragments that could not be classified by type. Most are fragments of stemmed points. Material: Rhyolite–10, Vein quartz–4, Other metavolcanic rock–3. Comment: A majority of these specimens probably date to the Archaic period.

Other Chipped Stone Artifacts

Preforms. Sample Size: 2. Form: Both specimens are fragments of large bifaces that exhibit final stages of reduction and shaping, and lack any modification to facilitate hafting. Material: Rhyolite–1, Other metavolcanic rock–1. Comment: These artifacts represent unfinished projectile points and probably are associated with Archaic site occupations.

Bifaces. Sample Size: 34. Form: Bifaces are blanks that exhibit flake removal scars on both faces. Material: Rhyolite–17, Vein quartz–15, Other metavolcanic rock–2. Comment: All but three specimens are biface fragments. Four artifacts, including one large quartz biface, came from feature contexts (i.e., Features 8, 38, and 46, and Structure 1). The remainder were recovered from the plowzone and midden. While most of these artifacts probably represent early stages in the manufacture of projectile points or bifacial knives, some may have been used as bifacial cores.

Drills (Figure 9.47*a–h*). Sample Size: 17. Form: Drills are bifacially worked tools that possess a long, parallel-sided, rod-like projection. Three of these specimens are heavily patinated, notched or stemmed Archaic projectile points that apparently were reworked into drills by later Dan River phase or middle Saratown phase flintknappers. This conclusion is based on the

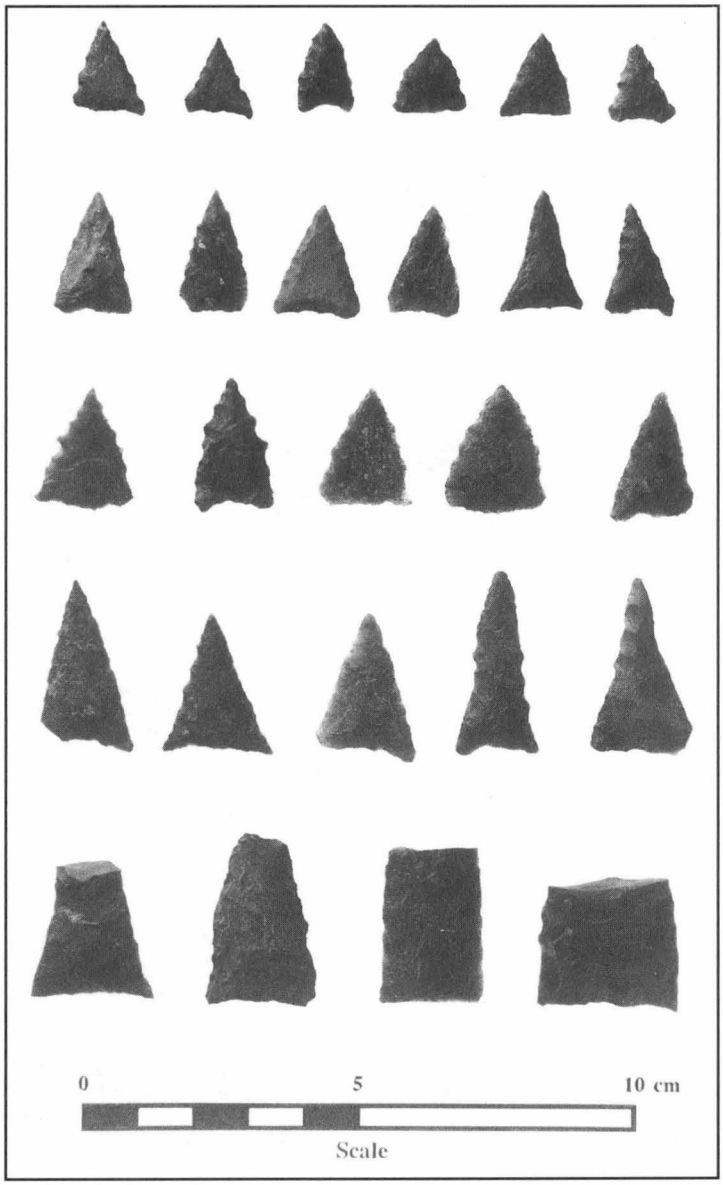

Figure 9.46. Chipped stone projectile points from Lower Saratown.

lack of patination on the reworked drill bit. A fourth specimen represents a small, reworked, triangular projectile point. The remaining drills are made on large, often patinated, flakes. Material: Rhyolite–15, Other metavolcanic rock–2. Comment: Most, if not all, of the drills found appear to be associated with the Dan River and middle Saratown phase occupations; however, the large number of specimens exhibiting evidence of patination on unmodified surfaces, and the presence of reworked Archaic points, suggest that the toolmakers may have intentionally sought lithic residues from earlier occupations as raw material. Drills, while mostly found in the plowzone and midden (n=10), also were recovered from Features 8, 10, 11, 24, 34, and 38, and Structure 1. All of these features are attributed to the middle Saratown occupation.

Chipped Disks (Figure 9.48*b*). Sample Size: 3. Form: All three specimens are tabular pieces of rock that have been chipped into a roughly circular form. The two sandstone disks are 5 cm to 6 cm in diameter and approximately 2 cm thick. The disk made of metavolcanic rock is slightly larger and much thinner, measuring 7 cm in diameter by 5 mm in thickness. Material: Sandstone–2, Other metavolcanic rock–1. Comment: Although the function of the two sandstone disks is uncertain, the disk made of metavolcanic rock exhibits extensive edge wear (i.e., polish) and may represent a discoidal cutting tool or scraper. Chipped disks were recovered from Features 8, 10, and 46, all of which are attributed to the middle Saratown phase occupation.

Chipped Hoes (Figure 9.48*a*). Sample Size: 3. Form: Chipped hoes are large, hafted tools, usually sub-triangular in shape, that have a bifacially chipped

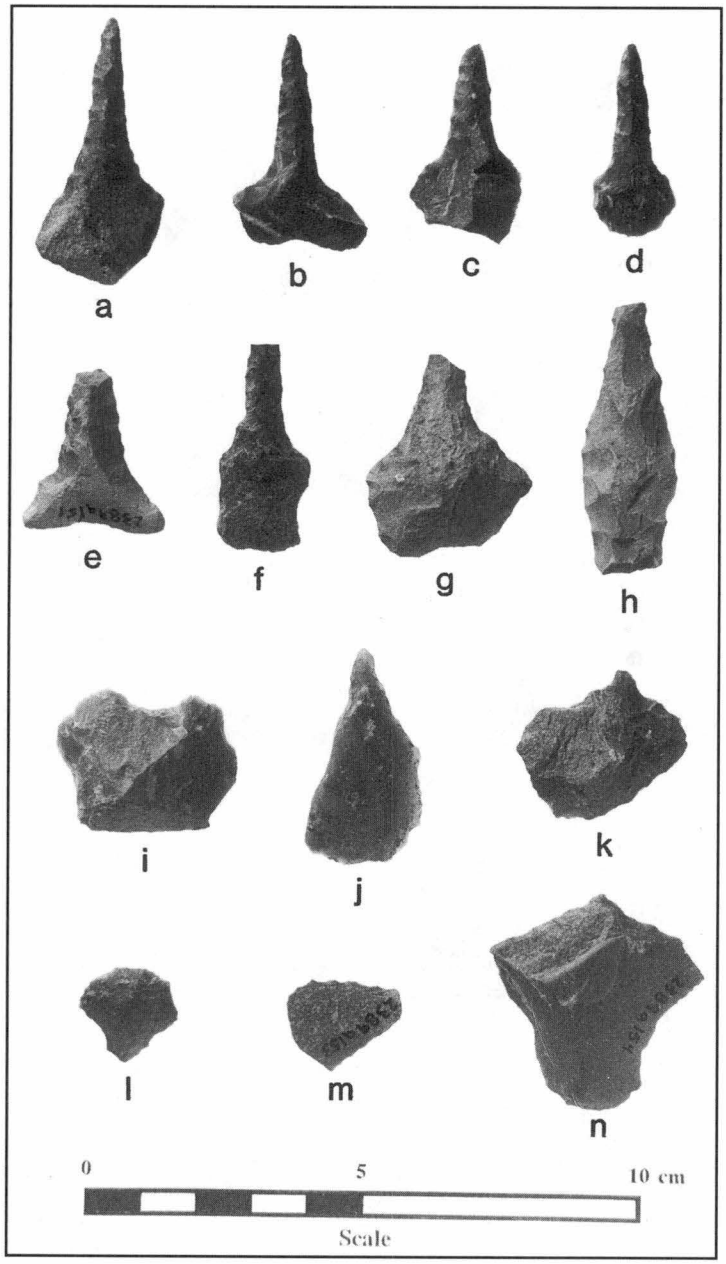

Figure 9.47. Miscellaneous chipped stone artifacts from Lower Saratown.

working edge transverse to the long axis. All three specimens are fragments of broken hoes. Material: Rhyolite–2, Granite–1. Comment: These tools probably served both as digging and cultivating implements. The specimen from Feature 35, a basal fragment that broke above the haft, exhibits extensive soil polish along the dorsal surface and lateral edges.

Pièce Esquillée. Sample Size: 1. Form: This specimen is a flake that exhibits sharp, straight, crushed working edges on opposing lateral edges, produced by a bipolar technique. Material: Rhyolite–1. Comment: Pièces esquillées are thought to represent slotting or wedging tools used in boneworking.

Side Scrapers. Sample Size: 2. Form: Both specimens are flakes that exhibit steep, regular retouch along the lateral margins. The chalcedony side scraper from Feature 6, made on a relatively large, blade-like flake, has a sharp, pointed end and also may have functioned as a perforator or graver. Material: Rhyolite–1, Chalcedony–1. Comment: Side scrapers are thought to represent hide-scraping or cutting tools.

End Scrapers (Figure 9.47*l*). Sample Size: 4. Form: All four specimens are small (17 mm to 25 mm long) interior flakes that possess a convex working edge, produced by steep, continuous retouch, along the distal end. Material: Rhyolite–2, Vein quartz–2.

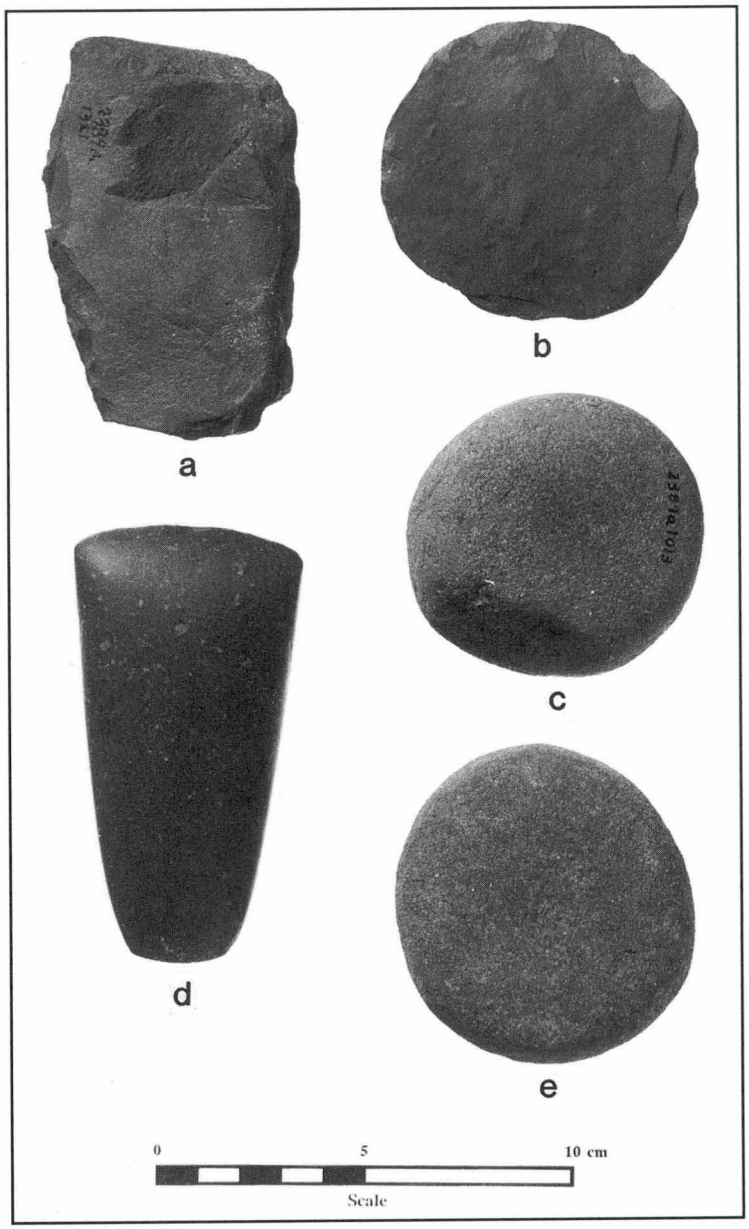

Figure 9.48. Ground stone and large chipped stone artifacts from Lower Saratown.

Comment: End scrapers are interpreted as hide-scraping tools. These artifacts were recovered from plowzone and midden excavations.

Spokeshaves (Figure 9.47*i*). Sample Size: 3. Form: All three specimens are thick, secondary decortication flakes that have a broad (11 mm to 12 mm), shallow (4 mm), steeply retouched notch along one edge. Material: Vein quartz–2, Rhyolite–1. Comment: Spokeshaves are interpreted as probable woodworking planes. One of the specimens was found in Feature 10; the other two came from the plowzone.

Perforators (Figure 9.47*j–k*). Sample Size: 9. Form: All of these specimens are interior flakes that have been unifacially or bifacially retouched along one edge to produce a pointed tool bit. One perforator exhibits extensive use-wear polish and several others have broken bits. Material: Rhyolite–8, Crystal quartz–1. Comment: Perforators are thought to represent unhafted hideworking punches. One perforator came from Feature 30; the rest were found during plowzone and midden excavations.

Gravers (Figure 9.47*n*). Sample Size: 7. Form: These tools are amorphous flakes that have been unifacially retouched along one edge to produce a small, sharp, triangular projection. Material: Rhyolite–6, Vein quartz–1. Comment: All of these specimens were recovered from the plowzone and are interpreted as engraving or scoring tools.

Denticulates (Figure 9.47*m*). Sample Size: 3. Form: These artifacts are small, amorphous flakes that

have unifacially retouched, serrated edges. Material: Rhyolite–3. Comment: Denticulates are interpreted as cutting, sawing, or shredding implements. All were recovered from non-feature contexts.

Utilized and Retouched Flakes. Sample Size: 237. Form: This category includes flakes that exhibit marginal retouch (n=144) or edge damage (n=93) presumably resulting from use. Material: Rhyolite–178, Vein quartz–41, Other metavolcanic rock–15, Crystal quartz–2, Quartzite–1. Comment: Utilized and retouched flakes are interpreted as *ad hoc* cutting implements.

Ground Stone Artifacts

Ground Celts (Figure 9.48*d*). Sample Size: 2. Form: One of these specimens, made of rhyolite, is a whole celt that has been highly ground and polished to a sub-triangular form, and has a squared, tapered poll end. The bit edge has been blunted and polished by use. This celt is 102 mm long, 53 mm wide at the bit, 27 mm wide at the poll end, and 30 mm thick. The other specimen is a small celt fragment. Material: Granite–1, Rhyolite–1. Comment: Neither specimen was recovered from a feature context; however, the morphological similarity of the whole celt to stone axes found at other late prehistoric sites in the region and rarity of ground stone celts at historic village sites suggest that these artifacts probably are associated with the Dan River phase occupation.

Soapstone Sherds. Sample Size: 2. Form: These specimens are small fragments of carved and ground stone bowls. Material: Soapstone–2. Comment: Stone bowls generally date to the Late Archaic period in piedmont North Carolina and probably are associated with the small stemmed projectile points found at the site.

Ground Stone Fragments. Sample Size: 17. Form: These specimens are unidentifiable stone fragments that have one or more ground or polished surfaces. Material: Granite–9, Other metavolcanic rock–6, Sandstone–1, Shale–1. Comment: Most of these artifacts probably are pieces of broken anvils or milling stones. Ground stone fragments were recovered from Features 13 and 38 in addition to the plowzone and midden.

Large Cobble Tools

Cobble Choppers. Sample Size: 5. Form: The quartzite and metavolcanic specimens are large cobble spalls that have been chipped along one edge to produce a convex working edge. The other specimens are large slabs that have been bifacially chipped to produce sharp edges. Material: Metamorphic rock–3, Sandstone–1, Quartzite–1. Comment: These artifacts probably represent heavy butchering implements or digging tools. Cobble choppers were recovered from the plowzone, midden, and Features 31 and 33.

Hammerstones/Manos (Figure 9.47*c,e*). Sample Size: 30. Form: Most of these artifacts were fist-sized (i.e., 7 cm to 9 cm in diameter), discoidal to spherical in shape, and displayed extensive abrasion and battering along the margins. Many also exhibited pitting on one surface. Some specimens were more hemispherical in shape and may have also served as hand-held manos. Material: Granite–21, Vein quartz–7, Quartzite–1, Other metavolcanic rock–1. Comment: Unlike most Late Prehistoric and Historic period sites, the hammerstones at Lower Saratown were ubiquitous in their occurrence and tended to be remarkably similar in both size and form. Although half of the hammerstone sample came from plowzone and midden excavations, hammerstones also were recovered from Features 6, 7, 8, 10, 24, 25, and 30. All of these features are attributed to the middle Saratown occupation at the site.

Milling Stones. Sample Size: 2. Form: Both specimens are fragments of large stone slabs that exhibit wear and abrasion on one surface. Material: Sandstone–2. Comment: Milling stones probably were used to process plant foods.

Summary

The sample of lithic artifacts recovered from Lower Saratown documents a sequence of site occupations spanning almost 10,000 years; however, the overwhelming majority of artifacts found can be attributed to the two most recent occupations during the Dan River and middle Saratown phases. Aside from the 12 projectile points that document visits to the site by late Paleo-Indian, Early Archaic, Middle Archaic, and Late Archaic peoples, few other artifacts can be reliably associated with pre-Dan River phase occupations. In fact, the lack of patination on most other stone tools suggests that they are of comparatively recent manufacture, and those that do display some patination (namely drills) are clearly items that were recycled by later site occupants.

Despite this lack of sample contamination by earlier inhabitants, it is difficult to differentiate Dan River phase and middle Saratown phase lithic assemblages. Given the distribution of Dan River and middle Saratown pottery across the site, it would appear that most of the lithic artifacts recovered from the midden are attributable to the Dan River occupation while most of the feature samples (excluding Features 14, 18, 32, and 41) are at least in part attributable to the subsequent middle Saratown phase. If this is a fair approximation, then several observations can be made about lithic tool manufacture and use during these two occupations. Flintknapping conducted at the site, and employing both local and non-local raw materials, produced a variety of functionally distinct tools. Chipped and ground stone tools were used during both occupations for a variety of activities, including butchering and hideworking, lithic and non-lithic tool manufacture, woodworking, and plant cultivation and processing.

Although the formal characteristics of several tool categories (e.g., end scrapers, drills, perforators, projectile points, etc.) were fairly uniform, the dominant tool category consisted of utilized or retouched flakes that appear to have been slightly modified for use as cutting tools.

Although the overall composition of lithic assemblages associated with the Dan River and middle Saratown occupations is generally similar, two interesting differences were noted. First, the proportion of bifacial thinning debitage in the middle Saratown sample is substantially larger and may reflect a greater emphasis on the production of triangular projectile points on small flake blanks. This corresponds with a much lower frequency of decortication flakes. Whereas approximately 65% of all Dan River phase debitage were classified as interior or bifacial thinning flakes and over 27% were decortication flakes, over 83% of all middle Saratown debitage consisted of interior/bifacial thinning flakes and only 13% were decortication flakes. Second, middle Saratown contexts produced far more small triangular projectile points than presumed Dan River contexts. In fact, almost 65% of all chipped stone tools (including utilized and retouched flakes) from middle Saratown features were projectile points while only 18% of the Dan River tools were projectile points. While these differences may be due in part to methods of artifact recovery (i.e., midden soils were dry-screened through 1/2-inch mesh and feature fill was waterscreened through 1/2-inch, 1/4-inch, and 1/16-inch mesh), they also appear to reflect more fundamental differences between the Late Prehistoric and Contact periods in the use of stone tools. Specifically, these data suggest an intensification of weapon manufacture and use that generally coincides with the establishment of the deerskin trade with the English.

Clay Artifacts

Five complete clay pipes and 48 pipe fragments were recovered from Lower Saratown (Figure 9.49*a–f*). Based upon clay differences, these were divided into three general categories: traditional, terra-cotta, and white clay. Traditional pipes were made from clay resembling that used in the manufacture of native pottery and appear to have been fired under similar conditions. In many instances, temper was added to this clay to produce a sandy or gritty paste. In contrast, terra-cotta pipes were made from a very fine, non-tempered clay that typically oxidized to a reddish-orange, brown, or "terra-cotta" color upon firing. These pipes usually displayed a very smooth or burnished surface. White clay pipes resembled the terra-cotta specimens in that they were made from a very fine clay paste; however, this clay sometimes contained small orange inclusions. The uniformity of these particles suggests that they naturally occurred in the clays. White clay pipes ranged in color from white to light smokey-gray. Their color was the main attribute that set them apart from the terra-cotta specimens, whereas their fine paste set them apart from the traditional category.

Within these general categories, the pipe fragments were further subdivided according to the segment or component of the complete specimen they represented (Table 9.4). Stems, bowls, heels, and combinations of these elements were recorded. A few broken pieces obviously were pipe fragments but were too small to identify what element they represented. The majority of the pipes and fragments were recovered from middle Saratown phase features (Table 9.5).

Most of the pipe fragments from Lower Saratown fell into the "traditional" category (Table 9.4). These were made from native clays identical to those used to make pottery, and most represent stem fragments or small bowl fragments. Although the sample is too small to draw definite conclusions, at least two types of stems—straight and tapered—were indicated. Diameters on the tapered stems tended to be large, up to 21 mm, with bore diameters as much as 10 mm. The straight or non-tapered stems tended to be smaller, with outside diameters averaging around 10 mm and bore diameters of around 5 mm. Tapered and straight stems were found on both "onion" and elbow pipe forms.

Onion pipes were first recognized by Coe at the late prehistoric Wall site and were included in his description of the Hillsboro focus (Coe 1952:311). These tubular pipes have a bowl created by expanding one end of the stem into a bulb or "onion" shape to hold the smoking material. Because the orifice of the bowl is parallel to the long axis of the stem, these pipes probably were held between the fingers of the hand clenched in a fist. The smoker would then have used the orifice created by the index finger and the thumb to draw smoke from the pipe, which would be oriented perpendicular to the top of the fist and parallel to the smoker's face. Early forms of onion pipes at the Wall site are thick and crude with trumpet-shaped bowls that were created by simply flaring out one end of the thick stem. These forms also have stems that taper away from the bowl end. Apparently the true "onion" form with its well-defined globular bowl developed later during the early Contact period and continued to be used until the late Contact period. The stems on these later pipes are usually straight but sometimes flare slightly at the very tip.

One complete onion pipe of traditional clay was recovered from Lower Saratown (Figure 9.49*a*). A complete elbow pipe of traditional clay also was found (Figure 9.49*f*). This specimen has a plain bowl that intersects a tapered stem at an obtuse angle. Its form

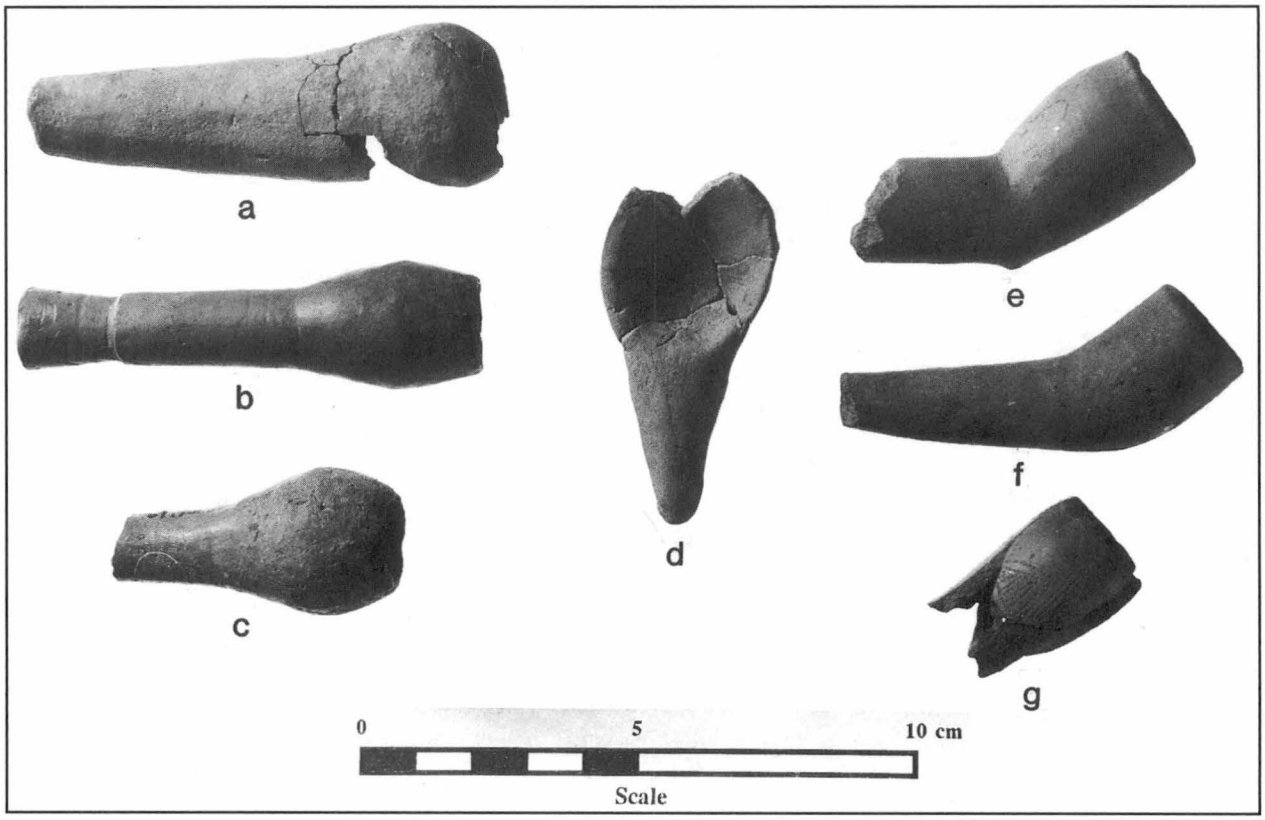

Figure 9.49. Clay artifacts from Lower Saratown.

Table 9.4. Summary of clay pipes from Lower Saratown.

Type	Stem Fragments	Bowls	Complete Pipes	Indeterminate Fragments	Total	Percent
Traditional	9	8	2	21	40	75.5
Terra-cotta	3	-	2	-	5	9.4
White Clay	4	3	1	-	8	15.1
Total	16	11	5	21	53	100.0

Table 9.5. Distribution of clay pipes from the Lower Saratown.

	Plowzone		Middle Saratown Phase Features		Other	
Type	n	%	n	%	n	%
Traditional	8	20.0	30	75.0	2	5.0
Terra-cotta	1	20.06	3	60.0	1	20.0
White Clay	3	37.5	4	50.0	1	12.5
Total	12		37		4	

is similar to terra-cotta pipes from Jenrette and other Contact period sites throughout the Siouan area.

White clay and terra-cotta pipes comprised the remainder of the sample. In some cases, it was hard to distinguish between the two categories as some white clay pieces had areas of orange mottling. This suggests that the paste might be the same, and the small orange particles noticeable in the white clay specimens

may simply be masked by the reddish-orange color of the terra-cotta pieces. Further support for this assessment lies in the similarities in stem and bowl forms between the two categories. In both cases the stems are straight, average 12 mm in outside diameter, and most seem to have been associated with onion-type bowls.

While most of the white clay and terra-cotta stems seem to have been parts of onion pipes—and two complete onion forms were found (Figure 9.49*b,c*)—elbow pipes also are represented in both categories. One terra-cotta specimen exhibits a tulip-shaped bowl that bulges on the side facing the smoker (Figure 9.49*c*). The bowl intersects the stem at an obtuse angle and has a pronounced heel. One almost complete, white clay bowl fragment also is tulip-shaped and has fine roulette designs. These consist of two parallel lines around the bowl rim. Below the lines are a series of diamonds and triangles set off by rouletting and also connected by two parallel lines (Figure 9.49*g*). Similar roulette pipe forms have been found at the Jenrette, Mitchum, and Fredricks site in the Eno and Haw drainages and at Upper Saratown on the Dan River. They also frequently occur in the Virginia Tidewater region, and appear to be horizon markers for the second half of the seventeenth century. Pipes decorated with roulette designs are discussed in greater detail in Chapter 12.

In addition to pipes, a few miscellaneous clay artifacts also were found. These include: 1) a small clay spoon with a short tapered handle and a bowl that measures 30 mm in diameter (Figure 9.49*d*); 2) a miniature conical clay pot that is 39 mm in diameter and 25 mm high; 3) a single clay bead, 14 mm in diameter; 4) six small clay coil or handle fragments; and 5) one potsherd that has abraded edges.

Bone Artifacts

One hundred and nine bone artifacts were recovered during excavations at Lower Saratown (Figure 9.50). With the exception of a single deer ulna awl fragment from Feature 32 (Dan River phase) and a bone needle and deer ulna awl fragment from the sub-plowzone humus, all of these artifacts came from middle Saratown phase contexts. Bone artifacts were particularly abundant in Feature 8, associated with the two structures, and within Features 30, 35, and 38, located along the village palisade.

Of the 106 middle Saratown phase artifacts, six displayed polish, striations, or groove-and-snap breaks but could not be assigned to a definite tool category. Thirty-six bone awls were found, making this the most frequently occurring tool category (Figure 9.50, top right and bottom). Four of these awls were made from the shafts of turkey tarsometatarsuses, four were from deer ulnas, one was from the shaft of a deer metacarpal, and one was from the shaft of a deer tibia. The remaining 26 awls were crafted from long-bone splinters of unidentifiable birds and mammals. Thirty-one bone beads were recovered. These specimens were identical in size and shape to the shell beads found at the site. Most (n=28) were small, measuring less than 3 mm in diameter; however, two beads measured 7 mm in diameter and one was 10 mm in diameter. Sixteen antler flakers (Figure 9.50, top left) and eleven beamers also were found. One of the beamers was created from the shaft of an unidentified mammal long bone, nine were from deer metapodials (Figure 9.50, top), and one was made from a deer tibia. Three cups or containers were found which had been created by grinding down the edges of box turtle carapaces. Finally, one fragment of a bone needle and two fragments of bone fishhooks also were recovered.

Shell Artifacts

One hundred and twenty shell beads were recovered from middle Saratown phase features (Figure 9.51 and Table 9.6). Small cut-shell disk beads averaged 3.0 mm in diameter and occurred more frequently than similar-sized glass trade beads (Figure 9.51*b*). Most of these were white, but a few were dark gray in color and similar to "wampum" beads except for their disk (rather than tubular) shape. Marginella beads (Figure 9.51*c*), formed by grinding the shoulders of the whole shell, were not as popular as the small cut-shell variety, and disks larger than 5.0 mm were even rarer. Examination under magnification revealed holes that flared slightly on the bead face but did not contract in the middle to create an hourglass profile. Except for the slight depression on the surface, the perforations were regular and cylindrical. The shell disks ranged in thickness from 1.0 mm to 3.0 mm and appear to have been cut from the wall sections of large marine univalves.

Aside from beads, the only other shell artifacts recovered from Lower Saratown were serrated-edged scrapers made from freshwater mussel shells (Figure 9.51*a*). Eleven whole specimens and 12 fragments, all from middle Saratown phase features, were recovered. These mussel shell tools were finely serrated around their entire periphery except for the thick portion comprising the hinge of the bivalve. In some cases, the saw-like edges had been worn flat from use.

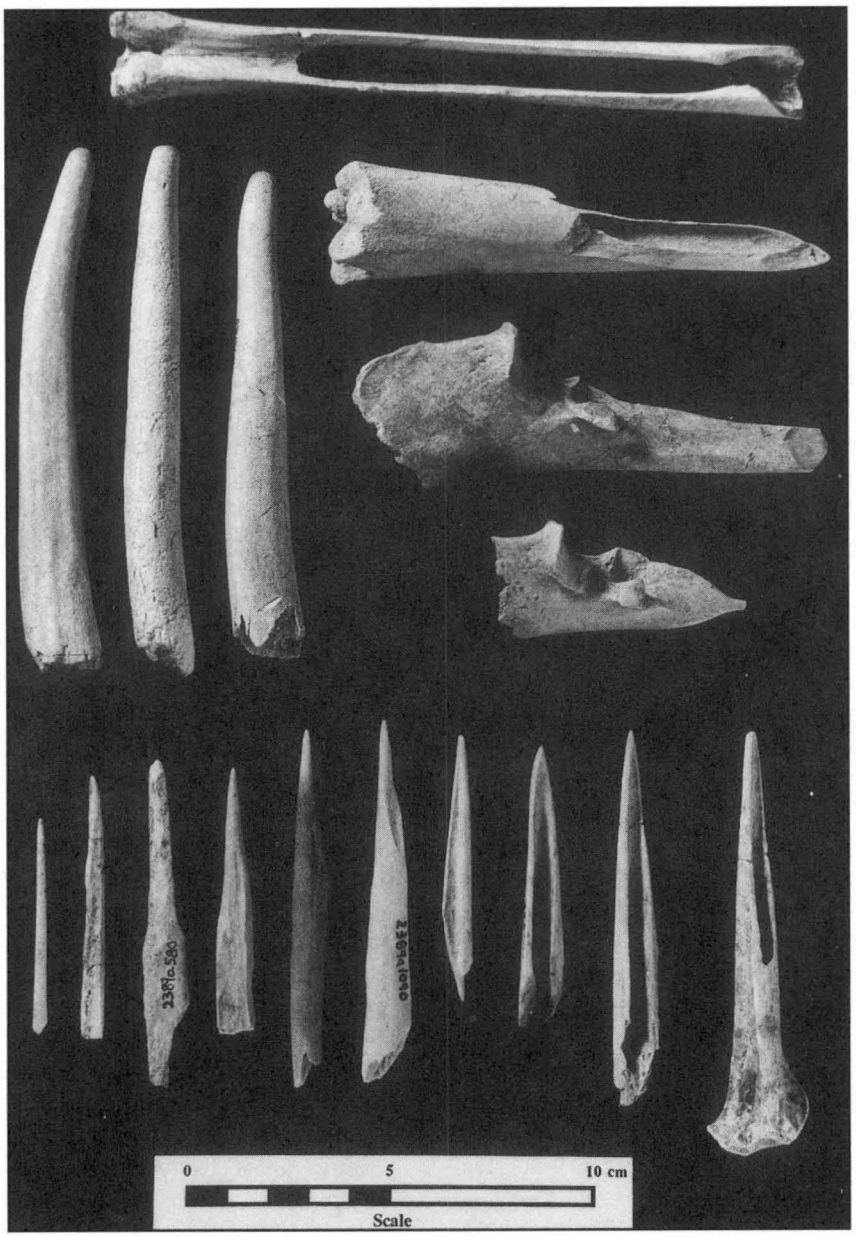

Figure 9.50. Bone artifacts from Lower Saratown.

Exactly how these tools were used remains conjectural, but the suggestion that they functioned to smooth or thin the interior surfaces of pottery vessels seems reasonable. Striations like those that would have been made by the serrated shells are frequently found on the interiors of earlier Dan River potsherds but only occasionally occur on sherds dating to the Protohistoric and Historic periods. Whatever their purpose, serrated shell tools apparently were replaced either by European counterparts or by tools made of more perishable material since this artifact type did not occur at the later Fredricks site (Hammett 1987:183).

Historic Artifacts

By far the largest number of European trade artifacts from Lower Saratown consisted of glass trade beads (n=56), followed by rolled brass tubular beads (n=5). These brass beads, though made from material obtained from Europeans, were shaped into their final form by the Indians. In addition to brass beads, a small perforated brass ornament was recovered from Feature 31. This fingernail-sized specimen was less than 1 mm in thickness and shaped like a truncated oval.

The only iron artifacts were recovered from the plowzone and consist of two heavy tang-and-blade fragments of large (butcher?) knives and a thick trapezoidal iron fragment. The knives probably do not date to the Indian occupation but rather to later utiliza-

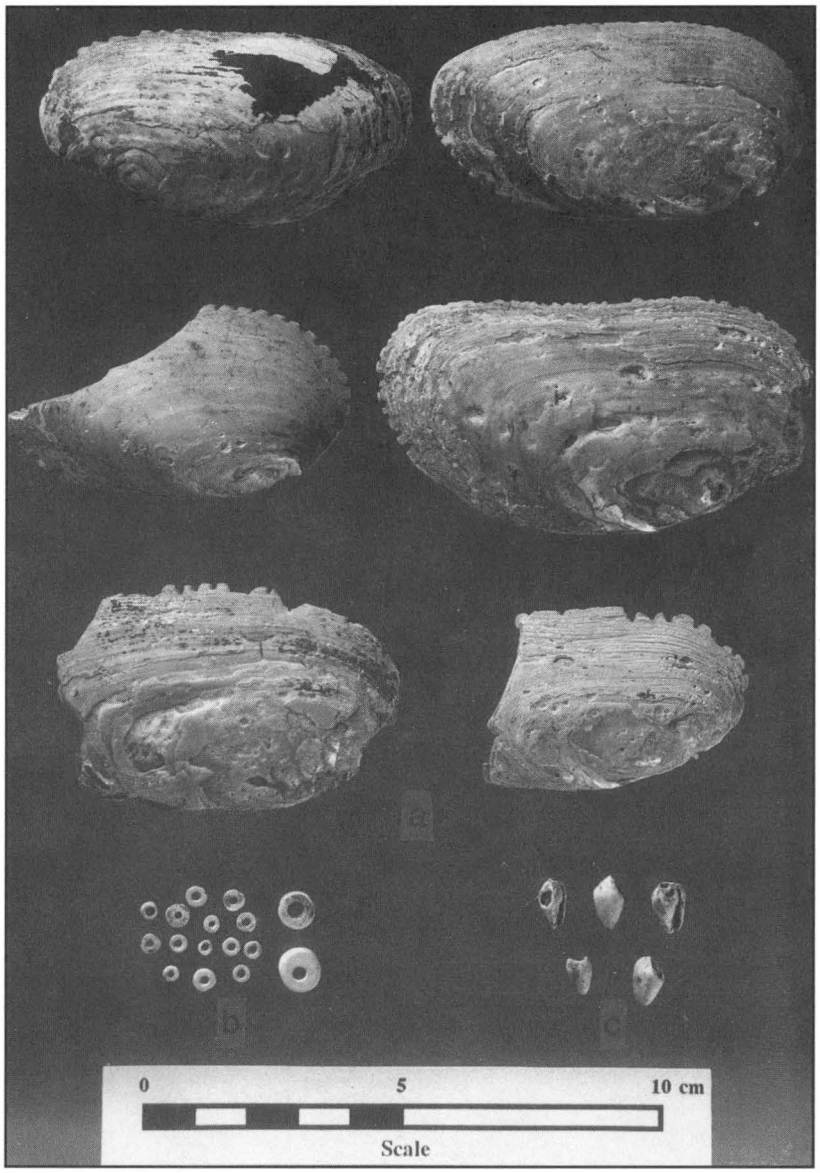

Figure 9.51. Shell artifacts from Lower Saratown.

tion of the area by Whites. The same is true for the geometrically shaped iron fragment.

Although glass beads or brass beads were found in almost every feature, they were never numerous and almost always were accompanied by similar beads of shell and bone (Table 9.7). Also, no large glass beads were recovered, although a few were up to 5 mm in diameter. Most were small "seed" beads that ranged from 1 mm to 4 mm in diameter. White glass beads (Kidd and Kidd's [1970] type IIa11) predominated, followed by dark blue beads (Kidd and Kidd's type IIa48). Multicolored or compound beads were rare. One small redwood specimen with a black center (Kidd and Kidd's type IVa1), two small white beads with a light blue interior (Kidd and Kidd's type IVa14), and one redwood, white-striped specimen (Kidd and Kidd's type IIb54) were the only compound varieties found.

The small number of trade beads points to early, probably indirect trade with Europeans. This inventory is very similar to the glass bead inventory from the Jenrette site and probably places this Lower Saratown component at approximately the same mid-seventeenth century date.

The number of beads recovered at Lower Saratown contrasts greatly with the number and variety found at Upper Saratown, occupied approximately 20–30 years later. Several hundred thousand glass beads were recovered from excavations at Upper Saratown, and it was not uncommon for a single excavated burial to produce thousands of small beads, usually sown in geometric patterns on burial garments.

The brass beads consisted of narrow ribbons of brass that had been wrapped around a thin rod to obtain their cylindrical shape. Seams were obvious and often

Table 9.6. Summary of shell beads from Lower Saratown.

Context	Small Disks	Large Disks	Marginella	"Wampum"	Total
Fea. 6	-	-	3	-	3
Fea. 7	3	-	2	-	5
Fea. 8	2	-	-	-	2
Fea. 10	-	1	-	-	1
Fea. 11	4	3	-	-	7
Fea. 13	2	-	1	1	4
Fea. 17	3	-	1	-	4
Fea. 24	1	-	-	-	1
Fea. 25	2	-	1	3	6
Fea. 30	17	-	2	11	30
Fea. 31	6	-	-	-	6
Fea. 33	15	2	3	-	20
Fea. 34	4	-	5	-	9
Fea. 35	10	-	1	1	12
Fea. 38	3	-	-	-	3
Fea. 46	5	-	-	2	7
Total	77	6	19	18	120
Percent	64.17%	5.00%	15.83%	15.00%	100.00%

Table 9.7. Summary of glass and brass beads from Lower Saratown.

Context	Small White	Small Blue	Medium White	Medium Blue	Rosewood	White with Blue Interior	Striped	Rolled Brass	Total
Fea. 1	2	-	-	-	-	-	-	-	2
Fea. 6	2	-	-	-	-	-	-	-	2
Fea. 7	1	1	-	-	-	-	-	1	3
Fea. 8	6	-	-	1	1	-	-	1	9
Fea. 10	2	-	-	-	-	1	-	-	3
Fea. 21	1	-	-	-	-	-	-	-	1
Fea. 24	5	1	-	-	-	-	-	-	6
Fea. 30	-	-	-	3	-	-	-	-	3
Fea. 31	7	-	-	1	-	-	-	-	8
Fea. 33	2	1	1	1	-	-	-	-	5
Fea. 34	1	1	-	-	-	-	-	-	2
Fea. 35	1	1	-	-	-	-	-	1	3
Fea. 38	5	4	-	-	-	1	1	-	11
Fea. 40	-	-	-	-	-	-	-	1	1
Fea. 46	-	1	-	-	-	-	-	1	2
Total	35	10	1	6	1	2	1	5	61
Percent	57.38%	16.39%	1.64%	9.84%	1.64%	3.28%	1.64%	8.20%	100.00%

irregular, and the beads were rarely more than 2 mm in diameter. Lengths varied from 8 mm to 40 mm. The longest specimen was cone shaped with a maximum diameter of 4.0 mm and a minimum diameter of 2 mm. All the brass beads were rather crudely made and seem to reflect the maximization of a very scarce commodity.

Faunal Remains

by
Mary Ann Holm

A total of 34,069 bone fragments was recovered from undisturbed contexts at Lower Saratown (Table 9.8). Bone recovered from the plowzone was excluded from analysis. Samples of animal bone were recovered from the fill of 28 features, one area of sub-plowzone midden, the postholes of Structure 1, and postholes from a small section of the middle Saratown phase palisade.

The fill from each of these features and postholes was washed through a sequence of 1/2-inch, 1/4-inch, and 1/16-inch screens. All bones from 1/2-inch waterscreen samples were analyzed. Bones from 1/4-inch waterscreen samples and identifiable beyond the level of class also were analyzed. The remaining bones recovered by 1/4-inch waterscreening were simply counted and weighed. No attempt was made to record how many of these unidentifiable, 1/4-inch fragments were modified (for example, burned or gnawed). Only those bones and bone fragments which appeared to be identifiable beyond the level of class were pulled from 1/16-inch washings for analysis. The remaining bone fragments recovered in the 1/16-inch screen were neither sorted, counted, nor weighed.

Approximately 36% of these fragments could be identified beyond the level of class. Over 85% of the recovered animal bone came from pit features associated with the middle Saratown occupation of the site while less than two percent came from Dan River phase features. The remainder were from contexts that could not be attributed to a specific phase.

Dan River Phase

Six hundred and eighteen fragments of animal bone were recovered from four features that date to the late prehistoric Dan River phase. From these, a minimum of 15 individuals representing 12 species was identified. Of these individuals, nearly 47% were mammals, 13% were birds, 20% were reptiles, 7% were amphibians, and 13% were fish.

Nearly 76% of the bone fragments from the Dan River phase at Lower Saratown were small, unidentifiable fragments recovered from 1/4-inch waterscreening of feature fill. Of the remaining 150 fragments, 15 were burned, one exhibited rodent gnawing marks, and two exhibited cut marks. One deer ulna awl was also recovered and was the only bone artifact associated with the Dan River phase at this site.

Middle Saratown Phase

The features and postholes assigned to the historic middle Saratown phase yielded a fairly large faunal assemblage consisting of 32,976 bone fragments. These fragments represent a minimum of 158 individuals belonging to 41 species. Of these individuals, approximately 37% were mammals, 11% were birds, 33% were reptiles, 5% were amphibians, and 14% were fish.

Mammals. Deer was by far the most significant of the mammalian species utilized by the Contact-period inhabitants of Lower Saratown. Of the minimum of 26 individuals identified, it was possible to determine the ages of eleven deer. Two fragments (one premaxilla and one scapula) of fetal deer were recovered and ten mandibles could be aged using the method described by Severinghaus (1946). These mandibles represent one individual that was approximately 6 to 7 months old, two that were 13 to 17 months old, one that was 17 to 20 months old, one that was 4-1/2 years old, one that was 5-1/2 years old, one that was 8-1/2 years old, and one that was 9-1/2 years old.

It was also possible to determine the sex ratio of a portion of the deer represented in this assemblage. One method for doing this is by examining the frontal bones for the presence of antlers or antler pedicles. In this way, it was possible to establish the presence of at least four male deer in the assemblage. A technique developed by Edwards and others (1982) uses characteristics of the pelvic girdle to distinguish male from female deer. Using this technique, it was possible to distinguish the pelvises of six females and one male. It is possible that one of the males identified through the presence of antlers was also represented by the single male pelvis which could be sexed. Thus, out of the minimum of 26 deer represented in this assemblage, it was only possible to determine that four of these individuals were males and six were females.

Because such a low percentage of the total number of individuals could be sexed, these figures may not be an accurate reflection of the actual sex distribution of the animals utilized. The knowledge of the age of several of the deer does make it possible, however, to hypothesize about the method used to hunt these animals. Waselkov (1977:120) suggests that when drives or surrounds were used in hunting, the majority of the individuals represented in the resulting faunal assemblage will be neither very young nor very old. The faunal assemblage produced by hunting with drives or surrounds will reflect a deer population whose characteristics are similar to those of a naturally-occurring population. Of the deer for whom age could be determined, 55% were less than 1-1/2 years old, 27% were between 1-1/2 and 8 years old, and 18% were more than 8 years old. Thus, of the deer that could be aged, 73% were either very young or very old. This pattern is consistent with that proposed by Waselkov (1977:120) as being indicative of a hunting

Table 9.8. Faunal remains from Lower Saratown.

Species	Dan River Phase						Middle Saratown Phase						Indeterminate				Total			
	Freq.		Weight		MNI		Freq.		Weight		MNI		Freq.		Weight		Freq.		Weight	
	n	%	g	%	n	%	n	%	g	%	n	%	n	%	g	%	n	%	g	%
Mammals																				
Didelphus virginianus, Oppossum	-	-	-	-	-	-	10	0.03	15.44	0.05	2	1.26	-	-	-	-	10	0.03	15.44	0.05
Soricidae, Shrews	-	-	-	-	-	-	2	0.01	0.02	0.00	1	0.63	-	-	-	-	2	0.00	0.02	0.00
Sylvilagus sp., Cottontail	1	0.16	0.06	0.01	1	6.67	15	0.04	3.22	0.01	1	0.63	-	-	-	-	16	0.05	3.28	0.01
Sciurus carolinensis, Gray Squirrel	-	-	-	-	-	-	23	0.07	6.15	0.02	2	1.26	-	-	-	-	23	0.07	6.15	0.02
Sciurus niger, Fox Squirrel	-	-	-	-	-	-	33	0.10	6.68	0.02	3	1.90	2	0.42	0.86	0.29	35	0.10	7.54	0.02
Sciurus sp., Squirrel	2	0.32	0.09	0.02	1	6.67	148	0.45	15.87	0.05	-	-	1	0.21	0.04	0.01	151	0.44	16.00	0.05
Castor canadensis, Beaver	-	-	-	-	-	-	32	0.10	69.00	0.23	1	0.63	-	-	-	-	32	0.09	69.00	0.22
Oryzomys palustris, Marsh Rice Rat	-	-	-	-	-	-	-	-	-	-	-	-	1	0.21	0.09	0.03	1	0.00	0.09	0.00
Peromyscus leucopus, White-footed Mouse	-	-	-	-	-	-	50	0.15	0.95	0.00	7	4.43	4	0.84	0.08	0.03	54	0.16	1.03	0.00
Sigmodon hispidus, Hispid Cotton Rat	-	-	-	-	-	-	8	0.02	0.22	0.00	2	1.26	-	-	-	-	8	0.02	0.22	0.00
Microtus pennsylvanicus, Meadow Vole	1	0.16	0.02	0.00	1	6.67	17	0.05	0.12	0.00	2	1.26	1	0.21	0.06	0.02	19	0.06	0.20	0.00
Ondatra zibetheca, Muskrat	-	-	-	-	-	-	1	0.00	0.35	0.00	1	0.63	-	-	-	-	1	0.00	0.35	0.00
Cricetidae, Mice, Voles	-	-	-	-	-	-	15	0.04	0.35	0.00	-	-	-	-	-	-	15	0.04	0.35	0.00
Urocyon cinereoargenteus, Gray Fox	-	-	-	-	-	-	4	0.01	0.24	0.00	1	0.63	-	-	-	-	4	0.01	0.24	0.00
Canidae, Wolf, Dog, Fox	-	-	-	-	-	-	2	0.01	3.10	0.01	-	-	-	-	-	-	2	0.00	3.10	0.01
Ursus americanus, Black Bear	-	-	-	-	-	-	15	0.04	202.80	0.67	1	0.63	-	-	-	-	15	0.04	202.80	0.65
Procyon lotor, Raccoon	2	0.32	0.80	0.15	1	6.67	136	0.41	155.60	0.51	5	3.16	2	0.42	0.45	0.15	140	0.41	156.85	0.50
Mephitis mephitis, Striped Skunk	-	-	-	-	-	-	3	0.01	0.70	0.00	1	0.63	-	-	-	-	3	0.01	0.70	0.00
Felis concolor, Mountain Lion	-	-	-	-	-	-	1	0.00	22.80	0.08	1	0.63	-	-	-	-	1	0.00	22.80	0.07
Lynx rufus, Bobcat	-	-	-	-	-	-	5	0.02	18.50	0.06	2	1.26	-	-	-	-	5	0.01	18.50	0.06
Odocoileus virginianus, White-tailed Deer	26	4.21	243.38	44.55	3	20.00	2050	6.22	12817.93	42.30	26	16.46	15	3.16	73.00	25.04	2091	6.14	13134.13	42.18
Unidentified Mammals	47	7.60	67.70	12.39	-	-	4744	14.39	6795.40	22.43	-	-	49	10.32	96.10	32.96	4840	14.21	6959.20	22.35
Total Mammals	79	12.78	312.05	57.12	7	46.67	7314	22.18	20135.44	66.45	59	37.34	75	15.79	170.68	58.54	7468	21.92	20618.17	66.21
Birds																				
Aytha affinis, Lesser Scaup	-	-	-	-	-	-	1	0.00	0.80	0.00	1	0.63	-	-	-	-	1	0.00	0.80	0.00
Meleagris gallapavo, Wild Turkey	22	3.56	85.05	15.57	2	13.33	172	0.52	542.69	1.79	11	6.96	-	-	-	-	194	0.57	627.74	2.02
Colaptes auratus, Yellow-shafted Flicker	-	-	-	-	-	-	4	0.01	1.00	0.00	2	1.26	-	-	-	-	4	0.01	1.00	0.00
Richmondena cardinalis, Cardinal	-	-	-	-	-	-	2	0.01	0.03	0.00	1	0.63	-	-	-	-	2	0.00	0.03	0.00
Ectopistes migratorius, Passenger Pigeon	-	-	-	-	-	-	7	0.02	0.39	0.00	2	1.26	2	0.42	0.37	0.13	9	0.03	0.76	0.00
Unidentified Birds	8	1.29	7.60	1.39	-	-	437	1.32	362.13	1.20	-	-	7	1.47	7.50	2.57	452	1.33	377.23	1.21
Total Birds	30	4.85	92.65	16.96	2	13.33	623	1.89	907.04	2.99	17	10.76	9	1.89	7.87	2.70	662	1.94	1007.56	3.24

Table 9.8 Continued.

Species	Dan River Phase						Middle Saratown Phase						Indeterminate				Total			
	Freq.		Weight		MNI		Freq.		Weight		MNI		Freq.		Weight		Freq.		Weight	
	n	%	g	%	n	%	n	%	g	%	n	%	n	%	g	%	n	%	g	%
Reptiles																				
Chelydra serpentina, Snapping Turtle	-	-	-	-	-	-	56	0.17	93.90	0.31	1	0.63	-	-	-	-	56	0.16	93.90	0.30
Kinosternon subrubrum, Mud Turtle	8	1.29	5.20	0.95	1	6.67	600	1.82	1454.34	4.80	14	8.86	4	0.84	13.90	4.77	612	1.80	1473.44	4.73
Sternotherus oderatus, Musk Turtle	-	-	-	-	-	-	13	0.04	6.98	0.02	2	1.26	-	-	-	-	13	0.04	6.98	0.02
Terrapene carolina, Box Turtle	3	0.48	7.80	1.43	1	6.67	880	2.67	2196.85	7.25	31	19.62	10	2.10	11.17	3.83	893	2.62	2215.82	7.12
Pseudemys concina, Cooter	-	-	-	-	-	-	1	0.00	3.80	0.01	1	0.63	-	-	-	-	1	0.00	3.80	0.10
Trionyx sp., Soft-shelled Turtle	-	-	-	-	-	-	25	0.08	21.26	0.07	1	0.63	-	-	-	-	25	0.07	21.26	0.70
Unidentified Turtle	10	1.62	5.70	1.04	-	-	274	0.83	185.61	0.61	-	-	13	2.74	8.20	2.81	297	0.87	199.51	0.64
Natrix sp., Water Snake	-	-	-	-	-	-	63	0.19	10.30	0.03	1	0.63	-	-	-	-	63	0.18	10.30	0.03
Colubridae, Non-poisonous Snakes	5	0.81	0.30	0.05	1	6.67	204	0.62	18.56	0.06	-	-	9	1.89	0.38	0.13	218	0.64	19.24	0.06
Crotalidae, Poisonous Snakes	-	-	-	-	-	-	66	0.20	6.30	0.02	1	0.63	-	-	-	-	66	0.19	6.30	0.02
Unidentified Snake	5	0.81	0.19	0.03	-	-	312	0.95	7.41	0.02	-	-	1	0.21	0.03	0.01	318	0.93	7.63	0.02
Total Reptiles	31	5.02	19.19	3.51	3	20.00	2494	7.56	4005.31	13.22	52	32.91	37	7.79	33.68	11.55	2562	7.52	4058.18	13.03
Amphibians																				
Scaphiopus holbrooki, Spadefoot Toad	-	-	-	-	-	-	46	0.14	2.19	0.01	5	3.16	-	-	-	-	46	0.13	2.19	0.01
Bufo americana, American Toad	-	-	-	-	-	-	7	0.02	0.27	0.00	2	1.26	-	-	-	-	7	0.02	0.27	0.00
Bufo sp., Toad	-	-	-	-	-	-	4	0.01	1.30	0.00	-	-	-	-	-	-	4	0.01	1.30	0.00
Rana catesbeiana, Bullfrog	-	-	-	-	-	-	4	0.01	0.64	0.00	1	0.63	-	-	-	-	4	0.01	0.64	0.00
Rana/Bufo sp., Frog, Toad	2	0.32	0.02	0.00	1	6.67	65	0.20	2.09	0.01	-	-	2	0.42	0.07	0.02	69	0.20	2.18	0.01
Total Amphibians	2	0.32	0.02	0.00	1	6.67	126	0.38	6.49	0.02	8	5.06	2	0.42	0.07	0.02	130	0.38	6.58	0.02
Fish																				
Amia calva, Bowfin	-	-	-	-	-	-	15	0.04	0.98	0.00	1	0.63	-	-	-	-	15	0.04	0.98	0.00
Lepisosteus sp., Gar	3	0.48	0.53	0.10	1	6.67	946	2.87	78.61	0.26	1	0.63	17	3.58	0.68	0.23	966	2.84	79.82	0.26
Alosa sapidissima, White Shad	-	-	-	-	-	-	28	0.08	2.61	0.01	1	0.63	-	-	-	-	28	0.08	2.61	0.01
Catostomus commersoni, White Sucker	-	-	-	-	-	-	11	0.03	2.20	0.01	2	1.26	-	-	-	-	11	0.03	2.20	0.01
Moxostoma sp., Redhorse	-	-	-	-	-	-	2	0.01	2.50	0.01	1	0.63	-	-	-	-	2	0.00	2.50	0.01
Catastomidae, Suckers	3	0.48	0.46	0.08	1	6.67	183	0.55	20.90	0.07	-	-	1	0.21	0.10	0.03	187	0.55	21.46	0.07
Ictalurus sp., Catfish	-	-	-	-	-	-	30	0.09	1.76	0.00	5	3.16	-	-	-	-	30	0.09	1.76	0.00
Anguilla rostrata, American Eel	-	-	-	-	-	-	6	0.02	0.37	0.00	1	0.63	-	-	-	-	6	0.02	0.37	0.00
Lepomis sp., Sunfish	-	-	-	-	-	-	47	0.14	6.02	0.00	4	2.53	-	-	-	-	47	0.14	6.02	0.02
Centrarchidae, Bass, Sunfish	-	-	-	-	-	-	31	0.09	2.53	0.01	-	-	-	-	-	-	31	0.09	2.53	0.01
Perciformes, Darters	-	-	-	-	-	-	42	0.13	13.96	0.05	6	3.80	-	-	-	-	42	0.12	13.96	0.04
Unidentified Fish	-	-	-	-	-	-	152	0.46	35.00	0.12	-	-	-	-	-	-	152	0.45	35.00	0.11
Total Fish	6	0.97	0.99	0.18	2	13.33	1493	4.53	167.44	0.55	22	13.92	18	3.79	0.78	0.27	1517	4.45	169.21	0.54
Unidentified	470	76.00	121.40	22.22	-	-	20925	63.46	5076.49	16.75	-	-	334	70.32	78.50	26.92	21729	63.78	5276.39	16.94
Human	-	-	-	-	-	-	1	0.00	2.40	0.00	-	-	-	-	-	-	1	0.00	2.40	0.01
Total	618	99.91	546.30	99.98	15	100.03	32976	99.97	30300.61	99.94	158	99.87	475	99.99	291.58	99.98	34069	99.93	31138.31	100.67

strategy characterized by stalking rather than the use of drives or surrounds.

A minimum of seven white-footed deer mice was identified. These animals, along with other mice, rats, voles, and amphibians found at the site, may not have been utilized by the inhabitants of the site, but rather, may represent animals whose remains were fortuitously incorporated into the faunal sample. Squirrels (both gray and fox) and raccoons each made up approximately 8% of the mammals in the assemblage. None of the other mammalian species was represented by more than two individuals (or approximately 3% of the total number of mammals). It is interesting to note that despite the heavy reliance placed upon deer, the inhabitants of the Lower Saratown site during the middle Saratown phase utilized a very wide range of mammals. This variety included not only the deer, squirrels, opossums, and raccoons so commonly found at aboriginal sites but also bear, beaver, gray fox, striped skunk, mountain lion, and bobcat.

Birds. The diversity of bird species identified was much lower than that of the mammals. Eleven of the seventeen individuals identified were turkeys. From a count of spurs it was determined that five (or 45%) of these turkeys were male. In a population representing randomly collected individuals, only 19% of the individuals would be expected to be males (Gwynn 1964). This discrepancy is an indication that the inhabitants of the Lower Saratown site may have preferentially selected male turkeys over female turkeys. Male turkeys are generally larger than females and they possess tail feathers which may have been prized. In addition to turkey, lesser scaup, yellow-shafted flicker, passenger pigeon, and cardinal also were present in the assemblage.

Reptiles. Reptiles made up 33% of the individuals identified from the middle Saratown phase of the site. Two of these 52 individuals were snakes and the rest were turtles. Box turtle (MNI=31) and mud turtle (MNI=14) were clearly important components of the middle Saratown phase subsistence strategy. Other turtles identified were snapping turtle, musk turtle, slider, and soft-shelled turtle. Although a minimum of eight amphibians (Eastern spadefoot toad, American toad, and bullfrog) was identified, it is not clear whether these animals represent any intentional use by the Indians or merely represent animals that inhabited the site.

Fish. Fish made up 14% of the minimum number of individuals represented in this assemblage. The species identified were basses, sunfishes, white shad, redhorse, white sucker, gar, freshwater eel, catfish, and bowfin.

Modified Bone. Of the total number of fragments (n=32,976) recovered from the middle Saratown component at Lower Saratown, 64% were recovered from 1/4-inch waterscreening and could not be identified. Of the remaining 11,932 fragments, 11% (1,316 fragments) showed some evidence of modification. Forty of these fragments exhibited marks consistent with those produced by gnawing rodents or dogs, 12 fragments exhibited cutting or chopping marks indicative of butchering, and 1,189 fragments were burned. In addition, 75 bones or bone fragments were reworked into tools. These latter specimens are described above as bone artifacts.

Human Bone. It is interesting to note that one fragment of a human ulna was recovered in the fill of Feature 38, a large basin or roasting pit. No other human bone was recovered from nonburial contexts at the site.

Indeterminate Phase

Of the 34,069 fragments of bone recovered from the Lower Saratown site, 475 (or slightly more than 1% of the entire assemblage) were recovered from contexts which could not be dated with any certainty to either the Dan River or middle Saratown phases (Table 9.8). There is no evidence to indicate that the features included in this indeterminate category were in use during the same period of time. Therefore, the minimum number of individuals was not calculated for this portion of the sample. Slightly more than 70% of the fragments recovered from these five small features could not be identified. Of the remaining fragments, nearly 16% were mammals, 2% were birds, 8% were reptiles, less than 1% were amphibians, and 4% were fish. Nearly 65% of the bones in this sample were unidentifiable fragments recovered from 1/4-inch waterscreening. Of the remaining 173 fragments, 10 were burned and one exhibited rodent gnaw marks. One fragment of a deer ulna awl and one fragment of a bone needle also were identified in this portion of the sample.

Shell

Large quantities of shell were recovered from most excavated contexts, including the plowzone and subplowzone humus. Shell also was clearly visible across the site surface prior to excavation. With the exception of nine unmodified marginella shells (unfinished beads ?), all shell consisted of freshwater mussel bivalves and bivalve fragments most likely taken from the nearby Dan River. Most of the large, food preparation facilities, including Features 8, 11, 30, 38, and 46, contained either pockets or lenses of discarded mussel shell; Features 17, 25, and 33 also contained pockets of mussel shell.

Botanical Remains

by
Kristen J. Gremillion

Carbonized plant remains from the 1988 excavations at Lower Saratown were recovered from 45 10-liter flotation samples (Tables 9.9 to 9.12). These samples produced 442.12 grams of wood charcoal, nutshell, seeds, and other charred plant remains. Flotation samples from all excavated features, except Features 3, 4, 5, and 44, contained plant remains. Other carbonized plant remains collected from waterscreened feature fill were not analyzed. Methods of analysis are the same as those described in Gremillion (1987).

Botanical remains are discussed below by cultural component.

Dan River Phase

Four Dan River features at Lower Saratown provided flotation samples. These samples, representing 40 liters of fill, yielded 19.57 grams of plant remains (0.49 grams/liter) and 2.49 grams of plant food remains (0.06 grams/liter). The ratio of seeds to total nutshell was 8.29.

Maize (*Zea mays* L.) was quite abundant in this sample, comprising 78.6% of all identified seeds. No other cultigens were noted in this small sample. Four types of nutshell were represented, with hickory (*Carya* sp.) being the most abundant. Small quantities of acorn (*Quercus* sp.), walnut (*Juglans nigra* L.), and hazelnut (*Corylus* sp.) also were identified.

Middle Saratown Phase

Plant remains were recovered from 25 middle Saratown phase features. A total of 400 liters of fill is represented by flotation samples from the site. In all, the assemblage produced 418.32 grams of plant remains (1.05 grams/liter) and 169.92 grams of plant food remains (0.42 grams/liter). The ratio of seeds to nutshell was 1.95. This was the largest sample of plant remains obtained during the 1988 archaeological investigations within the Dan River drainage.

Both nuts and cultigens are well represented in this assemblage. Maize proved to be both abundant and ubiquitous, with kernels making up about 56.6% of identified seeds. Maize remains occurred in 92.9% of the samples examined. In three features (Features 15, 16, and 45), maize remains were markedly dominant. Common bean also was found in 14.3% of samples and comprised 3.3% of identified seeds. A fragment of *Cucurbita pepo* rind was found in Feature 1. There was no evidence of indigenous, Eastern North American cultigens such as sunflower (*Helianthus annuus* L.) and sumpweed (*Iva annua* L.). The presence of small numbers of weed seeds, such as ragweed (*Ambrosia* sp.) and chenopod (*Chenopodium* sp.), probably are due to human disturbance in and around the site. Other weedy species (e.g., poke [*Phytolacca americana* L.] and some of the fleshy fruits) probably were utilized as food plants.

Nut remains (predominantly nutshell, but including a small quantity of acorn meat) comprised 55.4% of plant food remains from the middle Saratown phase component, a lower proportion than was observed at either the Powerplant or William Kluttz sites (see Chapters 10 and 11). Five taxa were represented, including chestnut (*Castanea dentata* [Marshall] Borkh.) which so far has not been reported from other late prehistoric and historic sites in the Haw and Eno drainages. Walnut also was better represented than it generally was further south in the Piedmont. It made up 13.4% of all nutshell and occurred in half of all samples. Hickory and acorn were the most ubiquitous of the nut types at 92.9% and 61.9% of samples, respectively. Hazelnut comprised only 0.1% of the nutshell from the site but was recovered from four features and 9.5% of all flotation samples. The acorn-to-hickory ratio was only 0.46, indicating that more nutmeat was represented by hickory shell. Thus, hickory appears to have been the most important of the mast resources, with walnut perhaps of secondary importance. The number of nut types represented indicates broad exploitation of taxa occurring in a relatively diverse plant community.

Fleshy fruits from middle Saratown phase samples included maypops (*Passiflora incarnata* L.), persimmon (*Diospyros virginiana* L.), grape (*Vitis* sp.), and bramble (*Rubus* sp.). Of these, persimmon and grape were the most abundant. Together, they comprised 30.3% of all identified seeds from the site.

Summary

The archaeological remains investigated in 1988 at Lower Saratown are associated primarily with a village that was occupied by the Sara Indians during the middle Saratown phase (A.D. 1620–1670). Based on ceramic evidence, the historical record, and trade artifacts from excavations, this village probably was occupied sometime between 1620 and 1650. The small number of trade artifacts, consisting entirely of glass and brass beads, suggests only indirect contacts between the native inhabitants and the English, who at this time were only beginning to explore the possibilities of establishing regular trade networks in the backcountry (Alvord and Bidgood 1912).

Although our excavations were not extensive, they

did reveal important data regarding architecture and site structure. When taken in conjunction with Coe's 1938 work, the recent excavations provide additional support for a clustered component model of aboriginal settlement developed by Simpkins and Petherick (1986:20–25). Basically, this model suggests that areas favorable to the location of prehistoric agricultural villages became increasing favorable to groups during the Contact period. The model further suggests that many of the later sites have been "masked" by the earlier occupations which were usually larger and more intense.

Given the extent of Coe's excavation in the Dan River phase area of the site and the size of our excavation in the middle Saratown phase area, it is difficult to determine the relative sizes of the two villages. However, the extent and density of Dan River phase ceramics on the surface are greater than those of the Contact period occupation, indicating a larger and more intensely occupied village during prehistoric times.

William Byrd described the Lower Saratown site in 1733 as lacking any shrubs that would interfere with his view of the rich floodplain; instead, the site was covered with "grass as high as a man on horseback" (Wright 1966:398). There is little doubt that Byrd was describing abandoned Indian fields, and if this is the case, other Contact period villages post-dating the middle Saratown phase village also must be present in the vicinity. Otherwise, Byrd's grassy fields would have been ensconced by timber matured during the 50 to 70 years following the abandonment of the village. Today, most of the modern fields lying in the Sara's homeland are covered in permanent pasture, making it extremely difficult to locate these later Contact period villages.

From the data that we do have, the English presence had made little impact on the day-to-day lives of the Lower Saratown inhabitants. The subsistence remains point to a rich and varied diet relying heavily on wild plant and animal resources as well as maize agriculture. Turtles, mussels, and fish from the Dan River contributed significantly to Sara's diet as did deer, turkey, and bear. The overall impression is that the variety and balance between wild and domesticated food resources are more marked than at later sites such as Fredricks where the Occaneechi lived.

Domestic structures are very similar in size, shape, and construction techniques to other Contact period sites on the Dan River. However, at Upper Saratown where eleven houses have been uncovered, their configuration in plan is almost a perfect circle as opposed to the oval shape of the Lower Saratown houses. Oval or sub-rectangular houses are more common during the Contact period in the Eno and Haw drainages at sites such as Jenrette, Fredricks, and Mitchum. At Jenrette and Fredricks, wall posts were set in trenches instead of being individually placed. However, all the piedmont villages with architectural data point to the same basic wigwam-like or "bower" construction technique.

The features at Lower Saratown illustrate a striking similarity to those from other protohistoric and Contact period piedmont sites. Large earth ovens, rich in food remains and other domestic refuse, frequently occurred at Upper Saratown on the Dan, at the Jenrette site on the Eno, and at the George Rogers and Edgar Rodgers sites in the Haw drainage. That these facilities functioned primarily in a communal, ceremonial context shared by the inhabitants of all these sites is certainly speculative, but that they were used to prepare food for social units larger than the nuclear family cannot be easily disputed.

Large cylindrical storage facilities occur throughout the study area on prehistoric as well as Contact period sites. The one exception is the Wall site (31Or11) where only three small cylindrical pits occurred within an extensive excavation area. Petherick (1987:41) has suggested that these probably represent caching facilities, and that bulk storage took place in granaries or other above-ground facilities. Ward (1985) has further suggested that most, if not all, Siouan subterranean storage pits functioned primarily to hide or "cache" food and other belongings during times of hostility or when large segments of the population were engaged in hunting or other activities away from the villages.

The one burial excavated at Lower Saratown also reflects previously recognized mortuary patterns. The shaft-and-chamber pit, the flexed position of the skeleton, and the body orientation with the head pointed eastward are traits commonly found across the Piedmont. The shell, brass, and glass beads accompanying the subadult burial are also typical. During the Late Prehistoric period, child burials often were accompanied by shell beads and gorgets; during the later Contact period, these were replaced by glass or brass counterparts (Navey 1982; Ward 1987). Containing both shell and brass beads, the Lower Saratown grave seems to reflect a transition between these two patterns.

As stated earlier, there is little evidence from Lower Saratown to suggest that the European presence had any significant impact on its inhabitants. Peach pits, watermelon seeds, and evidence of other foreign plants are totally lacking. Also missing are the knives, guns, and iron axes frequently found on sites such as Fredricks and William Kluttz, occupied about 50 years later. Although our excavations were not extensive enough to draw definite conclusions, the inhabitants of Lower Saratown probably also had avoided the epidemics that accompanied the hordes of English traders who would soon arrive on the Carolina Piedmont.

Table 9.9. Summary of plant remains from Lower Saratown (weights in grams).

Sample	Soil Volume (liters)	Wood/Stem Charcoal	Cane	Unknown Plants	Roots or Tubers	Plant Food Remains	Total
Dan River Phase							
Feature 14							
Zone 1	10	4.89	-	0.24	-	0.88	6.01
Feature 18							
Zone 1	10	4.23	-	0.10	-	0.80	5.13
Feature 32							
Zone 1	10	5.64	-	0.23	0.02	0.40	6.29
Feature 41							
Zone 1	10	1.70	-	0.03	-	0.41	2.14
Sub-total	40	16.46	-	0.60	0.02	2.49	19.57
Middle Saratown Phase							
Feature 1							
Zone 1	10	10.42	0.01	0.06	-	0.25	10.74
Zone 2	10	5.71	0.05	0.12	-	0.37	6.25
Sub-total	20	16.13	0.06	0.18	-	0.63	17.00
Feature 2							
Zone 2	10	0.16	-	-	-	0.14	0.30
Feature 6							
Zone 1	20	16.64	0.07	0.50	<0.005	1.39	18.60
Feature 7							
Zone 1	10	3.50	0.06	0.07	-	0.21	3.84
Feature 8							
Zone 2	10	12.56	0.07	0.37	-	0.66	13.66
Zone 3	10	1.16	-	0.07	-	0.05	1.28
Sub-total	20	13.72	0.07	0.44	-	0.71	14.94
Feature 10							
Zone 1	10	3.04	-	0.02	-	3.13	6.19
Zone 2	10	2.26	-	0.13	-	1.25	3.64
Sub-total	20	5.30	-	0.15	-	4.38	9.83
Feature 11							
Zone 1	10	7.58	0.05	0.30	-	3.99	11.92
Zone 2	10	15.48	0.05	0.65	-	13.78	29.96
Zone 3	10	4.62	-	0.26	-	0.59	5.47
Sub-total	30	27.68	0.10	1.21	-	18.36	47.35
Feature 13							
Zone 1	10	2.17	-	0.10	-	0.25	2.52
Feature 15							
Zone 1	10	12.87	0.72	0.09	-	15.46	29.14
Feature 16							
Zone 1	10	4.19	15.84	0.30	-	15.72	36.05
Feature 17							
Zone 1	10	2.56	0.25	0.09	-	0.72	3.62
Feature 21							
Zone 1	10	9.83	24.27	0.18	-	39.15	73.43
Feature 24							
Zone 1	10	0.13	0.02	0.02	-	0.01	0.28
Zone 2	10	2.25	-	0.06	-	0.42	2.73
Sub-total	20	2.38	0.02	0.08	-	0.43	2.91

Table 9.9 Continued.

Sample	Soil Volume (liters)	Wood/Stem Charcoal	Cane	Unknown Plants	Roots or Tubers	Plant Food Remains	Total
Middle Saratown Phase (continued)							
Feature 25							
Zone 1	10	6.68	-	0.26	0.02	3.29	10.25
Feature 30							
Zone 1	10	8.91	0.11	1.20	-	22.31	32.54
Zone 2	10	8.25	0.10	0.25	<0.005	33.21	41.81
Sub-total	20	17.16	0.21	1.46	<0.005	55.52	74.35
Feature 31							
Zone 1	10	6.95	-	0.27	-	0.85	8.07
Feature 33							
Zone 1	10	1.34	-	0.16	-	1.26	2.76
Zone 2	10	7.87	-	0.14	-	1.32	9.33
Zone 3	10	0.10	-	-	-	0.04	0.14
Sub-total	30	9.31	-	0.30	-	2.62	12.23
Feature 34							
Zone 1	10	8.66	-	0.10	0.01	1.65	10.42
Feature 35							
Zone 1	10	5.28	0.01	0.08	-	0.41	5.78
Zone 2	10	1.06	<0.005	0.08	-	0.16	1.30
Sub-total	20	6.34	0.01	0.16	-	0.57	7.08
Feature 38							
Zone 1	10	3.38	-	0.03	-	0.52	3.93
Feature 39							
Zone 1	10	1.19	-	-	-	0.04	1.23
Feature 40							
Zone 1	10	2.25	0.04	0.16	-	0.50	2.95
Feature 45							
Zone 1	10	1.37	1.89	0.05	-	3.60	6.91
Feature 46							
Zone 1	10	7.41	0.08	0.62	-	2.23	10.34
Feature 20 (Burial 1)							
Zone 1	10	2.83	-	0.12	-	0.18	3.13
Zone 2	10	1.31	-	0.01	<0.005	0.20	1.52
Zone 3	20	1.52	-	0.08	-	0.15	1.75
Posthole	10	4.10	0.03	0.06	-	0.45	4.64
Sub-total	50	9.76	0.03	0.27	<0.005	0.98	11.04
Sub-total	400	197.59	43.72	7.07	0.03	169.92	418.32
Midden	20	3.81	-	0.02	-	0.38	4.21
Total	460	217.86	43.72	7.69	0.05	172.79	442.10

Table 9.10. Carbonized plant food remains from Lower Saratown (weights in grams).

Sample	Hickory Shell	Acorn Shell	Acorn Meat	Walnut Shell	Hazelnut Shell	Maize Kernels	Maize Cupules	Common Bean	Seeds	Other	Total
Dan River Phase											
Feature 14											
Zone 1	0.78	0.01	-	0.01	-	0.01	0.03	-	0.04	-	0.88
Feature 18											
Zone 1	0.72	<0.005	-	0.02	0.01	0.04	0.01	-	<0.005	-	0.80
Feature 32											
Zone 1	0.18	0.06	-	-	-	0.02	0.14	-	-	-	0.40
Feature 41											
Zone 1	0.23	0.03	-	-	-	0.08	0.07	-	-	-	0.41
Sub-total	1.91	0.10	-	0.03	0.01	0.15	0.25	-	0.04	-	2.49
Middle Saratown Phase											
Feature 1											
Zone 1	0.25	-	-	-	<0.005	-	-	-	<0.005	-	0.25
Zone 2	0.22	0.02	-	-	-	0.02	0.11	-	-	0.01	0.38
Sub-total	0.47	0.02	-	-	<0.005	0.02	0.11	-	<0.005	0.01	0.63
Feature 2											
Zone 2	0.13	0.01	-	-	-	-	-	-	-	-	0.14
Feature 6											
Zone 1	0.69	0.09	-	0.18	-	0.06	0.28	0.02	0.07	-	1.39
Feature 7											
Zone 1	0.16	0.01	-	-	-	0.02	0.02	<0.005	-	-	0.21
Feature 8											
Zone 2	0.28	0.04	0.06	0.15	-	0.01	0.12	-	<0.005	-	0.66
Zone 3	0.01	-	-	0.04	-	<0.005	<0.005	-	-	-	0.05
Sub-total	0.29	0.04	0.06	0.19	-	0.01	0.12	-	<0.005	-	0.71
Feature 10											
Zone 1	0.37	0.03	-	1.61	-	-	1.09	-	0.03	-	3.13
Zone 2	1.01	-	-	0.08	-	0.03	0.13	-	-	-	1.25
Sub-total	1.38	0.03	-	1.69	-	0.03	1.22	-	0.03	-	4.38
Feature 11											
Zone 1	2.67	0.02	-	1.19	-	-	0.02	-	0.09	-	3.99
Zone 2	11.29	0.01	-	1.82	-	0.30	0.03	-	0.33	-	12.78
Zone 3	0.41	<0.005	-	0.01	0.06	-	0.11	-	<0.005	-	0.59
Sub-total	14.37	0.03	-	3.02	0.06	0.30	0.16	-	0.42	-	18.36
Feature 13											
Zone 1	0.22	-	-	-	-	-	0.01	-	0.02	-	0.25
Feature 15											
Zone 1	-	-	-	-	-	0.01	15.44	-	0.01	-	15.46
Feature 16											
Zone 1	0.03	-	-	-	-	0.22	15.47	-	-	-	15.72
Feature 17											
Zone 1	0.62	0.04	-	-	-	0.01	-	-	0.05	-	0.72
Feature 20 (Burial 1)											
Zone 1	0.11	<0.005	-	-	-	0.01	0.05	-	0.01	-	0.18
Zone 2	0.15	-	-	-	-	0.03	0.02	-	<0.005	-	0.20
Zone 3	0.04	-	-	-	-	0.01	0.09	-	0.01	-	0.15
Posthole	0.10	<0.005	-	-	-	0.01	0.33	0.01	<0.005	-	0.45
Sub-total	0.40	<0.005	-	-	-	0.06	0.49	0.01	0.02	-	0.98

Table 9.10 Continued.

Sample	Hickory Shell	Acorn Shell	Acorn Meat	Walnut Shell	Hazelnut Shell	Maize Kernels	Maize Cupules	Common Bean	Seeds	Other	Total
Middle Saratown Phase (continued)											
Feature 21											
Zone 1	0.38	<0.005	-	2.99	0.01	0.07	35.63	-	0.07	-	39.15
Feature 24											
Zone 1	-	-	-	-	-	-	0.01	-	-	-	0.01
Zone 2	0.11	0.03	-	0.17	-	0.04	0.01	-	0.06	-	0.42
Sub-total	0.11	0.03	-	0.17	-	0.04	0.02	-	0.06	-	0.43
Feature 25											
Zone 1	2.75	0.01	0.02	0.41	-	0.01	0.09	-	-	-	3.29
Feature 30											
Zone 1	22.11	0.04	-	0.04	-	0.01	0.04	-	0.07	-	22.31
Zone 2	30.05	-	-	3.07	-	0.03	0.06	-	<0.005	-	33.21
Sub-total	52.16	0.04	-	3.11	-	0.04	0.10	-	0.07	-	55.52
Feature 31											
Zone 1	0.30	0.05	-	-	-	0.06	0.13	-	-	0.31	0.85
Feature 33											
Zone 1	0.48	0.01	-	0.38	-	<0.005	0.38	-	0.01	-	1.26
Zone 2	1.19	<0.005	-	-	-	0.01	0.12	-	<0.005	-	1.32
Zone 3	0.04	-	-	-	-	-	-	-	-	-	0.04
Sub-total	1.71	0.01	-	0.38	-	0.01	0.50	-	0.01	-	2.62
Feature 34											
Zone 1	1.22	0.04	-	0.23	0.01	0.02	0.13	<0.005	<0.005	-	1.65
Feature 35											
Zone 1	0.29	0.01	-	0.01	-	0.07	0.03	-	-	-	0.41
Zone 2	0.03	<0.005	-	0.05	-	0.01	0.06	0.01	<0.005	-	0.16
Sub-total	0.32	0.01	-	0.06	-	0.08	0.09	0.01	<0.005	-	0.57
Feature 38											
Zone 1	0.46	0.03	-	0.02	-	0.01	-	-	-	-	0.52
Feature 39											
Zone 1	0.03	-	-	-	-	-	0.01	-	-	-	0.04
Feature 40											
Zone 1	0.43	-	-	0.02	-	0.03	0.02	-	-	-	0.50
Feature 45											
Zone 1	0.18	-	-	-	-	0.04	3.38	-	-	-	3.60
Feature 46											
Zone 1	1.59	0.15	-	0.12	-	0.15	0.10	0.08	0.04	-	2.23
Sub-total	80.40	0.64	0.08	12.59	0.08	1.30	73.52	0.12	0.87	0.32	169.92
Midden	0.23	0.02	-	0.01	-	0.04	0.07	-	0.01	-	0.38
Total	821.54	0.76	0.08	12.63	0.09	1.49	73.84	0.12	0.92	0.32	172.79

Table 9.11. Seed and fruit counts from Lower Saratown.

Sample	Rag-weed	Cheno-pod	Poke?	May-pops	Persim-mon	Bram-ble	Grape	Common Bean	Maize Kernels	Spurge	Bed-straw	Legume family	Night-shade	Un-known	Total
Dan River Phase															
Feature 14															
Zone 1	-	-	-	-	-	-	2	-	1	-	-	-	-	2	5
Feature 18															
Zone 1	-	-	-	-	-	-	-	-	2	-	1	-	1	-	4
Feature 32															
Zone 1	-	-	-	-	-	-	-	-	2	-	-	-	-	-	2
Feature 41															
Zone 1	-	-	-	-	-	-	-	-	6	-	-	-	-	-	6
Sub-total	-	-	-	-	-	-	2	-	11	-	1	-	1	2	17
Middle Saratown Phase															
Feature 1															
Zone 1	-	-	-	-	-	-	2	-	1	-	-	-	-	-	3
Zone 2	-	-	-	-	-	-	-	-	3	-	-	-	-	-	3
Sub-total	-	-	-	-	-	-	2	-	4	-	-	-	-	-	6
Feature 6															
Zone 1	-	-	-	1	2	-	-	1	4	1	-	-	-	-	9
Feature 7															
Zone 1	-	-	-	-	-	-	-	-	1	-	-	-	-	1	2
Feature 8															
Zone 2	-	-	-	-	-	-	-	-	1	1	-	-	-	-	2
Zone 3	-	-	-	-	-	-	-	-	2	-	-	-	-	-	2
Sub-total	-	-	-	-	-	-	-	-	3	1	-	-	-	-	4
Feature 10															
Zone 1	-	-	-	-	-	6	2	-	-	-	6	-	-	3	17
Zone 2	-	-	-	-	-	-	-	1	2	-	-	-	-	-	3
Sub-total	-	-	-	-	-	6	2	1	2	-	6	-	-	3	20
Feature 11															
Zone 1	-	-	-	-	2	-	-	-	-	-	-	1	-	-	3
Zone 2	-	-	-	-	6	-	-	-	10	-	-	-	-	2	18
Zone 3	-	-	-	-	-	-	-	-	-	-	-	-	-	2	2
Sub-total	-	-	-	-	8	-	-	-	10	-	-	1	-	4	23
Feature 13															
Zone 1	-	-	-	-	-	-	1	-	-	-	1	-	-	-	2
Feature 15															
Zone 1	-	-	-	-	-	-	-	-	2	-	-	-	-	2	4
Feature 16															
Zone 1	-	-	-	-	-	-	-	-	16	-	-	-	-	-	16
Feature 17															
Zone 1	-	-	-	1	-	-	5	-	1	-	-	-	-	1	8
Feature 20 (Burial 1)															
Zone 1	-	-	-	1	-	-	-	-	2	-	-	-	-	-	3
Zone 2	-	-	-	-	-	-	-	-	3	-	-	-	1	-	4
Zone 3	2	-	-	-	-	-	1	-	1	-	-	-	-	-	4
Posthole	-	1	-	-	-	-	-	1	2	-	-	-	-	1	5
Sub-total	2	1	-	1	-	-	1	1	8	-	-	-	1	1	16
Feature 21															
Zone 1	-	-	-	1	1	-	1	-	3	-	-	-	-	1	7
Feature 24															
Zone 2	-	-	-	-	1	-	-	-	2	-	-	-	-	-	3
Feature 25															
Zone 1	-	-	-	-	-	-	-	-	1	-	-	-	-	-	1
Feature 30															
Zone 1	-	-	-	-	1	-	3	1	2	1	-	-	-	3	11
Zone 2	-	-	-	-	-	1	-	-	3	-	1	1	-	4	10
Sub-total	-	-	-	-	1	1	3	1	5	1	1	1	-	7	21
Feature 31															
Zone 1	-	-	-	-	-	-	-	-	3	-	-	-	-	-	3

Table 9.11 Continued.

Sample	Rag-weed	Cheno-pod	Poke?	May-pops	Persim-mon	Bram-ble	Grape	Common Bean	Maize Kernels	Spurge	Bed-straw	Legume family	Night-shade	Un-known	Total
Middle Saratown Phase (continued)															
Feature 33															
Zone 1	-	-	-	-	-	-	1	-	1	-	-	-	-	-	2
Zone 2	-	-	-	-	-	-	-	-	2	-	-	-	-	1	3
Sub-total	-	-	-	-	-	-	1	-	3	-	-	-	-	1	5
Feature 34															
Zone 1	-	-	-	1	-	1	-	-	2	-	-	-	-	1	5
Feature 35															
Zone 1	-	-	-	-	-	-	-	-	2	-	-	-	-	-	2
Zone 2	-	-	-	-	-	-	2	-	1	-	-	-	-	1	4
Sub-total	-	-	-	-	-	-	2	-	3	-	-	-	-	1	6
Feature 40															
Zone 1	-	-	-	-	-	-	-	-	2	-	-	-	-	-	2
Feature 45															
Zone 1	-	-	-	-	-	-	-	-	4	-	-	-	-	-	4
Feature 46															
Zone 1	-	-	1	-	1	-	-	1	4	-	-	-	-	1	8
Sub-total	2	1	1	5	14	8	18	5	83	3	8	2	1	24	175
Midden	-	-	-	-	-	-	-	-	3	-	-	-	-	5	8
Total	2	1	1	5	14	8	20	5	97	3	9	2	2	31	200

Table 9.12. Ubiquity of plant foods from middle Saratown phase features at Lower Saratown.

Plant Food	No. of 10-Liter Samples	%	No. of Features	%
Maize	39	92.9	25	96.2
Hickory	39	92.9	25	96.2
Acorn	26	61.9	20	76.9
Walnut	21	50.0	14	53.8
Grape	9	21.4	9	34.6
Persimmon	8	19.0	5	19.2
Bean	6	14.3	6	23.1
Maypops	5	11.9	5	19.2
Hazelnut	4	9.5	4	15.4
Spurge	3	7.1	3	11.5
Bramble	3	7.1	3	11.5
Bedstraw	3	7.1	3	11.5
Ragweed	1	2.4	1	3.8
Poke	1	2.4	1	3.8
Pepo	1	2.4	1	3.8
Chestnut	1	2.4	1	3.8
Chenopod	1	2.4	1	3.8
Total	42		26	

Chapter 10

The Powerplant Site

The Powerplant site (RLA-Rk5; 31Rk5) is located in Rockingham County, North Carolina, within the same large expanse of bottomland that contains Lower Saratown. It lies on the south side of the Dan River directly across from a large electric generating station operated by Duke Power Company, approximately 0.5 mi upstream from Lower Saratown. The Powerplant site was discovered by Bennie Keel in 1967 during routine archaeological reconnaissance for the Research Laboratories of Anthropology. On the site form Keel filled out, he stated that although only one chip was found, "this area could potentially contain a good site" (Site files, Research Laboratories of Anthropology, UNC).

Records indicate that no personnel from the University of North Carolina revisited the site until it was brought to our attention in 1987. At that time, local collectors informed us that intact cultural deposits were eroding out of the river bank adjacent to the site. Our initial visit verified that severe soil erosion had occurred both upstream and downstream from the site, and that two-thirds of the village probably had been washed away. Artifacts (primarily potsherds) from the surface and along the eroding bank indicated that a small, early Dan River phase settlement was present. The surface scatter also indicated that an area approximately 40 ft wide and 100 ft long probably was all that remained of the site.

Given that the site was rapidly being destroyed and that it appeared to represent an early, single component, Dan River phase village, we felt that it was important to excavate as much of it as possible. Auger testing was not deemed necessary prior to excavation because of the restricted area of occupation and the presence of subsurface features eroding out of the adjacent riverbank.

The excavation block consisted of a 20-ft by 80-ft trench with two small insets to permit feature exposures (Figures 10.1, 10.2, and 10.3). The trench was located as close to the bank as possible because this was an area of known feature concentration; however, we did not cut through the bank for fear of accelerating the erosion process. As expected, the trench exposed numerous archaeological features (Figure 10.4); and of these, 20 early Dan River phase pits, six probable early Saratown phase pits, two pits of indeterminate cultural association, and one human burial were excavated.

Stratigraphy

The Powerplant site is located on very sandy soil comprising a natural levee of the Dan River (Figure 10.5). Soil maps describe it as a fine sandy loam; however, field observation indicates that the soil is closer to a loamy sand in texture. The subsoil is a grayish tan sand with considerable mottling near its interface with the plowzone. Although the grayish brown plowzone averaged around 0.8 ft in thickness, it was often necessary to excavate an additional 0.2–0.4 ft into the subsoil in order to clearly define pit features. The sandy character of the soil also necessitated frequent wetting to bring out the soil color contrast required to recognize intrusive pits. Because of excessive leaching, the organic content of the pits was not nearly as rich as is typical on piedmont village sites.

Features and Burials

Forty-three features and two burials were recorded at the base of plowzone. Twenty-eight of the pit features and one burial were excavated. The remainder extended beyond the limits of the excavation and were only mapped. Six excavated features (Features 5, 9, 11, 14, 19, and 27) contained artifacts that suggest their association with an early Saratown phase occupation of the site; the remainder are attributed to an early Dan River phase occupation. Although most features were cylindrical storage pits that had been dug deep into the subsoil sand, a few large, shallow basins also were excavated. Fill from these contexts was carefully waterscreened through 1/2-inch, 1/4-inch, and 1/16-inch mesh to retrieve artifacts and subsistence remains. Standard-sized soil samples also were collected and processed by flotation to recover archaeobotanical remains. Features and burials recorded at the Powerplant site are summarized in Table 10.1 and described below.

Feature 1

This feature appeared at the base of the plowzone as a nearly circular stain of dark brown (7.5YR 3/4) sand with flecks of charcoal and pockets of pure ash. It was located in the center of the excavation trench and was intruded by Feature 12. Cultural remains included

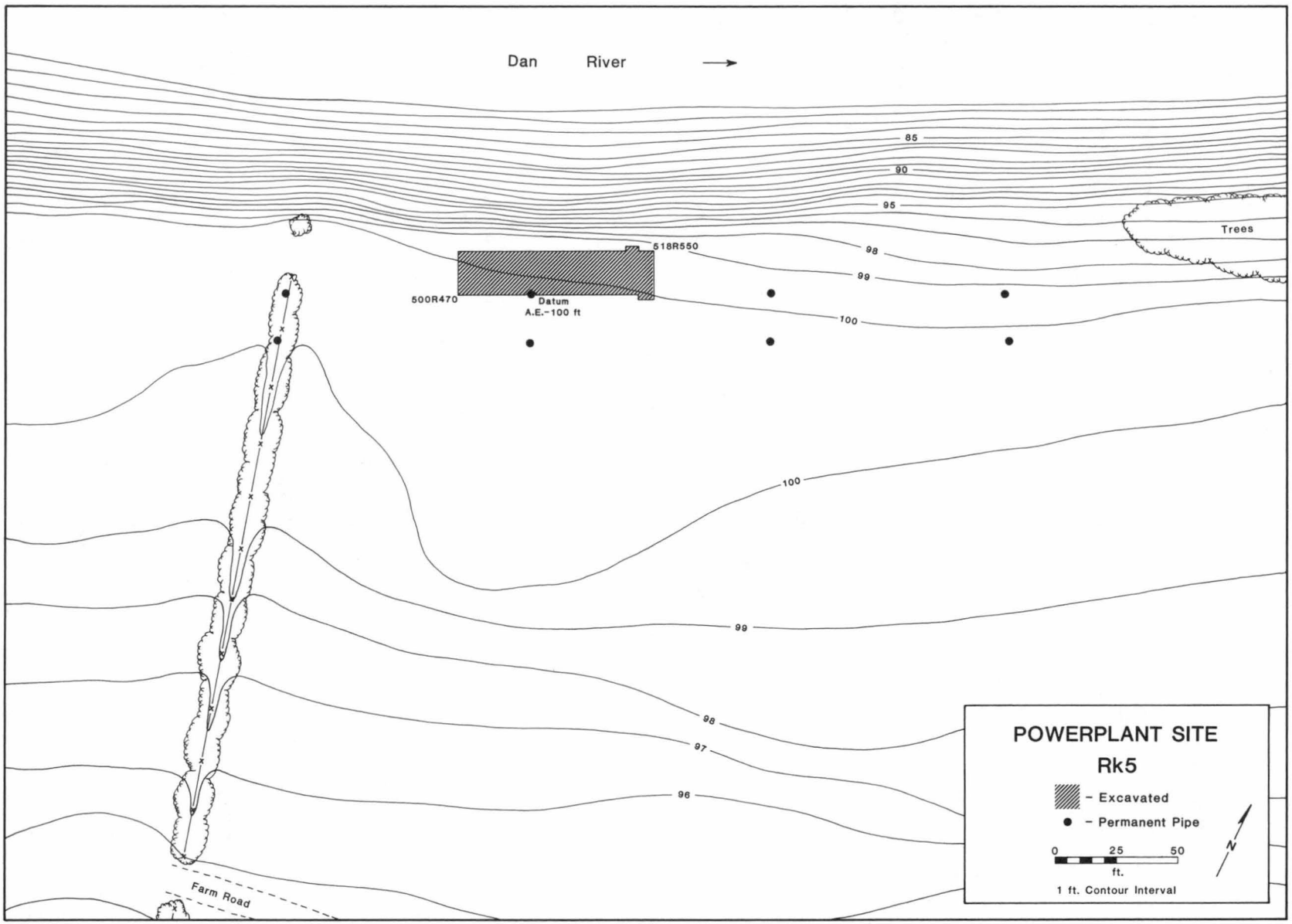

Figure 10.1. Map of the Powerplant site showing the area of excavation.

Figure 10.2. Beginning excavation at the Powerplant site.

Figure 10.3. Removing the plowzone at the Powerplant site.

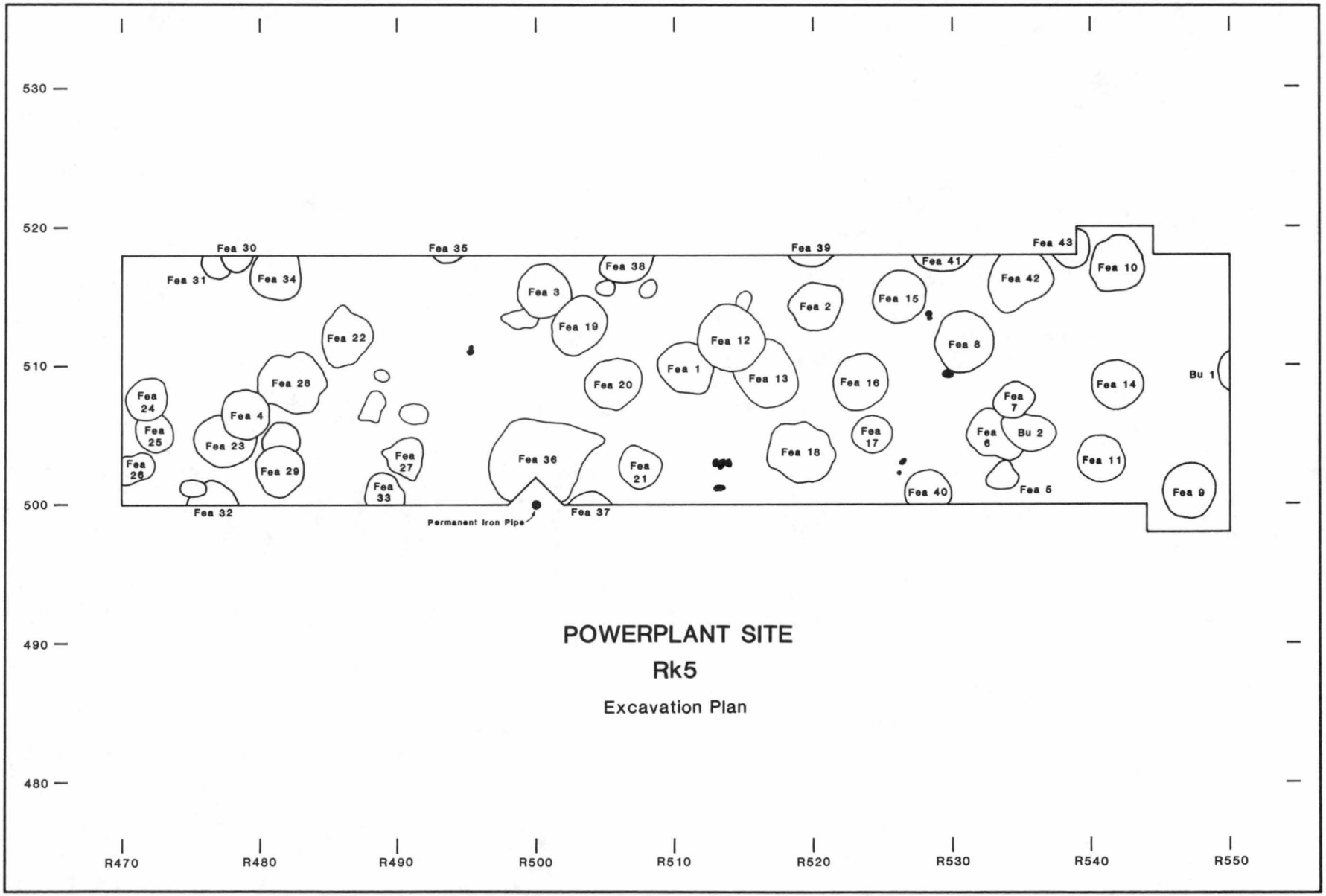

Figure 10.4. Excavation plan at the Powerplant site.

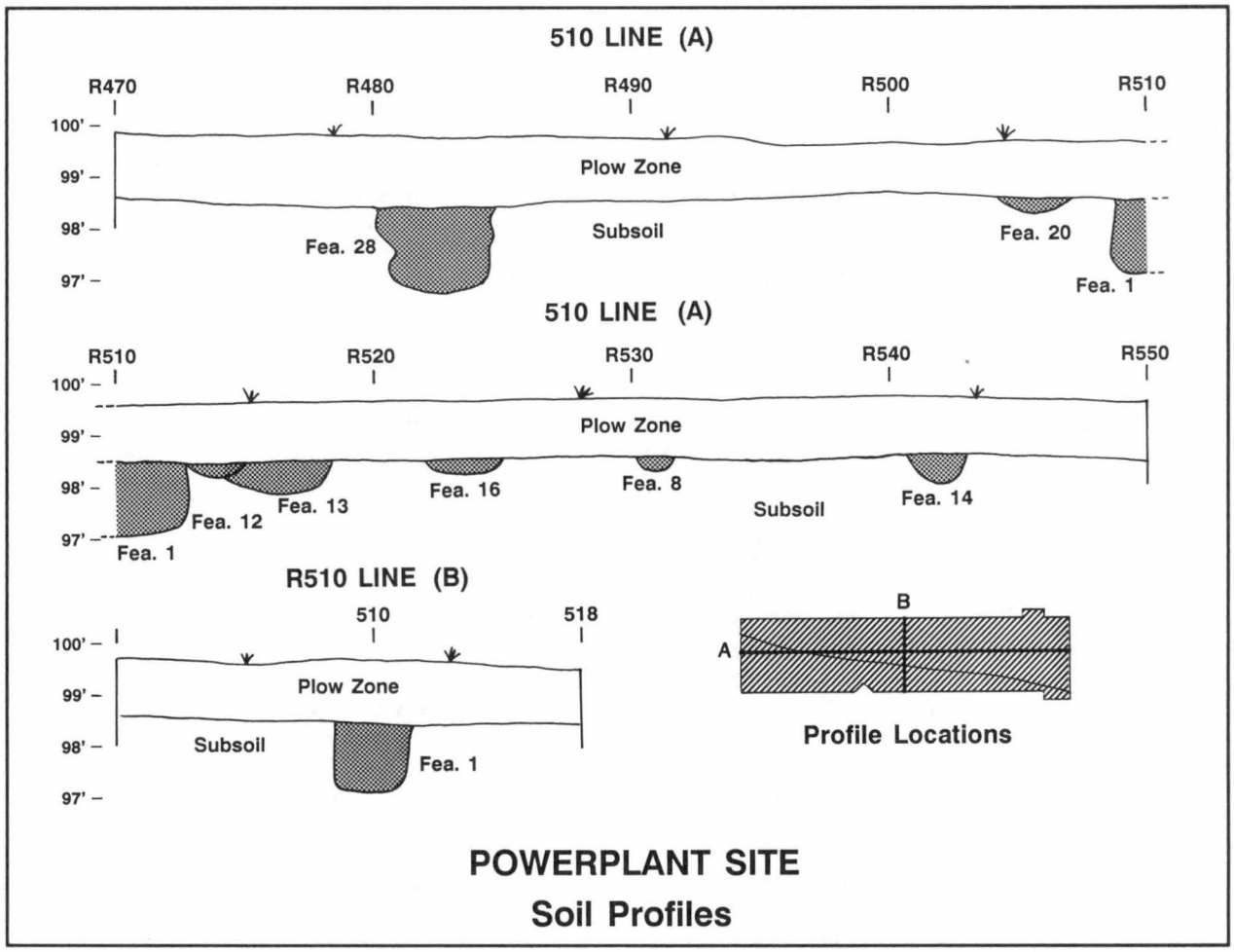

Figure 10.5. Stratigraphic profiles.

several snail and mussel shells concentrated in the upper part of the fill. Although most potsherds also were found in the upper levels of the fill, several sherds were found with fist-sized ash pockets deeper in the pit. An assortment of deer bones and an antler were recovered from the bottom of the feature. A few fire-cracked rocks and pebbles were scattered throughout the single fill zone. After excavation, the pit had a cuspidor-like profile and a rounded, concave bottom (Figure 10.6). It extended 1.4 ft below the subsoil surface. The feature's original function may have been to store or cache food, equipment, and other commodities. It appears to have been quickly refilled with discarded faunal remains and then covered with village humus, including the residue from fires or hearths. Additional food and domestic residue was either used to cap off the top of the pit or added once the original fill slumped.

Feature 2

This facility was located in the east-central portion of the excavation and also was nearly circular at the top of the subsoil, measuring 3.5 ft by 4.0 ft (Figure 10.7). The dark brown (7.5YR 3/2) sandy fill was very similar to that of Feature 1 and contained pottery sherds, mussel and snail shells, animal bones including deer and turkey, and a deer antler flaker. Charcoal deposits also were noted. Most of the cultural remains were concentrated in the southern third of the pit, which measured only 0.8 ft in depth. The walls were straight to slightly insloping near the flat bottom. It is difficult to posit the primary function of this shallow cylindrical facility; however, it appears to have been rapidly filled with village humus that contained some refuse resulting from food preparation and consumption.

Feature 3

Feature 3 was another circular pit located in the central area of the excavation trench. At the subsoil surface, it measured a little over 3.7 ft in diameter (Figure 10.8). Feature 3 contained a single fill zone comprised of a dark brown (10YR 4/3) sandy loam with flecks of charcoal and burned clay. In the northwest corner of the pit was a concentration of burned soil that contained several charred animal bone frag-

Table 10.1. Summary of features identified at the Powerplant site.

Feature No.	Type	Center Location	Dimensions (ft) L	W	D	Phase Association	Comment
Fea. 1	Storage Pit	510.0R510.5	3.9	3.6	1.4	Dan River	Excavated
Fea. 2	Pit	514.2R520.2	3.9	3.5	0.8	Dan River	Excavated
Fea. 3	Storage Pit	515.2R500.5	3.8	3.7	1.3	Dan River	Excavated
Fea. 4	Pit	506.5R479.0	3.8	3.6	0.9	Dan River	Excavated
Fea. 5	Basin	502.0R533.5	2.2	2.2	0.2	Early Saratown ?	Excavated
Fea. 6	Storage Pit	505.2R532.7	4.2	3.4	1.0	Dan River	Excavated
Fea. 7	Basin	507.2R534.5	2.9	2.6	0.3	Dan River	Excavated
Fea. 8	Storage Pit	511.7R530.7	4.3	4.3	1.2	Dan River	Excavated
Fea. 9	Storage Pit	501.0R547.0	4.0	3.8	1.5	Early Saratown ?	Excavated
Fea. 10	Storage Pit	517.2R541.7	4.1	3.8	1.0	Dan River	Excavated
Fea. 11	Storage Pit	503.2R540.7	3.6	3.5	2.9	Early Saratown ?	Excavated
Fea. 12	Food Prep. Facility	511.7R513.5	5.4	4.5	0.6	Dan River	Excavated
Fea. 13	Food Prep. Facility	509.5R516.5	6.2	6.0	1.2	Dan River	Excavated
Fea. 14	Storage Pit ?	508.5R542.0	3.9	3.5	1.3	Early Saratown ?	Excavated
Fea. 15	Storage Pit	515.0R526.3	3.9	3.8	2.1	Dan River	Excavated
Fea. 16	Basin	509.0R523.5	4.2	1.0	0.5	Dan River	Excavated
Fea. 17	Burial ?	505.0R524.2	3.0	2.7	-	Indeterminate	Mapped
Fea. 18	Storage Pit	503.5R519.2	4.9	4.5	2.4	Dan River	Excavated
Fea. 19	Food Prep. Facility	513.0R503.2	4.0	3.6	0.7	Early Saratown ?	Excavated
Fea. 20	Basin	508.7R505.5	4.3	3.5	0.6	Indeterminate	Excavated
Fea. 21	Basin	502.5R507.5	3.1	3.1	0.4	Dan River	Excavated
Fea. 22	Storage Pit	512.0R486.2	4.0	3.7	1.3	Indeterminate	Excavated
Fea. 23	Pit ?	504.7R477.5	4.6	3.8	-	Indeterminate	Mapped
Fea. 24	Storage Pit ?	507.5R472.0	3.2	3.2	0.9	Dan River	Excavated
Fea. 25	Storage Pit ?	505.2R472.2	2.8	2.7	0.8	Dan River	Excavated
Fea. 26	Basin ?	502.8R471.0	3.0	2.0	-	Indeterminate	Mapped
Fea. 27	Food Prep. Facility	504.7R490.7	2.9	2.8	0.5	Early Saratown ?	Excavated
Fea. 28	Storage Pit	508.8R482.2	4.7	4.6	1.7	Dan River	Excavated
Fea. 29	Storage Pit	502.5R481.5	3.8	3.5	2.3	Dan River	Excavated
Fea. 30	Basin	518.0R478.2	2.2	2.2	0.5	Dan River	Excavated
Fea. 31	Basin	517.5R477.0	2.2	2.2	0.4	Dan River	Excavated
Fea. 32	Pit ?	499.5R476.5	4.0	4.0	-	Indeterminate	Mapped
Fea. 33	Pit ?	501.0R489.0	3.0	2.7	-	Indeterminate	Mapped
Fea. 34	Pit ?	511.5R481.0	3.5	3.5	-	Indeterminate	Mapped
Fea. 35	Pit ?	518.5R493.5	3.0	3.0	-	Indeterminate	Mapped
Fea. 36	Large Basin ?	503.0R500.0	6.0	6.0	-	Indeterminate	Mapped
Fea. 37	Pit ?	499.2R504.0	3.5	3.5	-	Indeterminate	Mapped
Fea. 38	Pit ?	517.5R506.5	3.5	3.0	-	Indeterminate	Mapped
Fea. 39	Pit ?	518.7R519.7	3.5	3.5	-	Indeterminate	Mapped
Fea. 40	Pit ?	501.0R528.2	3.3	3.0	-	Indeterminate	Mapped
Fea. 41	Pit ?	518.7R529.2	4.0	4.0	-	Indeterminate	Mapped
Fea. 42	Pit ?	516.5R535.0	4.5	4.0	-	Indeterminate	Mapped
Fea. 43	Pit ?	518.5R538.5	3.0	3.0	-	Indeterminate	Mapped
Bu. 1	Burial	509.5R550.0	3.0	3.0	0.3	Indeterminate	Mapped
Bu. 2	Burial	505.2R535.5	4.1	2.7	1.6	Dan River ?	Excavated

ments. The remainder of the fill contained scattered fragments of burned and unburned bones, potsherds, lithic debitage, mussel shells, fire-cracked rock, and bits of charcoal and fired clay. The feature extended to a depth of 1.3 ft below the subsoil surface. The walls were generally straight but sometimes bowed out near the flat bottom. Feature 3 appears to represent a storage facility that was rapidly refilled with domestic refuse, some of which came from cooking areas.

Feature 4

This circular pit intruded Features 23 and 28 at the western end of the excavation trench. It measured 3.6 ft by 3.8 ft and after excavation was 0.9 ft deep (Figure 10.9). The pit walls sloped inward and the bottom was flat. The single fill zone was defined by a very dark grayish brown (10YR 3/2), sandy soil that contained a random mixture of pottery sherds, flakes, charcoal fragments, and fire-cracked rock. Only a few

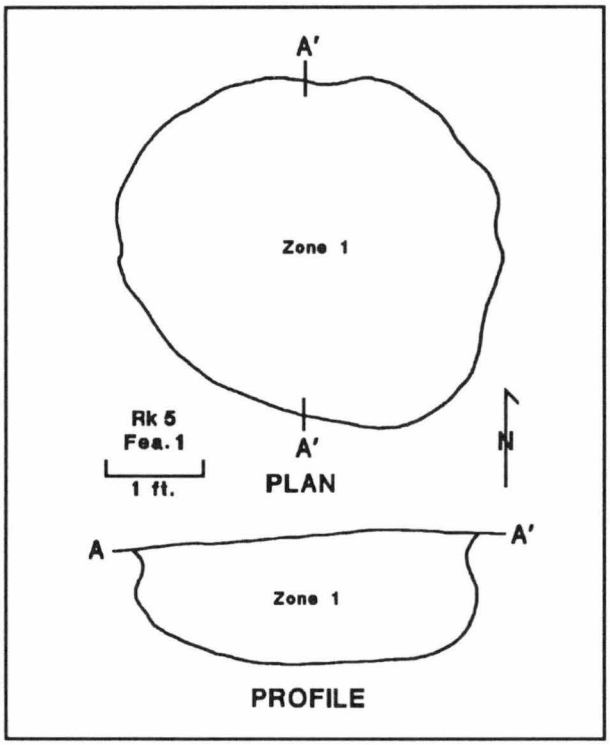

Figure 10.6. Feature 1, plan view and profile drawings.

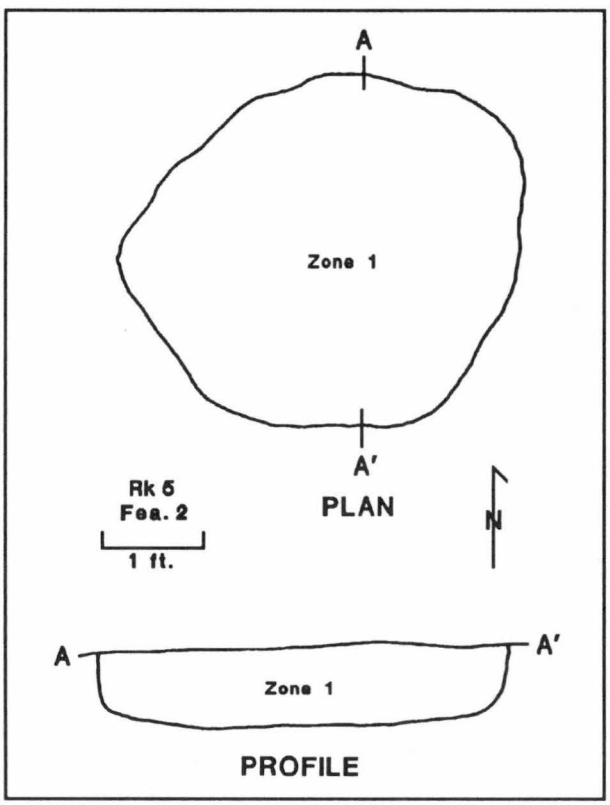

Figure 10.7. Feature 2, plan view and profile drawings.

small animal bones were recovered, and no mussel or snail shells were found. Although not as deep or as rich as Feature 3, this facility probably had a similar history of use and abandonment.

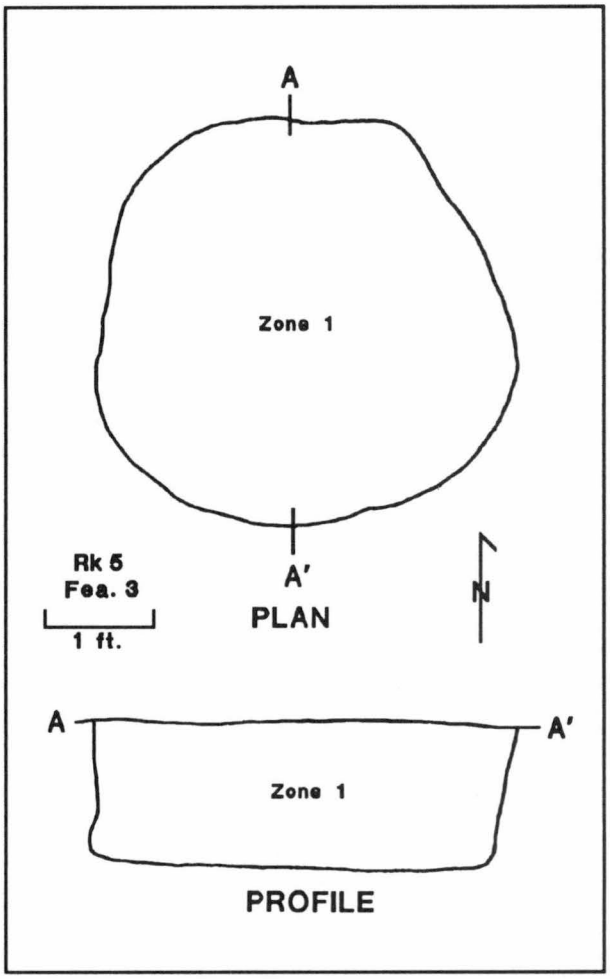

Figure 10.8. Feature 3, plan view and profile drawings.

Feature 5

Feature 5 was a shallow, basin-shaped facility located at the eastern end of the excavation. The dark reddish brown (5YR 3/2) fill contained a few flecks of charcoal and a small number of potsherds and lithic material. Feature 5 measured 2.9 ft by 2.3 ft in plan view and extended only a little over 0.1 ft into the subsoil. It may represent an unconformity in the original site surface where village humus was protected from plow action.

Feature 6

This feature, located in the eastern area of the excavation trench, was intruded by Feature 7 and Burial 2. It was ovoid in outline, measured 4.2 ft by 3.4 ft, and extended to a depth of 1.0 ft (Figure 10.10). The sides sloped inward to intersect a flat bottom. The fill consisted of two zones. Zone 1 represented a small pocket of dark, almost black (7.5YR 2/0) soil next to the chamber of Burial 2. This

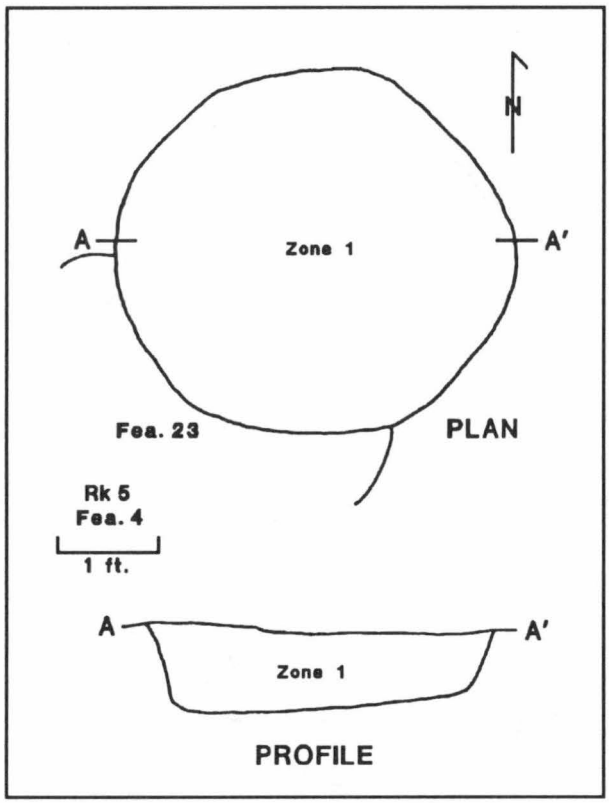

Figure 10.9. Feature 4, plan view and profile drawings.

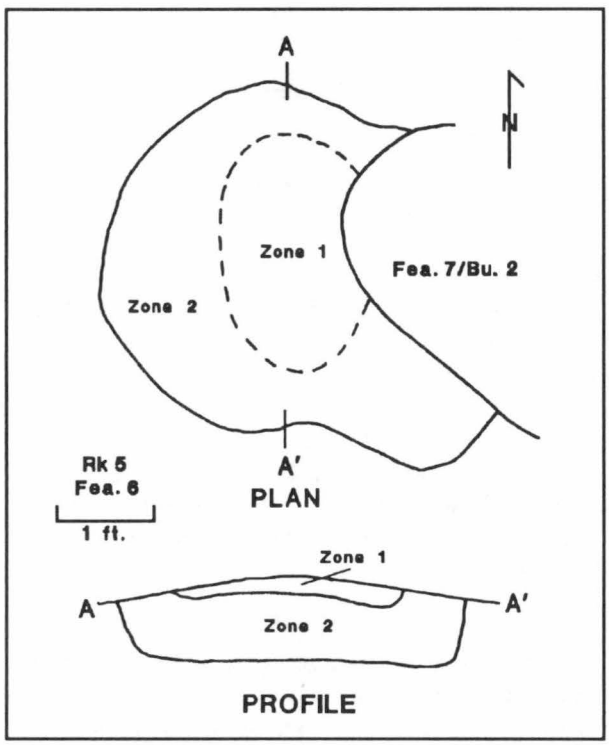

Figure 10.10. Feature 6, plan view and profile drawings.

fill contained a concentration of net impressed sherds, fired clay, charcoal, and several smooth pebbles. Zone

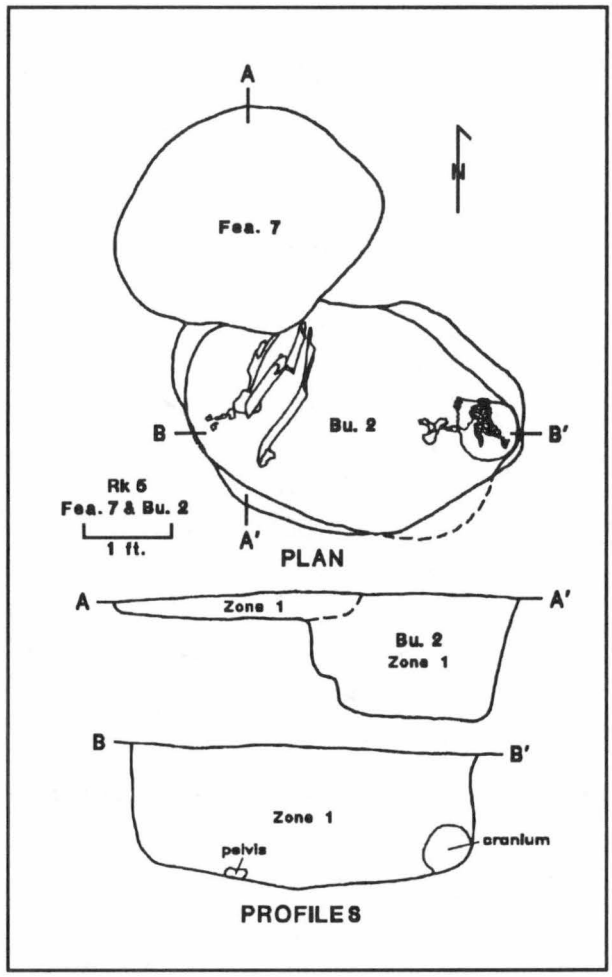

Figure 10.11. Feature 7 and Burial 2, plan view and profile drawings.

2 soil, a dark brown (10YR 4/3) mottled sand, filled most of the pit. This zone contained pottery sherds, a few animal bones, shell fragments, and fire-cracked rock. It was very similar to the fill of Features 1, 2, 3, and 4. Zone 2 fill suggests a storage facility refilled with domestic refuse. Zone 1 may reflect activities associated with Burial 2 or a separate dumping episode during the final filling of Feature 6.

Feature 7

This designation was assigned to what was originally thought to be a shaft-and-chamber burial. However, after excavation it seemed more likely that two distinct facilities were represented. Feature 7 was a shallow basin containing a dark brown (10YR 4/3) sandy fill with a few small bones, potsherds, and flecks of charcoal. Apparently this basin intruded Burial 2. After excavation, Feature 7 measured 2.9 ft by 2.6 ft and was only 0.3 ft deep (Figure 10.11).

Feature 8

This large, circular pit was located just north of

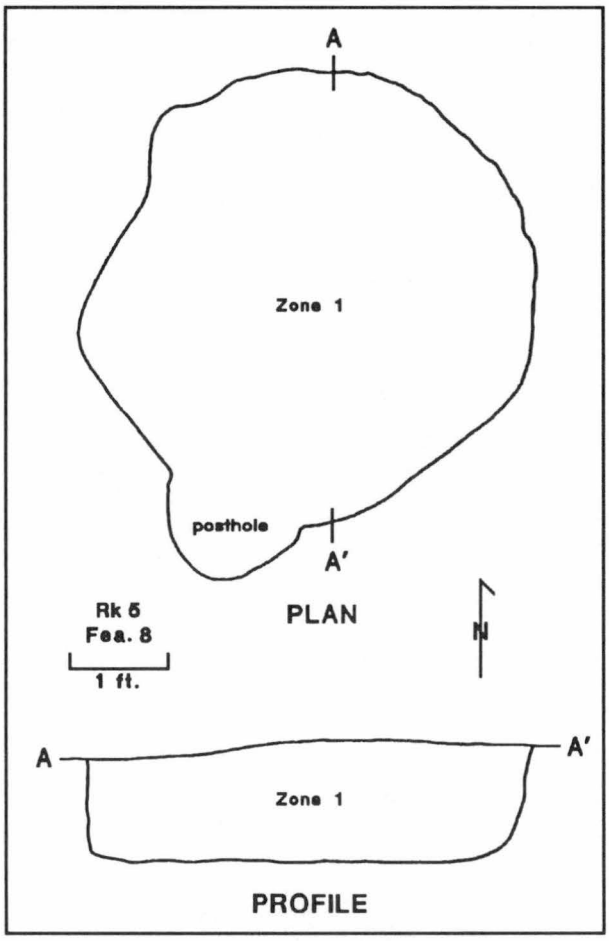

Figure 10.12. Feature 8, plan view and profile drawings.

Feature 6 and measured 4.3 ft in diameter at the surface of the subsoil. The fill consisted of a single zone of dark brown (10YR 3/3) sand with flecks of charcoal. A few large net impressed sherds, bone fragments, and flakes were recovered from the upper portions of the pit. Except for a few small bone fragments, the remainder of the fill was sterile. After excavation, Feature 8 measured 1.2 ft in depth and had generally straight sides and a flat bottom (Figure 10.12). No doubt this pit was excavated as a storage facility. After abandonment, it was rapidly filled with surface soil containing little cultural debris. The fill in the upper portion of the pit probably resulted from a later filling episode, perhaps after the original fill had settled and slumped. This final deposit appears to have resulted from the collection and disposal of domestic refuse.

Feature 9

Another large circular feature, Feature 9, was uncovered in the southeastern corner of the excavation area (Figure 10.13). The fill was a dark yellowish brown (10YR4/4) sandy soil and contained a large quantity of charcoal fragments, particularly in the lower levels. The upper portion of the pit produced

Figure 10.13. Feature 9, before excavation (arrow points south).

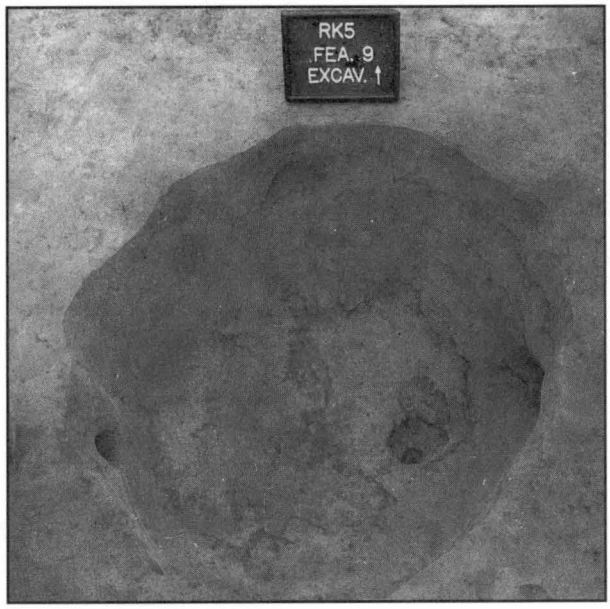

Figure 10.14. Feature 9, excavated.

several freshwater mussel shells and bits of fired clay. A few small pottery sherds and bone fragments were scattered throughout the feature, and a single blue glass trade bead also was found. A large fragment of a deer mandible was recovered from the bottom of the pit. After excavation, Feature 9 measured 3.8 ft by 4.0 ft and was 1.5 ft deep (Figures 10.14 and 10.15). The walls sloped inward at the bottom except along the southern edge where they were straight. The bottom dipped slightly in the southern half of the pit. Again, storage or concealment was probably the primary

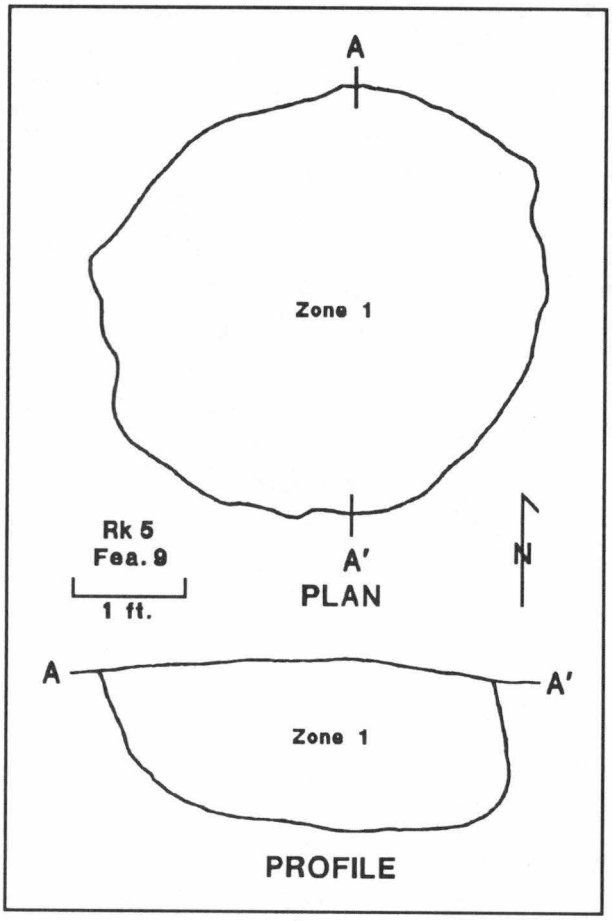

Figure 10.15. Feature 9, plan view and profile drawings.

function of this facility. The large amount of charcoal near the bottom suggests an episode of *in situ* burning prior to the final filling with soil and refuse from domestic activities.

Feature 10

This large circular pit was located at the eastern end of the excavation area in the northwest corner of Sq. 510R540 (Figure 10.16). The single fill zone was a dark brown (10YR 3/3) sandy soil that extended to a depth of 1.0 ft. The artifact content was relatively sparse with a few sherds, flakes, and small bone and charcoal fragments occurring near the top of the pit. After excavation, it measured 4.1 ft by 3.8 ft in diameter (Figures 10.17 and 10.18). In profile, the facility has a "cuspidor" shape with the walls bowing outward near the bottom. The original function of the pit was probably storage or curation. It was apparently filled rapidly after no longer being suited for this purpose. The fill appears to have come from surface soil in the near vicinity. The concentration of cultural remains in the upper portion of the fill zone suggests either a deposit of domestic refuse after the original fill slumped or material trampled into the pit fill as a consequence of day-to-day village activities.

Figure 10.16. Feature 10, before excavation.

Figure 10.17. Feature 10, excavated.

Feature 11

This large, deep, circular feature was located near Feature 9 in the eastern portion of the excavation. At the subsoil surface, it measured a little over 3.5 ft in diameter and, after excavation, extended to a depth of 3.0 ft beneath the subsoil surface (Figure 10.19). Fill consisted of a single zone of dark brown sand (10YR 3.3), similar to that of Feature 10. The first 0.5 ft of fill contained numerous potsherds, animal bones (including whole specimens), bits of clay, and chunks of charcoal. The middle portion of the fill contained

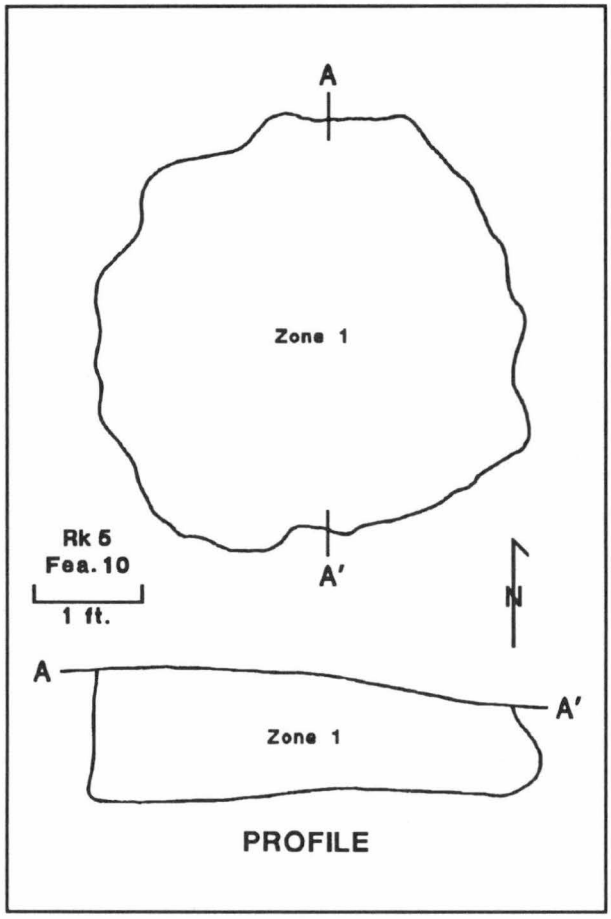

Figure 10.18. Feature 10, plan view and profile drawings.

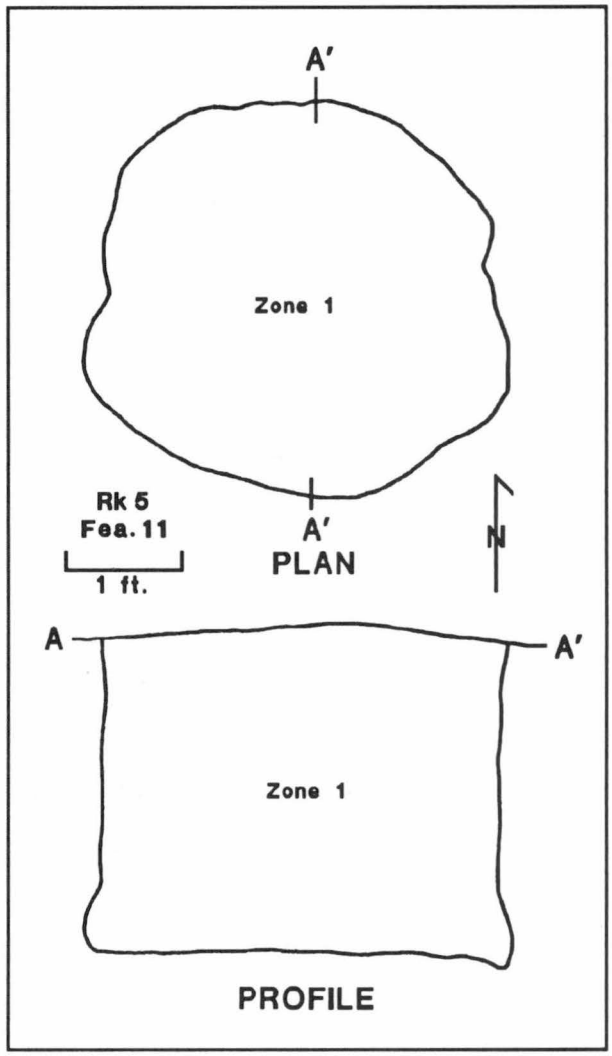

Figure 10.19. Feature 11, plan view and profile drawings.

relatively fewer artifacts; however, the charcoal continued to occur. Near the bottom of the feature, the density of potsherds and animal bone increased and was comparable to that of the upper level. Feature 11 had straight walls that bowed outward slightly at the bottom which was flat. It, no doubt, originally functioned as a storage pit. Although the consistency and color of the fill from Feature 11 were similar to that of Feature 10, the artifact content and distribution were not. Feature 11 also was filled rapidly but with soil from areas of more intense domestic activity. The large amount of charcoal and the animal bones suggest the fill came from an area around a hearth or some other food preparation facility.

Feature 12

Intruding Features 1 and 13, Feature 12 was a shallow, basin-shaped pit that measured 5.4 ft by 4.5 ft across and was 0.6 ft deep after excavation. Two fill zones were identified at the subsoil surface. Zone 1 was a brown (10YR 5/3) sand that covered most of the pit; Zone 2 was defined as a patch of dark yellowish brown (10YR 4/4) sand in the southern part of the facility, between Features 1 and 13. The two zones were very similar, although Zone 1 produced most of the cultural materials including potsherds, animal bones, freshwater mussel and snail shells, and fire-cracked rocks and pebbles. The depth and configuration of the feature would seem to preclude its use as a storage pit. The fill contents, if in primary association, would suggest an earth oven or some other food preparation facility. However, if the fill represents redeposition and resides in secondary context, the original function of this facility will remain enigmatic.

Feature 13

This large, shallow, basin-shaped facility, located near the center of the excavation trench, was intruded by Feature 12. It contained a single fill zone of dark brown (7.5YR 3/2) mottled sand with flecks of charcoal and fired clay. This matrix produced numerous potsherds and large quantities of snail and mussel shells. Animal bones, including a deer metatarsal beamer and the intact skeleton of a small rodent, were also prevalent as were fragments of fire-cracked rocks. After excavation, the pit measured 6.2 ft by 6.0 ft and

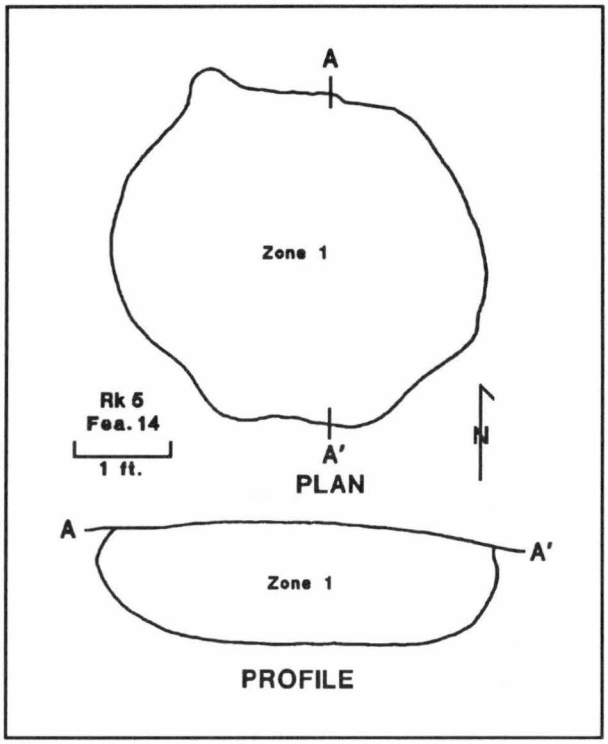

Figure 10.20. Feature 14, plan view and profile drawings.

was 1.3 ft deep in the center. Perhaps Feature 13 also served as a food preparation facility similar to Feature 12.

Feature 14

This designation was assigned to a circular pit located in the eastern end of the excavation and south of Feature 10. The fill consisted of a single zone of dark brown (10YR 3/3) sand with flecks of charcoal. Few artifacts except for small fragments of fire-cracked rocks were recovered. Seven small fire-broken quartz rocks were found lying together on the bottom of the pit. The dimensions of the pit were 3.5 ft by 3.9 ft in diameter and 1.3 ft in depth (Figure 10.20). The sides sloped inward at the bottom, creating a deep basin-shaped profile. Although the size of the pit suggests an abandoned storage unit, the fire-cracked rock fragments in the fill in conjunction with the rock concentration on the bottom of the pit suggest a pit hearth or similar food preparation facility. Of course, this latter interpretation assumes the fill contents to represent primary rather than secondary deposition.

Feature 15

Located east of Feature 2 was a circular pit that measured 3.9 ft in diameter. It also was filled with a single soil matrix that contained little cultural material. The dark brown (10YR 4/3) sand was homogeneous throughout and, except for a few sherds and small fragments of animal bone, was sterile. The pit reached a depth of 2.1 ft beneath the subsoil surface and had

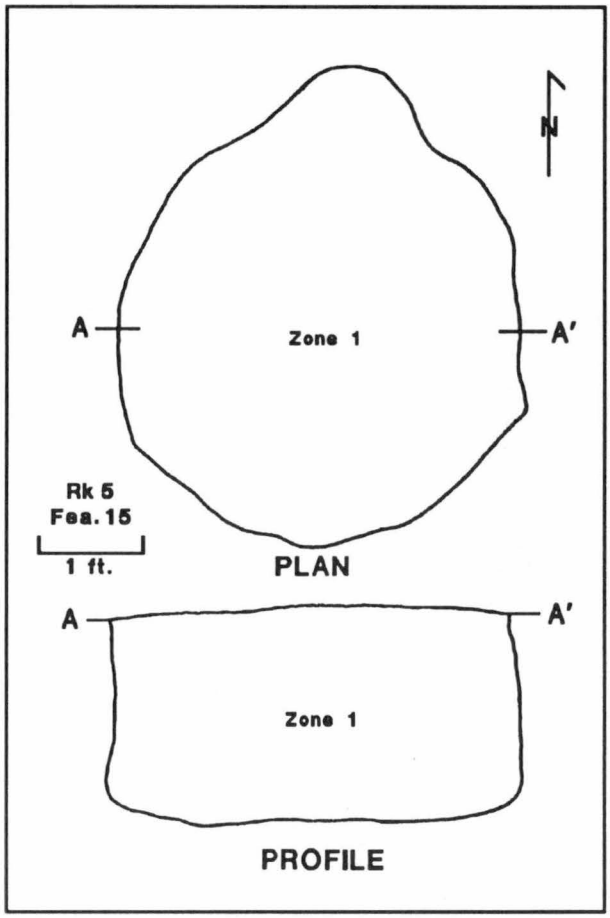

Figure 10.21. Feature 15, plan view and profile drawings.

generally straight sides and a flat bottom (Figure 10.21). Its configuration and size indicate a storage facility, and the contents point to the rapid and intentional filling of the pit with village humus after it was not longer suited for its original function.

Feature 16

This shallow, basin-shaped feature was located near Feature 2 in the east-central area of excavation. The thin zone of dark yellowish brown (10YR 4/4) sand contained only a few small potsherds and fire-cracked rocks. After excavation, the pit measured 4.2 ft in diameter and was only 0.5 ft deep. Feature 16 may represent nothing more than a natural depression that collected topsoil at some point during the site's occupation.

Feature 17

This number was assigned to a circular stain of dark brown fill with a lighter pocket of mottled fill along its southeastern edge. On the subsoil surface the feature measured a little over 3.0 ft in diameter. Because of the configuration of the surface fill, Feature 17 may represent a shaft-and-chamber burial. It was not excavated due to time constraints.

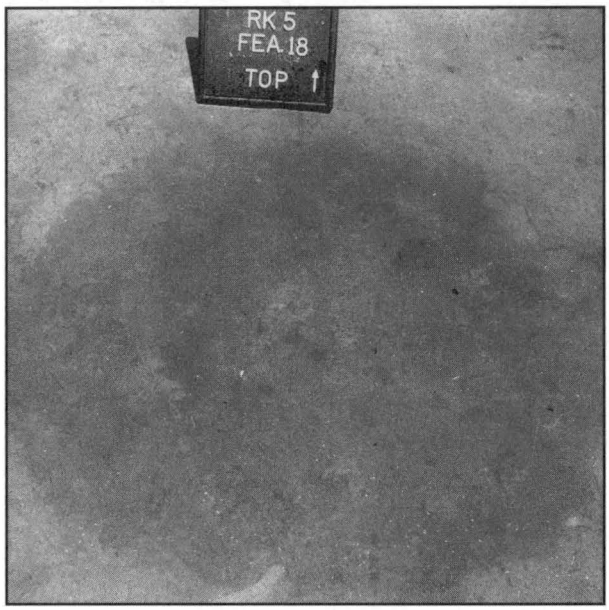

Figure 10.22. Feature 18, before excavation.

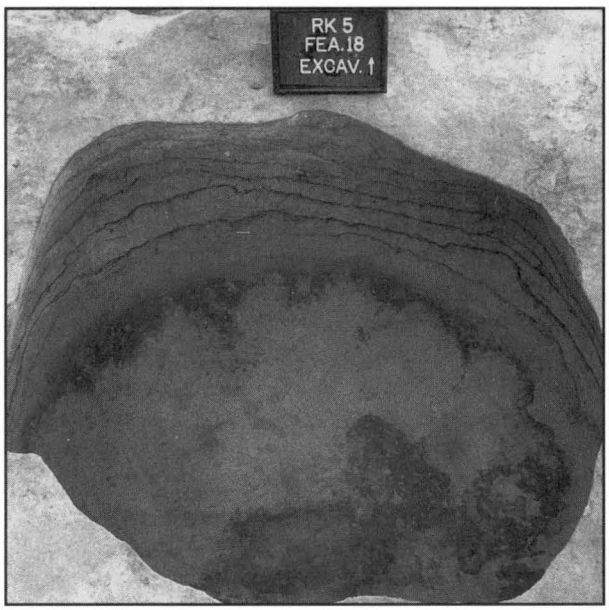

Figure 10.23. Feature 18, excavated.

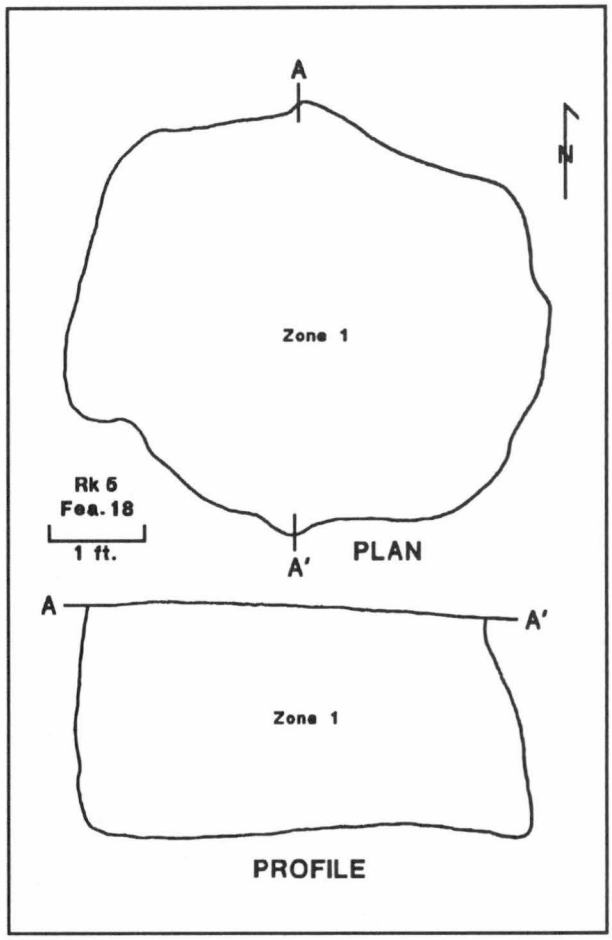

Figure 10.24. Feature 18, plan view and profile drawings.

Feature 18

This large pit, 4.5 ft by 4.9 ft in diameter, was located near the center of the excavation trench. The upper portion of the fill consisted of a dark brown (7.5YR 3/4) sandy loam with considerable charcoal and a few potsherds (Figure 10.22). As depth increased, this fill became more mottled and contained little more than charcoal fragments. Near the bottom of the pit, several fire-cracked rocks were noted along with a few potsherds. A large ash and charcoal deposit was found on the bottom in the center of the feature. After excavation, it measured 2.4 ft in depth (Figures 10.23 and 10.24). The diameter of the flat bottom was a little larger than that of the orifice, creating a slightly bell-shaped profile. Feature 18 appears to represent a storage pit that was filled first with a deposit of debris from around a food preparation facility, then with a large volume of village humus, and finally with a deposit of domestic refuse. The entire filling process seems to have occurred over a short span of time.

A radiocarbon sample was obtained from the charcoal concentration at the base of the pit. It yielded an age of 1480 $\pm$ 90 years: A.D. 470 (Beta-36094). This provides a calibrated one-sigma date range of A.D. 432 to A.D. 635 with an intercept of A.D. 578 (Stuiver and Becker 1986). Given the presence of *Dan River Net Impressed* potsherds in the fill, as well as two *Dan River Corncob Impressed* sherds that provide evidence of maize agriculture, this radiocarbon date is considered too early. The ceramic sample for the Dan River component at the Powerplant site indicates a probably occupation date between about A.D. 1000 and A.D. 1300.

Feature 19

This large, basin-shaped feature was located adjacent to and intruded Feature 3. The single fill zone

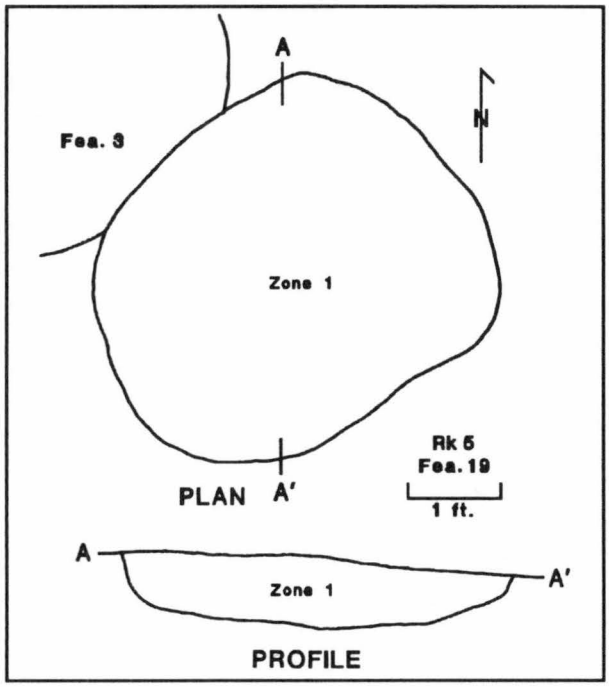

Figure 10.25. Feature 19, plan view and profile drawings.

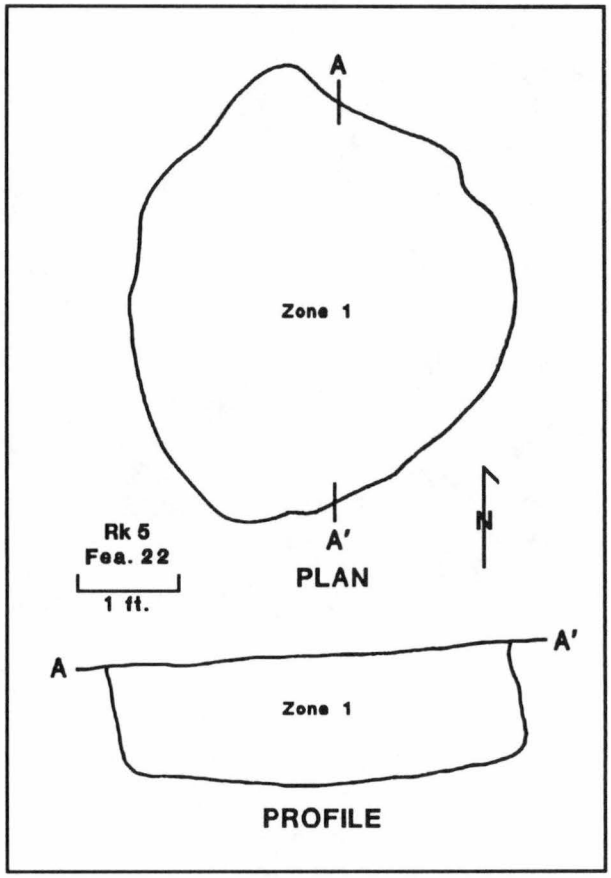

Figure 10.26. Feature 22, plan view and profile drawings.

was comprised of a dark brown (10YR 4/3) sandy soil flecked with bits of charcoal and fired clay. Artifacts included poorly preserved animal bone fragments and potsherds along with fire-cracked rocks. After excavation, the pit measured 4.0 ft by 3.6 ft and extended to a maximum depth of 0.7 ft near the center (Figure 10.25). It displayed a boat-shaped profile with insloping sides and a rounded, concave bottom. The size and configuration of Feature 19 suggest it served as a food preparation facility.

Feature 20

This large basin was located immediately south of Feature 19 and also contained a single fill zone. In contrast, however, this brown sandy soil was virtually sterile, containing only a few small potsherds and a single bone bead. The pit measured 3.5 ft by 4.3 ft and extended to a maximum depth of 0.6 ft. The sides sloped inward and the bottom was very uneven, dipping to its maximum depth in the western half of the feature. Feature 20 appears to designate a natural depression that protected a patch of village humus from plow action.

Feature 21

This shallow basin was located south of Feature 20 and east of Feature 36. It was circular in outline with a diameter of 3.1 ft, and only extended to a depth of 0.4 ft. The dark brown (7.5YR 4/4) sandy fill produced only a few small potsherds and animal bone fragments. A natural origin for this feature is suggested. Certainly the fill seems more characteristic of old topsoil or humus than of intentionally discarded refuse.

Feature 22

This large, irregularly shaped pit contained a single zone of dark brown (10YR 3/3) sandy soil that produced even fewer artifacts than Feature 21. After excavation, Feature 22 measured 4.0 ft by 3.7 ft and was 1.3 deep (Figure 10.26). The sides were generally straight and the bottom was slightly rounded. Its shape and size suggest a storage facility, and the contents indicate that it was rapidly filled, probably with nearby topsoil.

Feature 23

This circular feature, intruded by Feature 4, was neither augered nor excavated because of time constraints.

Feature 24

Feature 24 was situated along the western edge of the excavation. It represents a circular pit measuring 3.2 ft in diameter that intruded Feature 25 (Figure 10.27). Feature 24 reached a depth of 0.9 ft beneath the subsoil surface after excavation. Pit walls sloped inward slightly to intersect a flat bottom. A single zone of dark brown (10YR 4/4) sand filled the pit.

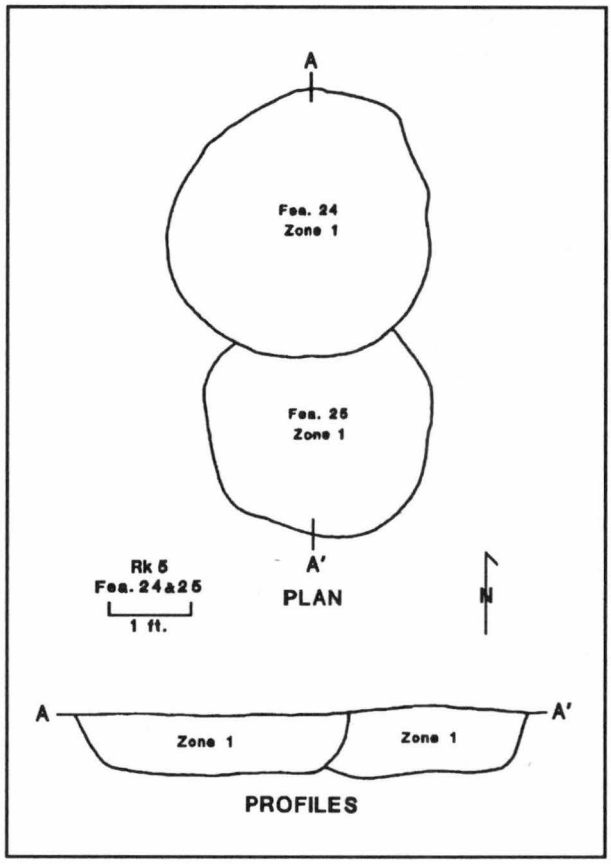

Figure 10.27. Features 24 and 25, plan view and profile drawings.

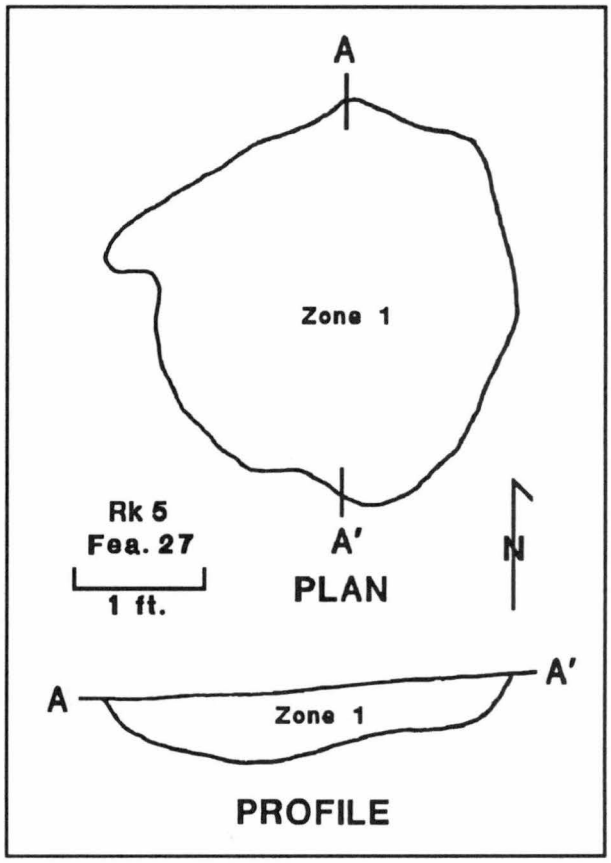

Figure 10.28. Feature 27, plan view and profile drawings.

Except for a few potsherds and animal bones, the fill was sterile. Feature 24 is very similar to Feature 22 and also may have originally served as a storage receptacle that was later filled with village humus.

Feature 25

Feature 25 designates a circular pit that was intruded by Feature 24 (Figure 10.27). It was somewhat smaller, measuring 2.8 ft in diameter, and extended to a depth of 0.8 ft. The fill consisted of a dark yellowish brown (10YR 3/4) sand that contained an area of artifact concentration in the northern portion of the pit. Here, animal bones, mussel shells, and potsherds were recovered, and the soil was darker than the remainder of the fill. The pit walls were generally straight and the bottom was flat. Feature 25 is very similar to the other circular features that have been interpreted as storage facilities. It differs from Features 22 and 24 in that it contained a relatively rich pocket of refuse in addition to the brown, sandy, humus-like soil. Apparently, it was important to quickly fill these pits after they were no longer suited for their primary purpose (e.g., storage). If refuse was available, it was thrown in, but if no garbage was handy, the pits were filled with nearby topsoil. A similar depositional history also characterizes Feature 18.

Feature 26

Time did not permit the excavation of this feature which extended into the west wall of the excavation trench.

Feature 27

This roughly circular feature was located in the western third of the excavation trench and measured 2.8 ft by 2.9 ft in diameter (Figure 10.28). The fill consisted of a single zone of yellowish brown (10YR 5/4) sandy soil that contained numerous fragments of fire-cracked rock, including several large pieces near the bottom. Charcoal fragments also were noted throughout the fill as were pieces of burned and unburned animal bones. Several cord-marked pottery sherds from a single, fragmented vessel were recovered from the upper portion of the fill. The pit was shallow, measuring only 0.5 ft in depth. The sides sloped inward, creating a basin-shaped profile. The shallow depth of Feature 27 would appear to preclude its functioning as a storage facility. If the fire-cracked rocks and charcoal represent primary deposits, then the pit may have served as a food preparation facility.

Feature 28

This large, irregular pit was uncovered between Features 4 and 22. As a consequence of smearing

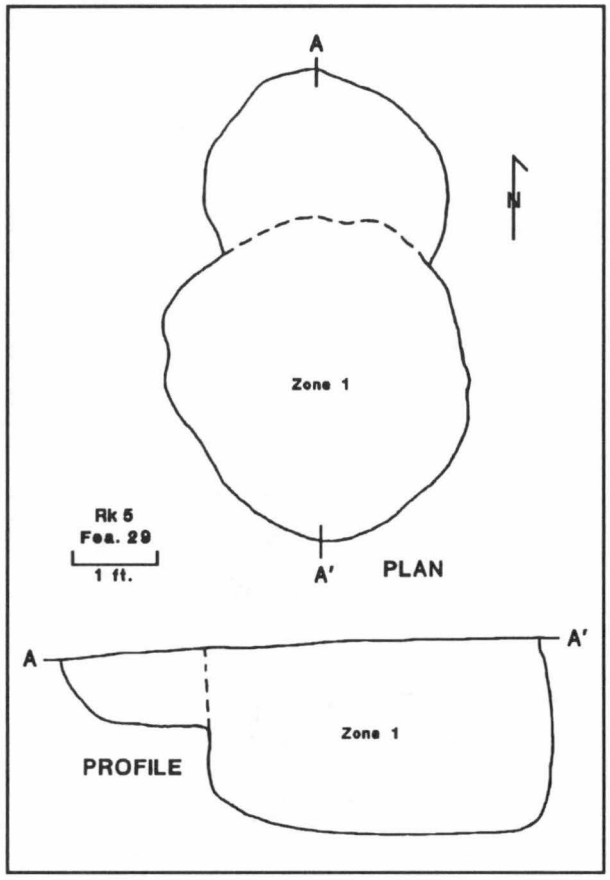

Figure 10.29. Feature 29, plan view and profile drawings.

from the adjacent features, the pit outline was difficult to define on the subsoil surface. As excavation proceeded, it became more circular and the diameter decreased from 4.7 ft to 3.0 ft. The single zone of dark yellowish brown (10YR 3/4) fill was virtually sterile, containing a single potsherd and a few fragments of fire-cracked rock. It extended to a depth of 1.7 ft below the subsoil surface. Pit walls were hard to discern and as a consequence, appeared irregular after excavation. The bottom was flat. Feature 28 may represent a storage pit that was refilled quickly with topsoil after it was no longer serviceable in its primary capacity.

Feature 29

This designation was assigned to what appeared to be two intrusive pits located immediately southeast of Feature 4. Cross-sectioning the pits failed to show the sequence of intrusion and to delimit clear-cut differences in the fill. Because it was not possible to establish natural boundaries between the two sections, Feature 29 was treated as a single unit, although two separate pits were probably present. Overall, the feature measured 5.8 ft by 4.1 ft. The northern section was relatively shallow, extending to a depth of 0.9 ft. The larger, southern section was 2.3 ft deep (Figure 10.29). Fill in both sections consisted of a dark brown (5YR 3/4) sand that contained numerous potsherds, some animal bones, debitage, and charcoal flecks. The larger, deeper section of Feature 29 probably represents a storage facility refilled with soil containing some domestic refuse. The original purpose of the smaller section is more difficult to reconstruct. Both sections appear to have been refilled at the same time.

Feature 30

Feature 30 was a small shallow basin that intruded Feature 31 and extended into the north profile of the excavation area, near the western end of the trench. A single zone of dark reddish brown (5YR 3/3) sandy loam contained several fragments of burned and unburned animal bone, freshwater mussel shells, and flecks of charcoal. A few fire-cracked rocks also were recovered. The excavated portion of the basin measured 1.2 ft by 1.5 ft and was 0.5 ft deep.

Feature 31

This shallow basin was west of and intruded by Feature 30. Although the color and texture of the soil used to fill this basin was nearly identical to that of Feature 30, it was virtually void of artifacts. Apparently Feature 31 was filled with soil from a sterile area of the site, whereas Feature 30 received a fairly rich deposit of food refuse. Again, this filling sequence suggests that pits were filled rapidly after abandonment. If garbage was available, it was used as ballast, and if not, nearby topsoil was used. The excavated portion of Feature 31 measured 1.7 ft by 2.4 and was only 0.4 ft deep. The activity set responsible for Features 30 and 31 cannot be discerned from present evidence.

Features 32 to 43

These last 12 features extended beyond the limits of the excavation trench. Because of time constraints and the fact that they were only partially exposed, the decision was made to leave these features intact for future investigations. Most (Features 32, 33, 34, 35, 37, 38, 39, 40, and 43) appeared to represent circular pits between 3.0 ft and 3.5 ft in diameter. The surface fill was a dark brown (7.5YR 4/4), reddish brown (5YR 3/4), or yellowish brown (10YR 4/2) sand, and was very similar to the fill from excavated features. Most of these features probably represent storage facilities refilled with humus and varying amounts of refuse.

Three of the unexcavated features (Feature 36, 41, and 42) were larger, ranging between 4.0 ft and 6.0 ft in diameter. All were defined by a surface fill of dark brown (7.5YR 3/2) sand containing particles of fired clay and charcoal. These features may represent food preparation facilities similar to Features 12 and 13.

Burial 1

This designation was assigned to a partially exposed pit whose configuration on the subsoil surface indicated the strong possibility that a burial was present. Because it extended beneath the excavation profile, there was not sufficient time to expose and excavate this feature.

Burial 2

Burial 2 only was recognized after the bottom of Feature 7 had been reached. The small intrusive portion of the burial pit was detected on the floor of the basin and originally was thought to be a small burial chamber opening. However, excavation soon revealed a simple intrusive burial pit rather than a shaft-and-chamber configuration. Burial 2 fill was very similar to that of Feature 7, consisting of a brown (10YR 3/3) sand with a few small flecks of charcoal, bone, and potsherds. After excavation, the oval grave measured 3.9 ft by 2.6 ft and extended to a depth of 1.5 ft (Figure 10.11).

On the floor of the pit lay the poorly preserved remains of an adult skeleton of indeterminate sex. It was flexed, lying on the right side, and the head was pointed toward the east. Although the skeleton was poorly preserved, the cranial region displayed ample evidence of infectious disease. In particular, the frontal sinus region had developed large cavities and showed infectious remodeling. Similar distortions also were present along the occipital crest and nuchal lines.

No grave goods were associated with Burial 2, but net impressed potsherds in the fill point to a probable affiliation with the early Dan River phase occupation at the site.

Summary

The most salient characteristic of the features at the Powerplant site is their size. Those interpreted as storage facilities averaged around 4.0 ft in diameter and usually were over 1.0 ft deep. Three large, basin-shaped pits measured between 4.0 ft and 6.0 ft in length and between 3.0 ft and 6.0 ft across but only a little over 0.5 ft in depth. These comparatively large dimensions are partly due to the sandy nature of the soil which has allowed a leaching or "bleeding" of organic stains outside the original pit structures. While excavating the features, these borders of ephemeral staining were scraped out until only undisturbed subsoil remained. This tended to create a somewhat arbitrary pit outline. Obviously the sandy conditions at the site were favorable to the aboriginal excavators and allowed them to dig larger holes with less energy than if they were dealing with typical piedmont clays.

We do not feel that the larger storage facilities indicate increased production during the Dan River phase. The overall density of cultural materials within the pits as well as in other site contexts is considerably less than densities at later sites such as Lower Saratown, Jenrette, Fredricks, Upper Saratown, and the historic component at the William Kluttz site.

The large, shallow basins at the Powerplant site also do not appear to be comparable to those interpreted as earth ovens at later sites. Although they may have been used in food preparation activities, the amount and kinds of refuse associated with the these facilities suggest less intense behavior without the ceremonial, communal referents characteristic of the large basins found on later sites in the Dan, Eno, and Haw drainages. The presence of charcoal, ash, and fire-cracked rock point to cooking, but the density of food remains and domestic debris indicate these features were used within the context of small family units rather than on a community-wide scale. Furthermore, refuse densities suggest that these basins were a part of day-to-day activities, as opposed to being used intensively during relatively short episodes of ceremonial celebration, as was the case with those found on Protohistoric and Contact period sites.

Postholes

No postholes were identified at the Powerplant site due to the sandy nature of the subsoil and excessive leaching. The 11 small, dark-stained disturbances that were noted while mapping the subsoil surface at the base of plowzone most likely represent either natural intrusions (root molds ?) or modern disturbances (Figure 10.4). None of these were excavated.

Pottery

Archaeological excavations at the Powerplant site produced 7,250 potsherds, including 30 sherds from a single, reconstructible jar. Approximately 79% (n=5,711) of these came from the plowzone and general site cleaning; the remainder (n=1,539) were recovered from archaeological features (Table 10.2). Most sherds either were too small (i.e., less than four centimeters in diameter) or too eroded to be reliably identified, and were classified as indeterminate. Of the remaining 1,146 potsherds, almost two thirds (n=737) were net impressed. Other surface treatments represented in the sample included cord marked, plain, corncob impressed, burnished, brushed, fabric marked, check stamped, and simple stamped.

Table 10.2. Distribution of pottery from the Powerplant site.

Context	Yadkin	Dan River					Oldtown					
	Fabric Marked	Net Impressed	Cord Marked	Plain	Corncob Impressed	Brushed	Plain	Burnished	Check Stamped	Simple Stamped	Indet.	Total
Dan River Phase												
Fea. 1	1	61	3	13	-	1	1	-	-	-	252	332
Fea. 2	-	7	-	3	-	-	-	-	-	-	61	71
Fea. 3	-	14	-	-	-	-	1	-	-	-	106	121
Fea. 4	-	8	1	1	-	-	-	-	-	-	10	20
Fea. 6	-	25	-	1	1	-	-	-	-	-	34	61
Fea. 7	-	4	-	-	-	-	-	-	1	-	1	6
Fea. 8	-	4	-	-	-	-	-	-	-	-	34	38
Fea. 10	-	5	1	-	-	-	-	-	-	-	25	31
Fea. 12	-	74	1	-	-	2	-	-	-	1	160	238
Fea. 13	-	33	2	3	-	-	-	-	-	-	73	111
Fea. 15	-	5	-	-	-	-	-	-	-	-	21	26
Fea. 16	-	-	-	-	-	-	-	-	-	-	2	2
Fea. 18	-	8	-	-	2	-	-	-	-	-	29	39
Fea. 21	-	2	-	-	-	-	-	-	-	-	3	5
Fea. 24	-	1	-	3	-	-	1	-	-	-	3	8
Fea. 25	-	6	3	1	-	-	-	-	-	-	12	22
Fea. 28	-	-	1	-	-	-	-	-	-	-	-	1
Fea. 29	-	29	-	6	1	-	-	-	-	-	128	164
Fea. 30	-	2	-	-	-	-	-	-	-	-	2	4
Fea. 31	-	1	-	-	-	-	-	-	-	-	-	1
Sub-total	1	289	12	31	4	3	3	0	1	1	956	1301
Early Saratown Phase												
Fea. 5	-	-	-	1	-	1	1	-	-	-	4	7
Fea. 9	-	1	1	-	-	-	-	-	-	-	11	13
Fea. 11	-	13	-	1	-	2	1	-	-	1	113	131
Fea. 14	-	2	-	-	2	-	2	-	-	-	2	8
Fea. 19	-	8	-	-	2	-	1	5	2	-	19	37
Fea. 27	-	2	30	-	-	-	-	5	-	-	5	42
Sub-total	0	26	31	2	4	3	5	10	2	1	154	238
Indeterminate Phase												
Plowzone	3	406	44	41	8	3	189	2	-	-	4892	5588
Misc.	-	16	5	-	-	-	-	-	-	-	102	123
Sub-total	3	422	49	41	8	3	189	2	0	0	4994	5711
Total	4	737	92	74	16	9	197	12	3	2	6104	7250

Three site occupations appear to be represented by the pottery sample. The four fabric marked sherds found are referable to the *Yadkin Fabric-Marked* type (Coe 1964) and indicate a minor Middle Woodland occupation. Two hundred and fourteen sherds with smoothed plain, burnished, simple stamped, and check stamped surfaces, and fine sandy pastes, are referable to the Oldtown series (Wilson 1983) and indicate a more substantial occupation during the early Saratown phase (A.D. 1450–1620). Finally, the overwhelming majority of identified sherds (n=928), with net impressed, cord marked, brushed, corncob impressed, and rough plain surfaces, are referable to the Dan River series (Coe and Lewis 1952). Most of these potsherds have coarse sand or crushed quartz tempered paste and are associated largely with an early Dan River phase occupation (ca. A.D. 1000–1300); however, some Dan River series sherds, including those from a reconstructible cordmarked jar found in Feature 27, exhibit fine sand temper and appear to be associated with the Saratown phase component.

Yadkin Fabric-Marked

Four *Yadkin Fabric-Marked* (Coe 1964) sherds were recovered from the plowzone and Feature 1. The exterior surfaces of these sherds have been impressed with a simple-plaited or wicker fabric-wrapped paddle; the interior surfaces are smoothed. These sherds are

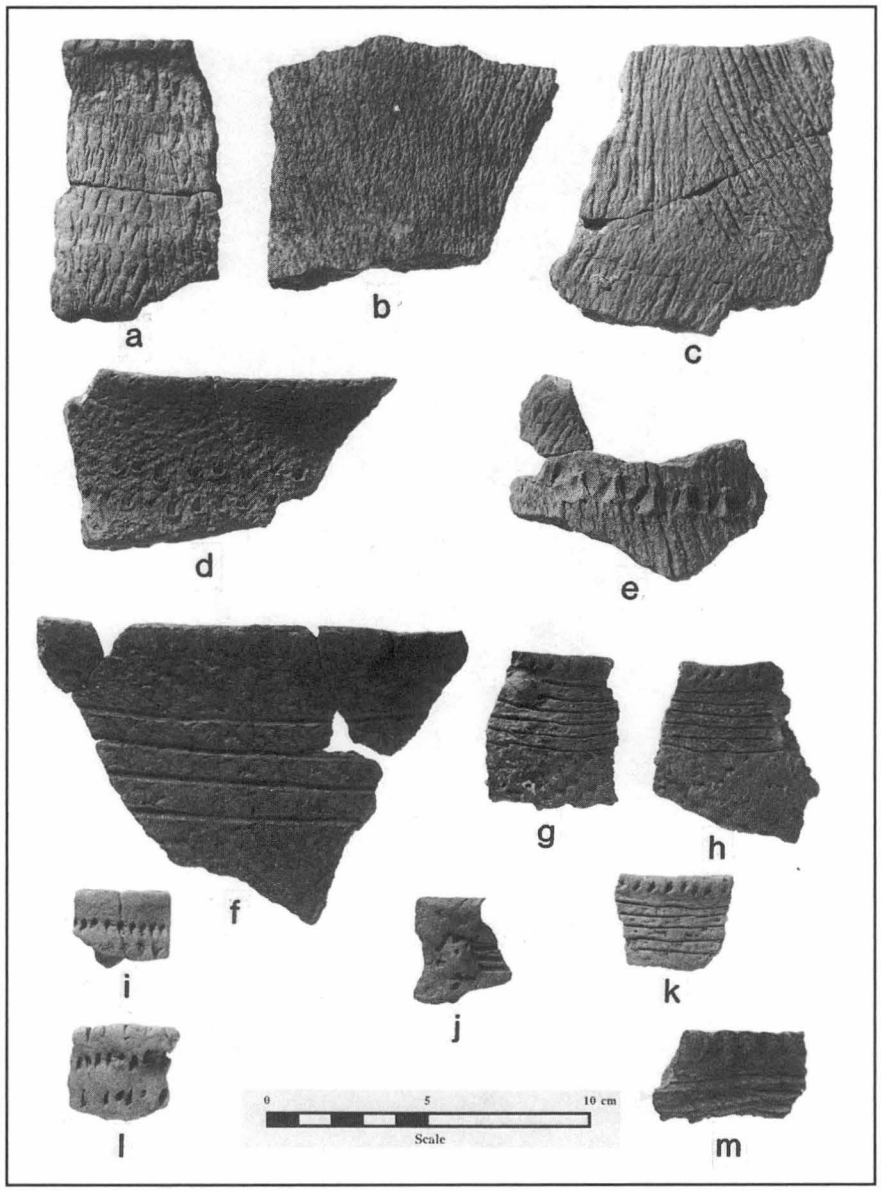

Figure 10.30. Dan River series pottery from the Powerplant site.

tempered with medium-sized crushed quartz, or mixed quartz and feldspar. Three of the four specimens are undecorated rimsherds and have rounded lips. These potsherds probably represent a minor Yadkin phase occupation of the site during the Middle Woodland period (ca. A.D. 100–500).

Dan River Net Impressed (Figure 10.30*d,f–h,j–k*)

Seven hundred and thirty-seven sherds were classified as *Dan River Net Impressed* (Coe and Lewis 1952). These sherds comprised 64.3% of all identified specimens and were recovered from the plowzone and all but three features. In most instances, the exterior sherd surface exhibited coarse, heavy, knotted-net impressions. Coarse, looped-net impressions were observed on only three sherds. Almost three-fourths of all sherds had scraped interiors; the rest were smoothed. Although several temper types were observed in the sherd sample, most sherds were tempered with either coarse sand (37.9%) or medium crushed quartz (30.4%). Other temper types included: fine sand (9.5%), fine crushed quartz (7.3%), mixed crushed quartz and feldspar (7.3%), coarse quartz (6.1%), and crushed feldspar (1.5%). The high incidence of crushed quartz temper and very high frequency of scraped interior surfaces are thought to characterize early pottery within the Dan River series (Coe and Lewis 1952).

Most *Dan River Net Impressed* sherds ranged from six to ten centimeters in thickness, and all appear to be from large storage or cooking jars. All but one of the 66 rimsherds large enough to determine rim profile were everted, and over 80% had rounded lips. Vessel decoration, represented by 93 sherds (15 of which

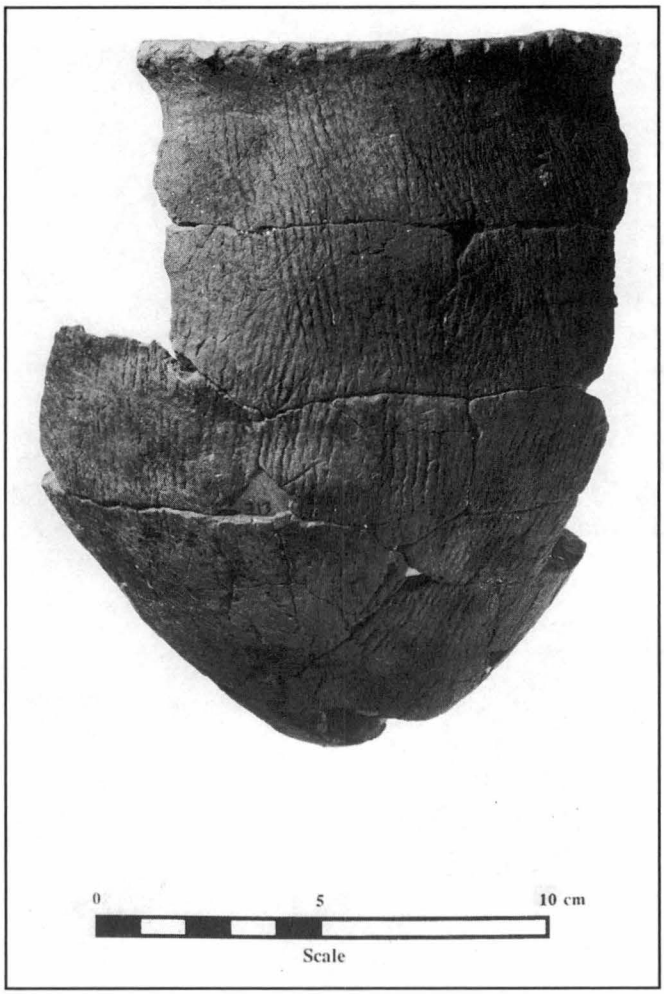

Figure 10.31. *Dan River Cord Marked* vessel from Feature 27.

possessed multiple decorations), was both common and varied. Methods used to decorate vessels included notching, incising, punctation, finger pinching or impressing, and smoothing or scraping. Of the 108 decorations observed, almost half (n=46) were applied to the vessel rim area and included: perpendicular, V-shaped notches along the lip (n=8), lip-rim edge (n=8), and rim (n=5) (Figure 10.30*f–h,k*); oblique, incised notches along the lip (n=9), lip-rim edge (n=7), and rim (n=6) (Figure 10.30*d*); and oblong or U-shaped punctations along the rim (n=3). Neck decorations also were common and included: single or multiple incised, brushed, or smoothed bands around the neck (n=28) (Figure 10.30*f–h,j–k*); a single band of finger pinches or fingertip impressions (n=16); oblong or U-shaped punctations along the neck (n=6) (Figure 10.30*d*); and multiple, parallel-incised lines placed perpendicular or oblique to the rim edge (n=2). Finally, 10 sherds exhibited brushing or scraping along the body exterior. Rim and neck decorations often co-occurred on the same vessel.

Although most of the features assigned to the early Saratown phase component at the site contained *Dan River Net Impressed* sherds, it is not clear whether these sherds represent early Saratown phase jars, contamination or mixing from the earlier Dan River occupation, or both. It is interesting to note, however, that no fine net impressed pottery, typical of the Oldtown pottery series of the early Saratown phase, was found. Net impressed pottery made up 83.8% of all identified sherds from Dan River phase features, but only 31.0% of the early Saratown phase feature sample.

Dan River Cord Marked (Figures 10.30*b–c,e* and 10.31)

Ninety-two potsherds were classified as *Dan River Cord Marked*. Twelve of these sherds were recovered from seven Dan River phase features while 31 sherds (including 30 from a single vessel) came from two early Saratown phase features. The remainder came from the plowzone and other contexts.

The reconstructible vessel, about two-thirds complete, was found in Feature 27 (Figure 10.31). It is a small jar that measures about 14 cm in orifice diameter and 17 cm in height. Vessel walls are about 5 mm

thick. This jar has a slightly constricted neck and a flattened lip, and was decorated with shallow, V-shaped notches along the lip-rim edge. Exterior cord impressions consist of fine (less than one millimeter in diameter), closely-spaced, Z-twisted cordage aligned vertically (i.e., perpendicular to the rim). The vessel interior was wiped smooth before firing. The paste is sparsely tempered with fine crushed quartz. Because of its context and degree of completeness, this vessel is attributed to the early Saratown component at the site.

The other 62 *Dan River Cord Marked* sherds from the site probably are associated with the early Dan River occupation and can be described as follows. Sherd exteriors were impressed with a coarse (1 mm to 2 mm in diameter) cord wrapped paddle with impressions aligned perpendicular to the rim. Just over 60% of the sherds had Z-twisted cord impressions; the remainder had S-twisted impressions. Over half had scraped interiors. These sherds were tempered with coarse-to-medium crushed quartz (48%), coarse sand (47%), and coarse crushed feldspar (5%). All three rimsherds in the sample were from jars with everted rims and rounded lips; two of these sherds had notched lips. Two neck sherds also were decorated and consisted of a band of fingernail impressions around the neck and a band of finger pinches around the neck (Figure 10.30*e*). These types of decoration are similar to those observed on *Dan River Net Impressed* sherds.

Dan River Plain (Figure 10.30*i,l–m*)

Seventy-four potsherds were classified as *Dan River Plain* (Coe and Lewis 1952), based upon paste similarities with other Dan River series sherds. These sherds mostly were recovered from the plowzone (n=41) and Dan River phase features (n=31). Only two came from features assigned to the early Saratown phase. All of these sherds had roughly smoothed exterior surfaces and almost two-thirds also had roughly smoothed interiors. The remainder had scraped interiors. Temper types represented by the sample included coarse sand (40.5%), fine sand (23.0%), coarse-to-fine crushed quartz (21.7%), very fine sand (12.2%), and mixed crushed quartz and feldspar (2.6%).

Over two-thirds of the sherds were more than six millimeters thick, and predominantly represent large vessels. Of the eight rimsherds found, all are everted and all but one have rounded lips. Five rimsherds were notched along the lip (n=4) or lip-rim edge (n=1) (Figure 10.30*l–m*). Several other *Dan River Plain* sherds also were decorated and include: single or multiple, incised or brushed lines around the vessel neck (n=4) (Figure 10.30*m*); a band of fingertip impressions around the neck (n=1); a band of incised, inverted V's around the neck (n=1); miscellaneous incised lines on the body exterior (n=2); and circular punctations (n=2) (Figure 10.30*i,l*).

Dan River Corncob Impressed (Figure 10.30*a*)

Sixteen *Dan River Corncob Impressed* sherds were recovered (Coe and Lewis 1952). Half of these came from the plowzone; the remainder came from Dan River phase Features 6, 18, and 29, and early Saratown phase Features 14 and 19. These sherds were tempered with coarse-to-fine sand, and all but three had smoothed interiors. All of these sherds apparently represent small jars with relatively thick (usually 6 mm to 8 mm) walls, everted rims, and rounded lips. Both rimsherds had notched lip-rim edges, and one also had a band of fingernail impressions around the neck (Figure 10.30*a*). Another sherd exhibited a band of circular punctations around the vessel neck.

Given their association elsewhere in both Dan River phase and later contexts, the *Dan River Corncob Impressed* sherds from the Powerplant site probably are associated with both cultural components.

Dan River Brushed

Nine sherds were recovered with brushed or scraped exteriors, and were classified as *Dan River Brushed*, based on paste characteristics (see Coe and Lewis 1952). Eight were tempered with coarse-to-fine sand; the other contained coarse crushed quartz. Five of the sherds had scraped interiors, and all but two were greater than six millimeters thick. Both rimsherds were from jars with everted rims and pointed, notched lips.

Dan River Brushed sherds were recovered from both Dan River and early Saratown phase features, as well as from the plowzone.

Oldtown Plain (Figure 10.32*i*)

One hundred and ninety-seven sherds were classified as *Oldtown Plain* (Wilson 1983:615–618), and are thought to be associated largely with the early Saratown phase occupation. These sherds have uniformly smoothed exterior surfaces and are tempered almost exclusively with fine to very fine sand. Other temper types, including finely crushed quartz and finely crushed feldspar, comprised less than three percent of the sample. All but 11 of these sherds also had smoothed interior surfaces.

Oldtown Plain sherds were substantially thinner than Dan River series sherds, with over 80% being less than six millimeters thick. Of the 35 rimsherds found, most are from jars or bowls that have everted rims and rounded (57.1%), pointed (40.0%), or flattened (2.9%) lips. Vessel decoration apparently was common, and relied upon techniques of incising, notching, and punctation. Thirty-two examples of decoration were observed on 28 sherds and include: V-shaped notches along the lip (n=5) and lip-rim edge (n=2); U-shaped punctations along the lip-rim edge (n=1) and along the rim (n=4); a band of multiple incised lines around the vessel exterior at the rim (n=5) (Figure 10.32*i*); a

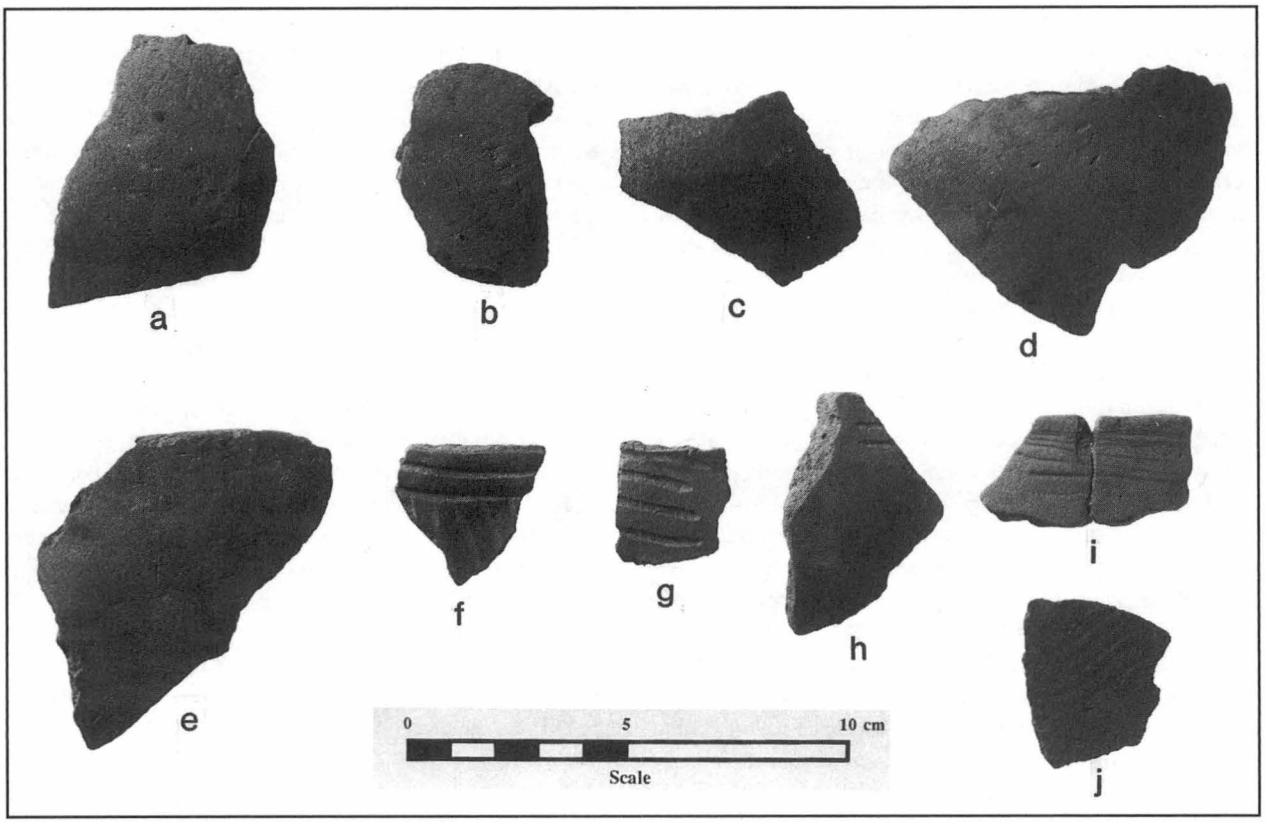

Figure 10.32. Oldtown series pottery from the Powerplant site.

single incised line or band of multiple incised lines around the neck (n=8); and bold incised designs along the shoulder and body (n=8).

Sherds classified as *Oldtown Plain* were recovered primarily from the plowzone, but also were found in early Saratown phase Features 5, 11, 14, and 19. Although three specimens were recovered from Dan River phase features, their association with that occupation is uncertain.

Oldtown Burnished (Figure 10.32*a–h*)

Twelve burnished sherds were recovered from the Powerplant site and are classified as *Oldtown Burnished* (Wilson 1983:615–618). A sherd surface was considered to be burnished rather than plain or smoothed if it appeared to have been rubbed with a hard, blunt instrument, producing a compact and lustrous surface (see Steponaitis 1983:23–24). *Oldtown Burnished* sherds were recovered from early Saratown phase Features 19 (n=5) and 27 (n=5), and from the plowzone (n=2). These sherds had smoothed or burnished interiors and were tempered with fine to very fine sand.

The single rimsherd in the sample is from a small bowl with a slightly inverted rim and a plain, rounded lip (Figure 10.32*e*). The curvature of the other burnished sherds suggests that they too are probably from small bowls or jars. Four sherds, all from the same vessel, were decorated with a boldly incised, rectilinear design located around the vessel rim or shoulder (Figure 10.32*f–h*). No other decorated sherds were found.

Oldtown Check Stamped

Three sherds, from Features 7 and 19, were classified as *Oldtown Check Stamped* (Wilson 1983:615–618) and are attributed to the early Saratown phase component. All three have smoothed-over check-stamp impressions on the exterior surface, smoothed interiors, and are tempered with coarse to fine sand. The one rimsherd in the sample is undecorated, and has a slightly everted profile and a flat, thickened lip. All three sherds are six to eight millimeters thick and probably are fragments of large jars.

Oldtown Simple Stamped (Figure 10.32*j*)

Two sherds, from Features 11 and 12, were classified as *Oldtown Simple Stamped* (Wilson 1983:615–618), and probably are associated with the early Saratown phase occupation. Both exhibit very faint stamp impressions, have smoothed interiors, and are tempered with fine sand. Both are 6 mm to 8 mm thick.

Indeterminate Sherds

Approximately 84% (n=6,104) of all sherds recov-

ered from the Powerplant site, including 4,994 from plowzone and other disturbed contexts, were not classified because of either eroded surfaces or small size. It seems likely that most of these sherds are attributable to the Dan River occupation of the site.

Summary

A majority of the potsherds found at the Powerplant site are associated with the early Dan River occupation and thus provide our best pottery sample for the beginning of that phase. Unlike later Dan River series pottery, as seen at Lower Saratown and the William Kluttz site, the Powerplant site assemblage contained a higher percentage of sherds that were tempered with crushed quartz as opposed to sand. Also, a slightly higher percentage of sherds exhibited scraped interior surfaces. Although both characteristics are associated more with the preceding Uwharrie series, other attributes such as vessel form and decoration clearly place the Powerplant pottery within the Dan River series. Most rimsherds were flaring or everted, and many also were decorated by notching, incising, or punctations.

Coe and Lewis (1952:1), in their definition of the Dan River series, noted that the development of Dan River out of Uwharrie was gradual rather than abrupt, and hypothesized that the Dan River series actually represented the transition from "proto-Siouan" (i.e., Uwharrie) crushed-quartz-tempered net-impressed and cord-marked pottery to the sand-tempered smoothed, burnished, and carved-paddle-stamped pottery of the historic piedmont Siouan tribes. In discussing the development of the Dan River series, they state:

> it illustrates the period of transition from the traditional Uwharrie types to the later Lamar-Catawba styles. The Uwharrie vertical rim jars changed to squattier flaring rim jars. The simple incised bands around the neck of the Uwharrie vessels changed to more complicated combinations of incising and punctations. The heavy crushed quartz temper schedule became less rigid, and river sand became more acceptable as a substitute. Finally, the roughly scraped interiors characteristic of the Uwharrie pottery became generally smoothed [Coe and Lewis 1951:1].

In addition to the pottery associated with the early Dan River phase, a small number of sherds appear to be associated with a later site occupation during the early Saratown phase. These sherds were recovered from the plowzone and several excavated features, and conform to Wilson's (1983) description of the Oldtown series. The Oldtown series is attributed to the protohistoric and historic Sara occupation of the upper Dan River drainage. The Oldtown potsherds from the Powerplant site are tempered predominantly with fine to very fine sand and have burnished, smoothed, or carved-paddle stamped surfaces. These attributes of paste and surface treatment readily distinguish the Oldtown sherds from the more abundant Dan River pottery at the site. Given that only a few Oldtown sherds were found in feature contexts, little else can be said about the early Saratown phase ceramic assemblage at present.

Lithic Artifacts

Archaeological testing at the Powerplant site yielded 1,441 lithic artifacts (Table 10.3). Almost 67% (n=958) came from pit features mostly associated with the Dan River occupation; the remaining 483 lithic artifacts came from the plowzone and other disturbed contexts. The sample consists of 1,272 pieces of debitage and exhausted cores, 162 chipped stone tools and tool fragments, two ground stone tools and tool fragments, and five large cobble tools. As with the Lower Saratown site, the small number of recovered Archaic projectile points and lack of earlier Woodland period projectile point types suggest that most of these artifacts are associated with Late Prehistoric and Contact period occupations. Because of the small number of features that can be attributed to the early Saratown phase and corresponding lack of evidence for extended site use, most of the lithic artifact sample is probably derived from the earlier Dan River phase occupation.

As with the Lower Saratown and William Kluttz site samples, no attempt was made during analysis to classify metavolcanic materials (except rhyolites) by specific rock type. Major artifact categories are described below.

Debitage

Decortication Flakes. Sample Size: 212. Form: Included within this category were 181 primary and 31 secondary decortication flakes. These flakes exhibit a striking platform and bulb of percussion on the ventral surface, and have cortex (primary - >75% cortex; secondary - <75% cortex) remaining on the dorsal surface. Material: Vein quartz–116, Quartzite–49, Rhyolite–41, Jasper–4, Other metavolcanic rock–2. Comment: These flakes are the by-products of core reduction during the early stages of stone tool manufacture. As with the nearby Lower Saratown site, the raw material distribution indicates a heavy reliance upon vein quartz. Most quartz and quartzite flakes are from water-worn cobbles that probably were collected from the river bottom.

Interior/Bifacial Thinning Flakes. Sample Size: 1,000. Form: Interior flakes are flat flakes, lacking a steep platform angle and cortex, that exhibit flake

Table 10.3. Distribution of lithic artifacts from the Powerplant site.

		Context														
Category	PZ	Fea 1	Fea 2	Fea 3	Fea 4	Fea 5	Fea 6	Fea 7	Fea 8	Fea 10	Fea 11	Fea 12	Fea 13	Fea 14	Fea 15	Fea 16
Debitage																
Decortication Flakes	93	25	2	13	-	-	-	-	-	5	18	10	7	3	2	1
Interior/Bif. Thin. Flakes	251	97	13	187	29	4	24	15	24	11	90	41	11	6	4	7
Shatter Fragments	5	2	-	3	-	-	-	-	-	-	9	1	-	-	-	-
Cores	21	-	1	2	-	-	1	-	-	-	4	2	1	-	-	-
Raw Material	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Projectile Points																
Kirk Serrated	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-
Savannah River Stemmed	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Small Stemmed Points	2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Small Triangular Points	35	2	-	16	-	-	1	1	-	-	4	2	1	1	-	-
Unidentified Points	8	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Chipped Stone Artifacts																
Preforms	-	2	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bifaces	12	4	-	1	1	-	-	-	1	-	2	-	1	-	-	-
Drill	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
End Scraper	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pièces Esquillées	2	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-
Spokeshave	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-
Utilized/Retouched Flakes	34	2	1	4	-	1	-	-	-	2	1	-	-	-	-	-
Ground Stone Artifacts																
Engraved Stone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ground Stone Fragment	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-
Large Cobble Tools																
Cobble Chopper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hammerstones/Manos	2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total	468	136	17	227	30	5	26	16	25	18	130	56	21	10	7	8

removal scars on the dorsal surface. Bifacial thinning flakes are similar to interior flakes but have a steep platform angle that indicates detachment from a biface. These two flake types were not differentiated during the analysis. Material: Rhyolite–502, Vein quartz–254, Other metavolcanic rock–126, Jasper–69, Quartzite–41, Crystal quartz–7, Unidentified–1. Comment:. Interior and bifacial thinning flakes are result from intermediate and final stages of core reduction and bifacial tool production. As was noted with the debitage from the Lower Saratown site, the higher frequency of rhyolite and other metavolcanic flakes, when compared with decortication flakes, suggests different procurement strategies for metavolcanic and quartz raw materials.

Shatter Fragments. Sample Size: 20. Form: Shatter fragments are angular flakes that result from biface and core reduction but cannot be specifically classified. Material: Vein quartz–15, Rhyolite–2, Jasper–2, Crystal quartz–1. Comment: None.

Cores. Sample Size: 37. Form: Cores are masses of lithic raw material from which two or more flakes have been removed. Material: Vein quartz–23, Rhyolite–8, Jasper–2, Quartzite–2, Crystal quartz–1, Other metavolcanic rock–1. Comment: The high proportion of vein quartz cores to metavolcanic cores reflects the raw material distribution of decortication flakes and indicates that vein quartz was a much more accessible raw material than rhyolite.

Raw Material. Sample Size: 3. Form: These specimens are chunks of utilizable raw material that have not been modified. Material: Other metavolcanic rock–3. Comment: None.

Projectile Points

Kirk Serrated Projectile Point. Sample Size: 1. Form: Coe (1964:70) describes this projectile point type as having "a long narrow blade with deep serrations and a broad square stem." The base usually is straight and blunt but may be thinned and concave. This unbroken specimen has only shallow serrations

Table 10.3 Continued.

Category	Context Fea 18	Fea 19	Fea 20	Fea 21	Fea 22	Fea 25	Fea 27	Fea 28	Fea 29	Bu 2	Misc.	Total
Debitage												
Decortication Flakes	13	1	-	-	-	5	1	-	11	2	-	212
Interior/Bif. Thin. Flakes	58	13	2	3	5	7	11	5	55	21	6	1000
Shatter Fragments	-	-	-	-	-	-	-	-	-	-	-	20
Cores	-	1	-	-	-	-	-	-	-	-	4	37
Raw Material	-	-	-	-	-	-	2	-	-	-	-	3
Projectile Points												
Kirk Serrated	-	-	-	-	-	-	-	-	-	-	-	1
Savannah River Stemmed	-	-	-	-	-	-	-	-	-	-	1	2
Small Stemmed Points	-	-	-	-	-	-	-	-	-	-	-	2
Small Triangular Points	-	1	-	-	-	-	-	-	3	-	1	68
Unidentified Points	-	-	-	-	-	-	-	-	-	-	-	9
Other Chipped Stone Artifacts												
Preforms	-	-	-	-	-	-	-	-	-	-	-	2
Bifaces	-	-	-	-	2	-	-	-	-	-	-	24
Drill	-	-	-	-	-	-	-	-	-	-	-	1
End Scraper	-	-	-	-	-	-	-	-	-	-	-	1
Pièces Esquillées	-	-	-	-	-	-	-	-	-	-	-	3
Spokeshave	-	-	-	-	-	-	-	-	-	-	-	1
Utilized/Retouched Flakes	1	-	-	-	-	-	-	-	-	-	2	48
Ground Stone Artifacts												
Engraved Stone	-	-	-	-	-	-	-	-	1	-	-	1
Ground Stone Fragment	-	-	-	-	-	-	-	-	-	-	-	1
Large Cobble Tools												
Cobble Chopper	-	-	-	-	-	-	1	-	-	-	-	1
Hammerstones/Manos	-	1	-	-	-	-	-	-	-	-	1	4
Total	72	17	2	3	7	12	15	5	70	23	15	1441

and a slightly thinned, concave base. Material: Other metavolcanic rock–1. Comment: This projectile point type is associated with the Early Archaic period (ca. 6,000–7,000 B.C.) and was recovered from the top of Feature 15.

Savannah River Stemmed Projectile Points. Sample Size: 2. Form: This projectile point type is defined by "a large, heavy, triangular blade with a broad stem" (Coe 1964:44). The quartzite specimen is unbroken and has a broad, tapered stem; the other is a basal fragment and conforms to Coe's (1964:44) "Slender variety." Material: Quartzite–1, Other metavolcanic rock–1. Comment: This type is associated with the Late Archaic period (ca. 2,000 B.C.). Both artifacts were recovered from disturbed contexts.

Small Stemmed Projectile Points. Sample Size: 2. Form: Both specimens are crudely made, and have a wide, triangular blade and a broad, straight base. Material: Rhyolite–2. Comment: These two artifacts were recovered from the plowzone and are generally similar to Oliver's (1985) *Gypsy Stemmed* type. A Late Archaic or Early Woodland cultural association (ca. 2,000 B.C.–A.D. 1) is likely.

Small Triangular Projectile Points (Figure 10.33). Sample Size: 68. Form: These projectile points conform to the *Caraway Triangular* type (Coe 1964). Although 30 specimens were fragments of small triangular points for which the overall shape could not be determined, most (n=22) of the remaining specimens had straight sides and a straight base. The rest of the sample included eight specimens with incurvate sides and base, four with a straight base and incurvate sides, three with an incurvate base and straight sides, and one specimen with a straight base and excurvate lateral edges. These points range from 17 mm to 36 mm (mean=25.1, sd=5.1, n=24) in length, 12 mm to 36 mm (mean=18.6, sd=4.2, n=52) in width, and 3 mm to 12 mm (mean=5.0, sd=1.8, n=63) in thickness. Material: Rhyolite–47, Other metavolcanic rock–11, Jasper–9, Crystal quartz–1. Comment: Small

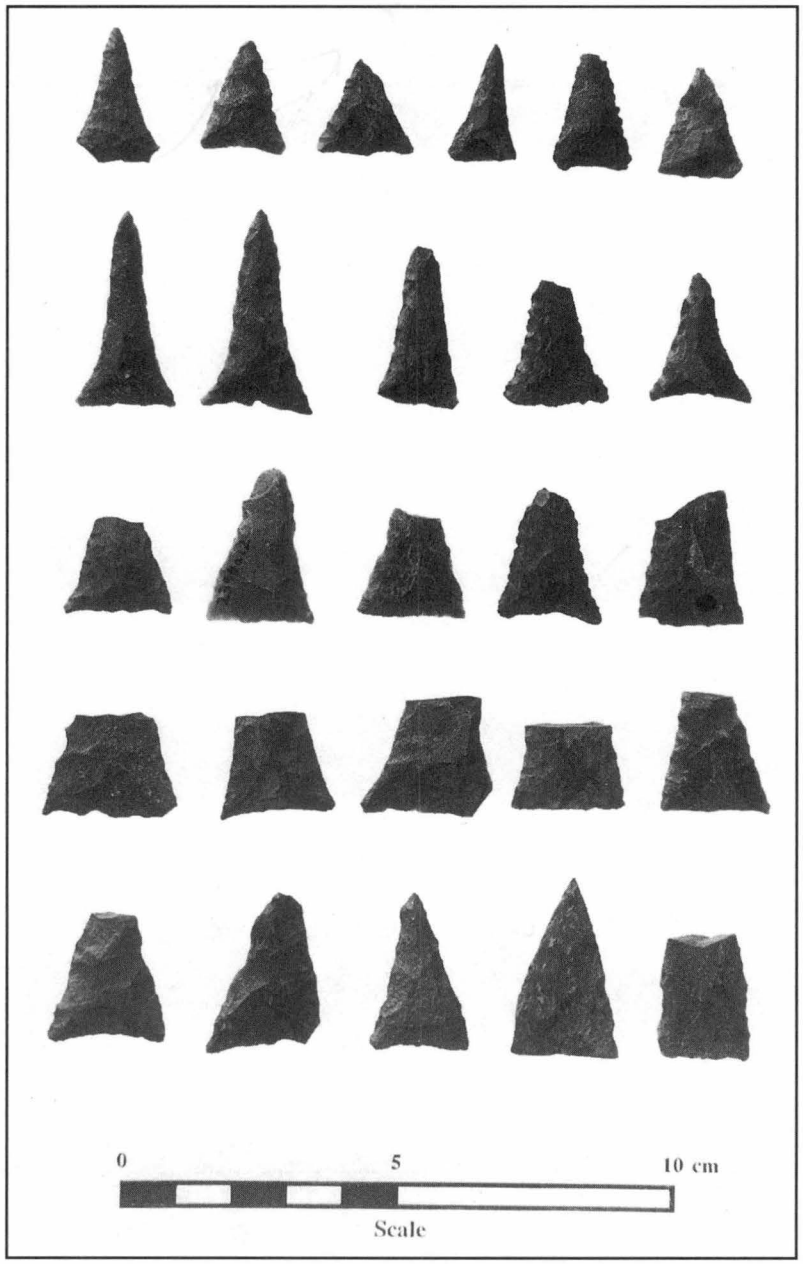

Figure 10.33. Chipped stone projectile points from the Powerplant site.

triangular projectile points were the most common chipped stone artifacts found at the Powerplant site. Twenty-six of these artifacts were recovered from Dan River phase features while only six came from early Saratown features. The remaining 36 specimens came from plowzone and other disturbed contexts. Most of these artifacts probably also are associated with the Dan River occupation. The projectile points from early Saratown features were only slightly smaller than the other points recovered at the site.

Unidentified Projectile Points. Sample Size: 9. Form: Four of these specimens are small corner-to-side notched points that do not conform to an established type; the remainder are small distal end fragments. Material: Vein quartz–5, Other metavolcanic rock–3, Rhyolite–1. Comment: All of the notched points and most tip fragments probably date to the Archaic period (ca. 8,000–1,000 B.C.). One notched point was recovered from Feature 1; the others came from the plowzone.

Other Chipped Stone Artifacts

Preforms. Sample Size: 2. Form: Both of these specimens are thick, triangular bifaces that appear to represent aborted attempts to manufacture a small triangular projectile point. Material: Rhyolite–2. Comment: These artifacts were recovered from Feature 1 and are attributed to the Dan River component.

Bifaces. Sample Size: 24. Form: These specimens are flake blanks that exhibit flake removal scars on both surfaces. While most of these appear to represent initial stages of triangular projectile point manufacture, some larger specimens may in fact be finished tools that functioned as knives. Material: Rhyolite–13, Vein quartz–6, Other metavolcanic rock–5. Comment: Half of the recovered bifaces came from the plowzone; all but two of the other specimens came from Dan River features.

Drill. Sample Size: 1. Form: This specimen is an angular decortication flake that has been bifacially chipped at the distal end to produce a thick, parallel-sided, rod-like bit. Material: Other metavolcanic rock–1. Comment: This artifact was recovered from the plowzone.

End Scraper. Sample Size: 1. Form: This artifact is a large bifacial thinning flake that has been finely, unifacially reworked at the distal end to form a triangular end scraper. Evidence of polishing along the lateral edges suggests that it probably was hafted. Material: Rhyolite–1. Comment: The form and workmanship of this tool, plus the fact that it is heavily patinated, indicate that it probably dates to the late Paleo-Indian or Early Archaic periods (i.e., before 6,000 B.C.). This artifact was recovered from the plowzone.

Pièces Esquillées. Sample Size: 3. Form: All three specimens are quartz flakes that exhibit sharp, straight, crushing along opposing edges. Material: Crystal quartz–2, Quartz–1. Comment: Pièces esquillées are thought to represent wedges or scoring tools used in boneworking. Two of these artifacts came from the plowzone; the third was found in an early Saratown feature (Feature 11).

Spokeshave. Sample Size: 1. Form: This specimen is a thick, angular, decortication flake that has a broad (13 mm), shallow (3 mm), steeply retouched notch on one edge. Material: Rhyolite–1. Comment: Spokeshaves, as the name implies, are thought to represent woodworking planes. This specimen was recovered from Feature 3, a Dan River phase storage pit.

Utilized and Retouched Flakes. Sample Size: 48. Form: This category includes flakes that exhibit marginal retouch (n=46) or edge damage indicating use (n=2). Material: Rhyolite-31, Quartz–7, Jasper–6, Other metavolcanic rock–2, Crystal quartz–2. Comment: These specimens are thought to represent *ad hoc* cutting implements and were the second most frequent kind of stone tools recovered. Although most came from the plowzone, retouched flakes also were found in both Dan River and early Saratown features.

Ground Stone Artifacts

Engraved Stone. Sample Size: 1. Form: This specimen is a waterworn sandstone river cobble that has an engraved design on one surface made up of three parallel lines crossed by three other parallel lines. Material: Sandstone–1. Comment: This artifact, recovered from Feature 29, probably represents a utilitarian implement such as a sharpening stone or anvil.

Ground Stone Fragment. Sample Size: 1. Form: This artifact is a piece of granite that has been ground on one surface. Material: Granite–1. Comment: This specimen was recovered from Feature 11.

Large Cobble Tools

Cobble Chopper. Sample Size: 1. Form: This artifact is a cobble that has been flaked at one end to produce a sharp edge. Material: Granite–1. Comment: Cobble choppers are thought to represent heavy butchering tools. This artifact was found in Feature 27.

Hammerstones/Manos. Sample Size: 4. Form: All four specimens are cobbles that exhibit battering along the lateral edges. Material: Quartz–2, Granite–1, Other metavolcanic rock–1. Comment: These hand-held hammers probably were used in flintknapping and other tasks. One of these artifacts came from Feature 19; the remainder came from disturbed contexts.

Summary

With the exception of five projectile points and a single end scraper, most of the lithic artifacts found at the Powerplant site can be attributed to Late Prehistoric and Contact period occupations. Furthermore, the lack of more extensive evidence for the early Saratown occupation suggests that most lithic artifacts probably are associated with the earlier Dan River occupation.

When compared with lithic artifacts from the William Kluttz and Lower Saratown sites, this sample contains surprisingly few types of chipped stone tools. In fact, triangular projectile points, bifaces, and retouched flakes account for over 85% of all stone tools. Although hunting, butchering, and flintknapping activities are well represented by the sample, other activities such as hideworking, boneworking, non-lithic tool manufacturing, crop cultivation, and plant food processing are at best poorly represented. Given that this was the smallest lithic artifact sample from the Dan River site sample, it is difficult to determine whether this pattern has real implications for site function or is simply a consequence of small sample size.

Clay Artifacts

Sixteen clay artifacts were recovered from the site. Seven of these are pieces of smoking pipes and include five bowl rim fragments and two stem fragments. One of the bowl rims, from Feature 11, has a thickened lip; another notched rim fragment was found in the plowzone. The other clay artifacts from the site include

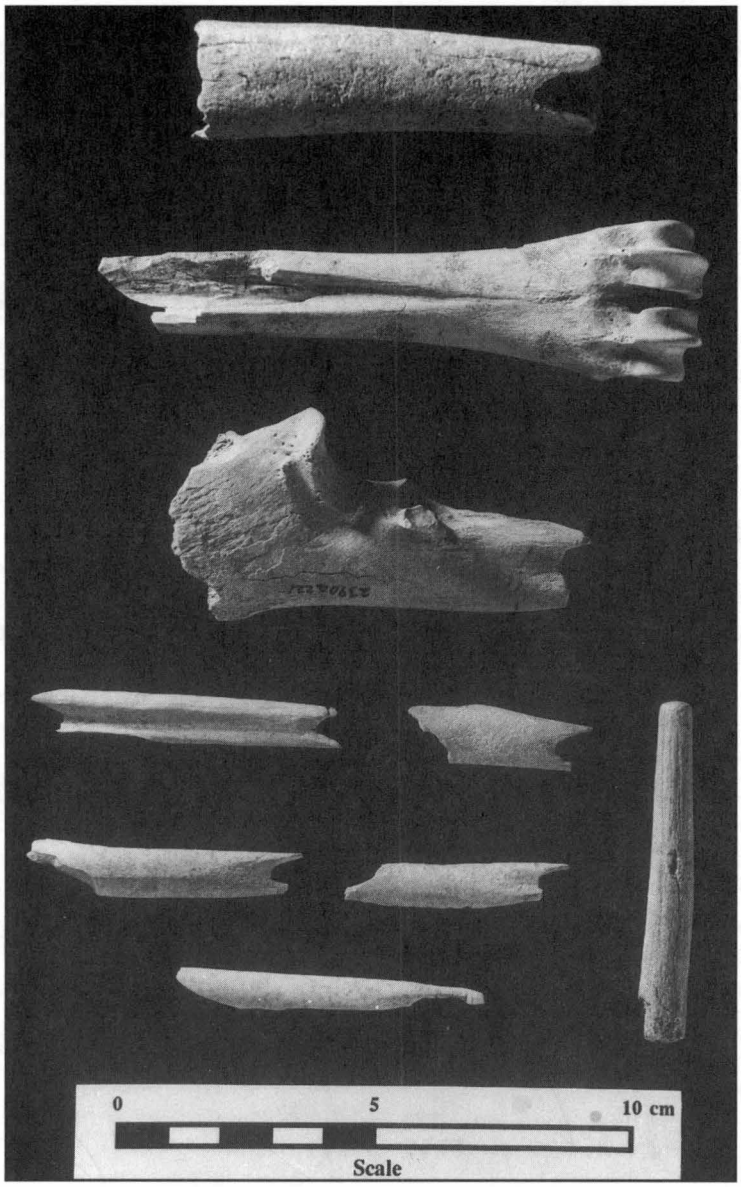

Figure 10.34. Bone artifacts from the Powerplant site.

seven amorphous, hand-molded pieces of fired clay, and two conjoining fragments of a punctated handle (possibly from a clay pot).

In addition, small quantities of fired clay were recovered from the plowzone as well as from most excavated features. Whether these specimens represent hearth remains or architectural daub is uncertain.

Bone Artifacts

Sixteen worked bone artifacts were recovered from four features and the plowzone. Feature 1 contained most of these artifacts, including a bone disk bead (3 mm in diameter), a beamer fragment, two bone splinter awls, a fishhook fragment, and five pieces of fishhook manufacturing debris (Figure 10.34, bottom). Feature 13 produced a piece of cut antler (Figure 10.34, top), a cut turtle carapace fragment, and a bone beamer (Figure 10.34, second from top). Feature 2 contained an antler punch (Figure 10.34, bottom right) and Feature 25 contained a drilled turtle carapace fragment. Finally, a bone fishhook blank was recovered from the plowzone overlying Features 1, 12, and 13. All of these artifacts are associated with the Dan River phase occupation of the site.

Historic Artifacts

Six historic artifacts were found at the Powerplant site. A single dark blue seed bead (Kidd and Kidd's type IIa48) was found the upper fill of Feature 9, a large storage pit. This artifact is attributed to the early Saratown occupation of the site.

One small fragment of thin, olive green, bottle glass was retrieved from the plowzone. The color and composition of the glass are similar to characteristics of seventeenth-century glass recovered from feature contexts at other Siouan sites. This similarity and the presence of the glass bead point to a post-Dan River phase, historic component at the Powerplant site. The presence of Oldtown series ceramics lends further support for the existence of a Contact period occupation.

The plowzone also contained two unidentifiable iron fragments and an iron ring of undetermined function. A modern split-lead sinker also was screened from the plowzone.

Faunal Remains

by

Mary Ann Holm

A total of 2,176 fragments of bone was recovered from 23 features at the Powerplant site (Table 10.4). Because the preservation of bone at this site was fairly poor, only 13% of these fragments could be identified beyond the level of class.

All feature fill was carefully washed through 1/2-inch, 1/4-inch, and 1/16-inch screens. Analysis was limited to bones from 1/2-inch waterscreen samples and all bones from smaller screen samples which could be identified beyond the level of class. The other 1/4-inch bones were simply counted and weighed, while the remaining 1/16-inch bones were neither sorted, counted, nor weighed. No attempt was made to record how many of these small, unidentifiable fragments were modified (e.g., burned or gnawed).

Dan River Phase

Sixteen features dating to the Dan River phase yielded a total of 1,854 bone fragments. These fragments represented a minimum of 28 individuals belonging to 22 different species. Nearly 40% of the individuals were mammals, 14% were birds, 25% were reptiles, 3% were amphibians, and 18% were fish. With the exception of deer (MNI=2), white-footed deer mouse (MNI=2), turkey (MNI=2), and box turtle (MNI=3), none of the species in this assemblage was represented by more than a single individual.

Approximately 56% of the bone fragments from Dan River features were unidentifiable fragments recovered from 1/4-inch waterscreening. Of the remaining 960 fragments, 135 were burned and three appeared to have been gnawed.

Early Saratown Phase

Only 318 fragments of animal bone were recovered from early Saratown features at the Powerplant site. Nine species, each represented by a single individual, were represented in this assemblage. Approximately 76% of these bones were unidentifiable fragments recovered from 1/4-inch waterscreening. Of the remaining 76 fragments, 20 were burned and one displayed rodent gnawing marks. No worked bone was found.

Indeterminate Phase

Only four fragments of bone were recovered from contexts at the Powerplant site which could not be assigned to a particular phase. These consisted of three fragments of unidentifiable mammal bone and one fragment of an awl created from the shaft of a long bone of an unidentifiable bird.

Shell

Two hundred and forty-one shells and shell fragments greater than 1/2-inch in diameter were recovered during excavations at the site. Numerous other small fragments also were collected during 1/4-inch and 1/16-inch waterscreening of feature fill. Fourteen specimens were gastropod shells from the plowzone and the top of Feature 9. The remainder were freshwater mussel shells and were recovered from Features 1, 2, 3, 6, 9, 10, 11,12, 13, 25, and 30, and the plowzone. All of these specimens most likely were taken from the nearby Dan River.

Botanical Remains

by

Kristen J. Gremillion

Carbonized plant remains from the 1988 excavations at the Powerplant site were systematically recovered from 28 10-liter flotation samples (Tables 10.5 to 10.8). All excavated features, except Features 5 and

Table 10.4. Faunal remains from the Powerplant site.

Species	Dan River Phase						Early Saratown Phase						Indeterminate				Total			
	Freq.		Weight		MNI		Freq.		Weight		MNI		Freq.		Weight		Freq.		Weight	
	n	%	g	%	n	%	n	%	g	%	n	%	n	%	g	%	n	%	g	%
Mammals																				
Sylvilagus sp., Cottontail	1	0.05	0.20	0.01	1	3.57	-	-	-	-	-	-	-	-	-	-	1	0.04	0.20	0.01
Sciurus carolinensis, Gray Squirrel	1	0.05	0.20	0.01	1	3.57	-	-	-	-	-	-	-	-	-	-	1	0.04	0.20	0.01
Sciurus niger, Fox Squirrel	1	0.05	0.30	0.02	1	3.57	-	-	-	-	-	-	-	-	-	-	1	0.04	0.30	0.02
Sciurus sp., Squirrel	3	0.16	0.30	0.02	-	-	2	0.63	0.33	0.16	1	11.11	-	-	-	-	5	0.23	0.63	0.04
Castor canadensis, Beaver	3	0.16	21.10	1.38	1	3.57	-	-	-	-	-	-	-	-	-	-	3	0.14	21.10	1.21
Microtus pennsylvanicus, Meadow Vole	28	1.51	1.12	0.07	2	7.14	-	-	-	-	-	-	-	-	-	-	28	1.29	1.12	0.06
Cricetidae, Mice, Voles	1	0.05	0.01	0.00	-	-	-	-	-	-	-	-	-	-	-	-	1	0.04	0.01	0.00
Urocyon cinereoargenteus, Gray Fox	9	0.49	9.13	0.60	1	3.57	-	-	-	-	-	-	-	-	-	-	9	0.41	9.13	0.52
Procyon lotor, Raccoon	1	0.05	2.60	0.17	1	3.57	-	-	-	-	-	-	-	-	-	-	1	0.04	2.60	0.15
Mephitis mephitis, Striped Skunk	1	0.05	0.70	0.05	1	3.57	-	-	-	-	-	-	-	-	-	-	1	0.04	0.70	0.04
Odocoileus virginianus, White-tailed Deer	104	5.61	567.96	37.02	2	7.14	10	3.18	74.20	36.81	1	11.11	-	-	-	-	114	5.24	642.16	36.86
Unidentified Mammals	288	15.53	427.50	27.87	-	-	35	11.01	45.80	22.72	-	-	3	75.00	5.00	78.12	326	14.98	478.30	27.45
Total Mammals	441	23.79	1031.12	67.21	11	39.28	47	14.82	120.33	59.69	2	22.22	3	75.00	5.00	78.12	491	22.56	1156.45	66.38
Birds																				
Colinus virginianus, Bobwhite	1	0.05	0.20	0.01	1	3.57	-	-	-	-	-	-	-	-	-	-	1	0.04	0.20	0.01
Meleagris gallapavo, Wild Turkey	14	0.76	32.70	2.13	2	7.14	4	1.26	12.10	6.00	1	11.11	-	-	-	-	18	0.83	44.80	2.57
Ectopistes migratorius, Passenger Pigeon	2	0.11	0.40	0.03	1	3.57	-	-	-	-	-	-	-	-	-	-	2	0.09	0.40	0.02
Unidentified Birds	60	3.24	53.63	3.50	-	-	2	0.63	0.80	0.40	-	-	1	25.00	1.40	21.88	63	2.90	55.83	3.24
Total Birds	77	4.15	86.93	5.67	4	14.28	6	1.89	12.90	6.40	1	11.11	1	25.00	1.40	21.88	84	3.86	101.23	5.81

Table 10.4 Continued.

Species	Dan River Phase						Early Saratown Phase						Indeterminate				Total			
	Freq.		Weight		MNI		Freq.		Weight		MNI		Freq.		Weight		Freq.		Weight	
	n	%	g	%	n	%	n	%	g	%	n	%	n	%	g	%	n	%	g	%
Reptiles																				
Sternotherus oderatus, Musk Turtle	2	0.11	0.70	0.05	1	3.57	-	-	-	-	-	-	-	-	-	-	2	0.09	0.70	0.04
Kinosternon subrubrum, Mud Turtle	19	1.02	19.00	1.24	1	3.57	8	2.52	10.30	5.11	1	11.11	-	-	-	-	27	1.24	29.30	1.68
Terrapene carolina, Box Turtle	14	0.76	30.71	2.00	3	10.71	5	1.57	4.40	2.18	1	11.11	-	-	-	-	19	0.87	35.11	2.01
Unidentified Turtle	22	1.19	12.70	0.83	-	-	-	-	-	-	-	-	-	-	-	-	22	1.01	12.70	0.73
Colubridae, Non-poisonous Snakes	12	0.65	0.61	0.04	1	3.57	1	0.31	0.10	0.05	1	11.11	-	-	-	-	13	0.60	0.71	0.04
Crotalidae, Poisonous Snakes	1	0.05	0.10	0.01	1	3.57	1	0.31	0.02	0.01	1	11.11	-	-	-	-	2	0.09	0.12	0.01
Unidentified Snake	1	0.05	0.01	0.00	-	-	-	-	-	-	-	-	-	-	-	-	1	0.04	0.01	0.00
Total Reptiles	71	3.83	63.83	4.16	7	25.00	15	4.72	14.82	7.35	4	44.44	-	-	-	-	86	3.95	78.65	4.51
Amphibians																				
Rana/Bufo sp., Frog, Toad	2	0.11	0.03	0.00	1	3.57	-	-	-	-	-	-	-	-	-	-	2	0.09	0.03	0.00
Lepisosteus sp., Gar	5	0.27	0.16	0.01	1	3.57	-	-	-	-	-	-	-	-	-	-	5	0.23	0.16	0.01
Catastomidae, Suckers	4	0.22	0.45	0.03	1	3.57	5	1.57	0.62	0.31	1	11.11	-	-	-	-	9	0.41	1.07	0.06
Ictalurus sp., Catfish	4	0.22	0.24	0.02	1	3.57	-	-	-	-	-	-	-	-	-	-	4	0.18	0.24	0.01
Lepomis sp., Sunfish	3	0.16	0.17	0.01	1	3.57	1	-	0.01	0.00	1	11.11	-	-	-	-	4	0.18	0.18	0.01
Centrarchidae, Bass, Sunfish	8	0.43	0.37	0.02	-	-	-	-	-	-	-	-	-	-	-	-	8	0.37	0.37	0.02
Perciformes, Darters	10	0.54	1.30	0.08	1	3.57	-	-	-	-	-	-	-	-	-	-	10	0.46	1.30	0.07
Unidentified Fish	5	0.27	1.00	0.07	-	-	-	-	-	-	-	-	-	-	-	-	5	0.23	1.00	0.06
Total Fish	39	2.10	3.69	0.24	5	17.85	6	1.89	0.63	0.31	2	22.22	-	-	-	-	45	2.07	4.32	0.25
Unidentified	1224	66.02	348.50	22.72	-	-	244	76.73	52.90	26.24	-	-	-	-	-	-	1468	67.46	401.40	23.04
Total	1854	100.00	1534.10	100.00	28	99.96	318	99.72	201.58	99.99	9	99.99	4	100.00	6.40	100.00	2176	99.94	1742.08	100.00

Table 10.5. Summary of plant remains from the Powerplant site (weights in grams).

Sample	Soil Volume (liters)	Wood/Stem Charcoal	Cane	Unknown Plants	Plant Food Remains	Total
Dan River Phase						
Feature 1						
Zone 1	10	0.82	-	0.04	0.38	1.24
Feature 2						
Zone 1	10	4.48	-	0.01	0.52	5.01
Feature 3						
Zone 1	10	1.34	-	0.07	0.36	1.77
Feature 4						
Zone 1	10	13.12	-	0.12	2.08	15.32
Feature 6						
Zone 1	10	18.27	-	0.25	1.41	19.93
Zone 2	10	1.68	-	0.02	0.54	2.24
Sub-total	20	19.95	-	0.27	1.95	22.17
Feature 7						
Zone 1	10	1.19	0.05	0.02	0.29	1.55
Feature 8						
Zone 1	10	0.67	-	0.46	0.05	1.18
Feature 10						
Zone 1	20	1.81	-	0.05	0.16	2.02
Feature 12						
Zone 1	10	1.10	-	0.10	0.15	1.35
Feature 13						
Zone 1	10	1.12	-	0.07	0.60	1.79
Feature 15						
Zone 1	10	0.28	-	-	0.05	0.33
Feature 16						
Zone 1	10	1.55	-	0.03	0.08	1.66
Feature 20						
Zone 1	10	0.09	-	0.03	-	0.12
Feature 21						
Zone 1	10	1.08	-	-	0.07	1.15
Feature 22						
Zone 1	10	0.02	-	-	0.05	0.07
Feature 24						
Zone 1	10	0.11	-	-	-	0.11
Feature 25						
Zone 1	10	1.04	-	0.02	0.02	1.08
Feature 28						
Zone 1	10	0.01	-	-	-	0.01
Feature 29						
Zone 1	10	3.40	-	0.05	0.35	3.80
Feature 30						
Zone 1	10	6.49	-	0.37	0.30	7.16
Feature 31						
Zone 1	10	0.75	-	0.02	-	0.77
Sub-total	230	60.42	0.05	1.73	7.46	69.66

Table 10.5 Continued.

Sample	Soil Volume (liters)	Wood/Stem Charcoal	Cane	Unknown Plants	Plant Food Remains	Total
Early Saratown Phase						
Feature 9						
Zone 1	10	2.40	0.03	0.05	0.34	2.82
Feature 11						
Zone 1	10	1.92	0.02	0.03	0.21	2.18
Feature 14						
Zone 1	10	0.04	-	-	0.08	0.12
Feature 19						
Zone 1	10	1.90	0.07	0.01	0.37	2.35
Feature 27						
Zone 1	10	7.44	0.02	0.03	1.18	8.67
Sub-total	50	13.70	0.14	0.12	2.18	16.14
Total	280	74.12	0.19	1.85	9.64	85.80

18, produced botanical samples. A total of 85.80 grams of wood charcoal, seeds, nutshell, and other charred plant remains was analyzed. Other plant remains recovered from waterscreened feature fill were not analyzed. Methods used to analyzed the ethnobotanical remains from the Powerplant site are the same as those described in Gremillion (1987).

Botanical remains are discussed below by cultural component.

Dan River Phase

The Powerplant site produced flotation samples from 19 Dan River phase pits and basins and two other features that probably also are associated with this phase. These samples represent 230 liters of fill and produced 69.66 grams of plant remains (0.31 grams/liter) and 7.46 grams of plant food remains (0.03 grams/liter). The ratio of seeds to total nutshell was 7.12.

Maize (*Zea mays* L.) was found in 89.5% of these samples and maize kernels comprised a rather striking 64.9% of identified seeds. Common bean (*Phaseolus vulgaris* L.) cotyledons occurred in 8.3% of samples but comprised only 5.4% of total seeds from the component. In addition to these cultigens, one sunflower (*Helianthus annuus* L.) seed of cultigen size was recovered.

Nutshell made up a quite high 91.0% of plant food remains, with cultigens (primarily maize) comprising only 8.3%, a value which is relatively low compared to Dan River and Saratown phase samples from Lower Saratown and the William Kluttz site. Compared to hickory (*Carya* sp.), acorn (*Quercus* sp.) shell was unusually abundant in this assemblage (21.7% of nutshell) and provided an exceptionally high acorn-to-hickory ratio of 15.90. Acorn's ubiquity, however, was not particularly high (only 45.8% of samples compared to 89.5% for hickory). Walnut (*Juglans nigra* L.) was also represented, and constituted 10.1% of all nutshell.

The fleshy fruit category was represented by grape (*Vitis* sp.), bramble (*Rubus* sp.), and sumac (*Rhus* sp.), but comprised only a total of 18.9% of identified seeds.

Early Saratown Phase

Flotation samples were drawn from five features at the Powerplant site that may form part of an early Saratown phase component. All of these features were classified as pits or basins. These samples contained 16.14 grams of plant remains (0.32 grams/liter) and 2.18 grams of plant food remains (0.04 grams/liter). The ratio of seeds to total nutshell was 3.53.

The overall botanical sample from this component is quite small, so only a few general comments can be made. Maize remains occurred in all but one of the features, and maize kernels made up the largest portion of identified seeds. Hickory and walnut comprised the bulk of the nutshell, with acorn represented by very small quantities from two of the features. Of particular interest was the presence of one caryopsis of little barley (*Hordeum pusillum* L.). This species was a small grain crop grown prehistorically in Illinois (Asch and Asch 1985). Little barley also was recovered from a Mitchum phase feature at the Mitchum site, where it occurred in association with large quantities of maygrass (*Phalaris caroliniana* Walter), a regionally important Eastern cultigen (Gremillion 1988). Although it could have grown as a weed at the Powerplant site, the links of this species with the continuation of elements of the Eastern North American pre-maize gardening complex into the Historic period in the Haw River drainage may have implications for interpreting subsistence change in the Dan drainage as well.

Table 10.6. Carbonized plant food remains from the Powerplant site (weights in grams).

Sample	Hickory Shell	Acorn Shell	Acorn Meat	Walnut Shell	Maize Kernels	Maize Cupules	Common Bean	Seeds	Total
Dan River Phase									
Feature 1									
Zone 1	0.21	0.06	0.08	0.02	<0.005	-	-	0.01	0.38
Feature 2									
Zone 1	0.22	0.03	-	0.22	0.03	0.02	-	<0.005	0.52
Feature 3									
Zone 1	0.26	<0.005	-	0.06	0.04	<0.005	-	<0.005	0.36
Feature 4									
Zone 1	2.05	-	-	0.02	-	0.01	-	-	2.08
Feature 6									
Zone 1	0.3	0.8	0.08	0.02	0.11	0.06	0.01	0.03	1.41
Zone 2	0.14	0.06	0.27	-	0.05	0.01	-	0.01	0.54
Sub-total	0.44	0.86	0.35	0.02	0.16	0.07	0.01	0.04	1.95
Feature 7									
Zone 1	0.18	-	-	0.10	<0.005	0.01	-	-	0.29
Feature 8									
Zone 1	-	-	-	0.02	0.03	-	-	-	0.05
Feature 10									
Zone 1	0.10	<0.005	-	0.05	-	0.01	-	-	0.16
Feature 12									
Zone 1	0.04	0.10	-	0.01	-	<0.005	-	-	0.15
Feature 13									
Zone 1	0.08	0.25	0.21	0.06	-	-	-	-	0.60
Feature 15									
Zone 1	0.02	-	-	-	0.01	0.02	-	-	0.05
Feature 16									
Zone 1	0.03	0.01	-	0.03	-	0.01	-	-	0.08
Feature 21									
Zone 1	0.07	-	-	-	-	-	-	-	0.07
Feature 22									
Zone 1	0.05	<0.005	-	-	-	-	-	-	0.05
Feature 25									
Zone 1	0.02	-	-	-	-	<0.005	-	-	0.02
Feature 29									
Zone 1	0.31	-	-	-	0.03	<0.005	0.01	<0.005	0.35
Feature 30									
Zone 1	0.04	<0.005	0.11	-	0.02	0.13	-	-	0.30
Sub-total	4.12	1.31	0.75	0.61	0.32	0.28	0.02	0.05	7.46
Early Saratown Phase									
Feature 9									
Zone 1	0.34	<0.005	-	-	-	-	-	-	0.34
Feature 11									
Zone 1	0.10	-	-	0.09	-	0.02	-	-	0.21
Feature 14									
Zone 1	<0.005	-	-	-	-	0.08	-	-	0.08
Feature 19									
Zone 1	0.25	-	-	0.05	0.05	0.02	-	-	0.37
Feature 27									
Zone 1	0.94	<0.005	-	0.21	0.03	-	-	-	1.18
Sub-total	1.63	<0.005	-	0.35	0.08	0.12	-	<0.005	2.18
Total	5.75	1.31	0.75	0.96	0.40	0.40	0.02	0.05	9.64

Table 10.7. Seed and fruit counts from the Powerplant site.

Sample	Chenopod	Grape	Sumac	Bramble	Sunflower	Common Bean	Maize Kernels	Little Barley	Nightshade	Legume family	Unknown	Total
Dan River Phase												
Feature 1												
Zone 1	-	1	-	-	-	-	1	-	1	-	-	3
Feature 2												
Zone 1	1	-	-	-	-	-	3	-	-	-	2	6
Feature 3												
Zone 1	-	-	-	-	-	-	2	-	-	1	-	3
Feature 6												
Zone 1	2	1	4	-	1	1	5	-	-	-	-	14
Zone 2	-	-	-	-	-	-	3	-	-	-	1	4
Sub-total	2	1	4	-	1	1	8	-	-	-	1	18
Feature 7												
Zone 1	-	-	-	-	-	-	1	-	-	-	-	1
Feature 8												
Zone 1	-	-	-	-	-	-	2	-	-	-	-	2
Feature 13												
Zone 1	-	-	-	-	-	-	1	-	-	-	-	1
Feature 15												
Zone 1	-	-	-	-	-	-	1	-	-	-	-	1
Feature 29												
Zone 1	-	-	-	1	-	1	4	-	-	-	1	7
Feature 30												
Zone 1	-	-	-	-	-	-	1	-	-	-	-	1
Sub-total	3	2	4	1	1	2	24	-	1	1	4	43
Early Saratown Phase												
Feature 19												
Zone 1	-	-	-	-	-	-	5	-	-	-	-	5
Feature 27												
Zone 1	-	-	-	-	-	-	1	1	-	-	-	2
Sub-total	-	-	-	-	-	-	6	1	-	-	-	7
Total	3	2	4	1	1	2	30	1	1	1	4	50

Table 10.8. Ubiquity of plant foods from Dan River phase features at the Powerplant site.

Plant Food	No. of 10-Liter Samples	%	No. of Features	%
Hickory	17	89.5	16	94.1
Maize	13	54.2	13	59.1
Walnut	11	45.8	11	50.0
Acorn	11	45.8	10	45.5
Grape	2	8.3	2	9.1
Chenopod	2	8.3	2	9.1
Bramble	2	8.3	2	9.1
Bean	2	8.3	2	9.1
Sunflower	1	4.2	1	4.5
Sumac	1	4.2	1	4.5
Total	19		17	

Summary

The primary significance of the Powerplant site is that it provided a substantial sample of early Dan River phase material in sealed feature contexts. Although features occurred with some frequency, they usually contained cultural deposits not as rich as those found on later Dan River and Saratown phase sites. The internal community structure also displays differences indicative of a smaller, more dispersed population than that of later Dan River phase settlements. At the Powerplant site, the community appears to have consisted of a linear pattern of households running parallel to the river. A somewhat similar early Dan River phase settlement, not palisaded and comprised of scattered households, also has been recognized in Virginia at the Leatherwood Creek site (44Hr1) (Davis and Ward 1989). Later in the Dan River phase, villages became more compact and were densely occupied. These later settlements usually were circular in outline and enclosed by one or more palisades.

The large percentage of corn kernels and the presence of beans in the ethnobotanical inventory attest to the importance of agriculture during the early Dan River phase. We speculate that agricultural pursuits intensified during the latter half of the phase, contributing to larger, thicker settlements where the requirements for arable land contributed to a heightened level of tension and hostilities between communities.

Chapter 11

The William Kluttz Site

The William Kluttz site (RLA-Sk6; 31Sk6) is located in the Upper Saratown vicinity of eastern Stokes County, North Carolina, approximately 0.2 mi southeast of the site known historically as "Upper Saratown" (31Sk1a). Situated on the west side of the Dan River, the site lies along a relatively level alluvial terrace about 500 ft back from the river. When plowed, the occupation area is clearly defined by a moderate scatter of cultural debris (primarily pottery) over an area approximately 350 ft by 800 ft, or about 6.5 acres (Figure 11.1).

On November 11 1967, Mr. R. P. Gravely, Jr. of Martinsville, Virginia wrote Joffre Coe to report that a large site near Upper Saratown was being looted by relic collectors. Gravely had visited the site on the same day he wrote the letter and had observed nine people vandalizing it. He interviewed these individuals and found that they had been digging for about six weeks and had looted approximately 30 burials, many of which contained trade artifacts. These artifacts ranged from glass beads to wire bracelets, iron axes, and muskets. On November 14, Roy Dickens, Joffre Coe, and Olin McCormick of the Research Laboratories of Anthropology visited the site for the first time and observed 45 to 50 filled-in potholes. After this visit, the site was formally entered into the Research Laboratories' site files as "Sk'6" (Site files, Research Laboratories of Anthropology, UNC–Chapel Hill).

In the Fall of 1971, another incident of site vandalism at nearby Upper Saratown (31Sk1a) was brought to the attention of UNC archaeologists. This incident led to the initiation of archaeological fieldwork the following summer at Upper Saratown (Keel 1972). During the 10 consecutive field seasons that followed, the crews working at Upper Saratown conducted numerous surface collections at the William Kluttz site, but excavations were never carried out. There seemed to be a general consensus that the site had been too severely looted to be productively investigated. Despite this, the surface-collected pottery from the site did contribute to a study of ceramic variability and typology within the upper Dan River basin (Gardner 1981).

After re-analyzing some of the surface collections from the site, it became apparent that the rich Contact period component was accompanied by an earlier Dan River phase occupation. Because the historic component appeared to be later than Upper Saratown and therefore could contribute significant new information about the terminal Sara occupation of the region, we decided to at least auger test the site in order to: 1) determine its exact location and size; 2) assess the extent of the past destruction; 3) identify potentially late features; and 4) verify the presence of multiple site occupations. These initial investigations were conducted during the fall of 1987 and the spring of 1988.

Approximately 14,750 sq ft of the site was augered at 2.5-ft intervals along a 350-ft transect (Figure 11.2). This transect was laid out across the southwestern half of the site where the densest surface concentration of artifacts occurred. These tests identified numerous pit features and burials, many of which had not been ravaged by pothunters. More significantly, these features were spatially clustered in two distinct areas that appeared to represent separate cultural components. This interpretation also was supported by field observations of the spatial distribution of pottery on the site's surface.

During May and June 1988, 20 units measuring 10 ft by 10 ft were dug in three areas (designated Areas A, B, and C) and exposed 65 features as well as numerous postholes. Twenty-three of these features, including 12 human burials, six pits, four basins, and a large refuse-filled pit, were excavated (Figure 11.3).

Area A, an excavation block of 802.5 sq ft, contained all the Dan River phase pits as well as two Contact period burials (Figure 11.4). In Area B, 616 sq ft were opened and uncovered several Contact period burials clustered in what appears to be a cemetery (Figure 11.5). Finally, Area C was located near the northeastern edge of the site. Unlike Areas A and B which were chosen for excavation based upon the results of auger testing, Area C was selected based on the occurrence of several large potsherds on the surface. Here, 600 sq ft were opened, exposing a large (14.2 ft long by 19.2 ft wide by 3.2 ft deep) pit that contained extremely rich deposits of refuse (mostly pottery) dating to the final Contact-period occupation of the site (Figure 11.6).

Overall, the William Kluttz site was better preserved than we had expected, given past accounts of extensive looting. A majority of archaeological features encountered had not been looted, and no evidence was found to suggest that pothunters were still active at this site. However, the more shallow deposits, including many human burials, were being quickly eradicated by plowing.

Prior to excavation, the ground surface in and around Area B was littered with fragments of human bone that had recently been plowed up, and all the burials excavated in this area had been disturbed by plowing. If the present pattern of deep plowing persists, it is likely that most other shallow graves like those sampled in Area B will be entirely destroyed

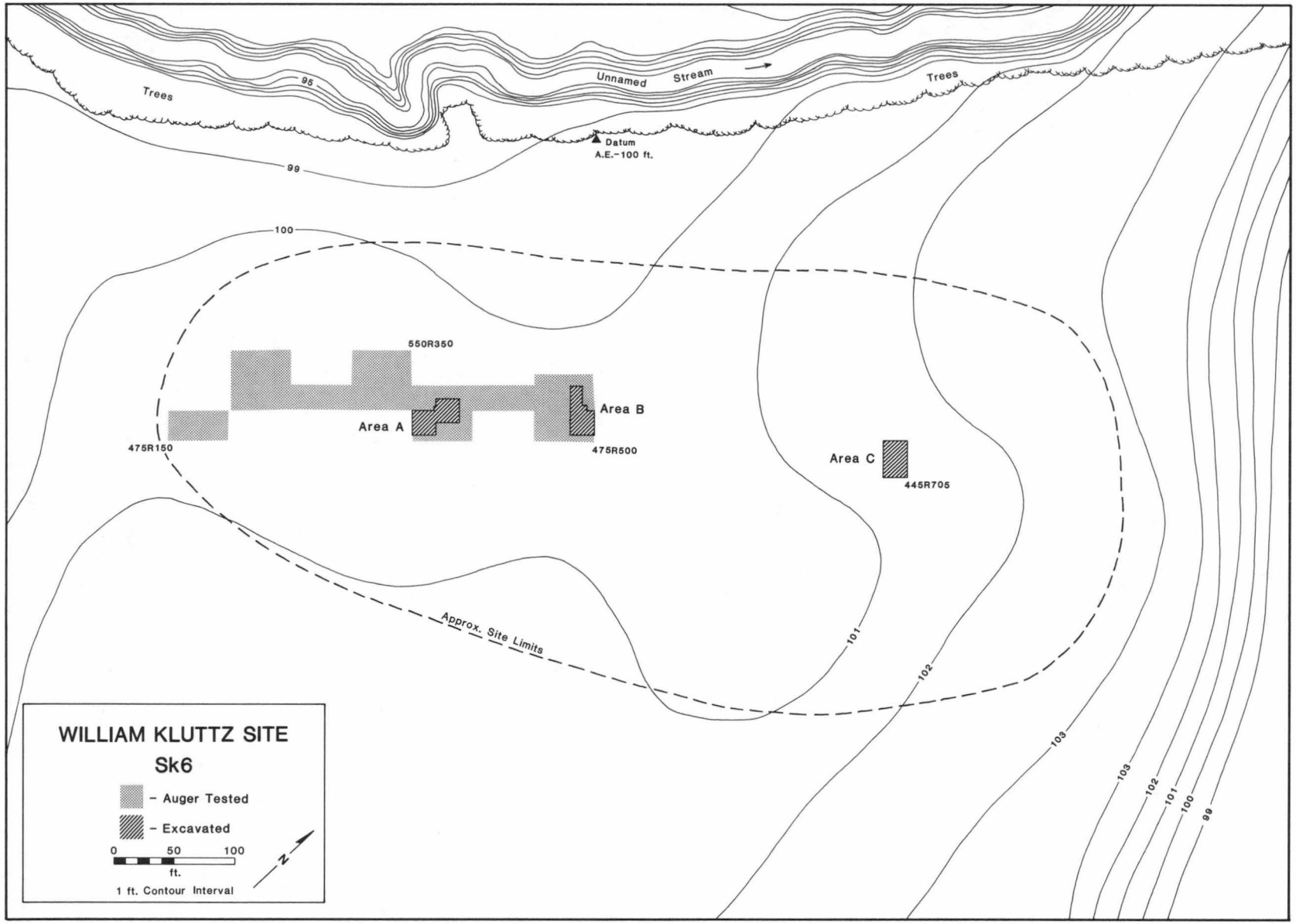

Figure 11.1. Map of the William Kluttz site showing areas of auger testing and excavation.

Figure 11.2. Auger testing at the William Kluttz site.

Figure 11.3. Beginning excavations in Area A (right) and Area B (left) at the William Kluttz site.

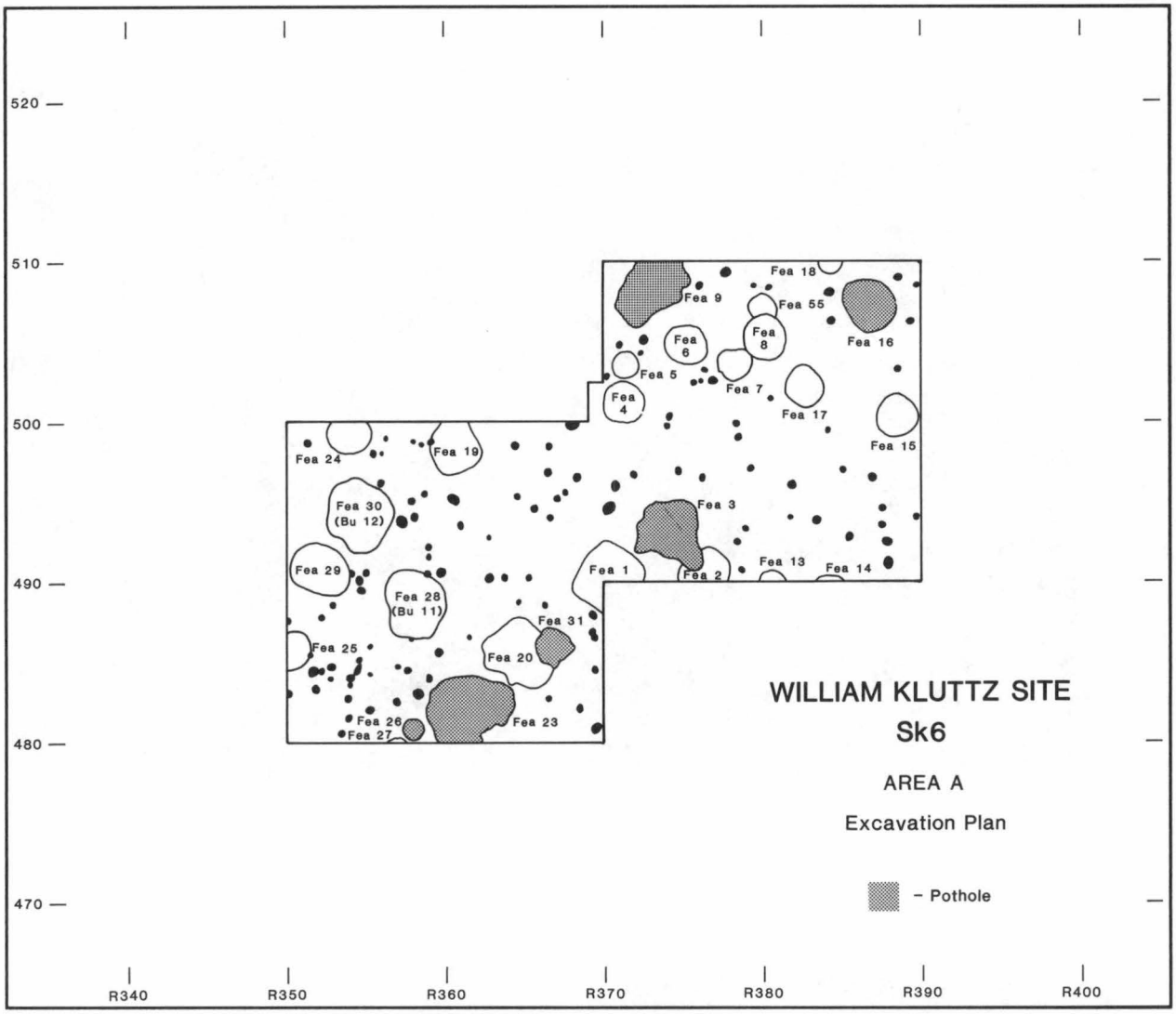

Figure 11.4. Excavation plan for Area A at the William Kluttz site.

during the next few years. Despite this, the William Kluttz site remains an important source of data on the late prehistoric and historic Indian occupation in the Upper Saratown locality.

Stratigraphy

Stratigraphy varied at the Kluttz site, depending on the location of the excavation block (Figure 11.7). At the western end of the site, or Area A, the plowzone was a brown sandy loam and was fairly uniform, averaging 1.0 ft in depth. It rested directly upon a yellowish tan, silty clay subsoil. The plowzone was rich in artifacts, particularly potsherds, that had been removed from the tops of features.

In the central excavation area (Area B), where the shallow burials were located, the plowzone was underlain by a layer of old village humus. The plowed soil ranged from 0.8 ft to 1.0 ft in thickness and was comprised of the same brown sandy loam found in Area A. The underlying humus zone was 0.3 ft to 0.5 ft thick. This undisturbed soil was a dark brown, organically enriched loam that contained animal and human bones, fired clay, charcoal particles, and large quantities of pottery and other artifacts. In most cases, features could be adequately isolated only after the humus had been removed to reveal the lighter colored subsoil.

The burials in Area B were encountered in the old village humus, near its interface with the plowzone. It was sometimes possible to delineate the bottoms of the burial pits after the humus had been removed from around the bones; however, in most instances the skeletons had been disturbed by plowing and pit outlines were obliterated.

The eastern excavation block (Area C), where Feature 10 was located, contained a deep plowzone that

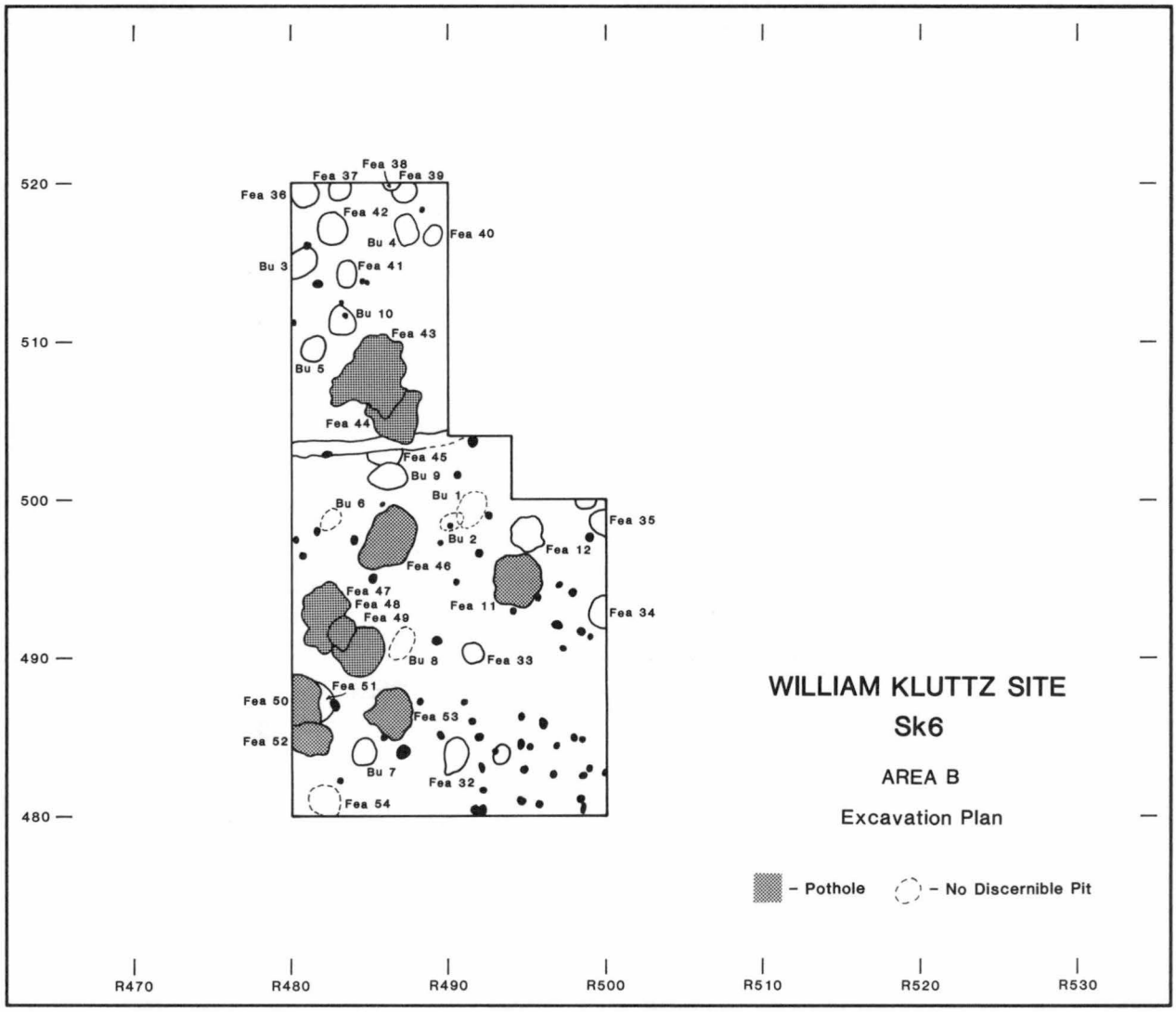

Figure 11.5. Excavation plan for Area B at the William Kluttz site.

ranged from 1.0 ft to as much as 1.5 ft in depth. Intact lenses of feature fill sometimes were present near the bottom of the plowed soil, indicating that the deepest plowing also was the most recent. The composition of the plowzone and subsoil was the same as that described above.

Features and Burials

Sixty-five features and human burials were identified during the 1988 investigations at the William Kluttz site (Table 11.1). Twenty-three of these, including 12 human burials, were excavated. Seven excavated features (Features 4, 6, 7, 8, 15, 17, and 55) contained artifacts which allow them to be attributed to the Dan River phase. Fifteen features, including all of the burials, artifact-rich Feature 10, and two basins (Features 21 and 54) are associated with the late Saratown phase occupation of the site. Finally, one excavated feature (Feature 5) contained too little material to determine its cultural association. The remaining features either extended beyond the limits of the excavations, were heavily potted, or appeared to represent additional burial pits in the cemetery (Area B). These were mapped and augered to determine depth, but were not excavated due to time constraints. All features and burials are described below.

Feature 1

This feature was located in Area A at the western end of the site. It was centered at 490R370 and extended into the 490 and R370 profiles. On the subsoil surface, it measured 4.0 ft by 3.8 ft and consisted of a compact, dark brown (7.5YR 3/2) humus. Due to its size, rectangular shape, and compact fill, Feature 1 was thought to be a burial pit. Because of this assessment and the fact that it intruded

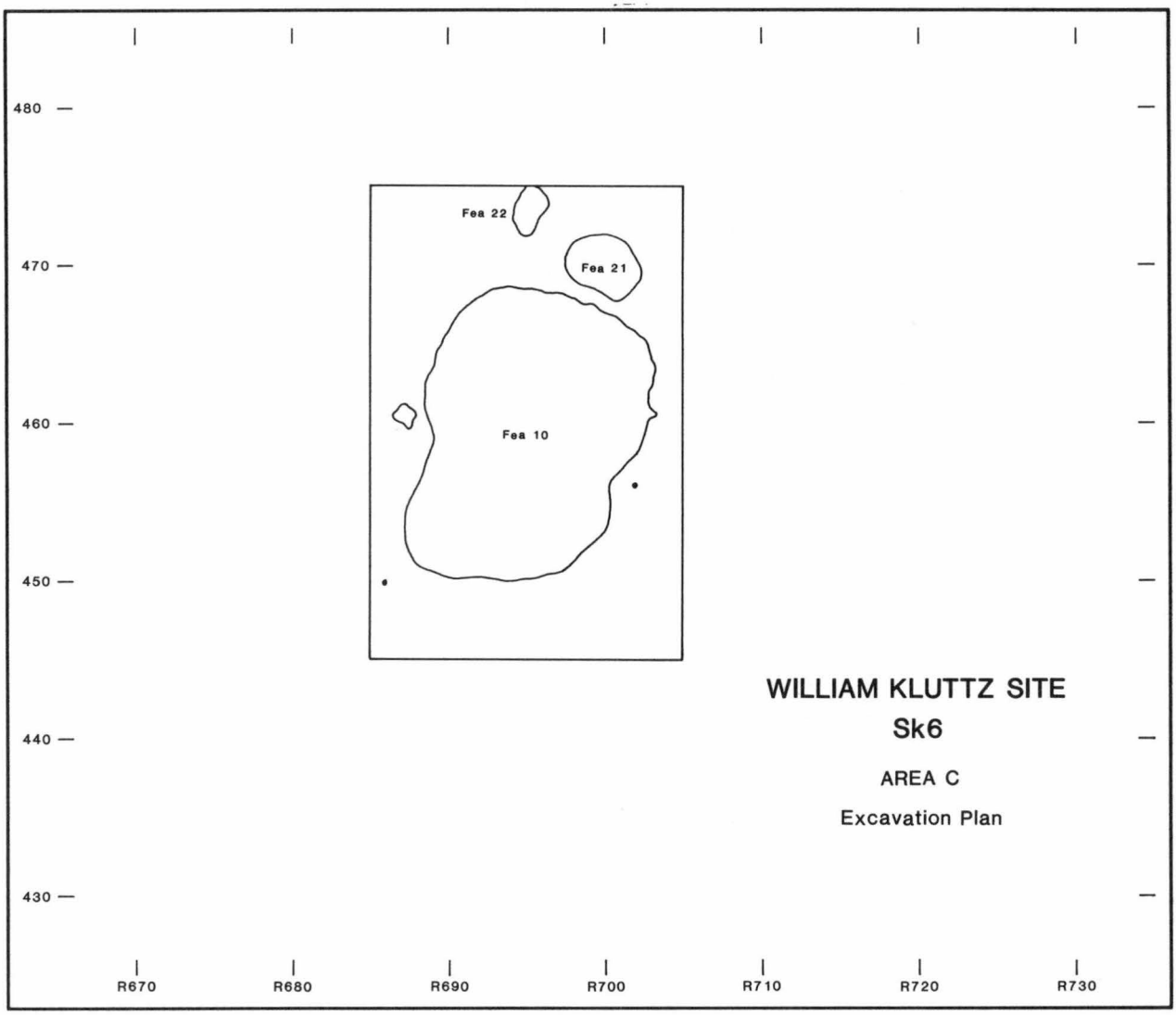

Figure 11.6. Excavation plan for Area C at the William Kluttz site.

into two profiles, Feature 1 was not excavated. The pit was auger tested, however, and revealed a depth of 2.2 ft, further supporting its identification as a burial pit. Potsherds from the top of Feature 1 suggest that it may date to the Dan River phase.

Feature 2

Feature 2 was located two feet east of Feature 1 and also extended into the 490 profile. It was partially disturbed by a large pothole, Feature 3. Feature 2 was circular in outline and measured 3 ft in diameter. The surface fill was comprised of a loosely packed, dark brown (5YR 3/2) loam with flecks of red clay, charcoal, and burned bone. Because the pit intruded into the profile, it was left unexcavated. Auger tests revealed it was 1.3 ft deep. Given the fill characteristics and dimensions of Feature 2, it probably functioned as a storage facility that was refilled with refuse. Potsherds removed from the top of this feature indicate that it is associated with the Dan River phase.

Feature 3

This pit had been totally destroyed by relic collectors. Shovel marks were evident around the periphery of the pothole, which measured 5.2 ft by 4.7 ft and intruded Feature 2. The fill consisted of plowed soil mixed with a loosely packed brown loam that probably represented the original pit fill. This fill also contained charcoal flecks, burned clay, and fragments of burned bone. This soil was similar to that contained in Feature 2, but auger tests indicated Feature 3 was only 0.8 ft deep. Because of the severe disturbance, Feature 3 was not excavated. Its shallow depth suggests use as a food preparation facility.

Feature 4

Feature 4 was located a few feet north of Features 1, 2, and 3, and was centered at 501.3R371.3. This circular pit had a diameter of 2.6 ft and extended to a depth of 1.8 ft beneath the subsoil surface (Figures 11.8, 11.8, and 11.10). The fill consisted of a single

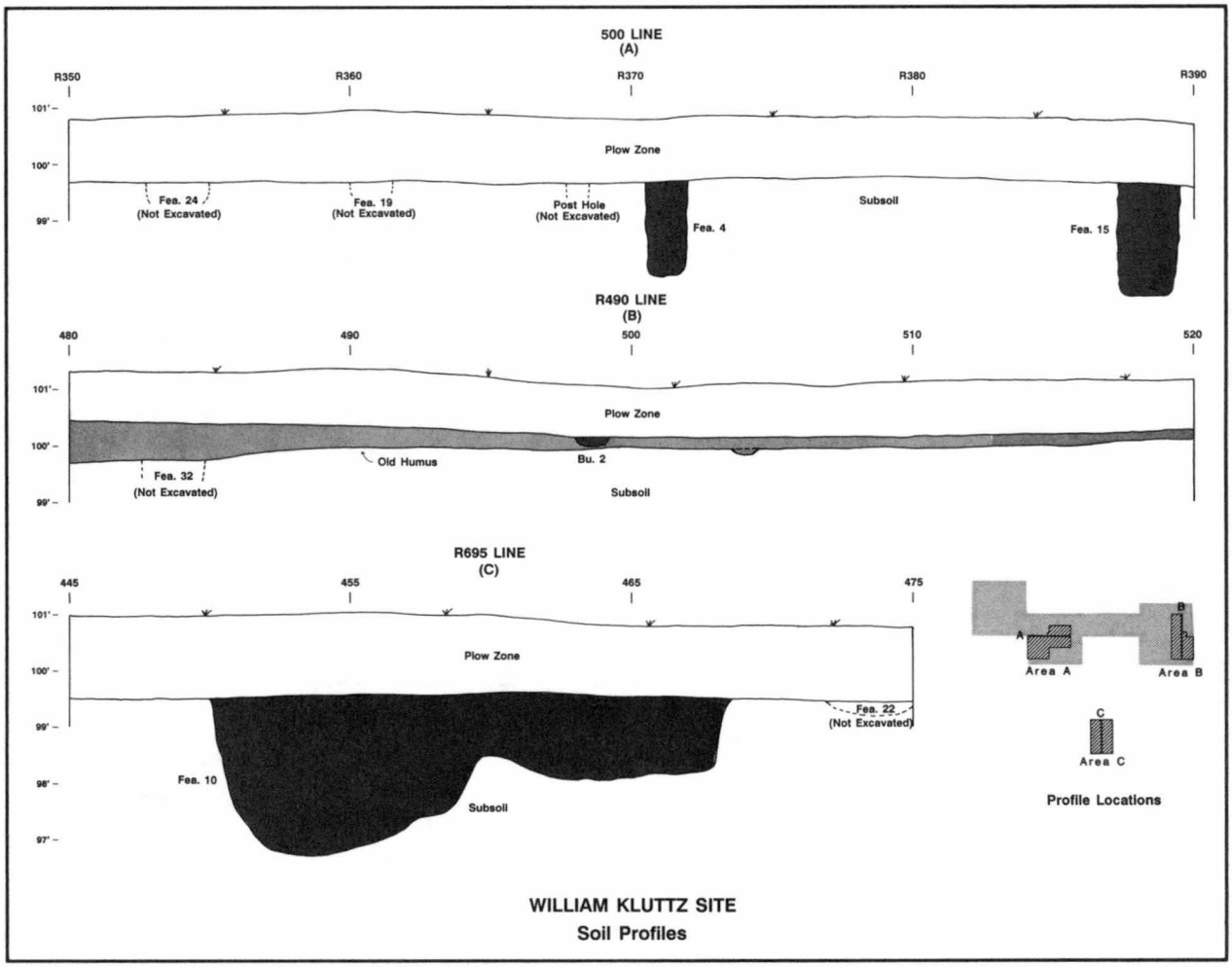

Figure 11.7. Stratigraphic profiles.

Table 11.1. Summary of features identified at the William Kluttz site.

Feature No.	Type	Center Location	Dimensions (ft) L	W	D	Phase Association	Comment
Fea. 1	Burial ?	490.0R370.0	4.0	3.8	2.2	Dan River	Mapped & Augered
Fea. 2	Pit ?	491.0R376.5	3.0	3.0	1.3	Dan River	Mapped & Augered
Fea. 3	Pothole	493.0R374.0	5.2	4.7	0.8	Indeterminate	Mapped & Augered
Fea. 4	Storage Pit	500.7R371.2	2.6	2.6	1.8	Dan River	Excavated
Fea. 5	Shallow Basin	503.0R371.2	3.8	3.7	0.2	Indeterminate	Excavated
Fea. 6	Storage Pit	504.7R375.2	2.7	2.5	1.2	Dan River	Excavated
Fea. 7	Storage Pit	503.5R378.2	2.3	2.2	0.7	Dan River	Excavated
Fea. 8	Storage Pit	505.2R380.0	2.7	2.6	0.6	Dan River	Excavated
Fea. 9	Pothole	508.5R373.0	5.0	3.8	1.8	Indeterminate	Mapped & Augered
Fea. 10	Large Pit	458.5R694.5	19.2	14.2	3.2	Late Saratown	Excavated
Fea. 11	Pothole	494.9R494.5	3.5	3.0	0.9	Indeterminate	Mapped & Augered
Fea. 12	Burial ?	497.7R495.0	2.5	2.1	2.1	Indeterminate	Mapped & Augered
Fea. 13	Pit ?	489.3R380.5	2.5	2.5	1.0	Indeterminate	Mapped & Augered
Fea. 14	Pit ?	489.0R384.2	2.5	2.5	1.0	Indeterminate	Mapped & Augered
Fea. 15	Storage Pit	500.2R388.5	2.7	2.6	2.0	Dan River	Excavated
Fea. 16	Pothole	507.4R386.7	3.5	2.9	1.1	Indeterminate	Mapped & Augered
Fea. 17	Storage Pit	502.2R382.5	2.8	2.6	1.0	Dan River	Excavated

Table 11.1 Continued.

Feature No.	Type	Center Location	Dimensions (ft) L	W	D	Phase Association	Comment
Fea. 18	Pit ?	510.0R384.4	1.5	1.5	-	Indeterminate	Mapped
Fea. 19	Burial	498.5R360.5	3.6	3.0	2.9	Indeterminate	Mapped & Augered
Fea. 20	Burial	485.5R364.9	4.4	3.5	0.6	Indeterminate	Mapped & Augered
Fea. 21	Food Prep. Facility	470.0R700.0	5.0	3.8	0.4	Late Saratown	Excavated
Fea. 22	Basin	473.6R695.4	3.5	2.0	0.3	Indeterminate	Mapped & Augered
Fea. 23	Potted Burial	482.3R361.5	5.5	5.0	2.7	Indeterminate	Mapped & Augered
Fea. 24	Burial ?	499.3R354.0	3.0	2.8	2.0	Indeterminate	Mapped & Augered
Fea. 25	Pit ?	485.7R350.4	2.3	2.2	0.8	Indeterminate	Mapped & Augered
Fea. 26	Pothole	480.7R357.9	1.4	1.4	-	Indeterminate	Mapped
Fea. 27	Pit ?	479.0R366.9	-	-	-	Indeterminate	Mapped
Fea.28 (Bu.11)	Burial	488.5R358.0	4.3	3.8	3.2	Late Saratown	Excavated
Fea. 29	Burial ?	490.7R351.8	3.9	3.0	1.2	Indeterminate	Mapped & Augered
Fea.30 (Bu.12)	Burial	494.0R354.5	4.5	3.7	3.1	Late Saratown	Excavated
Fea. 31	Pothole	485.8R366.5	2.8	2.3	-	Indeterminate	Mapped
Fea. 32	Burial ?	483.5R490.4	2.3	1.5	1.2	Indeterminate	Mapped & Augered
Fea. 33	Burial ?	490.2R491.3	1.5	1.5	0.5	Indeterminate	Mapped & Augered
Fea. 34	Burial ?	492.8R500.0	2.2	2.1	1.6	Indeterminate	Mapped & Augered
Fea. 35	Burial ?	498.6R499.8	1.9	1.7	0.3	Indeterminate	Mapped & Augered
Fea. 36	Burial ?	519.4R480.7	2.0	1.8	0.2	Indeterminate	Mapped & Augered
Fea. 37	Burial ?	519.6R483.1	1.5	1.4	0.7	Indeterminate	Mapped & Augered
Fea. 38	Burial ?	520.3R486.3	1.5	1.5	0.3	Indeterminate	Mapped & Augered
Fea. 39	Burial ?	519.5R487.3	1.5	1.5	0.2	Indeterminate	Mapped & Augered
Fea. 40	Pit ?	516.6R489.2	1.3	1.0	2.3	Indeterminate	Mapped & Augered
Fea. 41	Burial	514.2R483.5	1.7	1.3	0.6	Indeterminate	Mapped & Augered
Fea. 42	Burial ?	517.0R482.6	2.0	2.0	0.8	Indeterminate	Mapped & Augered
Fea. 43	Potted Burial	507.7R485.2	5.0	4.5	0.6	Indeterminate	Mapped & Augered
Fea. 44	Potted Burial	505.5R486.8	3.5	3.0	0.3	Indeterminate	Mapped & Augered
Fea. 45	Burial ?	503.0R486.0	2.2	2.0	0.9	Indeterminate	Mapped & Augered
Fea. 46	Pothole	497.5R486.4	4.3	3.0	0.4	Indeterminate	Mapped & Augered
Fea. 47	Potted Burial	492.6R482.0	4.3	2.8	0.5	Indeterminate	Mapped & Augered
Fea. 48	Potted Burial	491.5R483.0	2.2	1.5	0.4	Indeterminate	Mapped & Augered
Fea. 49	Pothole	490.5R484.2	3.0	3.0	0.5	Indeterminate	Mapped & Augered
Fea. 50	Pothole	487.2R480.3	3.2	3.0	0.7	Indeterminate	Mapped & Augered
Fea. 51	Pit ?	487.2R481.2	3.0	3.0	0.7	Indeterminate	Mapped & Augered
Fea. 52	Pothole	484.8R481.4	3.0	2.2	1.1	Indeterminate	Mapped & Augered
Fea. 53	Pothole	486.5R486.3	3.3	3.2	1.7	Indeterminate	Mapped & Augered
Fea. 54	Artifact Cluster	480.9R482.2	2.5	2.0	0.4	Late Saratown	Excavated
Fea. 55	Shallow Basin	507.0R380.0	1.9	1.8	0.3	Dan River	Excavated
Bu. 1	Burial	499.2R491.7	2.3	1.5	0.1	Late Saratown	Excavated
Bu. 2	Burial	498.7R490.5	2.0	1.5	0.1	Late Saratown	Excavated
Bu. 3	Burial	515.0R481.0	1.8	1.6	0.2	Late Saratown	Excavated
Bu. 4	Burial	517.0R487.4	1.9	1.5	0.4	Late Saratown	Excavated
Bu. 5	Burial	509.4R481.4	1.4	1.2	0.2	Late Saratown	Excavated
Bu. 6	Burial	499.2R482.7	1.4	1.0	0.1	Late Saratown	Excavated
Bu. 7	Burial	484.0R484.5	1.8	1.5	0.3	Late Saratown	Excavated
Bu. 8	Burial	491.0R487.0	2.2	1.4	0.1	Late Saratown	Excavated
Bu. 9	Burial	501.2R486.5	2.3	1.7	0.1	Late Saratown	Excavated
Bu. 10	Burial	511.2R488.2	1.9	1.4	0.3	Late Saratown	Excavated

zone of dark brown (7.5YR 3/2) loam with flecks of charcoal and fired clay that occurred throughout but were concentrated in the bottom half of the pit. Mixed in the fill were numerous pottery sherds, small flakes, pebbles, and fragments of fire-cracked rock. A small amount of poorly preserved animal bone also was present. Excavation revealed a straight-walled pit with a flat bottom. Its size and shape suggest the pit originally functioned as a storage facility, and the presence of *Dan River Net Impressed* potsherds indicates its use during the Dan River phase. Given the homogeneity of the deposit, the feature apparently was

Figure 11.8. Feature 4, before excavation.

Figure 11.9. Feature 4, excavated.

quickly filled with domestic refuse, perhaps from around a hearth area, after it was no longer suited for storage.

Feature 5

This small, shallow feature was located adjacent to

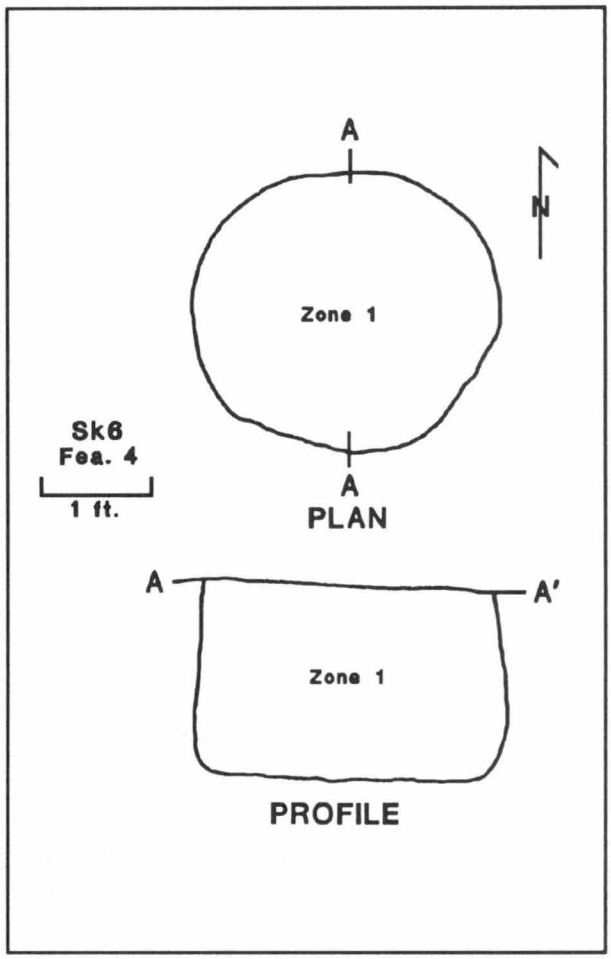

Figure 11.10. Feature 4, plan view and profile drawings.

and north of Feature 4. At the subsoil surface, it was circular in outline, measuring a little over 1.7 ft in diameter. Excavation revealed a basin-shaped depression only 0.2 ft deep (Figure 11.11). The shallow lens of fill consisted of a dark yellowish brown (10YR 3/4) loam with charcoal flecks and small particles of fired clay. Artifacts recovered include a few unidentifiable sherds and small pieces of animal bone. Except for a slightly lighter hue, the fill from Feature 5 was identical to that from Feature 4, suggesting that Feature 5 might represent a plowed out lens or smear from Feature 4.

Feature 6

This nearly circular pit was located a few feet east of Feature 5, in the center of Sq. 500R380. It measured 2.7 ft by 2.5 ft and extended to a depth of 1.2 ft beneath the subsoil surface (Figure 11.12). At the top of the subsoil, the dark reddish brown (5YR 3/3) pit fill appeared very similar to that from Feature 4 and also extended as a single zone to the bottom of the pit. Pockets of ash and flecks of charcoal were noted in the fill, which contained numerous potsherds, small quartz flakes, and fragments of fire-cracked rock. Several

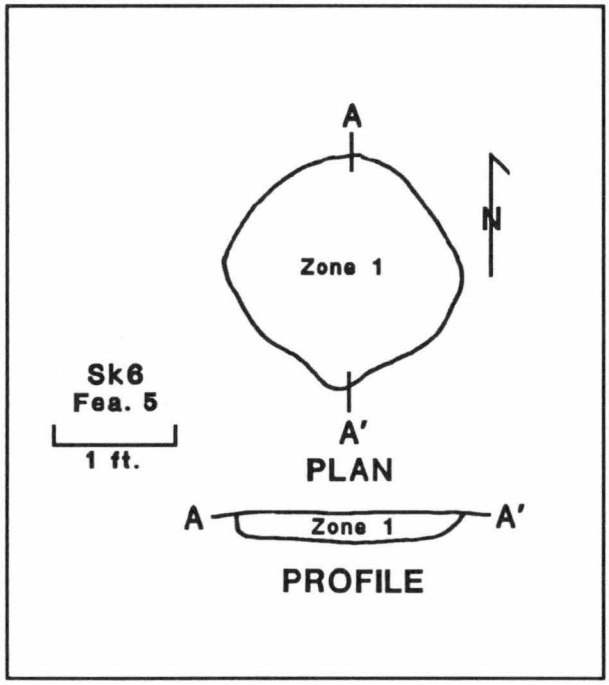

Figure 11.11. Feature 5, plan view and profile drawings.

poorly preserved animal bone fragments and a complete deer mandible also were recovered. A large *Dan River Net Impressed* rimsherd and a cluster of body sherds belonging to the same vessel were recovered from the upper portion of the feature. The walls of the pit were straight to insloping and the bottom was slightly concave. Overall, Feature 6 is very similar to Feature 4 and probably had the same behavioral history—a storage facility recycled as a garbage receptacle. The refuse in Feature 6 also appears to have been collected from the vicinity of a hearth or similar food preparation area.

Feature 7

This nearly circular pit was located adjacent to Feature 6 and was intruded by a slightly larger pit (Feature 8) (Figure 11.13). The fill consisted of a single zone of dark brown (7.5YR 3/2) loam with flecks of charcoal that increased in size with depth. In terms of color and texture, this fill was identical to that of the other Dan River phase features in Sq. 500R380. Artifact content was also comparable with plain and net-impressed sherds, a few small pieces of animal bone, fire-cracked rock fragments, and pebbles occurring throughout but concentrated toward the bottom of the pit. The feature measured 2.2 by 2.3 ft and extended to a depth of 0.7 ft beneath the subsoil surface. The walls bowed out slightly and the bottom was flat to slightly concave. Feature 7 probably also served as a storage pit prior to being filled with domestic refuse. The similar fill characteristics indicate contemporaneity for all these pits and suggest that they probably were filled at the same time from the same primary deposit.

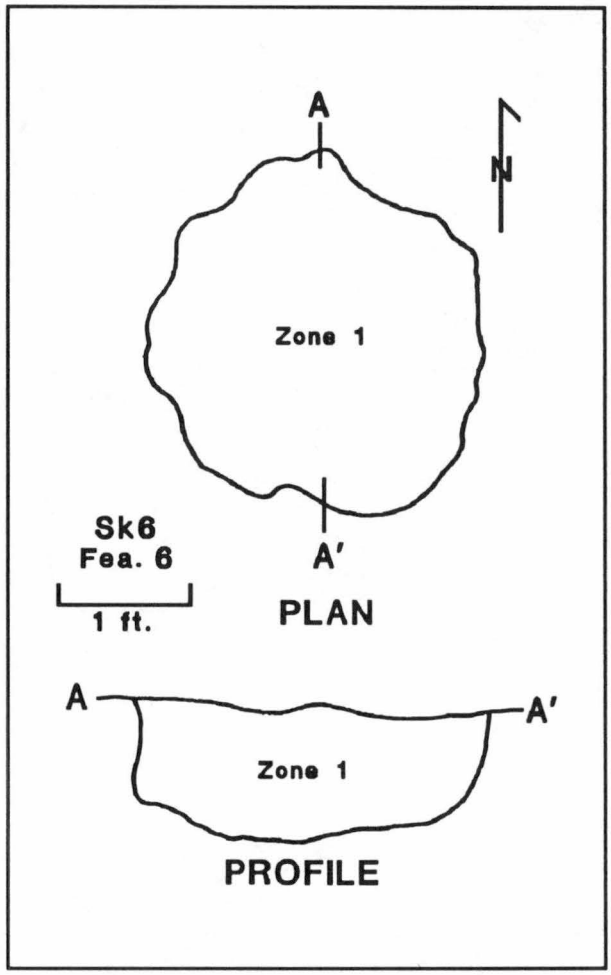

Figure 11.12. Feature 6, plan view and profile drawings.

Feature 8

Feature 8 intruded Features 6 and 55 and contained very similar fill which consisted of a loose, dark brown (7.5YR 3/2) loam with ash and small flecks of charcoal. Near the bottom of the pit, the charcoal fragments increased in size. *Dan River Net Impressed* pottery occurred in moderate amounts, and there were a few fragments of poorly preserved animal bone scattered throughout the fill. Small patches of fired clay also were observed. The single fill zone was contained within a circular pit measuring 2.7 ft in diameter and extending to a depth of 0.6 ft beneath the subsoil surface (Figure 11.13). The bottom was flat and the sides bowed out slightly. In general, Feature 8 is identical to other features in the area, and the similarity in fill zones suggests the pits were all filled at or near the same time with deposits from the same primary source. Although shallow, the size and configuration of this facility suggest its primary purpose was storage or concealment.

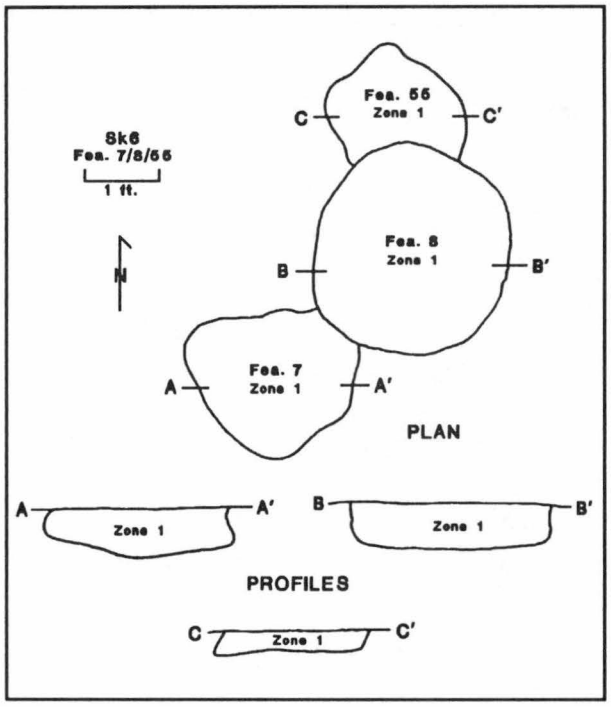

Figure 11.13. Features 7, 8, and 55, plan view and profile drawings.

Feature 9

This designation was assigned to a looted feature that extended into the 510 profile in Area A. Because of the disturbance and the fact that the feature was not completely exposed, it was mapped and augered but not excavated. Surface dimensions were 5.0 ft by 3.8 ft and augering indicated a depth of 1.8 ft. The fill was a loosely packed, dark brown loam with flecks of charcoal and burned bone. Feature 9 probably was similar to the other pits in Sq. 500R380.

Feature 10

After the site area was plowed, a surface collection revealed a small cluster of large *Oldtown Plain* potsherds that appeared to have been recently plowed from the top of a sub-plowzone feature. Augering in the immediate vicinity indicated the presence of one or more large, rich features located some 200 ft northeast of Area B. Removal of the plowzone from six contiguous squares, designated Area C, uncovered Feature 10, a very large, artifact-rich pit (Figures 11.14 and 11.15). In fact, this feature is unique within piedmont Siouan archaeology, both in terms of size and content.

Feature 10 measured 19.2 ft by 14.2 ft and had a maximum depth of 3.2 ft (Figure 11.16). In plan, it was shaped like an hourglass with the long axis oriented roughly north-south. After excavation, the feature seemed to represent two large, distinct, oval-shaped pits with a narrow shelf of subsoil separating them. However, profiles across the intersection of the two sections of the feature failed to reveal any indications of superposition that would indicate the two sections were filled at separate times. And the various fill zones identified during excavation crossed uninterrupted between the two sections (Figures 11.17 and 11.18).

The subsoil surface consisted of an homogeneous, very dark gray (10YR 3/1) loam with small fragments of fired clay and charcoal (Zone 1). Excavation revealed numerous clusters of fist-sized, fire-cracked quartz fragments associated with clusters of large, broken, Oldtown series potsherds (Figure 11.19). These concentrations of rock and pottery occurred throughout Zone 1, which also contained an assortment of glass trade beads, small fragments of burned bone, and stone and pottery disks. This was the thickest of the fill zones, and in some places it extended to a depth of over 2 ft.

Beneath Zone 1 in the northeastern quadrant of the feature was Zone 2, an uneven layer of dark reddish brown (5YR 2.5/2) sandy loam with large amounts of charcoal and burned bone and clay fragments. This deposit also contained several large pottery fragments and glass trade beads.

Beneath Zone 2 and Zone 1 (in areas where Zone 2 was not present) lay Zone 3, a brownish yellow (10YR 6/6) loam with only a few flecks of charcoal. This layer did, however, contain pockets or lens of burned clay, charcoal, and ash. At the bottom of one of the ashy deposits in the northeast corner was a large cluster of fire-cracked rock and large sections of pottery vessels. A thick lens of sterile gray sand also was observed within Zone 3 in the southwest quadrant of the feature.

The final zone, Zone 4, was comprised of a dark grayish brown (10YR 4/2) loam that contained only an occasional potsherd and a few fist-sized chunks of fire-cracked quartz.

After excavation, Feature 10 appeared to represent two large oval pits that were dug at slightly different times (Figures 11.20 and 11.21). However, both of these pits were open at the same time and refilled simultaneously as a consequence of the same behavioral episodes. The remaining questions are why the facility was dug in the first place, and what are the behavioral correlates reflected in the fill matrices? It could not have resulted from any known natural processes given its configuration and location in the floodplain. Flooding and scouring might be expected if the feature was located nearer to the river or configured in a more irregular, linear fashion. Its use as a borrow pit does not seem likely since the subsoil is silty in nature and not very different in terms of texture from the topsoil. Such soil certainly was not suited for use in the manufacture of hearths, or as a source of daubing material or pottery clay, as is usually the case where subsoil clays are mined creating borrow pits or depressions.

The clustering of large potsherds and fire-cracked rock throughout the fill zones is suggestive of basket

Figure 11.14. Removing plowed soil over Feature 10.

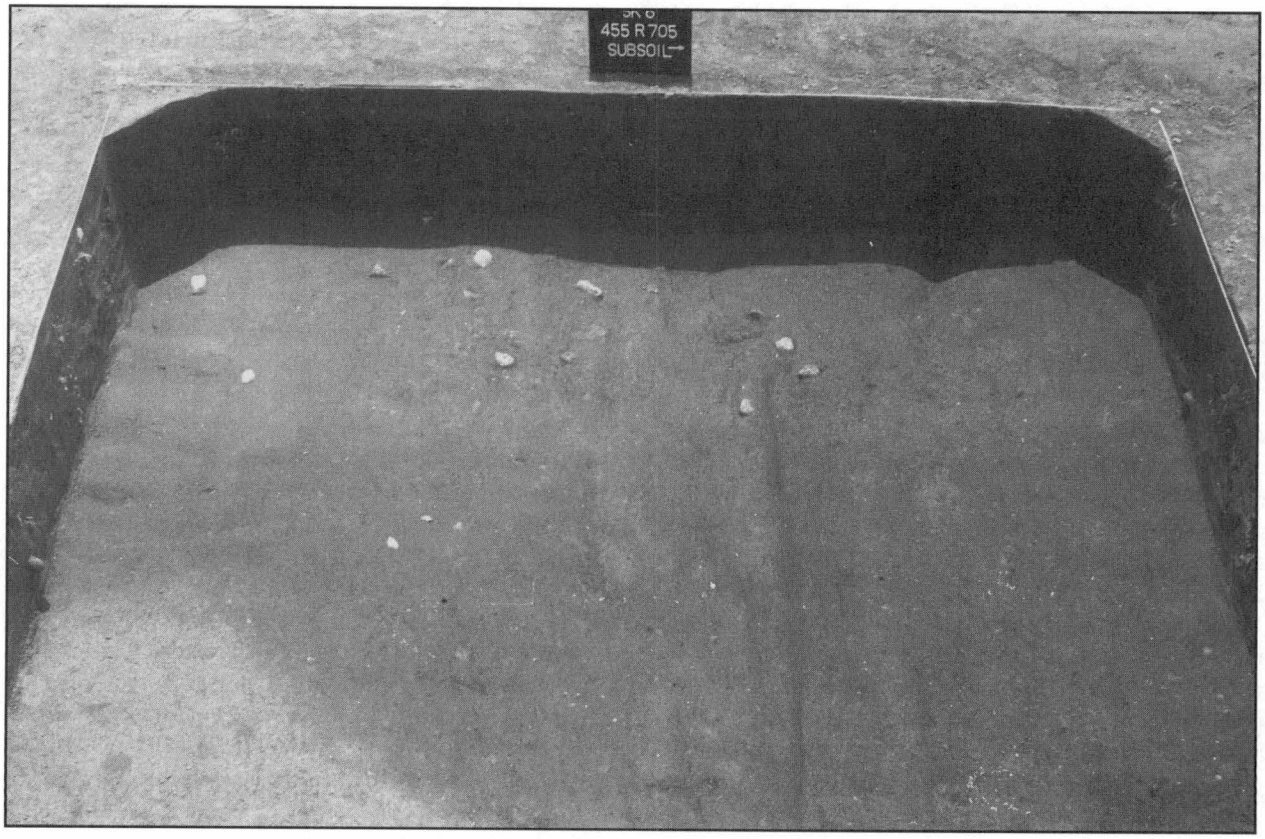

Figure 11.15. Portion of Feature 10 exposed at the base of Sq. 455R705.

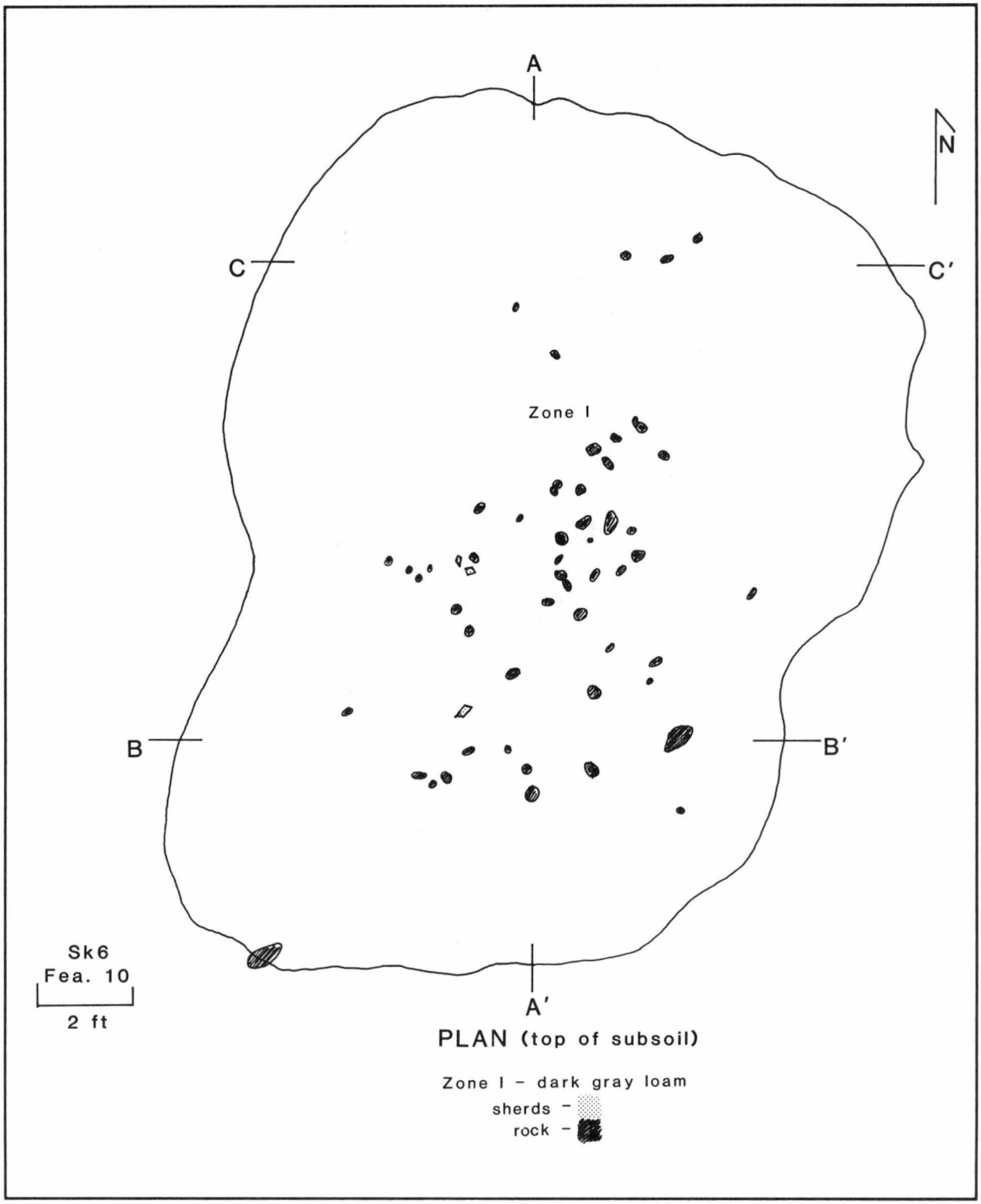

Figure 11.16. Top of Feature 10, plan view.

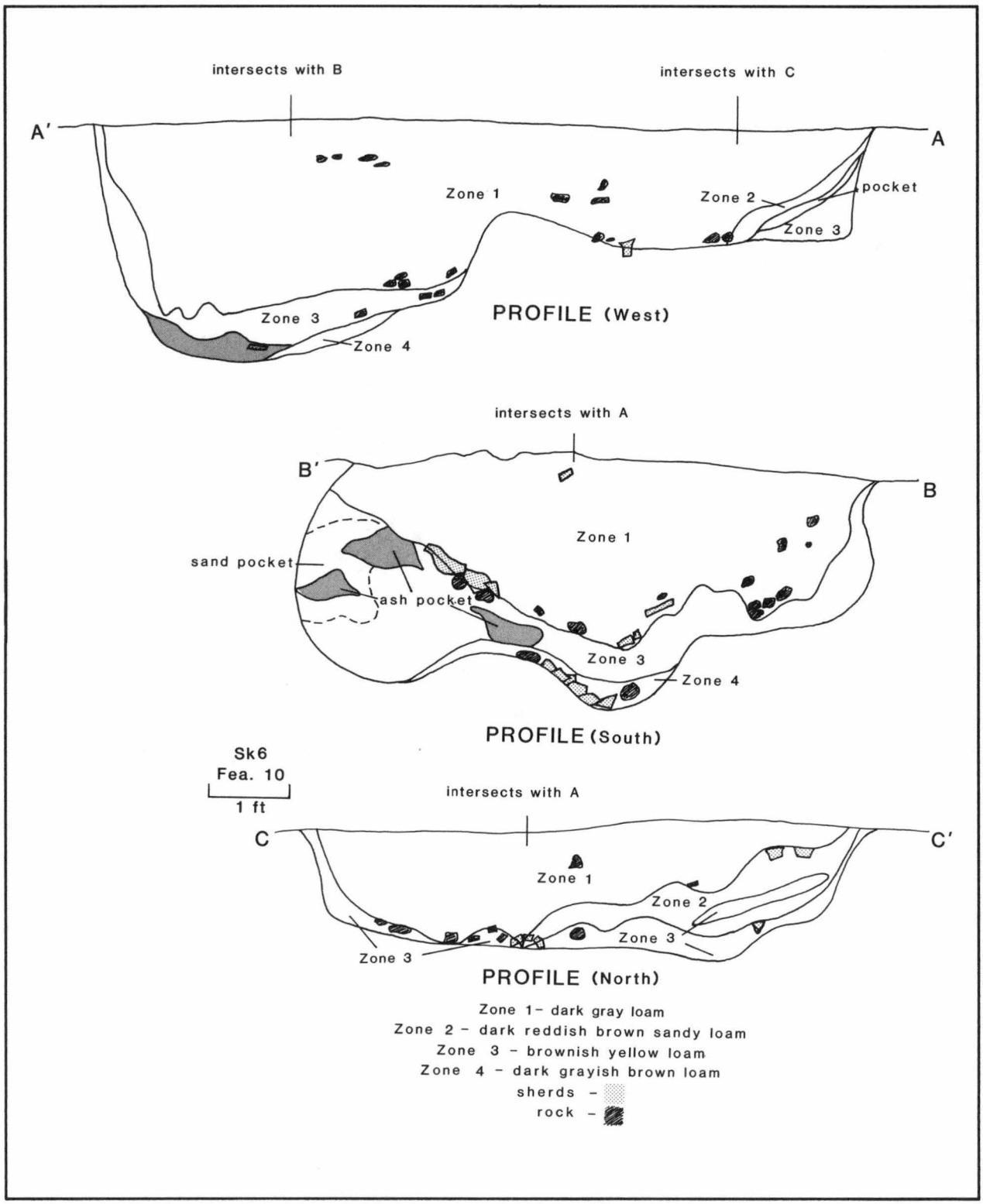

Figure 11.17. Profile view of Feature 10 deposits (see photograph of C-C' profile in Figure 11.19).

Figure 11.18. Broken pottery vessels at the bottom of Feature 10.

Figure 11.19. Stratigraphic profile (C-C') of Feature 10.

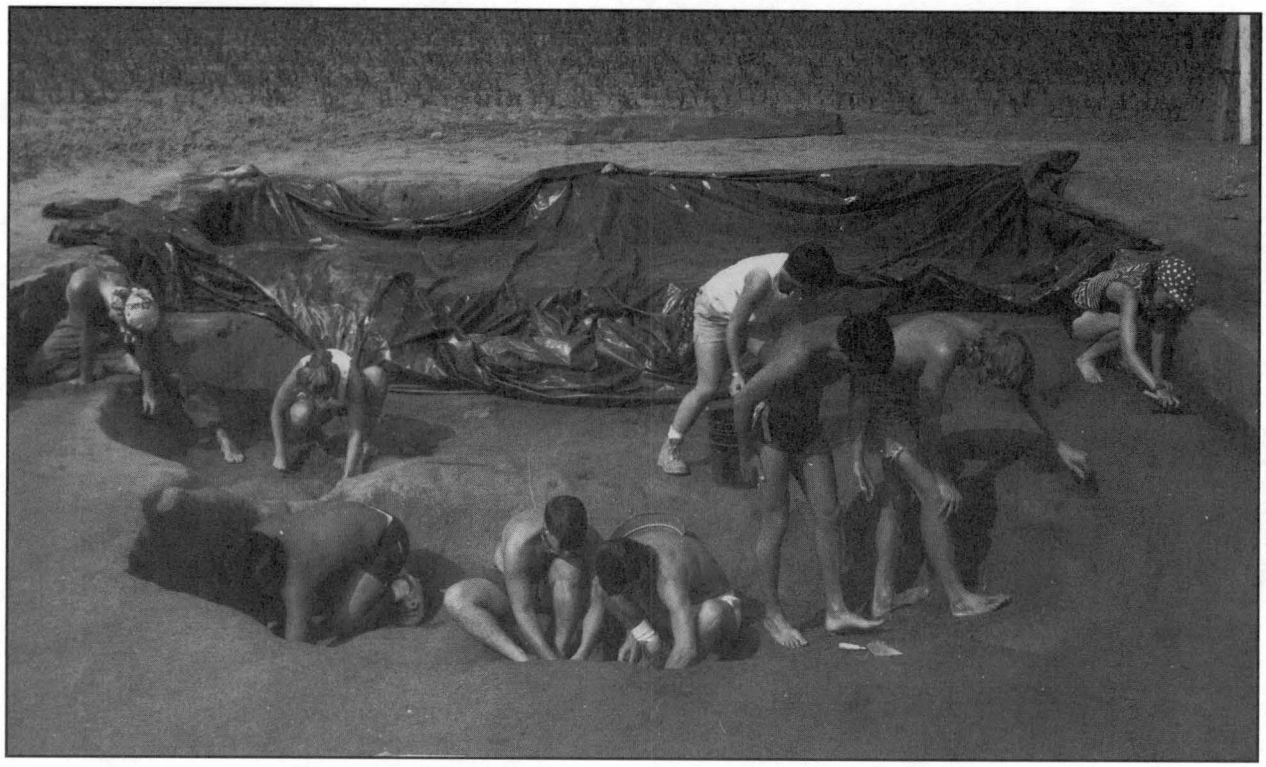

Figure 11.20. Crew cleaning Feature 10.

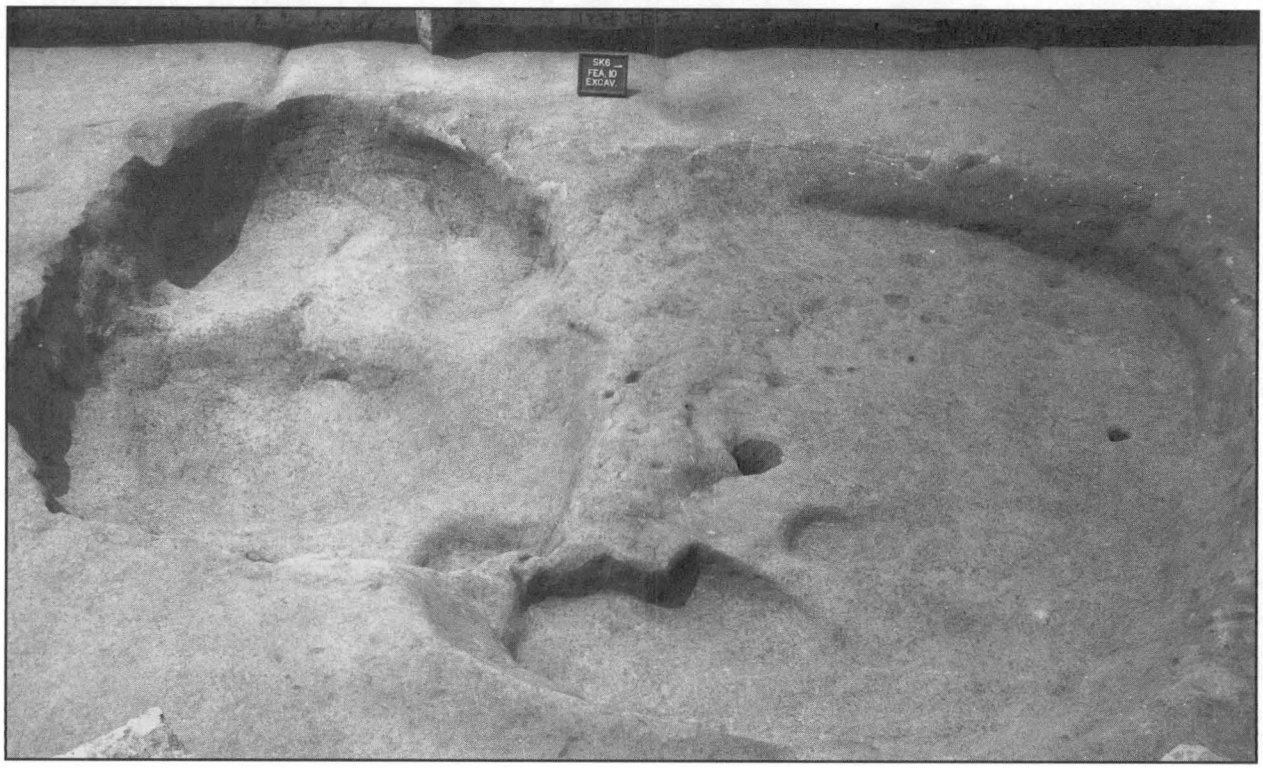

Figure 11.21. Feature 10, excavated.

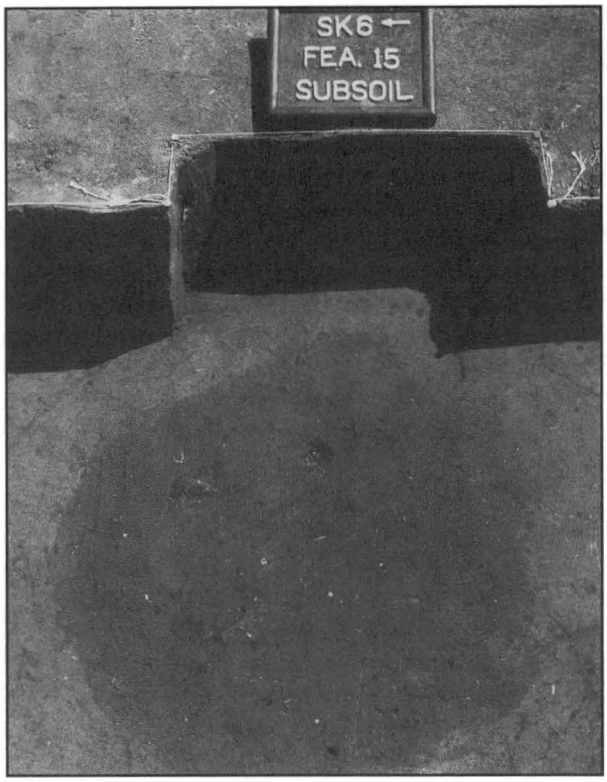

Figure 11.22. Feature 15, before excavation.

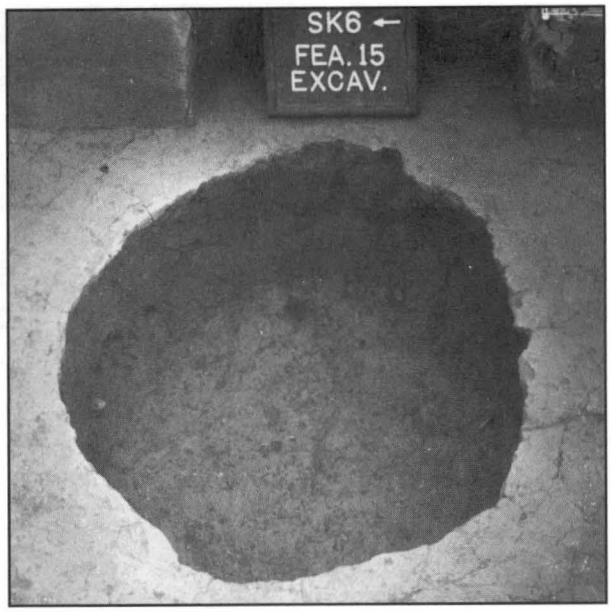

Figure 11.23. Feature 15, excavated.

loads of domestic refuse, and represents what may have been a significant portion of the pottery vessels being used by the site's inhabitants. Sections of over 50 vessels were recovered from Feature 10, making it the largest ceramic sample to come from a single context on a piedmont Siouan site. Although the specific behavioral context that resulted in the filling of the Feature 10 may never be known, we can say that these deposits represent a relatively short time span and may in fact be associated with the abandonment of the site by the Sara.

Feature 11

This large pothole was located in the cemetery area along with several other disturbances. It measured 3.5 ft in diameter, and auger testing indicated it was 0.9 ft deep. The fill consisted of a very dark grayish brown (10YR 3/2) loam with flecks of charcoal, fired clay, and small fragments of animal bone. Because of its disturbed nature, Feature 11 was not excavated.

Feature 12

This pit feature was located adjacent to Feature 11 and also was not excavated. On the subsoil surface, it measured 2.5 ft in diameter and augering indicated it was a little over 2.0 ft deep. The upper fill was a dark brown (10YR3/3) mottled loam and clay with charcoal, mussel shells, animal bone fragments, and fire clay particles. Toward the bottom of the pit, the fill became more homogeneous and clay-like. The composition of the fill and the depth of the feature suggested its use as a burial pit. Because of time constraints, Feature 12 was not excavated.

Feature 13

This pit intruded the south profile of Sq. 490R390 and had a diameter of 2.5 ft. Because it also extended beyond the limits of the excavation, Feature 13 was left intact. The surface fill consisted of a dark grayish brown (10YR 4/2) loam with charcoal and fired clay flecks, small pebbles, and burned bone fragments. Auger tests indicated that this fill zone extended to the bottom of the pit, reached at a depth of about 1.0 ft. Feature 13 appears to be very similar to other pits in this area and probably represents a storage facility recycled as a refuse receptacle.

Feature 14

Adjacent to Feature 13, Feature 14 was identical in size, depth, and fill characteristics. Consequently, a similar behavioral history also is suggested. Because it extended into an unexcavated unit, Feature 14 was auger tested but not excavated.

Feature 15

This circular pit feature was located in the southeast corner of Sq. 500R390 (Area A). In plan view, it measured 2.6 ft by 2.7 ft and extended to a depth of 2.0 ft beneath the subsoil surface (Figures 11.22, 11.23, and 11.24). After removal of the plowzone, Feature 15 appeared as a circle of compact, dark brown (7.5YR 3/4) loam with flecks of charcoal, fragments of animal bone, and small potsherds (Zone 1). After excavation began, an area of concentrated

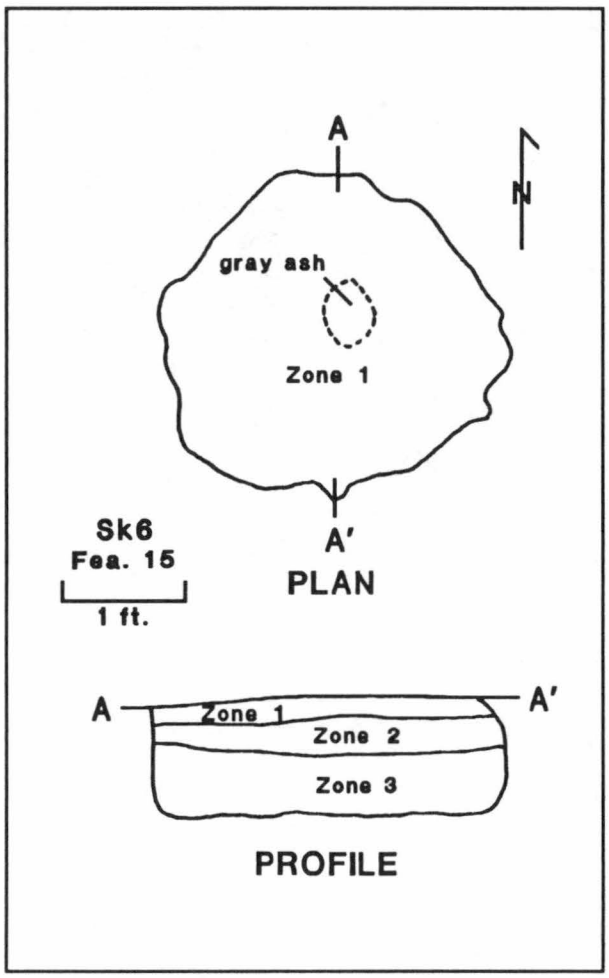

Figure 11.24. Feature 15, plan view and profile drawings.

ash and charcoal was noted near the center of the pit. Several pieces of burned clay or daub also were collected from this area. Few artifacts were recovered from Zone 1, but numerous fist-sized fragments of fire-cracked rock were found.

Zone 1 extended to an average depth of 0.4 ft and lay atop Zone 2 which was comprised of a dark brown (7.5YR 3/2) clay loam with greater amounts of charcoal. Daub fragments, as well as fire-cracked quartz cobbles, also were present. The deposit of charcoal continued in the central area of the pit, where most of the artifacts were recovered, and a dense pocket of ash and charcoal was observed in the southwest corner.

Zone 2 averaged approximately 0.5 ft in thickness and rested upon Zone 3 which was defined by a layer of yellow (10YR 7/6) clay mixed with sand. Charcoal flecks continued to occur throughout this zone. Zone 3 also contained several large animal bone fragments (primarily deer) and numerous large *Dan River Net Impressed* potsherds. Fist-sized, fire-cracked rock fragments were concentrated at the bottom of the pit. Fragments of daub, averaging 2 cm to 3 cm in diameter, continued to occur throughout Zone 3. The charcoal-ash concentration extended through Zone 3, and most of the artifacts also were found in this area.

Feature 15 represents a storage facility that was subsequently refilled with refuse. The upper two zones of the feature were very similar except for slight color and texture changes. Although Zone 3 was more distinct, all three zones appear to have been derived from primary deposits associated with hearths or other food preparation facilities. The central area of charcoal and ash concentration that extended through all three zones—and where most of the artifacts were recovered—indicates rapid refilling with all zones probably being produced as a consequence of a single dumping episode, albeit from a heterogeneous primary source.

Wood charcoal from Zone 3, occurring in direct association with *Dan River Net Impressed* pottery, yielded a radiocarbon assay of 780 ± 70 years: A.D. 1170 (Beta-36091). Following Stuiver and Becker (1986), this provides a calibrated one-sigma range of A.D. 1194 to A.D. 1280 with a single intercept at A.D. 1259. Given other radiocarbon information for the Dan River phase, this appears to be a reasonable age estimate for the site's Dan River occupation.

Feature 16

This potted feature was located just north of Feature 15. Shovel marks were evident at the subsoil surface, and the fill consisted of a loosely packed brown loam with charcoal and fired clay particles. Because the original configuration and contents of Feature 16 had been destroyed or badly disturbed, it was auger-tested but not excavated. In plan, the disturbed feature measured 3.5 ft by 2.9 ft and extended to a depth of 1.1 ft. Feature 16 probably was similar to Feature 15 and the other refilled storage pits in the area.

Feature 17

Feature 17 also was located in Sq. 500R390 (Area A) and appeared as a circular stain of dark yellowish brown (10YR 3/4) loam with small flecks of charcoal. This fill continued to the bottom of the pit which was reached at a depth of 0.8 ft. It contained numerous potsherds, a few animal bones, and daub fragments. A concentration of artifacts and charcoal was observed in the southeast corner of the pit. Pieces of a flat, brittle sandstone with mica inclusions were found scattered throughout the fill. After excavation, Feature 17 measured 2.8 ft by 2.6 ft and had a flat bottom (Figure 11.25). The sides were generally straight but undercut the northern and eastern edge of the pit. In size, shape, and fill characteristics, Feature 17 was nearly identical to other Dan River phase pits in Area A (e.g., Features 4, 5, 6, 7, 8, 15, and 55), and no doubt also served as a shallow storage facility that was filled from the same or similar primary refuse deposit as the other pits in the near vicinity.

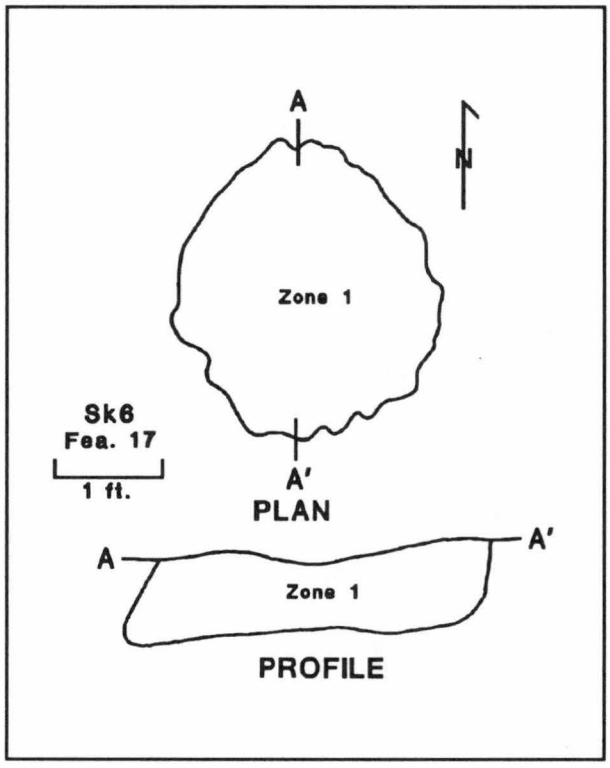

Figure 11.25. Feature 17, plan view and profile drawings.

Feature 18

Only the southern edge of this feature was exposed along the northern profile of Sq. 500R390. Because of time restraints, it was neither excavated nor augered. The portion of the fill that was exposed on the subsoil surface consisted of a brown (7.5YR 5/4) loam with particles of burned clay and charcoal, and again was very similar to the fill in the other pits in the area.

Feature 19

This large oval pit, located in Area A near Feature 30 (Burial 12), extended beyond the excavation limits and therefore was not excavated. It measured 3.6 ft by 3.0 ft at the subsoil surface, and augering indicated two distinct zones that extended to a depth of 2.9 ft. An upper zone consisted of 0.5 ft of very dark grayish brown (10YR 3/2) loam with charcoal and animal bone fragments. Beneath this layer was a thick deposit of mottled brown loam and clay. The size of the pit and the fact that it was located near other burials suggest that Feature 19 was a grave. This interpretation was reinforced by the presence of the thick second layer of mottled fill, and verified by the inadvertent encounter of the auger tube with human bone at the bottom of the pit.

Feature 20

This large, irregularly shaped feature was located in the center of Sq. 480R370 (Area A) and was intruded by a pothole (Feature 31). Although there was not sufficient time to excavate Feature 20, it was augered. The auger core revealed a single zone of dark brown (7.5YR 3/4) loam with bits of charcoal, animal bone, and fired clay. The bottom of the feature was reached at a depth of 0.6 ft beneath the subsoil surface. In plan, Feature 20 measured 4.4 ft by 4.5 ft. Its size and depth suggest a facility similar to the earth ovens or roasting pits excavated at several other piedmont Siouan sites including Upper Saratown, located just upstream (Ward 1980). It also was very similar to Feature 21.

Feature 21

This basin-shaped facility was located at the northern end of Area C, adjacent to Feature 10. It consisted of a roughly circular stain of very dark grayish brown (10YR 3/2) loam with small bits of charcoal (Zone 1). A single fill zone (Zone 1) contained numerous Oldtown series potsherds and poorly preserved animal bone fragments. Pebble-sized and fist-sized fire-cracked quartz rocks also were scattered throughout this fill, and two small pockets of fired clay were present on the surface of the feature. Zone 1 was shallow, averaging only 0.2 ft in thickness. Beneath this layer, in the eastern half of the feature, was a thin layer of dark gray ash with large chunks of charcoal. After excavation, Feature 21 measured 4.0 ft by 3.9 ft and was 0.4 ft deep (Figures 11.26, 11.27, and 11.28). Its size, configuration, and fill contents suggest an earth oven or similar food preparation facility. The bottom lens of ash and charcoal indicates an *in situ* deposit of residue from a large fire.

Feature 22

This unexcavated feature was located in Area C adjacent to Features 10 and 21. The fill on the surface of the subsoil was comprised of a very dark gray (10YR 3/1) loam with small particles of charcoal and fired clay fragments, very similar to that of Feature 21 and Zone 1 of Feature 10. In plan, Feature 22 measured 3.5 ft by 2.0 ft and augering revealed a depth of 0.3 ft. It is hard to say whether Feature 22 functioned similarly to Feature 21 or represents "spill" resulting from the filling of Feature 10.

Feature 23

This potted burial was located in Area A, near Feature 28 (Burials 11) and Feature 30 (Burial 12). The fill consisted of loosely packed plowed soil and clay that extended to a depth of 2.7 ft. Human bone was encountered by the auger at the bottom of the pit. Because Feature 23 was disturbed, it was not excavated.

Feature 24

Feature 24 was located adjacent to Feature 30 (Burial 12) and was defined by a single zone of dark

Figure 11.26. Feature 21, before excavation.

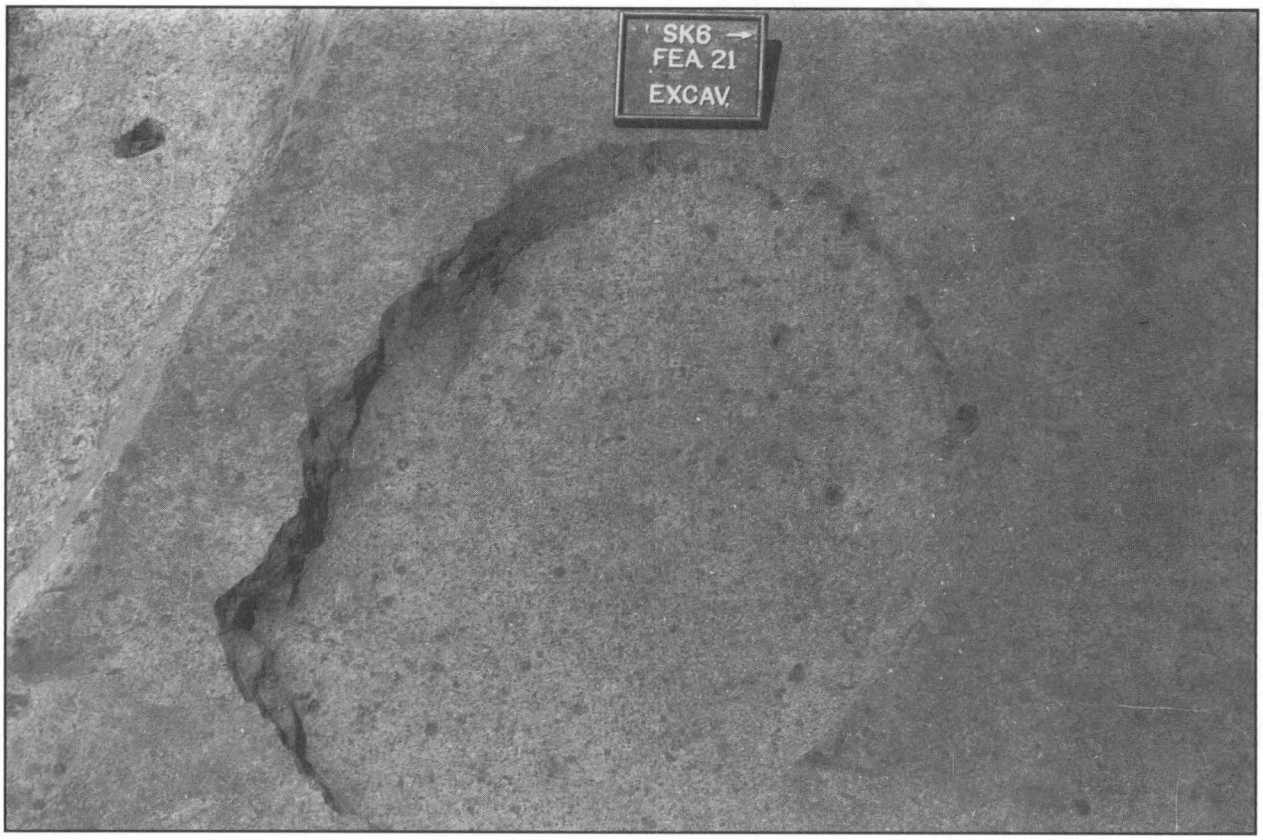

Figure 11.27. Feature 21, excavated.

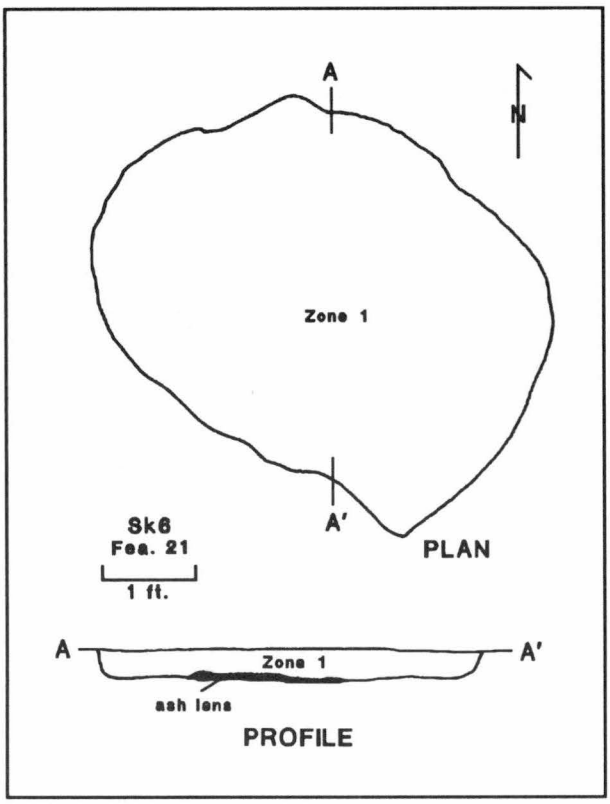

Figure 11.28. Feature 21, plan view and profile drawings.

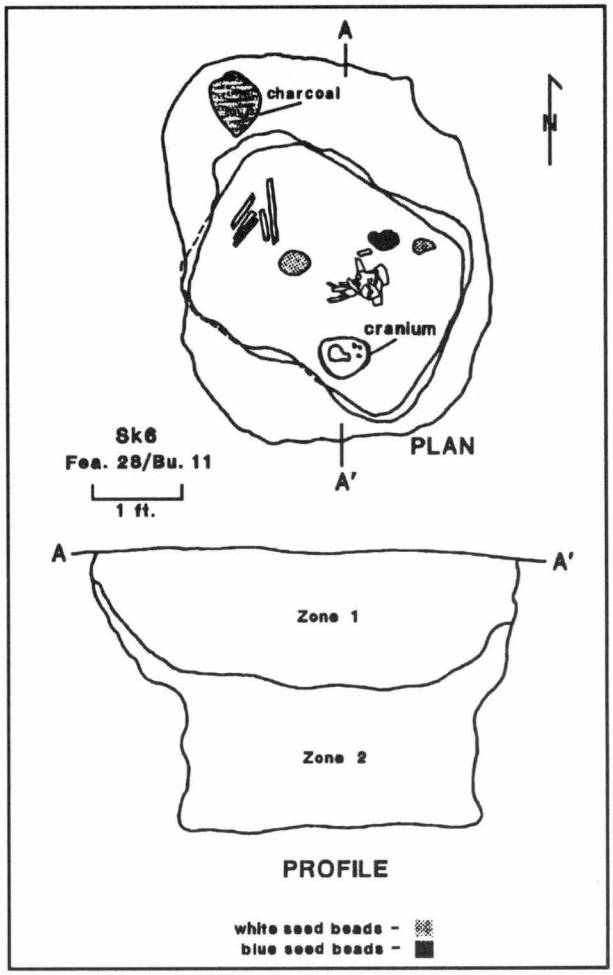

Figure 11.29. Feature 28 (Burial 11), plan view and profile drawings.

yellowish brown (10YR 3/4) loam. It measured 3.0 ft by 2.8 ft, and auger tests indicated a depth of 2.0 ft. A single glass bead was observed on the pit's surface. Because of its size, configuration, and spatial relationship to Burials 11 and 12, Feature 24 also probably represents a burial. Due to time constraints, it was not excavated.

Feature 25

This unexcavated feature intruded the R350 profile in Sq. 480R360 (Area A). The exposed surface measured 2.3 ft by 2.2 ft and auger tests penetrated 0.8 ft of dark reddish brown (5YR 3/4) loam containing small particles of charcoal and fired clay. Feature 25 may represent a shallow storage facility refilled with refuse.

Feature 26

This designation was assigned to a small pothole between Features 23 and 27 in Area A. It measured 1.4 ft in diameter and was neither excavated nor augered.

Feature 27

Only the very edge of this feature was exposed along the north 480 line. The fill that was visible consisted of a dark brown (7.5YR 3/4) loam with flecks of charcoal. Because only a small portion was exposed, this feature was not augered or excavated.

Feature 28 (Burial 11)

This burial was one of two late Saratown phase graves excavated in Area A and located approximately 120 ft southwest of the cemetery area (Area B). The burial pit was observed at the subsoil surface as a roughly rectangular stain of very dark brown (10YR 2/2) loam that contained a few small potsherds and other artifacts. This zone (Zone 1) extended to a depth of 1.5 ft and appeared lighter as the depth increased. Zone 1 lay atop a second layer of dark yellowish brown (10YR 4/4) clay that resembled subsoil and contained a few pockets of gray ash. Zone 2 extended to the bottom of the pit at a depth of 3.2 ft. In plan view, the pit measured 4.4 ft by 3.6 ft at the subsoil surface. A shelf of varying width was encountered just below the bottom of Zone 1 and surrounded a rectangular chamber that measured 2.7 ft by 2.1 ft.

The poorly preserved human remains encountered at the pit bottom were those of an adult who was loosely flexed and lying on the right side, with the head pointed toward the south (Figure 11.29). Clusters of blue and white seed beads were found in the pelvic

area and opposite the thoracic cavity along the northeast edge of the pit. A *Cornaline de Allepo* bead (Kidd and Kidd's [1970] Type IVa) was uncovered in the pelvic cluster. A rectangular, conch (?) shell bead and several teeth were uncovered in the chest area. The displacement of the teeth suggest post-depositional disturbance, perhaps from a rodent.

Feature 29

This oval pit was located adjacent to Burial 12 and measured 3.9 ft by 3.0 ft. Augering indicated a single zone of dark brown (10YR 3/3) loam that extended to a depth of 1.2 ft. Given its size, depth, fill composition, and location relative to Burial 12, Feature 29 is probably also a burial. Because of a lack of time, it was not excavated.

Feature 30 (Burial 12)

This elaborate grave (Figure 11.30) was located near Burial 11, and both were probably interred at about the same time. Burial 12 also was observed on the subsoil surface as a roughly rectangular patch of very dark grayish brown (10YR 3/2) loam containing some artifacts, particularly near the surface, and flecks of charcoal and burned clay. This zone (Zone 1) extended to a depth of almost 2.0 ft and rested upon a lighter Zone 2 comprised of a dark yellowish brown (10YR 4/4) clay. Zone 2 continued to the bottom of the pit at a depth of 3.1 ft. An uneven shelf surrounding a central rectangular body chamber was encountered at a depth of approximately 1.0 ft. The shelf extended around three sides of the chamber but was absent along the southeast wall. On the subsoil surface the pit measured 4.5 ft by 3.7 ft, whereas the chamber measured 3.6 ft by 2.5 ft.

The poorly preserved skeleton was loosely flexed and appeared to be lying on its back. The skull was pointing to the southeast. Several large shell beads and purple wampum were found near the head. Numerous other European trade items also were associated with this individual and suggest that the person may have held a prominent position within the deerskin trade. European artifacts associated with Burial 12 include: a brass wire C-bracelet around the left wrist; a brass buckle and loop at the waist; brass buttons at the right wrist and below both knees; an English pistol along the right side of the body; an iron knife next to the buckle; lead shot; several iron nails; and numerous glass beads around the neck.

Because of the poor condition of the Burial 12 bone, sex could not be determined, and age could only be estimated at between 12 and 20 years. However, by comparing the burial associations with those from other Siouan burials where this information is available, it is very likely that Burial 12 was a young adult male. The pistol, the knife, the bracelet, and the possibility the individual was wearing knickers (based on the position

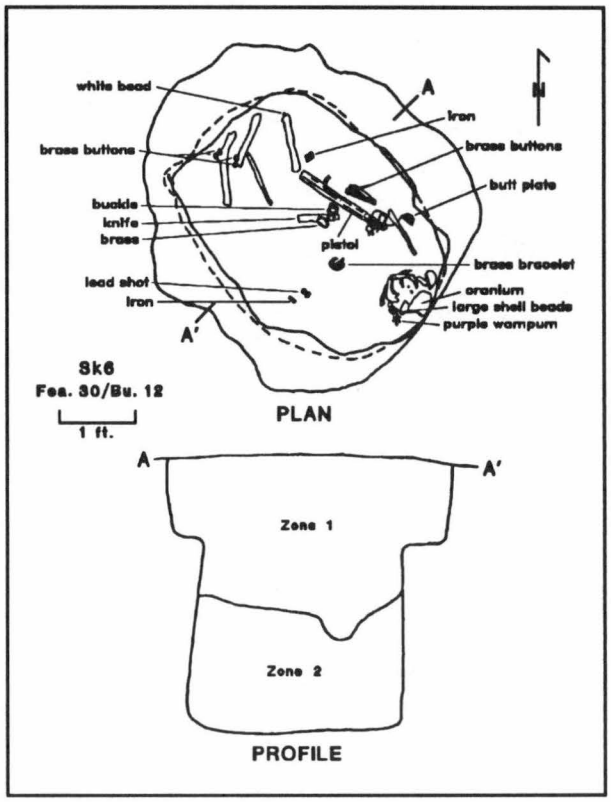

Figure 11.30. Feature 30 (Burial 12), plan view and profile drawings.

of brass buttons below the knees) all point to a male; and, in conjunction with the skeletal data, indicate a young adult male with a respected status position (cf. Ward 1987). The European-made burial associations are discussed in detail in the historic artifacts section of this chapter.

Feature 31

Feature 31 represents a pothole that intruded Feature 20. Neither of these features was excavated.

Feature 32

This small pit was located in the cemetery area, in Sq. 480R500. On the subsoil surface it measured 2.3 ft by 1.5 ft and was defined by a zone of loose brown loam (7.5YR 4/2) mottled with orange clay. Augering indicated one fill zone that extended to a depth of 1.2 ft. Although small in size, the location of Feature 32 and the composition of its fill strongly suggest a burial, perhaps that of a child like most of the burials in this area. This feature was not excavated.

Feature 33

This small feature, located in Area B, was very similar to Feature 32 and measured 1.5 ft in diameter on the surface of the subsoil. The fill consisted of a shallow zone, 0.5 ft thick, of mottled brown (7.5YR 4/2) loam and orange clay. As with Feature 32, a

child or infant burial is indicated. Time limitations prevented the excavation of Feature 33.

Feature 34

Feature 34 intruded into the east profile in the southeast corner of Sq. 490R500 (Area B). It was a little over 2.0 ft in diameter and contained a single zone of dark yellowish brown (10YR 4/4) mottled clay that reached a depth of 1.6 ft below the subsoil surface. A burial pit is strongly suggested by its location, size, and fill characteristics. Feature 34 was auger tested but not excavated.

Feature 35

This pit intruded the east profile in the northeast corner of Sq. 490R500 (Area B). The fill consisted of a dark brown (10YR 3/3) mottled loam that extended to a depth of 0.3 ft below the subsoil surface. The exposed portion of the pit measured 1.9 ft by 1.7 ft. Although not excavated, it is suspected that Feature 35 is another shallow grave in the cemetery area.

Feature 36

Intruding into the northwest corner of Sq. 510R490 (Area B), Feature 36 was another possible burial pit that was augered but not excavated. It measured approximately 2.0 ft in diameter and was defined by a dark brown (10YR3/3) mottled loam similar to the other unexcavated burial pits. Feature 36 was only 0.2 ft deep.

Feature 37

This feature was located adjacent to Feature 36 and was identical in terms of fill characteristics. It intruded the northern profile of Sq. 510R490. The exposed portion measured 1.5 ft by 1.4 ft, and augering indicated a depth of 0.7 ft. In all likelihood, Feature 37 represents another unexcavated burial within the cemetery area.

Feature 38

Feature 38 was virtually identical to the other unexcavated burial pits within the cemetery area (Area B). Located east of Feature 37 and also intruding the northern profile of Sq. 510R490, the exposed portion of the pit measured 1.5 ft in diameter and was filled with a dark yellowish brown (10YR 4/4) mottled loam. Human bone was inadvertently encountered by the auger bit at a depth of 0.3 ft, verifying Feature 38's identity as a grave. This supports the conclusion that the other unexcavated pits in the cemetery area are burials.

Feature 39

Another probable burial pit that was not excavated lay next to Feature 38 and also extended beyond the limits of the Area B excavation. The fill was identical to that of Feature 38. This pit also was shallow and extended only 0.2 ft below the subsoil surface. The exposed portion of Feature 39 measured 1.5 ft across.

Feature 40

This small, deep pit also was located in the cemetery area and was augered but not excavated. It was situated adjacent to Burial 4 in the northeast quadrant of Sq. 510R490 (Area B). On the surface, the pit averaged a little over a foot in diameter; however, it extended to a depth of 2.3 ft and contained a single zone of dark brown (7.5YR 4/2) sandy soil with flecks of charcoal. It may represent a large posthole or tree disturbance. The small surface diameter relative to the depth of the feature, as well as its fill characteristics, argue against Feature 40 being a burial.

Feature 41

Feature 41 represents an unexcavated burial near the center of Sq. 510R490 (Area B). The fill consisted of a mottled dark brown (7.5YR 3/2) loam and orange clay that measured 1.7 ft by 1.3 ft on the subsoil surface. A single auger test accidentally penetrated a human pelvis at a depth of 0.6 ft. As with the other burials that were not exposed by the plow, Feature 41 was not excavated.

Feature 42

This probable burial was located in the northwest quadrant of Sq. 510R490 (Area B). It measured 2.0 ft in diameter and extended to a depth of 0.8 ft. The fill was a dark yellowish brown (10YR 3/6) loam mottled with orange clay. Although Feature 42 was not excavated, the pit size suggests that it is the grave of a child.

Feature 43

This large, shallow pothole extended over much of the northern half of Sq. 500R490 (Area B). The fill consisted of plowed soil mixed with brown loam and mottled orange clay, and covered a 5.0-ft by 4.5-ft area. Auger tests in the center of the feature indicated a depth of only 0.6 ft. The fill and the depth of the disturbance support the assumption that vandals destroyed a burial here.

Feature 44

Feature 44 was intruded by Feature 43 and represents another looted burial. This disturbance measured 3.5 ft by 3 ft and augering revealed a depth of 0.3 ft. On the surface of the mottled plowed soil and orange clay fill was a concentration of broken human skeletal remains and animal bones.

Feature 45

This probable burial pit was intruded by Burial 9. It was not excavated. The surface of the feature was

approximately 2 ft in diameter and was defined by fill typical of the other unexcavated burials in the cemetery area (i.e., a dark yellowish brown (10YR 4/4), mottled loam). The homogeneous fill was contained in a pit 0.9 ft deep. The small size of Feature 45 suggests that it also represents a child burial.

Feature 46

This designation was assigned to a large pothole in the northern half of Sq. 490R490 (Area B). It measured 4.3 ft by 3.0 ft and was 0.4 ft deep. The fill consisted of a mixture of mottled brown loam and orange clay. It is likely that this shallow pothole destroyed a human burial.

Features 47, 48, and 49

This sequence of feature numbers designates three large, connected, and intrusive potholes in the southwest corner of Sq. 490R490 (Area B). None were excavated because of time limitations. Together they measured 6.5 ft by 3.0 ft, and augering indicated an average depth of 0.5 ft. The pothole fill consisted of a dark brown loam with orange clay mottling. Numerous human bone fragments were scattered across the surface of all three disturbances. It could not be determined with certainty whether or not each pothole targeted an individual burial; however, given the quantity and distribution of the skeletal remains, as well as the brutal accuracy demonstrated by the vandals, three graves may very well have been destroyed.

Features 50, 51, and 52

These unexcavated and connecting potholes were located adjacent to the above disturbances and intruded into the R480 profile. The combined area exposed on the subsoil surface measured 5.0 ft along the R480 profile and extended 3.0 ft into the excavation. Augering indicated an average depth of just over 1.0 ft. The fill was similar to that of other potholes, and small fragments of bone, probably human, were noted in the lower section of the auger core. One or more potted burials probably are represented.

Feature 53

This large pothole was located adjacent to Burial 7 and probably also represents the total disturbance of a human burial. The irregular pit measured 3.3 ft by 3.2 ft and augering indicated a depth of 1.7 ft. The fill was like that of the other potholes.

Feature 54

This designation was assigned to a concentration of Oldtown series pottery, gravel, charcoal, and animal bones located in the undisturbed humus in the southwest corner of Sq. 480R490 (Area B). The artifacts were concentrated within an area approximately 3.0 ft in diameter and did not extend below the humus layer. In addition to the artifacts mentioned above, 45 glass trade beads also were recovered from this feature.

Feature 55

This feature was a small, shallow depression within Area A that was intruded by Feature 8 (Figure 11.13). The single zone of fill was similar to that of Feature 8 and consisted of a lens of dark reddish brown (5YR 3/2) loam with flecks of charcoal. The surface of the feature measured 1.8 ft in diameter, and it extended to a depth of only 0.3 ft. A few Dan River series potsherds, animal bones, and pebbles were contained in the fill. Given the shallow depth, fill characteristics, and its spatial relation to Feature 8, Feature 55 probably reflects soil plowed out of that adjacent pit.

Burial 1

This tightly flexed skeleton was located near the center of the excavated portion of the cemetery area (Area B) (Figures 11.31 and 11.32). It had been badly disturbed by plowing with most of the skull and right side of the body missing. Based on this fragmentary evidence, the individual appears to have been placed on his/her left side with the head pointing to the southwest. The left knee and elbow were together, and the left hand was placed at the base of the rib cage. The lower left leg and foot were missing. The eruption of first and second lower molars suggests the individual was between 10 and 13 years old at the time of death. This burial lay atop Burial 2 and both may have been interred simultaneously. A fragment of green bottle glass was recovered from the thoracic region. In the plowzone immediately above Burials 1 and 2, seven projectile points, a brass gun sight, and an English gunflint were recovered. Because no evidence of a pit or pits was visible on the subsoil surface, it is likely that Burials 1 and 2 were placed in shallow graves that did not penetrate beneath the old humus.

Burial 2

Burial 2 also was tightly flexed, with its head oriented to the west (Figure 11.33). As with Burial 1, most of the skeleton had been plowed away and, lacking dentition, age could only be estimated in very general terms. The few fragments of skull and long bones that were recovered suggest that this was a subadult.

Burial 3

Burial 3 was located in the northwest corner of the cemetery excavation block (Area B) (Figure 11.34). The body was tightly flexed and lying on the right side. The left arm was resting on the left leg with the left hand cupping the left knee. The right lower arm was lying under the head with the hand facing upward, as if supporting the head in a sleeping position. The head was pointed to the southwest. Damage from the plow

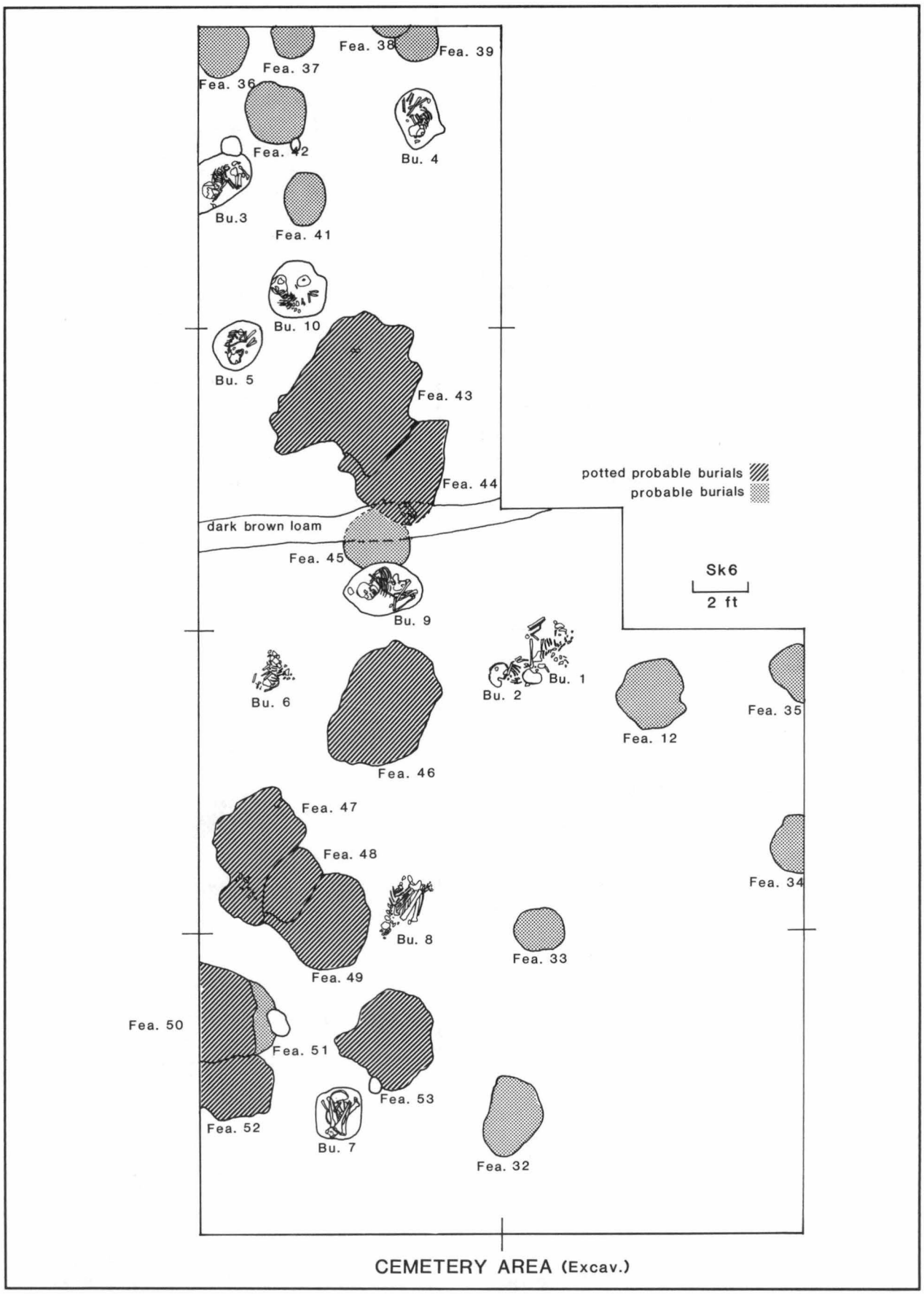

Figure 11.31. Plan drawing of Area B, showing excavated burials.

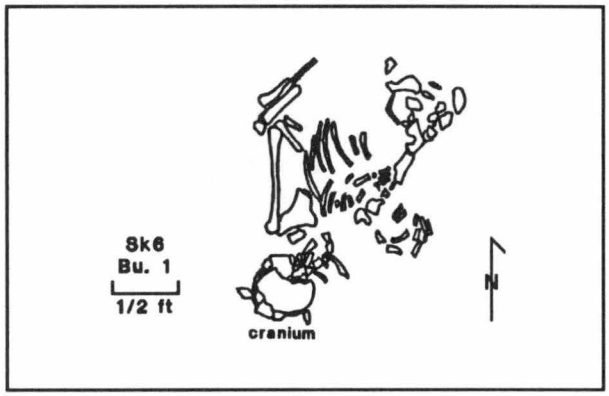

Figure 11.32. Burial 1, plan view.

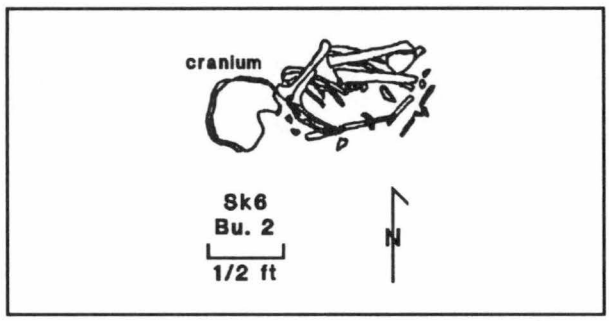

Figure 11.33. Burial 2, plan view.

was primarily restricted to the cranial area. The bottom of the oval burial pit was preserved and contained a dark brown (7.5YR 3/2) mottled loam that contained a few potsherds and animal bone fragments. Apparently this fill was originally derived from the old humus layer which the pit penetrated. Almost all the deciduous dentition were present and indicate a young child around three years old at the time of death.

Burial 4

This grave was located a few feet east of Burial 4 and contained another tightly flexed skeleton of a child (Figure 11.35). The individual was resting in a prone position, face down, with the arms folded beneath the chest. The legs were bent with the right femur lying across the left. The head was pointed toward the south. As with Burial 3, the bottom of an oval-shaped pit had escaped the plow and contained a dark loam identical to that described for Burial 3. This fill probably also was derived from the old humus layer. Based on dentition, the child was around six or seven years old at death.

Burial 5

Burial 5 was uncovered a few feet south of Burial 3 and almost adjacent to Burial 10 (Figure 11.36). The tightly flexed body lay on the right side with the head

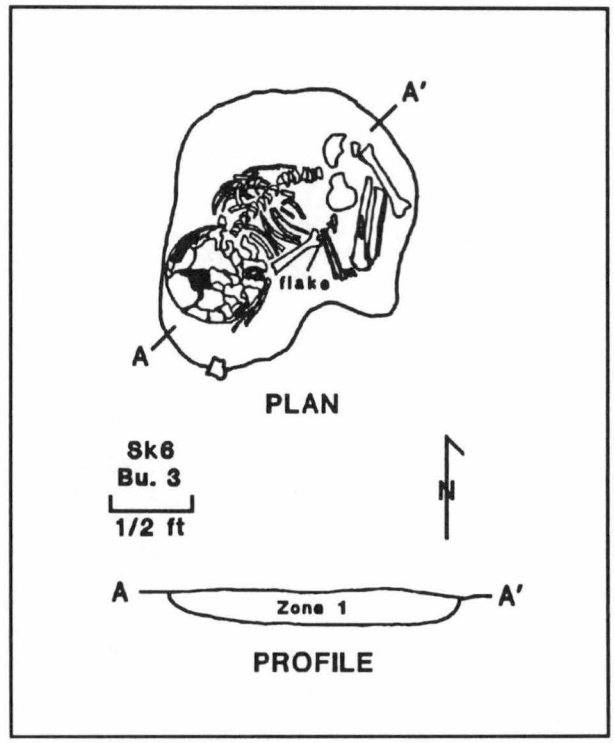

Figure 11.34. Burial 3, plan view and profile drawings.

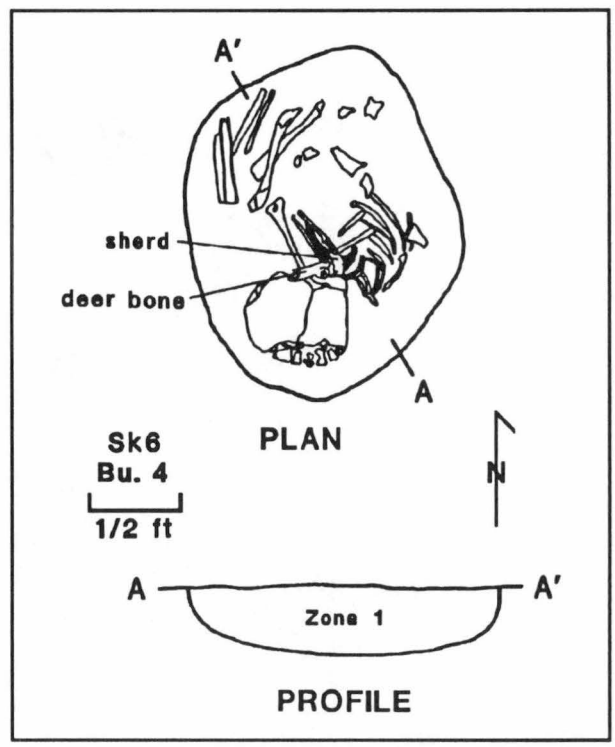

Figure 11.35. Burial 4, plan view and profile drawings.

pointed to the south. The right arm was extended with the hand placed between the knees. The left arm had been plowed away. A mussel shell lay between the mandible and the tightly flexed knees. The small,

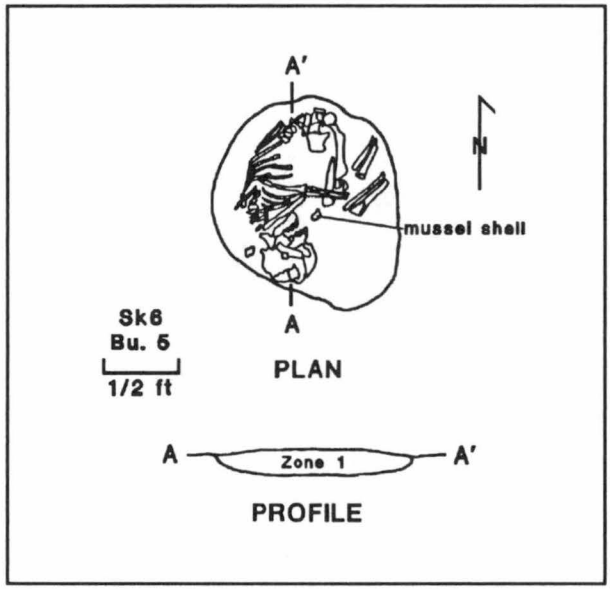

Figure 11.36. Burial 5, plan view and profile drawings.

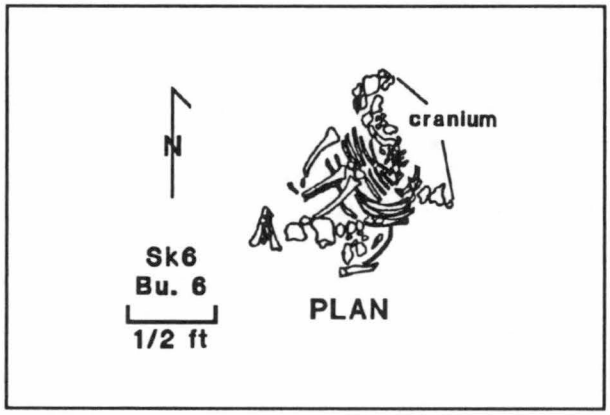

Figure 11.37. Burial 6, plan view.

shallow oval pit contained old humus fill identical to that described above. Deciduous dentition and other skeletal evidence suggest that this child was between two and three years old when he/she died.

Burial 6

This burial lay in the west-central cemetery area (Area B) and had been badly displaced by plowing (Figure 11.37). It was tightly flexed, lying on the right side, and the head was pointed toward the northeast. The right arm was extended with the hands between the knees. The left arm and hand had been removed by the plow. No discernible pit outline remained. Dentition and other skeletal data point to a child between two and three years old at the time of death.

Burial 7

This bundle burial, located in the southwest corner

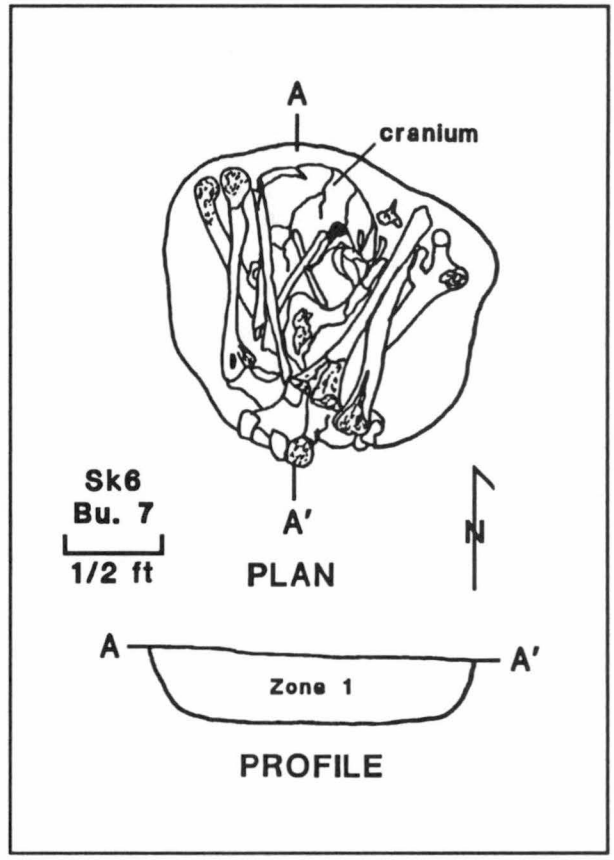

Figure 11.38. Burial 7, plan view and profile drawings.

of the Area B excavation, was one of two adults represented in the cemetery sample (Figure 11.38). The individual apparently died away from the village, and the bones were collected and buried sometime after the flesh had decayed. The bottom of the small (1.8 ft by 1.5 ft) pit was intact and contained the same loamy fill as the other burials in the cemetery. The skull was placed face down in the pit and ribs were placed on top of it. The long bones were stacked on either side, creating a "V" with the skull in the middle. Hands and feet, as well as the sternum, ulnas, and both clavicles, were missing. Apparently these bones were not present or not collected when the bundle was prepared for burial. The remains were those of an adult male between 35 and 40 years old at the time of death.

Burial 8

This tightly flexed, articulated, adult burial was interred a few feet northeast of Burial 7 (Figure 11.39). The body lay on its right side with the head pointing to the southwest. The skeleton was so tightly flexed that all the long bones were in a parallel position with both hands lying between the knees. No pit outline was discernible, and the skull had been badly disturbed by the plow. The undisturbed post-cranial remains suggest a male between 20 and 30 years old at the time of death.

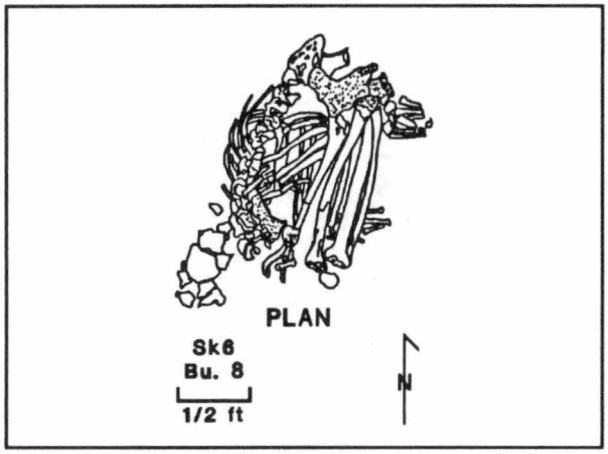

Figure 11.39. Burial 8, plan view.

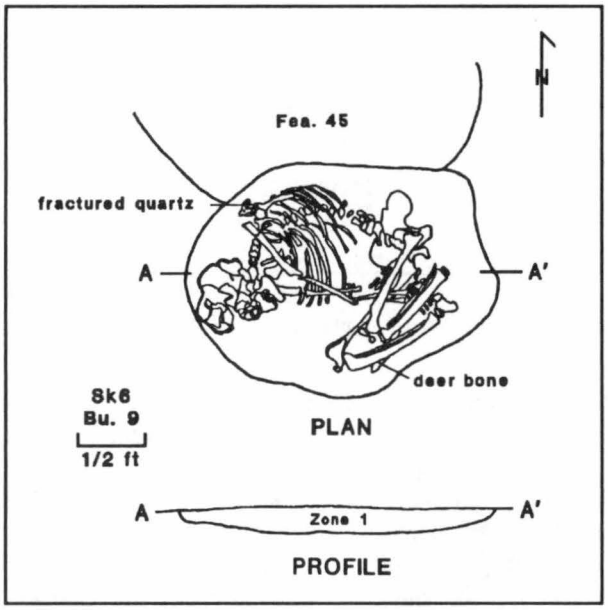

Figure 11.40. Burial 9, plan view and profile drawings.

Burial 9

Located near the center of the cemetery area (Area B), Burial 9 contained the remains of a child approximately nine years old (Figure 11.40). The bottom of the shallow pit measured 2.3 ft by 1.8 ft and contained dark loamy fill probably derived from the old humus zone. The skeleton was tightly flexed, positioned on the right side, and the skull was oriented toward the west. Both arms were extended and the left hand lay between the legs at the proximal end of the right femur. The right hand rested between the ankles. Only the left parietal and occipital bones had been disturbed by plowing.

Burial 10

Burial 10 was located in the northern excavated area of the cemetery, immediately northeast of Burial 5

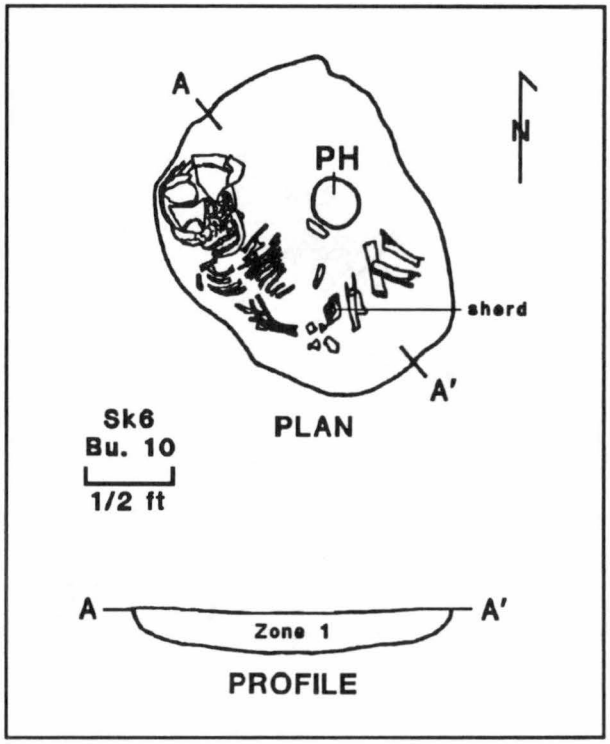

Figure 11.41. Burial 10, plan view and profile drawings.

(Figure 11.41). This one-year-old infant lay on its back, face up, with the legs flexed and pointing to the northeast. The left arm was flexed at a 90-degree angle, and the left hand was placed on the stomach area. The right arm had been plowed away. The shallow pit measured 1.9 ft by 1.4 ft and contained fill identical to that of the other burials where remnants of a pit remained.

Summary

Although 55 feature numbers (in addition to the 10 numbered burials) were assigned in the field, comparatively few of these were excavated. Of those not excavated, 11 were pits that had been obliterated by potholes, 19 represented probable burial pits, and the remainder extended beneath the excavation profiles. The primary reason for not excavating these features was a lack of time. The large number of burials encountered at the base of the plowzone that had to be excavated to salvage the remains, as well as the tremendous volume of Feature 10, did not leave sufficient time to excavate the disturbed pits and probable burial pits. As a consequence, the decision was made early during the excavation to focus on completely exposed, undisturbed pits, and graves in imminent danger of destruction.

The 11 features and 12 burials that were excavated provided a more than adequate sample for the goals of the project. Feature 10 produced the largest sample of late Contact period pottery that had ever been recovered in North Carolina. Because of the large number

of reconstructed vessels and large sherds deposited over a brief moment of time, this feature has been invaluable in providing comparative ceramic data needed to understand population dynamics during the late seventeenth century. In addition to Feature 10, Features 21 and 54, as well as all excavated burials, also provided important information about the late Saratown phase settlement at the site. Most of the other excavated features (Features 4, 6, 7, 8, 15, and 17) represent storage facilities associated with the earlier Dan River phase occupation and contributed much needed data on that component of the site.

The feature pattern at the William Kluttz site is identical to that identified at other piedmont Siouan sites. The characteristic Dan River phase pits were moderately-sized, circular storage facilities that were refilled rapidly with varying amounts of refuse. Some contained very little cultural material, giving the impression that once no longer suited for storage, the pits were immediately filled with nearby topsoil that contained a few small, *de facto* artifacts (see Schiffer 1972:161). If, however, the pits were emptied of their stored contents during a time when a large amount of food and domestic refuse was available, the resulting fill might be rich in these remains.

The one large, undisturbed basin (Feature 21) near Feature 10 was identical to other basins reported from protohistoric and historic Siouan sites throughout the Piedmont. This facility may have been an earth oven or roasting pit constructed to cook large quantities of food, possibly in association with communal feasting activities. (Interestingly, this method of cooking does not appear to have been practiced by the Occaneechi at the contemporary Fredricks site.) Feature 10, the very large facility at the northeastern end of the site, remains an enigma. Other than the fact that it was not created by natural processes, few conclusions can be drawn regarding its purpose. Why so many pots were disposed of in such a large hole brings to mind something akin to potlatching on the Northwest Coast, or at least the wholesale discarding of material possessions. But until future excavations around Feature 10 are undertaken or similar features are discovered in other contexts, the function of Feature 10 will remain a mystery that arouses our archaeological imagination without fulfilling our scientific curiosity.

Ten of the 12 burials at the William Kluttz site were located in the central excavation area. All these interments were extremely shallow and appeared to have been made over a very short period of time. In many cases the plow had cut into the bones, disturbing not only the skeleton but also obliterating any evidence of the burial pit. When initially encountered, the cemetery area appeared to represent a mass burial within a single, saucer-like pit. However, careful excavation revealed faint pit outlines around many of the individual burials. Rather than a single mass grave, the burials probably were placed in a cemetery area during a brief period of sickness and death, probably during an epidemic.

Postholes

One hundred and eighty-one postholes were mapped at the William Kluttz site. Due to time constraints, these were not excavated. All postholes were less than 1.0 ft in diameter and appeared at the top of subsoil as dark, circular, midden-like stains. Although no architectural features such as houses or palisade lines were identified, the density of postholes within the three excavation areas allows for some preliminary observations to be made about the distribution of activities within the site. Area A, which contained all of the recognized Dan River features, also had the highest posthole density (n=117, or 14.6 postholes/100 sq ft). This appears to be the only area of Dan River phase domestic activity sampled during the 1988 excavations. Area B also contained numerous postholes (n=62, or 10.3 postholes/100 sq ft), though most of these were located at the southern end of the excavation block. The lack of Dan River phase features here and the presence of late Saratown burials and at least one feature suggest that these postholes may be attributable largely to that occupation. Finally, the presence of only two possible postholes within Area C would seem to indicate that this area, including Features 10 and 21, was beyond the habitation area of both components. The site surface in the vicinity of Area C also contained far fewer artifacts than the surface of the other excavation areas.

Pottery

Archaeological excavations during 1988 at the William Kluttz site produced 37,155 potsherds from the plowzone, midden, and 25 features and burials (Table 11.2). Twelve hundred and thirty-six sherds were found in Dan River phase features while 8,691 potsherds were recovered from late Saratown phase features and burials. Most of the late Saratown pottery came from a single feature, Feature 10, which contained the remains of at least 51 separate vessels (Table 11.3). Of the remaining 27,228 sherds recovered from primary excavations and features of indeterminate cultural affiliation, over 98% were too small or too

Table 11.2. Distribution of pottery from the William Kluttz site.

	Yadkin	Dan River					New River		Oldtown								
Context	Fabric Marked	Net Impressed	Cord Marked	Corncob Impressed	Plain	Brushed	Net Impressed	Brushed	Plain	Burnished	Simple Stamped	Check Stamped	Comp. Stamped	Net Impressed	Brushed	Indet.	Total
Dan River Phase																	
Fea. 1	-	1	2	-	-	-	-	-	-	-	-	-	-	-	-	-	3
Fea. 2	-	2	-	-	1	1	-	-	-	-	-	-	-	-	-	2	6
Fea. 4	-	41	6	-	-	2	-	-	-	-	-	-	-	-	-	263	312
Fea. 6	-	34	-	-	3	-	-	-	-	-	-	-	-	-	-	149	186
Fea. 7	-	12	1	-	1	-	-	-	-	-	-	-	-	-	-	86	100
Fea. 8	-	19	-	-	1	1	-	-	-	-	-	-	-	-	-	105	126
Fea. 15	-	80	-	1	3	2	-	-	-	-	-	-	-	-	-	238	324
Fea. 17	-	31	-	-	-	1	-	-	-	-	-	-	-	-	-	122	154
Fea. 55	-	2	1	-	1	-	-	-	-	-	-	-	-	-	-	21	25
Sub-total	0	222	10	1	10	7	0	0	0	0	0	0	0	0	0	986	1236
Late Saratown Phase																	
Fea. 10	3	295	15	7	-	-	-	-	598	29	97	415	20	336	23	5295	7133
Fea. 21	-	3	2	-	-	-	-	-	8	-	12	6	1	7	-	53	92
Fea. 28/Bu. 11	-	16	3	-	-	4	-	-	-	-	-	-	-	-	-	245	268
Fea. 30/Bu. 12	-	17	2	-	9	-	2	-	3	-	-	-	-	-	-	257	290
Fea. 54	-	4	-	-	-	3	-	-	17	1	-	2	-	-	-	783	810
Bu. 1	-	3	-	-	-	-	-	-	-	-	-	-	-	-	-	27	30
Bu. 2	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	20	21
Bu. 3	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	1	2
Bu. 4	-	7	1	-	-	-	-	-	-	-	-	-	-	-	-	7	15
Bu. 7	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1
Bu. 8	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	3	4
Bu. 9	-	2	2	-	-	-	-	-	2	-	-	-	-	-	-	15	21
Bu. 10	-	2	-	-	-	-	-	-	-	-	-	-	-	-	-	2	4
Sub-total	3	350	26	7	9	7	2	0	630	30	109	423	21	343	23	6708	8691
Indeterminate Phase																	
Plowzone	4	196	36	1	8	23	1	1	70	-	7	30	5	12	-	25365	25759
Midden	1	20	13	-	1	5	1	-	4	-	1	-	-	-	-	1173	1219
Fea. 5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6	6
Fea. 11	-	2	-	-	-	-	-	-	-	-	-	-	-	-	-	3	5
Fea. 36	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1
Surface/Misc	-	4	-	-	-	2	1	-	3	-	-	-	-	-	-	228	238
Sub-total	5	222	49	1	9	30	3	1	78	0	8	30	5	12	0	26775	27228
Total	8	794	85	9	28	44	5	1	708	30	117	453	26	355	23	34469	37155

Table 11.3. Whole vessels and reconstructed vessel sections from Feature 10 at the William Kluttz site.

Vessel No.	Type	Temper	Description	Measurements (cm) Diameter	Height
1	*Oldtown Plain*	Fine Sand	Plain Inverted Bowl	22	19
2	*Oldtown Plain*	Fine Sand	Small-Mouth Jar with Loop Handle	9	-
3	*Oldtown Plain*	Fine Sand	Plain Bowl	10	6
4	*Oldtown Plain*	Very Fine Sand	Hand-Modeled Cup	-	-
5	*Oldtown Plain*	Very Fine Sand	Hand-Modeled Cup	9	4
6	*Oldtown Plain*	Very Fine Sand	Jar with V-Notches on Lip	8	-
7	*Oldtown Plain*	Very Fine Sand	Bowl with Lug Handle & V-Notches on Rim	20	-
8	*Oldtown Plain*	Fine Sand	Plain Jar	19	-
9	*Oldtown Plain*	Very Fine Sand	Bowl with Flared Rim & Red Filmed Interior	22	-
10	*Oldtown Plain*	Fine Sand	Jar with V-Notches on Lip/Rim Edge	30	-
11	*Oldtown Plain*	Fine Sand	Jar with U-Notches on Lip/Rim Edge	34	-
12	*Oldtown Plain*	Fine Sand	Jar U-Notches on Lip/Rim Edge	38	-
13	*Oldtown Plain*	Fine Sand	Cazuela Bowl with Mult. Row Punct. on Body	12	10
14	*Oldtown Plain*	Very Fine Sand	Bowl (?) (Flat Base)	-	-
15	*Oldtown Plain*	Very Fine Sand	Jar (?) (Sub-Conoidal Base)	-	-
16	*Oldtown Plain*	Fine Sand	Jar (?) (Rounded Base)	-	-
17	*Oldtown Plain*	Coarse Sand	Hand-Modeled Cup	-	-
18	*Oldtown Plain*	Very Fine Sand	Plain Bowl	-	-
19	*Oldtown Plain*	Fine Sand	Bowl (Flat Base)	-	-
20	*Oldtown Plain*	Fine Sand	Jar with U-Notches on Lip/Rim Edge	38	-
21	*Oldtown Burnished*	Fine Sand	Cazuela Bowl with Bold Rect. Incising on Rim	26	-
22	*Oldtown Plain*	Fine Sand	Jar with Finely Notched Lip/Rim Edge	30	-
23	*Oldtown Plain*	Fine Sand	Jar with U-Notches on Lip/Rim Edge	34	-
24	*Oldtown Plain*	Fine Sand	Plain Jar	28	-
25	*Oldtown Plain*	Fine Sand	Jar with U-Punctations on Lip/Rim Edge	40	-
26	*Oldtown Plain*	Fine Sand	Jar with Reed Punctations on Lip Edge	36	-
27	*Oldtown Check Stamped*	Fine Sand	Plain Jar	11	12
28	*Oldtown Check Stamped*	Fine Sand	Plain Jar	38	43
29	*Oldtown Check Stamped*	Fine Sand	Jar (Rounded Base)	-	-
30	*Oldtown Check Stamped*	Very Fine Sand	Jar (?) (Body Section)	-	-
31	*Oldtown Check Stamped*	Fine Sand	Jar (?) (Body Section)	-	-
32	*Oldtown Check Stamped*	Fine Sand	Jar (?) (Body Section)	-	-
33	*Oldtown Check Stamped*	Fine Sand	Plain Jar	30	-
34	*Oldtown Check Stamped*	Fine Sand	Jar with Castellated, Punctated, & Notched Rim	28	-
35	*Oldtown Check Stamped*	Fine Sand	Plain Jar	30	-
36	*Oldtown Simple Stamped*	Fine Quartz	Jar with V-Notches on Lip	38	-
38	*Oldtown Simple Stamped*	Very Fine Sand	Plain Jar	42	-
39	*Oldtown Brushed*	Very Fine Sand	Small Jar with U-Notches on Lip/Rim Edge	-	-
40	*Oldtown Comp. Stamped*	Fine Sand	Plain Jar	30	-
41	*Oldtown Net Impressed*	Fine Sand	Plain Jar (Rounded Base)	-	-
42	*Dan River Net Impressed*	Fine Sand	Plain Jar (?)	-	-
43	*Dan River Net Impressed*	Fine Sand	Plain Jar (Rounded Base)	-	-
44	*Dan River Net Impressed*	Fine Sand	Jar with V-Notches on Lip/Rim Edge	26	-
45	*Dan River Net Impressed*	Fine Sand	Plain Jar	44	-
46	*Oldtown Net Impressed*	Fine Sand	Jar with U-Notches on Lip/Rim Edge	34	-
47	*Oldtown Net Impressed*	Fine Sand	Jar with Rim Castellations	40	-
48	*Oldtown Net Impressed*	Fine Sand	Jar with Rim Castellations	26	-
49	*Oldtown Net Impressed*	Fine Sand	Plain Jar (Body Section)	-	-
50	*Oldtown Net Impressed*	Fine Sand	Jar with V-Notches on Lip/Rim Edge	40	-
51	*Oldtown Net Impressed*	Fine Sand	Plain Jar	38	-
52	*Oldtown Net Impressed*	Fine Sand	Jar with Fingertip Punctations on Rim	50	-

eroded for typological classification.

Three separate site occupations are represented by the pottery sample. Eight *Yadkin Fabric-Marked* (Coe 1964) sherds were recovered which can be attributed to a minor Middle Woodland occupation. A later, more substantial Dan River phase occupation is represented by Dan River series pottery with coarse-to-fine sand or crushed quartz temper, mostly scraped interiors, and net impressed, cord marked, brushed, plain, and corncob impressed surfaces. Finally, the late Saratown occupation is represented by Oldtown series pottery with fine-to-very fine sand temper, smoothed interiors, and plain, check stamped, fine net impressed, simple stamped, burnished, and complicated stamped surfaces. Some sherds classified into the Dan River series, especially those found in Feature 10 with net impressed and corncob impressed surfaces, also probably are associated with this occupation.

Yadkin Fabric-Marked

Eight potsherds were classified as *Yadkin Fabric-Marked* (Coe 1964). Three of these came from Feature 10; the remainder were recovered from plowzone and midden excavations. The exterior surfaces of these sherds were impressed with a fine, simple-plaited or wicker fabric-wrapped paddle and, with two exceptions, had smoothed interior surfaces. These sherds were tempered with crushed quartz and sand. Both rimsherds in the sample were undecorated and had rounded lips and straight to slightly everted rim profiles. These potsherds are attributed to a minor Yadkin phase occupation of the site during the Middle Woodland period (ca. A.D. 100–500).

Dan River Net Impressed (Figure 11.42*a–h,k*)

Seven hundred and ninety-four potsherds, or about 30% of all identifiable specimens, were classified as *Dan River Net Impressed* (Coe and Lewis 1952). Two hundred and twenty-two of these sherds came from nine Dan River phase features while 225 sherds also probably associated with this phase were recovered from plowzone, midden, and other miscellaneous contexts. Interestingly, 295 *Dan River Net Impressed* sherds were found in Feature 10 where they comprised 16% of all identified sherds. The occurrence of these sherds, including four large vessel sections, within this late Saratown phase feature strongly suggest that *Dan River Net Impressed* persisted as a minority type throughout the Contact period. This argument is strengthened further by the fact that this feature was located beyond the area of the Dan River phase village and appears to contain few artifacts from that earlier occupation.

Dan River Net Impressed potsherds from all contexts except Feature 10 had exterior surfaces that had been impressed with a coarse knotted net. Over 80% of these sherds also had heavily scraped interiors. Temper consisted primarily of coarse sand (35.4%), fine sand (33.1%), and coarse-to-medium crushed quartz (29.1%). A few sherds (n=26) also were recovered which contained crushed quartz and feldspar, and finely crushed feldspar. Of the 48 rimsherds found, 39 were from large jars with everted rims and rounded lips. The other nine had straight or inverted profiles and probably were from hemispherical bowls. All but 27 sherds exceeded 6 mm in thickness.

Sixty-eight net impressed sherds from non-Feature 10 contexts, including two-thirds of all rimsherds, were decorated or modified in some manner. Decorations most often were applied to the vessel lip and neck, and involved techniques of notching, brushing, incising, and punctation. Specific decorations observed in the sample include: V-shaped notches along the lip (n=4) and lip/rim edge (n=6) (Figure 11.42*a–b*); oblique incisions along the lip (n=7) and lip/rim edge (n=4) (Figure 11.42*c–h,k*); reed punctations along the lip edge (n=1) and body (n=1); U-shaped punctations along the neck (n=2) (Figure 11.42*c,f*); fingertip punctations along the rim (n=2) and neck (n=11) (Figure 11.42*a–b*); brushed or incised band(s) along the rim (n=7), neck (n=9), and body (n=11) (Figure 11.42*e,g–h,k*); and curvilinear incised designs along the neck and shoulder (n=1) (Figure 11.42*d*). Two other sherds had been drilled, presumably for mending.

The *Dan River Net Impressed* sherds recovered from Feature 10 differed in several respects from those found elsewhere at the site. Although exterior surfaces were generally similar, almost 60% of these sherds had smoothed interiors (compared with only 19.3% for sherds from Dan River phase and other contexts). In addition, over 80% contained fine sand temper with the remainder being tempered with medium-to-fine crushed quartz or mixed quartz and feldspar. All of the 21 rimsherds from Feature 10 are from large jars with everted rims and rounded lips; however, vessel walls were relatively thin compared to Dan River phase vessels, with 71% of the *Dan River Net Impressed* potsherds being less than 8 mm thick. Four large vessel sections were recovered from Feature 10. Two of these (Vessels 44 and 45) were rim sections from vessels with rim diameters of 26 cm and 44 cm; Vessel 43 was a rounded basal section of a large vessel; and Vessel 42 was a body section from a large jar (Table 11.3). Fewer *Dan River Net Impressed* sherds from Feature 10 were decorated, and reflect a narrower range of decorative techniques. Decorations observed in the sample included V-shaped notches along the lip (n=2) and lip/rim edge (n=7), U-shaped notches along the rim (n=1), a band of fingertip impressions along the neck (n=1), a brushed band around the neck (n=1), and brushing along the body (n=2).

Dan River Cord Marked (Figure 11.42*j*)

Eighty-five potsherds were classified as *Dan River*

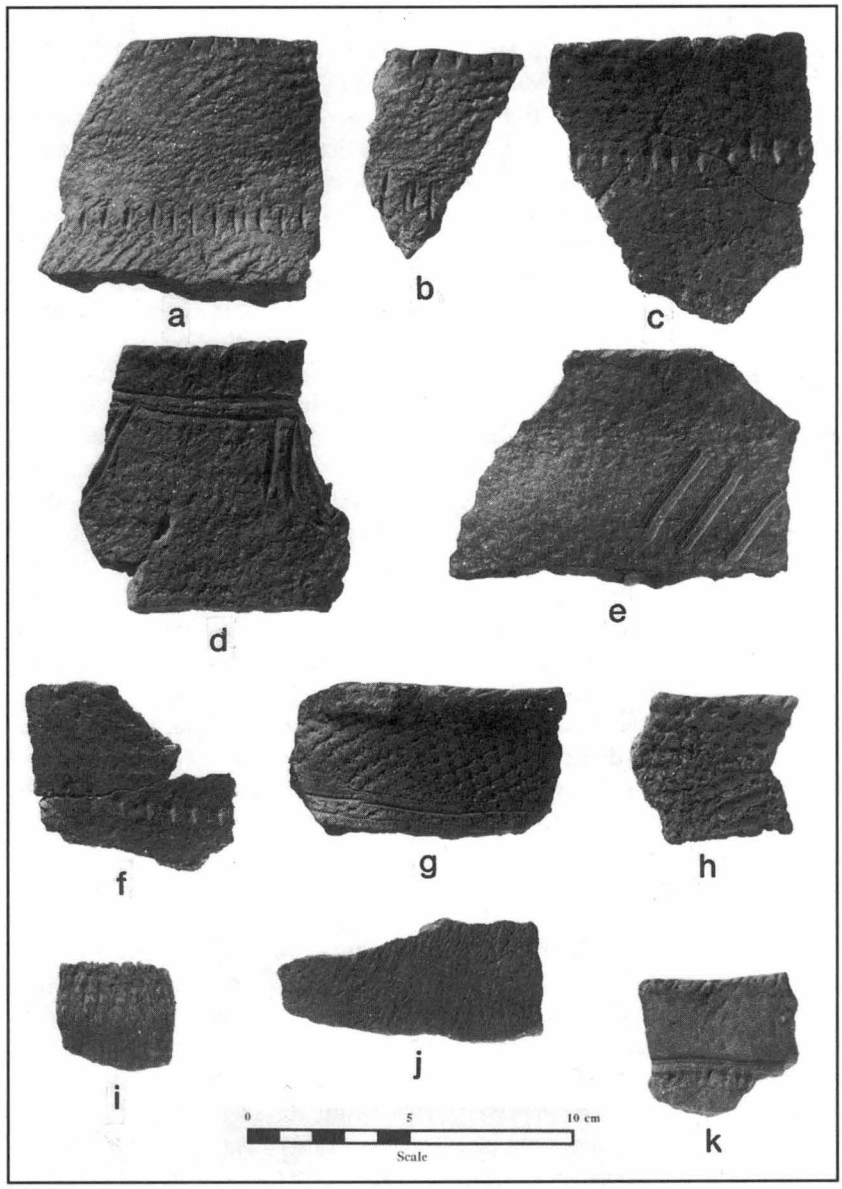

Figure 11.42. Dan River series pottery from the William Kluttz site.

Cord Marked (Coe and Lewis 1952). Over half of these came from plowzone and midden excavations; the remainder came from Features 4 and 10, and as largely isolated finds from several other features. None of these sherds were large enough to determine vessel form. All but six had been manufactured using a malleating paddle wrapped with an S-twisted cordage. Over 80% had heavily scraped interiors. *Dan River Cord Marked* sherds were tempered with coarse sand (50.6%), medium crushed quartz (16.5%), fine sand (16.5%), mixed quartz and feldspar (11.7%), and fine crushed feldspar (n=4.7%). All six rimsherds in the sample are from relatively thick-walled (>6 mm) jars with everted rim profiles and rounded lips. One of these sherds was decorated with oblique incisions along the lip.

Dan River Corncob Impressed (Figure 11.42*i*)

Only nine *Dan River Corncob Impressed* sherds were recovered from the William Kluttz site (Coe and Lewis 1952). Seven of these came from Feature 10 where they probably are associated with the late Saratown phase component. One everted rimsherd from Feature 15, a Dan River phase pit, had medium crushed quartz temper, a scraped interior surface, and V-shaped notches along the rounded lip. The remaining sherds, including two undecorated, everted rimsherds with rounded lips, were tempered with coarse-to-fine sand and had smoothed interiors.

Dan River Plain

Twenty-eight potsherds were classified as *Dan River Plain* (Coe and Lewis 1952). Ten of these were

recovered from Dan River phase features, nine came from Feature 30 (Burial 12) fill, and nine were found during plowzone and midden excavations. Most of these sherds had roughly smoothed exteriors, a gritty texture, and 75% had heavily scraped interiors. Over half (n=18) were tempered with varying amounts of coarse-to-fine sand; the remainder contained medium crushed quartz (n=9) or finely crushed feldspar (n=1). The only rimsherd in the sample had a straight profile, rounded lip, and was decorated with circular reed punctations along the rim.

Dan River Brushed

Forty-four potsherds were classified as *Dan River Brushed* (Coe and Lewis 1952). Thirty of these sherds were recovered during the excavation of plowzone and midden; the others were found in Dan River phase Features 2 (top), 4, 8, 15, and 17, and late Saratown Features 28 (Burial 11) and 54. The latter two features were located within the area of Dan River phase occupation. Most of these sherds (n=37) were tempered with coarse-to-fine sand. The other seven sherds contained fine crushed quartz or mixed quartz and feldspar. Over 70% had heavily scraped interiors. Of the four rimsherds found, two had straight rim profiles, rounded lips, and were undecorated. The other two rimsherds were from jars with everted rims and rounded lips. One was decorated with a band of fingertip punctations along the rim; the other had a band of U-shaped stick punctations along the rim.

New River Knot Roughened and Net Impressed

Five potsherds with crushed shell temper and coarse, knotted-net impressed exteriors were classified as *New River Knot Roughened and Net Impressed* (Evans 1955; Holland 1970). These sherds also had heavily scraped exteriors. The one rimsherd in the sample was from an everted rimmed, rounded lipped jar and was decorated with a band of fingertip punctations around the rim. Pottery of the New River series occurs within a late prehistoric context within the New River drainage to the northwest. These sherds were recovered from Feature 30 (Burial 12) fill, plowzone, midden, and the site surface, and probably are associated with the Dan River component.

New River Brushed

One shell tempered brushed sherd was recovered from the plowzone and probably represents a brushed variant of the New River series (see Evans 1955; Holland 1970). This body sherd also had a brushed interior. A Dan River phase association is assumed.

Oldtown Plain (Figures 11.43, 11.44, and 11.45)

Seven hundred and eight potsherds with smoothed exteriors were classified as *Oldtown Plain* (Wilson 1983:615–618). Over 80% of these, including large sections of at least 25 separate vessels, were recovered from Feature 10 (Table 11.3). Although most *Oldtown Plain* sherds were uniformly smoothed on both surfaces, about 15% had roughly smoothed exteriors while less than 5% exhibited scraping on the interior surface. Nine sherds had smoothed interiors which were subsequently painted with a red pigment and three had burnished interiors. All but nine sherds were tempered with fine-to-very-fine sand; the others contained finely crushed feldspar (n=4), mixed quartz and feldspar (n=2), and crushed steatite (n=3). These latter sherds, because to their unusual temper, may be related to the Burke series which occurs in the western Piedmont of North Carolina during the late prehistoric period (Keeler 1971; Levy et al. 1990).

Substantial information regarding variability in *Oldtown Plain* vessel morphology, size, and decoration was obtained from the William Kluttz site. This variability reflects stylistic and functional elaboration rather than chronological changes in assemblage composition, and can clearly be seen within the Feature 10 vessel assemblage. Because most Feature 10 pottery occurred as dense concentrations of large conjoining sherds that appear to have been deposited as basket loads over a brief period, they are considered to reflect the kinds of vessels that were in use at one moment in time. This is not to suggest, however, that they are the product of a single pottery-making tradition. In fact, much of variability in pottery from Feature 10 may reflect the William Kluttz site's hypothesized role as a refuge community for the Sara and their neighbors at the beginning of the eighteenth century.

Of the 25 *Oldtown Plain* vessels identified from Feature 10, 13 are jars that fall into three size categories (Table 11.3). Vessel 6, a small, thin, well-made jar with a flaring rim and finely incised notches along its flattened lip, has a rim diameter of 8 cm (Figure 11.43*d*). The next size category also is represented by a single vessel (Vessel 8). Although not decorated, it is identical in form to Vessel 6 and measures 19 cm at the rim. Nine other jars (Vessels 10, 11, 12, 20, 22, 23, 24, 25, and 26) represent large cooking or storage vessels and range from 30 cm to 40 cm in rim diameter (Figure 11.44). All of these have everted or flaring rims and are virtually identical in overall morphology. Because of this, isolated sherds were not assigned to a particular vessel unless they actually conjoined. Decorations were restricted to the vessel rim and were observed on all but one vessel. Seven large jars exhibited either U-shaped notches (n=4), V-shaped notches (n=1), finely incised notches (n=1), or U-shaped punctations (n=1) along the lip/rim edge. The other vessel had reed punctations along the lip. Two other vessel sections (Vessels 15 and 16) represent subconoidal and rounded basal sections from large storage jars.

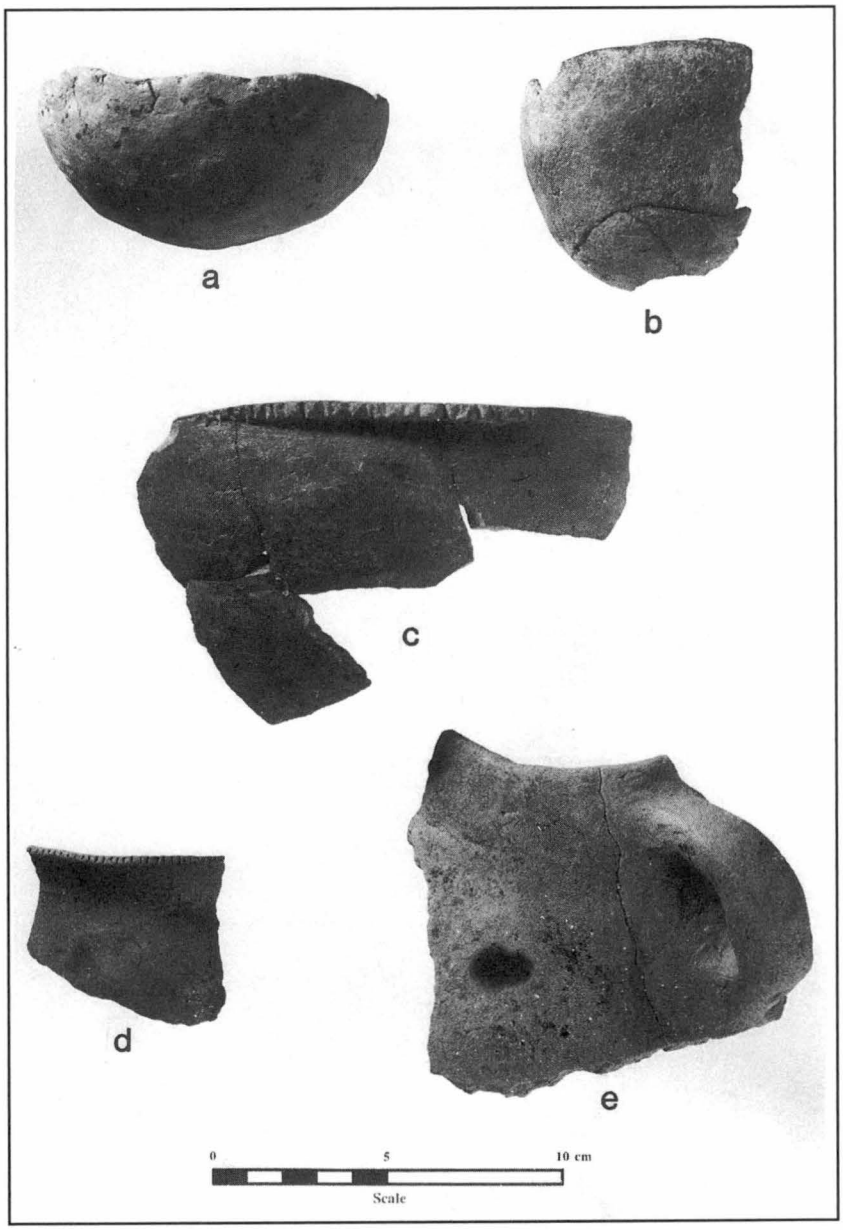

Figure 11.43. *Oldtown Plain* rims and vessel sections from Feature 10.

The remaining 12 *Oldtown Plain* vessels from Feature 10 represent three morphological types: bowls, hand-modeled cups, and small-mouthed jars. Of the eight bowls found, four (Vessels 1, 3, 7, and 18) had straight or inverted rim profiles and ranged from 10 cm to 22 cm in diameter. Only one of these was decorated. It had V-shaped notches along the rim and a lug handle (Figure 11.43*c*). One cazuela bowl (Vessel 13) was recovered (Figure 11.45). Although the rim is missing, most of the body is intact. It measures about 12 cm at the shoulder and was approximately 10 cm in height. This bowl was decorated with small, circular reed punctations which cover most of the vessel exterior. Specifically, a single line of punctations was placed around the shoulder and zigzag bands formed by a double line of punctations were placed both above and below the vessel shoulder. Another unusual bowl (Vessel 9) recovered from Feature 10 had a wide, slightly flaring rim and was painted on the interior with a red pigment. This bowl measures approximately 22 cm in rim diameter. Two flattened basal sections (Vessels 14 and 19) also were found which probably are from bowls.

Three small cups (Vessels 4, 5, and 17) were found which had been manufactured by hand modeling rather than by a paddle-and-anvil technique (Figure 11.43*a–b*). All were crudely made, undecorated, and did not exceed 10 cm in diameter. Finally, two conjoining rimsherds were recovered which represent a constricted-mouth, loop-handled jar (Figure 11.43*e*). This vessel form is without precedent within the Dan River drainage and may be derived from the New River or

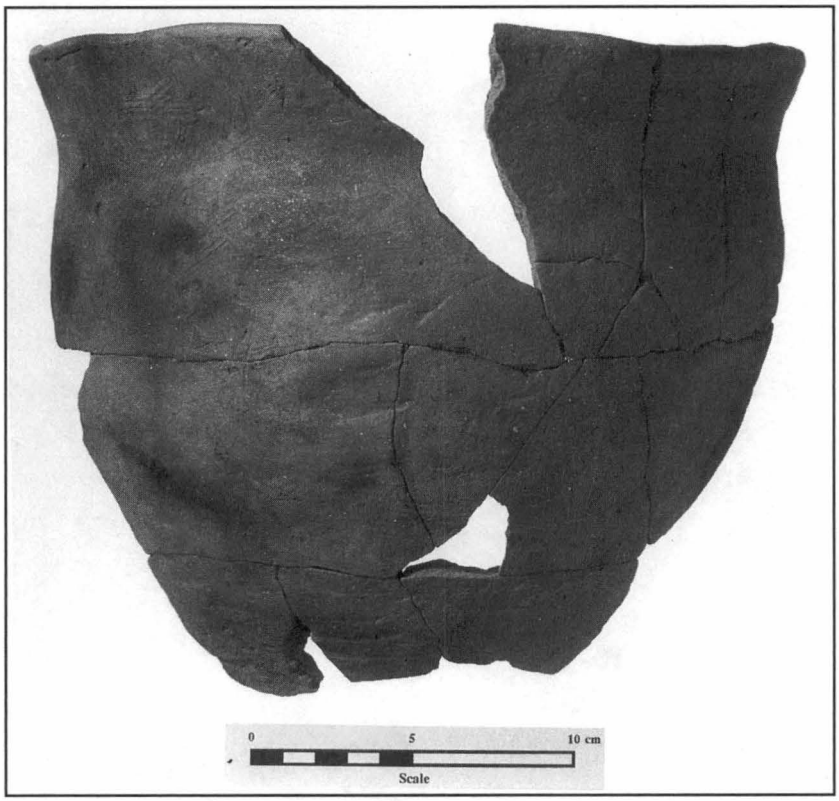

Figure 11.44. Reconstructed *Oldtown Plain* jar (Vessel 24) from Feature 10.

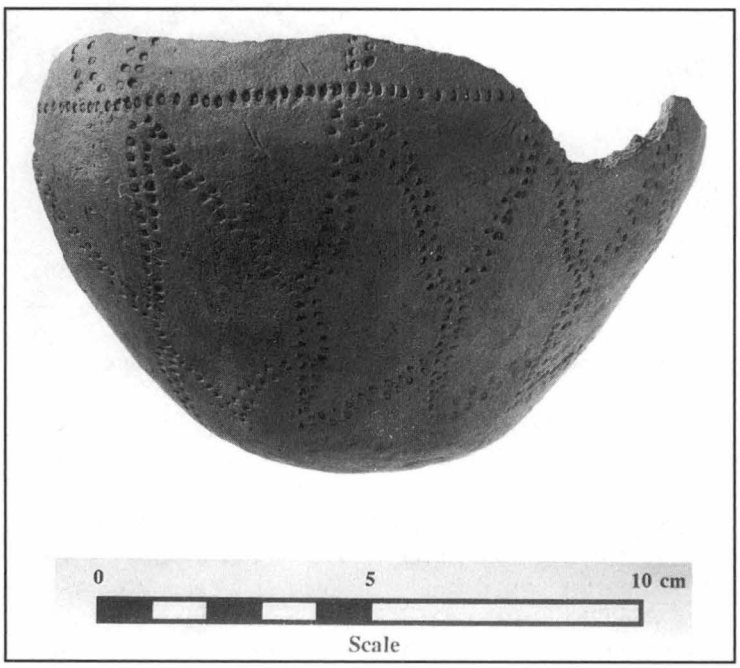

Figure 11.45. Punctated *Oldtown Plain* bowl (Vessel 13) from Feature 10.

upper Tennessee drainages where loop-handled vessels are more common.

Oldtown Burnished (Figure 11.46)

Thirty potsherds had highly smoothed or burnished surfaces and were classified as *Oldtown Burnished* (Wilson 1983:615–618). Twenty-nine of these were from a single vessel (Vessel 21) found in Feature 10; the other came from Feature 54, another late Saratown feature. Vessel 21 is a large, sand-tempered, cazuela

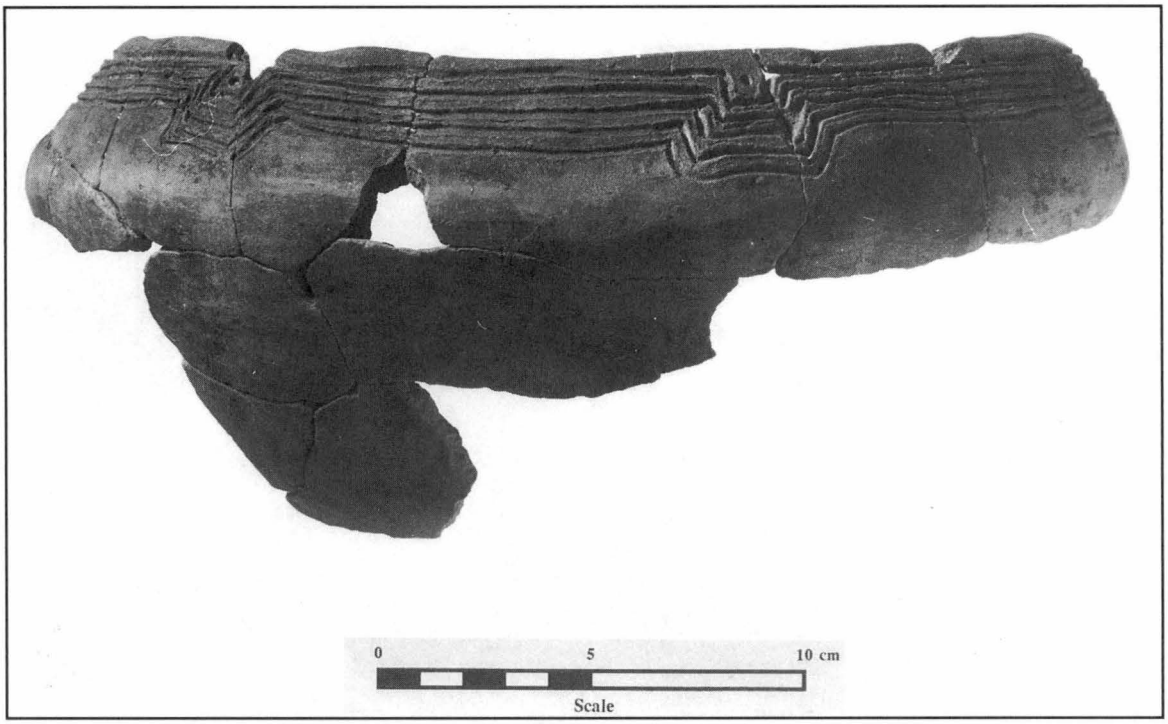

Figure 11.46. *Oldtown Burnished* cazuela bowl (Vessel 21) from Feature 10.

bowl about 26 cm in diameter at the rim. Although most of the rim was recovered, very little of the vessel below the shoulder was found. The area between the rim and shoulder was decorated with a Lamar-like, bold-incised design comprised of a circumferential band of five closely-spaced lines broken by eight rectilinear festoons placed equidistant around the rim.

Oldtown Simple Stamped (Figure 11.47)

One hundred and seventeen simple stamped sherds, including 57 sherds from three large vessels found in Feature 10 (Vessels 36 and 38) and late Saratown Feature 21 (Vessel 37), were recovered. All of these potsherds were classified as *Oldtown Simple Stamped* (Wilson 1983:615–618). Over 82% were tempered with coarse-to-very-fine sand; the remainder contained either fine crushed quartz (n=17) or mixed quartz and feldspar (n=4). All but two sherds had smoothed interiors. All three vessel sections, as well as other rimsherds, are from large storage or cooking vessels with everted rims. Most (73%) had flattened lips.

Vessels 36 and 37 are large, thick-walled (ca. 8 mm) jars that measure 38 cm and 32 cm in rim diameter, respectively. Vessel 36 also has a flattened lip that was paddle stamped to produce shallow notches. The bold simple-stamp impressions on both of these vessels were partially obliterated by subsequent wiping, scraping, and handling. Both of these vessels, and especially Vessel 36 (Figure 11.47), bear a remarkable resemblance to *Jenrette Simple Stamped* pottery recovered from the Jenrette site within the Eno drainage and attributed to the Shakori tribe. Vessel 38, while also a large jar (42 cm in rim diameter), has substantially thinner (ca. 5 mm) walls. It also contrasts with the other two vessels in that it has faint stamp impressions that probably resulted from the vessel being stamped after the clay had partially dried. This vessel is more typical of simple stamped pottery found at nearby Early Upper Saratown (Wilson 1983:408–409).

Oldtown Check Stamped (Figures 11.48, 11.49, and 11.50)

Four hundred and fifty-three potsherds were classified as *Oldtown Check Stamped* (Wilson 1983:615–618), making it the second most frequent Oldtown series type, behind *Oldtown Plain*. Over 90% of these, including two completely reconstructed jars and seven other large vessel sections, came from Feature 10. Late Saratown Features 21 and 54 also contained *Oldtown Check Stamped* pottery. Most vessels were manufactured using a carved paddle that had a square grid pattern consisting of parallel, 3-mm-wide grooves spaced 4 mm apart and cut perpendicular to one another. Often, the paddle was applied to a relatively wet exterior surface, producing a rough exterior that sometimes resembled coarse net impressed pottery. Vessel 29 and a few other sherds, however, were very lightly stamped with a different type of paddle containing much larger, diamond-shaped checks. The malleating paddles used to manufacture this pottery had designs constructed of 2 mm wide, parallel incisions spaced about 8 mm apart and crossed obliquely by

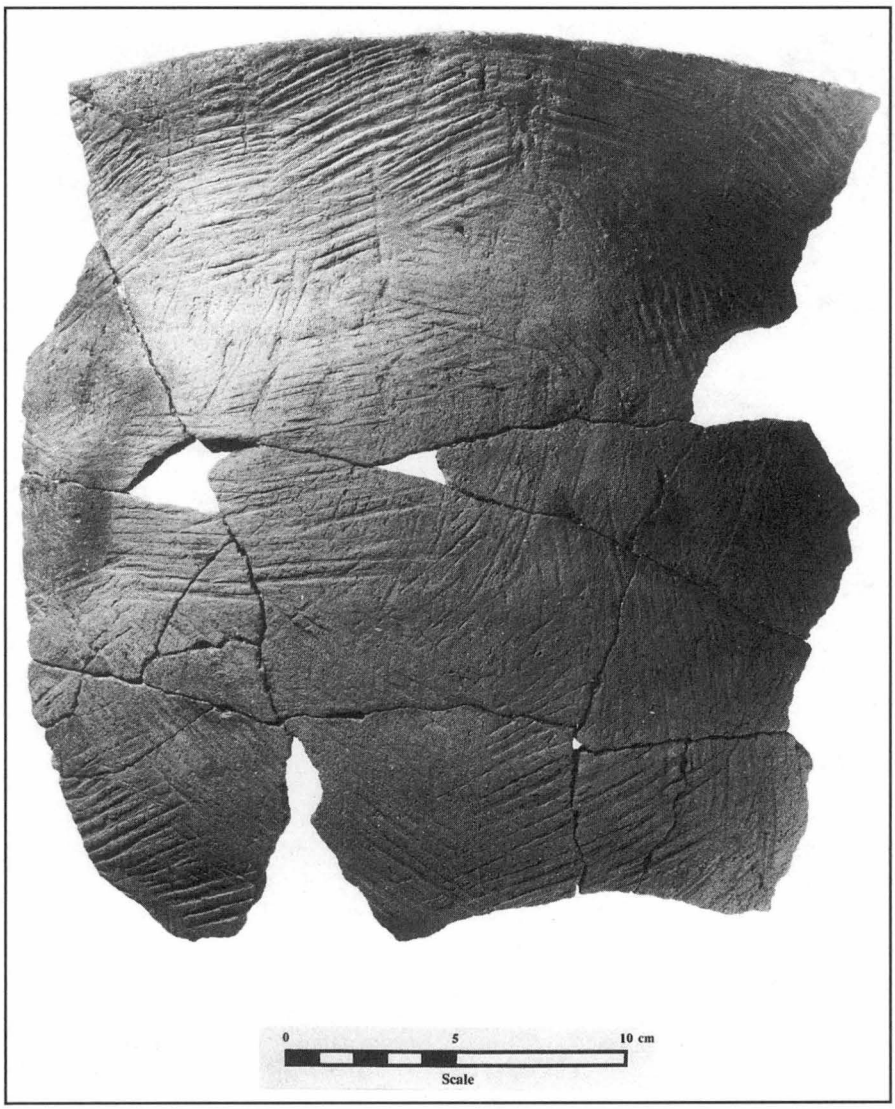

Figure 11.47. *Oldtown Simple Stamped* jar section (Vessel 36) from Feature 10.

other, similarly-spaced incisions.

All but two sherds were tempered with fine-to-very-fine sand and all had smoothed interiors. One sherd had fine crushed quartz temper while another contained small amounts of crushed steatite. This steatite-tempered sherd may be related to the Burke series, a late prehistoric pottery type which occurs in the western North Carolina Piedmont (Keeler 1971; Levy et al. 1990).

Of the nine *Oldtown Check Stamped* vessels identified from Feature 10, eight are large storage or cooking jars with everted rims and have rim diameters of 28 cm to 38 cm (Figures 11.48 and 11.49). One of these jars, Vessel 28, was completely reconstructed (Figure 11.48). It measures 38 cm in diameter and 43 cm in height. All of the large jars had flattened or thickened flat lips except for Vessel 34 which had a rounded lip. It also was the only decorated vessel, having four equally-spaced rim peaks or castellations as well as circular reed punctations, small stick punctations, and V-shaped notches along the lip. Finally, Feature 10 also contained a small, crushed check stamped jar measuring 11 cm in rim diameter and 12 cm in height (Figure 11.50). This undecorated jar had slightly flaring rim and flattened lip, and resembles in form and surface treatment Occaneechi pottery from the Fredricks site along the Eno River.

Oldtown Complicated Stamped (Figure 11.51*a*)

Twenty-six complicated stamped sherds were recovered from the William Kluttz site and classified as *Oldtown Complicated Stamped* (Wilson 1983:615–618). Twenty-two of these, including 20 from a single vessel (Vessel 40) found in Feature 10, had curvilinear stamp designs; the other four had rectilinear designs. These sherds were tempered with fine-to-very-fine sand and had smoothed interiors. Vessel 40 is an undecorated jar that has a flaring rim and a rounded lip, and

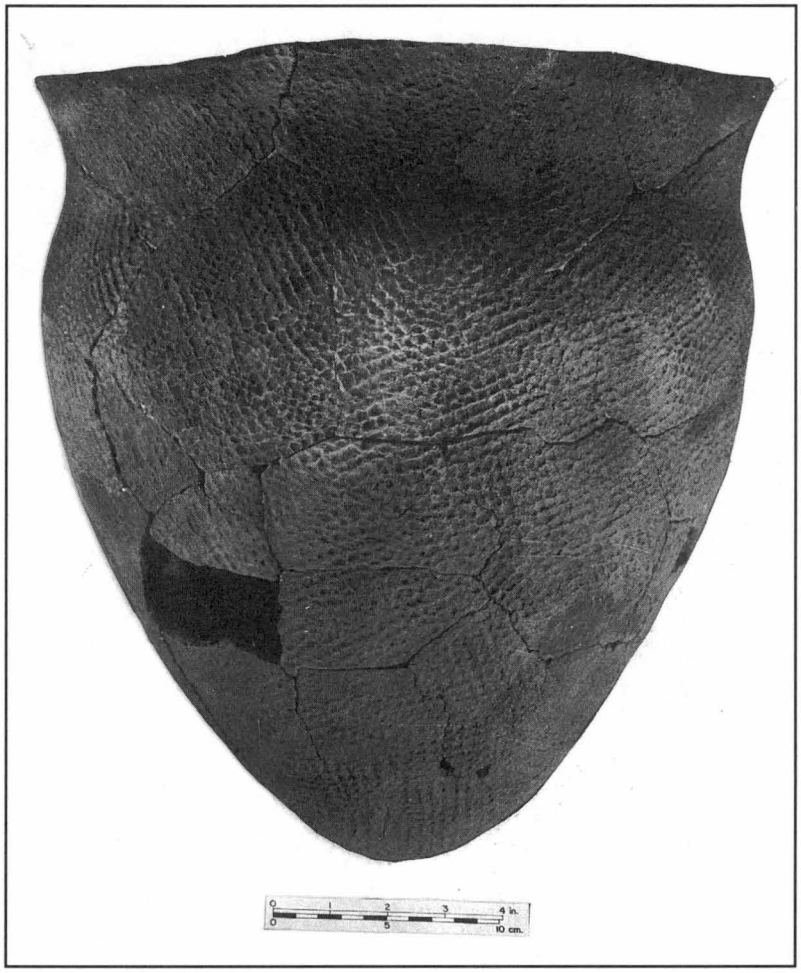

Figure 11.48. *Oldtown Check Stamped* storage jar (Vessel 28) from Feature 10.

measures 30 cm at the rim. The vessel walls are 7 mm to 9 mm thick. The carved-paddle motif consists of overlapping spirals and the interior rim surface has been burnished. Similar pottery has been reported from nearby Upper Saratown (see Wilson 1983:453).

Oldtown Net Impressed (Figures 11.51*b*, 11.52, and 11.53)

Three hundred and fifty-five potsherds were classified as *Oldtown Net Impressed* (Wilson 1983:615–618). Almost 95% of these, including 187 sherds representing eight vessels, were recovered from Feature 10. *Oldtown Net Impressed* sherds were distinguished from *Dan River Net Impressed* pottery by the almost exclusive use of fine-to-very-fine sand temper, the presence of very fine net impressions on the exterior surface (in contrast to the relatively coarse netting used by Dan River potters), uniformly smoothed vessel interiors, and thin sherd or vessel walls (only eight basal sherds exceeded 8 mm in thickness).

All of the *Oldtown Net Impressed* vessels identified from Feature 10 (Vessels 41 and 46 to 52) are large to very large jars with flaring rims and rounded or subconoidal bottoms (Table 11.3). Rim diameters for these vessels range from 26 cm to 50 cm. Surprisingly, the largest jar (Vessel 52) had very thin walls (i.e., 4 mm to 6 mm thick). Five of the eight vessels were decorated. Two of these had rim castellations (Figures 11.51*b* and 11.52), one had V-shaped notches along the lip/rim edge, one had U-shaped notches along the lip/rim edge (Figure 11.53), and one had fingertip notches along the rim.

Although some pottery classifiable as *Dan River Net Impressed* continued to be manufactured and used during the late Saratown phase, the presence of numerous *Oldtown Net Impressed* vessels within Feature 10 provides the best evidence that the net impressed pottery tradition begun by the onset of the Dan River phase persisted until the Sara's abandonment of the Dan River drainage in the early eighteenth century. This situation stands in sharp contrast to other drainages within the Siouan heartland (e.g., the Eno-Flat and Haw drainages) where no such continuity in ceramic tradition can be demonstrated.

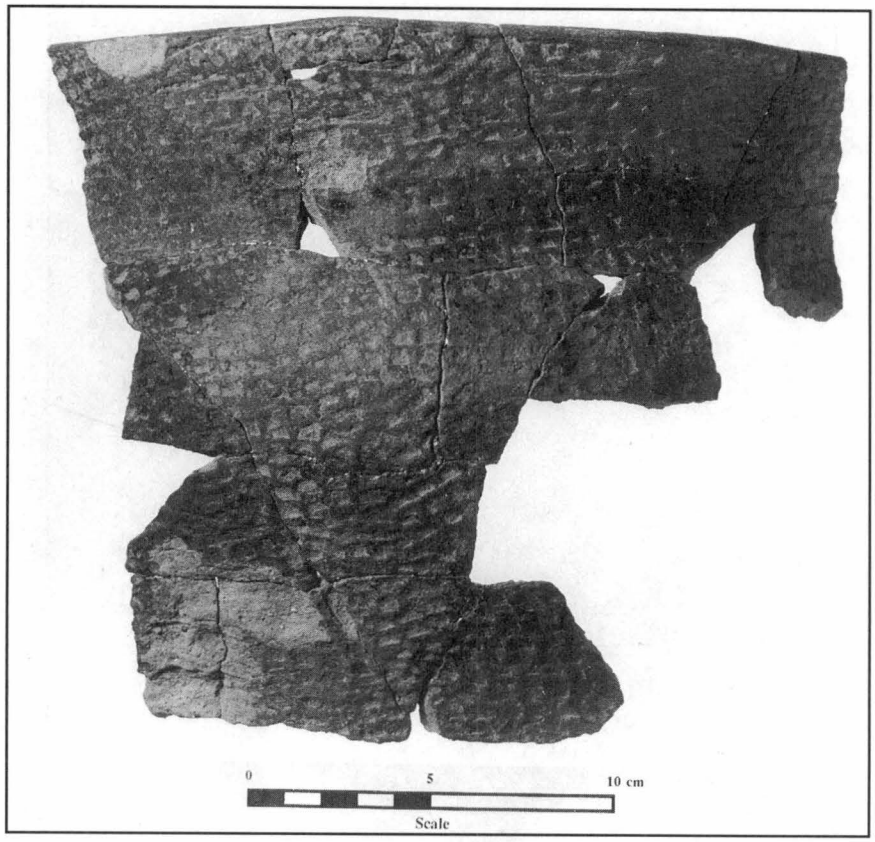

Figure 11.49. *Oldtown Check Stamped* jar section (Vessel 35) from Feature 10.

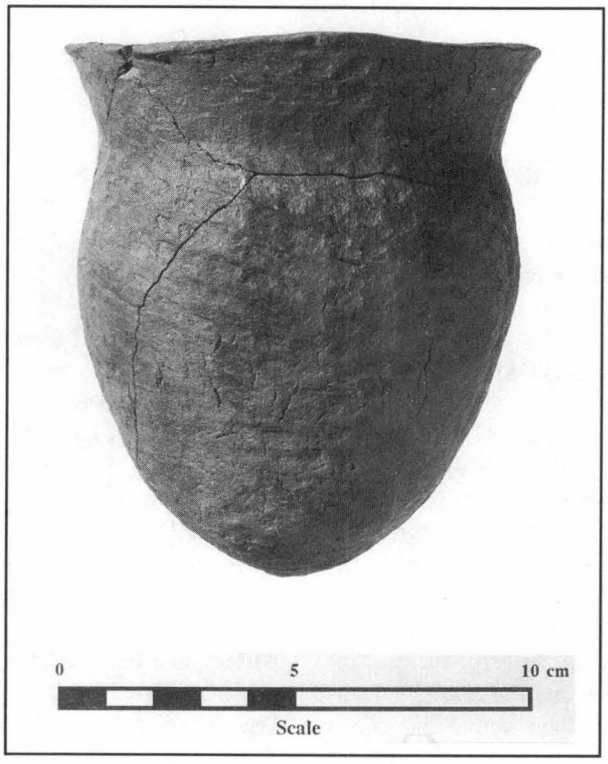

Figure 11.50. Small *Oldtown Check Stamped* jar (Vessel 27) from Feature 10.

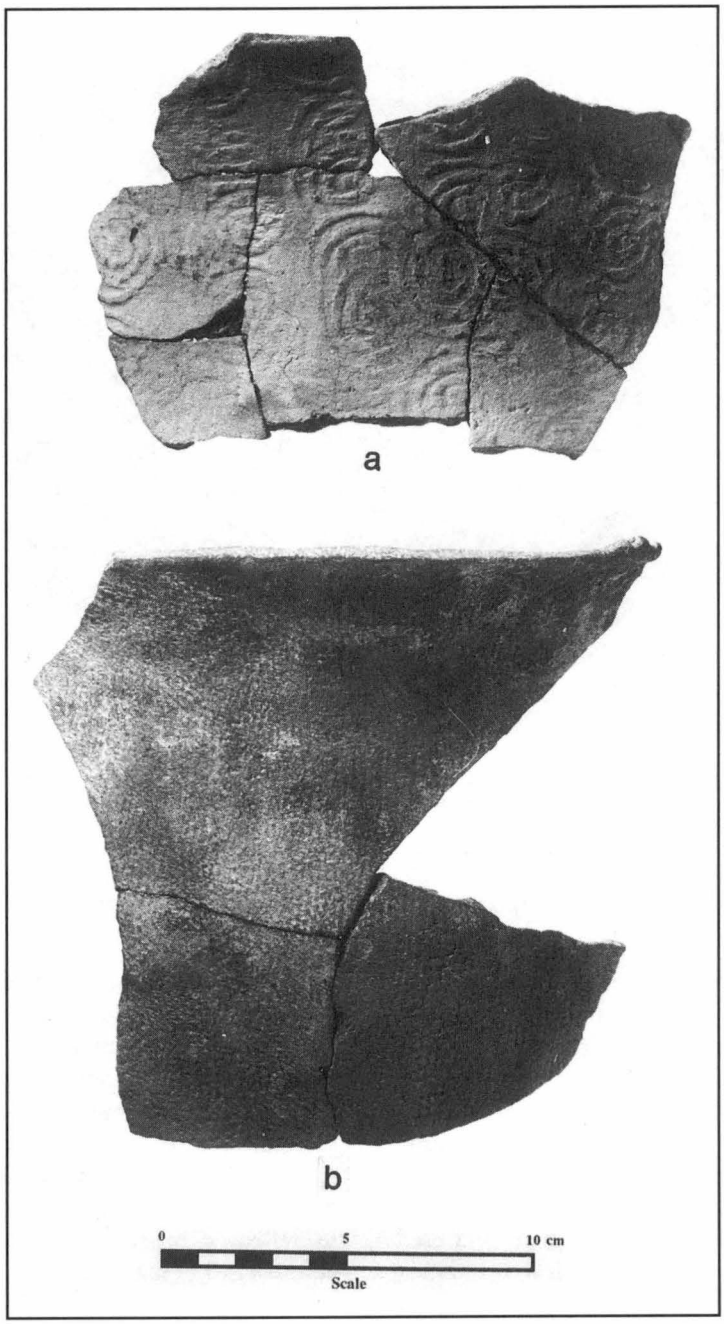

Figure 11.51. *Oldtown Complicated Stamped* (Vessel 40) and *Oldtown Net Impressed* (Vessel 48) jar sections from Feature 10.

Oldtown Brushed

Twenty-three potsherds, all of which were recovered from Feature 10, were classified as *Oldtown Brushed* (Wilson 1983:615–618). These sherds are from vessels that were scraped with a stiff twig brush prior to firing. Almost half of these sherds also have brushed interiors. All are tempered with fine-to-very-fine sand. One vessel section (Vessel 39), comprised of six sherds, was recovered. It is from a small (10–20 cm rim diameter) jar with an everted or flaring rim and decorated with V-shaped notches along the lip/rim edge.

Indeterminate Sherds

Over 92% (n=34,469) of the potsherds from the 1988 excavations at the William Kluttz site, including 26,775 from plowzone, midden, and other miscellaneous contexts, were not classified because of either eroded surfaces or small size.

Summary

The importance of the Feature 10 vessel assemblage to our general understanding of ceramic variability during the Contact period cannot be overstated. Be-

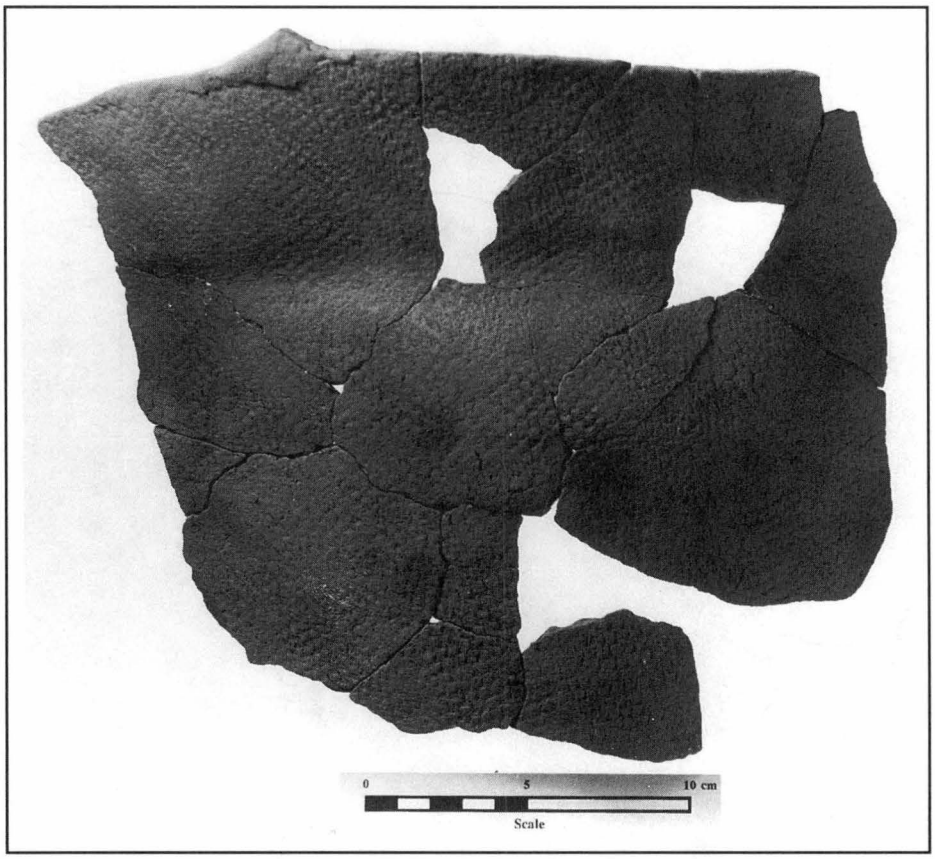

Figure 11.52. *Oldtown Net Impressed* jar section (Vessel 47) from Feature 10.

cause so many pots were removed from use and discarded during one brief moment in time, it has been possible to get a rare glimpse of the variety of pots being used by the William Kluttz site's inhabitants. Some of the variability almost certainly can be attributed to different functional requirements (e.g., cooking, storing, culinary, and ceremonial needs). However, the kinds of stylistic differences seen, as well as the similarity of certain vessels to pottery made and used outside the Dan River drainage, suggest that either trade or the presence of non-Sara potters representing different pottery-making traditions are necessary factors in any explanation of ceramic variability.

From the perspective of the Feature 10 ceramic sample, it appears that the final occupation of the site was as a refuge community to which many peoples, or at least potters, from adjacent drainages may have sought protection alongside the more populous Sara. For example, it seems more than coincidence that the *Oldtown Simple Stamped* pottery from the William Kluttz site is so similar to *Jenrette Simple Stamped*, since the Sara and Shakori became allied as part of the Catawba Nation little more than a decade later. Just as similarities between Sara and Catawba pottery appear to reflect a relationship between these two groups before 1700, it is suggested that some of the variability within ceramic assemblages from the William Kluttz site and other terminal villages of the piedmont Siouans may reflect the emerging social and political alliances that became more clearly manifested during the first quarter of the eighteenth century.

Lithic Artifacts

Archaeological testing at the William Kluttz site produced a sample of 5,962 lithic artifacts (Table 11.4). The sample consists of debitage and exhausted cores (n=5,224), chipped stone tools and tool fragments (n=704), ground stone tools and tool fragments (n=12), and large cobble tools (n=22). Approximately 60% of these artifacts were recovered from feature contexts associated with the Dan River phase and late Saratown phase occupations. One thousand and eight lithic artifacts came from features attributed to the Dan River phase; a larger sample of 2,423 artifacts came from late Saratown features. The remainder are from features that could not be assigned to a particular phase. Whereas most of the artifacts from Dan River features probably are associated with that phase, only the samples from Features 10 and 21 (n=1,803) can be

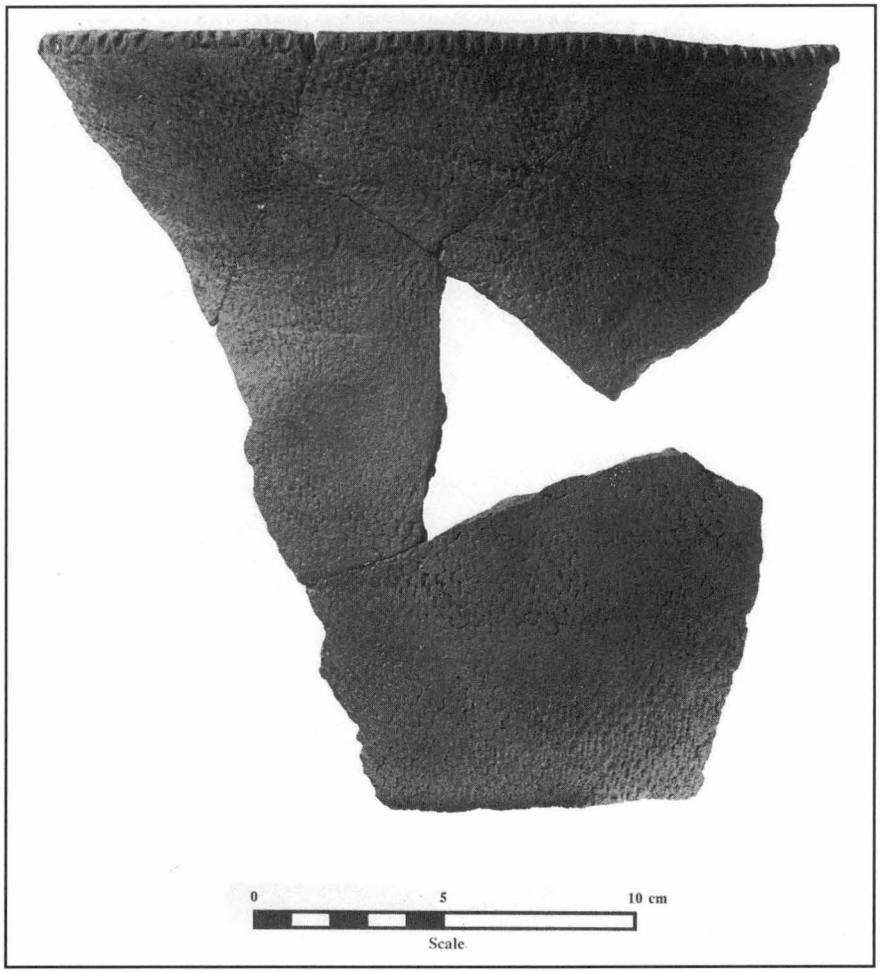

Figure 11.53. *Oldtown Net Impressed* jar section (Vessel 46) from Feature 10.

confidently attributed to the late Saratown phase. Both of these features were located away from the area of heaviest Dan River phase activity. Several earlier projectile point types were recovered throughout the excavation and suggest that some of the lithic artifacts from the site may be associated with Middle Archaic, Late Archaic/Early Woodland, and Middle Woodland components.

No attempt was made during analysis to classify metavolcanic materials (except rhyolites) by specific rock type. Major artifact categories are described below.

Debitage

Decortication Flakes. Sample Size: 806. Form: This category contains both primary (n=311) and secondary (n=495) decortication flakes. Decortication flakes exhibit a striking platform and bulb of percussion on the ventral surface, and have cortex (primary – >75% cortex; secondary – <75% cortex) remaining on the dorsal surface. Material: Rhyolite–623, Vein quartz–120, Quartzite–27, Jasper–17, Chert–16, Other metavolcanic rock–1, Chalcedony–1, Unidentified rock–1. Comment: Decortication flakes represent the by-product of core reduction during the early stages of stone tool manufacture. Unlike the Lower Saratown and Powerplant site samples, the raw materials represented at the William Kluttz site indicate a much greater reliance upon rhyolite, as well as the use of more exotic materials such as jasper and chert. Although potential source areas have not been identified, rhyolite and jasper are believed to be locally derived.

Interior/Bifacial Thinning Flakes. Sample Size: 4,138. Form: Interior flakes are flat flakes that lack cortex, do not have a steep platform angle, and exhibit flake removal scars on the dorsal surface. Bifacial thinning flakes are similar but have a steep platform angle that indicates detachment from a biface. These two flake types were not distinguished during analysis. Material: Rhyolite–2,660, Vein quartz–1,040, Other metavolcanic rock–200, Jasper–182, Chert–34, Quartzite–13, Crystal quartz–6, Chalcedony–3. Comment: Interior and bifacial thinning flakes result from intermediate and final stages of core reduction and bifacial tool production. Unlike corresponding flake samples

Table 11.4. Distribution of lithic artifacts from the William Kluttz site.

Category	PZ	Midden	Context Fea 1	Fea 2	Fea 3	Fea 4	Fea 5	Fea 6	Fea 7	Fea 8	Fea 10	Fea 11	Fea 15	Fea 17	Fea 21	Fea 28/ Bu 11
Debitage																
Decortication Flakes	382	34	1	-	-	38	-	23	5	10	174	-	16	20	4	10
Interior/Bif. Thin. Flakes	1276	97	-	1	3	179	6	164	77	119	1330	1	135	123	31	65
Shatter Fragments	80	-	-	-	-	-	-	8	1	3	56	-	3	7	3	3
Other Flakes	11	-	-	-	-	-	-	1	-	2	11	-	-	-	-	-
Cores	37	3	-	-	-	1	-	-	-	-	27	-	-	-	1	-
Raw Material	1	-	-	-	-	-	-	1	-	-	1	-	-	-	-	-
Projectile Points																
Morrow Mountain II Stemmed	3	2	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Halifax Side-Notched	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-
Small Stemmed Points	4	-	-	-	-	-	-	-	-	1	1	-	-	-	-	-
Yadkin Large Triangular	4	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-
Pee Dee Pentagonal	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Small Triangular Points	145	14	-	-	-	8	-	3	5	5	81	-	6	5	3	5
Randolph Stemmed	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Unidentified Points	10	-	-	-	-	-	-	4	-	3	4	-	-	3	-	-
Other Chipped Stone Artifacts																
Bifaces	38	-	-	-	-	-	-	1	1	-	5	-	-	-	-	-
Drills	6	-	-	-	-	-	-	-	-	-	3	-	-	1	-	-
Chipped Disks	1	-	-	-	-	-	-	-	-	-	3	-	-	-	1	-
Chipped Hoe	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-
End Scrapers	2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Side Scrapers	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pièces Esquillées	3	-	-	-	-	-	-	1	-	-	-	-	-	-	-	-
Denticulates	1	-	-	-	-	-	-	-	-	-	2	-	-	-	-	-
Spokeshaves	15	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perforators	21	-	-	-	-	-	-	-	-	-	5	-	-	-	-	-
Gravers	10	-	-	-	-	1	-	-	-	-	-	-	2	-	-	-
Retouched Flakes	170	8	-	-	-	1	1	1	1	1	28	-	-	-	-	10
Ground Stone Artifacts																
Ground Celt Fragment	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-
Ground Adze Fragment	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-
Ground Disks	-	-	-	-	-	-	-	-	-	-	2	-	-	-	-	-
Stone Bead	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-
Stone Pipes	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Ground Stone Fragments	1	-	-	-	-	-	-	-	-	-	3	-	-	-	-	-
Large Cobble Tools																
Hammerstones	4	-	-	-	-	-	-	-	-	-	15	-	-	-	-	-
Milling Stones	-	-	-	-	-	-	-	-	-	-	2	-	-	-	-	-
Abrader	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-
Total	2229	158	1	1	3	228	7	207	90	144	1760	1	162	159	43	94

from the Powerplant and Lower Saratown sites, the raw materials represented by interior and bifacial thinning flakes at the William Kluttz site are similar in relative frequency to those observed in the decortication flake sample and indicate similar patterns of acquisition, reduction, and use for these raw materials.

Shatter Fragments. Sample Size: 178. Form: Shatter fragments are amorphous, angular flakes that result from all stages of lithic reduction. Material: Vein quartz–92, Rhyolite–64, Jasper–14, Other metavolcanic rock–3, Crystal quartz–3, Quartzite–1, Chalcedony–1. Comment: None.

Other Flakes. Sample Size: 25. Form: This category includes eight core rejuvenation flakes and 17 other flakes that could not be specifically classified. Material: Rhyolite–16, Other metavolcanic rock–3, Vein quartz–3, Quartzite–2, Crystal quartz–1. Comment: None.

Cores. Sample Size: 73. Form: Cores are amorphous chunks or nodules of utilizable cryptocrystalline

Table 11.4 Continued.

Category	Context													
	Fea 30/ Bu 12	Fea 36	Fea 54	Fea 55	Bu 1	Bu 2	Bu 3	Bu 4	Fea 7	Fea 8	Fea 9	Fea 10	Surf./ Misc.	Total
Debitage														
Decortication Flakes	27	-	30	4	-	1	2	5	-	-	2	-	18	806
Interior/Bif. Thin. Flakes	152	-	201	11	10	4	2	26	3	10	16	2	94	4138
Shatter Fragments	-	1	11	-	-	-	-	-	-	-	-	-	2	178
Other Flakes	-	-	-	-	-	-	-	-	-	-	-	-	-	25
Cores	-	-	-	-	-	-	-	-	-	-	-	-	4	73
Raw Material	-	-	-	-	-	-	-	-	-	-	-	-	-	3
Projectile Points														
Morrow Mountain II Stemmed	-	-	-	-	-	-	-	-	-	-	-	-	-	5
Halifax Side-Notched	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Small Stemmed Points	-	-	-	-	-	-	-	-	-	-	-	-	-	6
Yadkin Large Triangular	-	-	-	-	-	-	-	-	-	-	-	-	-	5
Pee Dee Pentagonal	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Small Triangular Points	5	1	3	-	1	1	-	-	-	1	2	-	7	301
Randolph Stemmed	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Unidentified Points	-	-	-	-	-	-	1	1	-	-	1	-	-	27
Other Chipped Stone Artifacts														
Bifaces	-	-	1	-	-	-	-	-	-	-	-	-	2	48
Drills	-	-	-	-	-	-	-	-	-	-	-	-	-	10
Chipped Disks	-	-	-	-	-	-	-	-	-	-	-	-	-	5
Chipped Hoe	-	-	-	-	-	-	-	-	-	-	-	-	-	1
End Scrapers	-	-	-	-	-	-	-	-	-	-	-	-	-	2
Side Scrapers	-	-	-	1	-	-	-	-	-	-	-	-	-	2
Pièces Esquillées	-	-	-	-	-	-	-	-	-	-	-	-	-	4
Denticulates	-	-	-	-	-	-	-	-	-	-	-	-	-	3
Spokeshaves	-	-	-	-	-	-	-	-	-	-	-	-	-	15
Perforators	-	-	-	-	-	-	-	-	-	-	-	-	-	26
Gravers	-	-	-	-	-	-	-	-	-	-	-	-	-	13
Retouched Flakes	-	-	4	-	-	-	-	-	-	-	1	-	3	229
Ground Stone Artifacts														
Ground Celt Fragment	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Ground Adze Fragment	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Ground Disks	-	-	-	-	-	-	-	-	-	-	-	-	-	2
Stone Bead	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Stone Pipes	-	-	-	-	-	-	-	-	-	-	-	-	-	2
Ground Stone Fragments	-	-	-	-	-	-	-	-	-	-	-	-	1	5
Large Cobble Tools														
Hammerstones	-	-	-	-	-	-	-	-	-	-	-	-	-	19
Milling Stones	-	-	-	-	-	-	-	-	-	-	-	-	-	2
Abrader	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Total	184	2	250	16	11	6	5	32	3	11	22	2	131	5962

rock from which two or more flakes have been removed. Material: Vein quartz–42, Rhyolite–14, Jasper–8, Quartzite–4, Other metavolcanic rock–4, Crystal quartz–1. Comment: The predominance of quartz cores may reflect the use of river cobbles or hearth rocks as a ready source of utilizable stone.

Raw Material. Sample Size: 3. Form: All three of these specimens are pieces of utilizable rock that apparently were transported to the site but never used. Material: Other metavolcanic rock–1, Rhyolite–1, Soapstone–1. Comment: None.

Projectile Points

Morrow Mountain II Stemmed Projectile Points. Sample Size: 5. Form: According to Coe (1964:37), the *Morrow Mountain II* projectile point type is defined by a long, narrow blade and a tapered stem. Two of these specimens are complete; the other three have broken tips. Material: Rhyolite–2, Other metavolcanic rock–3. Comment: All of these artifacts were recov-

ered from plowzone or midden excavations. The *Morrow Mountain II* type dates to the Middle Archaic period (ca. 5,500–5,000 B.C.).

Halifax Side-Notched Projectile Point. Sample Size: 1. Form: The *Halifax Side-Notched* type is described by Coe (1964:108) as having a "slender blade with slightly restricted base. Shallow side-notches. Base and side-notches were usually ground. The material most frequently used was vein quartz." This specimen has a broken tip. Material: Vein quartz–1. Comment: This projectile point, recovered from Feature 10 fill, probably dates to the late Middle Archaic period (ca. 3,500 B.C.).

Small Stemmed Projectile Points. Sample Size: 6. Form: All of these specimens have triangular blades and small, squared stems, and resemble Keel's (1976:194) *Otarre Stemmed* type. Three of these artifacts are complete; the others have broken tips. Material: Rhyolite–5, Other metavolcanic rock–1. Comment: Four of these projectile points were recovered from the plowzone, one came from Feature 8, and one was found in Feature 10. A Late Archaic or Early Woodland cultural association is assumed for these artifacts.

Yadkin Large Triangular Projectile Points. Sample Size: 5. Form: Coe (1964:45) describes this type as "a large, symmetrical, and well-made triangular point." Three of these specimens, including one that conforms to Coe's "A-typical eared variety," are finely retouched. The other two are slightly larger and more crudely made. Material: Rhyolite–4, Porphyritic rhyolite–1. Comment: The "eared" Yadkin projectile point was recovered from Feature 10; the other specimens came from the plowzone. This projectile point type is associated with the Middle Woodland period (ca. A.D. 100–500).

Pee Dee Pentagonal Projectile Point. Sample Size: 1. Form: Although Coe (1964:49) describes this type as "a small asymmetrical and carelessly made point," he also notes that "some specimens. . .were very carefully and symmetrically made." This artifact is a small, finely retouched triangular projectile point that was reworked into a pentagonal form. Material: Chert–1. Comment: A general Late Prehistoric or Historic period association is assumed. This projectile point was found in the plowzone.

Small Triangular Projectile Points (Figures 11.54*a–s* and 11.55*a–bb*). Sample Size: 301. Form: These projectile points generally conform to the *Caraway Triangular* and *Clarksville Small Triangular* types (Coe 1964:49, 112). Several specimens are flakes that have been marginally retouched to produce a triangular form. Edge configuration could not be determined for 120 triangular point fragments. Most of the remaining specimens had straight lateral edges and straight (n=88) or incurvate (n=46) bases. Other shapes represented in the sample included incurvate sides and base (n=20), straight base and incurvate sides (n=16), straight base and excurvate sides (n=7), and incurvate base and excurvate sides (n=4). These projectile points range from 16 mm to 43 mm (mean=24.8, sd=4.9, n=92) in length, 4 mm to 38 mm (mean=18.2, sd=3.5, n=215) in width, and 1 mm to 10 mm (mean=4.2, sd=1.6, n=290) in thickness. Material: Rhyolite–257, Porphyritic rhyolite–14, Jasper–11, Vein quartz–8, Chert–4, Crystal quartz–3, Chalcedony–2, Other metavolcanic rock–1, Quartzite–1. Comment: Small triangular projectile points were recovered from most excavated contexts and are associated with both the Dan River and late Saratown occupations.

Randolph Stemmed Projectile Point. Sample Size: 1. Form: This specimen is a small, stemmed projectile point that has been crudely fashioned from a bifacial thinning flake. Material: Rhyolite–1. Comment: This artifact was recovered from the plowzone and probably is associated with the late Saratown occupation.

Unidentified Projectile Points. Sample Size: 27. Form: These specimens are fragments of projectile points that could not be classified by type. Most are fragments of stemmed points. Material: Rhyolite–20, Chert–3, Vein quartz–2, Other metavolcanic rock–1, Crystal quartz–1. Comment: A majority of these artifacts probably date to the Archaic period.

Other Chipped Stone Artifacts

Bifaces. Sample Size: 48. Form: Bifaces are blanks that exhibit flake removal scars on both surfaces. Material: Rhyolite–32, Vein quartz–5, Other metavolcanic rock–4, Chert–3, Quartzite–2, Porphyritic rhyolite–1, Jasper–1. Comment: Forty bifaces were recovered from the plowzone or surface; the remainder came from Features 6, 7, 10, and 54. Although most of these specimens represent early stages of triangular projectile point manufacture, several appear to reflect aborted attempts to manufacture larger (stemmed ?) projectile points, knives, or chipped hoes.

Drills (Figures 11.54*t–u* and 11.55*cc*). Sample Size: 10. Form: Drills are chipped stone tools that possess a long, bifacially-worked, parallel-sided, rod-like projection. Two of these specimens are small triangular projectile points that have been reworked into drills; five are flakes that have been worked into drills; and three are drill bit fragments. Material: Rhyolite–8, Porphyritic rhyolite–1, Chert–1. Comment: Chipped stone drills were recovered from Feature 10 (n=3), Feature 17 (n=1), and the plowzone (n=6). All appear to be associated with either the Dan River or late Saratown occupations. The morphology of these artifacts, interpreted as probable woodworking tools, indicate that most were hafted.

Chipped Disks (Figure 11.56*b–c*). Sample Size: 5. Form: These specimens are tabular pieces of rock, probably derived from the Dan River, that have been

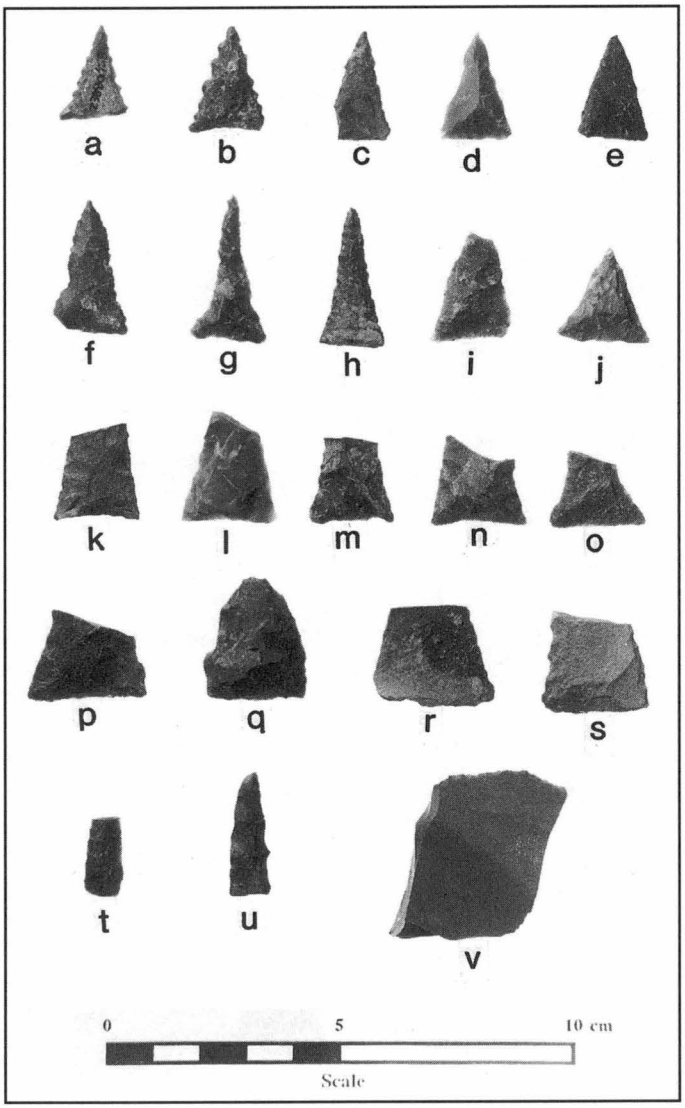

Figure 11.54. Chipped stone projectile points and other stone tools from Dan River phase features at the William Kluttz site.

roughly chipped into a discoidal shape. They vary in size with the smallest one measuring 38 mm in diameter by 13 mm in thickness and the largest one measuring 91 mm in diameter and 15 mm in thickness. Material: Quartzite–4, Other metavolcanic rock–1. Comment: Four chipped disks were recovered from late Saratown contexts (Features 10 and 21); the remaining one came from the plowzone. Their function is unknown.

Chipped Hoe (Figure 11.56*a*). Sample Size: 1. Form: This specimen is a roughly chipped, bifacial, triangular hoe that exhibits battering along the broad distal edge. It measures 110 mm in length, 64 mm in maximum width, and 25 mm in thickness. Material: Other metavolcanic rock–1. Comment: This artifact was recovered from Feature 10 and probably represents an agricultural implement.

End Scrapers. Sample Size: 2. Form: One of these specimens is a small, thick, decortication flake that has been steeply retouched along the lateral and distal edges. The other specimen is a small, heavily patinated biface that has been steeply retouched along the distal edge. Material: Rhyolite–2. Comment: Both artifacts were found in the plowzone and are interpreted as hafted hideworking tools. The patinated specimen probably dates to the Archaic period.

Side Scrapers (Figure 11.54*v*). Sample Size: 2. Form: The rhyolite specimen is a thin, elongate, heavily patinated, thinning flake that has been finely and steeply retouched along both lateral margins. The illustrated jasper specimen is a large, thick, interior flake that exhibits continuous retouch along one lateral edge. Material: Rhyolite–1, Jasper–1. Comment: The jasper scraper was recovered from Feature 55; the other scraper came from the plowzone. Both artifacts probably represent cutting or hideworking tools.

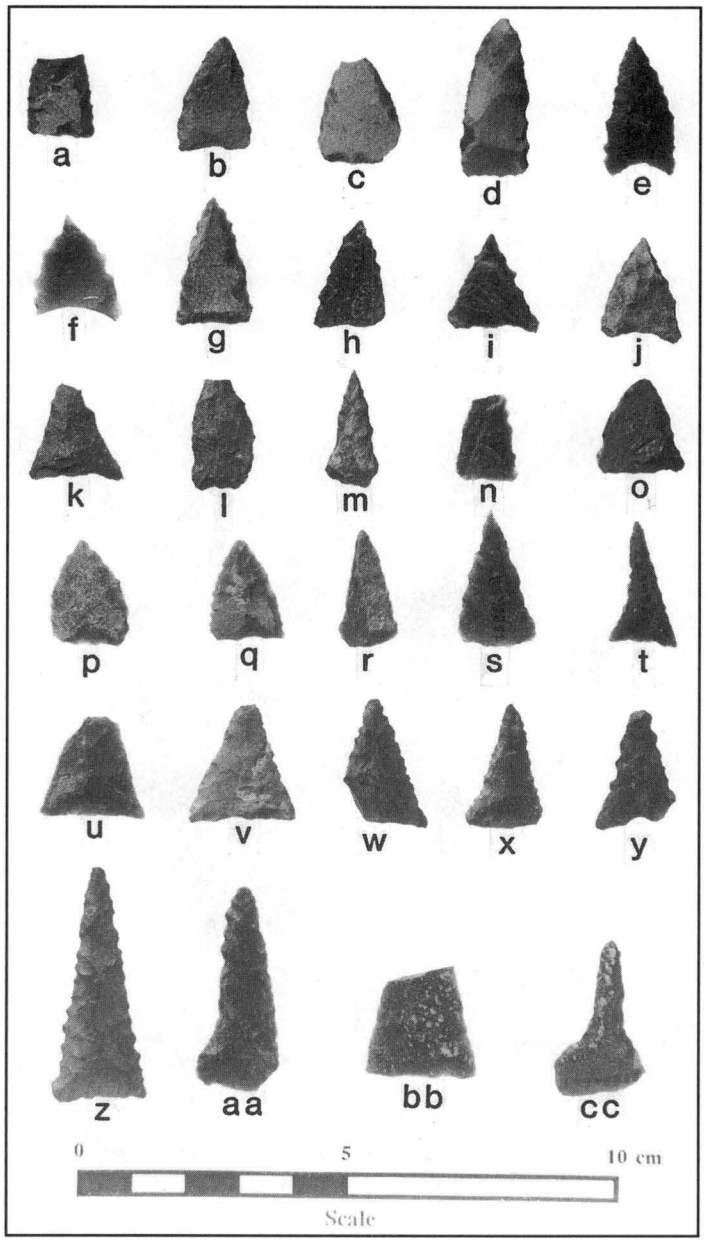

Figure 11.55. Chipped stone projectile points and drill from Feature 10 at the William Kluttz site.

Pièces Esquillées. Sample Size: 4. Form: These artifacts are small flakes that have opposing sharp, straight, crushed working edges, produced by repeated blows using a bipolar percussion technique. Material: Vein quartz–2, Rhyolite–1, Crystal quartz–1. Comment: Pièces esquillées were recovered from the plowzone and Feature 6, and are believed to have been used as wedges or slotting tools for working bone or wood.

Denticulates. Sample Size: 3. Form: This category includes two interior flakes and one decortication flake that have been unifacially retouched to produce a serrated edge. Material: Rhyolite–2, Vein quartz–1. Comment: Denticulates were recovered from Feature 10 (n=2) and the plowzone (n=1), and are thought to represent cutting tools.

Spokeshaves. Sample Size: 15. Form: Six of these specimens are secondary decortication flakes that have a broad, shallow, steeply retouched concavity on one edge. The remaining specimens are thin, interior or bifacial thinning flakes that have been modified in a similar manner. Unlike spokeshaves from the Lower Saratown and Powerplant sites, the concavities on these specimens vary considerably in size. Material: Rhyolite–14, Crystal quartz–1. Comment: Spokeshaves are interpreted as probable woodworking tools and were recovered only from plowzone contexts.

Perforators. Sample Size: 26. Form: Perforators

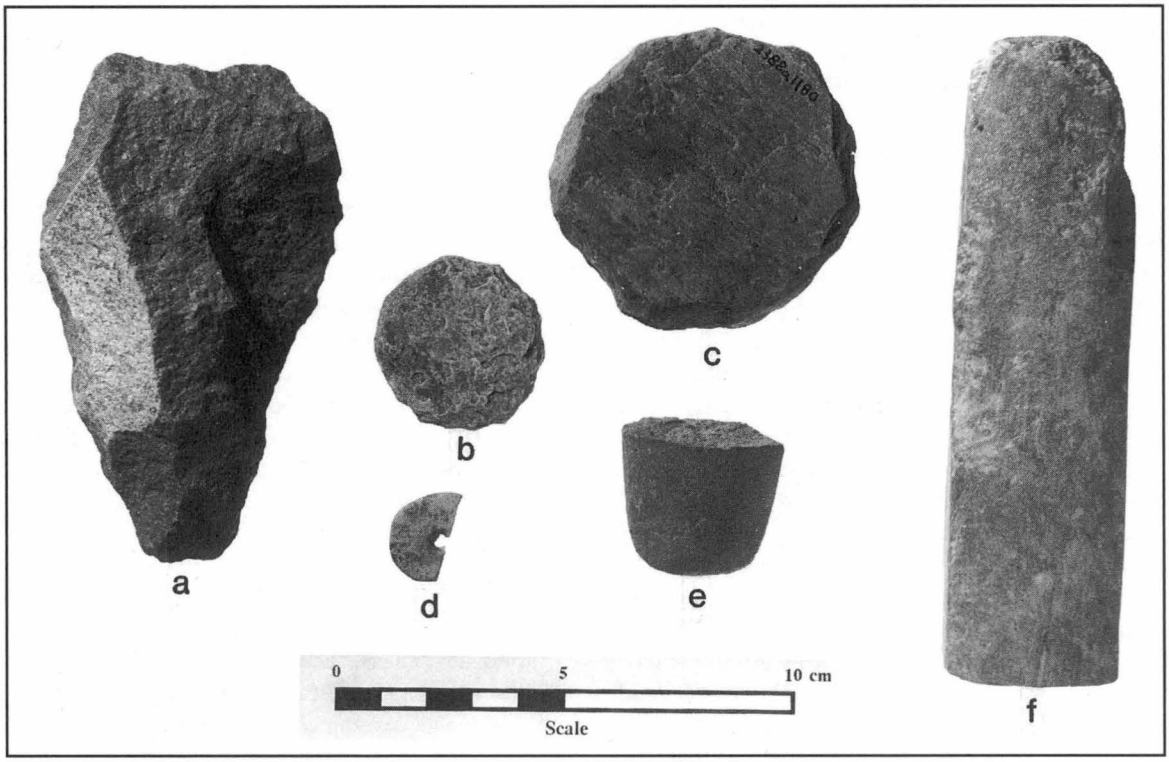

Figure 11.56. Ground stone and large chipped stone artifacts from the William Kluttz site.

are flake or bifacial tools that exhibit a finely retouched projection. Four of the tools in the sample are bifacial perforators; the remainder are irregular flakes, often thick decortication flakes, that have been unifacially retouched to form a pointed projection. Material: Rhyolite–19, Vein quartz–4, Crystal quartz–1, Quartzite–1, Jasper–1. Comment: These artifacts are thought to represent punches used in hideworking.

Gravers. Sample Size: 13. Form: Gravers are flake tools that have been retouched along one edge to produce a small, sharp, triangular projection. Four of these tools were manufactured on decortication flakes; the remainder were made on interior or bifacial thinning flakes. Material: Rhyolite–10, Vein quartz–3. Comment: Gravers probably represent engraving or scoring tools and were recovered from Features 4 and 15, and from the plowzone.

Retouched Flakes. Sample Size: 229. Form: This category includes flakes that have been retouched along one or more edges. Material: Rhyolite–186, Vein quartz–14, Jasper–12, Quartzite–7, Crystal quartz–4, Porphyritic rhyolite–2, Other metavolcanic rock–2, Chert–1, Unidentified rock–1. Comment: These artifacts are interpreted as *ad hoc* cutting tools.

Ground Stone Artifacts

Ground Celt Fragment. Sample Size: 1. Form: This specimen is a spall from the side of a highly polished ground stone celt. Material: Other metavolcanic rock–1. Comment: This stone axe fragment was recovered from Feature 10.

Ground Adze Fragment (Figure 11.56*e*). Sample Size: 1. Form: This specimen is a poll fragment of a ground stone adze that is plano-convex in cross-section. Material: Fine-grained igneous rock–1. Comment: This artifact was recovered from Feature 10 and represents a woodworking tool.

Ground Disks. Sample Size: 2. Form: These specimens are tabular river cobbles that have been roughly ground into a discoidal shape. They are similar to chipped disks observed in the sample and vary in size from 43 mm to 106 mm in diameter and 15 mm to 20 mm in thickness. Material: Quartzite–2. Comment: As with chipped disks, the function of these two artifacts is unknown. Both were recovered from Feature 10.

Stone Bead (Figure 11.56*d*). Sample Size: 1. Form: This specimen is a small, ground, circular disk that has a hole drilled in the center. It measures 18 mm in diameter and 3 mm in thickness; the central perforation is 2.5 mm in diameter. Material: Other metavolcanic rock–1. Comment: This artifact came from Feature 10.

Stone Pipe Fragments. Sample Size: 2. Form: The soapstone artifact is a small fragment from the end of an alate-stemmed pipe. The other specimen is a fragment of a large, highly polished, tubular stone pipe. Material: Soapstone–1, Chlorite schist–1. Comment: The soapstone pipe fragment was recovered from Feature 28 (Burial 11) and the other came from

the plowzone in the cemetery area (Area B).

Ground Stone Fragments. Sample Size: 5. Form: This category includes unidentifiable fragments of ground stone tools or objects. Material: Sandstone–2, Rhyolite–2, Quartzite–1. Comment: None.

Large Cobble Tools

Hammerstones (Figure 11.56*f*). Sample Size: 19. Form: The illustrated specimen is an elongate, rhyolite cobble that displays heavy battering along one edge and on the distal end. The remaining specimens are fist-sized or smaller, spherical cobbles that exhibit extensive battering along the margins. Material: Vein quartz–15, Granite–1, Rhyolite–1, Other metavolcanic rock–1, Quartzite–1. Comment: These artifacts are interpreted as hand-held hammers and probably were used for a variety of tasks, including flintknapping. Fifteen hammerstones were recovered from Feature 10; the rest came from the plowzone.

Milling Stones. Sample Size: 2. Form: Both of these specimens are fragments of large slabs that have been heavily ground on one surface. Material: Sandstone–2. Comment: These artifacts, recovered from Feature 10, probably represent stone surfaces that were used to prepare plant foods.

Abrader. Sample Size: 1. Form: This specimen is a tabular piece of sandstone that exhibits abrasion on one surface. Material: Sandstone–1. Comment: This artifact was recovered from Feature 10.

Summary

The William Kluttz site yielded the largest sample of lithic artifacts within the Dan River drainage. With few exceptions, these artifacts are associated with the Dan River phase and late Saratown phase occupations of the site. Projectile points that date from the Middle Archaic to the Middle Woodland periods occurred in small numbers and indicate only minor use of the site by earlier peoples.

As stated earlier, over 1,000 lithic artifacts were recovered from Dan River features. Most of these came from Features 4, 6, 7, 8, 15, and 17, and were either decortication, interior, or bifacial thinning flakes. Although 32 small triangular projectile points were found, only 12 other stone tools were found that can be attributed to the Dan River phase (Figure 11.54). These include two bifaces, one drill, one side scraper, one pièce esquillée, three gravers, and four retouched flakes. No ground stone artifacts or large cobble tools were found. Although many of the lithic artifacts recovered from plowzone and midden excavations probably are also a product of the Dan River occupation, they cannot be distinguished from later Saratown phase artifacts based solely on stylistic attributes.

Several features and burials were excavated that date to the late Saratown phase; however, only Features 10 and 21 are considered to be reliable contexts for interpreting the historic lithic assemblage. Both of these features were located in Area C, well away from the other excavations that contained evidence of the Dan River occupation. Furthermore, most of the potsherds found in these features and the overlying plowzone can be confidently attributed to the late Saratown phase. These two features, and Feature 10 in particular, contained a large amount of debitage as well as numerous chipped and ground stone tools. One hundred and two small triangular projectile points, many of which were little more than flakes that had been marginally retouched, were found (Figure 11.55). Other chipped stone tools and tool fragments included five bifaces, three drills, four chipped disks, two denticulates, five perforators, and 28 utilized and retouched flakes. Ground stone tools included a celt fragment, two ground disks, a stone bead, and four unidentified ground stone fragments. Numerous large cobble tools, including 15 hammerstones, two milling stones, and an abrader, also were recovered. Although the late Saratown community at the William Kluttz site appears to represent the terminal aboriginal occupation of the upper Dan River drainage, stone implements clearly were still relied upon for a variety of tasks. The stone tool technology apparently had not been greatly affected by European-introduced metal tools.

Clay Artifacts

Most (n=64) of the clay artifacts from the William Kluttz site are fragments of smoking pipes and were divided into three general categories—traditional, terra-cotta, and kaolin—based on the kinds of clays used in their manufacture (Figure 11.57). Traditional pipes were made from clay resembling that used in the manufacture of native pottery and appeared to have been fired under similar conditions. In many instances, temper was added to this clay to produce a sandy or gritty paste. In contrast, terra-cotta pipes were made from a very fine, non-tempered clay that typically oxidized to a reddish-orange, brown, or "terra-cotta" color upon firing. Usually these pipes display a very smooth or burnished surface. Kaolin pipes are typically white in color, and their stems, bores, and bowl walls are thinner than native specimens. In cross section, the kaolin pipe stems present a uniform white color, indicating tightly controlled firing temperatures. The presence of heels and mold seams indicate a European origin.

Within these general categories, the pipe fragments were subdivided further according to the segment or component of the complete specimen they represented (Table 11.5). Stems, bowls, heels, and combinations

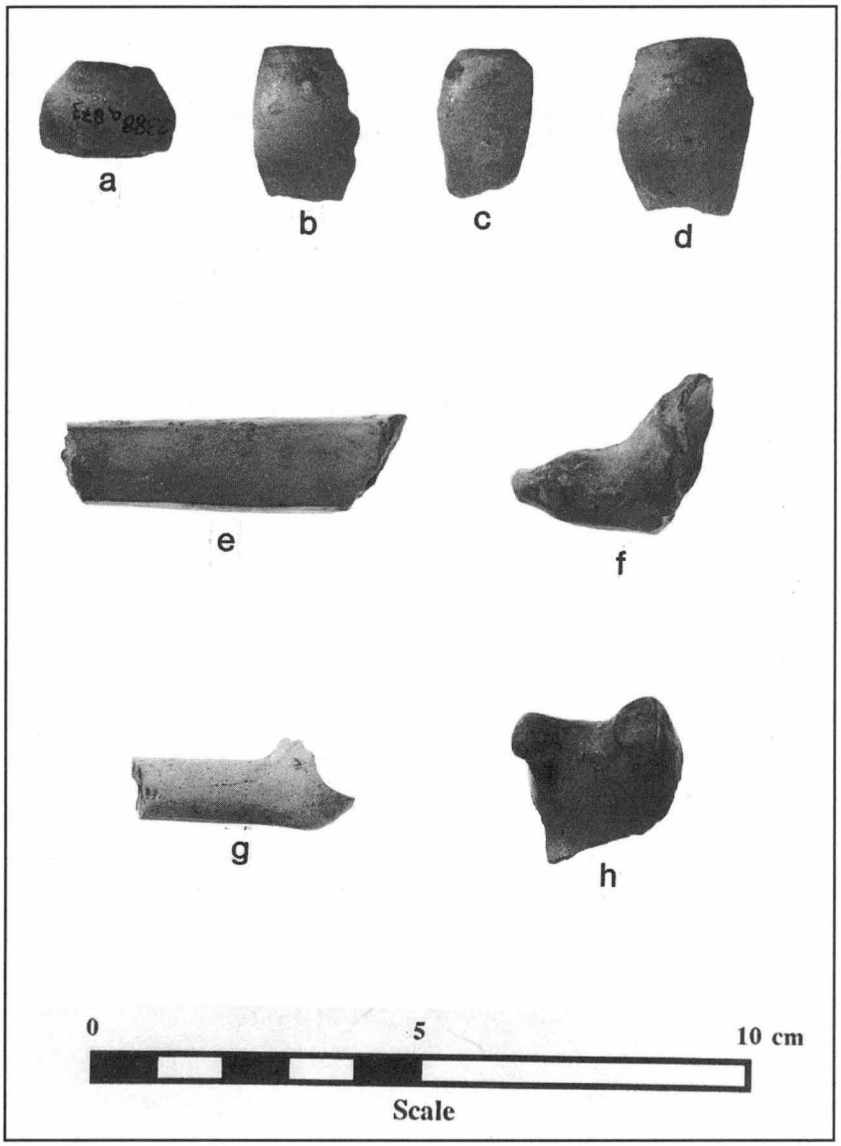

Figure 11.57. Clay pipe fragments from the William Kluttz site.

of these elements were recorded. A few broken pieces were obviously pipe fragments but were too small to identify what element they represented. No complete pipes were found and only a few fragments were large enough to gain some insight into bowl and stem forms.

Traditional specimens, representing over 90 percent of the total sample, were the most popular. Most of these consist of bowl fragments and are not large enough to inform on overall bowl configurations (Table 11.5). One fragment represents a simple, tulip-shaped bowl that connected to the stem at a slightly obtuse angle. Four fragments are from bowls with incurvate rims and two have carinated shoulders. Similar specimens have been found throughout the Siouan area and are typical of pipes used during the latter half of the seventeenth century (Figure 11.57*a–d*). One bowl fragment was from an unidentifiable effigy form (Figure 11.57*h*).

Most of the traditional stem fragments are small and represent round stems that show no evidence of tapering. The stems that can be measured are large, averaging 17 mm in outside diameter, and have bores that average 7 mm in diameter. One large, square stem piece was also recovered. It tapers slightly and measures 12 mm on a side. The bore is 5 mm in diameter. This represents the only square stem that was found during the course of the Siouan project excavations (Figure 11.57*e*).

One terra-cotta stem fragment was found in the plowzone, and all but one of the kaolin pieces came from the plowzone (Table 11.6; Figure 11.57*e–g*). One kaolin specimen consisted of a broken-stemmed pipe that had been whittled to a point at the stem break in order to attach it to a hollow reed stem (Figure 11.57*f*). One kaolin stem fragment was recovered from Feature 10. The near absence of kaolin and

Table 11.5. Summary of clay pipes from the William Kluttz site.

Type	Stem Fragments	Bowl Fragments	Bowl/Heel Fragments	Indeterminate Fragments	Total	Percent
Traditional	17	29	-	12	58	90.6
Terra-cotta	1	-	-	-	1	1.6
Kaolin	2	1	2	-	5	7.8
Total	20	30	2	12	64	100.0

Table 11.6. Distribution of clay pipes from the William Kluttz site.

	Plowzone		Late Saratown Phase Features	
Type	n	%	n	%
Traditional	15	25.9	43	74.1
Terra-cotta	1	100.0	0	0.0
Kaolin	4	80.0	1	20.0
Total	20		44	

terra-cotta pipes is surprising given their frequent occurrence at the Fredricks site which is considered contemporary.

Of the remaining 46 clay artifacts found at the William Kluttz site, 22 were edge-ground pottery disks (Figure 11.58). Thirteen of these came from Feature 10 while five more were recovered from plowed soil overlying this feature. Other clay artifacts include nine ceramic handle fragments, 13 fragments of unidentifiable fired clay objects, and two fired clay ball fragments. With the exception of the clay ball fragments which came from Feature 15, most of these specimens came from either Feature 10 or the plowzone.

Bone and Shell Artifacts

Only three pieces of worked bone were recovered. All of these came from late Saratown phase features and include a beamer fragment found while cleaning around Burial 9, an antler billet from Feature 10, and a bone disk bead recovered from Feature 54. The lack of worked bone tools also has been observed at other late-seventeenth-century and early-eighteenth-century sites such as Upper Saratown and the Fredricks site.

The only shell artifacts from the William Kluttz site were 32 large columella beads and several purple wampum beads associated with Burial 12. These are discussed below with the Burial 12 trade artifacts.

Historic Artifacts

Glass Beads

Most of the 1,454 trade beads found at the William Kluttz site fall into the general category of "seed" beads, and most were recovered from the fill around Burials 11 and 12 and from Feature 10 (see Table 11.7). (The *in situ* beads that were associated with Burial 12 [Feature 30] are discussed below with the other trade artifacts from that burial.) These seed beads are small (2–4 mm in diameter), donut-shaped, tube beads that were mass-produced from the middle of the seventeenth century into the eighteenth century. Although most were white, blue and black varieties also were present. These correspond to Kidd and Kidd's (1970) types IIa11, IIa48, and IIa6, respectively. The next most frequent type was a compound tube bead with a rosewood exterior and a dark green or black interior. These correspond to Kidd and Kidd's type IVa1 and are also known as *Cornaline de Allepo* beads. Although most of these were around 4 mm in diameter, some were as small as 2 mm. Another compound variety found was characterized by a white exterior and a dark blue interior. The size range of this compound bead type was similar to that of the *Cornaline de Allepo* beads. A single large (7 mm by 9 mm), off-white specimen was recovered from the old humus zone and may represent a rosary bead. A single large (8 mm in diameter) dark blue specimen was recovered from Feature 54.

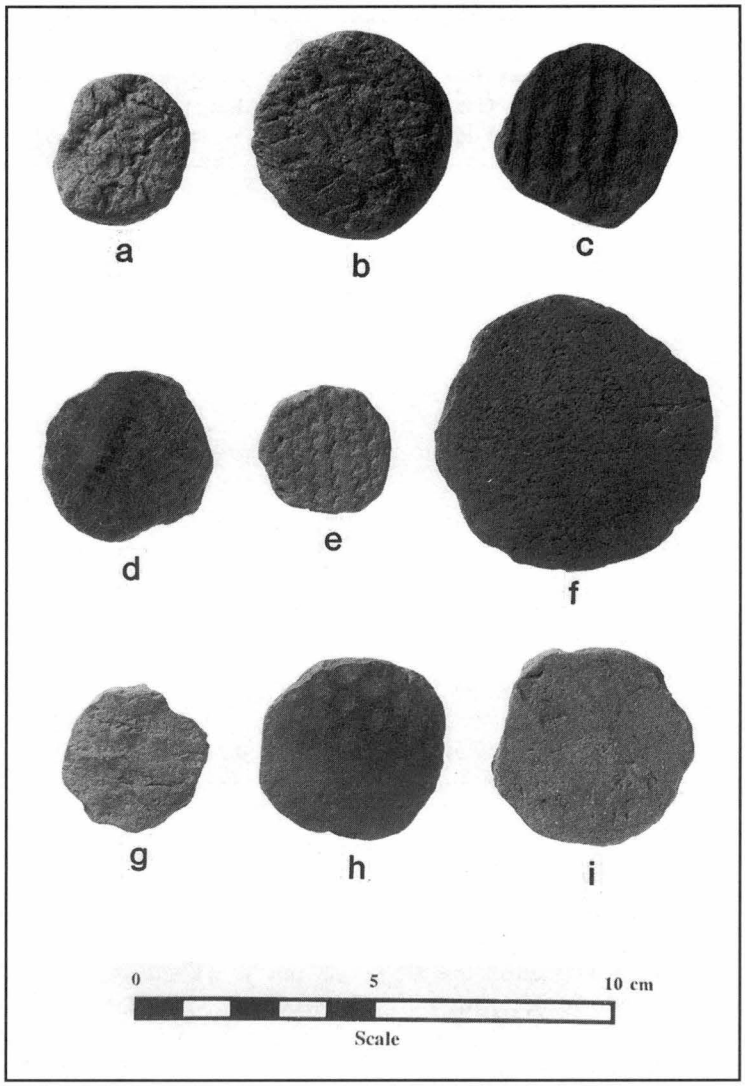

Figure 11.58. Pottery disks from the William Kluttz site.

Seed beads have been found on historic Siouan sites dating from the early seventeenth century into the early eighteenth century. The only type recovered from the William Kluttz site that appears to be temporally sensitive is the *Cornaline de Allepo* bead. Beads of this kind were recovered with great frequency at the Fredricks site which dates to the turn of the eighteenth century but were noticeably absent from earlier sites such as Upper Saratown and Jenrette that date from the mid-to-late seventeenth century.

Bottle Glass

Glass was rare at the William Kluttz site; only six fragments were recovered from all contexts. The plowzone and old humus produced four small fragments of thin (2 mm), pale green bottle glass with pitted or eroded surfaces. A similar fragment was recovered from Feature 10. In addition, a thick (8 mm) fragment of dark green bottle glass also was retrieved from the plowzone. This specimen was heavily patinated and resembled the glass in the wine bottles found with two Fredricks site burials (Carnes 1987:148).

Mirror Glass

A total of five small, thin (1 mm) fragments that have been tentatively identified as mirror glass were associated with Burial 1. All appeared to be backed, and the largest fragment measured only 10 mm in diameter.

Metal Artifacts

Iron nails, or iron "blobs" that probably represent nails, comprise the largest category of metal artifacts from the William Kluttz site. The plowzone produced 18 amorphous specimens which, because of their size, are probably the remains of badly eroded nails. Another "blob" was recovered from the upper fill of Burial 11. Three rose-head, spatula-tipped nails were found in old humus and plowzone contexts. These

Table 11.7. Summary of glass beads from the William Kluttz site.

Context	Small White	Small Blue	Small Black	Compound Rosewood	Compound White/Blue	Striped White/Red	Large White	Large Blue	Blue Tube	White Tube	Black Tube	Total
Fea. 10	140	21	13	9	8	1	2	1	-	-	-	195
Fea. 54	45	-	-	1	-	-	-	-	1	-	-	47
Bu. 1	6	-	-	-	-	-	-	-	-	-	-	6
Bu. 1 & 2	2	-	-	-	-	-	-	-	-	-	-	2
Bu. 2	2	-	2	-	-	-	-	-	-	-	-	4
Bu. 4	1	-	-	-	-	-	-	-	-	-	-	1
Bu. 5	2	-	-	-	-	-	-	-	-	-	-	2
Bu. 6	1	-	-	-	-	-	-	-	-	-	-	1
Bu. 7	1	-	-	-	-	-	-	-	-	-	-	1
Bu. 8	1	-	-	-	-	-	-	-	-	-	-	1
Bu. 9	2	-	-	-	-	-	-	-	-	-	-	2
Bu. 10	1	-	-	-	-	-	-	-	-	-	-	1
Bu. 11	930	48	44	3	-	-	-	-	-	1	1	1027
Bu. 12	68	57	33	-	-	-	-	-	-	-	-	158
Old Humus	4	-	-	-	-	-	-	-	-	-	-	4
Plowzone	-	-	-	-	-	-	1	-	-	-	-	1
Surface	-	-	-	1	-	-	-	-	-	-	-	1
Total	1206	126	92	14	8	1	3	1	1	1	1	1454
Percent	82.94	8.67	6.33	0.96	0.55	0.07	0.21	0.07	0.07	0.07	0.07	100.00

averaged 65 mm in length. Two small (31 mm) "horseshoe" nails were also recovered from the plowzone. Because similar specimens were found *in situ* with Burial 12 (discussed below), it is possible that all were associated with the late Saratown occupation at the William Kluttz site.

Other metal artifacts include: an iron knife blade fragment; half of a worn-out horseshoe; a trigger guard fragment; a small rectangular brass pendant with a hole in one corner; an irregularly shaped, perforated, ovoid lead pendant; and a V-shaped, brass, butterfly gun sight. Except for the gun sight which was found in the old humus layer, all were retrieved from the plowzone. While it is possible that all these specimens were associated with the late Saratown occupation, horseshoes have not been found in an undisturbed context at any other Siouan site.

Metal artifacts associated with Burial 12 (Feature 30) are discussed below.

Kaolin Pipe Fragments

Kaolin pipes are discussed above with clay artifacts.

Gunflints

Six gunflints were recovered from the plowzone and old humus. All of the specimens are rectangular in form and have been bifacially chipped. Two were made of European, honey-colored flint and measure 13 mm to 17 mm in width, 18 mm to 20 mm in length, and 6 mm to 9 mm in thickness. The other four were aboriginally made and include: two of non-local chert or chalcedony that are 14 mm to 18 mm wide, 16 mm to 20 mm long, and 6 mm to 8 mm thick; and two of local rhyolite that measure 22 mm to 24 mm in width, 23 mm to 31 mm in length, and 9 mm to 10 mm in thickness. All of these gunflints are attributed to the late Saratown occupation of the site.

Burial 12 Trade Artifacts

Because most of the trade artifacts, other than glass beads, were found with a single burial (Burial 12), they will be described together, along with their positions in the grave (Figure 11.59). A more general summary of these burial associations was provided earlier with the discussion of Burial 12.

Four iron nails were recovered from Burial 12, and three were identifiable. A badly eroded specimen with a fragment of leather attached was located on the pit bottom in the northwest corner. A rose-headed, spatula-tipped nail 44 mm in length lay adjacent to a pistol barrel along the right torso area. Two identical specimens, rusted together, were recovered from the left arm area. It is believed that the nails represent intentional grave furnishings rather than fasteners (i.e., "coffin nails").

A total of 13 small brass buttons were found. Ten of these were found in the right and left knee areas. Three other identical specimens were uncovered in the lower right arm area. The two-piece buttons are small (12 mm in diameter), circular, and bi-convex in cross-section. The molded top portion has a slightly raised rim, creating concentric outer and inner circles in plan

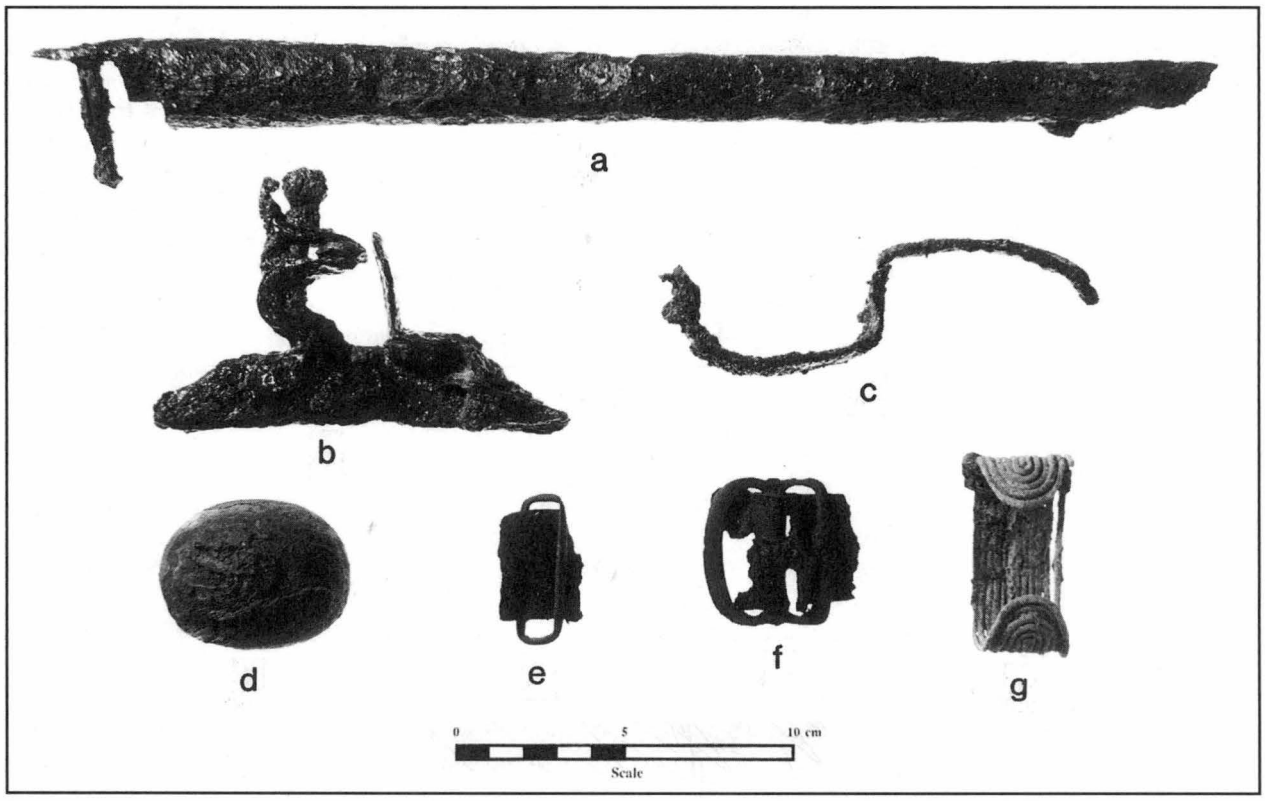

Figure 11.59. European trade artifacts associated with Burial 12 at the William Kluttz site.

view. In profile, the rim creates a carinated shoulder. The bottom halves are bowl-shaped and contain an iron eye. Though not identical, they are similar to South's (1964:115) Type 2 buttons which were worn by British and French soldiers prior to 1768. Although buttons are notoriously hard to date (see Noël-Hume 1982:88), we know based on the pistol found in Burial 12 that these date to the latter part of the seventeenth century, after 1690. A leather-like material was preserved on some of the specimens from the knee area. The suggestion is that the individual was wearing leather knickers, or the buttons may simply have been sown on the knees of the trousers for decoration. What is unmistakable, however, is the fact that the preserved fabric was leather, not cloth.

A large (43 mm by 40 mm), brass, D-shaped belt buckle with a double frame also was found in Burial 12 (Figure 11.59*f*). The frame is indented on both sides at the point where the central bar is attached. This bar holds an iron tang, and a large portion of the belt itself, attached to the central bar by two brass rivets, is preserved. A patch of deerskin was also preserved on the back of the buckle. This buckle is almost twice as large as similar specimens associated with Burials 3 and 8 at the Fredricks site (Carnes 1987:147). Buckles of this type were usually military issue and often are indistinguishable from harness buckles (Noël-Hume 1982:86). Given the fact that it was located in the central abdominal area, there can be little doubt that this buckle was part of a belt that was worn around the waist of the individual. A large (44 mm by 14 mm), rectangular brass loop was threaded through the belt and may have been used as an attachment for the pistol (Figure 11.59*e*). Fragments of deerskin also were preserved on the back of the loop.

A badly decayed, bone-handled iron knife was positioned in the belt adjacent to the buckle. Two pieces of lead shot, 12 mm in diameter, were found in the area of the left arm next to the two iron nails previously described. Also in the left arm area was a C-shaped, compound copper (?) wire bracelet (Figure 11.59*g*). The inside diameter of the bracelet measures 40 mm by 50 mm, suggesting an individual with a very small wrist. Twelve coils of ca. 14-gauge wire were used in its construction and held together by two small iron bands. Similar bracelets have been recovered from burials at Upper Saratown (31Sk1a), Madison Cemetery (31Rk6), and the Fredricks site (31Or231). All three of these sites date to the latter half of the seventeenth century (Carnes 1987:153).

Perhaps the most striking artifact associated with Burial 12 was a flintlock pistol that probably was attached to the belt (Figure 11.59*a–d*). The barrel measured 31 cm from the breech to the tip and, at the breech end, appeared to be octagonal. The ball-shaped brass butt cap was plain, lacked spurs, and was attached to the butt by a basal pin or nail (Figure 11.59*d*). Although plain butt caps were replaced by

more elaborate forms with spurs extending up the entire length of each side of the butt by the mid-1660s, plain forms continued to be used on military pistols until the nineteenth century (Blair 1983:102). In fact, the specimen accompanying Burial 12 is identical to an English military flintlock, illustrated in Wilkinson's (1977:Figure 43) *Antique Firearms*, that dates to 1680. This specimen is 47 cm long and has a barrel length of 29 cm. The inside bore diameter of the Burial 12 pistol is 12 mm or 0.47 inches at the distal end. The two lead shot, being of the same calibre, probably represent ammunition for the pistol. A large patch of deerskin with hair was preserved by the butt plate, indicating that the individual was wrapped in a deerskin blanket or robe prior to interment.

Another prominent feature of Burial 12 was a necklace of 32 large, disc-shaped, columella shell beads. These range in size from 20 mm to 8 mm in diameter, and most are around 8 mm in thickness. The strand ran around the neck and under the chin. Two clusters of smaller, linear columella beads interspersed with purple wampum beads were located in the ear areas. In addition, black and blue glass seed beads were scattered around the cranium and appear to have been strung in a separate necklace, a little longer than the columella necklace. A single black tube or "cane" bead was situated above the neck and may have formed the center of the glass bead necklace.

Faunal Remains

by

Mary Ann Holm

A total of 5,462 fragments of animal bone was recovered from the William Kluttz site (Table 11.8). As bone preservation was generally poor at this site, only 8% of these fragments were identifiable beyond the level of class.

Analysis was limited to bone recovered from undisturbed feature (n=20) contexts. The fill from each feature was washed through a series of 1/2-inch, 1/4-inch, and 1/16-inch screens. All of the bones from the 1/2-inch screen were analyzed. Bones identifiable beyond the level of class were pulled from the 1/4-inch sample and analyzed. The remaining bones recovered in the 1/4-inch screen were simply counted and weighed. No attempt was made to record how many unidentifiable fragments from the 1/4-inch screen were modified (for example, burned or gnawed). Only those bones and bone fragments which appeared to be identifiable beyond the level of class were pulled from the 1/16-inch washings for analysis. The remaining bone fragments recovered in the 1/16-inch screen were neither sorted, counted, nor weighed.

Dan River Phase

Only 339 bone fragments were recovered from Dan River phase features at the William Kluttz site. A minimum of one deer, one unidentifiable species of turtle, and one nonpoisonous snake were represented in this assemblage. Approximately 79% of these bone fragments were recovered from 1/4-inch waterscreen samples and were not identifiable. However, it was noted that the majority of these fragments were burned. Of the remaining 71 bone fragments, 13 were burned but none of the others displayed any other form of modification.

Late Saratown Phase

The majority of bone fragments recovered from the William Kluttz site came from features that date to the late Saratown phase. A minimum of 22 individuals representing 14 species was identified. Approximately 27% of the individuals were mammals, 18% were birds, 36% were reptiles, and 18% were fish. Nearly 83% of the bone fragments from late Saratown features were unidentifiable fragments recovered in the 1/4-inch screen. Of the remaining 883 fragments, 687 were burned and two exhibited rodent gnawing marks.

Shell

Eighteen freshwater mussel shell fragments and two gastropod shells were recovered from the William Kluttz site. Two of the mussel shells were found while cleaning around Burials 5 and 8; the remainder were recovered during excavation of the plowzone and old humus. These mollusks probably were taken from the Dan River and represent food remains. The low frequency of shell remains, while contrasting sharply with Lower Saratown and the Jenrette site, is similar to that seen at the Fredricks site and may indicate a de-emphasis of shellfish utilization among piedmont Siouans by the turn of the eighteenth century.

Conclusions

With the exception of the assemblage from the middle Saratown phase of the Lower Saratown site, none of the faunal remains from the three Dan River sites was large enough to provide more than a very general indication of the ways in which faunal resources were utilized by the inhabitants of these sites. In keeping with the findings at other aboriginal piedmont sites (Holm 1987, 1988), deer was the most frequently utilized mammal and turkey the most frequently used bird. Box turtle also appears to have been a very important resource during the middle Saratown phase at the Lower Saratown site, although it seems to have been less important during the Dan River phase at the same site. The fact that no remains of box turtle were

Table 11.8. Faunal remains from the William Kluttz site.

Species	Dan River Phase						Late Saratown Phase						Total			
	Freq.		Weight		MNI		Freq.		Weight		MNI		Freq.		Weight	
	n	%	g	%	n	%	n	%	g	%	n	%	n	%	g	%
Mammals																
Sciurus niger, Fox Squirrel	-	-	-	-	-	-	1	0.02	0.20	0.01	1	5.56	1	0.02	0.20	0.01
Sciurus sp., Squirrel	-	-	-	-	-	-	12	0.23	1.03	0.05	-	-	12	0.22	1.03	0.05
Cricetidae, Mice, Voles	-	-	-	-	-	-	2	0.04	0.06	0.00	1	5.56	2	0.04	0.06	0.00
Ursus americanus, Black Bear	-	-	-	-	-	-	2	0.04	2.50	0.13	1	5.56	2	0.04	2.50	0.12
Odocoileus virginianus, White-tailed Deer	34	10.03	9.60	9.14	1	33.33	178	3.48	481.40	25.20	3	16.67	212	3.88	491.00	24.36
Unidentified Mammals	34	10.03	28.20	26.86	-	-	317	6.19	319.00	16.70	-	-	351	6.43	347.20	17.23
Total Mammals	68	20.06	37.80	36.00	1	33.33	512	10.00	804.19	42.09	6	33.33	580	10.62	841.99	41.78
Birds																
Meleagris gallapavo, Wild Turkey	-	-	-	-	-	-	4	0.08	12.30	0.64	1	5.56	4	0.07	12.30	0.61
Ectopistes migratorius, Passenger Pigeon	-	-	-	-	-	-	10	0.20	1.00	0.05	3	16.67	10	0.18	1.00	0.05
Unidentified Birds	-	-	-	-	-	-	14	0.27	7.00	0.37	-	-	14	0.26	7.00	0.35
Total Birds	-	-	-	-	-	-	28	0.55	20.30	1.06	4	22.22	28	0.51	20.30	1.01
Reptiles																
Kinosternon subrubrum, Mud Turtle	-	-	-	-	-	-	28	0.55	13.50	0.71	1	5.56	28	0.51	13.50	0.67
Sternotherus oderatus, Musk Turtle	-	-	-	-	-	-	3	0.06	0.50	0.03	1	5.56	3	0.05	0.50	0.02
Unidentified Turtle	2	0.59	1.50	1.43	1	33.33	3	0.06	3.80	0.20	-	-	5	0.09	5.30	0.26
Colubridae, Non-poisonous Snakes	1	0.29	0.10	1.00	1	33.33	73	1.43	6.50	0.34	1	5.56	74	1.36	6.60	0.33
Crotalidae, Poisonous Snakes	-	-	-	-	-	-	43	0.84	3.11	0.16	1	5.56	43	0.79	3.11	0.15
Unidentified Snake	-	-	-	-	-	-	30	0.59	1.20	0.06	-	-	30	0.55	1.20	0.06
Total Reptiles	3	0.88	1.60	1.52	2	66.67	180	3.51	28.61	1.50	4	22.22	183	3.35	30.21	1.50
Fish																
Alosa sapidissima, White Shad	-	-	-	-	-	-	5	0.10	0.40	0.02	1	5.56	5	0.09	0.40	0.02
Catastomidae, Suckers	-	-	-	-	-	-	18	0.35	1.57	0.08	1	5.56	18	0.33	1.57	0.08
Ictalurus sp., Catfish	-	-	-	-	-	-	3	0.06	0.20	0.01	1	5.56	3	0.05	0.20	0.01
Anguilla rostrata, American Eel	-	-	-	-	-	-	1	0.02	0.03	0.00	1	5.56	1	0.02	0.03	0.00
Total Fish	-	-	-	-	-	-	27	0.53	2.20	0.12	4	22.22	27	0.49	2.20	0.11
Unidentified	268	79.06	65.60	62.48	-	-	4375	85.42	1055.20	55.23	-	-	4643	85.02	1120.80	55.61
Total	339	100.00	105.00	100.00	3	99.99	5122	100.00	1910.50	100.00	18	100.00	5461	100.00	2015.50	99.99

recovered from the William Kluttz site sets this site apart from other northern piedmont North Carolina sites. At all of these sites, the heavy reliance upon deer and turkey was supplemented by a variety of smaller mammals (of which squirrel was the most frequently utilized), turtles, and freshwater fish. Despite the fact that all three of these sites contained Contact period components, no remains of domesticated animals were found. This, too, is consistent with the findings at other historic aboriginal sites in the Piedmont (Holm 1987, 1988). Although the Indians at these sites were clearly trading with the Europeans (as evidenced by the presence of historic trade goods), it is not readily apparent that their use of faunal resources was being significantly altered by their participation in this trade.

Botanical Remains

by

Kristen J. Gremillion

Carbonized plant remains from 29 10-liter flotation samples recovered during the 1988 William Kluttz site excavations were analyzed (Tables 11.9 to 11.12). These samples produced 200.41 grams of plant remains, and were taken from Features 4, 5, 6, 7, 8, 10, 15, 17, 21, 28, 30, and 55, and Burial 6. Numerous samples were collected from Feature 10. Other botanical samples also were collected by water-screening feature fill but were not analyzed. Methods used to analyze the ethnobotanical remains from the William Kluttz site are the same as those described in Gremillion (1987). Botanical remains are discussed below by cultural component.

Dan River Phase

Eight Dan River features at the William Kluttz site produced flotation samples representing 100 liters of fill. These samples contained a total of 50.15 grams of plant remains (0.50 grams/liter) and 2.84 grams of plant food remains (0.03 grams/liter). The seed-to-nutshell ratio was 6.70. This component produced a relatively small sample of carbonized plant remains.

Maize (*Zea mays* L.) was relatively abundant in the sample. Maize remains occurred in all flotation samples and maize kernels comprised 51.4% of all identified seeds. Common bean (*Phaseolus vulgaris* L.) made up 16.2% of identified seeds and occurred in 10.0% of the samples examined. In addition, five seeds or achenes of sumpweed (*Iva annua* L.), of cultigen size, were found in one feature. Apparently this species, which was domesticated in eastern North America prior to the introduction of maize, was still a part of a gardening complex in which maize played an increasingly important role.

Hickory (*Carya* sp.) nut fragments also were quite abundant within Dan River phase samples at the William Kluttz site, as were walnut (*Juglans nigra* L.) remains. Although acorn (*Quercus* sp.) shell made up only 3.4% of nutshell by weight, the acorn-to-hickory ratio was 2.33, indicating that acorn actually represented more food than the hickory shell in this assemblage. This contrasts with the Saratown phase components at the William Kluttz site and Lower Saratown, where the acorn-to-hickory ratio was less than 1.0. A small quantity of chestnut (*Castanea dentata* [Marshall] Borkh.) also was recovered.

Late Saratown Phase

The late Saratown component produced flotation samples representing 190 liters of fill from two pit features and three burial pits. These samples contained 150.26 grams of plant remains (0.79 grams/liter) and 15.51 grams of plant food remains (0.08 grams/liter). Pit features had a higher density of plant food remains than the burials (about 0.12 grams/liter and 0.01 grams/liter, respectively). Feature 10 produced most of the flotation samples from the site (12 10-liter samples). The seed-to-nutshell ratio was 3.47.

Maize and common bean were both well-represented. Maize kernels made up 43.7% of identified seeds and maize remains were found in 77.8% of samples analyzed. Common bean comprised 5.7% of identified seeds and was found in 22.2% of samples. Values for these two taxa are quite similar to those produced by the Saratown phase assemblage at Lower Saratown. No other cultigens were noted, although sumpweed was recovered from a Dan River feature at the site. While knotweed (*Polygonum* sp.) was rather abundant in Feature 10, it is assumed to have been a weed.

Hickory was the most abundant nutshell type, making up 95.6% of nutshell. Only acorn, hickory, and walnut occurred, and only hickory was found in considerable quantity. The acorn-to-hickory ratio was only 0.62, similar to that observed for the middle Saratown phase sample at Lower Saratown. This apparent focus on hickory based on weights is borne out by the high ubiquity of hickory (94.4% of samples, the highest of plant food remains) compared to acorn (22.2%) and walnut (38.9%). However, the four contexts that provided plant food remains for these calculations may not be representative of the occupation as a whole.

Fleshy fruits, which comprise 18.4% of identified seeds, were represented by maypops (*Passiflora incarnata* L.), persimmon (*Diospyros virginiana* L.), grape (*Vitis* sp.), bramble (*Rubus* sp.), and plum (*Prunus* sp.).

Table 11.9. Summary of plant remains from the William Kluttz site (weights in grams).

Sample	Soil Volume (liters)	Wood/Stem Charcoal	Cane	Unknown Plants	Root or Tuber	Plant Food Remains	Total
Dan River Phase							
Feature 4							
Zone 1	10	4.22	-	0.09	-	0.26	4.57
Feature 5							
Zone 1	10	1.82	-	0.01	-	0.46	2.29
Feature 6							
Zone 1	10	9.49	-	0.23	-	0.32	10.04
Feature 7							
Zone 1	10	2.88	-	0.72	-	0.34	3.94
Feature 8							
Zone 1	10	0.11	-	-	-	0.03	0.14
Feature 15							
Zone 1	10	2.78	-	0.05	-	0.20	3.03
Zone 2	10	5.15	0.14	0.62	-	0.55	6.46
Zone 3	10	0.71	-	0.23	-	0.36	1.30
Sub-total	30	8.64	0.14	0.90	-	1.11	10.79
Feature 17							
Zone 1	10	6.16	-	0.13	-	0.20	6.49
Feature 55							
Zone 1	10	11.58	-	0.12	0.07	0.12	11.89
Sub-total	100	44.90	0.14	2.20	0.07	2.84	50.15
Late Saratown Phase							
Feature 10							
Zone 1	60	18.55	-	0.65	-	2.68	21.88
Zone 2	40	107.56	0.04	1.40	-	12.27	121.27
Zone 3	20	1.45	-	-	-	0.23	1.68
Sub-total	120	127.56	0.04	2.05	-	15.18	144.83
Feature 21							
Zone 2	10	0.19	0.02	<0.005	-	0.02	0.23
Feature 28 (Burial 11)							
Zone 1	10	0.09	-	-	-	0.08	0.57
Zone 2	10	0.09	-	-	0.02	0.02	0.33
Zone 3	10	0.51	-	<0.005	-	0.03	0.54
Sub-total	30	1.29	-	<0.005	0.02	0.13	1.44
Feature 30 (Burial 12)							
Zone 1	10	3.18	-	0.01	-	0.15	3.34
Zone 2	10	0.35	-	-	-	0.03	0.38
Sub-total	20	3.53	-	0.01	-	0.18	3.72
Burial 6	10	0.04	-	-	-	-	0.04
Sub-total	190	132.61	0.06	4.12	0.02	15.51	150.26
Total	290	176.51	0.20	6.30	0.09	18.35	200.41

Summary

Although several pre-Late Prehistoric site occupations can be documented at the William Kluttz site, intensive use of the site did not occur until the thirteenth century when Dan River phase peoples established a village there. Only a few features associated with this village were excavated, and no structures were identified; however, the large amounts of Dan River pottery that have been surface-collected from the site, and their spatial distribution, suggest that this village was substantial and may have been palisaded. Survey data from the region indicate that this was just one of several agricultural villages that dotted the bottomlands along the Dan River and its tributaries. The radiocarbon evidence suggests further that the Dan River phase component at Lower Saratown may be a contemporary settlement.

Table 11.10. Carbonized plant food remains from the William Kluttz site (weights in grams).

Sample	Hickory Shell	Acorn Shell	Walnut Shell	Chestnut Shell	Maize Kernels	Maize Cupules	Common Bean	Seeds	Total
Dan River Phase									
Feature 4									
Zone 1	0.13	-	0.08	-	0.03	0.01	-	0.01	0.26
Feature 5									
Zone 1	0.33	0.01	0.07	-	0.02	0.03	-	<0.005	0.46
Feature 6									
Zone 1	0.22	0.03	-	-	0.01	0.06	-	<0.005	0.32
Feature 7									
Zone 1	0.17	<0.005	0.11	<0.005	<0.005	0.05	-	0.01	0.34
Feature 8									
Zone 1	-	-	-	-	<0.005	0.03	-	-	0.03
Feature 15									
Zone 1	0.07	<0.005	0.06	-	-	0.02	0.02	0.03	0.20
Zone 2	0.09	-	-	-	0.13	0.23	0.07	0.03	0.55
Zone 3	0.10	-	0.08	-	0.05	0.04	0.08	0.01	0.36
Sub-total	0.26	<0.005	0.14	-	0.18	0.29	0.17	0.07	1.11
Feature 17									
Zone 1	0.11	0.02	0.04	-	0.01	0.02	-	<0.005	0.20
Feature 55									
Zone 1	0.07	-	-	-	-	0.05	-	-	0.12
Sub-total	1.29	0.06	0.44	<0.005	0.25	0.54	0.17	0.09	2.84
Late Saratown Phase									
Feature 10									
Zone 1	1.88	0.02	0.07	-	0.37	0.20	0.05	0.09	2.68
Zone 2	9.92	0.13	0.30	-	0.62	0.68	0.11	0.51	12.27
Zone 3	0.20	-	-	-	0.01	0.02	-	<0.005	0.23
Sub-total	12.00	0.15	0.37	-	1.00	0.90	0.16	0.60	15.18
Feature 21									
Zone 2	0.02	-	-	-	-	-	-	-	0.02
Feature 28 (Burial 11)									
Zone 1	0.05	-	0.01	-	0.01	0.01	-	<0.005	0.08
Zone 2	0.01	-	-	-	-	0.01	-	-	0.02
Zone 3	0.01	-	-	-	-	0.02	-	-	0.03
Sub-total	0.07	-	0.01	-	0.01	0.04	-	-	0.13
Feature 30 (Burial 12)									
Zone 1	0.04	-	-	-	0.01	<0.005	-	0.10	0.15
Zone 2	-	-	0.03	-	-	-	-	-	0.03
Sub-total	0.04	-	0.03	-	0.01	-	-	0.10	0.18
Sub-total	12.13	0.15	0.41	-	1.02	0.94	0.16	0.70	15.51
Total	13.42	0.21	0.85	<0.005	1.27	1.48	0.33	0.79	18.35

The Contact period component of the William Kluttz site represents the latest occupation thus far identified in the Dan River drainage, and may be one of the last villages occupied by the Sara within this area. Although Upper Saratown (31Sk1a) and the Madison site (31Rk6) also fall within the temporal span of the late Saratown phase (1670–1710), they appear to date to the 1670–1690 period, whereas the William Kluttz site probably dates between 1690 and 1710. This chronological placement for the William Kluttz site is based on: 1) similarities between the pottery from Feature 10 (particularly the check stamped pottery) and the Fredricks site ceramic assemblage; 2) the style of the pistol accompanying Burial 12; and 3) the presence of *Cornaline de Allepo* beads.

In contrast to nearby Upper Saratown which represents a small nucleated, palisaded village comprised of closely-spaced houses, the William Kluttz site extends over a large 6.5-acre area. The settlement plan seems to be one of widely scattered households without palisades. Also at Upper Saratown, burials were placed within and around houses, and because of their

Table 11.11. Seed and fruit counts from the William Kluttz site.

Sample	Cheno-pod	Knot-weed	May-pops	Persim-mon	Bram-ble	Grape	Plum	Night-shade	Sump-weed	Common Bean	Maize Kernels	Bul-rush	Un-known	Total
Dan River Phase														
Feature 4														
Zone 1	-	-	-	-	-	2	-	-	-	-	2	-	2	6
Feature 5														
Zone 1	-	1	-	-	-	-	-	-	-	-	1	-	-	2
Feature 6														
Zone 1	-	-	-	-	-	-	-	-	-	-	1	-	1	2
Feature 7														
Zone 1	-	-	-	1	-	-	-	-	-	-	1	-	-	2
Feature 8														
Zone 1	-	-	-	-	-	-	-	-	-	-	1	-	-	1
Feature 15														
Zone 1	-	-	-	1	-	-	-	-	-	1	-	-	2	4
Zone 2	1	-	-	-	-	-	-	-	5	3	9	-	-	18
Zone 3	-	-	-	-	-	-	-	-	-	2	3	-	2	7
Sub-total	1	-	-	1	-	-	-	-	5	6	12	-	4	29
Feature 17														
Zone 1	-	-	-	-	-	-	-	1	-	-	1	-	1	3
Sub-total	1	1	-	2	-	2	-	1	5	6	19	-	8	45
Late Saratown Phase														
Feature 10														
Zone 1	-	25	1	2	-	-	-	-	-	2	9	-	6	45
Zone 2	-	2	-	7	-	1	-	-	-	3	25	-	5	43
Zone 3	-	-	-	-	-	-	-	-	-	-	1	-	3	4
Sub-total	-	27	1	9	-	1	-	-	-	5	35	-	14	92
Feature 28 (Burial 11)														
Zone 1	-	-	-	-	-	-	-	-	-	-	2	1	-	3
Feature 30 (Burial 12)														
Zone 1	-	-	-	-	1	3	1	-	-	-	1	-	3	9
Sub-total	-	27	1	9	1	4	1	-	-	5	38	1	17	104
Total	1	28	1	11	1	6	1	1	5	11	57	1	25	149

large numbers, the entire village resembled a cemetery (Davis and Ward 1989). At the William Kluttz site, the central excavation block uncovered a cemetery that most likely was located away from habitation areas. Despite these differences in burial placement, both sites evidence a persistent high mortality rate among the Sara that probably was caused by European-introduced disease.

The fact that most burials were the graves of children also suggests that adults who had survived earlier epidemics, perhaps at Upper Saratown, had developed some immunity to killers such as smallpox. The tightly clustered placement of the burials and their shallow depth seem to indicate that they were made over a short period of time and may reflect a single disease episode. These burials certainly represent mortuary behavior very different from that suggested by the two deep shaft-and-chamber graves (Burials 11 and 12) located some distance away from the cemetery.

In terms of pit form and body placement, Burials 11 and 12 fit the more traditional Siouan pattern; however, the large number of trade artifacts associated with Burial 12 suggests a shift in status reckoning similar to that identified at the Fredricks site. At Fredricks, young adult Occaneechi males appear to have achieved high status positions due to their involvement in the English trade (Ward 1987). The same might also be said of the individual in Burial 12 who was dressed in English clothes with a pistol on his belt. This pattern stands in sharp contrast to the Upper Saratown burials where the most elaborate grave, with a wide array of European trade artifacts, was that of an adult female (Navey 1982).

Subsistence remains dating to the late Saratown phase were not plentiful at the William Kluttz site, but in the samples that were analyzed, there was no evidence of Old World plant use, nor was there any evidence for the use of European animals. The absence of Old World plant foods was somewhat surprising because peaches were quite popular at Upper Saratown and Occaneechi Town, and are ubiquitous on Contact period sites throughout the Piedmont.

Table 11.12. Ubiquity of plant foods from the William Kluttz site.

Plant Food	No. of 10-Liter Samples	%	No. of Features	%
Dan River Phase				
Maize	10	100.0	8	100.0
Hickory	9	90.0	7	87.5
Walnut	6	60.0	5	62.5
Acorn	5	50.0	5	62.5
Persimmon	2	20.0	2	25.0
Sumpweed	1	10.0	1	12.5
Nightshade	1	10.0	1	12.5
Knotweed	1	10.0	1	12.5
Grape	1	10.0	1	12.5
Chestnut	1	10.0	1	12.5
Chenopod	1	10.0	1	12.5
Common Bean	1	10.0	1	12.5
Total	10		8	
Late Saratown Phase				
Hickory	17	94.4	4	100.0
Maize	14	77.8	3	75.0
Knotweed	8	44.4	1	25.0
Walnut	7	38.9	3	75.0
Persimmon	5	27.8	1	25.0
Common Bean	4	22.2	1	25.0
Acorn	4	22.2	1	25.0
Grape	2	11.1	2	50.0
Plum	1	5.6	1	25.0
Maypops	1	5.6	1	25.0
Bulrush	1	5.6	1	25.0
Bramble	1	5.6	1	25.0
Total	18		4	

Chapter 12

The Jenrette Site

The Jenrette site (RLA-Or231a; 31Or231a) is located along the banks of the Eno River in central Orange County, North Carolina, adjacent to the Fredricks site (Figure 12.1). It was discovered in 1989 while auger testing near the Fredricks site excavations. Numerous positive auger tests, indicating intact archaeological features, were recorded by these investigations (Figure 12.2). Soon after excavations were begun at the Jenrette site, it became obvious that the features located during the auger testing fit a pattern found on most palisaded piedmont villages. They formed a broad band just inside the palisade where houses were also located. The excavation strategy, initiated in 1989 and continued in 1990, was to follow the palisade and excavate features within the interior band (Figures 12.3 and 12.4). Structures identified during these investigations also were fully exposed and excavated. The overall goal of the Jenrette site excavations was to retrieve as much feature data as possible and, at the same time, expose a large enough area of the village to allow some assessment of its size and internal structure.

Both of the goals were accomplished in 1989 when a 5,200-sq-ft excavation block was opened. This area exposed 47 pit features, including four human burials, a rectangular wall-trench structure, a structure of single-post construction, and segments of two palisade lines. The pit features contained rich deposits of food remains and other domestic refuse. Only one of the burials was found to be associated with the Jenrette site occupation; the other three form part of a small cemetery associated with the Occaneechi occupation at the adjacent Fredricks site.

During the summer of 1990, excavations at Jenrette doubled the exposed area of the village, revealing 24 additional pit features, another wall-trench structure, and a small two-sided structure that may represent an outbuilding. An additional burial pit also was excavated in the small Occaneechi cemetery identified in 1989. Because these data have not been completely analyzed, they will not be reported in detail. Nevertheless, we can say that the 1990 fieldwork offered no surprises but rather corroborated previously defined patterns (Figure 12.5).

Stratigraphy

The stratigraphy at the Jenrette site typifies most piedmont North Carolina village sites situated in a cultivated floodplain environment (Figure 12.6). A relatively shallow (0.8 ft thick) plowzone rests directly on the undisturbed subsoil. At Jenrette, the plowed soil is a brown, Congaree fine sandy loam; the underlying subsoil consists of a tannish orange silty clay. A midden or undisturbed humus layer is lacking, although in some areas of the site the top of the subsoil is very mottled with stains of the original topsoil. Usually parallel plow scars are distinctly displayed on top of the subsoil and sometimes create an undulating surface after being cleaned out.

Intrusive pits usually were distinct in color and composition from the surrounding subsoil. These were mapped and excavated once the overlying plowed soil had been removed. In a few instances, features were recognized while flatshoveling the base of the plowzone, and this fill was kept separate from the plowed soil. Although located in an active floodplain, the Jenrette site, like the other sites in the horseshoe bend of the Eno, has experienced little soil deposition over the last several centuries. As a consequence, the surface of the site today probably does not differ radically from the surface during the time of aboriginal occupation.

Features and Burials

Forty-three pit features and four burials were excavated at the Jenrette site during 1989; four additional features were recorded but not excavated because they extended beyond the limits of the excavation (Table 12.1). Six of these features are attributed to the early Haw River phase occupation at the nearby Hogue site, while three of the burials are associated with the Occaneechi occupation at the adjacent Fredricks site. Most of the remaining features and one burial contained artifacts that allowed them to be attributed to the seventeenth-century Jenrette phase.

During 1990, 26 features (including two tree disturbances and a crushed pot found *in situ*) and one burial were excavated. Another feature that extended into the excavation profile was mapped. All are associated with the Jenrette phase village except for the burial (attributed to the later Occaneechi village) and six large, rectangular, posthole-like pits. These straight-sided, evenly spaced pits are elements of a later, undefined Euroamerican structure.

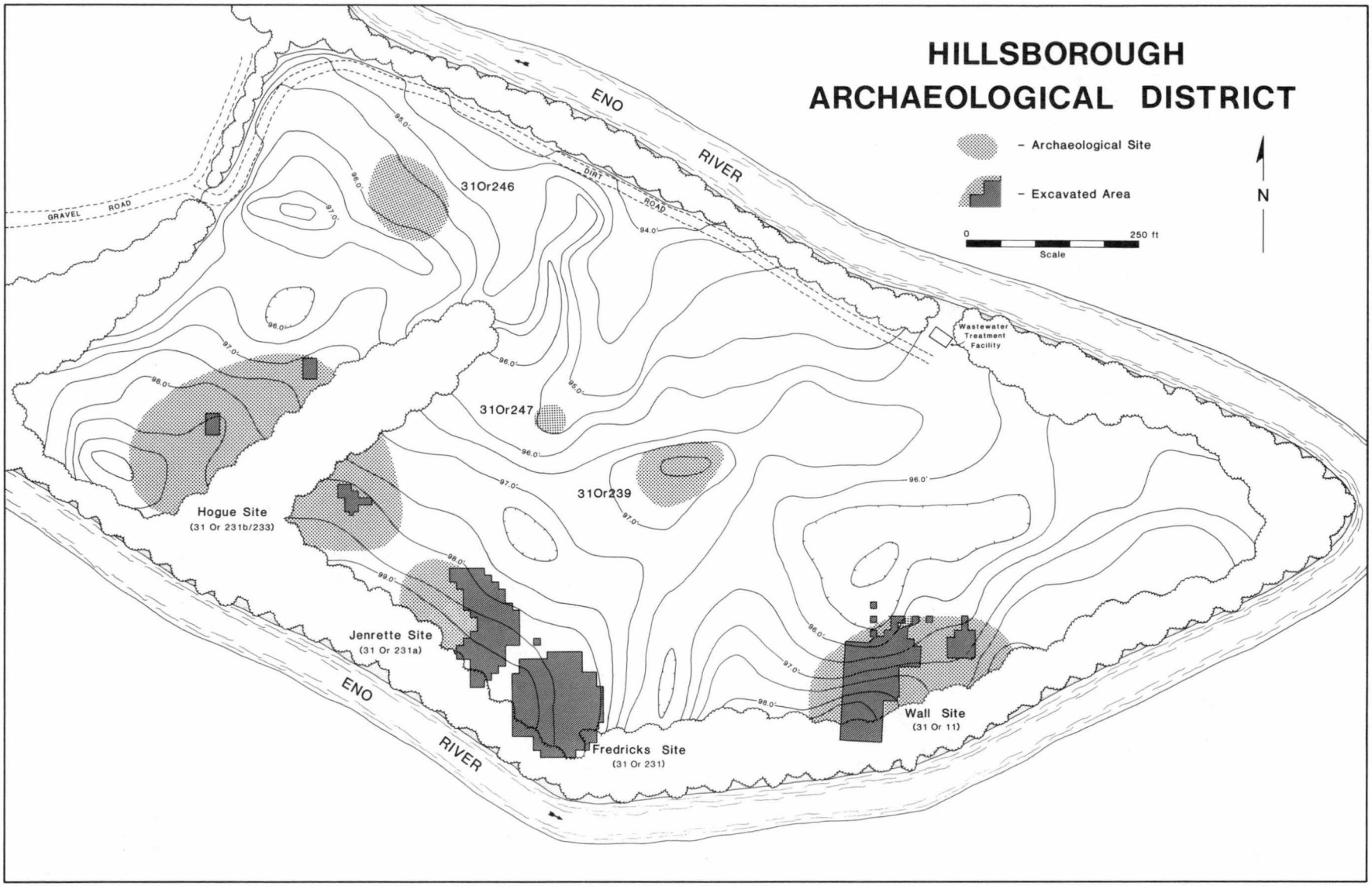

Figure 12.1. Map showing areas of auger testing and excavation at Jenrette and surrounding sites near Hillsborough, North Carolina.

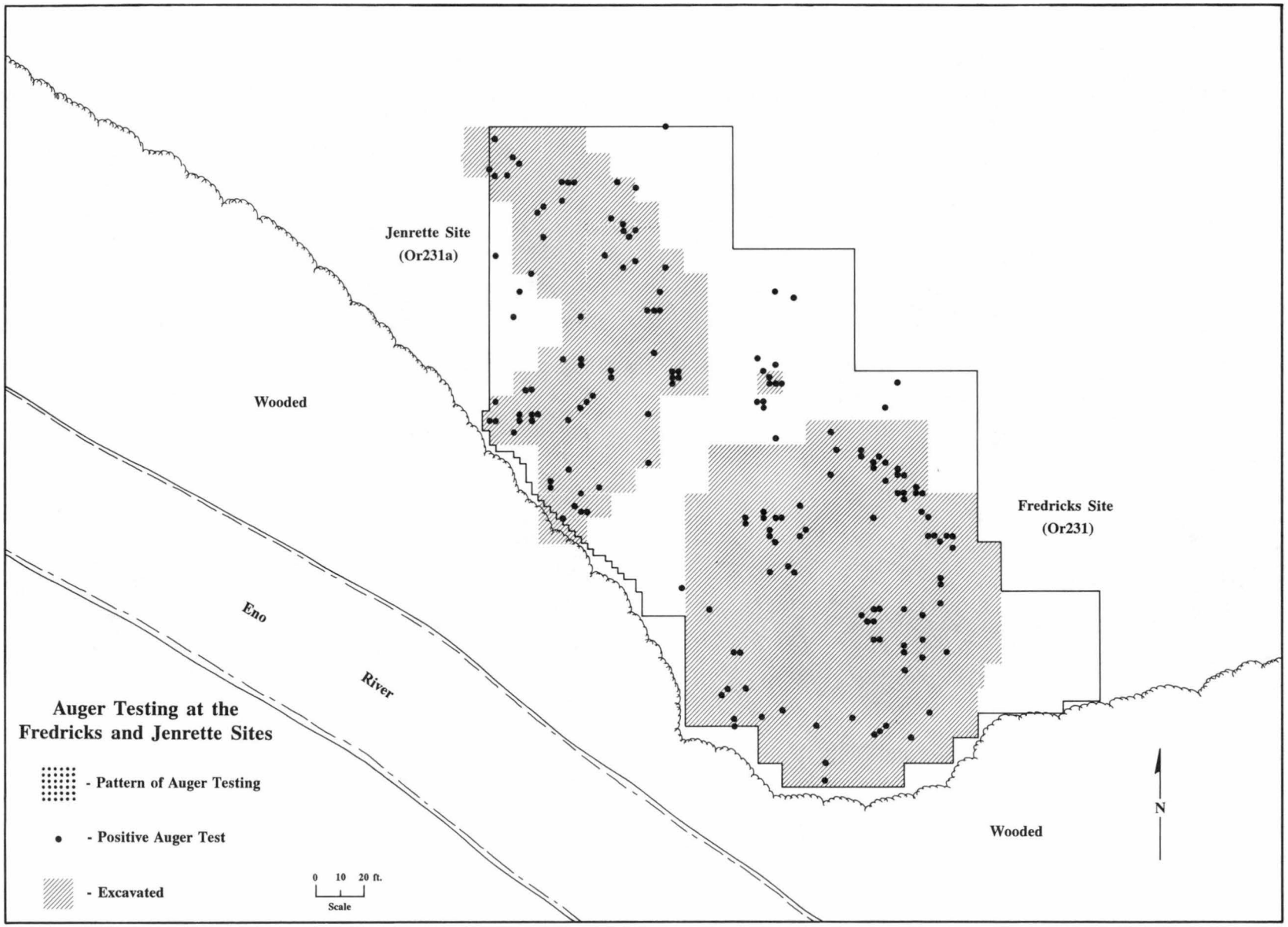

Figure 12.2. Results of auger testing at the Jenrette and Fredricks sites.

Figure 12.3. Excavating plowzone at the Jenrette site.

Figure 12.4. Troweling top of subsoil at the Jenrette site.

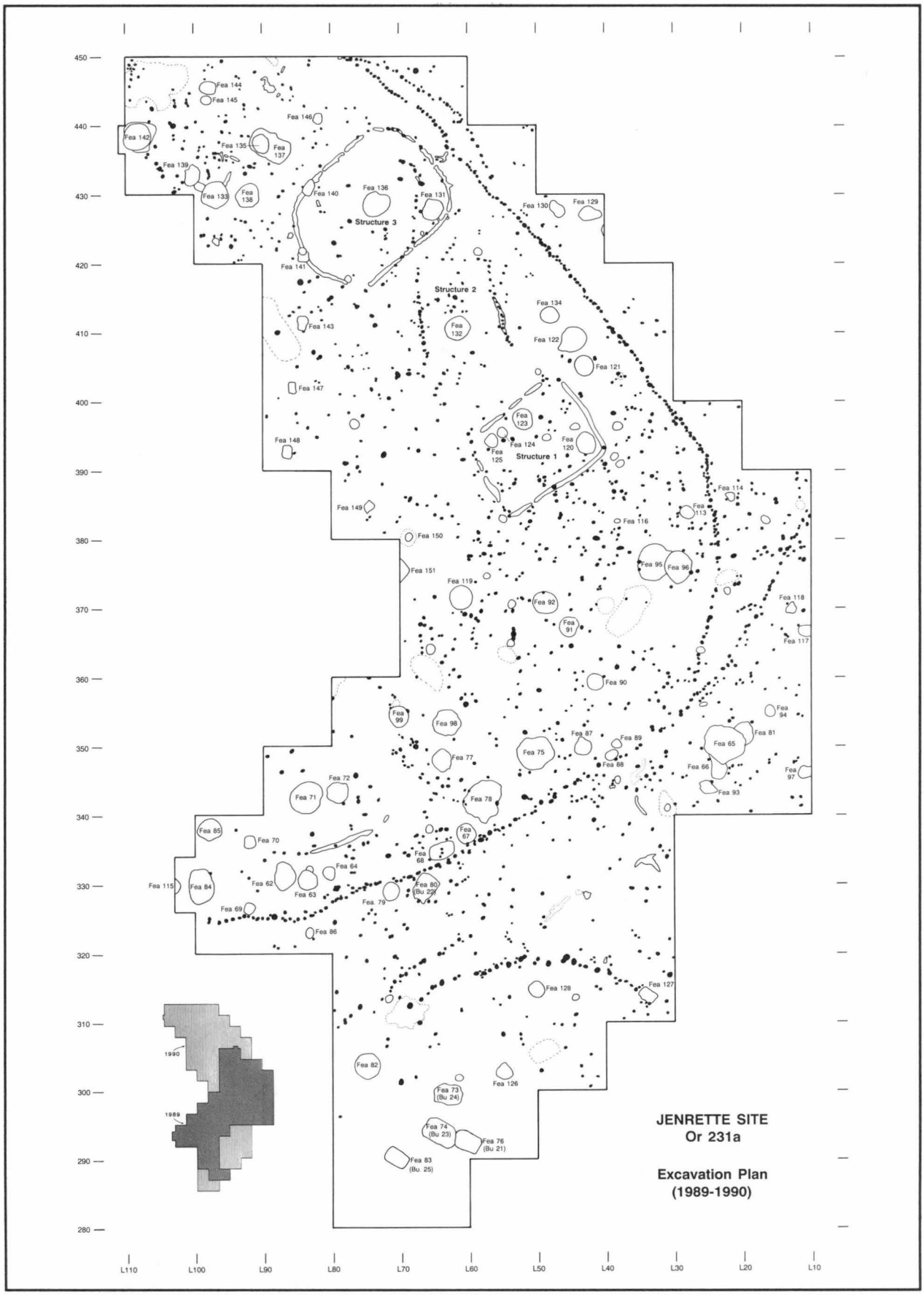

Figure 12.5. Excavation plan at the Jenrette site.

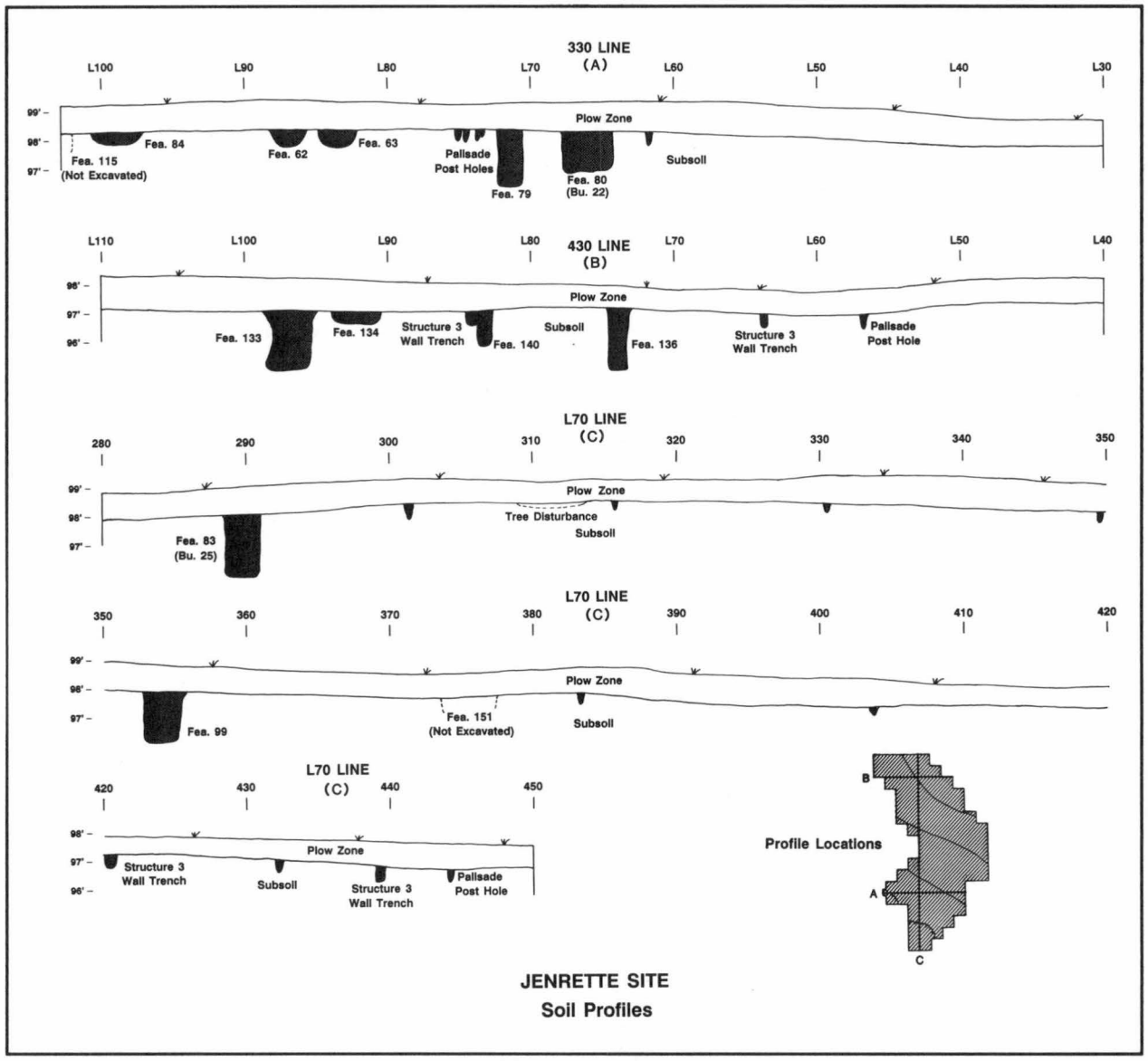

Figure 12.6. Stratigraphic profiles.

Features and burials excavated in 1989 are described below. The 1990 features and burial are summarized in Table 12.2 and located in Figure 12.5. Because of the Jenrette site's proximity to the Fredricks site and our initial uncertainty about whether it represented a new village site or simply an extension of the Fredricks site, feature and burial designations were maintained within the sequence employed at Fredricks. For this reason, the initial feature excavated at Jenrette was Feature 62 (Feature 61 was the last feature excavated at the Fredricks site in 1986). Excavations in the eastern half of the Hogue site (RLA-Or231b) also employed the same numbering sequence.

Feature 62

This large, shallow, basin-shaped pit was located in the southwest section of the 1989 excavation, just inside the palisade. On the subsoil surface, it appeared as an oval stain of dark yellowish brown (10YR 3/4) loam with flecks of charcoal and fired clay. This zone, Zone 1, extended to an average depth of 0.3 ft and lay atop Zone 2, a reddish orange clay mottled with brown loam. This final zone was 0.6 ft thick. Zone 1 contained a few small potsherds and animal bone fragments along with fragments of fire-cracked rock. Zone 2 was virtually sterile except for a large rock that rested on the floor of the pit. After excavation, the feature measured 4.3 ft by 3.2 ft and was 0.9 ft deep (Figure 12.7). The sides sloped inward to intersect an uneven bottom. Based on the configuration of the pit and its contents, it is difficult to determine its primary function. The Zone 1 fill appears to represent village midden, whereas Zone 2 resembles re-deposited subsoil, perhaps from the excavation of a nearby pit.

Table 12.1. Summary of features identified during the 1989 field season at the Jenrette site.

Feature No.	Type	Center Location	Dimensions (ft) L	W	D	Phase Association	Comment
Fea. 62	Pit	331.0L87.0	4.3	4.0	0.9	Jenrette	Excavated
Fea. 63	Pit	330.5L83.5	3.0	3.0	0.8	Jenrette	Excavated
Fea. 64	Basin	331.5L80.3	2.0	1.7	0.3	Jenrette	Excavated
Fea. 65	Food Prep. Facility	350.0L22.5	5.9	5.5	1.4	Jenrette	Excavated
Fea. 66	Basin	347.3L23.8	3.0	2.4	0.6	Jenrette	Excavated
Fea. 67	Basin	337.3L50.5	3.0	2.7	0.5	Jenrette	Excavated
Fea. 68	Basin	335.0L64.0	3.8	2.4	0.3	Jenrette	Excavated
Fea. 69	Basin	326.5L92.5	1.9	1.7	0.8	Jenrette	Excavated
Fea. 70	Basin	336.5L92.0	1.7	1.5	0.6	Jenrette	Excavated
Fea. 71	Storage Pit	342.8L83.6	4.6	4.5	1.8	Jenrette	Excavated
Fea. 72	Storage Pit	343.4L79.0	3.2	3.1	1.3	Early Haw River	Excavated
Fea.73 (Bu.24)	Burial	299.5L63.0	4.3	3.0	2.2	Fredricks	Excavated
Fea.74 (Bu.23)	Burial	293.8L64.5	5.2	3.2	2.3	Fredricks	Excavated
Fea. 75	Food Prep. Facility	339.0L50.3	5.4	4.6	0.8	Jenrette	Excavated
Fea.76 (Bu.21)	Burial	292.5L60.3	4.1	2.8	1.4	Fredricks	Excavated
Fea. 77	Storage Pit	348.5L63.8	0.3	2.5	1.7	Jenrette	Excavated
Fea. 78	Food Prep. Facility	342.0L57.8	6.0	5.0	0.4	Jenrette	Excavated
Fea. 79	Storage Pit	328.8L71.5	2.7	2.5	2.0	Jenrette	Excavated
Fea.80 (Bu.22)	Burial	329.5L66.5	4.1	3.0	1.6	Jenrette	Excavated
Fea. 81	Tree Disturbance	352.0L20.0	3.1	2.6	>1.6	Early Haw River	Excavated
Fea. 82	Storage Pit	303.7L74.9	3.7	3.4	2.2	Early Haw River	Excavated
Fea. 83	Burial	290.0L70.0	-	-	-	Fredricks	Mapped (Excav. 1990)
Fea. 84	Food Prep. Facility	330.0L99.0	5.5	4.0	0.4	Jenrette	Excavated
Fea. 85	Storage Pit	338.1L97.9	3.4	3.2	2.4	Jenrette	Excavated
Fea. 86	Tree Disturbance	323.0L83.0	1.5	1.4	1.6	-	Excavated
Fea. 87	Basin	349.9L43.3	2.6	2.6	0.2	Jenrette	Excavated
Fea. 88	Basin	348.7L39.1	2.0	1.5	0.3	Jenrette	Excavated
Fea. 89	Basin	349.8L38.5	1.4	1.4	0.2	Early Haw River	Excavated
Fea. 90	Basin	359.3L41.5	2.5	2.4	0.4	Jenrette	Excavated
Fea. 91	Basin	367.3L45.3	2.8	2.7	0.5	Jenrette	Excavated
Fea. 92	Burial?	370.7L48.8	3.5	3.3	0.8	Jenrette	Excavated
Fea. 93	Tree Disturbance	344.0L25.2	3.0	2.0	1.8	-	Excavated
Fea. 94	Pit	355.0L11.0	1.7	1.7	1.0	Early Haw River	Excavated
Fea. 95	Food Prep. Facility	376.5L33.0	5.4	4.3	0.5	Jenrette	Excavated
Fea. 96	Food Prep. Facility	376.0L19.2	4.6	3.9	1.0	Jenrette	Excavated
Fea. 97	Pit?	346.0L11.0	-	-	-	Indeterminate	Mapped
Fea. 98	Storage Pit	353.5L63.3	3.8	3.8	2.2	Jenrette	Excavated
Fea. 99	Storage Pit	354.3L70.3	3.1	2.9	1.9	Jenrette	Excavated
Fea. 113	Smudge Pit	383.8L28.0	2.4	2.0	0.5	Jenrette	Excavated
Fea. 114	Smudge Pit	386.1L21.6	1.4	1.2	0.9	-	Excavated
Fea. 115	Pit?	329.6L103.5	2.5	2.5	-	Indeterminate	Mapped
Fea. 116	Large Posthole	380.3L38.3	0.8	0.7	0.2	Jenrette	Excavated
Fea. 117	Pit ?	366.5L10.5	2.0	1.7	-	Indeterminate	Excavated
Fea. 118	Tree Disturbance	369.7L12.8	1.6	1.6	>1.1	-	Excavated
Fea. 119	Storage Pit	371.2L60.0	2.5	2.0	>2.0	Jenrette	Mapped (Excav. 1990)
Fea. 120	Storage Pit	393.8L42.6	3.2	2.7	1.4	Jenrette	Excavated
Fea. 121	Basin	405.0L43.0	3.0	2.8	0.6	Jenrette	Excavated
Fea. 122	Food Prep. Facility	409.0L44.5	3.7	3.6	1.4	Jenrette	Excavated
Fea. 123	Storage Pit	397.5L52.0	3.1	2.9	1.5	Jenrette	Excavated
Fea. 124	Basin	395.3L55.1	1.5	1.5	0.4	Jenrette	Excavated
Fea. 125	Pit	394.3L56.5	2.0	1.9	1.1	Early Haw River	Excavated

Table 12.2. Summary of features identified during the 1990 field season at the Jenrette site.

Feature No.	Type	Center Location	Dimensions (ft) L	W	D	Phase Association	Comment
Fea.83 (Bu.25)	Burial	290.3L70.8	3.8	2.6	2.2	Fredricks	Excavated
Fea. 119	Storage Pit	371.2L60.0	2.5	2.0	>2.0	Jenrette	Excavated
Fea. 126	Pit	303.0L55.0	3.2	3.2	1.2	Jenrette	Excavated
Fea. 127	Pit	313.8L34.0	2.5	2.0	1.2	Indeterminate	Excavated
Fea. 128	Basin	314.4L50.4	3.1	2.7	1.0	Indeterminate	Excavated
Fea. 129	Tree Disturbance	427.0L42.0	3.3	2.2	0.6	-	Excavated
Fea. 130	Tree Disturbance	427.7L47.0	2.4	1.7	2.0	-	Excavated
Fea. 131	Storage Pit	428.0L65.0	3.0	2.9	1.5	Jenrette	Excavated
Fea. 132	Storage Pit	410.7L61.2	3.5	3.5	2.2	Jenrette	Excavated
Fea. 133	Storage Pit	430.0L96.7	3.5	3.5	2.0	Jenrette	Excavated
Fea. 134	Basin	412.5L48.3	2.5	2.4	0.3	Jenrette ?	Excavated
Fea. 135	Pit	437.4L90.2	2.5	2.4	1.3	Jenrette	Excavated
Fea. 136	Storage Pit	418.5L74.0	3.7	3.6	2.3	Jenrette	Excavated
Fea. 137	Basin	437.2L88.7	6.5	4.4	1.2	Jenrette	Excavated
Fea. 138	Pit	430.0L92.1	3.7	3.4	1.8	Jenrette	Excavated
Fea. 139	Pit	433.0L100.3	2.5	2.2	0.9	Jenrette	Excavated
Fea. 140	Pit	431.0L83.0	2.3	2.0	1.4	Colonial ?	Excavated
Fea. 141	Pit	421.2L84.2	2.8	1.8	1.2	Colonial ?	Excavated
Fea. 142	Storage Pit	438.5L108.3	3.7	3.3	2.0	Jenrette	Excavated
Fea. 143	Pit	411.7L84.1	2.0	1.5	1.1	Colonial ?	Excavated
Fea. 144	Pit	445.8L97.9	3.0	2.7	1.1	Jenrette	Excavated
Fea. 145	Pit	443.7L97.6	1.5	1.2	0.5	Jenrette ?	Excavated
Fea. 146	Pit	441.0L82.0	2.1	2.0	1.0	Colonial ?	Excavated
Fea. 147	Pit	402.0L85.7	2.6	2.3	1.0	Colonial ?	Excavated
Fea. 148	Pit	392.5L86.5	2.1	1.6	1.1	Colonial ?	Excavated
Fea. 149	Cob-Filled Pit	384.5L74.5	2.4	1.6	0.5	Jenrette ?	Excavated
Fea. 150	Crushed Pot	380.3L68.7	1.2	1.2	0.3	Jenrette	Excavated
Fea. 151	Pit ?	375.0L71.0	-	-	-	Indeterminate	Mapped

Feature 63

This feature was circular in outline and was located adjacent to Feature 62. It contained a single zone of fill that consisted of a dark brown (7.5YR 3/2) loam (Figure 12.8). This zone was observed in the field as being very similar to Zone 1 of Feature 62. However, the fill from Feature 63 was much richer, containing numerous potsherds, animal bones, mussel shells, shell and glass beads, and charcoal. Five projectile points and a fragment of a clay pipe also were recovered. After excavation, the pit measured 3.2 ft by 2.9 ft and extended to a depth of 0.7 ft (Figures 12.9 and 12.10). The sides sloped inward, creating a profile similar to that of Feature 62. Again, it is difficult to determine the original function of the pit; however, it was filled with a rich deposit of domestic refuse that may have come from cleaning the floor of a structure or from deposits derived from food preparation and consumption activities.

Feature 64

This designation was assigned to a small circular stain of dark yellowish brown (10YR 3/6) loam immediately east of Feature 63. A few small potsherds and animal bone fragments were recovered before the stain bottomed out at 0.2 ft beneath the subsoil surface. In plan, the feature measured 2.0 ft in diameter and had a basin-shaped profile (Figure 12.11). The fill appeared very similar to Zone 1 fill in Feature 62 and also probably represents general village midden that may have accumulated in a shallow depression.

Feature 65

This feature was located at 350L22.5, in the southeastern corner of the excavation and just outside the village palisade. The large circular pit appeared at the subsoil surface as a stain of dark brown (7.5YR 3/2) sandy loam (Zone 1) laden with refuse. This zone contained numerous potsherds, animal bones, a pipe bowl, a stone hoe, a ground celt, a lead shot, 200 glass beads, and 12 green glass flakes. Most of the cultural material was concentrated in an irregular band near the bottom of Zone 1. Of particular note were several turtle carapaces and plastrons, two bone beamers, and a worked antler. Ashy pockets and a cluster of fist-sized fire-cracked rock also were encountered near the bottom of Zone 1, which extended to an average depth of 0.6 ft.

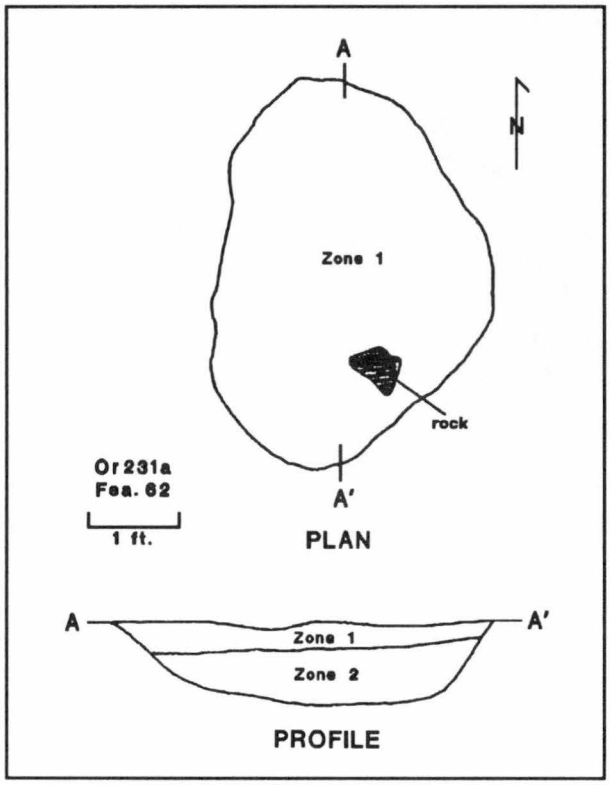

Figure 12.7. Feature 62, plan view and profile drawings.

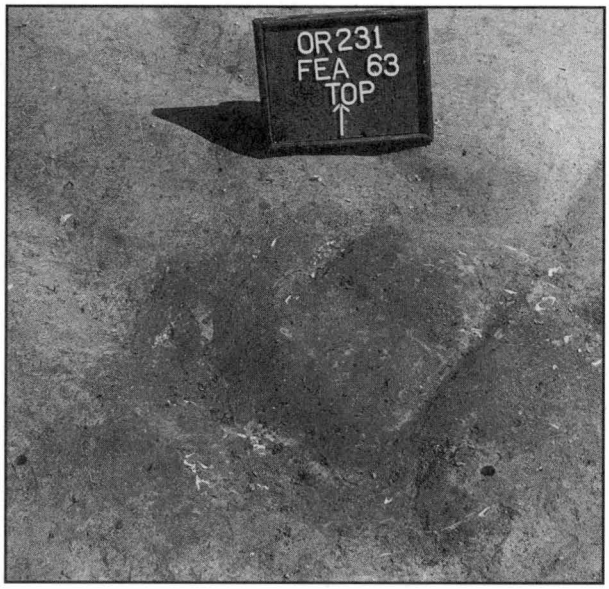

Figure 12.8. Feature 63, before excavation.

Zone 2, which averaged 0.7 ft in thickness, consisted of a mottled, yellowish orange, sandy clay that contained a similar array of refuse but not as concentrated as the material in Zone 1. In addition, a single peach pit was removed from Zone 2. After excavation, Feature 65 measured 5.7 ft by 5.0 ft and extended to a depth of 1.3 ft beneath the subsoil surface (Figures

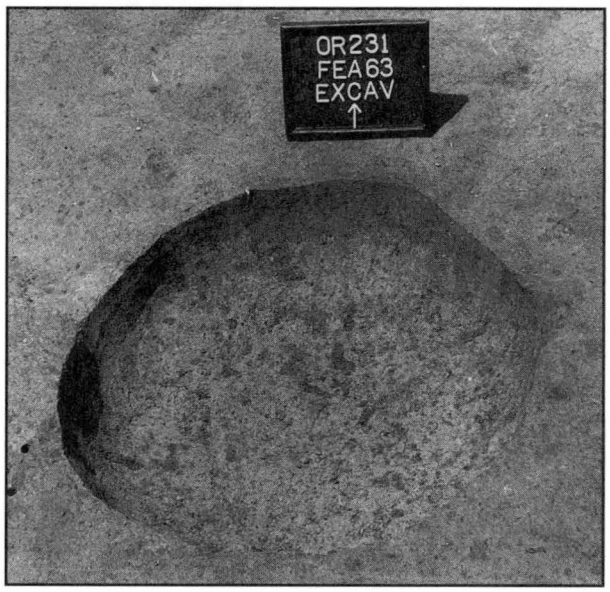

Figure 12.9. Feature 63, excavated.

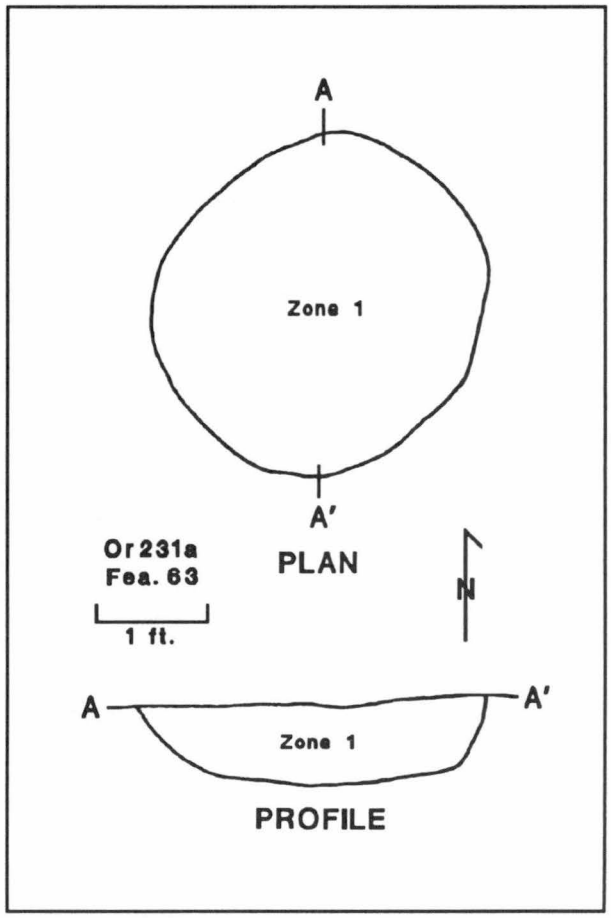

Figure 12.10. Feature 63, plan view and profile drawings.

12.12 and 12.13). The walls sloped inward to intersect a flat bottom, and produced a boat-shaped profile. This large pit may have been used in food preparation

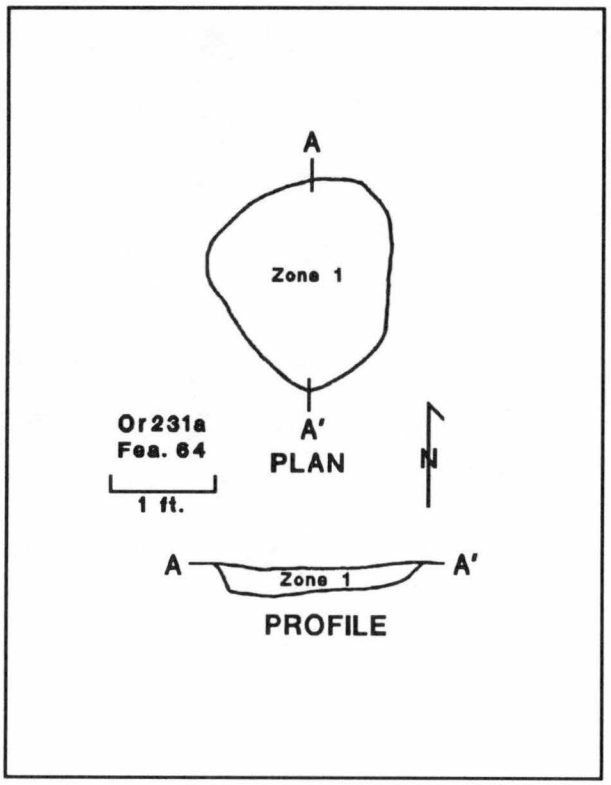

Figure 12.11. Feature 64, plan view and profile drawings.

and is very similar to features found on other Siouan sites that have been interpreted as earth ovens or roasting pits. Its location along the palisade is also similar to the placement of earth ovens at Upper Saratown (Ward 1980; Wilson 1977).

Feature 66

This shallow, oval-shaped basin was intruded by Feature 65. The fill was a dark yellowish brown (10YR 4/4) loam that contained a moderate amount of pottery, animal bones, projectile points, and lithic debris. Glass trade beads also were recovered. The portion of the feature that remained after being truncated by Feature 65 measured 3.7 ft by 2.4 ft and had a maximum depth of 1.4 ft. The east-west profile was U-shaped, whereas the long north-south profile was defined by an uneven bottom that dipped near the intersection with Feature 65. The primary function of this facility cannot be ascertained at this time.

Feature 67

Feature 67 was located just inside the palisade at 337.5L50.5. This shallow basin consisted of a single zone of dark yellowish brown (10YR 3/6) mottled loam that contained a small amount of cultural material. Atop this zone was a thin lens of clay with small fragments of charcoal which gave the pit the appearance of a burial. After excavation, it measured 3.0 ft by 2.8 ft and extended to a depth of 0.5 ft below the

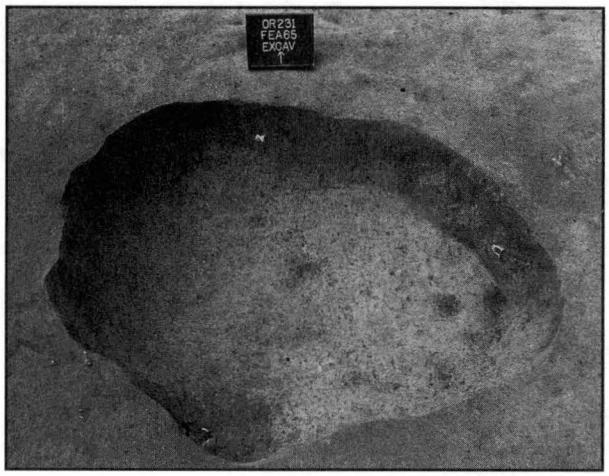

Figure 12.12. Feature 65, excavated.

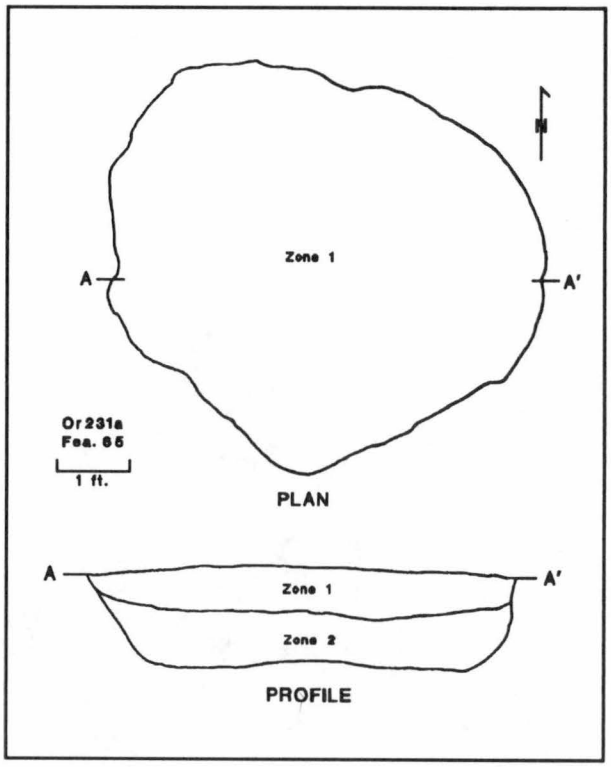

Figure 12.13. Feature 65, plan view and profile drawings.

surface of the subsoil (Figure 12.14). As with the other shallow basins, it's primary function is enigmatic. The clay cap on top is particularly puzzling.

Feature 68

This shallow, rectangular basin was located just inside the palisade and immediately west of Feature 67. The fill consisted of a single zone of yellowish brown (10YR 5/8) silty clay mottled with dark grayish brown loam. Except for several large, fitting sherds, very little cultural material was present (Figure 12.15). The

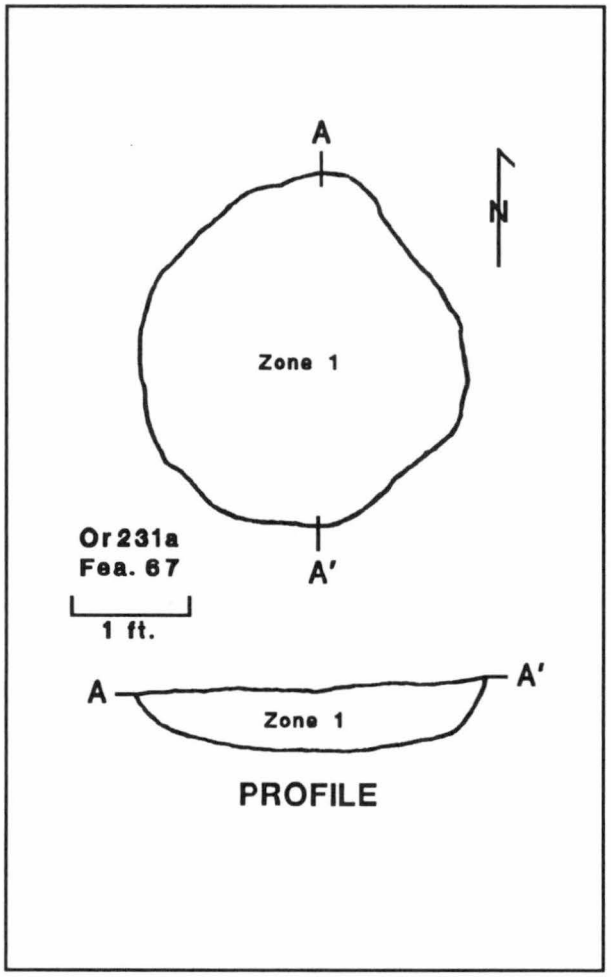

Figure 12.14. Feature 67, plan view and profile drawings.

basin measured 3.8 ft by 2.6 ft and was only 0.3 ft deep (Figure 12.16). Its function is unclear.

Feature 69

This small circular basin also was located adjacent to the palisade near the western edge of the excavation. It was filled with a single zone of dark yellowish brown, loamy clay similar to that contained in Feature 68. A few flecks of charcoal and fired clay also were noted. Except for a few small bone fragments and flakes, and a single glass bead, the fill was sterile. After excavation the feature measured 1.9 ft by 1.7 ft and was 0.8 ft deep. In all likelihood, this basin represents a natural unconformity that contained original village humus that escaped the plow.

Feature 70

This small rectangular feature was located near the western edge of the excavation and was defined by a single zone of dark brown (5YR 3/2) loam with flecks of charcoal. The only artifacts recovered from the fill were three small potsherds and a piece of worked steatite. It measured 1.8 ft by 1.5 ft and was 0.7 ft

Figure 12.15. Feature 68, excavated.

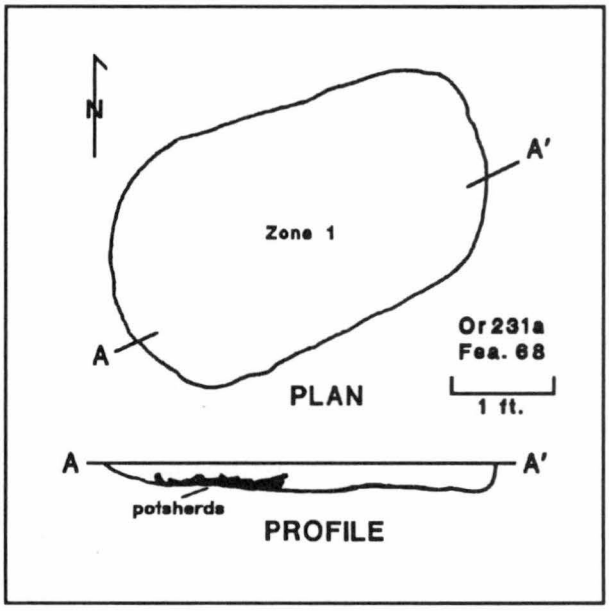

Figure 12.16. Feature 68, plan view and profile drawings.

deep. The sides sloped inward, creating a basin-shaped profile. As with many of the other small basins, it is suspected that Feature 70 was created naturally and filled with village humus.

Feature 71

This facility also was located in the western section of the excavation at 342.8L83.6, inside the palisade. On the subsoil surface, it appeared as a roughly circular stain of dark brown (10YR 3/3) loam mottled with patches of dark yellowish brown (10YR 4/6) loam, ash, and flecks of charcoal. This fill zone extended to the bottom of the feature and contained a moderate amount of artifacts, including potsherds, lithic debris, and fire-cracked rocks. Several poorly preserved animal bones also were present, as were

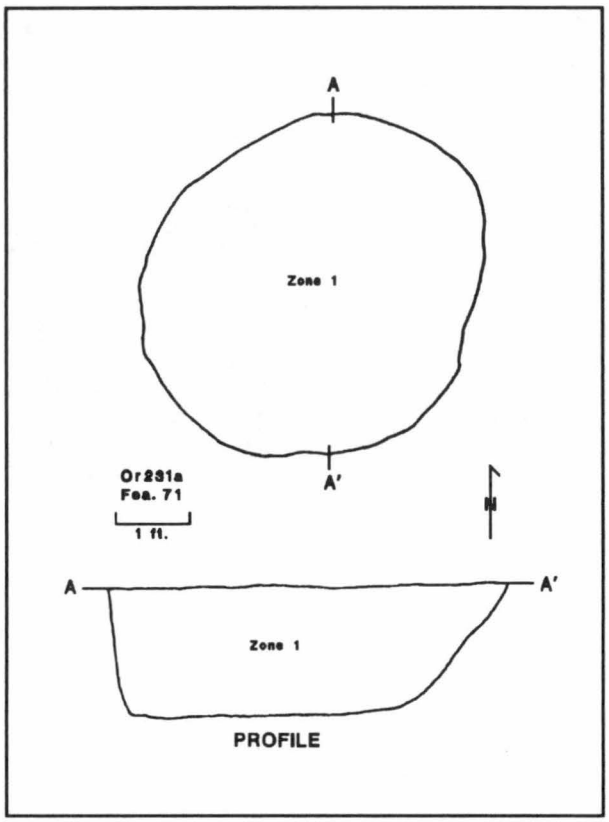

Figure 12.17. Feature 71, plan view and profile drawings.

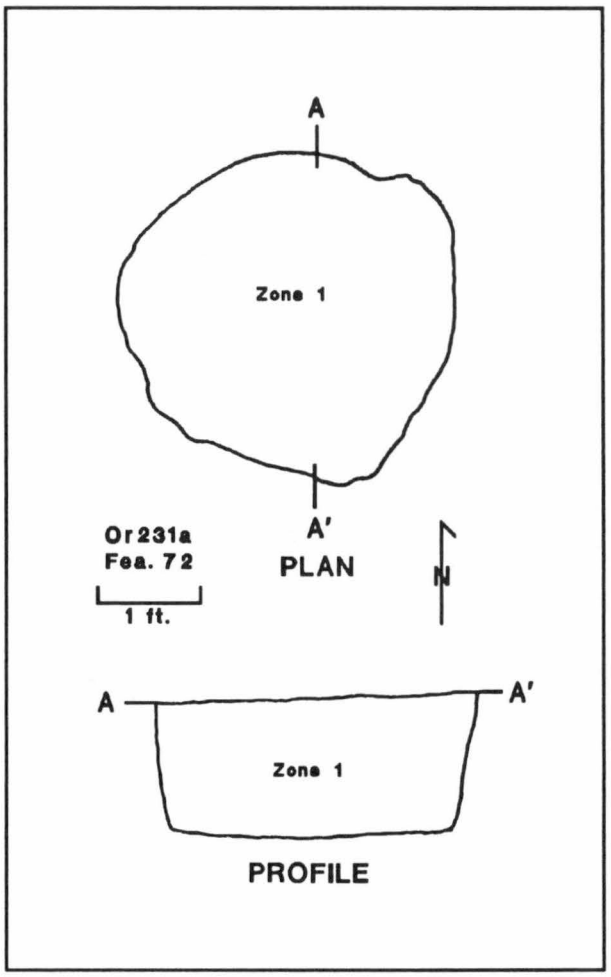

Figure 12.18. Feature 72, plan view and profile drawings.

glass trade beads and a complete, incised, aboriginal pipe bowl. After excavation, the pit measured 5.1 ft by 4.5 ft and extended to a depth of 1.8 ft below the subsoil surface (Figure 12.17). The bottom was flat and the slides sloped inward, creating an asymmetrical boat-shaped profile.

The size and configuration of the pit suggest that it was originally dug to serve as a storage facility. The fill and its contents represent a secondary deposition of general village refuse.

Feature 72

This storage pit was located immediately east of Feature 71 and contained fill that was similar in terms of color and texture. However, artifact content was not as dense nor as varied as that of Feature 71. After excavation, the pit measured 3.7 ft by 3.4 ft and was 1.4 ft deep (Figure 12.18). Although smaller than Feature 71, this feature also probably served as a storage facility and was re-filled with humus when it became unsuited for its primary function. Potsherds found in the fill suggest that this pit may date to the early Haw River phase.

Feature 73 (Burial 24)

This burial was located some two feet north of Feature 76 (Burial 21) and Feature 74 (Burial 23), and was aligned on an east-west rather than a southeast-northwest axis, as Burials 21 and 23 were. In outline, the pit was roughly rectangular on the subsoil surface and became more so as excavation progressed (Figure 12.19).

Two concentric fill zones were observed prior to excavation. The larger central matrix (Zone 1) was 0.5 ft thick, consisted of a dark grayish brown (10YR 3/2) loam, and contained a heavy concentration of carbonized wood fragments, a kaolin pipe fragment, a few animal bones, and potsherds. Surrounding and beneath Zone 1 was a yellowish brown (10YR 5/6) mottled clay (Zone 2) that was practically sterile. Zone 2 extended almost to the bottom of the pit. These zones seem to indicate a filling and settling sequence like that described below for Feature 74 (Burial 23).

Beneath Zone 2 and resting on the pit floor was a greenish, gray-brown stain that extended over the southern two-thirds of the pit. Zone 2 fill continued to the pit bottom in the northern one-third of the grave. Although this gray-brown stain, thought to represent burial remains, was carefully excavated, human bone was not encountered. Apparently, the stain was all that survived of the body. There were no associated

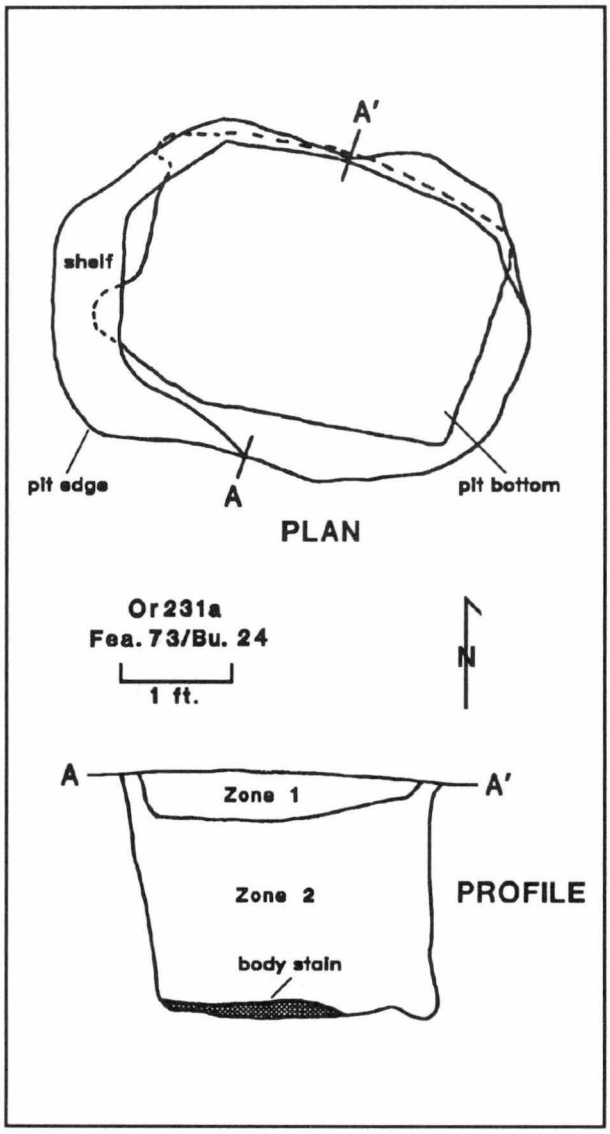

Figure 12.19. Feature 73 (Burial 24), plan view and profile drawings.

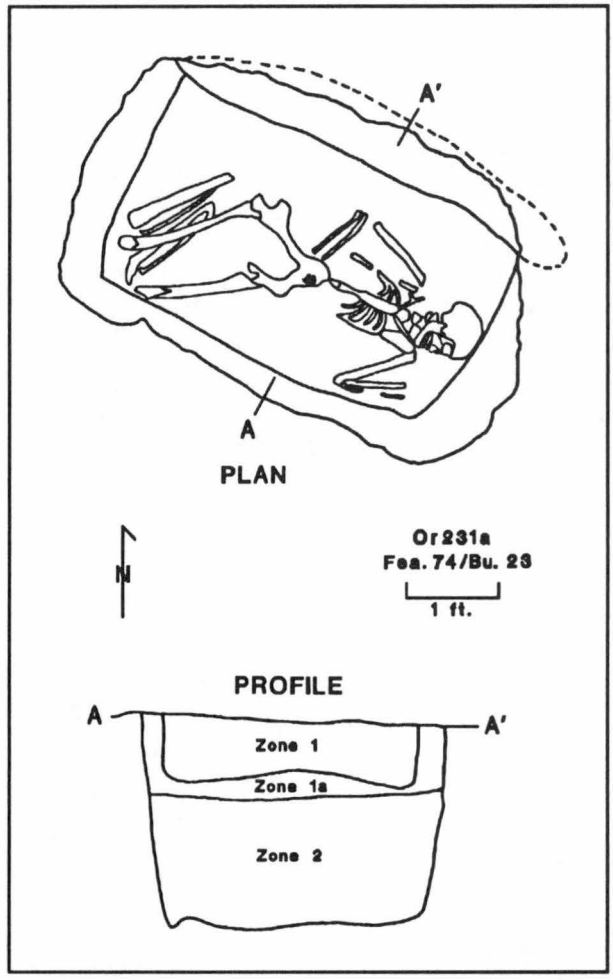

Figure 12.20. Feature 74 (Burial 23), plan view and profile drawings.

artifacts; however, like Burial 23, a trench dug along the northern wall may represent a chamber where perishable materials were placed. Given the size of the grave, we can only guess that it contained the body of a subadult.

The presence of a kaolin pipe fragment and a *Fredricks Check Stamped* potsherd in the fill indicate that this burial is associated with the Occaneechi occupation at the Fredricks site.

Feature 74 (Burial 23)

Burial 23 intruded slightly into the northwestern end of Feature 76 (Burial 21) and is also related to the Occaneechi occupation at the Fredricks site. In plan, the pit was defined by a dark grayish brown (10YR 4/3) loam (Zone 1) with a rim of dark yellowish brown (10YR 4/4) loam (Zone 1a) around all but the southeastern edge of the pit. Zone 1 extended to a depth of a little over 0.5 ft where Zone 1a was again encountered. This zone contained a few potsherds and small bone fragments, and reflects humus that slumped into the pit as the fill settled into the central burial chamber. Zone 1a was roughly 0.2 ft thick and produced even fewer artifacts. This zone probably reflects the bottom of the original fill that topped off the pit (i.e., the portion that had not been plowed out). Zone 2 lay beneath Zone 1a and filled the remainder of the pit. Zone 2 designated a loamy, brownish orange clay and was virtually sterile. Once excavated, the pit measured 5.4 ft by 3.3 ft and was 2.2 ft deep (Figure 12.20).

The skeleton was poorly preserved, but based on cranial features, it appeared to be that of a young adult female between 20 and 30 years old. The body was loosely flexed and lay on the left side. The head pointed to the southeast. The right arm rested on the pelvic area, while the left hand was drawn up toward the face. A dark organic stain beneath the body may indicate that it was wrapped prior to interment. No grave goods were present; however, a narrow trench, filled with dark organic soil, undercut the northeast

Figure 12.21. Feature 75, before excavation.

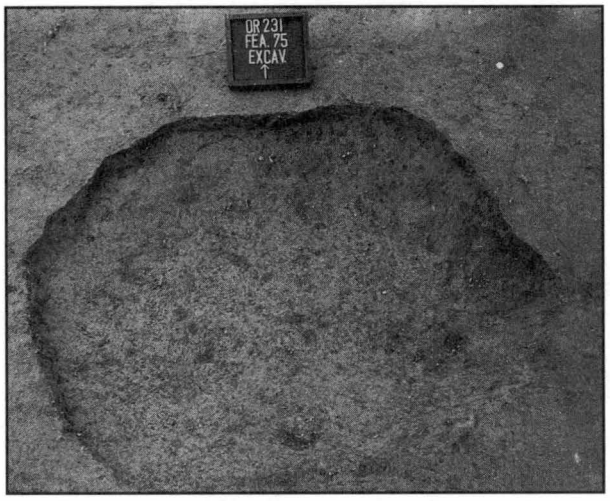

Figure 12.22. Feature 75, excavated.

wall of the pit and may have contained perishable items such as cloth or furs. A similar trench-like chamber was found in Burials 4 and 7 at the Fredricks site (Ward 1987:96, 99). Given the alignment of the burial, its spatial relationship to Burials 21, 24, and 25 (excavated in 1990) within a small cemetery area, and the configuration of the pit, this grave is also attributed to the Occaneechi occupation at the Fredricks site. Upon completion of the excavation, the human remains within this feature were carefully re-buried *in situ*.

Feature 75

This large shallow pit was located just north of the palisade in the central section of the excavation at 339L50.3 (Figure 12.21). The fill was comprised of a single zone of dark yellowish brown (10YR 3/4) loam, flecked with charcoal, that contained a large quantity of

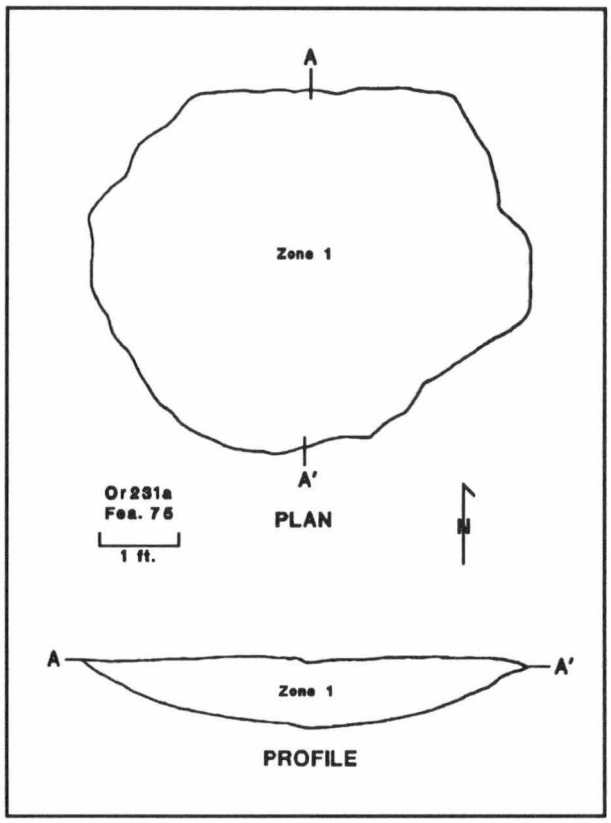

Figure 12.23. Feature 75, plan view and profile drawings.

animal bones (particularly deer and turtle). The bone, some of it charred, tended to be concentrated around the periphery of the pit. A pocket of dense yellow clay was observed in the southeastern corner of the feature. After the fill was removed, it measured 5.1 ft by 5.4 ft and extended to a depth of 0.9 ft below the subsoil surface (Figures 12.22 and 12.23). The inwardly sloping sides created a basin-shaped profile. This facility may have been used in food preparation activities. Perhaps the charred and uncharred animal residues reflect by-products of this primary function.

Feature 76 (Burial 21)

This burial pit, located next to Feature 74 (Burial 23) and just south of Feature 73 (Burial 24), was recognized as a rectangular stain of grayish brown loam mottled with yellow clay. The clay contained some charcoal and small fragments of burned bone. Comparatively speaking, the fill was not very rich. A large pocket of orange clay also was noted within the Zone 1 matrix. Zone 1 averaged 0.6 ft in thickness and extended across the upper portion of the pit. It lay atop Zone 2, a brown (7.5YR 4/6) mottled sandy clay that also contained few artifacts and was approximately 0.4 ft thick. Excavation of Zone 2 uncovered a shelf of subsoil that rimmed the pit, creating a central burial chamber. Beneath this zone, along the southwestern wall of the pit, a dark stain similar to Zone 1 was

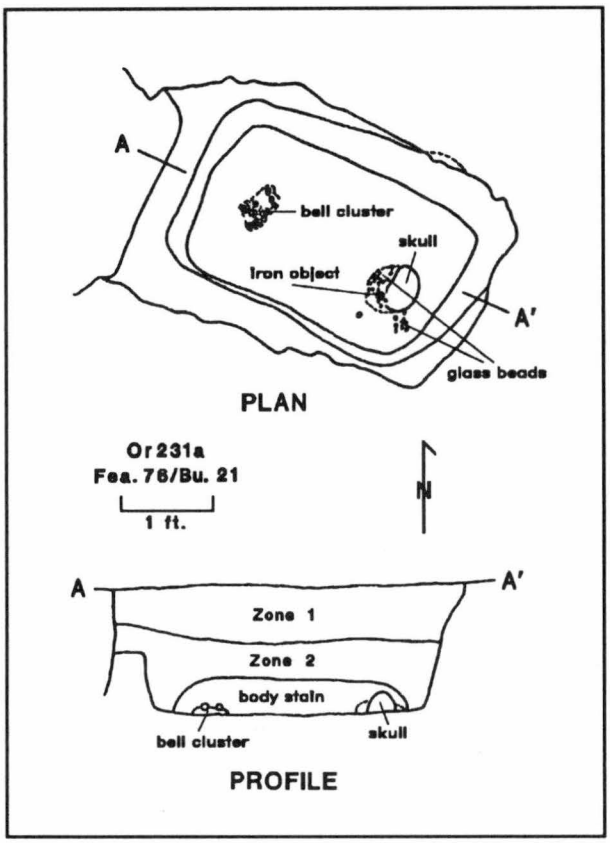

Figure 12.24. Feature 76 (Burial 21), plan view and profile drawings.

recognized. This stain was derived from the organic remains of the body and covering material. Zone 2 continued to the bottom of the pit in the northern section.

Excavation of the area of body stain uncovered the poorly preserved remains of a juvenile 10–15 years old at the time of death (Figure 12.24). The cranium was oriented to the southeast and lay on the left side. Other than teeth, this was the only intact bone remaining. Several *Cornaline de Allepo* beads, in a necklace-like configuration, ran from the frontal area to the base of the cranium. One white and two blue barrel-shaped beads also were in this cluster along with a cylinder-shaped iron object. At the opposite end of the pit was a cluster of 10 flush-loop brass bells attached to a beaded leather fabric, perhaps the remnant of trousers (Figure 12.25). White seed beads predominated with a few small turquoise beads also interspersed in rows sewn onto the leather. Contact with the brass bells also preserved small fragments of the bark or mat covering used to wrap the individual prior to interment. Because of poor bone preservation, the remains and associated artifacts were documented *in situ*, and the grave was carefully refilled. The pit measured 3.8 ft by 2.8 ft and was 1.3 ft deep.

The shape and orientation of the pit, as well as its central shaft-and-chamber configuration, indicate that

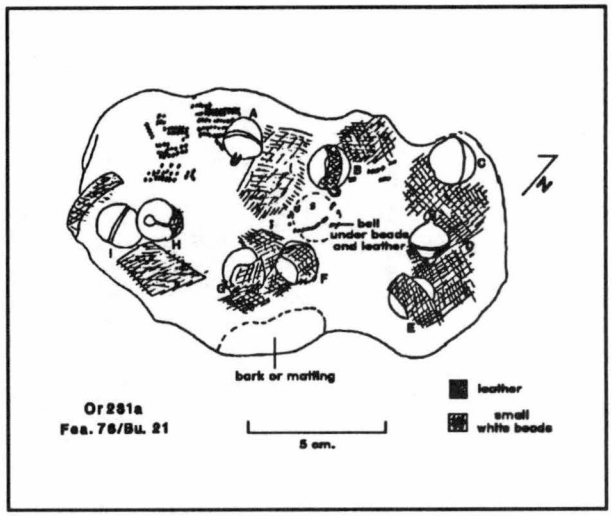

Figure 12.25. Feature 76 (Burial 21), cluster of bells.

this burial dates to the Fredricks rather than the Jenrette site occupation. This temporal assessment is further supported by the associated trade materials and the presence of a *Fredricks Check Stamped* sherd in the fill. The flush-loop bells and particularly the *Cornaline de Allepo* beads have been found only in late seventeenth-century contexts in the North Carolina Piedmont. Burials 21, 23, 24, and 25, and possibly other yet undetected burials, represent a second cemetery associated with the Occaneechi village and lend further support to the existence of social fragments living together in this small village compound ca. A.D. 1700.

Feature 77

Feature 77, located within the habitation area of the village just south of Feature 98, represents a storage facility. It was filled with a single zone of dark yellowish brown (10YR 3/6) loam that contained a high concentration of cultural materials, including potsherds, animal bones, charcoal, and stone tools and debris (Figures 12.26 and 12.27). Of particular note were a ground stone metate, a bone beamer, and two worked antler fragments. Two large, flat, unmodified stones lay beneath the metate. In addition, several large fire-cracked rock fragments were distributed around the periphery of the pit. Feature 77 measured 2.7 ft in diameter after excavation, and the generally straight pit walls intersected a flat bottom at a depth of 1.8 ft (Figure 12.28). After being no longer suited for its original purpose, the storage facility was rapidly filled with domestic refuse.

Feature 78

This feature, located southwest of Feature 75 and just inside the palisade, presented the best evidence for the interpretation of the large shallow basins at the Jenrette site as food preparation facilities. Two very distinct fill zones were recognized. Zone 1 was a dark

Figure 12.26. Feature 77, before excavation.

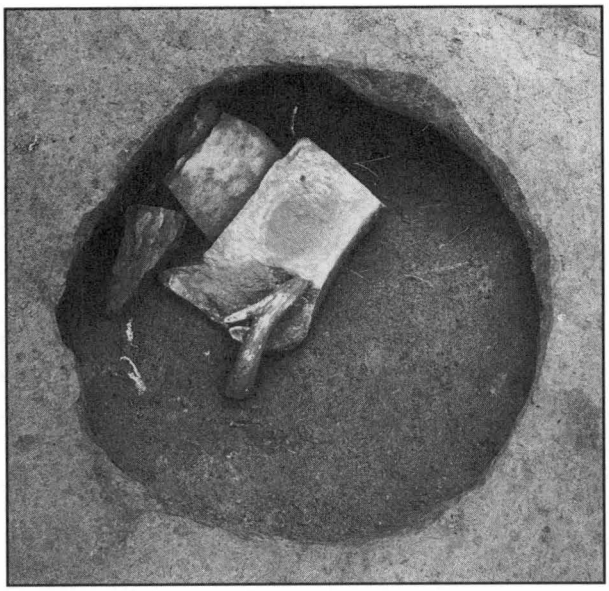

Figure 12.27. Feature 77, partially excavated with rocks, metate, and worked antler exposed.

reddish brown (5YR 3/3) silty loam that produced several animal bones, some potsherds, charcoal, and fist-sized fire-cracked rocks. Zone 2 consisted of a dark greenish brown (10YR 3/3) ash lens that covered the bottom of the feature. While removing Zone 2, a broken rim of intensively fired, red (2.5YR 5/8) clay was encountered near the center of the pit. The fired clay and the ashy fill surrounding it reflect residue from fires built to cook food in the "earth oven." Zone 1 consisted of organically rich refuse that resulted from the consumption of this food. Both zones were thin, as

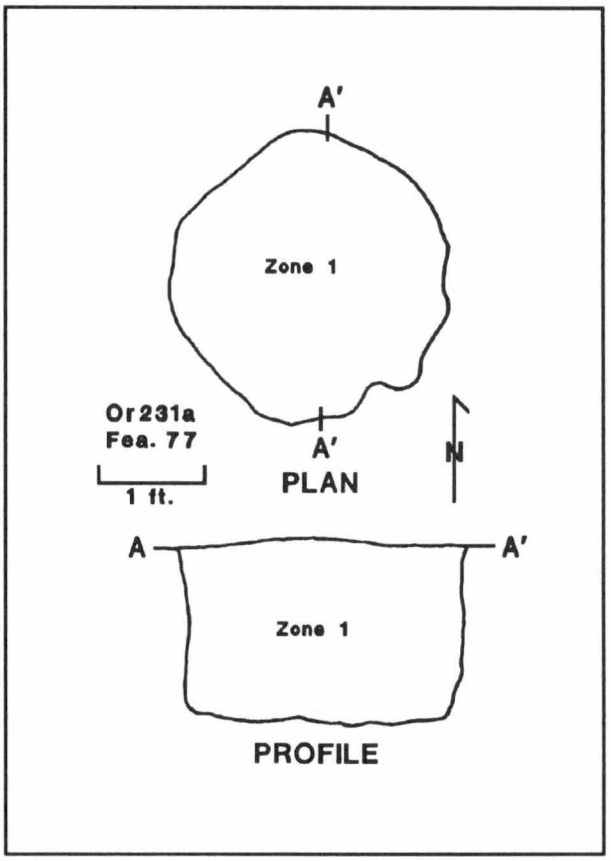

Figure 12.28. Feature 77, plan view and profile drawings.

the feature was a little less than 0.5 ft deep at its deepest point. In plan, however, it measured 6.1 ft by 5.0 ft.

Feature 79

This storage facility was located just outside the palisade and immediately west of Feature 80 (Burial 22). On the subsoil surface, it was defined by a nearly circular stain of dark reddish brown (5YR 3/4) loam that contained numerous animal bones, charcoal, and fragments of fired clay. Potsherds, mussel shells, fire-cracked rocks, and glass beads also were recovered. Most notable, however, was the well-preserved condition of the animal bones, primarily deer. The fill attributes recognized on the surface characterized the pit contents throughout. After excavation, it measured 2.6 ft in diameter and extended to a depth of 2.0 ft. The walls were straight and the bottom was flat (Figure 12.29). Feature 79 originally served as a storage facility that later was rapidly filled with debris from food preparation and consumption activities.

Feature 80 (Burial 22)

This classic shaft-and-chamber burial was located just outside and adjacent to the palisade, some 30 ft north of the Occaneechi burials associated with the Fredricks site. On the subsoil surface, the pit appeared

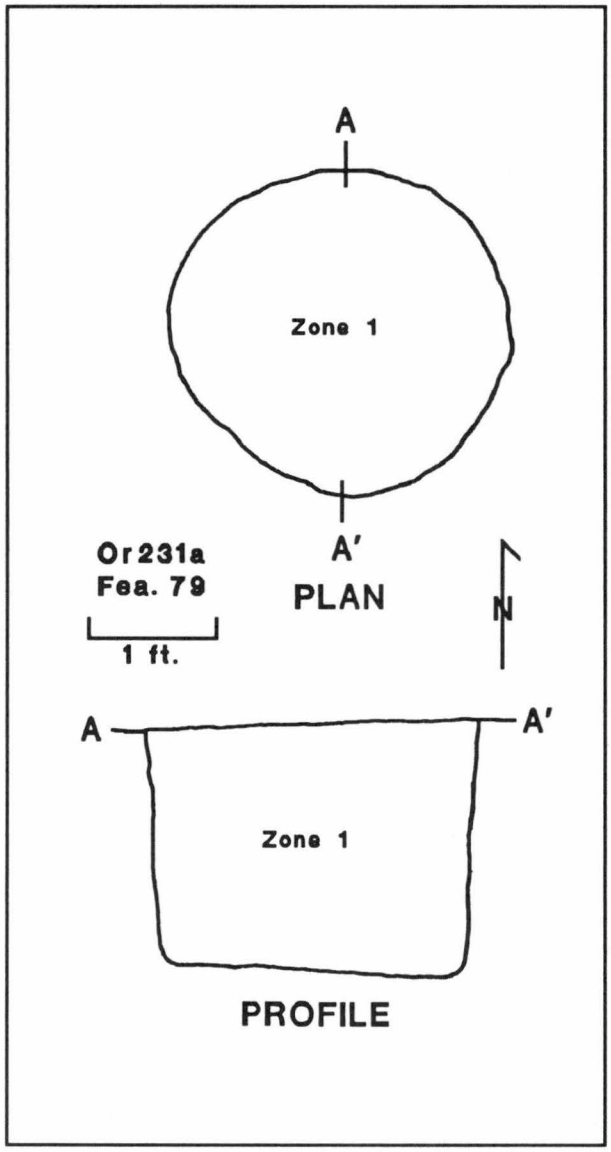

Figure 12.29. Feature 79, plan view and profile drawings.

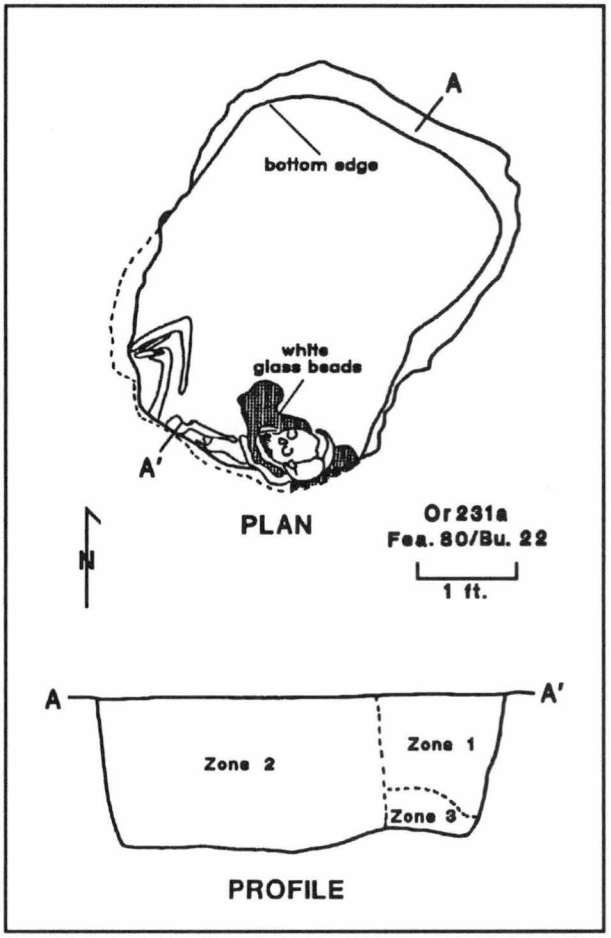

Figure 12.30. Feature 80 (Burial 22), plan view and profile drawings.

as an irregular rectangular stain comprised of two very distinct fill zones. The southwestern half, designated Zone 1, was a dark brown (7.5YR 3/2) sandy loam that contained several animal bones, some pottery, and charcoal. In contrast, the northeastern half of the stain (Zone 2) was a mottled brownish orange (7.5YR 4/6) clay that contained relatively little cultural material. A thin ribbon of intermediate soil ran between the two zones. Based on previous experience with shaft-and-chamber burials, it was suspected that Zone 1 reflected midden-like soil that had settled over the collapsed burial chamber. Zone 2, on the other hand, reflected original subsoil clay removed when the grave was dug and then used to refill the shaft after the body was placed in the chamber. These suspicions were borne out during the course of the excavation. A final zone, designated Zone 3, was recognized beneath Zone 1 and consisted of a yellowish brown (10YR 5/6) sandy clay that represented the original fill placed atop the body within the chamber. After excavation, the pit measured 4.0 ft by 3.0 ft and extended to a depth of 1.6 ft beneath the subsoil surface (Figure 12.30).

The loosely flexed skeleton of a juvenile approximately 10–12 years of age lay on the bottom of the chamber. The head was pointed to the southeast and the body positioned on its right side. An amorphous mass of very small, white, glass seed beads mixed with a few small shell beads was uncovered in the chest area. A few beads also were present around the top of the skull and probably extended under the skull to connect with the mass in the chest area. In all likelihood, these were sewn onto a burial garment. No other artifacts were associated with the burial. Given that little additional information could be gleaned because of the poor state of bone preservation, the skeleton and associated artifacts were left undisturbed and the grave was carefully refilled. The grave goods (i.e., the white glass seed beads), the configuration of the shaft-and-side chamber pit, ceramics from the fill, and its location all point to this individual being associated with the mid-seventeenth century Jenrette phase occupation of the site.

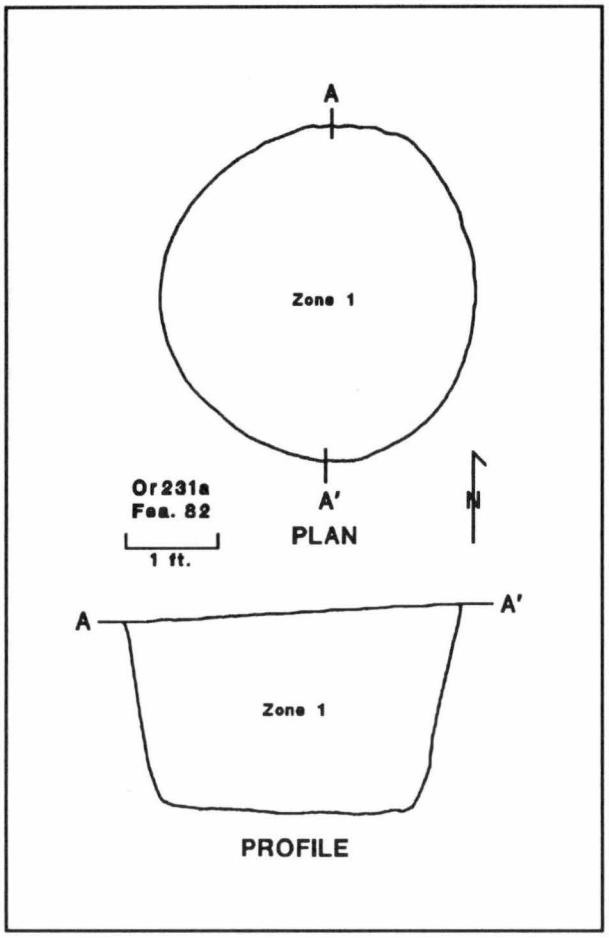

Figure 12.31. Feature 82, plan view and profile drawings.

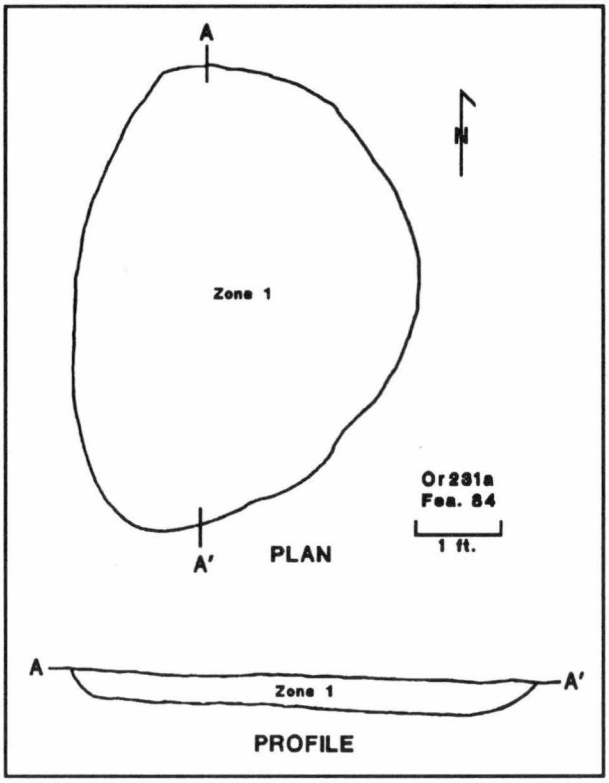

Figure 12.32. Feature 84, plan view and profile drawings.

Feature 81

This designation was assigned to a large irregular depression intruded by Feature 65. Excavation was terminated after it was determined that the feature probably represented a tree-fall disturbance. A small amount of cultural material was recovered that reflects fortuitous inclusions that naturally accumulated in the hole. The pottery contents of this feature indicate that it postdates the early Haw River phase but is earlier than the Jenrette phase.

Feature 82

This large storage pit was located outside the palisade near Burials 21, 23, and 24. The fill consisted of a single zone of dark yellowish brown (10YR 4/4), sandy soil heavily mottled with lighter yellowish brown soil. Although large and clearly defined, Feature 82 produced very little cultural material. Excavation revealed a nearly circularly facility that measured 3.7 ft by 3.4 ft and was 2.3 ft deep. The pit walls sloped inward slightly and the bottom was flat (Figure 12.31). After being abandoned as a storage facility, the pit was rapidly filled with relatively sterile soil collected away from areas of significant domestic activity. The few artifacts (particularly pottery) from this pit suggest that it is associated with the early Haw River phase occupation of the nearby Hogue site.

Feature 83 (Burial 25)

This number was assigned to a stain that extended into the L70 profile in the southwest corner of the excavation and was not excavated in 1989. During the 1990 fieldwork, it was exposed and excavated. This feature represents a fourth Occaneechi burial contained within the small cemetery that also includes Burials 21, 23, and 24. Burial 25 contained the poorly preserved remains of a juvenile and was accompanied by a crushed *Fredricks Check Stamped* pot (see Figure 12.58) and a badly corroded pewter smoking pipe.

Feature 84

Feature 84 was located just inside the palisade near the western edge of the 1989 excavation (Figure 12.32). It was a large shallow basin that probably was used in food preparation, serving a function similar to that described for Features 65, 75, and 78. The fill consisted of a single zone of dark grayish brown (10YR 3/2), silty loam that contained burned and unburned animal bones, charcoal, fire-cracked rock, and several large potsherds. Most of the cultural debris was concentrated in the east-central section of the basin. Also noted in the same area were flecks of fired clay and a pocket of brown ashy soil. After removing the fill, the feature measured 5.5 ft by 4.0 ft

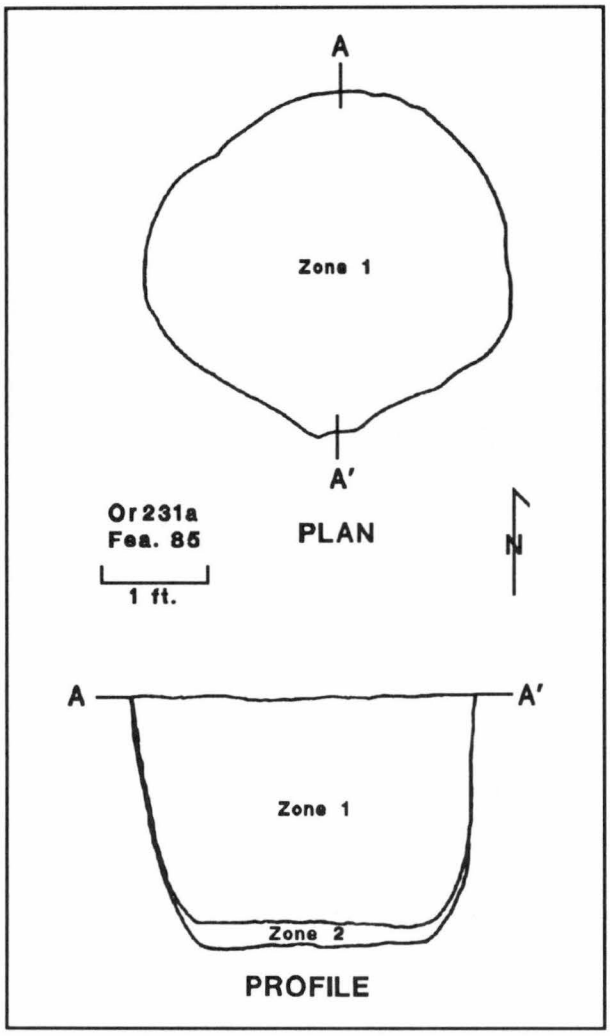

Figure 12.33. Feature 85, plan view and profile drawings.

and was 0.4 ft deep. Given its configuration and fill characteristics, Feature 84 was probably utilized as an "earth oven" or similar food preparation facility.

Feature 85

This large storage pit was situated just north of Feature 84 and west of Feature 70. It contained two fill zones. Zone 1 defined a dark reddish brown (5YR 3/3) sandy loam that contained few artifacts but a relatively large amount of charcoal, some of which was concentrated in pockets. Several glass beads also were retrieved. Zone 1 extended 2.1 ft below the pit surface and rested atop Zone 2, a nearly sterile yellowish brown (10YR 4/4) loam. This zone was only 0.2 ft thick and may represent a band of illuviated organic material from Zone 1. After excavation, Feature 85 averaged 3.4 ft in diameter and extended to a depth of 2.3 ft (Figure 12.33). The walls sloped inward slightly at the bottom which was flat.

Feature 86

This designation was assigned to a 1.5 ft in diameter

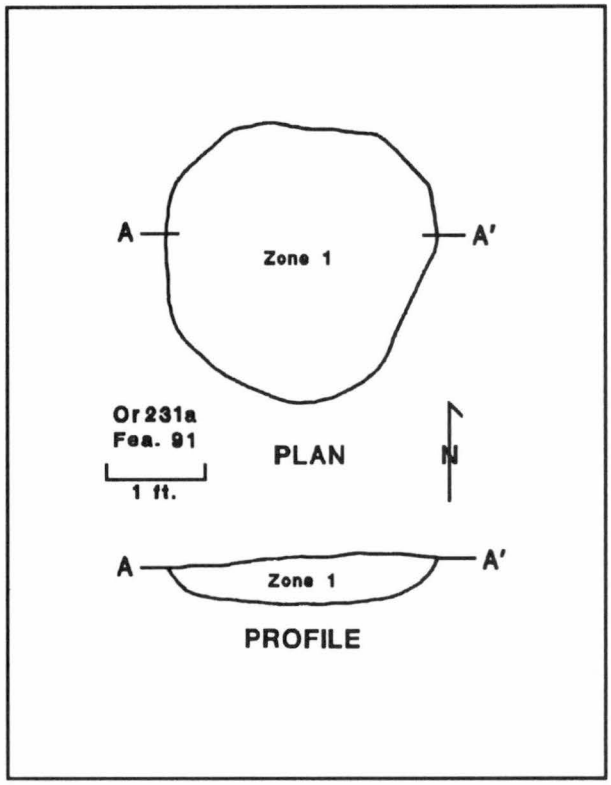

Figure 12.34. Feature 91, plan view and profile drawings.

disturbance that resulted from the decomposition of a tap root. Except for the presence of two small potsherds, the fill was sterile.

Features 87, 88, 89, 90, and 91

These features represented shallow, circular basins in the central area of the excavation that extended in a slight arc from 349L39 to 367L45. They were roughly circular in plan and ranged from 1.4 ft (Feature 88) to 2.8 ft (Feature 91) in diameter (Figure 12.34). Their fill was nearly identical, consisting of a dark brown (10YR 4/4) loam mottled with orange clay. Maximum depth below the subsoil surface ranged from 0.2 ft (Features 87, 88, and 89) to 0.5 ft (Feature 91). Other than a few small bone fragments and pottery sherds, no artifacts were recovered. It is difficult to reconstruct the original purpose of these features. Schroedl (1980) has suggested that similar basin-shaped pits found at Overhill Cherokee towns resulted from clay borrowing activities. Perhaps, or they may simply indicate small depressions that filled with village humus and escaped the plow.

Feature 92

As observed at the subsoil surface, this pit appeared to be a human burial. In plan, two fill zones were recognized: Zone 1, a brown (7.5YR 4/6) loam mottled with orange clay; and Zone 2, an orange (10YR 3/6) clay that was lighter than the surrounding

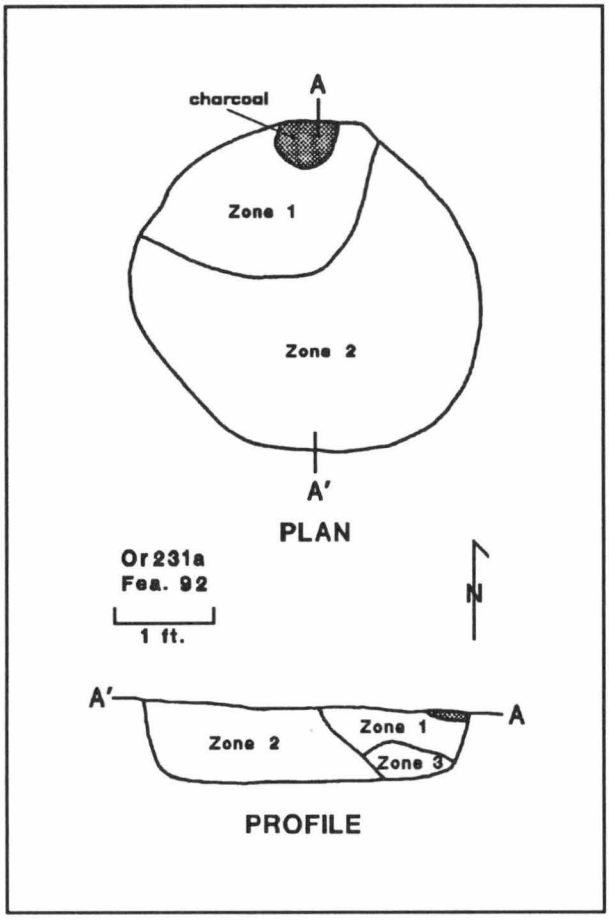

Figure 12.35. Feature 92, plan view and profile drawings.

subsoil. A similar soil configuration had been observed elsewhere in shaft-and-chamber burials, with the body chamber being represented by the darker soil that slumped after the chamber collapsed. Zone 2 soil continued beneath Zone 1 in the central portion of the pit; however, Zone 1 changed to a strong brown (7.5YR 5/6) loam (designated Zone 3) toward the north side of the pit. None of these fill zones contained many artifacts. After excavation, the pit measured 3.6 ft in diameter and was 0.8 ft deep (Figure 12.35). Slightly insloping walls created a boat-shaped profile. The lack of artifacts in the fill and the pit structure strongly suggest that it was a grave, perhaps of a child. The darker organic soil comprising Zone 3 may be all that remained of the body.

Feature 93

This designation was assigned to an amorphous soil discoloration located just south of Feature 66. Excavation revealed a tree disturbance with a pointed tap root. It measured 2.5 ft by 2.0 ft and the tap root extended to a depth of 1.8 ft. This configuration suggests a secondary sere species such as yellow pine. Small bits of charcoal indicate that the tree may have burned, whereas an absence of artifacts in the matrix suggests that the cavity was filled before the site was occupied.

Feature 94

This relatively small pit was located in the southeastern section of the excavation, outside the palisade. The single fill zone was a dark brown (7.5YR 3/4) loam with charcoal fragments. Except for a few net-impressed potsherds and a single projectile point, few artifacts were recovered. Excavation revealed a pit measuring 1.8 ft in diameter with slightly insloping walls that extended to a depth of 0.9 ft beneath the subsoil surface. Because size would seem to preclude its use as a storage facility, the function of this pit is problematic. Ceramics from the fill point to it's use during the Haw River phase.

Feature 95

Located in the north-central area of the 1989 excavation, just inside the palisade, were two large, intersecting, basin-shaped pits—Features 95 and 96. Feature 95 was earlier, having been intruded by Feature 96. The fill in this shallow basin consisted of two zones: Zone 1, a dark brown (10YR 3/3) loam rich in cultural material, particularly animal bone; and Zone 2, a brown (10YR 4/3) mottled clay fill that was relatively sterile. Zone 1 fill was restricted to a thin lens in the center of the feature, whereas Zone 2 fill formed a collar around the periphery of the basin. Zone 2 also contained some ashy pockets with charcoal and fired clay. Feature 95 appears to represent another large food preparation facility, similar to the "earth ovens or roasting pits" previously described. Zone 1 may reflect secondary refuse deposited after the facility was no longer being used, perhaps as part of the same dumping episode responsible for the filling of Feature 96. Feature 95 measured 5.5 ft by 4.5 ft and was 0.5 ft deep (Figure 12.36).

Feature 96

Feature 96 was slightly smaller than Feature 95 in plan but was twice as deep. Its fill consisted of a single matrix of extremely rich, dark brown (10YR 2/2) loam replete with animal bones, broken pottery, mussel shells, charcoal, and other refuse (Figure 12.37). Of particular note were a large number of deer bones along with some turtle carapaces and plastrons. In the southeastern corner of the pit, a concentration of deer antlers and crania were uncovered. After the fill was removed, the pit measured 4.6 ft by 3.9 ft and was a little over 1.0 ft deep in the center (Figures 12.38 and 12.39). The sides sloped inward to create a basin-shaped profile. Feature 96 was probably created as a replacement facility for Feature 95. The culturally rich refuse used to fill the feature may have been derived from feasting activities associated with its primary function—food preparation.

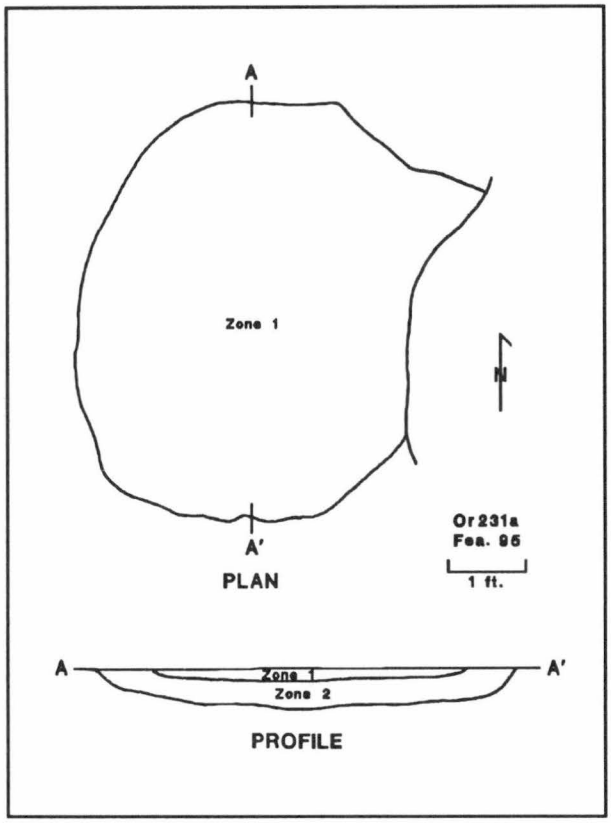

Figure 12.36. Feature 95, plan view and profile drawings.

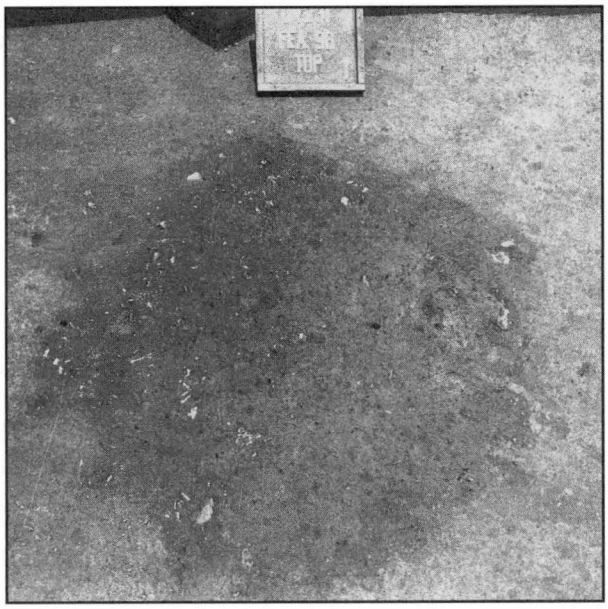

Figure 12.37. Feature 96, before excavation.

Feature 97

This designation was assigned to a stain that extended into the L10 profile within Sq. 340L10 and was not excavated.

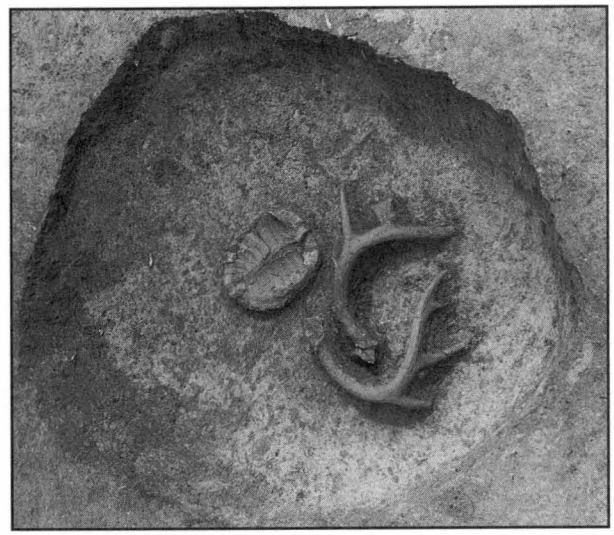

Figure 12.38. Feature 96, excavated.

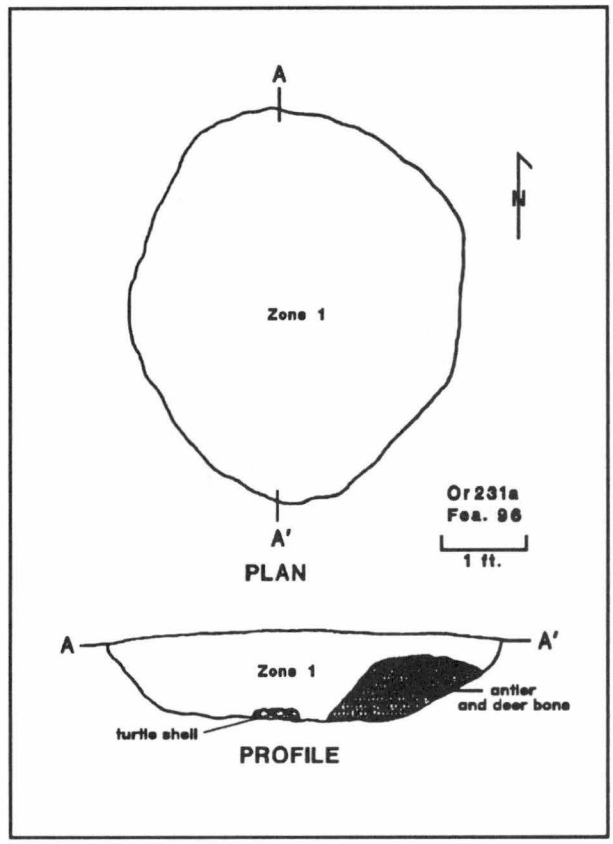

Figure 12.39 Feature 96, plan view and profile drawings.

Feature 98

This large, nearly circular, storage pit was located in the central portion of the excavation (Figure 12.40). Most of the fill (Zone 1) was comprised of a dark brown (10YR 3/3) silty loam that contained some potsherds, a few animal bones, peach pits, and glass trade beads. It was not exceptionally rich in cultural remains. Zone 2 was described as a yellowish brown

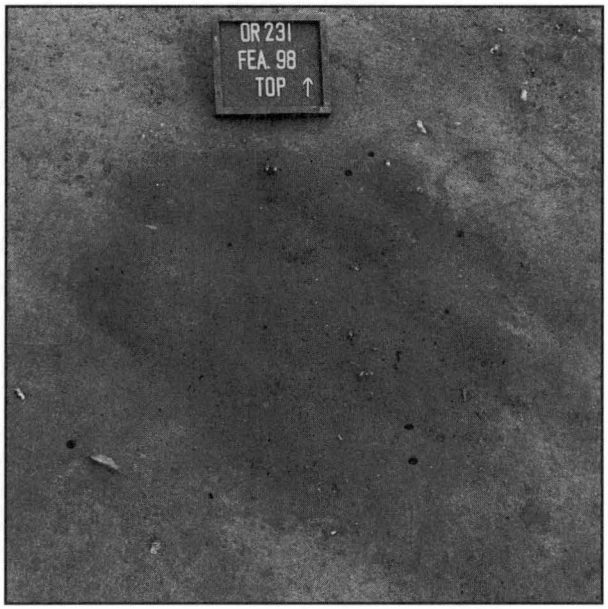

Figure 12.40. Feature 98, before excavation.

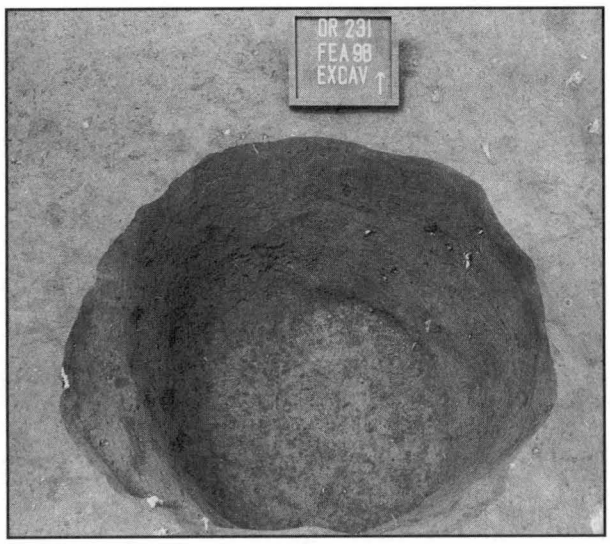

Figure 12.41. Feature 98, excavated.

(10YR 4/4) sandy clay and probably represented a zone of percolation at the interface between the pit bottom and the subsoil. This layer contained no artifacts and averaged only about 0.2 ft in thickness. Once excavated, the pit measured 3.7 ft by 3.9 ft in plan and was 2.5 ft deep (Figures 12.41 and 12.42). The pit walls gradually sloped inward at the bottom. The feature originally served as a storage or caching facility that appears to have been rapidly filled with village topsoil after it was no longer suited for its primary function.

Feature 99

This storage facility was located a few feet west of

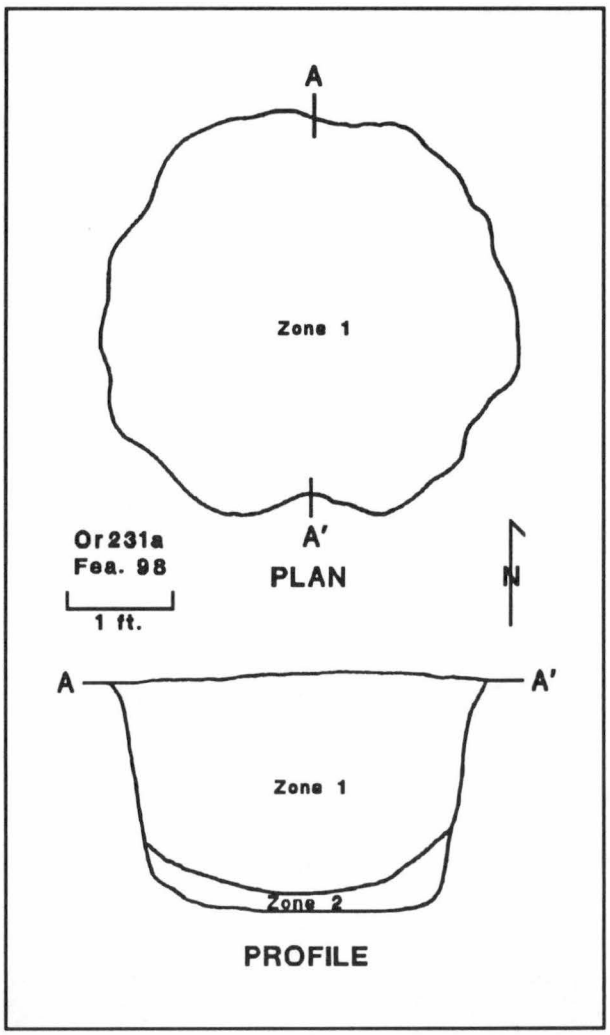

Figure 12.42. Feature 98, plan view and profile drawings.

Feature 98. The fill consisted of two zones of brown loam mottled with orange clay. Zone 1 was a dark yellowish brown (10YR 4/6) loam with some clay, whereas Zone 2 was a dark reddish brown loam with very little clay. Zone 1 extended to a depth of approximately 1.0 ft and contained a thin lens of mottled clay that covered the eastern half of the pit to a depth of 0.4 ft below the subsoil surface. Most of the artifacts from Zone 1 were recovered beneath the clay lens. Zone 2 fill continued to the bottom of the pit and contained a richer assortment of cultural materials, including animal bones, potsherds, and glass trade beads. The two fill zones may indicate that the pit was first the receptacle for domestic refuse and then topped off with village humus and clay. This suggests that refilling was done quickly and that the pit did not remain open for a long period of time. If garbage was handy, it was thrown in. If it was not, nearby soil, perhaps derived from digging a replacement facility, was used to completely fill the pit after it was no longer needed. After excavation, Feature 99 measured 3.1 ft by 2.8 ft and was 1.9 ft deep (Figure 12.43).

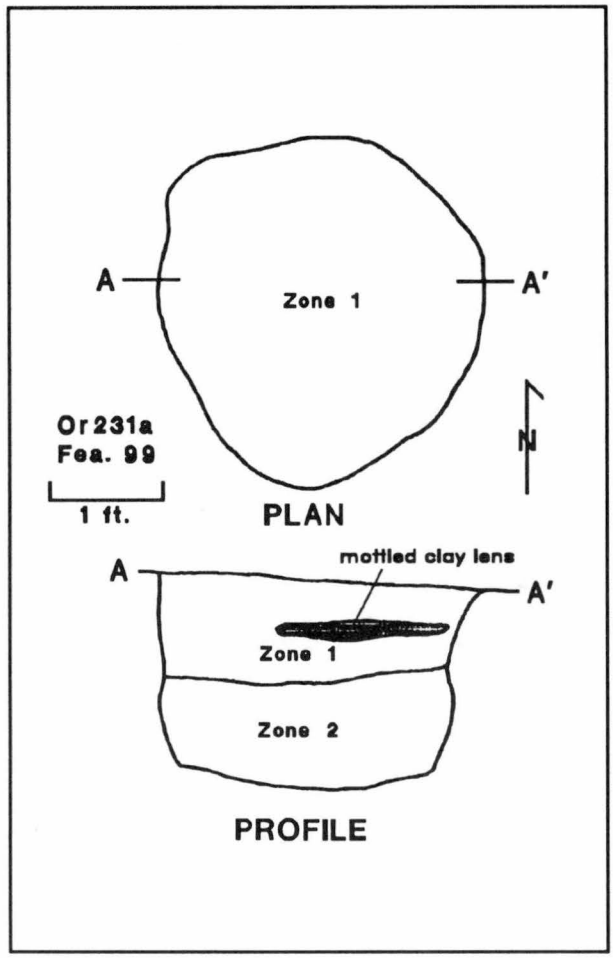

Figure 12.43. Feature 99, plan view and profile drawings.

Features 100 to 112

These numbers were assigned to features uncovered in the eastern section (designated RLA-Or231b) of the Hogue site.

Feature 113

This shallow basin was located north of Features 95 and 96, near the palisade line. It contained two thin zones of fill: Zone 1, a dark reddish brown (5YR 3/3) loam that contained ash, charcoal, and charred corncobs; and Zone 2, a dark reddish brown (5YR 3/4) sandy loam mottled with orange clay. The feature measured 2.0 ft by 2.4 ft in plan and was 0.6 ft deep at its deepest point. Its size, configuration, and the presence of charcoal and charred corncob fragments suggest it may have served as a smudge pit. This interpretation is further supported by the feature's location close to the palisade and away from the main habitation area.

Feature 114

This small pit was located a few feet northeast of Feature 113, just outside of the palisade. A single fill zone of brown (10YR 4/3) loam contained several corncob fragments and wood charcoal. The conical pit measured 1.5 ft in diameter and was 0.9 ft deep. Feature 114 also appears to have been a smudge pit.

Feature 115

This number was assigned to a circular stain that intersected the western profile of the inset excavated to fully uncover Feature 84. Because it continued under the inset profile, the feature was not excavated.

Feature 116

This designation was assigned to the bottom of a large burned post. It measured 0.8 ft in diameter and was only 0.2 ft deep.

Feature 117

This number was assigned to a stain that extended beyond the L10 profile in Sq. 360L10. It was not excavated.

Feature 118

Excavation revealed this feature to represent the remains of an old tree stump. Once this interpretation became evident, excavation ceased.

Feature 119

This number designates a pit that intruded the excavation profile at 370L60. Although not excavated in 1989, it was re-exposed and excavated in 1990.

Feature 120

Feature 120 was located in the eastern corner of Structure 1. It was an oval storage facility that contained a single zone of dark brown (10YR 3/4) loam. A moderate amount of cultural material was present, including potsherds, poorly preserved animal bones, and glass trade beads. Compared to other storage facilities at the site, Feature 120 was relatively shallow, extending only 1.3 ft beneath the subsoil surface. In plan, it measured 3.1 ft by 2.7 ft. The sides sloped inward to intersect a nearly circular bottom. The pit was filled by a single dumping episode using topsoil from the habitation area (Figure 12.44).

Feature 121

This shallow basin was located just outside the northern corner of Structure 1. On the subsoil surface, it appeared as a circular stain of dark brown (10YR 3/3) loam with flecks of charcoal and fired clay. This fill zone contained few artifacts. After excavation, Feature 121 measured 3.0 ft in diameter and the sides sloped inward to a maximum depth of 0.6 ft near the pit center (Figure 12.45). As with most of the small shallow basins, it is difficult to discern its primary function. Perhaps this feature represents a clay borrow pit used in the construction of Structure 1.

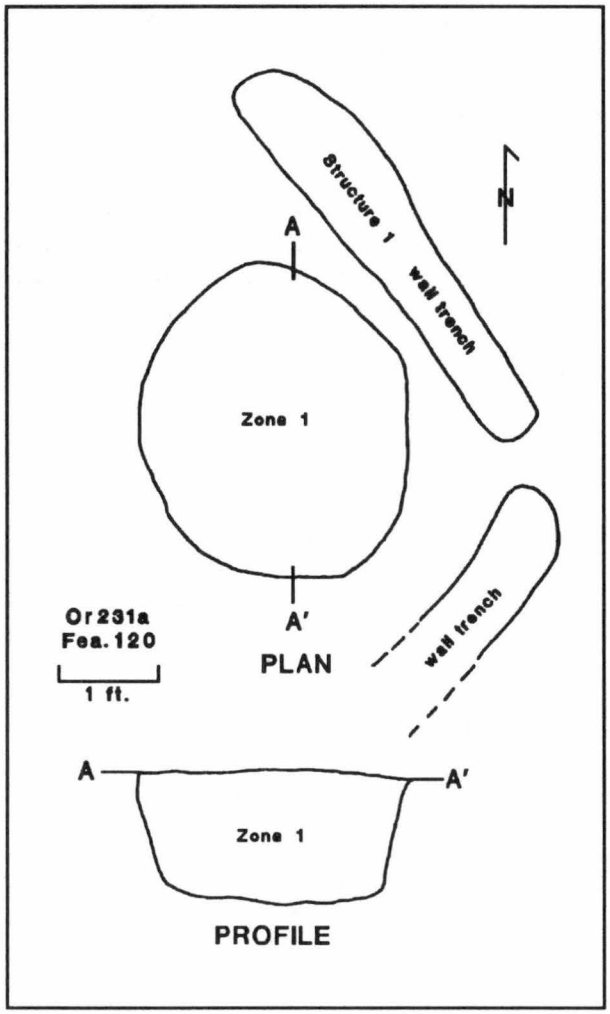

Figure 12.44. Feature 120, plan view and profile drawings.

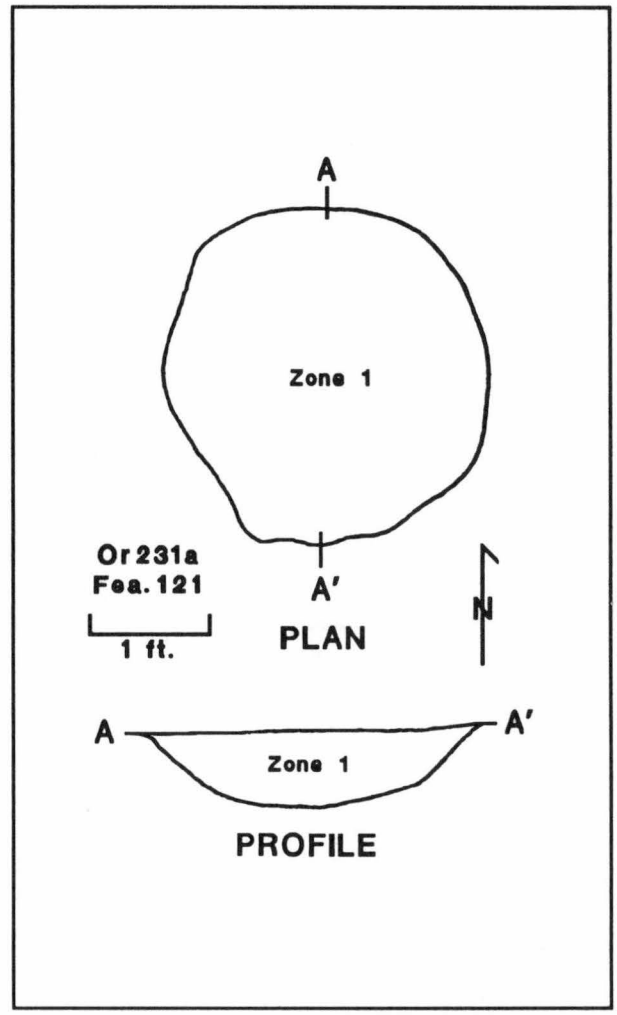

Figure 12.45. Feature 121, plan view and profile drawings.

Feature 122

Although this feature was described in the field as a storage pit that was subsequently filled with refuse, the composition of the fill as well as its size and shape suggest that it probably served as a food preparation facility, similar to the other large basins located along the palisade (e.g., Features 65 and 75). Located just north of Feature 121, the pit measured 3.7 ft by 4.6 ft and was 1.3 ft deep (Figures 12.46, 12.47, and 12.48). The fill consisted of a single zone of dark grayish brown (5YR 3/3) loam that was rich in cultural debris, and contained numerous potsherds, animal bones, fire-cracked rocks, and mussel shells. Several pockets of ashy soil, wood charcoal, and burned corncob fragments also were noted near the bottom of the pit. Feature 122 represents an "earth oven" or roasting pit refilled with food refuse, soil, and ash created during the food preparation process, perhaps in association with an occasion of ceremonial feasting.

Feature 123

This storage facility was located inside Structure 1 adjacent to the northwest wall. In most respects it was like Feature 120 which also was situated within the structure. The dark brown (2.5YR 3/2) loamy fill contained relatively few artifacts, suggesting that it was derived from village humus rather than refuse from intense domestic activities such as food preparation or cleaning. After excavation, the pit measured 3.1 ft by 2.9 ft and was 1.3 ft deep, the same depth of Feature 120. The walls bowed out slightly near the bottom to create a bell-shaped profile.

Features 124 and 125

These two small pit were located adjacent to one another near the west corner of Structure 1. Both were approximately 1.5 ft in diameter and contained very little cultural material. The fill in both instances was a yellowish brown (10YR 3/4) loam. Feature 124 was basin-shaped and extended to a maximum depth of only 0.4 ft. Feature 125 was deeper, 1.1 ft, and had fairly straight sides and a slightly concave bottom. Ceramic evidence suggests that Feature 125 dates to the early Haw River phase, whereas Feature 124 dates to the

Figure 12.46. Feature 122, before excavation.

Figure 12.47. Feature 122, excavated.

Jenrette phase and is associated with Structure 1.

Summary

Features excavated at the Jenrette site in 1989 consisted of 11 storage facilities, seven roasting pits or earth ovens, four burial pits, two smudge pits, four tree disturbances, two possible burials without preserved human remains, and several small shallow basin-shaped pits. These latter features may represent nothing more than the remnants of naturally formed depressions, or they may have resulted from clay mining activities. Most features were associated with the mid-seventeenth

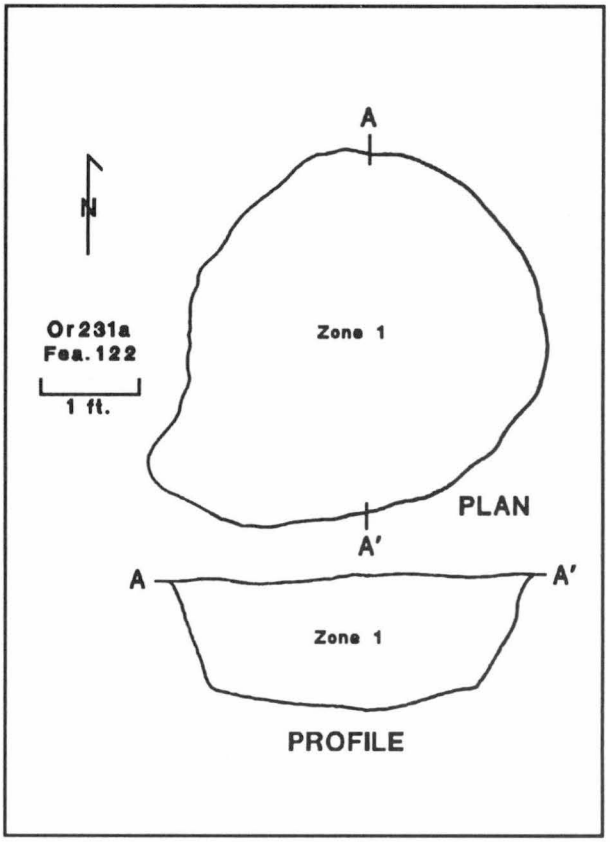

Figure 12.48. Feature 122, plan view and profile drawings.

century Jenrette phase component at the site.

As with other protohistoric and Contact period sites investigated during the course of the project (e.g., Edgar Rogers, George Rogers, Lower Saratown, and William Kluttz), the facilities interpreted as food preparation facilities contained rich deposits of food remains, ash, charcoal, and fire-cracked rocks. The large amounts of food refuse as well as other domestic debris found in these features point to their functioning within the context of communal activities, perhaps feasting associated with renewal or mortuary rituals.

The storage facilities were similar in size and shape to those found throughout the Siouan area. These pits probably served the dual purpose of curating food and other resources, as well as concealing valuables whenever the village was abandoned by large segments of the resident population (cf. DeBoer 1988; Ward 1985). Some of the storage pits were refilled with topsoil or village humus, lacking large amounts of cultural debris. Other pits were filled with deposits rich in food remains and other domestic refuse, similar to the fill contained in the earth ovens. In either case, the pits were rapidly filled once they were no longer needed for their primary purpose. Contrary to recent speculations by Whyte (1988), it is unlikely that these large pits were left open to ensnare turtles, frogs, and other unwary creatures.

We suggest that storage facilities were probably

inspected at regular intervals coinciding with annual rituals similar to the Busk ceremony celebrated by Indians throughout the southeastern United States. These renewal rituals also required that houses be cleaned, new fires lighted, and old, useless belongings disposed of. These ceremonies were celebrated with feasts that sometimes lasted several days. Those pits that were found to be no longer suited for storage were quickly filled with the refuse generated by these renewal activities. And if there was not sufficient garbage to top off the pits, they were quickly filled with topsoil. In some cases, soil removed in the preparation of new pits may have been dumped in recently abandoned facilities.

Three of the four definite human graves were associated with the later Occaneechi occupation at the Fredricks site. The single Jenrette phase burial was similar to the Lower Saratown burial that dates to the same general time period. Also a subadult, this burial contained numerous small glass "seed" beads typical of the ornaments that often accompany child burials. At Lower Saratown the associated grave ornaments were of shell and brass, relatively few in number, and appeared to have been strung and worn as jewelry. In contrast, the large number of small glass beads clustered in the chest and head areas of the Jenrette burial suggests that these ornaments were sewn onto a burial garment. Their comparatively large number may suggest increased access to European goods.

Structures

Structure 1

This rectangular, wall-trench structure was located in the northern portion of the 1989 excavation, approximately 10 ft inside the palisade (Figures 12.49 and 12.50). It was oriented on a northeast-southwest axis. The northwest wall measured approximately 16 ft in length, the southeast 17.6 ft, the northeast 14 ft, and the southwest 12.5 ft. The structure contained 220 sq ft of covered space. The northeastern wall trench was the deepest, averaging a little over 0.5 ft in depth. The northeastern end of the southeast wall also was a little over 0.5 ft deep; however, this wall decreased in depth toward the southwestern corner. The southwestern wall trench segments were approximately 0.3 ft deep, whereas the northwest wall trench segments were a little over 0.2 ft deep. Portions of the trenches of these latter two walls had been plowed away, leaving only the bottoms of individual posts to mark the wall alignments. Several postholes also were identified in the bottoms of the surviving wall trenches. Due to the fact that segments of the wall trenches had been plowed away, it was difficult to determine where the entrance to the structure was located. A gap in the western corner is the most obvious candidate.

Several small shallow posts were located within the interior of the structure. They were less than 0.5 ft in diameter and averaged 0.2 ft in depth. These small dimensions indicate that the posts were not primary support posts but may have been placed to buttress sagging roof timbers.

The existing evidence suggests that this structure may have been built employing techniques similar to those used to construct the circular houses described by John Lawson (Lefler 1967). According to Lawson, posts were cut from fairly small saplings, no more than 0.5 ft in diameter. The larger ends of the posts were buried in shallow postholes set in the trenches. The more flexible tops were then pulled together and tied, creating a U-shaped or dome-shaped configuration. This framework was then covered with bark, thatch, or hides (Lefler 1967:181–182). Waddle-and-daub construction may have been used in the walls during the winter to create a more weather-proof dwelling. Given the absence of interior roof supports, it is doubtful that anything heavier than thatch was ever used to cover the roof. Also, during the hot summer months, the coverings may have been stripped from the walls to create an arbor-like dwelling.

Three of the four pits located inside the structure were probably used by its inhabitants. Features 120 and 123 were storage facilities that were nearly identical in size, shape, and content. Both were also refilled with village soil that contained relatively few artifacts. A third feature—Feature 124—was a small shallow basin of indeterminate function. It, too, contained fill with few artifacts. The pottery found in Feature 125 date this small pit to the earlier Haw River phase; consequently, it is not associated with the structure. Conspicuously absent from the interior of Structure 1 was evidence of a hearth. Plowing may have cut away and obliterated any floor-level construction, as well as subsoil evidence of burning.

The rectangular shape and wall-trench construction distinguish Structure 1 from earlier Siouan houses excavated in the immediate vicinity. Fifteenth-century structures at the nearby Wall site, as well as seventeenth-century houses excavated at Upper Saratown on the Dan River, were circular and were constructed of individually-set wall posts. However, most of the late seventeenth-century Occaneechi houses at the Fredricks site were constructed using wall trenches. Most also were more oval or sub-rectangular than circular. A circular wall-trench sweat lodge was uncovered in the plaza area at the Fredricks site. Oval structures also were found at the mid-seventeenth century occupation of the Mitchum site on the Haw River and at Lower Saratown. None of the previously excavated piedmont houses, however, approach the rectangular outline of

Figure 12.49. Troweling Structure 1.

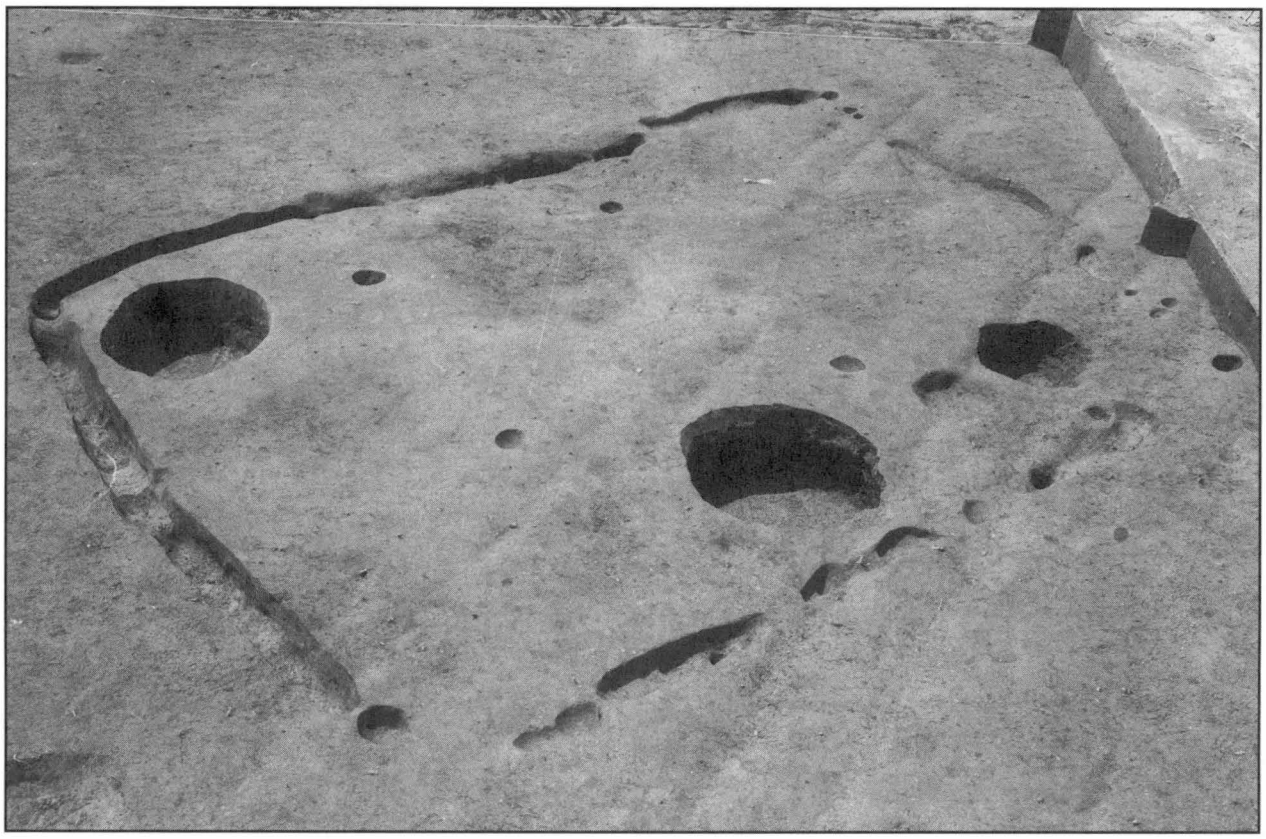

Figure 12.50. Structure 1, excavated.

Structure 1. It is to the west in the Cherokee area where rectangular houses are the dominant form (Dickens 1976). And there, single posts placed in individually dug holes characterize wall construction; wall trenches were only used in constructing entryways.

In terms of size, Structure 1 is very similar to the Occaneechi houses at the Fredricks site where floor space averaged 232 sq ft. In comparison with the Wall site houses (containing an average of 403 sq ft of living space) and Upper Saratown houses (containing an average of 607 sq ft), Structure 1 is considerably smaller (Petherick 1987; Ward and Davis 1991).

Structure 2

Structure 2 was a rectangular structure located just northwest of Structure 1 (see Figure 12.5). Although a small segment of the eastern wall was uncovered during the 1989 excavations, it was not fully exposed until 1990. It was smaller than Structure 1 with about 130 sq ft of interior space. Structure 2 was aligned along a north-south axis and constructed primarily using wall posts that were individually set into the ground. The only evidence of a wall trench was along the eastern wall. The 51 postholes associated with Structure 2 formed three walls; the southern wall either was left open or was of light construction. A single storage pit (Feature 132), measuring 3.5 ft in diameter and 2.2 ft deep, was located near the center of the structure and probably was associated with it. Although Structure 2 may have been a residence like Structure 1, its different alignment and form also may reflect a non-domestic function.

Structure 3

Structure 3 was identified during the 1990 excavations and will only be summarized here. Located northwest of Structure 2, it is similar to Structure 1 in alignment, method of construction, and overall form (see Figure 12.5). Its wall trenches, measuring about one foot in width and 0.5 ft deep, were better preserved than those of Structure 1, and encompass a larger interior floor area measuring 16 ft by 19 ft, or 304 sq ft. Two storage pits were dug into the Structure 3 floor. One of these (Feature 131) was located in the eastern corner of the house and mirrors the position of Feature 120 within Structure 1. Feature 136, like Feature 132 within Structure 2, is a large and deep storage pit that was dug in the center of the floor.

Other Possible Structures

Two other areas of possible structures were identified during the 1989 excavation season. Both were located toward the southern end of the excavation where the plow had dug deeper into the top of the clay subsoil. The first area was centered at 356L56 and was approximately 26 ft to 28 ft in diameter (Figure 12.5). This area contained a greater concentration of postholes than the surrounding area, as well as Features 75, 77, 78, 90, 91, 92, 98, 99, and 119. If a structure did exist here, its shape and method of construction was substantially different than Structures 1 and 3. The second area of a possible structure was identified by a 10-ft long wall trench segment located just north of Feature 64 and aligned parallel to the palisade. This remnant trench may represent the back wall of another rectangular structure centered over Feature 71.

Postholes

Nine hundred and eighty-nine postholes and postmolds were mapped within the 5,200-sq-ft excavation during 1989; another 732 postholes were mapped the following summer. With few exceptions, none of these were excavated. The majority (approx. 1,200) of the postholes at the Jenrette site were not clearly associated with any recognizable architectural features. Of the remaining postholes, 51 defined the wall alignments of Structure 2, several others were associated with Structures 1 and 3, and 459 comprised palisade alignments.

Two separate palisades were identified. The first, forming a 260-ft long arch of closely-spaced postholes running through the 1989 and 1990 excavations, represents the perimeter wall that encompassed the Jenrette phase village (Figure 12.51). Three hundred and eighty-two of the mapped postholes comprise this palisade alignment. During 1990, an entryway was exposed just north of Structure 3. Unlike the village entrances at the Fredricks site, this entryway was fully concealed from the outside by a 25-ft long wall running parallel and close to the palisade. Another interesting, but unexplained, feature of the Jenrette village palisade is an additional alignment of posts that extends outside the village perimeter north of Feature 65. Whether this segment represents an expansion of the village, another entrance, or some other architectural feature is unclear (Figure 12.5).

A second palisade, partially mapped in 1989 and more fully exposed in 1990, appears to represent a circular enclosure that encompassed the small Fredricks phase cemetery at the southern end of the Jenrette site excavation. If so, it can be attributed to the Occaneechi occupation of the Fredricks site. Seventy-seven postholes are presently attributed to this alignment. Hopefully, future excavations will clarify its overall configuration, age, and function (Figure 12.5).

Figure 12.51. Sq. 320L90 at top of subsoil, showing part of the palisade (center) and the tops of Feature 69 (foreground) and Feature 84 (upper right).

Pottery

Excavations during 1989 at the Jenrette site produced 12,013 potsherds (Table 12.3). Other than simple quantification, analysis was limited to the 1,230 sherds that were larger than four centimeters in diameter and thus could be reliably classified. Of the remaining 89.7% of the sample, most potsherds were recovered either from plowzone excavations or from 1/4-inch screening of feature fill.

Just over 80% of the sherds in the sample came from the plowzone. The other 2,305 potsherds were recovered from early Haw River (n=38), Jenrette (n=2,210), and Fredricks (n=57) phase features. Most potsherds from Jenrette phase features have been placed in the Jenrette series. This series is attributed to the seventeenth-century Jenrette and Mitchum phases, thought to be associated with the historic Shakori and Sissipahaw tribes, respectively. Samples from early Haw River features contained sherds that were classified exclusively into the Uwharrie series, while two of the three Fredricks phase features contained *Fredricks Check Stamped* sherds. Interestingly, *Fredricks Check Stamped* sherds also were recovered from 14 Jenrette phase features, suggesting some type of interaction between Shakori and Occaneechi peoples prior to the establishment of Occaneechi Town.

Pottery types of the newly-defined Jenrette series, as well as other types represented in the sample, are described below.

Uwharrie Net Impressed (Figure 12.52*a–e,g*)

One hundred and twenty-three net impressed sherds were recovered from the plowzone and numerous features. All of these were classified into the Uwharrie series and are attributed to the early Haw River occupation focused at the nearby Hogue site. *Uwharrie Net Impressed* was the predominant type of pottery within the six Haw River phase features (Features 72, 81, 82, 89, 94, and 125) excavated at the Jenrette site.

Almost two-thirds (64.2%) of the sherds contained coarse sand temper; other temper types included crushed quartz (32.5%) and crushed feldspar (3.3%). Most of these specimens exhibited coarse, knotted-net impressions, and all but five had scraped interiors. These sherds, including 16 rimsherds with slightly everted profiles and rounded lips, appear to represent large, thick-walled (6 mm to 12 mm thick) storage or cooking jars. The types of vessel decoration or modification were similar to those at the Hogue site, and include: brushing or scraping of the exterior surface (n=12); V-shaped notches along the lip/rim edge

Table 12.3. Distribution of pottery from the Jenrette site.

Context	Uwharrie		Jenrette					Fredricks		
	Net Impressed	Cord-marked	Simple Stamped	Roughly Smoothed	Plain	Brushed	Cob Impressed	Check Stamped	Indet.	Total
Haw River Phase										
Fea. 72	3	-	-	1	-	-	-	-	6	10
Fea. 81	3	1	-	-	-	-	-	-	2	6
Fea. 82	5	1	-	-	-	-	-	-	5	11
Fea. 89	1	-	-	-	-	-	-	-	-	1
Fea. 94	5	-	-	-	-	-	-	-	-	5
Fea. 125	4	-	-	-	-	-	-	-	1	5
Sub-total	21	2	0	1	0	0	0	0	14	38
Jenrette Phase										
Fea. 62	1	1	4	7	1	-	-	-	19	33
Fea. 63	2	2	21	2	19	-	-	14	95	155
Fea. 64	1	-	-	7	-	-	-	-	-	8
Fea. 65	7	-	69	23	19	13	4	4	178	317
Fea. 66	-	-	15	5	1	-	5	1	14	41
Fea. 67	-	-	4	-	1	-	-	-	16	21
Fea. 68	-	-	1	3	-	-	19	-	8	31
Fea. 69	-	-	1	2	-	-	-	-	8	11
Fea. 70	-	-	-	-	1	-	-	-	2	3
Fea. 71	6	-	20	13	-	2	-	1	30	72
Fea. 75	2	1	24	4	2	1	-	2	46	82
Fea. 77	-	1	18	42	4	1	1	20	102	189
Fea. 78	5	-	12	3	-	11	-	-	70	101
Fea. 79	-	-	8	6	6	10	1	2	44	77
Fea. 80 (Bu. 22)	1	2	7	12	-	5	1	2	25	55
Fea. 84	1	1	3	25	4	1	-	1	35	71
Fea. 85	5	-	-	5	1	-	-	-	7	18
Fea. 88	-	-	4	-	-	-	-	1	-	5
Fea. 90	-	-	2	-	-	-	4	-	1	7
Fea. 91	-	-	1	1	-	-	-	-	2	4
Fea. 92	2	-	-	-	-	3	-	1	6	12
Fea. 95	-	-	14	5	-	10	-	1	39	69
Fea. 96	3	1	29	37	19	6	-	2	144	241
Fea. 98	5	-	3	9	11	1	-	-	38	67
Fea. 99	1	-	23	16	1	5	-	-	74	120
Fea. 120	3	-	12	1	1	2	-	-	19	38
Fea. 121	-	-	3	-	-	-	-	9	20	32
Fea. 122	2	-	10	42	25	24	-	-	126	229
Fea. 123	2	1	15	18	5	-	-	-	50	91
Str. 1	-	-	-	-	-	-	-	-	8	8
Sub-total	49	10	323	288	121	95	35	61	1226	2208
Fredricks Phase										
Fea. 73 (Bu. 24)	1	-	1	1	-	-	-	1	-	4
Fea. 74 (Bu. 23)	3	-	5	2	-	2	-	-	25	37
Fea. 76 (Bu. 21)	4	-	1	-	-	-	-	1	10	16
Sub-total	8	0	7	3	0	2	0	2	35	57
Indeterminate Phase										
Plowzone	45	4	60	18	46	-	4	35	9496	9708
Fea. 86	-	-	-	-	-	-	-	-	2	2
Sub-total	45	4	60	18	46	0	4	35	9498	9710
Total	123	16	390	310	167	97	39	98	10773	12013

(n=8) and, less commonly, along the lip (n=2) (Figure 12.52*g*); and circular reed punctations on the body (n=1).

Uwharrie Cordmarked (Figure 12.52*f,h*)

Only 16 cordmarked sherds were recovered. All of these were classified into the Uwharrie series and are attributed to the early Haw River phase, although only two sherds were actually found in Haw River features. Unlike the *Uwharrie Cordmarked* sherds from the Hogue site, both S-twisted and Z-twisted cord impressions were equally represented, and just over half of these sherds had scraped interiors. Nine sherds contained sand temper; the remainder were tempered

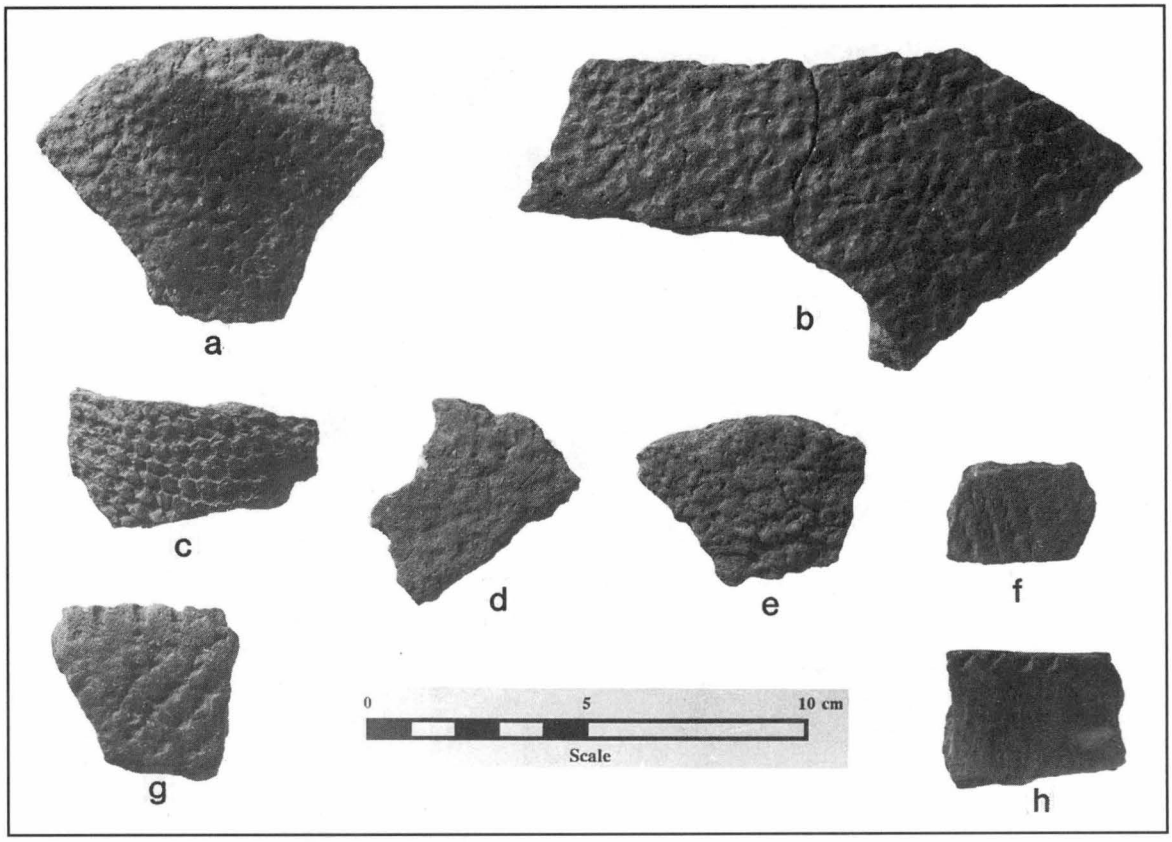

Figure 12.52. Uwharrie series potsherds from the Jenrette site.

with medium crushed quartz. Only three rimsherds were recovered. All displayed slightly everted profiles and two had rounded lips. One of these had oblique incised notches along the lip/rim edge (Figure 12.52*h*).

Jenrette Simple Stamped (Figures 12.53*a–n* and 12.54*a*)

Sample Size: N=390.

Paste: Vessels were manufactured by applying thin annular strips of clay to a basal plate. Several kinds of tempering materials were added to the clay, including finely crushed quartz and quartz mixed with crushed feldspar (39.5%), sand (33.6%), and coarse-to-fine crushed feldspar (26.9%). With the exception of sand, these temper particles comprise up to 40% of the paste. Exterior surface color is variable and ranges from light brown (7.5YR 6/4) to very dark gray (10YR 3/1). Most sherds have generally light exteriors and firing clouds are common. Interior surfaces exhibit the same range of colors.

Surface Finish (Exterior): The exterior vessel surface has been stamped with a carved wooden paddle that has a pattern of parallel lands and grooves. Although most sherds exhibit lightly-stamped paddle impressions, some vessels were boldly stamped. Land and groove impressions tend to be aligned either parallel or slightly oblique to the rim edge, and over-stamping is common. This type of treatment is similar to that observed for simple stamped pottery found at the mid-seventeenth century Mitchum site and at the nearby Fredricks site.

Surface Finish (Interior): Vessel interiors were uniformly smoothed.

Decoration: Decoration was restricted to the vessel rim and consisted of: paddle stamping the lip to produce shallow, parallel notches (n=27) (Figures 12.53*a–g* and 12.54*a*); incised, V-shaped notches along the lip/rim edge (n=5) (Figure 12.53*k*); V-shaped notches along the lip (n=1); U-shaped notches along the lip (n=2); and oblique, parallel incisions along the lip (n=1). One neck sherd displayed a drill hole that apparently was used to mend an adjacent crack (Figure 12.53*j*).

Form: All but two sherds appear to represent medium-sized to large jars; however, only one reconstructed vessel section was complete enough to determine approximate size. It is from a jar with an orifice diameter of about 30 cm, and has a flattened lip and a slightly everted rim (Figure 12.54*a*). Of the 55 rimsherds in the sample, 52 had everted profiles while three appeared to have straight or slightly inverted profiles. Two rimsherds with inverted profiles appear to represent hemispherical bowls (Figure 12.53*m–n*). Over two-thirds of the rimsherds had flattened lips. Sherds ranged from 4 mm to 10 mm in thickness, with over half being 6 mm to 8 mm thick.

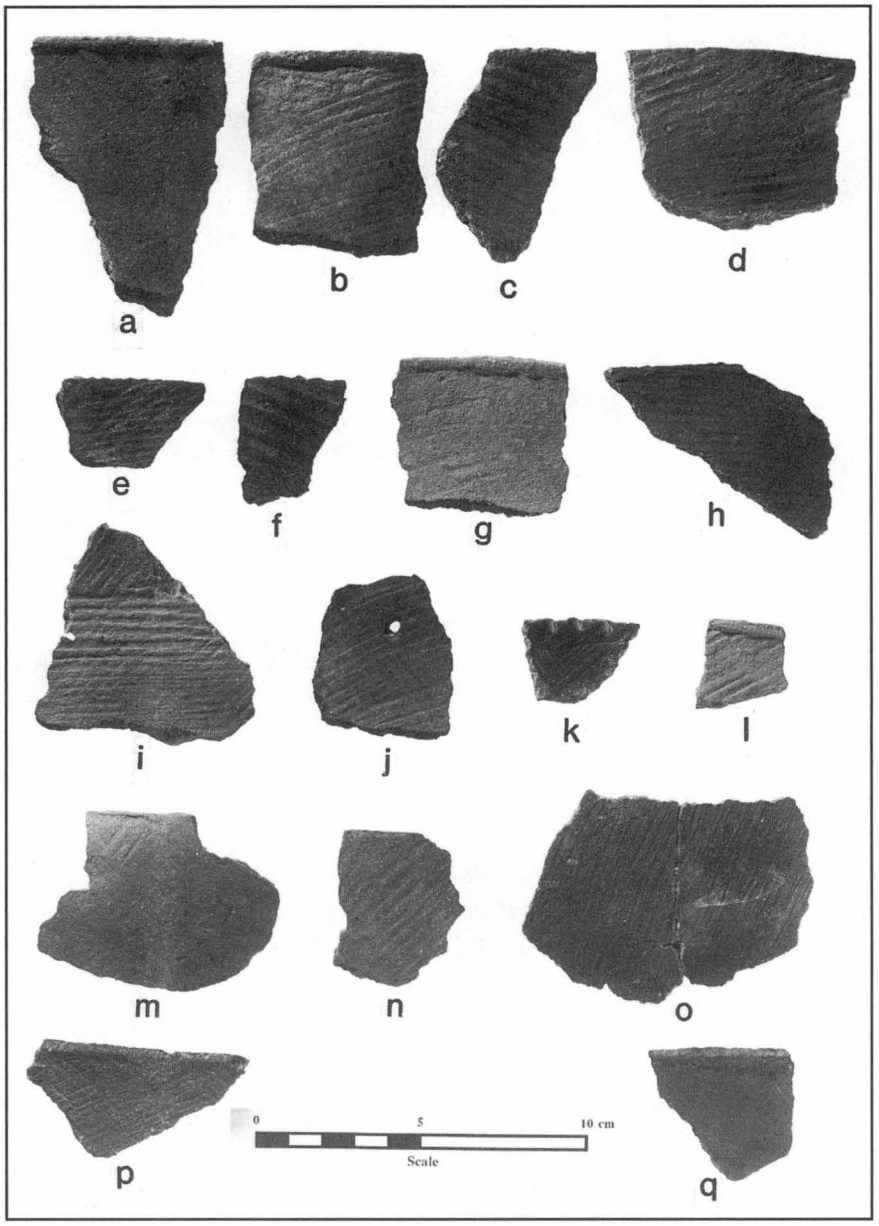

Figure 12.53. *Jenrette Simple Stamped* and *Jenrette Brushed* potsherds from the Jenrette site.

Comments: *Jenrette Simple Stamped* was the predominant ceramic type at the Jenrette site and comprised 35.5% of all sherds classified into the Jenrette series. Sherds of this type were present within all but five Jenrette phase features. The simple stamped pottery from the Jenrette site bears a close relationship to simple stamped pottery (also classified as *Jenrette Simple Stamped)* found at the Mitchum site, a probable seventeenth-century Sissipahaw village on the Haw River. The major difference in the pottery from these two sites is in the type of temper used. Whereas coarse sand and finely crushed quartz are the primary temper types used at the Jenrette site, over two-thirds of the Mitchum sherds contained crushed feldspar and much fewer sherds contained crushed quartz. This difference, however, seems minor in light of temper variability seen in earlier Hillsboro series pottery within the Eno and Haw river drainages, and is overshadowed by the extreme similarity in simple stamped vessel morphology and other characteristics at the Jenrette and Mitchum sites. In retrospect, most of the simple stamped pottery found at the nearby Fredricks site (including two large vessel sections) also is now recognized as *Jenrette Simple Stamped* (Davis 1988:50–52).

The Jenrette ceramic series in general, and *Jenrette Simple Stamped* in particular, is viewed as a direct development out of the earlier fifteenth-to-sixteenth century Hillsboro series. What distinguishes the Jenrette series pottery from the Hillsboro series is that

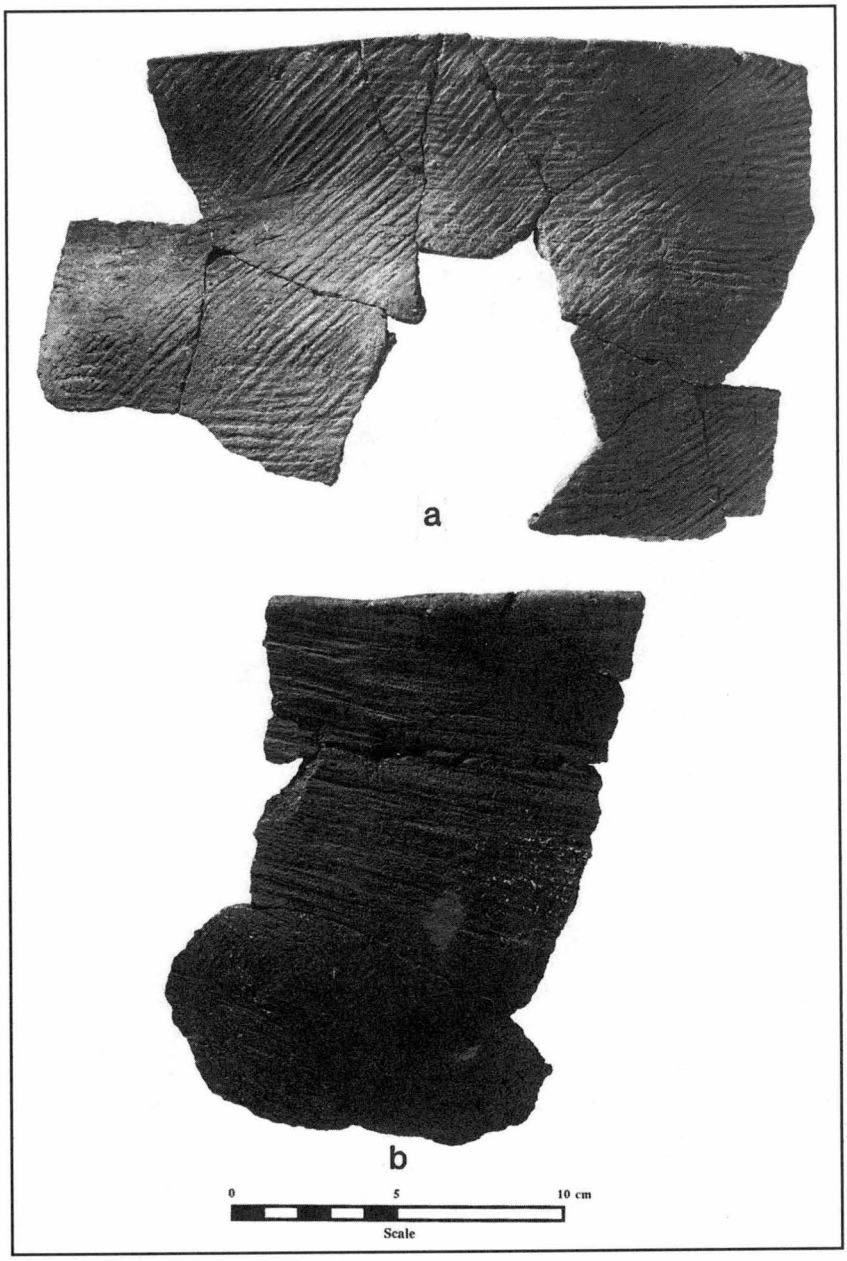

Figure 12.54. *Jenrette Simple Stamped* and *Jenrette Brushed* vessel sections from the Jenrette site.

it appears to be more crudely made, contains substantially larger amounts of coarser tempering material, and represents vessels with generally thicker walls. Stamping appears to have been more hastily executed, and the resulting surfaces often were partially obliterated before firing.

Jenrette Roughly Smoothed

Sample Size: N=310.

Paste: Paste was the same as that described for *Jenrette Simple Stamped* except for the frequency distribution of temper types. Medium-to-fine crushed quartz, occasionally mixed with finely crushed feldspar, occurred in 51.6% of the sherds analyzed. The remainder of the sherds were tempered with sand (32.6%) and finely crushed feldspar (15.5%).

Surface Finish (Exterior): The exterior surface has been stamped, probably with a simple stamped paddle, and subsequently smoothed over or wiped while the clay was still quite damp, leaving a rough, irregular surface. This resulting type of surface appears to have been intentionally produced, and is not simply a poor attempt to produce a plain or evenly smoothed exterior surface.

Surface Finish (Interior): Interior vessel surfaces were uniformly smoothed.

Decoration: Ten of the 28 rimsherds found were decorated. All decoration was restricted to the lip or

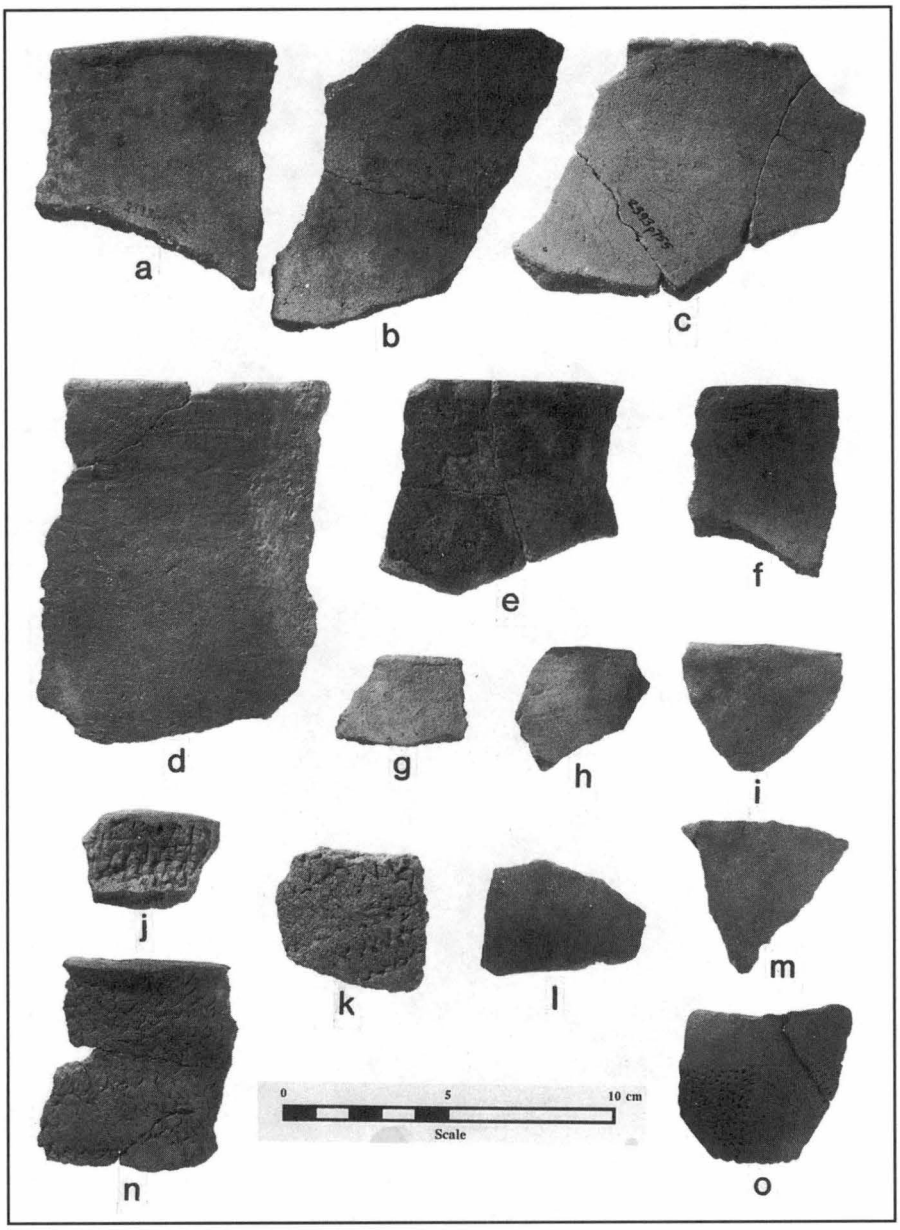

Figure 12.55. *Jenrette Plain* and *Jenrette Cob Impressed* potsherds from the Jenrette site.

lip/rim edge and consisted of: V-shaped notches along the lip (n=3) and lip/rim edge (n=1); U-shaped notches along the lip/rim edge (n=1); hollow reed (n=2) and U-shaped (n=1) punctations along the lip; and simple stamping of the lip (n=2). This latter treatment indicates that some of these vessels originally were simple stamped.

Form: Although no reconstructible vessel sections were recovered, the curvature of most sherds found suggest a large jar form. *Jenrette Roughly Smoothed* vessels had relatively thick walls that were usually more than 6 mm thick. Of the 28 rimsherds found, 21 had everted or flaring rim profiles, four had inverted profiles, and three were indeterminate. Almost three-fourths of these sherds had rounded lips.

Comments: The occurrence of this ceramic type within the Jenrette series provides a striking contrast to the earlier Hillsboro series, characterized by unusually well-made vessels with carefully stamped or uniformly smoothed exterior surfaces. Pottery similar to *Jenrette Roughly Smoothed* also was observed at the Mitchum site, though in fewer numbers. The predominance of crudely smoothed pottery at the Jenrette site lacks a precedent within the region.

Jenrette Plain (Figures 12.55*a–i,l–m,o* and 12.56)

Sample Size: N=167.

Paste: Vessels were manufactured by a coiling method. Although overall paste texture and color were similar to other Jenrette series pottery, temper consisted primarily of medium-to-fine sand (59.3%), followed by finely crushed quartz (25.1%), mixed quartz and

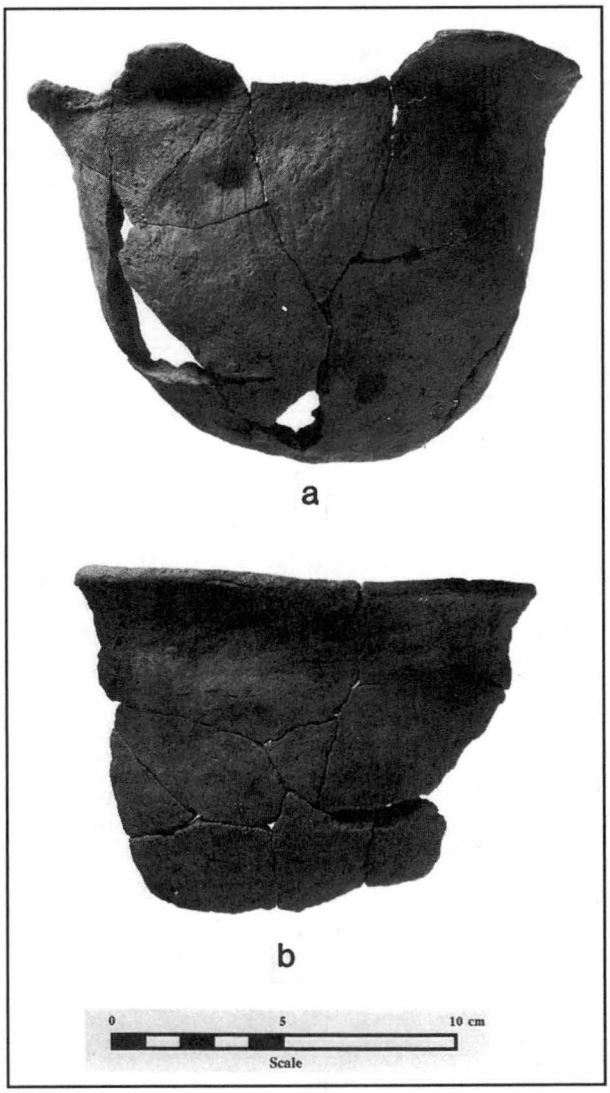

Figure 12.56. *Jenrette Plain* vessel sections from the Jenrette site.

feldspar (8.4%), crushed feldspar (4.2%), and coarse grit (3.0%). This profile of temper types further differentiates this type from *Jenrette Roughly Smoothed*.

Surface Finish (Exterior): The exterior surface was smoothed prior to firing. Most sherds exhibit some surface irregularities.

Surface Finish (Interior): All sherd interiors were smoothed.

Decoration: Unlike other Jenrette series pottery, *Jenrette Plain* vessels often were decorated. Rim treatments consist of V-shaped notches along the lip (n=1) and lip/rim edge (n=6) (Figure 12.55*c*), and oblique incisions along the lip edge (n=1). Other types of decoration include circular reed punctations (often forming triangles) along the vessel shoulder (n=2) and body (n=6), and incising on the body (n=1) (Figure 12.55*o*). One sherd also had an applique node. Rim and lip decorations usually were associated with jar forms, whereas other types of decoration were restricted to bowls.

Form: Three vessel categories appear to be represented by this pottery type: medium-sized to large (approximately 20 cm to 30 cm in diameter) storage and cooking jars with slightly constricted necks and everted rims (Figure 12.55*a–f*); small (10 cm to 16 cm diameter) jars with flaring rims (Figure 12.56); and small (6 cm to 12 cm diameter), hemispherical bowls with inverted rims (Figure 12.55*h–i,l–m,o*). Sherds from bowls and small jars ranged from 2 mm to 6 mm in thickness while sherds from larger jars usually were 6 mm to 10 mm thick.

Comments: *Jenrette Plain* pottery possesses certain similarities to both the earlier Hillsboro and later Fredricks series. Like *Hillsboro Plain*, this type represents (in part) small jars and bowls that were decorated by notching and zoned punctations; however, the cazuela or carinated bowl forms that typically occur within Hillsboro pottery assemblages were conspicuously absent at the Jenrette site. Also, crushed quartz is a more predominant temper type within *Jenrette Plain*.

Temper also distinguishes *Jenrette Plain* from the predominantly sand-tempered *Fredricks Plain* type. Aside from paste, the primary difference between these two types is that the Fredricks pottery was not decorated using punctations, and other kinds of decoration (mostly rim notching) were only rarely used. The similarity between *Jenrette Plain* and *Fredricks Plain* lies mostly with the general range of vessel sizes and forms represented. Much of the plain pottery at the Fredricks site also represents large storage jars.

Jenrette Brushed (Figures 12.53*o–q* and 12.54*b*)

Sample Size: N=97.

Paste: Four temper types were represented in almost equal frequency and are as follows: crushed feldspar (32.6%), finely crushed quartz (often mixed with crushed feldspar) (24.2%), coarse grit (23.2%), and medium sand (20.0%). Large amounts of temper (except for medium sand) were added to the clay and temper particles often protrude either the exterior or interior surface. Exterior surface color ranges from light brown (7.5YR 6/4) to reddish brown (5YR 4/4) to very dark gray (10YR 3/1). Interiors show the same range of colors.

Surface Finish (Exterior): The exterior surface has been scraped with a stiff twig brush, producing deep, irregular striations. Both coarse and fine striations are represented.

Surface Finish (Interior): Almost 96% of the sherds examined had smoothed interiors; the remainder were brushed.

Decoration: No decorations were recorded for *Jenrette Brushed* sherds aside from brush marks along the lip, which were present on more than half of the rimsherds examined. One body sherd was from a

vessel that had been drilled to repair an adjacent crack.

Form: Most of these sherds, including some that possessed heavy carbon or soot deposits, appear to represent medium-sized or large cooking vessels. Although most had thick (6 mm to 10 mm) walls, several sherds were much thinner. All rimsherds were from jars with everted or flaring rims and either rounded or flattened lips.

Comments: This type often was difficult to distinguish from *Jenrette Simple Stamped*, and it is possible that some sherds assigned to each type have been misclassified. Brushed pottery was very rare at both the Wall and Fredricks sites, but was much more common at the Mitchum site where it represented about 8% of all classified sherds found in 1983 (Davis 1987:205). Interestingly, no brushed pottery was found at this site during the 1986 excavations. The close similarity of the Mitchum pottery to *Jenrette Brushed*, with respect to paste, exterior surface impressions, vessel form, and decoration, suggests that the Mitchum sherds also are referable to the Jenrette series.

Only a small number of vessels appear to be represented by the sherd sample recovered at the Jenrette site.

Jenrette Cob Impressed (Figure 12.55*j–k,n*)

Sample Size: N=39.

Paste: Vessels were manufactured by applying thin annular strips of clay to a basal plate. Over half (53.8%) of the sherds were tempered with finely crushed quartz and feldspar; the remainder were tempered with coarse-to-medium sand. Exterior surface color ranges from pale brown (10YR 6/3) to light yellowish brown (10YR 6/4) to dark gray (10YR 4/1). Most sherds have generally light exteriors. Interior surfaces exhibit the same range of colors.

Surface Finish (Exterior): The surface has been impressed with a dried corncob, rolled across the vessel exterior. Cob impressions on most sherd surfaces have been partially obliterated by subsequent smoothing.

Surface Finish (Interior): The vessel interior was uniformly smoothed.

Decoration: One of the six rimsherds in the sample displayed V-shaped notches along the lip. No other decorations were observed.

Form: Conjoining sherds from three different vessels were recovered from Features 65 and 66, 68, and 90. These sherds comprise almost 70% (n=27) of the entire sample. Two of these reconstructed vessel sections are rounded bases of large storage or cooking jars. In both instances, the vessel exterior has been completely smoothed above the base. The third vessel section represents the rim and neck of a much smaller (approximately 16 cm in diameter), constricted-neck jar with a flattened lip. The other three rimsherds found were also everted and had flat or rounded lips. Although most basal sherds were more than 6 mm in thickness, other rim, neck, and body sherds usually were much thinner.

Comments: Jenrette Cob Impressed appears to be derived from the earlier *Hillsboro Cob Impressed*, a minority type found at the nearby Wall site. Cob impressed pottery also was recovered at the Fredricks and Mitchum sites (see Davis 1987). Although a single, completely-impressed vessel was found at the Wall site (Wilson 1983), most of the cob impressed pottery from these sites represent rim and neck portions of relatively small jars. Conversely, most of the *Jenrette Cob Impressed* sherds from the Jenrette site are from basal portions of large jars. The predominant use of mixed quartz and feldspar temper appears unique to the Jenrette sample, and reflects the general use of these temper types within the Jenrette series.

Fredricks Check Stamped (Figures 12.57 and 12.58)

Ninety-eight check stamped sherds were recovered from the Jenrette site. Although some variability is present within this sample, all fit comfortably into the *Fredricks Check Stamped* type. A majority of these sherds were recovered from the plowzone and 14 Jenrette phase features. Only two came from Fredricks phase features.

Three varieties of *Fredricks Check Stamped* are represented. At present, it is uncertain to what extent this variability might reflect cultural, chronological, or idiosyncratic differences. Nineteen sherds, recovered from the plowzone and Fredricks phase Features 73 (Burial 24) and 76 (Burial 21), are more typical of the check stamped pottery found at the adjacent Fredricks site (Figure 12.57*a–b*). The vessel found in Feature 83 (Burial 25) during the 1990 excavations also falls into this category (Figure 12.58). These specimens represent thin-walled (less than six millimeters thick), exceptionally well-made jars with medium to fine sand temper and shallow check impressions on the exterior surface. Interiors are evenly smoothed. Four of the six rimsherds have been decorated with oblique incisions or linear impressions along the flattened lip. This was the sole type of decoration recognized for check stamped pottery at the Fredricks site (Davis 1988:46).

A second variety is represented by 16 sherds from the plowzone overlying Feature 121 and 13 sherds from Features 65, 79, 84, 96, and 121. Although these sherds also have faint stamp impressions and represent similar, thin-walled, well-made jars, the paste is very sandy and rough to the touch (Figure 12.57*c–d,g*). This type of paste is identical to that observed for Vessels 3 and 5 recovered from Burials 2 and 3 at the Fredricks site (Davis 1988). The three rimsherds were undecorated and had flattened lips. One neck sherd was drilled in an apparent attempt to repair an adjacent crack. Such evidence of mending was com-

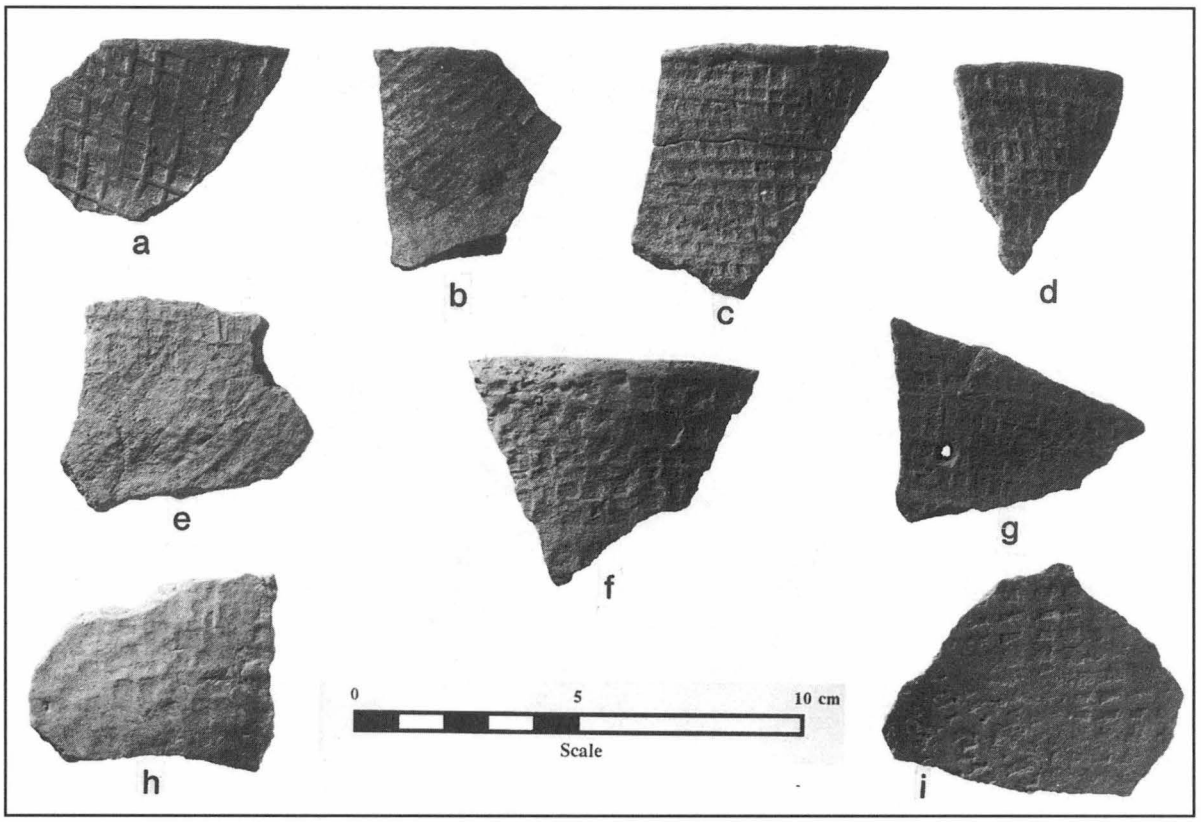

Figure 12.57. *Fredricks Check Stamped* potsherds from the Jenrette site.

mon within the *Fredricks Check Stamped* pottery from the Fredricks site. Although it is uncertain if the Jenrette sherds represent a single vessel, they may well represent the work of a single potter.

Sherds of the third variety represent the majority (n=50) of check stamped sherds at the Jenrette site, and were recovered from the plowzone and Features 71, 77, and 80 (Figure 12.57*e-f,h-i*). These sherds are tempered with crushed feldspar (40%), crushed quartz mixed with feldspar (10%), and sand (50%). Although the check stamp designs are similar to those seen on other *Fredricks Check Stamped* sherds, the stamped surface often has been partially obliterated by subsequent smoothing. Several of these sherds are relatively thick and represent much heavier vessels. The eight rimsherds in the sample are from large jars with rounded or flattened lips. Only one rimsherd was decorated, and was notched along the lip. The only vessel identified at the Fredricks site that can be placed into this variety is Vessel 12, a large, medium crushed quartz-tempered jar that was found in Feature 18 in association with a large, broken, simple stamped jar (Davis 1988:46). It now appears that this feature may be associated with the Jenrette village instead of Occaneechi Town.

The presence of *Fredricks Check Stamped* pottery within Jenrette phase features raises several interesting questions. In particular, what was the relationship between the Occaneechi and Jenrette site inhabitants? Did some Occaneechi inhabit the Hillsborough area while the Jenrette site was still occupied? Finally, can a micro-chronology for Fredricks series pottery be constructed (based on paste and possibly stamp design characteristics) that would help clarify the evolution of the Occaneechi village? Given the presence of a pre-palisade house at the Fredricks site, the potential for developing such a chronology would appear to be great. It is hoped that further research at the Jenrette site will be able to contribute substantially to the resolution of these questions.

Indeterminate Sherds

Almost 90% (n=10,773) of the potsherds from the Jenrette site, including 9,496 sherds recovered from plowzone excavations, were not classified because of either small sherd size or eroded surfaces. Most of these sherds are attributable to the Jenrette phase; however, some Haw River and Fredricks phase sherds probably also are represented.

Summary

Analysis of the pottery from the Jenrette site has contributed substantially to our understanding of the development of the late prehistoric ceramic tradition in the Eno and Haw river drainages. The Jenrette ceramic series is closely related to pottery associated with the

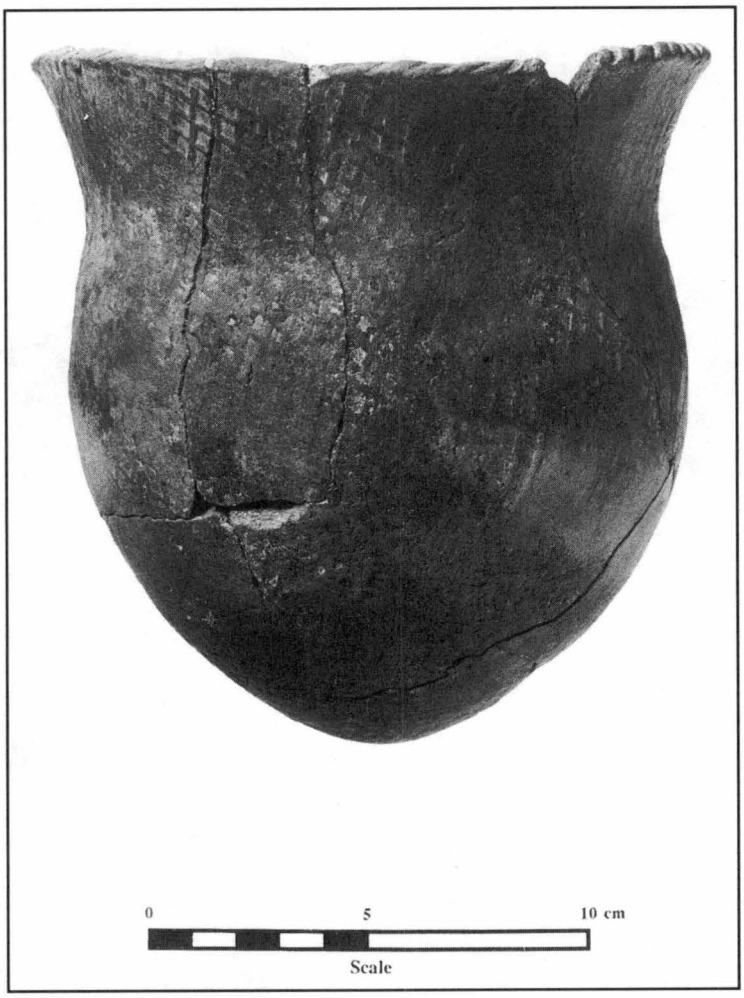

Figure 12.58. *Fredricks Check Stamped* jar from Feature 83 (Burial 25).

mid-seventeenth century Mitchum phase village at the Mitchum site. This similarity supports the idea advanced by Rights, Swanton, and others that the Shakori and Sissipahaw were closely related peoples, if not branches of the same tribe (Rights 1957:30; Swanton 1946:183). The ceramic assemblages from both sites are viewed as developments out of the earlier Hillsboro series, the pottery of fifteenth-century and sixteenth-century Indians in both drainages. Of the two, the Jenrette site pottery appears to show greater similarity to the Hillsboro series as originally defined from the Wall site (Coe 1952), and argues strongly for cultural continuity in the region from the 1400s until the fourth quarter of the seventeenth century.

An equally important result of the ceramic analysis was the discovery of Fredricks series pottery within several Jenrette phase features. Although numerically small, these *Fredricks Check Stamped* sherds indicate that the process of Occaneechi migration into the Eno valley during the latter half of the 1600s was much more complex than simply the creation of a new village at the Fredricks site. It is hoped that, as more of the Jenrette site is investigated during subsequent years, we will be able to understand more fully the relationships between the Shakori and Occaneechi through their potters.

Lithic Artifacts

Archaeological testing at the Jenrette site in 1989 recovered a sample of 3,238 lithic artifacts (Table 12.4). Almost half of these artifacts were recovered from pit features associated with the Jenrette (42.1%), Fredricks (2.0%), and early Haw River (0.6%) phases; the remainder were recovered mostly from the plowzone. Although most of the plowzone artifacts appear to be associated with the Jenrette phase, both the Fredricks and Haw River phases probably are better represented in this excavated context. The lithic artifact sample consists of 2,089 pieces of debitage and exhausted cores, 428 projectile points, 679 other chipped stone tools (including 551 utilized and retouched flakes), eight ground stone tools, and 34 large

Table 12.4. Distribution of lithic artifacts from the Jenrette site.

Category	PZ	Context Fea 62	Fea 63	Fea 64	Fea 65	Fea 66	Fea 67	Fea 68	Fea 69	Fea 70	Fea 71	Fea 72	Fea 73	Fea 74	Fea 75
Debitage															
Decortication Flakes	128	1	2	-	24	4	-	-	2	-	5	-	-	3	1
Interior/Bif. Thin. Flakes	781	11	17	-	119	18	-	-	4	1	18	5	10	31	38
Shatter Fragments	5	-	-	-	1	-	-	-	-	-	-	-	-	-	1
Archaic Flakes	76	-	-	-	3	-	-	-	-	-	-	-	-	-	-
Cores	158	1	-	-	5	3	-	-	-	-	4	-	1	1	-
Raw Material	1	-	1	-	-	-	-	-	-	-	1	-	-	-	-
Projectile Points															
LeCroy Bifurcated Stem	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-
Morrow Mountain II Stemmed	2	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Guilford Lanceolate	3	-	-	-	1	-	-	-	-	-	-	-	-	-	-
Savannah River Stemmed	4	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Small Stemmed Points	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Badin Crude Triangular	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Yadkin Large Triangular	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Small Triangular Points	146	2	9	-	25	6	1	1	-	1	3	1	-	1	11
Unidentified Points	26	-	-	-	-	1	-	-	-	-	1	-	-	1	4
Other Chipped Stone Artifacts															
Bifaces	20	-	-	-	-	-	-	-	-	-	1	-	-	-	-
Gunflints	9	-	-	-	-	-	-	-	-	-	-	-	1	-	-
Drills	8	-	-	-	-	1	-	-	-	-	1	-	-	-	-
Chipped Hoe Fragments	1	-	-	-	1	-	-	-	-	-	-	-	-	-	-
End Scrapers	3	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Side Scrapers	2	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pièces Esquillées	26	-	-	-	2	-	-	-	-	-	1	-	-	-	1
Denticulates	4	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Spokeshaves	3	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perforators	10	-	-	-	2	-	-	-	-	-	-	-	-	-	-
Gravers	2	-	-	-	1	-	-	-	-	-	-	-	-	-	1
Utilized/Retouched Flakes	352	-	4	1	37	9	-	1	1	-	7	-	-	1	4
Ground Stone Artifacts															
Ground Celt	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-
Engraved Stone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ground Stone Fragments	3	-	-	-	1	1	-	-	-	1	-	-	-	-	-
Large Cobble Tools															
Cobble Choppers	5	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hammerstones/Manos	6	-	-	-	2	1	-	-	-	-	2	-	-	-	-
Anvils/Milling Stones	2	-	-	-	2	-	-	-	-	-	-	-	-	-	2
Worked Slabs	3	-	-	-	1	-	-	-	-	-	-	-	-	-	-
Total	1792	15	33	1	229	44	1	2	7	3	44	6	12	38	63

cobble tools. Raw materials represented by these artifacts were predominantly local metavolcanic rock and vein quartz; however, several flakes made of European bottle glass also were recovered. Major artifact categories are described below.

Debitage

Decortication Flakes. Sample Size: 249. Form: This category includes both primary and secondary decortication flakes. These flakes exhibit a striking platform and bulb of percussion on the ventral surface, and have cortex (primary – >75%; secondary – <75%) remaining on the dorsal surface. Material: Metavolcanic rock–239, Crystal quartz–6, Vein quartz–4. Comment: Decortication flakes are produced during initial stages of core reduction and bifacial tool manufacture. The very high frequency of metavolcanic flakes indicates a heavy reliance upon this raw material type.

Interior/Bifacial Thinning Flakes. Sample Size: 1,551. Form: Interior flakes are flat flakes that exhibit flake removal scars on the entire dorsal surface but

Table 12.4 Continued.

Category	Context														
	Fea 76	Fea 77	Fea 78	Fea 79	Fea 80	Fea 81	Fea 82	Fea 84	Fea 85	Fea 87	Fea 88	Fea 89	Fea 90	Fea 92	Fea 94
Debitage															
Decortication Flakes	-	14	9	2	1	-	-	4	2	-	-	-	-	2	1
Interior/Bif. Thin. Flakes	11	57	25	21	7	5	13	13	30	-	-	-	4	8	3
Shatter Fragments	-	-	1	1	-	-	-	-	-	-	-	-	-	-	-
Archaic Flakes	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cores	-	4	2	-	-	1	-	1	1	-	-	-	-	-	-
Raw Material	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Projectile Points															
LeCroy Bifurcated Stem	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Morrow Mountain II Stemmed	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Guilford Lanceolate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Savannah River Stemmed	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Small Stemmed Points	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Badin Crude Triangular	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Yadkin Large Triangular	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Small Triangular Points	-	21	14	6	5	-	1	11	6	1	-	-	1	5	1
Unidentified Points	-	-	1	-	1	-	-	1	1	-	-	-	-	-	-
Other Chipped Stone Artifacts															
Bifaces	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Gunflints	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-
Drills	-	-	1	-	-	-	-	1	-	-	-	-	-	-	-
Chipped Hoe Fragments	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
End Scrapers	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-
Side Scrapers	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pièces Esquillées	-	5	1	-	-	-	-	-	-	-	-	-	-	-	-
Denticulates	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Spokeshaves	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perforators	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-
Gravers	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Utilized/Retouched Flakes	2	23	2	5	4	1	2	2	7	-	1	1	-	3	-
Ground Stone Artifacts															
Ground Celt	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Engraved Stone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ground Stone Fragments	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Large Cobble Tools															
Cobble Choppers	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hammerstones/Manos	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Anvils/Milling Stones	-	1	-	-	-	-	-	1	-	-	-	-	1	-	-
Worked Slabs	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total	14	126	56	35	18	7	16	34	49	1	1	1	6	18	5

lack a steep platform angle; bifacial thinning flakes are similar but possess a steep platform angle indicative of removal from a biface. These two flake types were not differentiated during analysis. Material: Metavolcanic rock–992, Vein quartz–488, Crystal quartz–31, Bottle glass–26, Quartzite–12, Chert–1, Unidentified igneous rock–1. Comment: Interior and bifacial thinning flakes reflect intermediate and final stages of core reduction and biface manufacture, and comprised the most frequent and ubiquitous lithic artifact class. The presence of small (less than a 1/4-inch in diameter), green glass, bifacial thinning flakes in Features 65 and 85 indicates that some bottles received in trade with the English were subsequently recycled. Although it is likely that these flakes represent residues of projectile point manufacture, no glass projectile points were recovered at the site.

Shatter Fragments. Sample Size: 9. Form: This category includes angular flakes that, based upon morphological attributes, could not be specifically classified. Material: Metavolcanic rock–6, Vein quartz–2, Bottle glass–1. Comment: These specimens

Table 12.4 Continued.

Category	Context													
	Fea 95	Fea 96	Fea 98	Fea 99	Fea 113	Fea 114	Fea 120	Fea 121	Fea 122	Fea 123	Fea 124	Str 1	Surface/ Misc.	Total
Debitage														
Decortication Flakes	4	11	4	12	-	-	2	-	2	9	-	-	-	249
Interior/Bif. Thin. Flakes	25	80	17	56	-	1	23	2	39	55	-	1	2	1551
Shatter Fragments	-	-	-	-	-	-	-	-	-	-	-	-	-	9
Archaic Flakes	-	-	-	-	-	-	-	-	-	-	-	-	-	79
Cores	2	3	1	3	-	-	-	-	1	4	-	1	1	198
Raw Material	-	-	-	-	-	-	-	-	-	-	-	-	-	3
Projectile Points														
LeCroy Bifurcated Stem	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Morrow Mountain II Stemmed	-	-	-	-	-	-	-	-	-	-	-	-	-	2
Guilford Lanceolate	-	-	-	-	-	-	-	-	-	-	-	-	-	4
Savannah River Stemmed	-	-	-	-	-	-	-	-	-	-	-	-	-	4
Small Stemmed Points	-	-	-	-	-	-	-	-	-	-	-	-	-	2
Badin Crude Triangular	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Yadkin Large Triangular	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Small Triangular Points	12	26	5	9	1	-	5	-	24	8	1	1	-	371
Unidentified Points	-	-	1	1	-	-	1	-	-	2	-	-	-	42
Other Chipped Stone Artifacts														
Bifaces	-	-	-	-	-	-	-	-	-	-	-	-	-	21
Gunflints	-	-	-	-	-	-	-	-	-	-	-	-	-	11
Drills	-	3	3	-	-	-	-	-	-	1	-	-	-	19
Chipped Hoe Fragments	-	-	-	1	-	-	-	-	-	-	-	-	-	3
End Scrapers	-	-	-	-	-	-	-	-	-	-	-	-	-	4
Side Scrapers	-	-	-	-	-	-	-	-	-	-	-	-	-	2
Pièces Esquillées	1	2	-	3	-	-	-	-	-	-	1	-	-	43
Denticulates	-	-	-	-	-	-	-	-	-	-	-	-	-	4
Spokeshaves	-	-	-	-	-	-	-	-	-	-	-	-	-	3
Perforators	-	-	-	-	-	-	-	-	-	1	-	-	-	14
Gravers	-	-	-	-	-	-	-	-	-	-	-	-	-	4
Utilized/Retouched Flakes	9	18	2	21	-	-	6	1	14	9	1	-	-	551
Ground Stone Artifacts														
Ground Celt	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Engraved Stone	-	-	-	1	-	-	-	-	-	-	-	-	-	1
Ground Stone Fragments	-	-	-	-	-	-	-	-	-	-	-	-	-	6
Large Cobble Tools														
Cobble Choppers	-	-	-	-	-	-	-	-	-	-	-	-	-	5
Hammerstones/Manos	-	-	-	-	-	-	-	-	1	-	-	-	-	12
Anvils/Milling Stones	-	2	-	-	-	-	1	-	-	-	-	-	-	12
Worked Slabs	-	-	1	-	-	-	-	-	-	-	-	-	-	5
Total	53	145	34	107	1	1	38	3	81	89	3	3	3	3238

probably represent all stages of stone tool manufacture.

Archaic Flakes. Sample Size: 79. Form: This category consists of large and heavily patinated flakes that, based upon these characteristics, most likely date to the Archaic period. Material: Metavolcanic rock–79. Comment: These specimens probably are associated with the numerous Archaic projectile points that also were recovered at the site.

Cores. Sample Size: 198. Form: This category includes 188 amorphous chunks or nodules of utilizable raw material from which two or more flakes were removed, and 10 cores that have been reduced using a bipolar percussion method. Material: Vein quartz–149, Metavolcanic rock–30, Crystal quartz–11, Quartzite–4, Other igneous rock–2, Chert–1, Slate–1. Comment: Several of the vein quartz cores may represent fragments of shattered hammerstones.

Raw Material. Sample Size: 3. Form: These three specimens are pieces of utilizable raw material that do not show any signs of working or use. Material: Metavolcanic rock–1, Soapstone–1, Crystal quartz–1. Comment: None.

Projectile Points

LeCroy Bifurcated Stem Projectile Point. Sample Size: 1. Form: This projectile point type is defined by a straight, parallel-sided stem that has been deeply notched at the base (Kneberg 1956). This specimen is a heavily patinated basal fragment. Material: Metavolcanic rock–1. Comment: *LeCroy Bifurcated Stem* projectile points have been recovered from late Early Archaic (ca. 6,500–5,800 B.C.) contexts within the lower Little Tennessee River valley (Chapman 1975, 1977, 1978). A similar chronological placement is assumed for piedmont North Carolina. This artifact was recovered from Feature 65.

Morrow Mountain II Stemmed Projectile Points. Sample Size: 2. Form: The *Morrow Mountain II* projectile point type is defined by a long, narrow blade and a tapered stem (Coe 1964:37). One of these specimens is unbroken; the other has a reworked tip. Material: Metavolcanic rock–2. Comment: This projectile point type is associated with the Middle Archaic period (ca. 5,500–5,000 B.C.). Both artifacts were found in the plowzone.

Guilford Lanceolate Projectile Points. Sample Size: 4. Form: The *Guilford Lanceolate* projectile point type is defined by "a long, slender, but thick blade with straight, rounded, or concave base" (Coe 1964:43). All four specimens are heavily patinated and have rounded bases. Three have broken tips; the fourth has a reworked point. Material: Metavolcanic rock–4. Comment: This projectile point type is associated with the Middle Archaic period (ca. 4,500 B.C.). These artifacts were recovered from the plowzone and Feature 65.

Savannah River Stemmed Projectile Points. Sample Size: 4. Form: Coe (1964:44) describes this projectile point type as having "a large, heavy, triangular blade with a broad stem." Of the four specimens fitting this description, two are basal fragments of broad-bladed projectile points and two are complete examples of Coe's "slender variety." Material: Metavolcanic rock–4. Comment: The *Savannah River Stemmed* type is associated with the Late Archaic period (ca. 2,000 B.C.). All four artifacts were found in the plowzone.

Small Stemmed Projectile Points. Sample Size: 2. Form: One of these specimens is complete, and has a triangular blade and a broad, squared stem. The other is a basal fragment, and has a broad triangular blade and a narrow, squared stem. Material: Metavolcanic rock–2. Comment: Small stemmed projectile points were recovered from Feature 76 and the plowzone. Neither point conforms to an established projectile point type; consequently, their cultural association is uncertain.

Badin Crude Triangular Projectile Point. Sample Size: 1. Form: This specimen is a large, thick, triangular projectile point that conforms to Coe's (1964:45) *Badin Crude Triangular* type. Material: Metavolcanic rock–1. Comment: This artifact type is thought to represent either an early triangular point form or an unfinished triangular point. Coe suggests an Early Woodland chronological placement for this type. This artifact was recovered from the plowzone.

Yadkin Large Triangular Projectile Point. Sample Size: 1. Form: The *Yadkin Large Triangular* type is defined by Coe (1964:45) as "a large, symmetrical, and well-made triangular point." This specimen has a deeply concave base and a broken tip, and has been reworked along one edge. Material: Metavolcanic rock–1. Comment: This projectile point was recovered from the plowzone and probably dates to the Early-Middle Woodland period (ca. A.D. 100–500).

Small Triangular Projectile Points (Figure 12.59). Sample Size: 371. Form: These projectile points generally conform to the *Caraway Triangular*, *Clarksville Small Triangular*, and *Hillsboro Triangular* types (Coe 1952, 1964). Although some of these points were exceptionally well made and often had finely serrated edges, almost half (n=180) were small, asymmetrical, irregularly retouched flakes and appear to have been mass produced with relatively little effort. Of the 89 bifacially worked points that were large enough to determine their overall configuration, 69 had incurvate bases and excurvate (n=37), incurvate (n=23), or straight (n=9) lateral edges. The remainder had straight bases and excurvate (n=15), straight (n=3), or incurvate (n=2) lateral edges. The small triangular points from the Jenrette site range from 12 mm to 53 mm (mean=22.0, sd=6.4, n=198) in length, 8 mm to 30 mm (mean=16.3, sd=3.6, n=306) in width, and 2 mm to 10 mm (mean=4.3, sd=1.3, n=330) in thickness. Material: Metavolcanic rock–352, Vein quartz–14, Chert–2, Crystal quartz–2, Quartzite–1. Comment: Although early Haw River and Fredricks phase projectile points probably are represented by this sample, most are associated with the Jenrette phase component. In fact, 60% (n=225) of the small triangular points in the sample came from Jenrette phase features while only three came from Haw River or Fredricks phase features. The remainder were recovered from the plowzone.

Projectile Point Fragments. Sample Size: 44. Form: This category includes projectile point fragments that could not be classified into a specific type. A majority of these specimens are fragments of large, stemmed points. Material: Metavolcanic rock–38, Vein quartz–5, Crystal quartz–1. Comment: Most, if not all, of these artifacts probably date to the Archaic period.

Other Chipped Stone Artifacts

Bifaces. Sample Size: 21. Form: Bifaces are blanks that exhibit flake removal scars on both surfaces. About half of these are large bifaces or biface fragments that probably date to the Archaic period; the

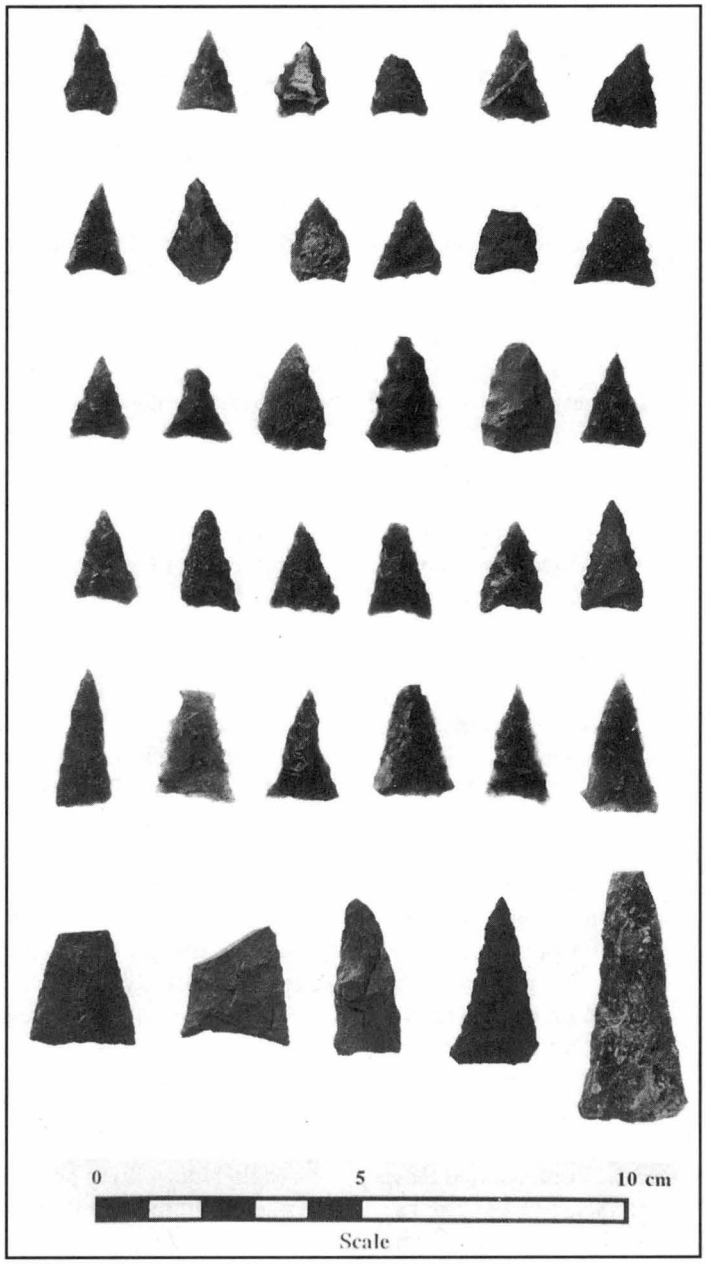

Figure 12.59. Chipped stone projectile points from the Jenrette site.

rest appear to represent aborted attempts to manufacture triangular projectile points. Material: Metavolcanic rock–17, Vein quartz–3, Unidentified–1. Comment: Most of these artifacts represent unfinished projectile points and, except for one specimen from Feature 72, were recovered from the plowzone.

Gunflints. Sample Size: 11. Form: The four honey-colored, European gunflints in the sample are made on spalls and have been reduced in size due to repeated resharpening and use. They range from 20 mm to 22 mm in width, 14 mm to 18 mm in length, and 6 mm to 7 mm in thickness. Three of the metavolcanic gunflints also are of a spall type; the fourth has been bifacially worked. These gunflints are slightly larger than the European flints and range from 20 mm to 30 mm in length, 17 mm to 22 mm in width, and 6 mm to 9 mm in thickness. Two of the other gunflints are made on flakes; the third is a small, extensively reworked biface. Material: European flint–4, Metavolcanic rock–4, Chert–2, Quartz crystal–1. Comment: With the exception of one European gunflint from the top of Feature 73 (Burial 24), a Fredricks phase burial, and a probable chert gunflint from Feature 85 (attributed to the Jenrette phase), all of these artifacts were recovered from the plowzone. Given the large number of gunflints, gun parts, and lead shot that were found at the adjacent Fredricks site (see Carnes 1987), it is likely that most of these

gunflints are associated with that village rather than the mid-seventeenth century Jenrette village.

Drills (Figure 12.60*a–f*). Sample Size: 19. Form: Drills are bifacially worked tools that exhibit a long, rod-like projection that is roughly diamond-shaped in cross-section. Seven of the specimens in the sample are unbroken drills that were made on thick decortication or interior flakes, six are bases of broken drills that were made on similar flakes, five are small drill bit fragments, and one is an unbroken drill reworked from a triangular projectile point. Material: Metavolcanic rock–19. Comment: Drills are interpreted as woodworking implements and were recovered from Features 66, 71, 78, 84, 96, 98, and 123, and from the plowzone.

Chipped Hoe Fragments (Figure 12.61*a*). Sample Size: 3. Form: Chipped hoes are large, triangular to sub-triangular bifaces that have a bifacially chipped working edge that is transverse to the tool's long axis. All three specimens are fragments of broken hoes. Material: Schist–2, Metavolcanic rock–1. Comment: Chipped hoes are interpreted as agricultural or digging implements. These artifacts were recovered from Features 65 and 99, and from the plowzone.

End Scrapers. Sample Size: 4. Form: Three of these specimens are small interior flakes that have been retouched along the distal end to produce a steep, convex working edge. The fourth specimen is a large, patinated interior flake that has been similarly worked. Material: Metavolcanic rock–4. Comment: End scrapers are interpreted as hideworking tools. The large end scraper probably is associated with an earlier Archaic occupation of the site. The other artifacts probably were discarded during the Jenrette phase. Three of these artifacts were found in the plowzone; the other came from Feature 85.

Side Scrapers. Sample Size: 2. Form: One of these specimens is a large, thick, patinated flake that has been steeply retouched along one lateral edge. The other is a small quartz flake with steep, continuous retouch along one edge. Material: Metavolcanic rock–1, Vein quartz–1. Comment: Both of these artifacts came from the plowzone. Although the large side scraper almost certainly is an Archaic artifact, the cultural association of the quartz scraper is uncertain.

Pièces Esquillées (Figure 12.60*k–n*). Sample Size: 43. Form: Pièces esquillées are flakes, bifaces, or exhausted cores that exhibit one or more sharp, straight, crushed working edges, produced by repeated blows using a bipolar percussion technique. Most are generally rectangular in shape and range from 15 mm to 30 mm in length, 10 mm to 22 mm in width, and 5 mm to 10 mm in thickness. Material: Metavolcanic rock–36, Vein quartz–4, Crystal quartz–3. Comment: Pièces esquillées were the most frequent chipped stone tool category at the Jenrette site other than utilized and retouched flakes. These artifacts are interpreted as probable wedging or slotting tools for working bone or wood (see MacDonald 1968:85–90; Keeley 1980:40–41, 47). Pièces esquillées were recovered from the plowzone (n=26) and Features 65, 71, 75, 77, 78, 95, 96, 99, and 124. All of these features are attributed to the Jenrette phase.

Denticulates (Figure 12.60*o–p*). Sample Size: 4. Form: Three of these specimens are flakes that have isolated, retouched projections along their margins, producing a serrated working edge. The fourth specimen is a biface fragment that has unifacially retouched, serrated edges. Material: Metavolcanic rock–4. Comment: Denticulates are interpreted as cutting tools that may have been used to saw or shred wood or other vegetal materials. All four denticulates were recovered from the plowzone.

Spokeshaves (Figure 12.60*q*). Sample Size: 3. Form: Two of these specimens are large decortication flakes that have been worked along one edge to form a broad (15 mm to 17 mm), shallow (3 mm to 4 mm), steeply retouched concavity. The other specimen is a thin interior flake that possesses a similar working edge. Material: Metavolcanic rock–3. Comment: Tool morphology indicates a plane-like use, probably for woodworking. All of these artifacts came from the plowzone.

Perforators (Figure 12.60*g–h*). Sample Size: 14. Form: Perforators are flakes or bifaces that have been finely retouched to produce a pointed bit. One of these specimens is a *Guilford Lanceolate* projectile point that was subsequently reworked (probably during the Jenrette phase) into a perforator. The other specimens mostly are thick, elongate decortication or interior flakes that taper to a retouched point. Material: Metavolcanic rock–11, Vein quartz–2, Crystal quartz–1. Comment: Perforators are interpreted as probable hideworking punches. Four perforators were recovered from Jenrette phase Features 65, 77, and 123. The remainder came from the plowzone.

Gravers (Figure 12.60*i–j*). Sample Size: 4. Form: The three specimens made of metavolcanic rock are thin flakes that exhibit a small, sharp, finely retouched, triangular projection along one edge. The other specimen is a quartz core fragment that has a sharp, finely retouched, triangular projection. Material: Metavolcanic rock–3, Vein quartz–1. Comment: Gravers are interpreted as specialized engraving or scoring tools, and may have been used to work wood, bone, or antler. Two of these artifacts were recovered from Features 65 and 75; the others came from the plowzone.

Utilized and Retouched Flakes. Sample Size: 534. Form: This category includes flakes that exhibit marginal retouch (n=230) or edge damage (n=304) presumably resulting from use. Material: Metavolcanic rock–482, Vein quartz–61, Crystal quartz–3, Chert–2, Bottle glass–2, Quartzite–1. Comment: Utilized and

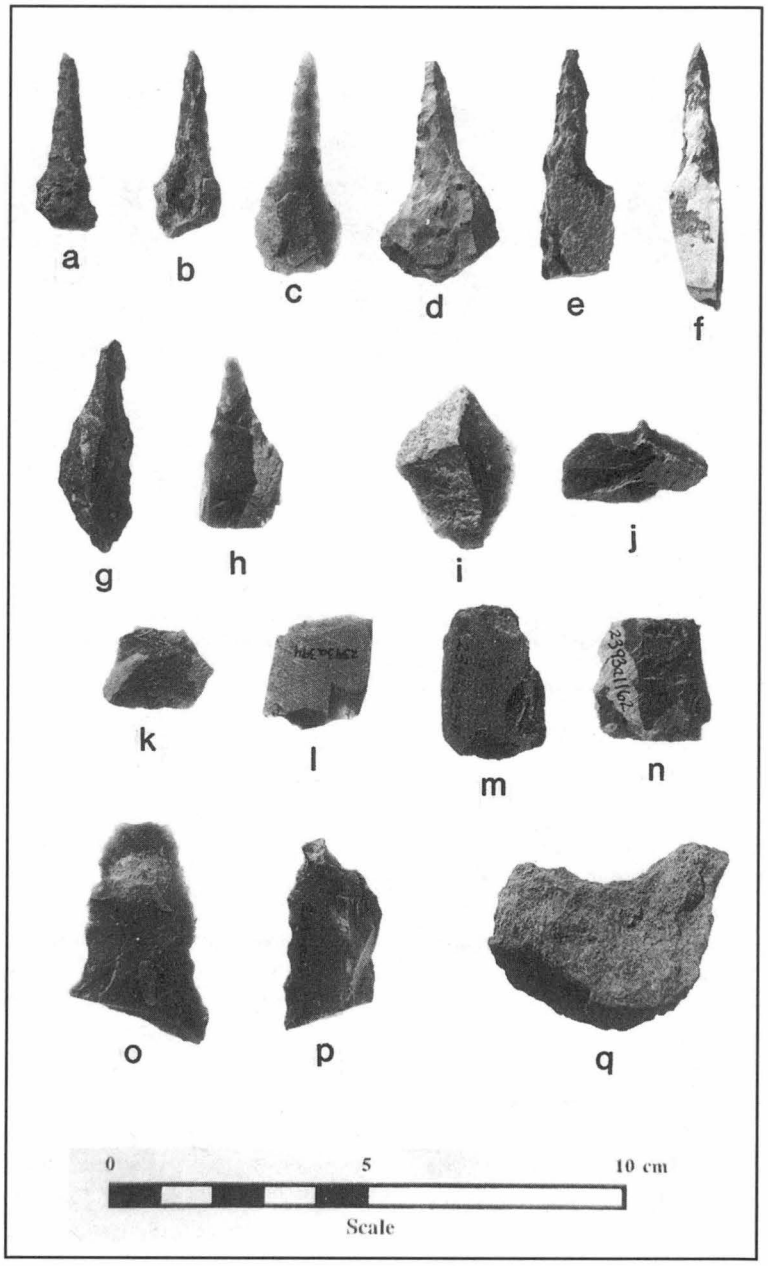

Figure 12.60. Miscellaneous chipped stone artifacts from the Jenrette site.

retouched flakes comprise the most common chipped stone artifact class represented at the Jenrette site and were recovered from the plowzone and most excavated features. These artifacts are interpreted as *ad hoc* cutting implements.

Ground Stone Artifacts

Ground Celt (Figure 12.61*c*). Sample Size: 1. Form: This specimen is a fragment of a small, well-made, ground and polished stone axe. It has parallel sides, is roughly oval in cross-section, has a convex bit, and measures 33 mm in width, 21 mm in thickness, and at least 68 mm length. Material: Fine-grained igneous rock–1. Comment: This artifact was recovered from Feature 65.

Engraved Stone. Sample Size: 1. Form: This specimen is a piece of siltstone that has lines engraved across one surface. Material: Siltstone–1. Comment: This artifact was found in Feature 99. Its function is unknown.

Ground Stone Fragments (Figure 12.61*b*). Sample Size: 6. Form: The soapstone specimen is probably a fragment of a stone bowl or pendant; the other specimens are unidentified fragments of ground stone tools (probably celts). Material: Metavolcanic rock–2, Other igneous rock–2, Schist–1, Soapstone–1. Comment: Unidentified ground stone fragments were recovered from Features 65, 66, 70, and the plowzone.

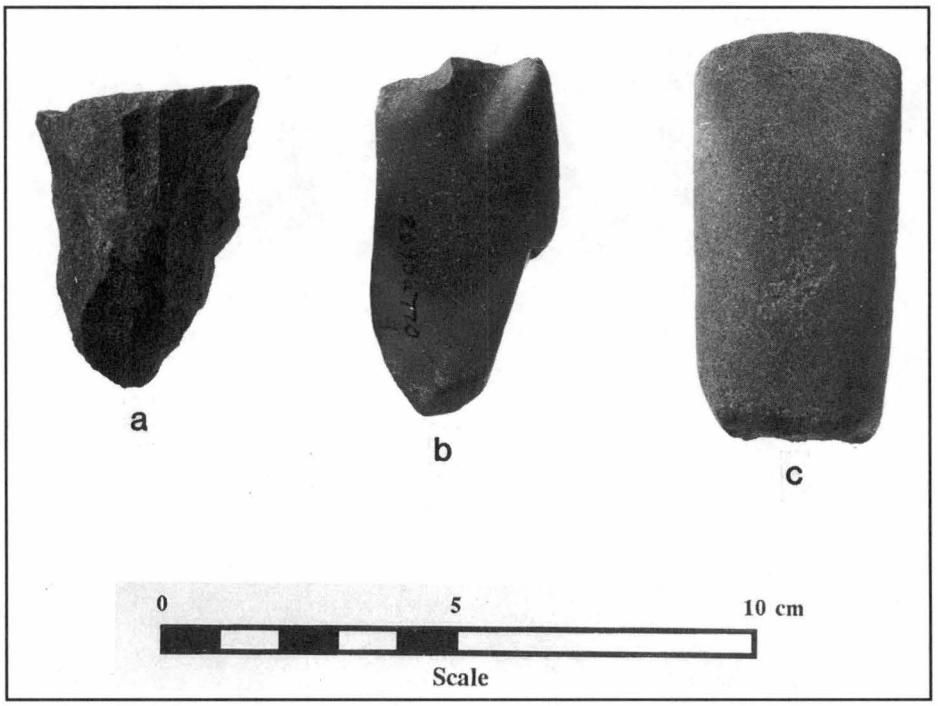

Figure 12.61. Large chipped and ground stone artifacts from the Jenrette site.

Large Cobble Tools

Cobble Choppers. Sample Size: 5. Form: These specimens are large cobbles or tabular pieces of rock that have been chipped along one side to form a sharp working edge. Material: Schist–3, Metavolcanic rock–1, Other igneous rock–1. Comment: These artifacts probably represent heavy butchering or digging implements, and were recovered from the plowzone.

Hammerstones/Manos. Sample Size: 12. Form: These specimens are fist-sized, spherical cobbles that exhibit battering or abrasion along one or more surfaces. Two also have been pitted through use as anvils. Material: Other igneous rock–8, Vein quartz–1, Quartzite–1, Schist–1, Unidentified rock–1. Comment: These artifacts are interpreted as hand-held hammers or grinding stones, and were recovered from Features 65, 66, 71, and 122, and the plowzone.

Anvils/Milling Stones. Sample Size: 12. Form: These specimens are large slabs or fragments of slabs that exhibit heavy abrasion, or have depressions resulting from grinding, on one or both faces. Material: Other igneous rock–6, Metavolcanic rock–5, Schist–1. Comment: These artifacts are interpreted as anvils or grinding stones used to mill corn or other seed crops. They were recovered from Features 65, 75, 77, 84, 90, 96, and 120, and from the plowzone.

Worked Slabs. Sample Size: 5. Form: This category includes large rock slabs that possess chipped or shaped edges but otherwise exhibit no evidence of use. Material: Schist–3, Metavolcanic rock–1, Slate–1. Comment: These artifacts were recovered from Features 65 and 98, and from the plowzone. Although their function is unknown, they may represent anvils or milling stones that were not heavily used.

Summary

Excavations at the Jenrette site produced an extensive and varied collection of lithic artifacts. Although some of these artifacts can be attributed to sporadic site occupations throughout the Archaic and Early-to-Middle Woodland periods, and more substantial activities during the preceding Haw River phase and subsequent Fredricks phase, most of the collection appears to be associated with the mid-seventeenth century Jenrette phase. The large numbers of artifacts that were found in Jenrette phase features are similar to those that were retrieved from the overlying plowzone, and reflect a thriving stone tool industry. Artifacts not associated with this phase mostly predate it and include all projectile points other than small triangular forms, a few bifaces and biface fragments, and several large, heavily patinated flakes. Gunflints comprise the one tool class that apparently post-dates the Jenrette phase. These artifacts probably are associated largely with the Occaneechi occupation at the adjacent Fredricks site, where numerous gunflints were recovered.

The Jenrette phase lithic assemblage suggests that stone tools were being produced and used at the site for a variety tasks, including hunting, butchering, hide-working, boneworking, woodworking, crop cultivation and digging, and plant food processing. The chipped stone projectile point industry was particularly interesting, being based largely upon the intensive production of triangular arrow points from small flakes. Unlike

the bifacial projectile points made during the preceding Haw River and Hillsboro phases, many of the Jenrette points are flakes that have been roughly shaped by pressure flaking, and are little more than triangular, retouched flakes. The large number of projectile points found, coupled with the minimal amount of effort represented, indicate that these points were being mass-produced. Chipped stone drills and pièces esquillées also were recovered in far greater numbers than expected, suggesting intensive woodworking and boneworking activities. Although woodworking products have not been preserved, several bone tools were found (in contrast to their near absence at the later Fredricks site).

Clay Pipes

One hundred and nine clay pipe fragments were recovered from the Jenrette site (Figure 12.62). They were divided into four general categories—traditional, terra-cotta, white clay, and kaolin—based on the kinds of clays used in their manufacture. Traditional pipes were made from clay resembling that used to make native pottery and appear to have been fired under similar conditions. In many instances, temper was added to this clay to produce a sandy or gritty paste. In contrast, terra-cotta pipes were made from a very fine, non-tempered clay that typically oxidized to a reddish-orange, brown, or "terra-cotta" color upon firing. These pipes usually display a very smooth or burnished surface.

White clay pipes resemble the terra-cotta specimens in that they were made using a very fine paste; however, the clay sometimes contained small orange inclusions. The uniformity of these particles suggests that they occurred naturally in the clay. White clay pipes range in color from white to a light smokey-gray. Their color is the main attribute that sets them apart from the terra-cotta specimens, whereas their fine paste sets them apart from the traditional category.

Kaolin pipes also are typically white in color; however, their stems, bores, and bowl walls are thinner than native specimens. In cross section, the stems present a uniform white color, indicating tightly controlled firing temperatures. Heels and mold seams are other common attributes that point to their European origins.

Within these general categories, the pipe fragments were further subdivided according to the segment or component of the complete specimen they represented (Table 12.5). Stems, bowls, heels, and combinations of these elements were recorded. A few broken pieces were obviously pipe fragments but were too small to identify what element they represented. While no unbroken pipes were recovered, a few nearly complete bowls were found.

Terra-cotta specimens, representing over 58% of the total sample, were the most popular. Most of these consisted of bowl fragments (Table 12.5). Complete or nearly complete bowls (n=4) indicate that the most popular style was a simple tulip-shaped bowl that connected to the stem at a slightly obtuse angle (Figure 12.62*a–e*). Another bowl form, represented by two specimens, had an incurvate rim which created a slightly carinated profile (Figure 12.62*h–i*). Most of the terra-cotta pipes displayed fine rouletted decorations which consisted of rings of interlocking diamonds or triangles around the circumference of the bowls and/or very fine parallel lines (Figure 12.62*d*). The geometric elements were filled with rouletting to set them off from the rest of the bowl. Mold seams were absent. The stems were usually smooth, straight, and non-tapering. They averaged 7 mm in outside diameter and had an inside bore diameter of about 5 mm.

Similar pipes have been found in a variety of archaeological contexts throughout Maryland and eastern Virginia. At the Nominy Plantation in Westmoreland County, Virginia, they were found in the lowest level of the excavation, below bottle seals and colonial ceramics dating between 1677 and 1686. Here they are believed to reflect a local (Colonial ?) pipemaking industry (Mitchell 1976:83–84). Terra-cotta pipes also have been reported from Flowerdew Hundred (Emerson 1986), a mid-seventeenth century Colonial trash dump in Northampton County, Virginia (Heite 1973), the Camden site in Carolina County, Virginia (Heite 1972), and numerous other mid-seventeenth century sites along the Middle Atlantic Seaboard. These pipes are sometimes referred to as "Tidewater" pipes, although they also have been found on Susquehannock sites in southern Pennsylvania (Kent 1984:147–148). Kent reports one specimen from the Schultz-Funk site that he believes may date as early as 1550 (Kent 1984:148).

In North Carolina, terra-cotta pipes decorated with rouletting and incising were found at Occaneechi Town (i.e., the Fredricks site), which dates to the turn of the eighteenth century, and at the late seventeenth century village of Upper Saratown. At both of these sites, the terra-cotta pipes often exhibited mold seams that were visible along the front of the bowl.

Typically, terra-cotta pipe forms resemble contemporary European pipes; however, the rouletted decorations consisting of sunbursts, stars, running deer, and various geometric patterns are generally thought to reflect Indian influence (Kent 1984:149). Most of the specimens described in the literature have come from colonial Euroamerican sites, although the Camden site was described as the house site of a single Indian family adopting a European lifestyle (MacCord 1969; Heite 1972). We think that, in some cases, it can be

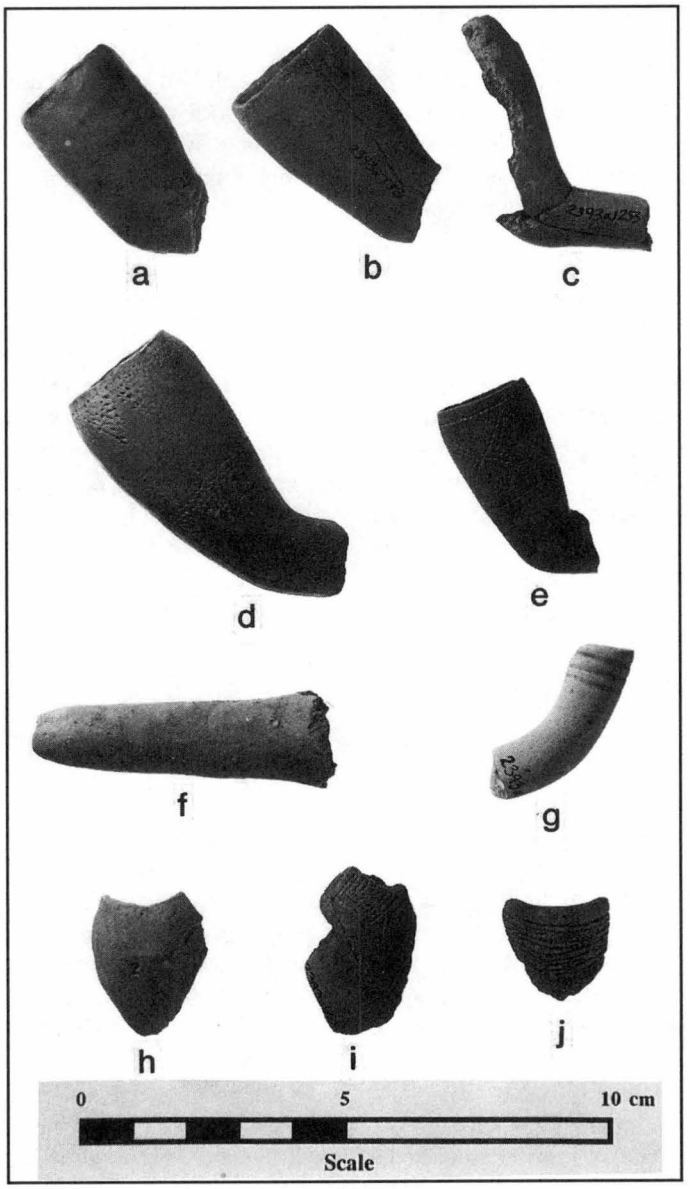

Figure 12.62. Clay pipe fragments from the Jenrette site.

argued that the designs on these pipes may reflect what European Americans considered to be "typical" or appealing to the natives rather than a reflection of indigenous stylistic tastes. And no doubt, many were made by colonial craftsmen specifically for trade with the Indians. Yet, terra-cotta pipes such as those from the Jenrette site may have been made by Indian potters. This assessment is based on the lack of mold seams and color variability in the Jenrette sample. These attributes suggest that they were not mass-produced using European kiln technology.

Although we cannot solve the problem of the origins of terra-cotta pipes—in fact they probably have several origins—the period of occupation for the Jenrette site is in line with the 1650-to-1680 time span generally assigned to similar pipes from the Tidewater region. The overwhelming evidence for their manufacture and use during this time period suggests that extreme caution should be exercised in accepting sixteenth-century dates, such as the one suggested by Kent (1984).

Traditional pipe fragments occurred with the second-highest frequency at the Jenrette site, comprising 17.4% of the sample (Table 12.5). Most of these are represented by stems that usually taper away from the bowl toward the mouthpiece (Figure 12.62*f*). One has an expanding stem. These stems are large compared with the terra-cotta pieces, and average 15 mm in outside diameter with an average inside bore diameter of 7 mm. No bowl fragments are large enough to get a clear picture of their form, but one stem terminates in the bottom of the bowl. Instead of joining the stem at a right or obtuse angle, the bowl appears to have continued along the same axis as the stem, making the

Table 12.5. Summary of clay pipes from the Jenrette site.

Type	Stem Fragments	Bowl Fragments	Heel Fragments	Bowl/Heel Fragment	Stem/Heel Fragments	Indeterminate Fragments	Total	%
Traditional	10	5	-	-	2	2	19	17.4
Terra-cotta	21	32	1	-	-	10	64	58.7
White Clay	3	6	-	-	1	-	10	9.2
Kaolin	4	8	1	1	2	-	16	14.7
Total	38	51	2	1	5	12	109	100.0

Table 12.6. Distribution of clay pipes from the Jenrette site.

	Plowzone		Jenrette Phase Features		Fredricks Phase Features	
Type	n	%	n	%	n	%
Traditional	10	52.6	9	47.4	0	0.0
Terra-cotta	3	4.9	61	95.1	0	0.0
White Clay	5	50.0	5	50.0	0	0.0
Kaolin	10	62.5	5	31.3	1	6.2
Total	28		80		1	

orifice parallel rather than perpendicular to the stem. Tubular pipes of this form are usually referred to as "onion" pipes. They were first recognized by Coe at the Wall site (Coe 1952:Figure 166*j*). Recently, these pipes have been found at the Fredricks site, the Mitchum site on the Haw River, and at Lower Saratown, Upper Saratown, and nearby early Upper Saratown on the Dan River. Most date to the latter half of the seventeenth century. The development of this pipe form is discussed in more detail in Chapter 9.

The remaining pipes at Jenrette are represented by stem, bowl, and miscellaneous fragments of white clay and kaolin. Most of these pieces are small and nondescript, except for a white clay stem. This piece represented the broad, L-shaped elbow of a tulip bowl pipe similar to specimens described as the "rage" during the Strickler period, ca. 1640–1665, in southern Pennsylvania (Kent 1984:147). The upper portion of the stem is decorated with three concentric bands of incised lines (Figure 12.62*g*). The white clay paste contains the small orange inclusions typical of other white clay pipe fragments.

Ten of the 16 kaolin pipe fragments were found in the plowzone and could easily date to the later Frederick phase occupation at the adjacent Fredricks site (Table 12.6). The remaining fragments were from the tops of two Jenrette phase features (Features 66 and 71) and the top of Feature 73 (Burial 24), a Fredricks phase burial.

The pipes at Jenrette appear to bridge the gap between the popular onion bowl varieties from Lower Saratown and the later popularity of imported kaolin pipes at Occaneechi Town. The large number of terra-cotta elbow pipes with tulip bowls points to a close affinity with Upper Saratown, thought to have been occupied between about 1670 and 1690. The evidence at hand suggests that these pipes, particularly those with rouletted decorations, may be excellent horizon markers for the Tidewater region as well as the north-central North Carolina Piedmont. The question of who made them may have several answers—Euroamericans, Indians, African-Americans—but the question of when they were made seems to have a single, straightforward answer—after 1650. Although they continued to be used until the beginning of the eighteenth century, the popularity of terra-cotta pipes declined as kaolin pipes became more readily available.

One thing seems clear from the pipe data collected during the course of the Siouan project—smoking increased sharply in popularity during the Contact period. It would appear that smoking—using tobacco as well as other materials—was restricted and probably ritually prescribed during the pre-Contact and early Contact periods. The evidence from sites occupied during the Haw River and Dan River phases suggests that smoking was not widespread. Hillsboro phase components continue to reflect this pattern of nonsecular smoking. However, by the middle of the seventeenth century, the number and variety of pipes show a marked increase. Terra-cotta elbow forms, reflecting European styles,

appear alongside traditional onion bowl varieties. And late in the Contact period, at sites like Fredricks, kaolin pipes became popular European trade items. Their numbers suggest that by this time smoking was a leisure activity enjoyed by almost everyone. Still, traditional pipe forms persist along side the imports. This persistence of old forms may mean that smoking continued to be an important part of purification and curing rituals. Perhaps, too, different varieties of tobacco were being used for different purposes after about 1650. A milder English blend may have been grown for everyday use, whereas traditional varieties continued to be cultivated for ceremonial purposes (cf. Swanton 1946:383).

Bone Artifacts

Twenty-four worked bone artifacts were recovered from 10 Jenrette phase features (Figure 12.63). The most common artifacts were worked antler and include specimens that have been modified by whittling (n=2), polishing (n=3), or a groove-and-snap technique (n=1). Other, more formalized antler artifacts include socketed antler projectile points, a tanged antler projectile point, and a 9.5 cm long antler segment with one end hollowed out, probably for use as a handle for a stone drill, perforator, or bone awl.

One fragmented beamer and seven beamer fragments were recovered. All were made from white-tailed deer metatarsals, or cannon bones. Although beamers are common on most prehistoric and early historic Siouan village sites in North Carolina, the Jenrette specimens appear to be unique in terms of their method of manufacture. Typically, such hideworking implements were made by taking a cannon bone, cutting or grinding a groove longitudinally along about two thirds of the ventral surface, and then enlarging the groove with an abrader to produce two sharp, parallel edges. Beamers made in this fashion almost always exhibit fine striations running lengthwise along the interior side of each "blade." The Jenrette tools, however, appear to have been made using an entirely different method. Instead of grinding a medial groove to produce the tool's working edges, each edge was cut, whittled, or sawed separately, and subsequently smoothed with an abrader. Consequently, each of these tools exhibits coarse striations along the interior blade edges, running perpendicular to the tool's long axis. In one instance, a tool was re-sharpened in a similar manner by working the outside blade edges. As interesting and unique as these tools are, it is unclear at present if they are in any way related to the intensifying deerskin trade or if they simply reflect variability in beamer-making among the piedmont Siouans.

Other bone artifacts found at the Jenrette site include two split bone awls, two split bone awl tips, a drilled turtle carapace fragment, and a drilled-tooth pendant made from a small mammal canine.

In general, the bone tool assemblage compares favorably in frequency and content with assemblages from the earlier, nearby Wall site and from Lower Saratown along the Dan River. Artifacts from both of these sites suggest a well-developed boneworking technology that contributed heavily to the overall tool inventory. Given that slightly later sites such as Upper Saratown and the Fredricks site contained almost no worked bone artifacts, Jenrette may be viewed as a final expression of the Siouan boneworking tradition.

Shell Artifacts

Shell beads did not occur frequently at Jenrette; only 93 were recovered from feature fill. Of these, small (3.0 mm in diameter) white disks predominated (n=61), followed by small black or dark gray disks (n=28), marginella beads (n=3), and a single large disk that measured 6.0 mm in diameter. The disks appear to have been cut from the walls of large marine bivalves and drilled. They averaged ca. 2.0 mm in thickness, and the central holes were cylindrical except for a slight depression on either face. The dark-colored "wampum" beads were identical in size and shape to the small white disks. Holes created by grinding the shoulders of the marginella shells provided access for stringing.

Over half (n=51) of these beads came from Feature 96. Seventeen were found in Feature 122, while the remainder were recovered from five other features (Features 63, 75, 78, 79, and 95) and Burial 22. Although identical to cut shell beads from Lower Saratown, they did not occur with the same frequency at the Jenrette site. Perhaps glass beads had surpassed shell beads—as well as brass beads—in popularity at Jenrette by the mid-seventeenth century.

Three complete and three fragments of serrated freshwater mussel shells were recovered from features (Figure 12.63). Four came from Feature 122 and one each came from Features 63 and 96. The whole shells were serrated around their entire perimeter except for the thick edge comprising the hinge. The edges were generally well worn, suggesting use as scrapers or pottery smoothing tools.

Although identical in form to tools from other Late Prehistoric and Contact period piedmont sites, the Jenrette shells were considerably smaller, averaging 4.0

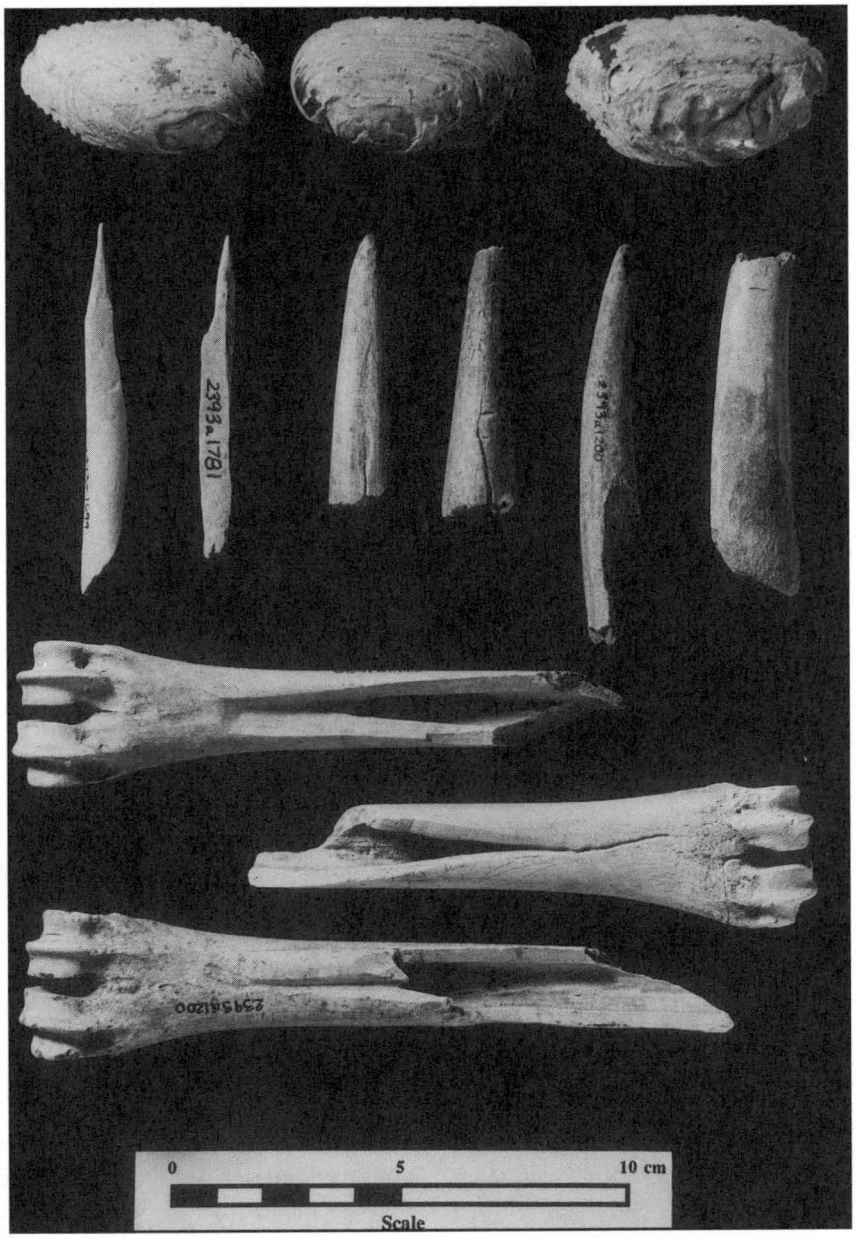

Figure 12.63. Bone and shell artifacts from the Jenrette site.

cm in length compared with 8.0 cm for the same species of serrated shells from Lower Saratown. This size difference may have seasonal or climatic implications.

Historic Artifacts

Historic artifacts found at the Jenrette site, with the exception of gunflints and kaolin pipe fragments which are summarized with lithic artifacts and clay pipes, respectively, are discussed below.

Glass Beads

Most of the 1,871 glass beads from the Jenrette site were small seed beads that probably were sewn on clothing (Table 12.7). These ranged from 1 mm to 3 mm in diameter and most were white, corresponding to Kidd and Kidd's (1970) Type IIa11. Dark blue to almost black seed beads (Kidd and Kidd's Type IIa48) were a distant second in popularity.

Other varieties of glass beads were rare. A "Large Seed Bead" category contained 12 specimens that ranged from 4 mm to 6 mm in diameter, and included Kidd and Kidd's Type IIa13 (white), Type IIa36 (light blue), and Type IIa55 (dark blue). Fourteen compound beads were found, and include 13 redwood-colored specimens with black interiors (Kidd and Kidd's Type

Table 12.7. Summary of glass beads from the Jenrette site.

Context	Small Seed Beads White	Dark Blue	Light Blue	Large Seed Beads White	Dark Blue	Light Blue	Compound Beads	Tubular Beads	Total
Fea. 65	267	6	3	-	-	2	1	-	279
Fea. 66	54	8	-	-	-	-	-	-	62
Fea. 70	1	-	-	-	-	-	-	-	1
Fea. 71	82	9	-	-	-	-	-	-	91
Fea. 72	1	-	-	-	-	-	-	-	1
Fea. 73	1	-	-	-	-	-	-	2	3
Fea. 74	9	-	-	-	-	1	-	-	10
Fea. 75	40	10	-	-	-	-	-	-	50
Fea. 76	212	-	-	1	1	2	13	-	229
Fea. 77	53	6	2	-	-	-	-	-	61
Fea. 78	8	2	-	-	-	-	-	-	10
Fea. 79	20	-	1	-	-	1	-	-	22
Fea. 80	663	8	-	-	-	-	-	-	671
Fea. 81	2	2	1	-	-	-	-	-	5
Fea. 84	42	13	-	-	-	-	-	-	55
Fea. 85	32	11	2	-	-	-	-	-	45
Fea. 88	1	-	-	-	-	-	-	-	1
Fea. 91	-	1	-	-	-	-	-	-	1
Fea. 92	1	2	-	-	-	-	-	-	3
Fea. 95	5	8	-	-	-	-	-	-	13
Fea. 96	9	6	5	-	-	-	-	-	20
Fea. 98	26	4	-	-	1	1	-	-	32
Fea. 99	35	4	4	-	-	1	-	-	44
Fea. 120	58	4	2	-	-	-	-	-	64
Fea. 121	4	2	-	-	-	-	-	-	6
Fea. 122	55	11	5	-	-	1	-	-	72
Fea. 123	20	-	-	-	-	-	-	-	20
Total	1701	117	25	1	2	9	14	2	1871
Percent	90.91	6.25	1.34	0.05	0.11	0.48	0.75	0.11	100.00

IVa1) from Burial 21 (Feature 76) fill and a single small, striped bead from Feature 65. The latter specimen, corresponding to Kidd and Kidd's Type IIb5, was black and had redwood stripes on a white background.

Burial 21 is associated with the later occupation of the adjacent Fredricks site which explains the presence of redwood-colored *Cornaline de Allepo* beads in the fill. Identical beads also were found strung around the neck of the burial. Finally, two black tubular specimens measuring 6 mm by 3 mm (Kidd and Kidd's Type Ia2) were retrieved while cleaning around Burial 24 (Feature 73). This burial also is associated with the later Fredricks phase occupation.

Beads from non-feature contexts included two small white seed beads and a large *Cornaline de Allepo* bead from the plowzone, 17 white seed beads and a small dark blue bead from the backdirt, and seven small white beads and one dark blue bead from the wall trenches of Structure 1.

Compared with the Lower Saratown sample, the number of beads recovered from Jenrette is considerable; however, in terms of the types represented, the bead samples from these two sites are very similar. Both samples lack the variety found on later sites such as Fredricks, William Kluttz, and Upper Saratown. Also, while numerous compared with Lower Saratown, the overall quantity of beads from the Jenrette site, as well as their frequency of occurrence in individual features, is low compared with the later Contact period sites mentioned above.

Metal Trade Artifacts

Brass artifacts were observed in two features. A rolled tubular bead (4 mm in diameter and 5 mm in length), made from a piece of sheet brass, was found in Feature 122 and is attributed to the Jenrette phase. This specimen is identical to brass beads recovered from Lower Saratown; however, its singular presence at Jenrette suggests that the popularity of brass beads may have waned after the widespread introduction of glass beads.

Ten flush-edge, flush-loop brass bells were associated with Burial 21 (Feature 76), an Occaneechi grave

associated with the Fredricks site occupation. Sheet brass bells with flat loops were associated with Burial 7 at Fredricks (Carnes 1987:152) and also have been frequently found in graves at Upper Saratown. Their apparent absence during the Jenrette phase suggests they were not available as trade items when the village was occupied.

Two other brass artifacts were found in the plowzone: a fragment of a curry comb blade and a thin, irregular fragment of 1 mm thick sheet brass measuring 21 mm by 15 mm. The curry comb piece is similar to one found at Guilford Courthouse (Ward 1973:39) and probably dates to the late eighteenth century—a time when the site area was being used as a race track by the early colonial Hillsborough residents.

Other metal artifacts from undisturbed feature contexts include five unidentifiable iron fragments from Features 65, 71, 75, 98, and 99. All of these contexts are attributed to the Jenrette phase. These poorly preserved linear "blobs" resembled nails but were too deteriorated to identify with certainty. During 1990, a fragmented pewter pipe was found in association with Burial 25 (Feature 83)—an Occaneechi burial. Pewter pipes also were recovered from the Fredricks site (Carnes 1987).

Seventy additional fragments of iron were found in the plowzone with "nails" being the only category that could be sorted with confidence. Most of these could not be typed and, given the disturbed nature of their context, may date to any segment of the Contact period. As a consequence, a detailed analysis of plowzone nails was not attempted.

Although not encountered frequently, lead shot demonstrated some variability. One ball each was found in Jenrette phase Features 65, 92, 96, 98, and 122. Feature 95 yielded two shot. Most (n=4) of the specimens were of buckshot size (i.e., 7 mm to 9 mm in diameter) or around .30 caliber. Two pellets measured only 2 mm in diameter and resembled small, No. 10 birdshot used in shotguns today. A single large ball measured 15 mm in diameter, or .59 caliber, and was flattened on one side, apparently from impact. This shot could not have been fired as part of a multiple load as the others no doubt were. No other gun parts were recovered.

Buckshot pellets were frequently found at the Fredricks site along with locks and other mechanisms from dog-lock fowling muskets. Burial 6 contained a complete dog-lock, long-fowler musket. These guns were frequently traded to eastern Indians as early as 1625 and continued in use until about 1700 (Carnes 1987:145). The small number of lead shot and the absence of gun parts clearly mean that such weapons were rare at Jenrette, although their use is amply indicated at the later Fredricks site.

Bottle Glass

Twenty-four small, fingernail-sized, green glass flakes came from the fill of Feature 65. Two identical flakes also were recovered from Feature 85. These resembled debitage from secondary retouch and may reflect the use of bottle glass in making scrapers, projectile points, or other tools ordinarily manufactured from stone. No glass tools, however, have been retrieved from the Jenrette or Fredricks sites.

The plowzone produced 11 dark green bottle glass fragments that range from 4 mm to 8 mm in thickness. Similar pieces probably provided the raw material for the flakes described above. The color and thickness of this glass is very similar to fragments from Fredricks as well as the two complete wine bottles associated with Fredricks site burials (Carnes 1987:148).

The lack of complete containers or even large fragments indicates that glass was a rare commodity during the mid-seventeenth century, and given the small retouch flakes described above, small glass pieces may have been used primarily to make tools in the aboriginal tradition. Perhaps these small fragments were traded among the Indians themselves as rare containers were broken.

One hundred and eleven additional fragments of glass were recovered from the plowzone. Most of these also are from bottles that post-date the Indian occupation of the Hillsborough area.

Miscellaneous Artifacts

Numerous other Euroamerican artifacts were recovered from the plowzone and include 114 brick fragments, 23 pieces of coal, 3 cinders, and 101 potsherds. All of these artifacts appear to be associated with the period following the settlement of Hillsborough in the mid-1700s and, therefore, are not related to the aboriginal occupation of the site.

Faunal Remains

Excavations during 1989 at the Jenrette site produced 22,818 animal bones and bone fragments (Table 12.8). All but 161 of these specimens came from feature contexts; the remainder came from plowed soil overlying features. Large amounts of animal bone were recovered from Features 63, 65, 75, 95, 96, and 122. Feature 65 was a food preparation facility or roasting pit located just outside the Jenrette phase palisade; the other features were located along the inside of the palisade and, except for Feature 63, also were interpreted as food preparation facilities. Most of the animal bone found at the site is associated with the Jenrette phase.

Approximately 70% of all recovered animal bones

Table 12.8. Faunal remains from the Jenrette site.

Species	Count N	Count %	Weight Grams	Weight %	MNI N	MNI %
Mammals						
Didelphus virginianus, Opossum	8	0.04	17.7	0.07	5	4.85
Sciurus niger, Fox Squirrel	1	0.00	0.3	0.00	1	0.97
Sciurus carolinensis, Gray Squirrel	2	0.01	0.5	0.00	1	0.97
Sciurus sp., Squirrel	3	0.01	0.8	0.00	-	-
Castor canadensis, Beaver	19	0.08	81.8	0.30	2	1.94
Peromyscus sp., Deer Mouse	2	0.01	<0.1	0.00	1	0.97
Ondatra zibetheca, Muskrat	1	0.00	2.3	0.01	1	0.97
Canis familiaris, Dog	1	0.00	<0.1	0.00	1	0.97
Ursus americanus, Black Bear	3	0.01	130.6	0.49	1	0.97
Procyon lotor, Raccoon	54	0.24	87.3	0.33	6	5.83
Odocoileus virginianus, White-tailed Deer	3277	14.36	17619.9	65.67	39	37.86
Unidentified Mammals	577	2.53	1054.1	3.93	-	-
Total Mammals	3948	17.30	18995.4	70.79	58	56.31
Birds						
Meleagris gallapavo, Wild Turkey	39	0.17	76.7	0.29	2	1.94
Colinus virginianus, Bobwhite Quail	1	0.00	0.1	0.00	1	0.97
Ectopistes migratorius, Passenger Pigeon	1	0.00	0.1	0.00	1	0.97
Unidentified Birds	146	0.64	61.3	0.23	-	-
Total Birds	187	0.82	138.2	0.52	4	3.88
Reptiles						
Chelydra serpentina, Snapping Turtle	94	0.41	247.5	0.92	3	2.91
Kinosternon sp., Mud Turtle	303	1.33	64.9	0.24	6	5.83
Terrapene carolina, Box Turtle	1819	7.97	2130.9	7.94	21	20.39
Pseudemys floridanal, Cooter	38	0.17	64.5	0.24	1	0.97
Unidentified Turtle	258	1.13	71.1	0.26	-	-
Agkistrodon sp., Copperhead	2	0.01	0.5	0.00	1	0.97
Lampropeltis sp., King Snake	3	0.01	0.8	0.00	1	0.97
Natrix sp., Water Snake	18	0.08	1.7	0.01	1	0.97
Coluber sp., Black Racer	2	0.01	0.3	0.00	1	0.97
Unidentified Snake	5	0.02	0.7	0.00	-	-
Total Reptiles	2542	11.14	2582.9	9.63	35	33.98
Amphibians						
Scaphiopus holbrooki, Spadefoot Toad	3	0.01	0.3	0.00	1	0.97
Unidentified Amphibians	9	0.04	1.8	0.01	-	-
Total Amphibians	12	0.05	2.1	0.01	1	0.97
Fish						
Lepisosteus sp., Gar	1	0.00	0.1	0.00	1	0.97
Catostomus sp., Suckers	1	0.00	0.1	0.00	1	0.97
Ictalurus sp., Catfish	2	0.01	0.3	0.00	1	0.97
Lepomis sp., Sunfish	10	0.04	1.3	0.00	2	1.94
Unidentified Fish	47	0.21	6.2	0.02	-	-
Total Fish	61	0.27	8.0	0.03	5	4.85
Unidentified	16068	70.42	5106.2	19.03	0	0.00
Total	22818	100.00	26832.8	100.00	103	100.00

were unidentifiable fragments. The remaining specimens represent a minimum of 103 individuals belonging to at least 26 different species. Over 56% of these individuals are mammals, 4% are birds, 34% are reptiles, 1% are amphibians, and 5% are fish.

Mammals

White-tailed deer was the predominant source of meat for the Jenrette site inhabitants, and accounted for over 97% of all identified mammal bones and 48% of all identified bones from the site. At least 39 individuals are represented in the sample. The occurrence of a small triangular projectile point imbedded in a deer scapula from Feature 96 attests to the use of the bow-and-arrow by Jenrette hunters. Raccoon (MNI=6), opossum (MNI=5), and beaver (MNI=2) were the only other mammals represented by more than one individual. Single individuals of fox squirrel, gray squirrel, deer mouse, muskrat, dog, and black bear also were represented in the sample.

Birds

Only 41 of the 187 bird bones could be identified by species. Single individuals of passenger pigeon and bobwhite quail were represented by two bones. The remaining 39 bones represent at least two wild turkeys.

Reptiles

Several reptilian species were represented in the sample. Most frequent among these were box turtle (MNI=21), mud turtle (MNI=6), and snapping turtle (MNI=3). Other reptile bones apparently represent single individuals and include cooter, copperhead, king snake, water snake, and black racer.

Amphibians

Only 12 amphibian bones were recovered. Three of these represent a single spadefoot toad.

Fish

Sixty-one fish bones were recovered from the Jenrette site. Only 14 of these could be identified and represent a gar, sucker, catfish, and at least two sunfish. All of these individuals probably were taken from the nearby Eno River.

Shell

Numerous shells and shell fragments of freshwater mussels were found mixed with the food refuse contained in the various pits. The greatest concentrations of shell occurred in Features 96 and 122. Both of these features also contained large animal bone deposits. Freshwater mussels, taken from the nearby Eno River, probably were used in stews and soups, and contributed variety to the diet. A solitary piece of oyster shell represented the only unmodified marine specimen.

Summary

The faunal assemblage from the Jenrette site reflects a variety of species that contributed to the overall diet. The predominant source of meat almost certainly was the white-tailed deer; however, raccoon, opossum, beaver, black bear, squirrels, muskrat, turkey, turtles, shellfish, and various fish species also contributed to the diet. Most of these species also provided raw materials in the form of skins, pelts, feathers, and bone for making clothing, robes, and tools. Numerous other species, including dog, deer mouse, snakes, and toads probably do not represent meat sources but rather inhabitants of the site environment. Consequently, the presence of these animals within the sample is considered to be fortuitous and unrelated to the Jenrette subsistence strategy.

Botanical Remains

by

Kristen J. Gremillion

Carbonized plant remains from the 1989 excavations at the Jenrette site were recovered from 45 10-liter, one 5-liter, and two 2.5-liter flotation samples. These samples produced 253.66 grams of wood charcoal, nutshell, seeds, and other charred plant remains. Plant remains also were recovered from waterscreened feature fill but were not systematically analyzed.

Method of Analysis

All flotation samples were analyzed according to methods outlined by Gremillion (1987, 1989). Each sample was screened through a series of U.S. Standard geological sieves. Material remaining in the 2.0 mm and larger screens was completely sorted and quantified. Smaller material was searched only for seeds, cultigen remains, and items not noted amongst the largest fragments. Several heavy fractions were sorted completely only through the 2.38-mm size category. Further sorting of these samples would have produced largely redundant results due to the unusually large quantities of charcoal they contained. Tables 12.9 to 12.12 present estimated quantities of plant remains above 0.71 mm in size extrapolated on the basis of actual proportions in the fully sorted size category.

Jenrette Phase

Most of the plant remains from the 1989 field season were recovered from Jenrette phase features. Features of indeterminate cultural affiliation were grouped with Jenrette phase contexts for purposes of

Table 12.9. Summary of plant remains from the Jenrette site (weights in grams).

Sample	Soil Volume (liters)	Wood/Stem Charcoal	Cane	Unknown Plants	Pedicel/ Petiole	Plant Food Remains	Total
Jenrette Phase Features							
Feature 62							
Zone 1	10.0	2.51	-	0.03	-	0.12	2.66
Feature 63							
Zone 1	10.0	5.19	-	0.05	-	0.37	5.61
Feature 64							
Zone 1	10.0	1.20	-	0.04	-	0.02	1.26
Feature 65							
Zone 1	10.0	1.60	-	0.05	-	1.14	2.79
Zone 2	10.0	0.53	-	0.11	-	0.06	0.70
Sub-total	20.0	2.13	-	0.16	-	1.20	3.49
Feature 66							
Zone 1	10.0	3.27	-	0.03	-	0.71	4.01
Feature 67							
Zone 1	10.0	4.33	-	0.04	-	1.21	5.58
Zone 2	10.0	0.14	-	-	-	0.01	0.15
Sub-total	20.0	4.47	-	0.04	-	1.22	5.73
Feature 68							
Zone 1	10.0	4.67	-	-	-	0.01	4.68
Feature 70							
Zone 1	10.0	1.64	-	0.03	-	0.15	1.82
Feature 71							
Zone 1	10.0	1.96	-	0.03	-	0.38	2.37
Feature 75							
Zone 1	10.0	6.37	-	1.20	-	1.42	8.99
Feature 77							
Zone 1	10.0	3.35	-	-	-	0.01	3.36
Feature 78							
Zone 1	10.0	5.17	-	0.27	-	0.41	5.85
Feature 79							
Zone 1	10.0	1.94	-	0.16	-	0.41	2.51
Feature 80 (Burial 22)							
Zone 1	10.0	3.77	-	0.21	-	1.03	5.01
Zone 1	10.0	0.60	-	0.05	-	0.01	0.66
Sub-total	20.0	4.37	-	0.26	-	1.04	5.67
Feature 84							
Zone 1	10.0	9.55	-	0.23	-	0.70	10.48
Zone 1	2.5	3.98	-	0.01	-	0.16	4.15
Sub-total	12.5	13.53	-	0.24	-	0.86	14.63
Feature 85							
Zone 1	10.0	8.38	0.03	0.62	-	43.11	52.14
Zone 2	10.0	0.97	-	0.02	-	0.97	1.96
Sub-total 85	20.0	9.35	0.03	0.64	-	44.08	54.10
Feature 86							
Zone 1	10.0	3.05	-	0.20	-	1.03	4.28
Feature 87							
Zone 1	10.0	0.56	-	0.22	-	0.07	0.85
Feature 90							
Zone 1	10.0	0.31	-	0.02	-	0.16	0.49
Feature 91							
Zone 1	10.0	0.39	-	0.07	-	0.23	0.69
Feature 92							
Zone 1(1)	10.0	0.30	-	-	-	0.02	0.32
Zone 1(2)	10.0	0.23	-	0.01	-	0.10	0.34
Zone 2	10.0	0.46	-	0.01	-	0.02	0.49
Sub-total	30.0	0.99	-	0.02	-	0.14	1.15

Table 12.9 Continued.

Sample	Soil Volume (liters)	Wood/Stem Charcoal	Cane	Unknown Plants	Pedicel/ Petiole	Plant Food Remains	Total
Jenrette Phase Features (continued)							
Feature 93							
Zone 1	10.0	1.01	-	-	-	-	1.01
Feature 95							
Zone 1	10.0	5.50	-	0.69	-	9.75	15.94
Zone 2	10.0	1.64	-	0.06	-	0.85	2.55
Sub-total	20.0	7.14	-	0.75	-	10.60	18.49
Feature 96							
Zone 1	10.0	10.23	-	1.16	-	6.05	17.44
Feature 98							
Zone 1	10.0	3.92	-	0.17	-	2.87	6.96
Zone 2	10.0	1.16	-	0.01	-	0.03	1.20
Sub-total	20.0	5.08	-	0.18	-	2.90	8.16
Feature 99							
Zone 1	10.0	0.58	-	-	-	<0.005	0.58
Zone 1	10.0	0.93	-	0.11	0.01	0.07	1.12
Zone 2	10.0	7.39	-	0.18	-	1.06	8.63
Sub-total	30.0	8.90	-	0.29	0.01	1.13	10.33
Feature 113							
Zone 1	10.0	0.18	-	-	-	0.52	0.70
Zone 2	10.0	0.25	-	-	-	0.03	0.28
Sub-total	20.0	0.43	-	-	-	0.55	0.98
Feature 114							
Zone 1	10.0	7.69	-	0.02	-	0.66	8.37
Feature 116							
Zone 1	2.5	4.35	-	0.19	-	0.80	5.34
Feature 118							
Zone 1	10.0	0.36	-	-	-	0.01	0.37
Feature 120							
Zone 1	10.0	2.52	-	0.03	-	3.25	5.80
Feature 121							
Zone 1	10.0	4.31	-	0.99	-	0.30	5.60
Zone 2	5.0	0.23	-	0.01	-	<0.005	0.24
Sub-total	15.0	4.54	-	1.00	-	0.30	5.84
Feature 122							
Zone 1	10.0	25.40	-	1.85	-	6.88	34.13
Feature 123							
Zone 1	10.0	1.29	-	-	-	0.75	2.04
Feature 124							
Zone 1	10.0	1.15	-	-	-	0.01	1.16
Sub-Total	460.0	156.51	0.03	9.18	0.01	87.93	253.66
Haw River Phase Features							
Feature 72							
Zone 1	10.0	1.08	-	0.01	-	0.14	1.23
Feature 81							
Zone 1	10.0	0.92	-	0.02	-	0.06	1.00
Zone 2	10.0	0.71	-	-	-	0.22	0.93
Sub-total	20.0	1.63	-	0.02	-	0.28	1.93
Feature 82							
Zone 1	10.0	2.23	-	-	0.06	0.06	2.35
Feature 89							
Zone 1	10.0	0.76	-	-	-	0.18	0.94
Feature 94							
Zone 1	10.0	3.60	-	0.08	-	0.26	3.94

Table 12.9 Continued.

Sample	Soil Volume (liters)	Wood/Stem Charcoal	Cane	Unknown Plants	Pedicel/ Petiole	Plant Food Remains	Total
Haw River Phase Features (continued)							
Feature 125							
Zone 1	10.0	2.11	-	0.23	-	0.40	2.74
Sub-Total	70.0	11.41	-	0.34	0.06	1.32	13.13
Fredricks Phase Features							
Feature 73 (Burial 24)							
Zone 1	10.0	6.13	-	0.10	-	4.10	10.33
Zone 2	10.0	0.20	-	-	-	0.04	0.24
Sub-total	20.0	6.33	-	0.10	-	4.14	10.57
Feature 74 (Burial 23)							
Zone 1	10.0	0.91	-	0.06	-	0.24	1.21
Zone 2	10.0	0.11	-	0.05	-	0.08	0.24
Sub-total	20.0	1.02	-	0.11	-	0.32	1.45
Feature 76 (Burial 21)							
Zone 1	10.0	0.31	-	-	-	0.39	0.70
Zone 2	10.0	0.10	-	-	0.02	0.02	0.14
Sub-total	20.0	0.41	-	-	0.02	0.41	0.84
Sub-Total	60.0	7.76	-	0.21	0.02	4.87	12.86
Total	590.0	175.68	0.03	9.73	0.09	94.12	279.65

Table 12.10. Carbonized plant food remains from the Jenrette site (weights in grams).

Sample	Hickory Shell	Acorn Shell	Walnut Shell	Peach Pit	Maize Kernels	Maize Cupules	Seeds	Other	Total
Jenrette Phase Features									
Feature 62									
Zone 1	0.06	<0.005	0.02	-	0.03	0.01	-	-	0.12
Feature 63									
Zone 1	0.13	0.02	0.01	-	0.05	-	0.16	-	0.37
Feature 64									
Zone 1	0.02	<0.005	-	-	-	-	-	-	0.02
Feature 65									
Zone 1	0.90	0.05	-	0.16	0.03	-	<0.005	-	1.14
Zone 2	0.04	<0.005	-	0.01	0.01	-	-	-	0.06
Sub-total	0.94	0.05	-	0.17	0.04	-	<0.005	-	1.20
Feature 66									
Zone 1	0.68	0.03	-	-	-	-	<0.005	-	0.71
Feature 67									
Zone 1	0.71	0.19	0.22	-	-	-	0.01	0.08 (Nutmeat)	1.21
Zone 2	0.01	<0.005	-	-	-	-	-	-	0.01
Sub-total	0.72	0.19	0.22	-	-	-	0.01	0.08	1.22
Feature 68									
Zone 1	<0.005	0.01	-	-	-	-	<0.005	-	0.01
Feature 70									
Zone 1	0.11	-	0.01	0.03	-	-	<0.005	-	0.15
Feature 71									
Zone 1	0.34	-	-	0.04	-	-	-	-	0.38

Table 12.10 Continued.

Sample	Hickory Shell	Acorn Shell	Walnut Shell	Peach Pit	Maize Kernels	Maize Cupules	Seeds	Other	Total
Jenrette Phase Features (continued)									
Feature 75									
Zone 1	1.32	0.06	-	-	0.01	-	0.02	0.01	1.42
Feature 77								(Gourd rind)	
Zone 1	-	0.01	-	-	-	-	-	-	0.01
Feature 78									
Zone 1	0.20	0.15	-	-	-	-	-	0.06	0.41
Feature 79								(Acorn meat)	
Zone 1	0.25	0.02	0.04	0.01	0.07	-	-	0.02	0.41
Feature 80 (Burial 22)							(Common bean)		
Zone 1	0.96	0.07	-	-	-	<0.005	<0.005	-	1.03
Zone 1	-	<0.005	-	0.01	-	-	-	-	0.01
Sub-total	0.96	0.07	-	0.01	-	<0.005	<0.005	-	1.04
Feature 84									
Zone 1	0.59	0.06	-	0.02	0.02	-	<0.005	0.01	0.70
								(Common bean)	
Zone 1	0.01	0.06	-	-	0.02	-	0.07	-	0.16
Sub-total	0.60	0.12	-	0.02	0.04	-	0.07	0.01	0.86
Feature 85									
Zone 1	40.72	-	1.89	0.38	0.07	-	0.05	-	43.11
Zone 2	0.82	0.02	-	0.05	0.01	-	0.07	-	0.97
Sub-total	41.54	0.02	1.89	0.43	0.08	-	0.12	-	44.08
Feature 86									
Zone 1	1.03	-	-	-	-	-	-	-	1.03
Feature 87									
Zone 1	-	-	-	0.07	-	<0.005	<0.005	-	0.07
Feature 90									
Zone 1	0.09	0.02	-	-	-	-	0.05	-	0.16
Feature 91									
Zone 1	0.05	-	0.18	-	-	-	-	-	0.23
Feature 92									
Zone 1 (1)	0.02	-	-	-	-	<0.005	-	-	0.02
Zone 1 (2)	0.01	-	-	0.08	0.01	<0.005	-	-	0.10
Zone 2	0.02	<0.005	-	-	-	-	-	-	0.02
Sub-total	0.05	<0.005	-	0.08	0.01	-	-	-	0.14
Feature 95									
Zone 1	7.57	0.01	1.57	-	0.04	-	0.49	0.07	9.75
								(Nutmeat)	
Zone 2	0.75	-	0.05	-	0.02	-	0.03	-	0.85
Sub-total	8.32	0.01	1.62	-	0.06	-	0.52	0.07	10.60
Feature 96									
Zone 1	2.32	3.53	0.17	-	0.02	-	0.01	-	6.05
Feature 98									
Zone 1	0.02	<0.005	-	2.83	-	<0.005	0.02	-	2.87
Zone 2	0.03	-	-	-	-	<0.005	<0.005	-	0.03
Sub-total	0.05	<0.005	-	2.83	-	<0.005	0.02	-	2.90
Feature 99									
Zone 1	-	<0.005	-	-	-	-	-	-	<0.005
Zone 1	0.05	-	0.02	-	<0.005	-	-	-	0.07
Zone 2	1.00	0.06	-	-	-	-	-	-	1.06
Sub-total	1.05	0.06	0.02	-	<0.005	-	-	-	1.13
Feature 113									
Zone 1	0.02	-	-	-	0.50	-	<0.005	-	0.52
Zone 2	0.03	-	-	-	<0.005	-	-	-	0.03
Sub-total	0.05	-	-	-	0.50	-	<0.005	-	0.55

Table 12.10 Continued.

Sample	Hickory Shell	Acorn Shell	Walnut Shell	Peach Pit	Maize Kernels	Maize Cupules	Seeds	Other	Total
Jenrette Phase Features (continued)									
Feature 114									
Zone 1	0.24	-	0.11	0.18	0.12	-	0.01	-	0.66
Feature 116									
Zone 1	-	-	-	0.79	-	-	0.01	-	0.80
Feature 118									
Zone 1	0.01	-	-	-	-	<0.005	-	-	0.01
Feature 120									
Zone 1	1.79	0.01	1.45	<0.005	-	-	<0.005	<0.005 (Gourd rind)	3.25
Feature 121									
Zone 1	0.24	0.04	-	-	-	-	0.02	-	0.30
Zone 2	<0.005	-	-	-	-	<0.005	-	-	<0.005
Sub-total	0.24	0.04	-	-	-	<0.005	0.02	-	0.30
Feature 122									
Zone 1	5.54	0.60	0.02	0.66	0.04	-	0.01	0.01 (Gourd rind)	6.88
Feature 123									
Zone 1	0.71	<0.005	0.03	-	0.01	-	<0.005	-	0.75
Feature 124									
Zone 1	0.01	-	-	-	-	-	-	-	0.01
Sub-Total	69.42	5.02	5.79	5.32	1.08	0.01	1.03	0.26	87.93
Haw River Phase Features									
Feature 72									
Zone 1	0.14	-	-	-	<0.005	-	<0.005	-	0.14
Feature 81									
Zone 1	0.04	-	-	-	-	0.01	0.01	-	0.06
Zone 2	0.22	-	-	-	-	-	<0.005	-	0.22
Feature 82									
Zone 1	0.04	0.02	-	-	-	-	<0.005	-	0.06
Feature 89	0.12	<0.005	-	-	<0.005	0.06	-	-	0.18
Feature 94									
Zone 1	0.08	-	0.09	-	-	0.09	-	-	0.26
Feature 125									
Zone 1	0.32	0.07	-	-	-	-	0.01	-	0.40
Sub-Total	0.96	0.09	0.09	-	<0.005	0.16	0.02	-	1.32
Fredricks Phase Features									
Feature 73 (Burial 24)									
Zone 1	3.39	-	0.07	0.01	0.03	0.57	0.03	-	4.10
Zone 2	0.04	<0.005	-	-	-	<0.005	-	-	0.04
Sub-total	3.43	<0.005	0.07	0.01	0.03	0.57	0.03	-	4.14
Feature 74 (Burial 23)									
Zone 1	0.11	0.01	-	0.01	0.01	0.10	-	-	0.24
Zone 2	0.06	-	-	-	-	0.02	<0.005	-	0.08
Sub-total	0.17	0.01	-	0.01	0.01	0.12	<0.005	-	0.32
Feature 76 (Burial 21)									
Zone 1	0.39	<0.005	-	-	-	-	-	-	0.39
Zone 2	0.01	-	-	-	-	0.01	-	-	0.02
Sub-total	0.40	<0.005	-	-	-	0.01	-	-	0.41
Sub-total	4.00	0.01	0.07	0.02	0.04	0.70	0.03	-	4.87
Total	74.38	5.12	5.95	5.34	1.12	0.87	1.08	0.26	94.12

Table 12.11. Seed and fruit counts from the Jenrette site.

Sample	Chenopod	Knotweed	Poke	Maypops	Persimmon	Black Gum	Bramble	Grape	Nightshade	Hawthorn	Sumpweed	Common Bean	Maize Kernels	Bedstraw	Bearsfoot	Beggars Lice	Bulrush	Solanaceae	Unknown	Total
Jenrette Phase Features																				
Feature 62																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	2	-	-	-	-	-	-	2
Feature 63																				
Zone 1	-	-	-	-	7	-	-	1	-	-	5	-	6	-	-	-	-	-	2	21
Feature 65																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	1	2
Zone 2	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	1
Sub-Total	-	-	-	-	-	-	-	-	-	-	-	-	2	-	-	-	-	-	1	3
Feature 66																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	1
Feature 67																				
Zone 1	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Feature 68																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1
Feature 70																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1
Feature 75																				
Zone 1	-	-	-	-	1	-	-	-	1	-	-	-	3	-	-	-	1	-	1	7
Feature 79																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	1	3	-	-	-	-	-	-	4
Feature 80 (Burial 22)																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	1	2
Zone 2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1
Sub-Total	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	2	3
Feature 84																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	-	1
Zone 2	-	-	-	-	2	-	-	-	-	-	-	1	2	-	-	-	-	-	-	5
Sub-Total	-	-	-	-	2	-	-	-	-	-	-	2	2	-	-	-	-	-	-	6
Feature 85																				
Zone 1	-	-	-	-	2	-	-	-	-	-	-	-	3	-	-	-	-	-	-	5
Zone 2	-	-	-	-	2	-	2	-	-	-	-	-	1	-	-	-	-	-	-	5
Sub-Total	-	-	-	-	4	-	2	-	-	-	-	-	4	-	-	-	-	-	-	10
Feature 90																				
Zone 1	-	4	1	-	1	-	23	2	6	-	-	-	-	1	-	-	-	-	2	49

Table 12.11 Continued.

Sample	Cheno-pod	Knot-weed	Poke	May-pops	Persim-mon	Black Gum	Bram-ble	Grape	Night-shade	Haw-thorn	Sump-weed	Common Bean	Maize Kernels	Bed-straw	Bears-foot	Beggars Lice	Bul-rush	Solana-ceae	Un-known	Total
Jenrette Phase Features (continued)																				
Feature 92																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	1	-	1	-	-	-	-	2
Feature 95																				
Zone 1	-	-	-	-	5	-	-	-	-	17	-	-	3	-	-	-	-	-	1	26
Zone 2	-	-	-	-	-	-	-	-	-	1	-	-	2	-	-	-	-	-	1	4
Sub-Total	-	-	-	-	5	-	-	-	-	18	-	-	5	-	-	-	-	-	2	30
Feature 96																				
Zone 1	-	-	-	-	-	-	-	-	-	-	1	-	2	-	-	-	-	-	1	4
Feature 98																				
Zone 2	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Feature 99																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	1
Feature 113																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	20	-	-	-	-	-	1	21
Zone 2	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	1
Sub-Total	-	-	-	-	-	-	-	-	-	-	-	-	21	-	-	-	-	-	1	22
Feature 114																				
Zone 1	-	-	-	-	1	-	-	-	-	-	-	-	4	-	-	-	-	-	-	5
Feature 116																				
Zone 1	-	-	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	1	2
Feature 121																				
Zone 1	-	-	-	1	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2
Feature 122																				
Zone 1	-	-	3	-	-	-	-	-	-	-	-	-	2	-	-	-	-	-	-	5
Feature 123																				
Zone 1	1	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	2
Sub-Total	1	4	1	2	22	1	25	4	7	18	6	3	59	1	1	1	1	1	15	177
Haw River Phase Features																				
Feature 72																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	1	2
Feature 81																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	-	5	-	-	-	-	1	6
Zone 2	-	-	-	-	-	-	-	-	-	-	-	-	-	3	-	-	-	-	-	3
Sub-Total	-	-	-	-	-	-	-	-	-	-	-	-	-	8	-	-	-	-	1	6

Table 12.11 Continued.

Sample	Cheno-pod	Knot-weed	Poke	May-pops	Persim-mon	Black Gum	Bram-ble	Grape	Night-shade	Haw-thorn	Sump-weed	Common Bean	Maize Kernels	Bed-straw	Bears-foot	Beggars Lice	Bul-rush	Solana-ceae	Un-known	Total
Haw River Phase Features (continued)																				
Feature 82																				
Zone 1	-	-	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	-	1	2
Feature 89																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	1
Feature 125																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	1
Sub-Total	-	-	-	-	-	-	-	1	-	-	-	-	2	8	1	-	-	-	3	15
Fredricks Phase Features																				
Feature 73 (Burial 24)																				
Zone 1	-	-	-	-	-	-	-	3	-	-	-	-	2	-	-	-	-	-	3	8
Feature 74 (Burial 23)																				
Zone 1	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	1
Zone 2	-	-	-	1	-	-	-	1	1	-	-	-	-	-	-	-	-	-	-	3
Sub-Total	-	-	-	1	-	-	-	1	1	-	-	-	1	-	-	-	-	-	-	4
Sub-Total	-	-	-	1	-	-	-	4	1	-	-	-	3	-	-	-	-	-	3	12
Total	1	4	13	3	22	1	25	9	8	18	6	3	64	9	2	1	1	1	21	204

Table 12.12. Ubiquity of plant foods from Jenrette phase features at the Jenrette site.

Plant Food	No. of Samples	%	No. of Features	%
Hickory	30	83.3	41	91.1
Acorn	24	66.7	29	64.4
Maize	20	55.6	25	55.6
Peach	13	36.1	16	35.6
Walnut	13	36.1	15	33.3
Persimmon	8	22.2	9	20.0
Grape	3	8.3	3	6.7
Bean	2	5.6	3	6.7
Bramble	2	5.6	2	4.4
Sumpweed	2	5.6	2	4.4
Hawthorn	1	2.8	2	4.4
Nightshade	2	5.6	2	4.4
Poke	2	5.6	2	4.4
Maypops	2	5.6	2	4.4
Bedstraw	1	2.8	1	2.2
Beggars Lice	1	2.8	1	2.2
Bulrush	1	2.8	1	2.2
Bearsfoot	1	2.8	1	2.2
Black Gum	1	2.8	1	2.2
Knotweed	1	2.8	1	2.2
Chenopod	1	2.8	1	2.2
Total	36		45	

tabulation. The overall density of carbonized plant remains was considerably higher here than at the nearby Hogue site at 0.58 g/l. In addition to abundant wood charcoal, small quantities of cane were noted in Feature 85. A pedicel (fruit stalk) from Feature 99 could not be further identified.

Hickory nutshell was the most abundant nutshell type, but acorn and walnut were better represented in Jenrette phase features than they were at the Hogue site. A large concentration of hickory nutshell occurred in Feature 85, and a smaller one was noted in Feature 95. Peach pit, acorn shell, and walnut shell occurred in approximately equal quantities. Peach and walnut were found in less than half of the feature samples, but outranked the various fruit and weed seeds recovered. Maize remains were better represented than at Hogue, but surprisingly consisted mostly of kernels rather than more durable (and generally more abundant) cupule and cob fragments. These were scattered throughout the features. In addition to being relatively low in quantity, maize occurred in only 56% of 10-liter samples and was exceeded in this respect by hickory nuts (91.1%) and acorn (64.4%). Bottle gourd and common bean were also identified at the site.

Seeds were abundant in Jenrette phase features. Most were found in pits and basins. Feature 90 was especially seed-rich, containing a mixture of fruit and weed seeds. Hawthorn seeds were concentrated in Feature 95. Maypops, which thrives in disturbed habitats such as agricultural fields, was observed but not abundant. Fleshy fruit and cultigen seeds (the latter comprised primarily of maize) dominate the seed assemblage, which resembles contemporaneous collections from other piedmont sites.

Of particular interest, though not exceptional, is the presence of six sumpweed seeds. Reconstructed achene dimensions for the three measurable seeds were calculated using correction factors suggested by Asch and Asch (1985). The resulting dimensions are 6.0 mm by 5.0 mm (Feature 96) and 6.2 mm by 5.6 mm and 5.8 mm by 4.7 mm (both from Feature 63). Their large size places these specimens comfortably within the cultigen category as defined by Heiser (1985), Yarnell (1972, 1978), and Smith (1987). Several Siouan project sites have produced small quantities of indigenous eastern North American crop plants, including sumpweed, sunflower, little barley, and maygrass. The Jenrette site is distinguished by having produced the most recent archaeological specimen of domesticated sumpweed in the East. This find extends the temporal range of this now-extinct cultigen variety 200 years or so past the occupation of the Wall site, where a single kernel was found. Sumpweed from the study area also is unusual in that it falls outside the previously known archaeological range of the plant (Yarnell 1978).

Haw River Phase

Several pits and disturbances attributed to earlier

activity on the site were assigned to the early Haw River phase. The small sample of plant remains recovered revealed an overall density of 0.19 g/l. Hickory nutshell was most abundant, although acorn and walnut were present in small quantities. Maize cupules were quite well represented in this rather small sample at about 12% of plant food remains. As at Hogue, seeds were primarily of non-food plants, although grape was identified as well as bearsfoot and bedstraw.

Fredricks Phase

Flotation samples were collected from three Fredricks phase burial pits. Overall density of plant remains in these contexts was moderately high at 0.21 g/l. The burial pits produced a considerable variety of plant food remains, including a whole hickory nut in the upper zone of Burial 24. Peach pits were present in two of the three burial pits. Except for maize kernels, the seeds recovered were all of fleshy fruits.

Waterscreened Material

All charcoal collected from waterscreening in the 1/2-inch and 1/4-inch size categories was scanned for plant remains not previously noted. A plum pit from Feature 85 was the only item not also identified in flotation samples.

Summary

The discovery of the Jenrette site filled an important gap in the Contact period chronology of the Eno River drainage. Like the Mitchum site on the Haw River, Jenrette provides the earliest clues for understanding the beginnings of the establishment of regular, sustained contacts between Virginia traders and the native tribes. Here, too, most of the trade goods may have arrived through Indian intermediaries, but their rate of flow suggests that the inhabitants of Jenrette also may have had first-hand encounters with the White foreigners.

What is perhaps most interesting about Jenrette, however, is not change but continuity—a persistence of traditions that extend at least as far back in time as the Wall site occupation. There are also obvious ties and similarities between the Jenrette site and the later Occaneechi village, only a few feet away and some 30 years distant in time. In terms of overall village size, Jenrette lies between Wall and Fredricks, covering approximately 0.5 acres.

The duration of the Jenrette occupation seems closer to the short time span of the Occaneechi village at the Fredricks—less than 10 years—than the somewhat longer 20-year span estimated for the Wall site (Davis and Ward 1989). Jenrette houses showed no evidence of rebuilding or superimposition as was the case at Wall, nor was there any suggestion of significant midden accumulation like that found around the Wall site palisades.

The palisade itself was constructed of posts spaced and sized much like those of the Wall site, but at Jenrette, only a single line of posts surrounded the village. At the Wall site there were at least five concentric palisades. Although the Fredricks site was enclosed by one palisade, at least some of the posts were set in a wall-trench, and all were noticeably smaller than those at Jenrette.

The Jenrette site structures, though larger than those at the Fredricks site, still show strong similarities to the Occaneechi houses by using wall trenches to provide the footings for the framework of posts. Similarities exist in the use of the "bower" or "wigwam" construction technique at Wall, Fredricks, Jenrette, Upper Saratown, Lower Saratown, and Mitchum, as well as all other piedmont sites where house patterns have been isolated. Once set in the ground, the upper portions of the wall posts were pulled together and tied off to create the roof supports. The entire frame was then covered with thatch, bark, or waddle-and-daub, depending on the requirements of the season. In plan view, these houses range from almost perfectly circular, as at the Wall site and Upper Saratown, to nearly rectangular like Structure 1 at Jenrette. The oval or sub-rectangular-shaped Fredricks, Mitchum, and Lower Saratown houses fall in between these two extremes.

The fact that only one Jenrette phase burial was found implies that Old World epidemic diseases had not yet struck the population, at least not with the ferocity that they would a few years later at sites such as William Kluttz, Upper Saratown, and Fredricks. The shaft-and-chamber pit form and the flexed position of the body with the head pointing southeastward fit a pattern of mortuary behavior found throughout the Siouan area, from prehistoric times to the late seventeenth century.

Even after intensive trade relations were established and European diseases devastated the indigenous population, native lifeways were still shaped largely by processes that led to cultural continuity and stability rather than acculturation. Newly acquired trade items were incorporated into the native cultural system instead of invoking fundamental technological change. Shell beads were replaced by their glass counterparts; brass kettles and pewter bowls took the place of, or simply supplemented, clay pots. Yet the burial pit was still prepared in the traditional manner, the body received the same pre-interment ritual, and the ceremonies which sent the deceased to the other world and eased the pain of those left behind were steeped in native rather than European ritual.

Only at the Fredricks site does variation from this traditional Siouan theme begin to occur. The cemetery arrangement of the graves and their rectangular shapes implies a shift from the old ways but, even here, the change is more superficial than substantive, more apparent than real (Ward 1987).

Finally, the evidence from Jenrette also points to continuity in subsistence practices. Deerskins were no doubt traded for English trinkets, but these exchanges seem to have had little impact on the mixed hunting, gathering, and agricultural economy indicated by the food remains recovered from Jenrette. The only concrete subsistence evidence of the European presence were charred peach pits found in several of the features. And these probably originated with the Spanish settlements along the coast and were passed from tribe to tribe long before the English traders ventured into the Piedmont.

Chapter 13

The Hogue Site

The Hogue site (RLA-Or231b/Or233; 31Or231b/31Or233), located along the Eno River adjacent to the Jenrette site, is identified by two separate site designations; however, it represents a single cultural component that dates to the early Haw River phase. The eastern (31Or231b) and western (31Or233) halves of the site are separated by a wide, wooded ditch that has been interpreted as the remnant of an old wagon road (Simpkins and Petherick 1986:53). Widely scattered net-impressed ceramics from the Hogue site, and from the plowzone and several excavated features at the nearby Jenrette and Fredricks sites, suggest that a small but highly dispersed population occupied the horseshoe bend of the Eno at about A.D. 1000.

Initial auger testing was conducted in 1984 when 50-ft by 50-ft blocks were sampled at 2.5-ft intervals on each side of the wooded ditch (Figure 13.1). Tests on the east side (31Or231b) identified several subsoil anomalies characterized by vague soil mottling and the occurrence of charcoal flecks. The later excavation of two 5-ft by-5 ft pits within this test block revealed a few postholes corresponding to the positive auger tests, but no features (Simpkins and Petherick 1985).

The test block west of the wooded gully (31Or233) also produced several positive auger tests, and two 5-ft by 5-ft test squares were subsequently excavated. One of these units uncovered a large, refuse-filled storage facility (Feature 1). Due to time constraints, only the west half of this feature was excavated. Several postholes also were noted in the vicinity of the feature (Simpkins and Petherick 1985). In 1985, the search for structural evidence associated with the feature led to the expansion of the 5-ft by 5-ft unit to a 10-ft by 20-ft excavation trench. This work exposed additional postholes and a possible hearth area just east of Feature 1 (Simpkins and Petherick 1986:56–57).

During the summer of 1985, the property containing most of the archaeological sites within the horseshoe bend of the Eno (i.e., Wall, Fredricks, Jenrette, and Hogue) changed ownership. The new owner had plans to construct a residence and stable, and to grade a large portion of the floodplain in order to level it for a polo field. The stable area was to be located near Feature 1 at 31Or233, whereas the residence was to be built in the area of another site, designated RLA-Or246 (31Or246).

Because of these developments, extensive areas were tested during the late summer of 1985 in the vicinity of 31Or233 and 31Or246. At 31Or233, the original auger-test block was expanded from 2,500 sq ft to an area of over 6,000 sq ft. Samples were taken at 2.5-ft intervals and 40 additional positive tests were recorded in a cluster northeast of Feature 1. A 50-ft by 50-ft test unit was laid out over the proposed house site location at 31Or246. Here, a combination of shovel tests and auger probes also were placed at 2.5-ft intervals. The shovel test samples contained several sherds, flakes, and fired clay particles from the plowzone, while the auger cores revealed additional soil anomalies indicating potential subsoil pits or postholes. Obviously, both sites contained significant cultural deposits that would be adversely impacted by any construction activities (Simpkins and Petherick 1986:52–61).

On August 17 1985, "Mother Nature" became an ally of the archaeologists. What was left of Hurricane Danny blew through Hillsborough, dumping 5.5 inches of rain. The Eno roared over its banks, flooding the bottoms in the horseshoe bend. Flood debris was observed in trees 10 ft above the ground near the proposed house site; construction stakes were washed away; and the lowest areas of the bottoms became ponds after the high water subsided. This flooding caused the new owner of the property to have second thoughts, and eventually the land was sold to Mr. Richard H. Jenrette, a friend and trustee of The University of North Carolina at Chapel Hill, who continues to preserve its rich cultural and natural resources.

In the spring of 1989, an additional 10,000-sq-ft block was auger tested at 2.5-ft intervals at 31Or233, southwest of the area tested by Simpkins and Petherick in 1985. An additional 100-ft by 50-ft block also was tested east of 31Or233, on the other side of the ditch. Because of its proximity to the Fredricks site (31Or231) and the suspicion that any archaeological remains there might also be associated with the Occaneechi occupation, this area was designated "31Or231b." In order to follow rather than constantly cross large, deep furrows while augering, this test unit was laid out diagonal to the main grid axis used elsewhere within the river bend. Only 10 positive tests were obtained from the extensive 31Or233 test block, and these suggested only shallow pits or postholes. In contrast, 19 positive tests were recorded in the 31Or231b test area, and several of these indicated relatively deep subsurface features.

Based on the results of previous excavations and the findings of the 1989 auger testing, we decided to re-excavate the 10-ft by 20-ft trench dug by Simpkins and Petherick in 1985, complete the excavation of Feature 1 (only half was taken out in 1984), and expand the trench into a 30-ft by 20-ft unit in hopes of clarifying any structural remains associated with Feature 1

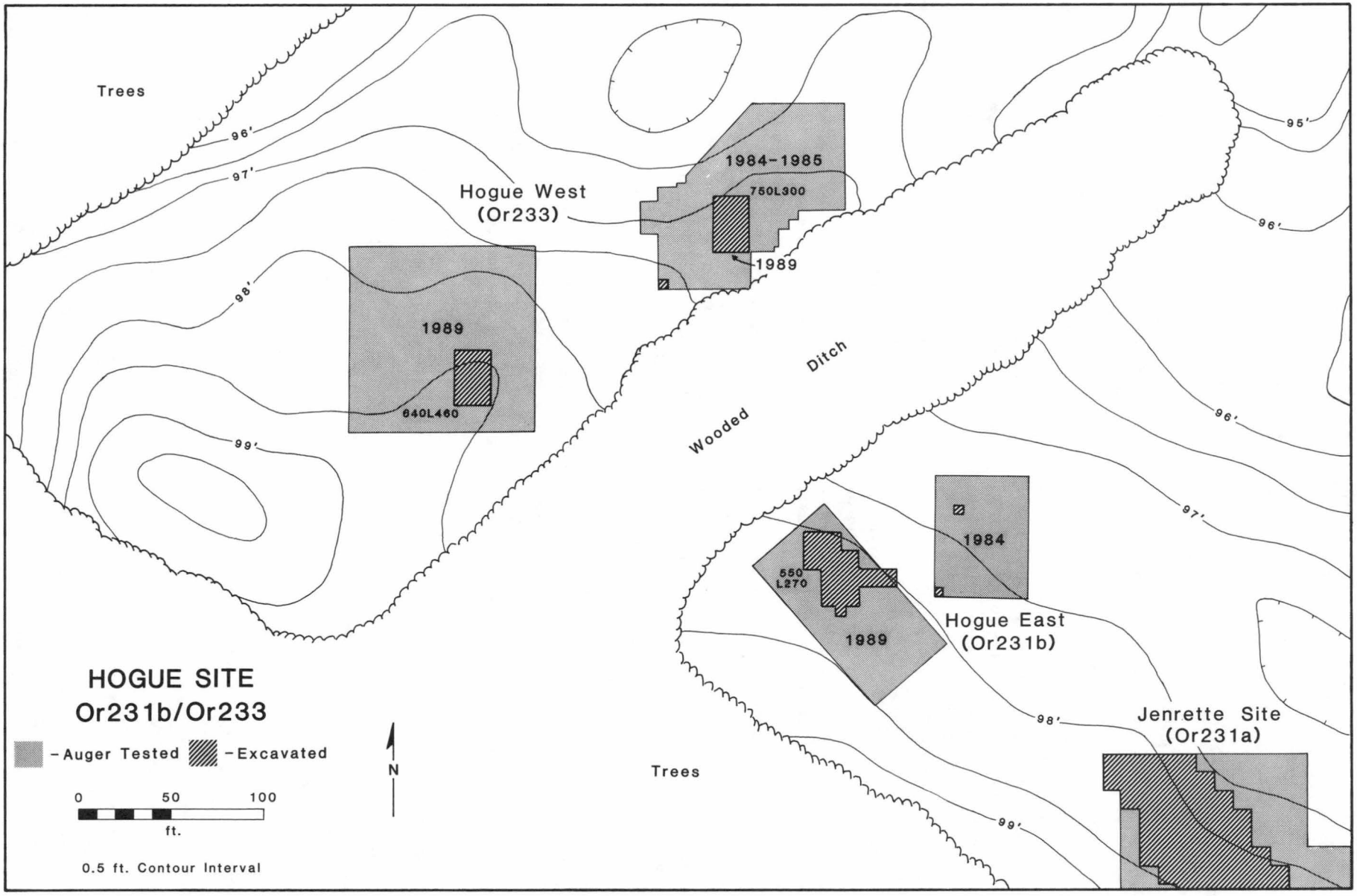

Figure 13.1. Map of the Hogue site showing areas of auger testing and excavation.

(Figures 13.2 to 13.4). The search for structures also led to the excavation of another 30 ft by 20 ft block in the area of a cluster of positive auger tests southwest of Feature 1 (Figure 13.5). At 31Or231b, a block of 11 10-ft by 10-ft squares was excavated in the area with the densest feature concentration as indicated by auguring (Figures 13.6 and 13.7).

The 1989 excavations helped clarify the question of structures at 31Or233 and also uncovered a portion of what appears to be a cemetery at 31Or231b. Following these investigations, the initial impression of a comparatively sparse, dispersed, village settlement plan during the early Haw River phase remained intact.

Stratigraphy

When Simpkins and Petherick excavated their trench at 31Or233 in 1985, they noted a "thin stratum of soil interpreted as possible 'old humus'" that "expanded in thickness toward the east, or presumed center of the structure, apparently indicating a depressed house interior" (Simpkins and Petherick 1986:56). This zone of mottled brown loam lay beneath approximately one foot of plowed soil and rested directly atop the tan loamy clay subsoil, but was only recognized in the north and east profiles of Sq. 730L300.

Expanded excavations in 1989 to the north and south of the 1984 trench did not pick up this "old humus" layer but rather revealed the plowzone lying directly over the undisturbed subsoil (Figure 13.8). Nor did a diffuse scatter of postholes north of the 1984 excavation clarify the presence of a structure associated with Feature 1. It is likely that the soil recognized by Simpkins and Petherick as "old humus" was organically enriched fill plowed out of and displaced from the top of Feature 1.

The southwestern excavation block at 31Or233 also uncovered a simple stratigraphy consisting of about one foot of brown, sandy loam, plowed soil overlying a tan to tannish orange, loamy clay subsoil. Although several small postholes intruded the subsoil, no obvious structural patterns were present.

The eastern area excavated at the Hogue site (31Or231b) was marked by a series of wide, parallel rows or seed beds separated by extremely deep furrows. This undulating surface created a plowzone of extremely variable depth. It sometimes exceeded one foot in depth across ridges created by the rows and then dipped abruptly to less than 0.5 ft in the bottoms of the furrows. In all cases, the brown sandy loam plowzone rested directly on a sterile, tannish clay loam subsoil.

Features and Burials

Sixteen features, including five human burials, were excavated at the Hogue site; two additional features were mapped but not excavated. A final feature, designated Feature 2 at 31Or233, represents a nineteenth century garbage dump that was identified within the wooded ditch in 1986 (Table 13.1). Features identified at 31Or233 are designated Features 1 to 6, while features and burials from 31Or231b were incorporated into the sequence used at the Fredricks site (31Or231) (see the introduction to the Jenrette site features in Chapter 12).

Hogue West (31Or233) Features

Feature 1. This large storage pit was originally discovered in 1984, at which time the western half of the feature was excavated (Simpkins and Petherick 1985). The remainder of Feature 1 was excavated in 1989 (Figure 13.9).

Pit fill was comprised of three distinct zones (Figure 13.10). The uppermost zone—Zone 1—was further divided into two sub-zones, designated Zone 1a and Zone 1b. Zone 1a was a dark brown mottled sandy loam within the center of the pit that contained fragments of charcoal and daub; Zone 1b was a lighter brown soil that extended around and beneath Zone 1a. Zone 1b graded into a tannish orange sandy loam (Zone 2) that resembled burial fill. The final zone, Zone 3, was a light brown sandy clay loam that contained large fragments of charcoal. No Munsell color readings were taken on any of the zones.

Zone 1a contained a polished stone celt lying atop a chipped stone hoe with a highly polished bit. The position of these artifacts (excavated by Simpkins and Petherick) suggests they were cached near the top of the pit, rather than deposited as refuse. A few rocks, potsherds, and flakes also were gleaned from Zones 1a and 1b. Zone 2 produced a similar array of artifacts, but given the large volume of fill, this soil was not particularly rich. Zone 3, on the other hand, contained numerous potsherds, fire-cracked rocks, and large chunks of charcoal concentrated in the center of the pit near the bottom. After excavation, Feature 1 measured 5.0 ft in diameter and was 3.4 ft deep, making it one of the largest pit features to be excavated in the north-central Piedmont.

Although the original use of the pit was undoubtedly for storage or caching, a reconstruction of the various filling episodes is more problematic. The rich soil comprising Zone 3 appears to have originated in the area of a hearth, given the large number of fire-

Figure 13.2. Beginning excavations at Hogue West (31Or233) (view to south).

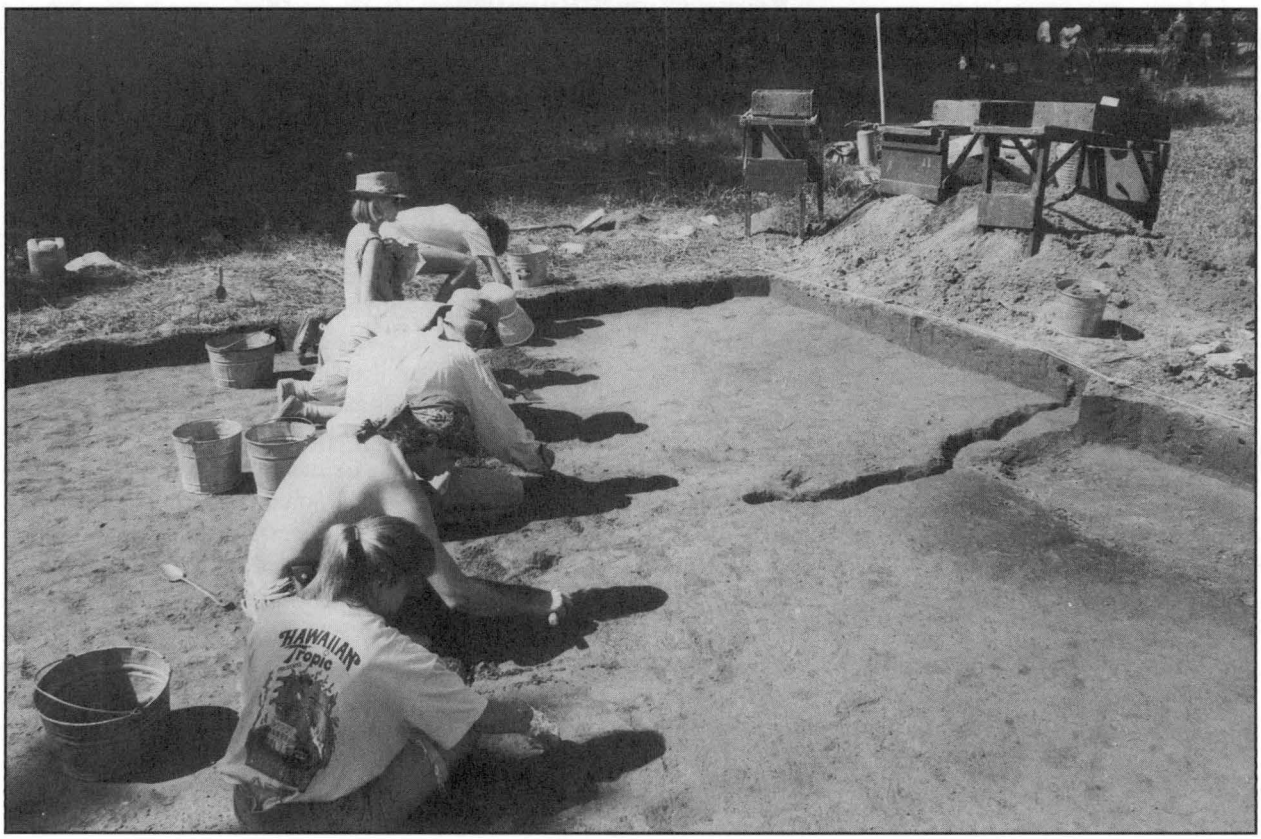

Figure 13.3. Troweling to expose Feature 1 (at right) and surrounding excavation surface.

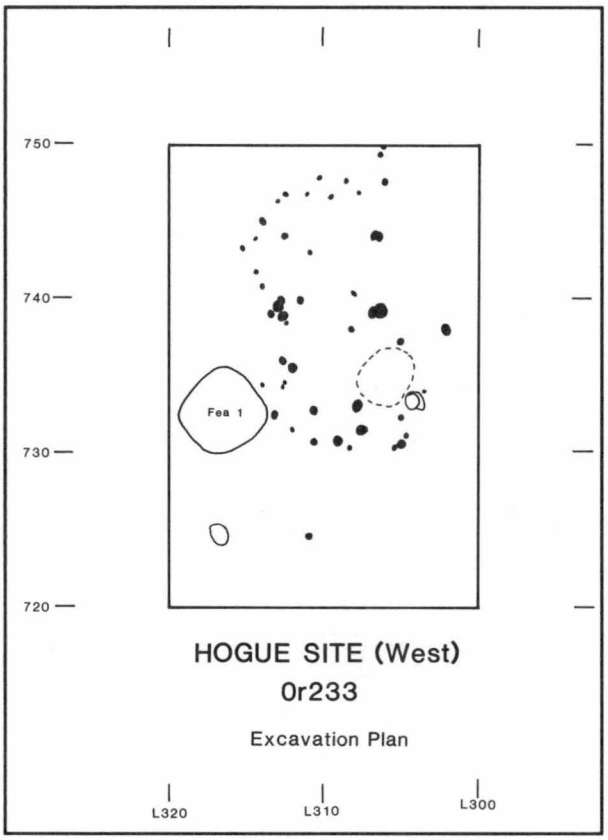

Figure 13.4. Excavation plan for the northeastern block at Hogue West (31Or233).

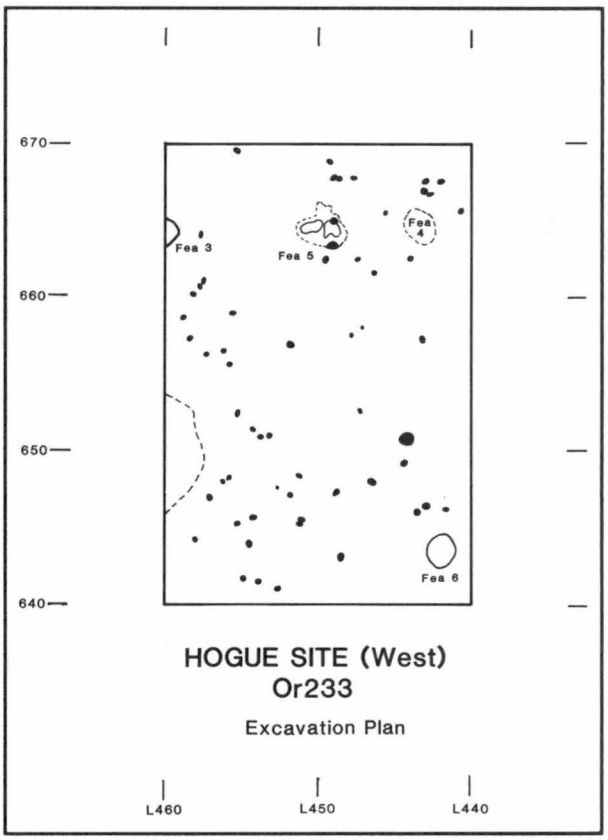

Figure 13.5. Excavation plan for the southwestern block at Hogue West (31Or233).

Figure 13.6. Removing plowed soil at Hogue East (31Or231b) (view to south).

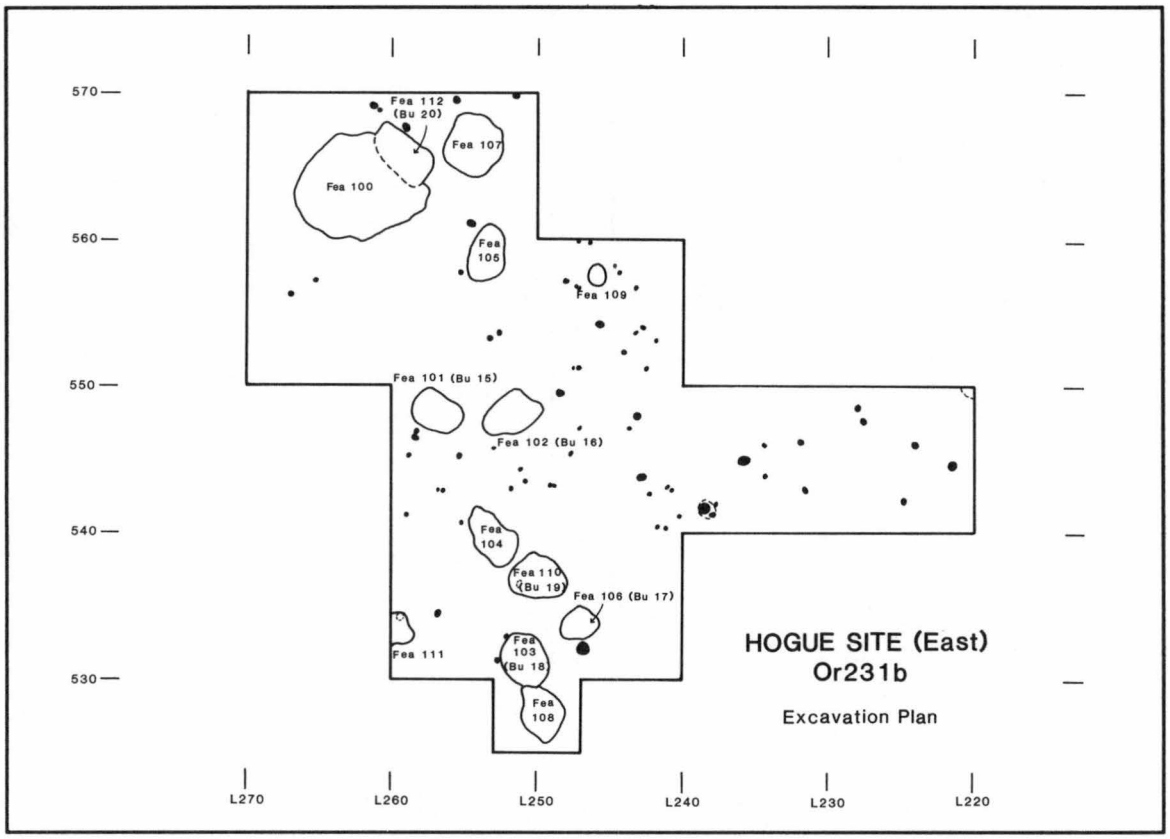

Figure 13.7. Excavation plan for Hogue East (31Or231b).

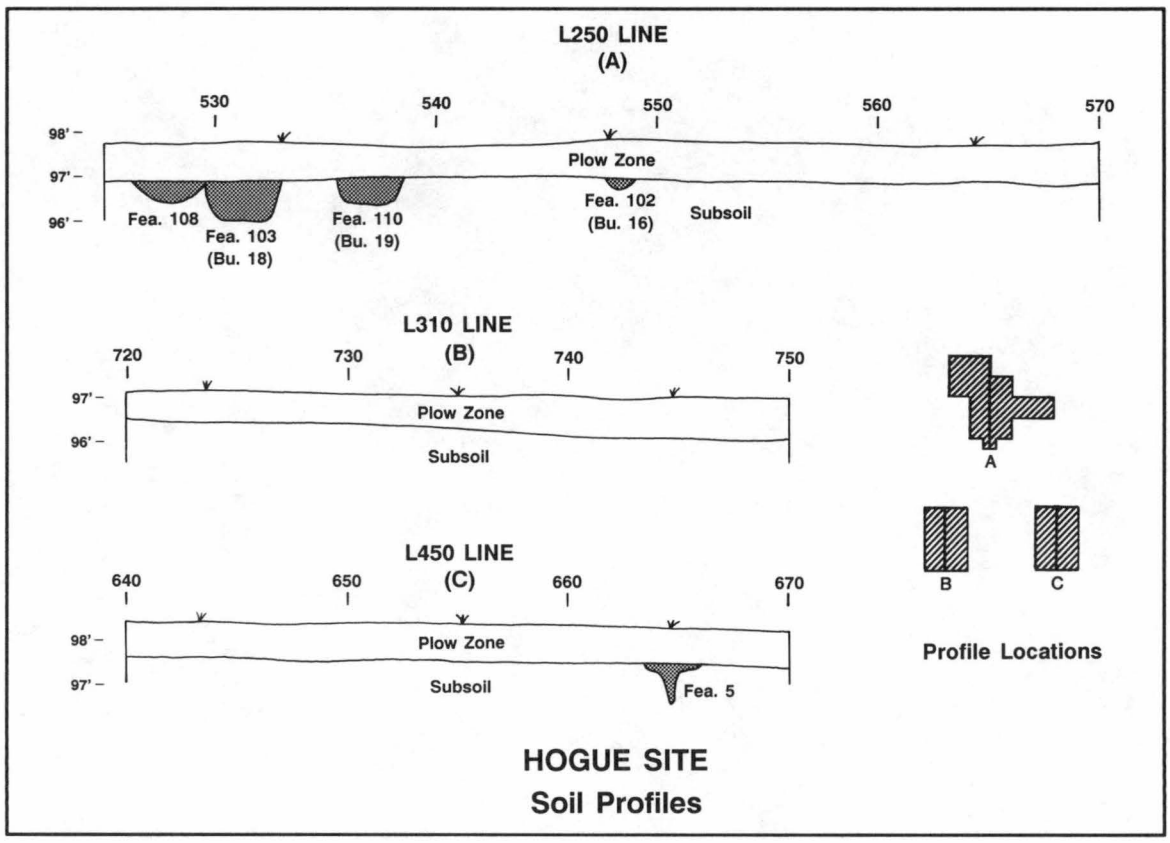

Figure 13.8. Stratigraphic profiles.

Table 14.1. Summary of features identified at the Hogue site.

Feature No.	Type	Center Location	Dimensions (ft) L	W	D	Phase Association	Comment
Western Half (Or233)							
Fea. 1	Storage Pit	732.7L317.3	4.8	4.6	3.5	Early Haw River	Excavated
Fea. 2	Historic Dump	Indeterminate	10.0	4.0	-	Late Historic	Surface Collected
Fea. 3	Basin	664.3L459.5	1.2	1.1	0.3	Early Haw River?	Excavated
Fea. 4	Basin	664.6L443.6	2.3	1.8	0.4	Early Haw River?	Excavated
Fea. 5	Tree Disturbance	664.1L449.6	4.3	3.3	2.7	—	Excavated
Fea. 6	Tree Disturbance	643.4L441.7	2.1	2.0	2.1	—	Excavated
Eastern Half (Or231b)							
Fea. 100	Large Basin	563.5L262.5	8.7	5.9	2.8	Early Haw River	Excavated
Fea. 101 (Bu.15)	Burial	548.2L257.0	3.6	2.6	0.8	Early Haw River	Excavated
Fea. 102 (Bu.16)	Burial	548.0L251.7	4.1	2.8	0.7	Early Haw River	Excavated
Fea. 103 (Bu.18)	Burial	531.5L249.0	4.0	3.1	0.4	Early Haw River	Excavated
Fea. 104	Burial ?	539.7L246.7	4.0	2.2	0.7	Early Haw River	Excavated
Fea. 105	Burial ?	558.9L254.3	3.8	2.6	0.9	Early Haw River	Excavated
Fea. 106 (Bu.17)	Burial	533.9L247.0	2.9	2.2	0.7	Early Haw River	Excavated
Fea. 107	Basin	566.3L254.3	4.2	4.2	0.5	Early Haw River	Excavated
Fea. 108	Basin	527.5L245.5	4.3	3.0	0.8	Early Haw River	Excavated
Fea. 109	Large Posthole	552.6L245.6	1.5	0.8	1.0	Early Haw River	Excavated
Fea. 110 (Bu.19)	Burial	537.0L250.0	4.0	2.9	0.6	Early Haw River	Excavated
Fea. 111	Basin ?	533.5L260.0	2.0	-	-	Indeterminate	Mapped
Fea.112 (Bu.20)	Burial	566.0L259.5	4.5	2.3	-	Early Haw River?	Mapped

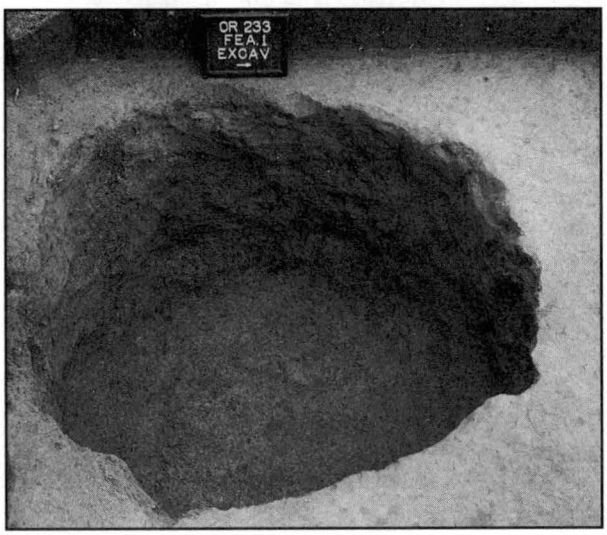

Figure 13.9. Feature 1, excavated.

fractured rocks, charcoal, and broken pottery. Because there is no evidence of burning on the pit bottom or along the sides, it is reasonable to suspect that the material originated elsewhere and was tossed into the pit. The Zone 2 fill may represent a concerted effort to complete the filling by scraping up nearby soil or by using soil dug from another storage pit. Zone 1b may be nothing more than the top of Zone 2 that slumped and was stained by organic leaching from Zone 1a. This latter zone was rich in organic matter and may reflect a load of domestic refuse dumped in to cap off the depression created by the fill settling in the deep pit. The absence of bone in all of the zones is puzzling and probably a consequence of poor preservation. Finally, the caching of the celt and stone hoe as well as the hearth cleaning activity may indicate a ceremonial component in the behavior responsible for the final transformation of Feature 1. Similar caching of stone tools was noted in Feature 3 at the Holt site (see Chapter 4).

A sample of wood charcoal from the base of Feature 1, excavated by Simpkins and Petherick, was submitted for radiocarbon dating. It yielded an age of 920±70 years: A.D. 1030 (Beta-20380). When calibrated following Stuiver and Becker (1986), this provides a one-sigma range of A.D. 1020 to A.D. 1209 with multiple intercepts at A.D. 1044, A.D. 1090, A.D. 1122, A.D. 1139, and A.D. 1152. Comparison of the pottery sample from Feature 1 with pottery from dated contexts at other Haw River sites suggests that this is a reasonable age estimate for the Hogue site.

Feature 2. This designation was assigned to a mid-nineteenth century bottle dump in the wooded ditch (thought to represent an old road bed) that cuts through the site. Most were round-bottomed ginger beer bottles and have no relevance to the current research.

Features 3, 4, 5, and 6. These designations were assigned to vague soil stains and tap root disturbances mapped within the southwestern block excavation at 31Or233.

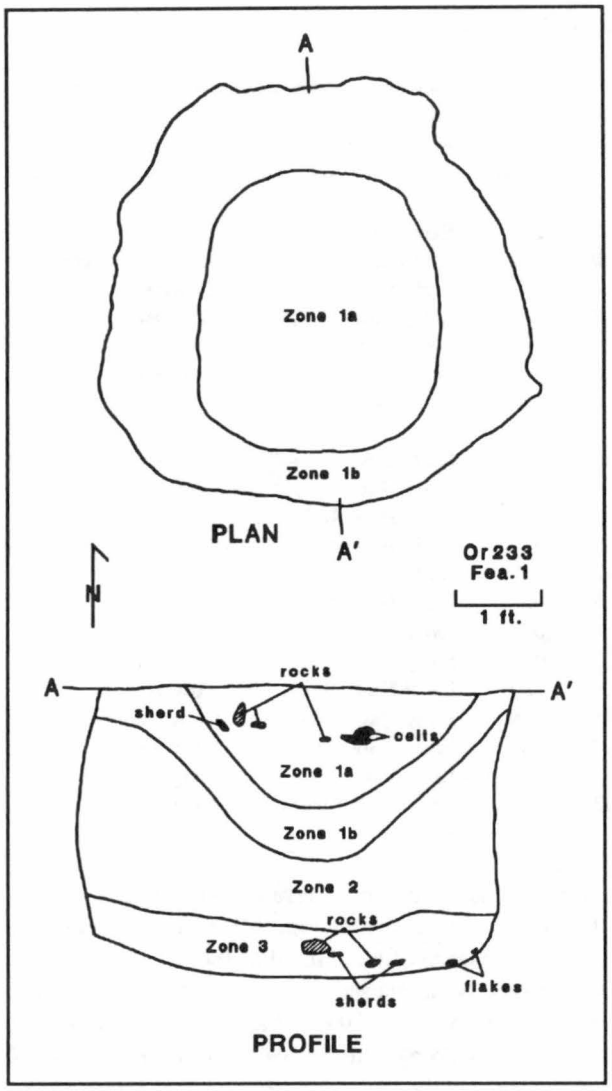

Figure 13.10. Feature 1, plan view and profile drawings.

Hogue East (31Or231b) Features

Feature 100. This large, basin-shaped feature was located at the northern end of the 31Or231b excavations. It contained a single zone of dark brown (7.5YR 3/2) mottled loam that produced small potsherds, a few flakes, and a large number of gravel-sized rocks. In outline, Feature 100 measured 8.7 ft by 5.9 ft and reached a maximum depth of 2.8 ft near the center (Figures 13.11 and 13.12). While finding the pit wall in the northeast quadrant, a human occipital bone was encountered. Subsequent cleaning of the adjacent subsoil surface revealed the vague stain of an oval burial pit (Feature 112/Burial 20). It was not excavated.

Feature 101 (Burial 15). Burial 15 was located at the northern end of the cluster of burials revealed by the 31Or231b excavation. At the subsoil surface, the burial appeared as an oval stain of strong brown (7.5YR 4/6) loam mottled with orange subsoil clay. The major axis of the pit was oriented northwest-southeast. After excavation, it measured 3.0 ft by 2.0 ft and was 0.7 ft deep. The walls sloped inward creating a basin-shaped profile.

The badly deteriorated skeleton was lying in the center of the pit with the head oriented to the northwest. Skull fragments, a portion of the mandible, and traces of the leg bones were all that remained of the skeleton. Based on one unerupted third molar in the mandible, the individual is estimated to have been a juvenile at the time of death. Except for a large flat rock in the area of the feet, no artifacts were associated with the burial. After cleaning and documentation, the grave was carefully refilled without disturbing the human remains.

Feature 102 (Burial 16). This interment was located only 1.0 ft east of Burial 15. It, too, appeared at the top of subsoil as a light brown (7.5YR 4/6) mottled stain. The long axis of the pit was oriented northeast-southwest and measured 4.3 ft. After excavation, the pit was 3.0 ft wide and 0.8 ft deep. The sides sloped inward and the bottom was generally flat.

Only a few fragments of the cranium, including the mastoid processes, and a small long bone fragment were preserved. An unerupted molar also was found adjacent to the skull fragments, which were located in the southwest end of the pit. The position of the long bone fragment and the size of the pit suggest that the individual was flexed. The unerupted molar further suggests that a subadult is represented. The burial was photographed, drawn, and refilled without disturbing the remains.

Feature 103 (Burial 18). This pit was located in the same vicinity as Burials 17 and 19, and was adjacent to Feature 108 which also may have been a burial without any preserved bone. Both the fill and pit configuration were similar to the other burials. It measured 4.0 ft by 3.0 ft and extended to a depth of 0.5 ft below the subsoil surface. The major pit axis was northwest-southeast with the skull pointing to the southeast (Figure 13.13).

In general, the bone was better preserved than most of the burials at the site. The skull, upper and lower long bones, a fragment of the pelvis, and the right scapula were fragmentary but identifiable. The individual appears to be an adult male (?), and was placed in the pit in a flexed position, lying on the left side. The hands were oriented toward the face. A flat rock had been placed on the lower legs and another rock was placed in the area of the rib cage. A deer mandible was found in the lower torso area. After cleaning, photographing, and drawing, the grave was carefully refilled, leaving the skeletal remains undisturbed.

Feature 104. This oval pit measured 3.5 ft by 2.0 ft and was 0.9 ft deep. It was situated between Burials 15 and 19 in the southern part of the excavation where most burial pits were concentrated. Pit fill consisted of a dark yellowish brown (10YR 4/6) mottled loam. In

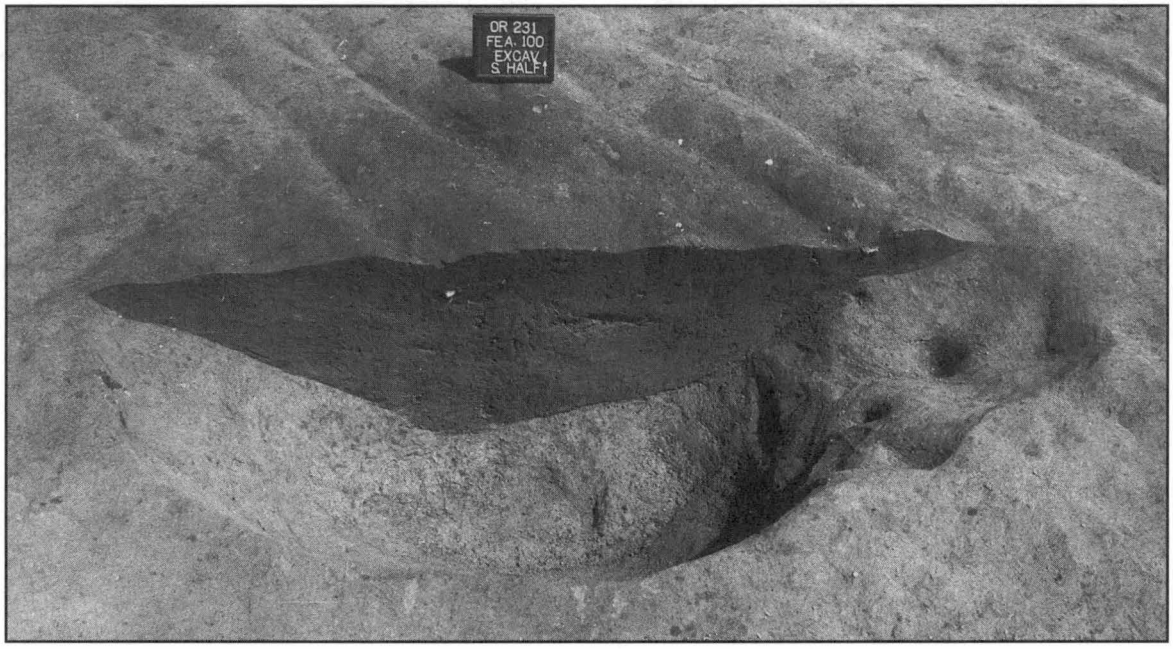

Figure 13.11. Feature 100, south half excavated.

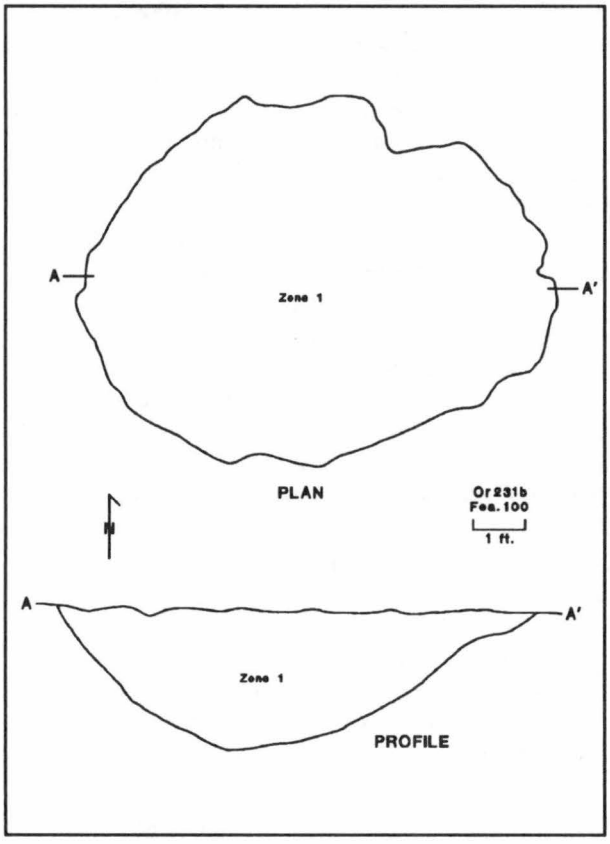

Figure 13.12. Feature 100, plan view and profile drawings.

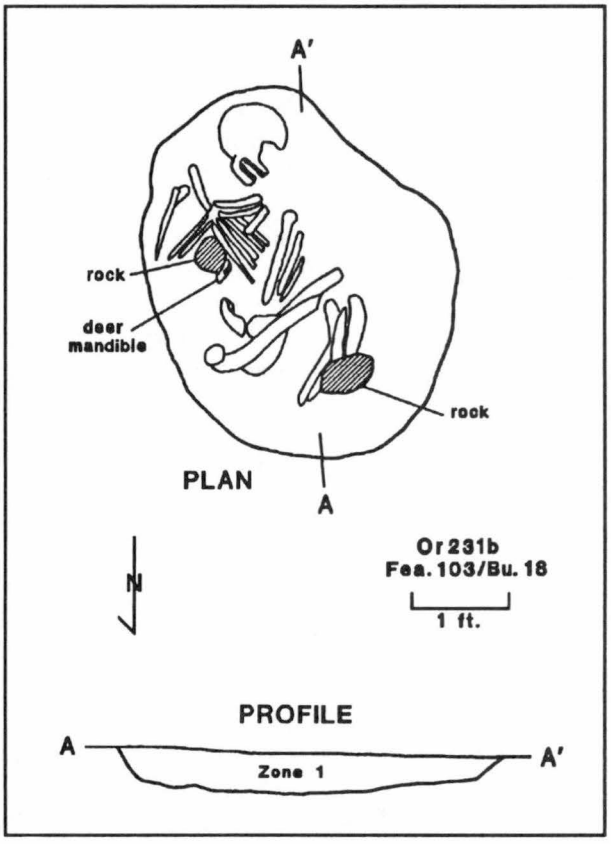

Figure 13.13. Feature 103 (Burial 18), plan view and profile drawings.

terms of size, shape, and fill attributes, Feature 104 was very similar to the nearby burial pits, and also probably was a grave, although no skeletal remains were preserved. Only a small sherd and a flake were found in the fill during excavation.

Feature 105. Feature 105 was located a few feet southeast of Feature 100 and also appears to have been a burial pit. While it probably contained a human

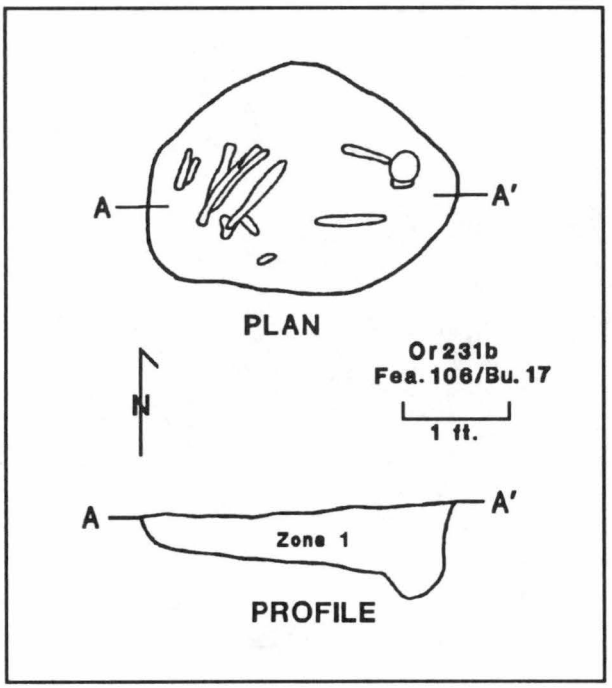

Figure 13.14. Feature 106 (Burial 17), plan view and profile drawings.

burial at one time, no evidence of skeletal material remained. After excavation, the pit measured 3.8 ft by 2.8 ft and extended to a depth of 0.9 ft. In profile, it was bowl-shaped. The single zone of strong brown (7.5YR 4/6) mottled fill contained very few artifacts.

Feature 106 (Burial 17). This grave was located only 1.0 ft southeast of Burial 19 and 1.5 ft northeast of Burial 18. The fill was similar to that of the other burials and consisted of a dark yellowish brown (10YR 4/6) loam mottled with orange subsoil clay. Portions of the cranium were visible at the base of the plow-zone, and the skull had been disturbed by the plow. The shallow basin-like pit was only about 0.3 ft deep and measured 2.9 ft by 2.2 ft in plan (Figure 13.14).

The poorly preserved skull was lying face down in the pit at the east end. Small fragments of the humeri, the leg bones, and the pelvis were present but in extremely poor condition. The body was lying in a tightly flexed position on its right side. Except for a large flay rock apparently placed over the legs, no artifacts were associated with the burial. The skeleton appears to be that of an adult female. Because of imminent danger of being destroyed by subsequent plowing, the skeletal remains were removed and returned to the lab for further study.

Feature 107. This designation was assigned to a large depression at the north end of the excavation. The fill consisted of a dark yellowish brown (10YR 3/4) mottled soil that blended into the subsoil, leaving indistinct edges. Only a single stone flake was found in the fill.

Feature 108. This somewhat amorphous, basin-like pit was located adjacent to Feature 103 (Burial 18). On the subsoil surface, two fill zones were identified: Zone 1, a dark brown (10YR 3/3) mottled loam; and Zone 2, a dark yellowish brown (10YR 4/6) loam (Figure 13.15). Zone 1 soil was concentrated in the northern and southern ends of the feature, separated by Zone 2 fill in the central area. The southern pocket of Zone 1 contained numerous fitting sherds and rock fragments. A few potsherds, numerous broken rocks, and charcoal were concentrated in the northern pocket of Zone 1 soil. The Zone 2 fill contained relatively few cultural remains. Along its long axis, the pit measured 4.5 ft and was 3.0 ft wide. Maximum depth below the subsoil surface was 0.8 ft.; however, the bottom was very irregular and in some places less than 0.2 ft deep (Figure 13.16). In size and configuration, the feature is similar to other burials located in the vicinity, but lacking preserved skeletal remains, this assessment can only be made with caution.

A sample of wood charcoal from Zone 1 fill at the south end of Feature 108 was submitted for radiocarbon dating. It was anticipated that this sample would provide a date between about A.D. 1000 and A.D. 1200, and corroborate radiocarbon dates obtained earlier from early Haw River phase Feature 1 (31Or233) and Feature 30 at the Fredricks site (see Table 14.2). Instead, the sample produced an age of 1790±200 years: A.D. 160 (Beta-36096). When calibrated (see Stuiver and Becker 1986), this yields an incercept of A.D. 231 and a one-sigma range of 15 B.C. to A.D. 526. Given the occurrence of moderate amounts of Uwharrie series pottery in this feature, and substantially later dates from these other two early Haw River phase features, the Feature 108 date is rejected as too early. At present, no explanation can be offered for this aberrant result. Excavations failed to provide any evidence for an earlier Woodland occupation at the site that could have contaminated the sample.

Feature 109. This designation was assigned to a large posthole that contained numerous rocks but very little else.

Feature 110 (Burial 19). This burial was located between Feature 104 and Burial 17, and all three pits were aligned in a northwest-southeast direction. Like the other pits within the 31Or231b excavation, the fill was comprised of a dark yellowish brown (10YR 4/6) mottled loam. On the subsoil surface, the pit appeared as an amorphous, roughly oval stain measuring 4.0 ft by 3.0 ft. After excavation, it extended 0.7 ft into the subsoil. The skull was located in the western end of the pit.

The bone, consisting of a few fragments of long bones and badly eroded skull fragments, was in very poor condition. The size of the pit suggests that the skeleton was flexed; however, orientation could not be determined from the bones themselves. Also, it was

Figure 13.15. Feature 108, before excavation.

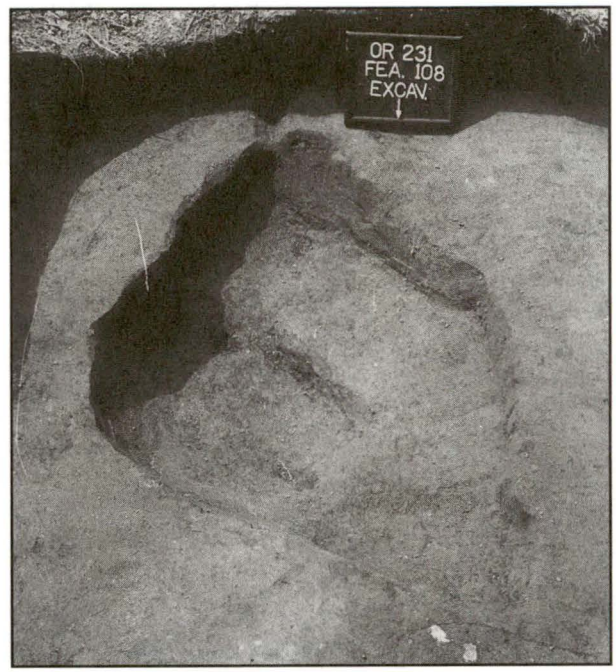

Figure 13.16. Feature 108, excavated.

impossible to determine age or sex of the individual and no associated artifacts were present. After documenting the remains, the grave was carefully refilled.

Summary

Most of the pits excavated in the eastern area of the Hogue site (31Or231b) were graves. Six of these, including Feature 112 (Burial 20) which was not excavated, produced human remains. Three other pits were similar to these burial pits in form and size but lacked skeletal remains. The other excavated features included a large basin-shaped pit (Feature 100) that contained very few artifacts and a large posthole (Feature 109). Only Feature 108, which contained a large number of *Uwharrie Net Impressed* and *Uwharrie Cordmarked* potsherds, produced a substantial amount of cultural remains. Other than resembling burial pits, little can be said about the primary use of the facilities that contained no skeletal materials. Feature 100 may represent a storage pit, but it's size and shape are atypical of storage facilities found at other Haw River and Dan River phase sites.

The tightly clustered distribution of the burials strongly suggest a cemetery. Except for the few scattered postholes and perhaps Feature 100, there is little evidence of domestic activities. If the burials do comprise a cemetery, it is the first evidence for this kind of mortuary behavior during the Haw River phase. It should be added, however, that excavated data for this phase are meager when compared with those from later Contact period sites.

Only Feature 1 in the western area of the site contained significant cultural remains, including moderate amounts of net-impressed, brushed, and cord-marked pottery, and stone tools. The absence of other associated pits appears to be typical of Haw River phase sites and suggests an intrasite settlement pattern of dispersed households.

Postholes

Approximately 180 small subsoil disturbances were mapped which appear to represent postholes. Only one of these, located in the southwest corner of Sq. 540L230 and containing the basal portion of a *Uwharrie Cordmarked* pot, was excavated. Although no clear posthole alignments were detected, the presence of several large postholes just east of Feature 1 suggests that a structure may have stood at this location.

Pottery

Four thousand and seventy aboriginal potsherds were recovered from the Hogue site. Almost 90% of these (n=3,650) came from plowzone excavations; the remainder (n=420) were recovered from features, burials, and postholes (Table 13.2). Although additional pottery samples were collected from the plowzone

Table 13.2. Distribution of pottery from the Hogue site.

Context	Uwharrie				Jenrette	Fredricks		
	Net Impressed	Brushed	Cord-marked	Plain	Simple Stamped	Check Stamped	Indet.	Total
Haw River Phase								
Fea. 1	26	92	15	1	-	-	105	239
Fea. 100	3	-	1	1	-	-	4	9
Fea. 101	2	-	-	-	-	-	3	5
Fea. 102	5	-	1	-	-	-	2	8
Fea. 103	3	-	-	-	-	-	11	14
Fea. 104	-	-	-	-	-	-	3	3
Fea. 105	1	-	-	-	-	-	-	1
Fea. 108	47	3	10	3	-	-	53	116
Fea. 110	1	-	-	-	-	-	5	6
Postholes	4	-	3	-	-	-	3	10
Sub-total	92	95	30	5	0	0	189	411
Indeterminate Phase								
Plowzone	38	-	22	2	1	-	3587	3650
Fea. 5	1	1	2	-	-	1	4	9
Fea. 6	-	-	1	-	-	-	-	1
Sub-total	39	1	25	2	1	1	3591	3660
Total	131	96	55	7	1	1	3780	4071

and Feature 1 during earlier test excavations by Simpkins and Petherick (1985, 1986), these have not been included in the present analysis.

Despite the large number of potsherds found, most were small (less than four centimeters in diameter) and had badly eroded surfaces. In fact, only 290 sherds could be classified according to exterior surface treatment. Two hundred and twenty-seven of these came from features. Most identifiable potsherds had either net impressed (45%), brushed (33%), or cord marked (19%) surfaces; the remaining three percent had smoothed or simple stamped surfaces.

With few exceptions, these artifacts appear to be associated with the early Haw River component at the site, and are similar to sherds from Haw River phase features excavated at the nearby Fredricks (Features 8 and 30) and Jenrette (Features 72, 81, 82, 89, 94, and 125) sites. This similarity suggests that these features may be attributable to a single settlement. Although Haw River phase potsherds from the Fredricks site previously have been regarded as early examples of the Dan River ceramic series (Davis 1987, 1988), a reexamination of these samples along with the Hogue site pottery suggests that they bear closer resemblance to the Uwharrie ceramic series which immediately precedes the development of Dan River and Haw River series pottery in piedmont North Carolina.

Uwharrie Net Impressed (Figure 13.17*d,j,l,q,r*)

One hundred and thirty-one sherds in the sample were classified as *Uwharrie Net Impressed* (see Coe 1952). All exhibited coarse, heavy, knotted-net impressions on the exterior surface, and most (90%) had scraped interiors. These sherds were tempered predominantly with medium crushed quartz (n=55) or coarse sand (n=50), but also contained fine quartz (n=10), coarse quartz (n=6), coarse quartz and feldspar (n=9), and coarse feldspar (n=1). Most sherds were from relatively heavy vessels, and ranged from 6 mm to more than 10 mm in thickness.

According to Coe (1952:308), Uwharrie vessels "were invariably either a hemispherical bowl or a conoidal base jar with a slightly constricted neck and a short vertical rim." All 15 rimsherds from the Hogue site had slightly everted profiles and rounded (n=11) or flat (n=4) lips. Vessel decoration was rare. The most common modification was scraping or brushing the vessel exterior before firing. Fifteen *Uwharrie Net Impressed* sherds, five of which were from Feature 1, were modified in this manner. The 96 sherds classified as *Uwharrie Brushed* probably represent examples where the brushing completely obliterated the net impressions. Only four other sherds displayed different types of decoration. These include: V-shaped notches placed along the lip (Figure 13.17*j*), V-shaped notches placed along the lip/rim edge, a band of vertical fingertip impressions placed just below the lip (see discussion below of *Uwharrie Brushed*), and finger pinching along the neck.

Uwharrie Brushed (Figure 13.17*c,e,n*)

Ninety-six sherds were recovered from the Hogue

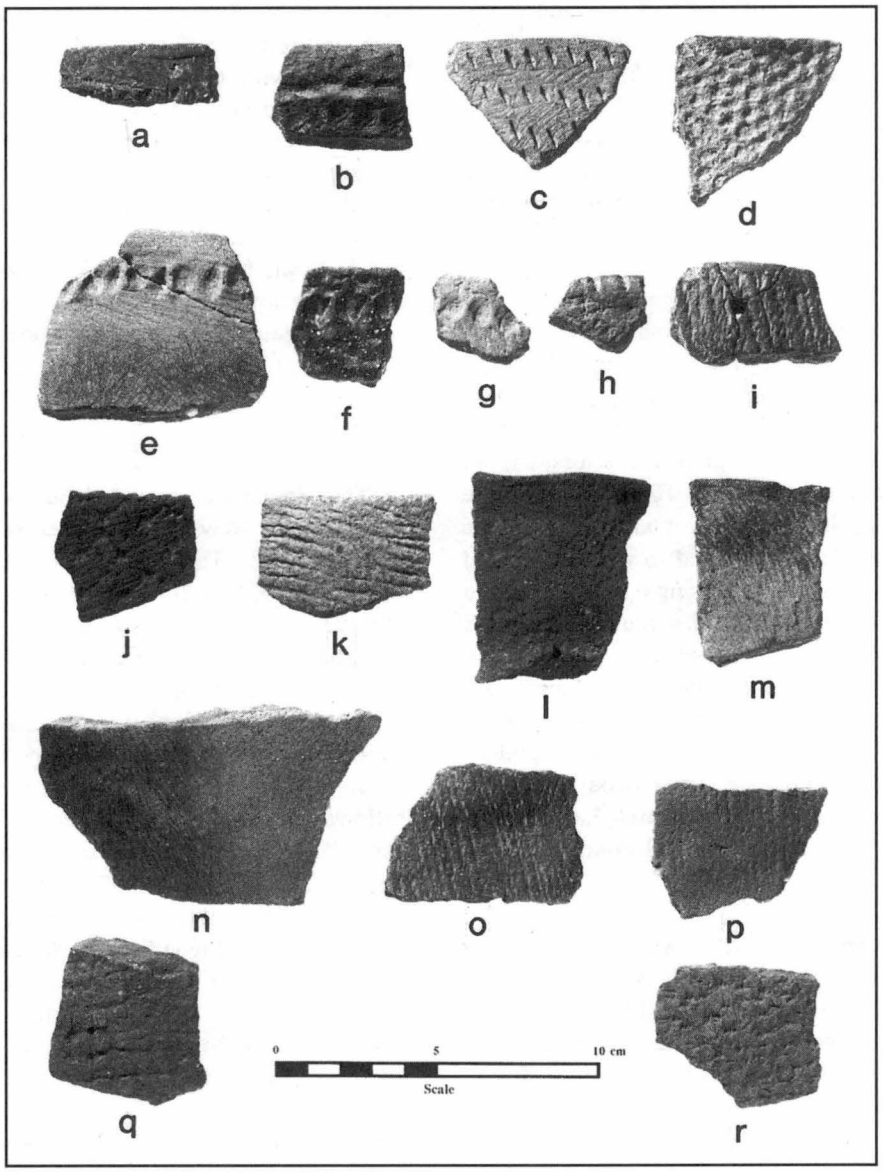

Figure 13.17. Uwharrie series pottery from the Hogue site.

site which had brushed or scraped exteriors. Ninety-two of these sherds came from Feature 1 and represent a large, net impressed jar that was heavily scraped prior to firing. All but one of these sherds also had finely scraped interiors. Most of these sherds were relatively thick, ranging from 6 mm to 10 mm, and were tempered largely with coarse (n=39) or medium (n=50) crushed quartz. Other temper types included sand (n=3), fine crushed quartz (n=2), and mixed quartz and feldspar (n=1). All of the 10 brushed rimsherds were slightly everted and had rounded lips. Four of these were decorated with a band or bands of vertical fingertip impressions placed just below the lip (Figure 13.17*c,e*). Vessel form characteristics and the predominance of coarse crushed quartz tempering generally conform to Coe's (1952) descriptions of Uwharrie series pottery. Moreover, he notes that although cord marking and net impressing were the principal types of surface treatment, "scraping the exterior surface was another new style that was soon to become commonplace" (Coe 1952:308).

Uwharrie Cordmarked (Figure 13.17*i,k,m,o–p*)

Fifty-five sherds were classified as *Uwharrie Cordmarked*. All but one had S-twisted cord impressions, and most (88%) had scraped interiors. As with *Uwharrie Net Impressed* sherds, coarse sand (n=26) and medium crushed quartz (n=12) were the primary temper types. Other kinds of temper included fine crushed quartz (n=8), coarse quartz (n=6), and mixed quartz and feldspar (n=3). Most of these sherds were more than 6 mm thick and appear to represent relatively large, heavy jars with rounded or conoidal bases. Of the 10 rimsherds found, all had straight or slightly

everted profiles and all but one had a rounded lip. Only seven sherds were decorated or modified. Four of these were brushed or scraped on the exterior prior to firing; one neck sherd exhibited a band of broad, multiple, parallel incisions; one rimsherd possessed V-shaped notches along the lip (Figure 13.17*k*); and another rimsherd possessed U-shaped notches along the lip/rim edge.

Uwharrie Plain

Only seven sherds with smoothed or roughly smoothed exteriors were recovered. Most, if not all, of these specimens probably represent partially smoothed portions of net impressed or cord marked pots. Four of the sherds had scraped interiors, and all were more than 6 mm thick. These sherds were tempered with medium crushed quartz (n=2), fine crushed quartz (n=2), coarse sand (n=2), and mixed quartz and feldspar (n=1). The single rimsherd in the sample was slightly everted, had a flattened lip, and was undecorated. One small potsherd found in the plowzone has several small punctations on the exterior surface that were made with a small, pointed instrument. These sherds generally conform to pottery descriptions for the Uwharrie series (Coe 1952) and also are similar to sherds in the Research Laboratories of Anthropology's Uwharrie type collection.

Jenrette Simple Stamped

One simple stamped body sherd was recovered from the plowzone at the Hogue site. It is tempered with fine sand, is 6 mm to 8 mm thick, and has a smoothed interior. This specimen is similar to pottery found at the nearby Jenrette site and probably is associated with the mid-seventeenth century occupation of that site.

Fredricks Check Stamped

One check stamped rimsherd was recovered from Feature 5, interpreted as a tree disturbance. This sherd exhibits lightly-stamped paddle impressions characteristic of Fredricks series pottery, is tempered with fine sand, is 4 mm to 6 mm thick, and has a smoothed interior. It is from a medium-sized, undecorated jar that had a flattened lip and everted rim. This specimen probably is associated with the Occaneechi occupation of the nearby Fredricks site at the turn of the eighteenth century.

Indeterminate Sherds

Almost 93% of all sherds found at the Hogue site could not be classified because of either small sherd size or eroded surfaces. Most of these sherds are tempered with crushed quartz or very coarse sand, have scraped interiors, are relatively thick, and (when present) are decorated or modified by scraping, finger pinching, or notching of the lip. Given these characteristics, most indeterminate sherds probably are attributable to the Uwharrie series. A single exception is a fine sand tempered, flattened loop handle fragment that was recovered from the plowzone. This specimen almost certainly post-dates the Haw River occupation; however, no similar artifacts have been found at any of the nearby sites.

Summary

The Hogue site provided our best pottery sample from an early Haw River phase context (ca. A.D. 1000 to A.D. 1200). This pottery conforms reasonably well to Coe's (1952) general descriptions for ceramics of his Uwharrie focus, and therefore has been typologically classified into the Uwharrie series. Although published descriptions of Uwharrie pottery types do not exist, comparative collections were available for study at the Research Laboratories of Anthropology.

Significant characteristics of Uwharrie pottery are as follows. The predominant vessel form was a large, conoidal jar with either a straight or slightly constricted neck. Though Coe (1952) also reports the use of hemispherical bowls, no evidence of this vessel type was seen at the Hogue site. Uwharrie jars were heavy, compared to later Siouan pottery, and had walls that usually were more than 6 mm thick. Paste usually was tempered with crushed quartz, or secondarily, very coarse sand. Other temper types, including coarse crushed feldspar and mixed crushed feldspar and quartz, were rare. Most vessels were stamped with a paddle wrapped in a heavy, knotted net; however, some vessels were stamped with cord-wrapped paddles and others had heavily scraped or brushed exteriors. Often, net impressed pots appear to have been intentionally brushed prior to firing. Vessel interiors also were invariably scraped, though some were subsequently smoothed. Aside from brushing, other kinds of modification were rare. Decorations, when present, consisted of: V-shaped notches along the lip or lip/rim edge; broad, stick-incised bands around the vessel neck; or a band of finger pinches or finger impressions around the vessel neck or rim. During the latter part of the Haw River phase (after ca. A.D. 1200), vessel decoration became more common and more varied.

Lithic Artifacts

Archaeological testing at the Hogue site in 1989 recovered a sample of 1,816 lithic artifacts (Table 13.3). Almost two thirds (n=1,194) of these artifacts came from excavations on the eastern half of the site (designated 31Or231b). Debitage, including flakes and discarded cores, comprises almost 77% (n=1,394) of the sample. The remainder is made up of 104 projectile points, 295 other chipped stone tools (including 236

Table 13.3. Distribution of lithic artifacts from the Hogue site.

		Context																
Category	PZ	Fea 1	Fea 3	Fea 5	Fea 100	Fea 101	Fea 102	Fea 103	Fea 104	Fea 105	Fea 106	Fea 107	Fea 108	Fea 109	Fea 110	Surf./ Misc.	Total
Debitage																	
Decortication Flakes	272	9	-	2	20	-	2	2	2	1	-	-	12	-	1	-	323
Interior/Bif. Thin. Flakes	644	96	2	5	78	2	11	13	-	3	1	1	91	2	6	11	966
Shatter Fragments	6	-	-	-	-	-	-	-	-	-	-	-	-	1	-	-	7
Bipolar Flake	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Archaic Flakes	40	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	41
Cores	48	1	-	-	1	-	-	-	-	1	-	-	4	-	-	-	55
Raw Material	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Projectile Points																	
Kirk Corner-Notched	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Kirk Stemmed	2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2
Guilford Lanceolate	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Small Triangular Points	77	3	-	-	-	-	-	-	-	1	-	-	1	-	-	-	82
Unidentified Points	12	3	-	-	1	-	-	-	-	-	-	-	1	-	-	-	17
Other Chipped Stone Artifacts																	
Bifaces	28	1	-	-	1	-	-	-	-	-	-	-	1	-	-	1	32
Knife	-	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Chipped Hoes	4	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	5
End Scrapers	3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3
Side Scrapers	4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4
Denticulate	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Spokeshave	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Perforators	4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4
Gravers	7	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7
Utilized/Retouched Flakes	221	7	-	-	6	-	-	1	-	-	1	-	1	1	-	-	238
Ground Stone Artifacts																	
Ground Celt Fragment	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Stone Pipe Fragments	2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2
Large Cobble Tools																	
Cobble Choppers	4	2	-	-	2	-	-	-	-	-	-	-	7	-	-	-	15
Hammerstones	3	-	-	-	1	-	-	-	-	-	-	-	-	-	-	-	4
Worked Slab	-	-	-	-	-	-	-	-	-	-	1	-	-	-	-	-	1
Total	1388	124	2	7	111	2	13	16	2	6	3	1	118	4	7	12	1816

utilized and retouched flakes), three ground stone artifacts, and 20 large cobble tools. A majority of these artifacts, from both the plowzone and feature contexts, appear to be associated with the early Haw River phase occupation of the site. Only a few lithic artifacts (primarily projectile points and heavily patinated flakes) can be attributed to earlier site occupations.

Major artifact categories are described below. No attempt was made during raw material classification to differentiate types of metavolcanic rock.

Debitage

Decortication Flakes. Sample Size: 323. Form: This category includes 47 primary and 276 secondary decortication flakes. These flakes have a striking platform and bulb of percussion, and have cortex (primary – >75% cortex; secondary – <75% cortex) remaining on the exterior surface. Material: Metavolcanic rock–321, Vein quartz–1, Jasper–1. Comment: Given that quartz and metavolcanic cores occurred in relatively equal frequency at the Hogue site, the predominance of metavolcanic decortication flakes may simply reflect an inability of the lithic analyst to recognize cortical surfaces on quartz flakes. Decortication flakes were recovered from most excavated contexts.

Interior/Bifacial Thinning Flakes. Sample Size:

966. Form: Interior flakes are flat flakes that exhibit flake removal scars on the entire dorsal surface but lack a steep platform angle; bifacial thinning flakes are similar but possess a steep platform angle indicative of removal from a biface. These two flake types were not differentiated during analysis. Material: Metavolcanic rock–858, Vein quartz–104, Crystal quartz–3, Jasper–1. Comment: Interior and bifacial thinning flakes comprise over half of all lithic artifacts recovered from the Hogue site. These flakes were recovered from virtually excavated contexts; however, most came from the plowzone.

Shatter Fragments. Sample Size: 7. Form: Shatter fragments are undifferentiated, angular flakes that result from all stages of stone tool manufacture. Material: Metavolcanic rock–5, Vein quartz–2. Comment: One shatter fragment came from Feature 109; the other six came from the plowzone.

Bipolar Flake. Sample Size: 1. Form: This flake exhibits crushing at both ends, indicating that it was detached from a core using a bipolar percussion technique. Material: Vein quartz–1. Comment: Bipolar flake production is only poorly represented within late prehistoric lithic assemblages in piedmont North Carolina. This flake was recovered from the plowzone.

Archaic Flakes. Sample Size: 41. Form: These specimens are large, patinated flakes that probably date to the Archaic period, and were not classified by flake type. Material: Metavolcanic rock–41. Comment: One Archaic flake was found in Feature 1; the rest came from the plowzone.

Cores. Sample Size: 55. Form: This category includes amorphous chunks of raw material from which two or more flakes have been detached. One of these is a bipolar core; the others appear to be the product of direct percussion techniques. Material: Vein quartz–31, Metavolcanic rock–24. Comment: Cores were recovered from Features 1, 100, 105, and 108, as well as from the plowzone.

Raw Material. Sample Size: 1. Form: This specimen is an unmodified piece of soapstone. Material: Soapstone–1. Comment: None.

Projectile Points

Kirk Corner-Notched Projectile Point. Sample Size: 1. Form: The *Kirk Corner-Notched* type is defined by a large triangular blade, a straight to slightly concave base, and corner notches (Coe 1964:69–70). This specimen was complete and heavily patinated. Material: Metavolcanic rock–1. Comment: This projectile point type is associated with the Early Archaic period (ca. 8,000–6,000 B.C.). It was found in the plowzone in the western half of the site.

Kirk Stemmed Projectile Point. Sample Size: 2. Form: The *Kirk Stemmed* projectile point type is characterized by "a long daggerlike blade with deep serrations and a broad stem" (Coe 1964:70). The two fragments conjoin to form a complete specimen. Material: Metavolcanic rock–2. Comment: This type dates to the Early Archaic period (ca. 8,000–6,000 B.C.). Both fragments came from the same plowzone unit and probably were broken during excavation.

Guilford Lanceolate Projectile Point. Sample Size: 1. Form: The *Guilford Lanceolate* projectile point type is defined by a long, thick, slender, blade with convex edges and a straight, rounded, or concave base. This complete specimen is plano-convex in cross-section. Material: Metavolcanic rock–1. Comment: This specimen dates to the Middle Archaic period (ca. 4,500–4,000 B.C.) and was recovered from the plowzone in the western half of the site.

Small Triangular Projectile Points (Figure 13.18*b–t*). Sample Size: 82. Form: These specimens generally conform to the *Uwharrie Triangular* or *Caraway Triangular* types (Coe 1964:49). Although some are thick and crudely made, most are finely retouched and often have serrated edges. Of the 22 triangular points with incurvate bases, 13 had incurvate sides, five had excurvate sides, and four had straight sides. Of the 18 flat-based points, eight had excurvate lateral edges, seven had straight edges, and only three had incurvate edges. Seven points were small flakes that had been minimally retouched into a triangular shape. The remaining artifacts in this category were small projectile point fragments whose overall edge configuration could not be determined. These specimens range from 22 mm to 39 mm (mean=29.2, sd=4.7, n=24) in length, 15 mm to 32 mm (mean=20.4, sd=3.0, n=67) in width, and 1 mm to 17 mm (mean=5.7, sd=2.2, n=77) in thickness. Material: Metavolcanic rock–82. Comment: Although most of these specimens probably are associated with the early Haw River component, some may be associated with later villages at the nearby Jenrette and Fredricks sites. Only five of these points came from feature contexts. The rest were found in the plowzone.

Projectile Point Fragments. Sample Size: 17. Form: This category includes unidentifiable projectile point fragments. Ten of these appear to be fragments of large stemmed or notched points and probably date to the Archaic period. The other nine fragments probably are from small triangular projectile points. Material: Metavolcanic rock–17. Comment: The five projectile point fragments from Features 1, 100, and 108 are from triangular points. All other specimens were recovered from the plowzone.

Other Chipped Stone Artifacts

Bifaces. Sample Size: 32. Form: This category includes lithic blanks that exhibit flake removal scars on both surfaces. Although most of these specimens are fragments of amorphous bifaces that represent initial stages of bifacial tool production, several are

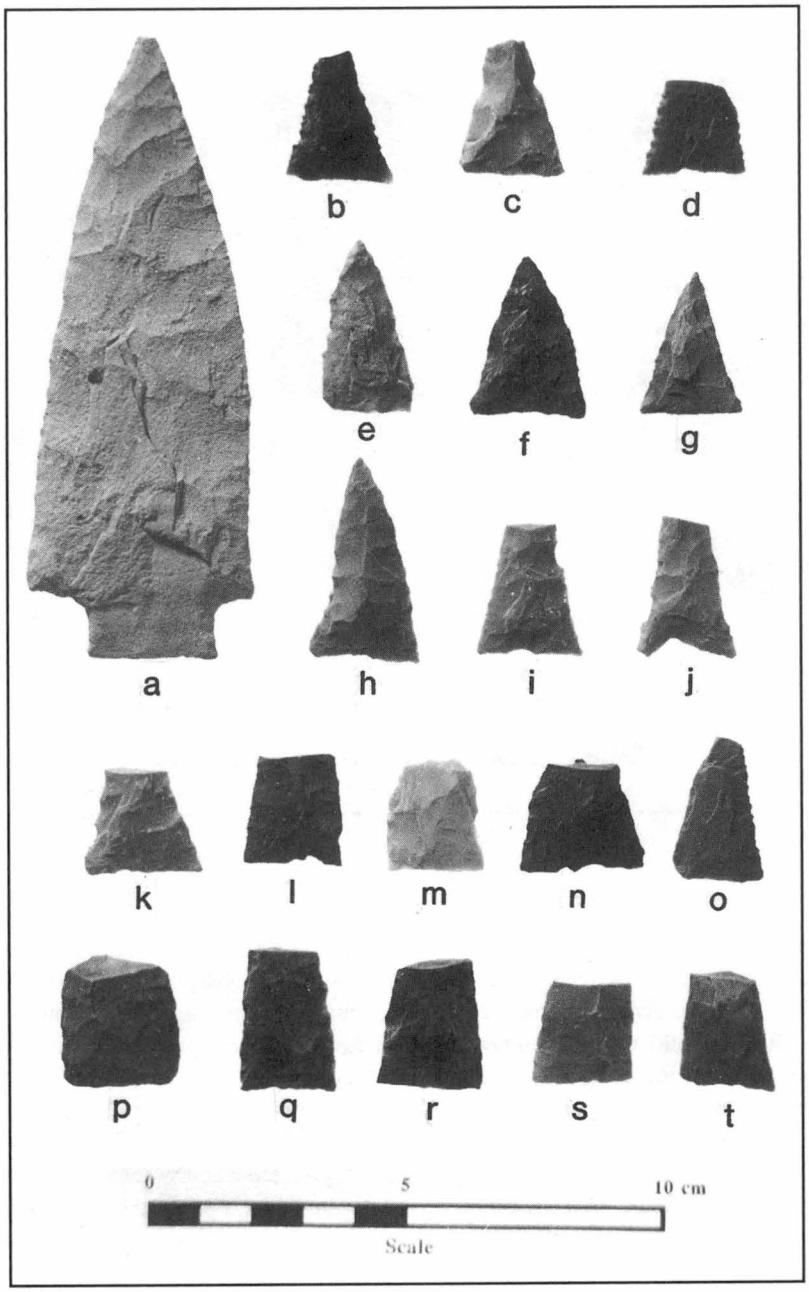

Figure 13.18. Chipped stone projectile points and knife from the Hogue site.

triangular in shape and reflect intermediate stages of projectile point manufacture. Most of these latter specimens apparently were discarded because of structural flaws in the raw material. Material: Metavolcanic rock–29, Vein quartz–2, Crystal quartz–1. Comment: Most of these artifacts probably are associated with the early Haw River phase occupation of the site. Bifaces and biface fragments were recovered from Features 1, 100, and 108, and from the surface and plowzone.

Knife (Figure 13.18*a*). Sample Size: 1. Form: This specimen is a large, thin, well-made, hafted biface. Though similar in size and gross form to the *Savannah River Stemmed* projectile point type (see Coe 1964), it was shaped by fine pressure-flaking rather than by direct percussion and possesses pronounced edge asymmetry. It measures 119 mm in length by 44 mm in width and is 9 mm thick. The squared stem appears to have been produced by removing the corners (with a pressure-flaking tool) from a large, straight-based, triangular preform. Material: Metavolcanic rock–1. Comment: This artifact came from Zone 2 of Feature 1 and is interpreted as a Haw River phase hafted knife.

Chipped Hoes (Figure 13.19). Sample Size: 5. Form: Chipped hoes are large, hafted implements, usually triangular to sub-triangular in form, that have a bifacially chipped working edge that is transverse to the long axis. Three specimens are either whole or

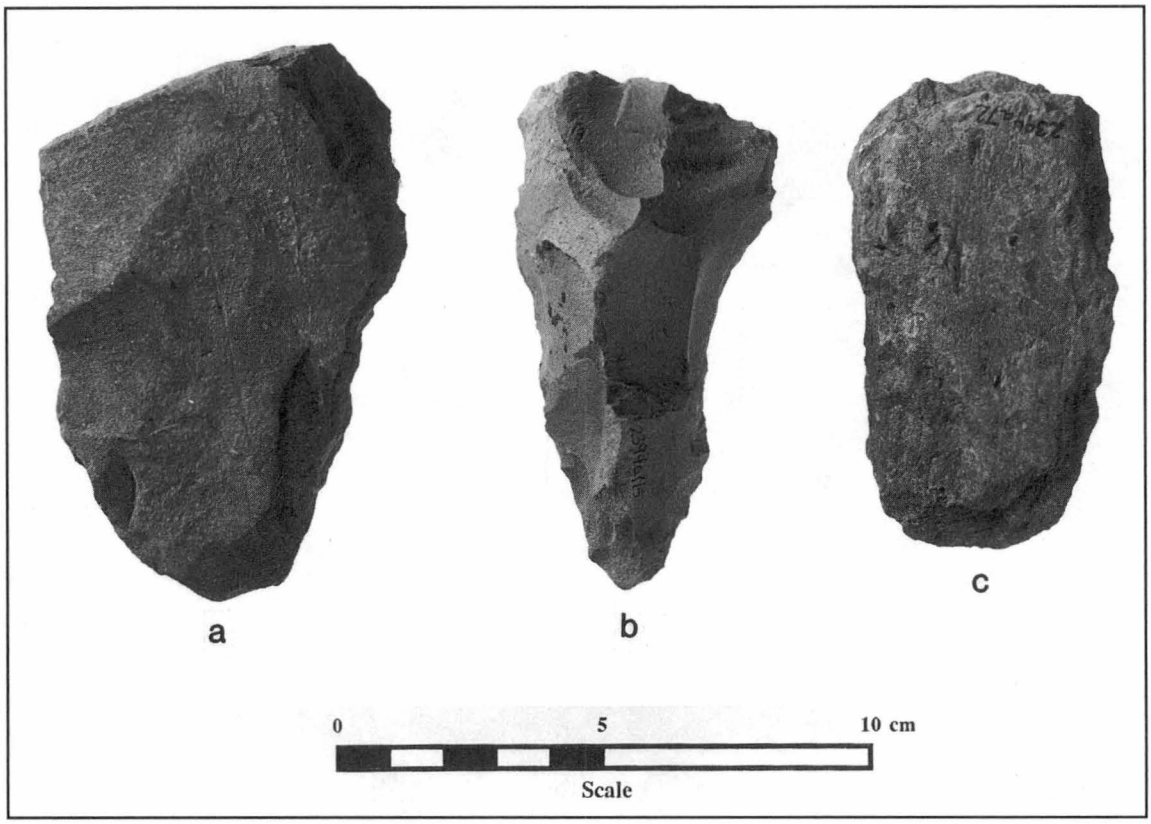

Figure 13.19. Chipped stone hoes from the Hogue site.

nearly whole; the other two are fragments. Material: Schist–3, Metavolcanic rock–2. Comment: Chipped hoes are interpreted as agricultural implements and were recovered from Feature 100 and the plowzone. Another chipped stone hoe, not included in this analysis, was recovered during initial testing of Feature 1.

End Scrapers. Sample Size: 3. Form: These specimens are small interior flakes that have been steeply retouched along the distal edge to produce a straight-to-convex working edge. Material: Metavolcanic rock–3. Comment: These artifacts were found in the plowzone and probably are associated with the early Haw River component. End scrapers are interpreted as hideworking tools.

Side Scrapers. Sample Size: 4. Form: Three of these specimens are thick decortication flakes that have been steeply retouched along a single lateral edge. The fourth specimen is a bifacial thinning flake that exhibits steep retouch along both lateral edges. Material: Metavolcanic rock–4. Comment: These artifacts were found in the plowzone and are interpreted as cutting or scraping tools. All but one specimen is probably associated with the early Haw River component.

Denticulate. Sample Size: 1. Form: This specimen is a large, Archaic, bifacial thinning flake that has been retouched to produce a serrated, denticulate edge. The lack of patination on the denticulate notches suggests that the flake was modified long after it was originally produced. Material: Metavolcanic rock–1. Comment: This plowzone artifact is interpreted as a cutting or shredding tool and probably is associated with the early Haw River component.

Spokeshave. Sample Size: 1. Form: This specimen is a heat-damaged interior flake with a broad, shallow, steeply retouched notch that measures 14 mm wide and 4 mm deep. Material: Metavolcanic rock–1. Comment: Spokeshaves are interpreted as probable woodworking planes. This artifact was recovered from the plowzone.

Perforators. Sample Size: 4. Form: All of these specimens are thick decortication flakes or shatter fragments that have a finely retouched, angular projection. Material: Metavolcanic rock–4. Comment: These four artifacts were recovered from the plowzone and are thought to represent hideworking punches.

Gravers. Sample Size: 7. Form: These specimens are small flakes that have been finely retouched or burinated along one edge to produce a small, sharp, triangular projection. Material: Metavolcanic rock–7. Comment: Gravers are interpreted as scoring or engraving tools. All of these artifacts were found in the plowzone.

Utilized and Retouched Flakes. Sample Size: 236. Form: This category includes 68 flakes that have been retouched along one or more edges and 168 flakes that

possess edge damage presumably resulting from use. Material: Metavolcanic rock–221, Vein quartz–13, Quartzite–1, Schist–1. Comment: Utilized and retouched flakes are interpreted as probable cutting implements. These artifacts were recovered from the plowzone and from Features 1, 100, 103, 106, 108, and 109.

Ground Stone Artifacts

Ground Celt Fragment. Sample Size: 1. Form: This specimen is a fragment from a ground stone celt or axe. Material: Unidentified igneous rock–1. Comment: This artifact was recovered from the plowzone. A whole celt, not included in this analysis, also was recovered from the west half of Feature 1 by Simpkins and Petherick (1985).

Stone Pipe Fragments. Sample Size: 2. Form: This category includes two conjoining fragments of a polished soapstone pipe bowl. Material: Soapstone–2. Comment: Both artifacts were recovered from the plowzone.

Cobble Choppers. Sample Size: 15. Form: This category consists of large cobbles or tabular pieces of rock that have been chipped along one edge. Material: Schist–9, Metavolcanic rock–5, Vein quartz–1. Comment: These artifacts are interpreted as probable heavy butchering implements but may also represent crude digging tools. Choppers were recovered from Features 1, 100, and 108, and from the plowzone.

Hammerstones. Sample Size: 4. Form: Three of these specimens are fist-sized rocks that have been battered along the edge; the fourth specimen also exhibits pitting on both surfaces, presumably from additional use as an anvil. Material: Vein quartz–2, Other igneous rock–1, Schist–1. Comment: These artifacts are interpreted as hand-held hammers. One hammerstone was found in Feature 100; the remainder came from the plowzone.

Worked Slab. Sample Size: 1. Form: This specimen is a large, tabular piece of rock that has been chipped around the edge. Material: Schist–1. Comment: The function of this artifact, recovered from Feature 106, is unknown.

Summary

Although a relatively large sample of lithic artifacts was collected at the Hogue site, very few of these came from feature contexts; instead, most (77.1%) were recovered from disturbed plowed soil. Moreover, very few chipped stone tools were found other than projectile points and utilized and retouched flakes. Because of this, very little can be said about the stone tool technology of the early Haw River phase component at this site.

The types of debitage recovered indicate that all stages of core reduction and tool production were performed at the site. Flintknapping activities primarily focused upon the manufacture of small, bifacially-made, triangular projectile points. Although utilized and retouched flakes were more numerous, these cutting tools represent little more than waste flakes that were minimally modified to produce a desirable working edge. As such, they are viewed as recycled debitage rather than specifically manufactured, formalized tools. Likewise, most of the other chipped stone tools in the sample (e.g., end scrapers, side scrapers, denticulate, spokeshave, perforators, and gravers) also are recycled flakes and, where multiple examples exist, lack uniformity both in form and design. In short, most of the chipped stone tools that can be attributed to the early Haw River phase reflect an expedient rather than a curated technology. Despite these observations, a variety of stone tool-related tasks appear to be represented, including hunting, butchering, hide-working, boneworking, woodworking, and crop cultivation.

Other Artifacts

The only aboriginal clay artifacts other than pottery found at the Hogue site were small fragments of fired clay and architectural daub. Fired clay, possibly representing hearth remains, was retrieved from the plowzone, Feature 5, and Feature 100. Several pieces of daub contained distinct stick or twig impressions and were recovered from Features 1, 6, 108, and 109. The presence of daub within these features suggests that the houses used by the Hogue site inhabitants may have been of wattle-and-daub construction.

Two hundred and sixty-one historic artifacts were recovered from the plowzone. All of these artifacts are associated with post-aboriginal activities at the site and include: 107 brick fragments, 40 historic potsherds, 37 cinders, 29 coal fragments, 29 pieces of plate glass and bottle glass, and 19 iron fragments.

One small piece of eroded oyster shell was recovered during plowzone excavations. Because shell rapidly deteriorates within the plowzone due to physical and chemical weathering, it is considered to be a recent artifact.

Botanical Remains

by

Kristen J. Gremillion

Carbonized plant remains from the 1989 excavations at the Hogue site were recovered from 19 10-liter flotation samples (Tables 13.4 to 13.6). The overall density of plant remains, however, was rather low at 0.09 grams/liter of soil. Hickory nutshell comprised the bulk of plant food remains. Acorn and walnut shell, maize remains, and seeds occurred only in small quantities, with maize appearing only in Features 1 and 105. The only non-cultigen seeds noted, bedstraw and bearsfoot, probably do not represent food plants.

Summary

A community pattern of dispersed homesteads with associated pit features seems to be indicated by the remains from the Hogue site. Light artifact densities and widely scattered subsurface features point to such a pattern. A similar settlement plan has been recognized at other Haw River phase sites in the Haw drainage such as Guthrie (31Am145) and Webster (31Ch463). What is distinctive about the Hogue site is the presence of numerous burials in a cemetery-like cluster. The Guthrie site produced three dispersed burials while excavations at the Webster site did not uncover any burials. It should be quickly added, however, that the scale of excavations at all these sites has been small, particularly considering the widely dispersed nature of the settlements. Consequently, statements regarding potential differences in intrasite structure and composition among Haw River phase sites must remain tentative until more sites and larger areas have been excavated.

Table 13.4. Summary of plant remains from the Hogue site (weights in grams).

Sample	Soil Volume (liters)	Wood/Stem Charcoal	Unknown Plant	Root or Tuber	Plant Food Remains	Total
Feature 1						
Zone 1a	10.0	2.94	0.18	0.19	0.34	3.65
Zone 1b	10.0	0.54	-	-	0.01	0.55
Zone 2	10.0	0.64	0.05	-	0.01	0.70
Zone 3	10.0	0.28	0.03	-	<0.005	0.31
Sub-total	40.0	4.40	0.26	0.19	0.36	5.21
Feature 5						
Zone 1(A)	10.0	1.24	0.08	-	0.12	1.32
Zone 1(B)	10.0	0.87	0.06	-	0.15	1.08
Sub-total	20.0	2.11	0.14	-	0.27	2.40
Feature 6, Zone 1	10.0	0.14	0.41	-	0.03	0.58
Feature 100, Zone 1	10.0	0.19	-	-	0.11	0.30
Feature 101 (Burial 15), Zone 1	10.0	0.24	-	-	-	0.24
Feature 102 (Burial 16), Zone 1	10.0	0.65	0.02	-	0.03	0.70
Feature 103, Zone 1	10.0	2.67	-	-	-	2.67
Feature 104, Zone 1	10.0	0.39	0.09	-	-	0.48
Feature 105, Zone 1	10.0	0.10	-	-	0.01	0.11
Feature 106, Zone 1	10.0	0.25	0.06	-	0.02	0.33
Feature 107, Zone 1	10.0	0.14	-	-	-	0.14
Feature 108						
Zone 1	10.0	0.66	0.22	-	0.12	1.00
Zone 2	10.0	0.65	0.03	-	0.03	0.71
Sub-total	20.0	1.31	0.25	-	0.15	1.71
Feature 109, Zone 1	10.0	0.51	-	-	0.04	0.55
Feature 110, Zone 1	10.0	0.62	0.05	-	0.06	0.73
Total	190.0	13.72	1.28	0.19	1.08	16.15

Table 13.5. Carbonized plant food remains from the Hogue site (weights in grams).

Sample	Hickory Shell	Acorn Shell	Walnut Shell	Maize Kernels	Maize Cupules	Seeds	Total
Feature 1							
Zone 1a	0.31	-	-	0.02	0.01	-	0.34
Zone 1b	0.01	-	-	-	-	-	0.01
Zone 2	-	-	-	0.01	-	-	0.01
Zone 3	-	-	-	-	<0.005	-	<0.005
Sub-total	0.32	-	-	0.03	0.01	-	0.36
Feature 5							
Zone 1(A)	0.12	-	-	-	-	<0.005	0.12
Zone 1(B)	0.13	0.02	-	-	-	-	0.15
Sub-total	0.25	0.02	-	-	-	-	0.27
Feature 6							
Zone 1	0.03	-	-	-	-	-	0.03
Feature 100							
Zone 1	0.11	-	-	-	-	<0.005	0.11
Feature 102 (Burial 16)							
Zone 1	0.03	-	-	-	-	<0.005	0.03
Feature 105							
Zone 1	-	-	-	-	0.01	-	0.01
Feature 106							
Zone 1	0.02	-	-	-	-	-	0.02
Feature 108							
Zone 1	0.12	-	-	-	-	-	0.12
Feature 108							
Zone 2	0.03	-	-	-	-	-	0.03
Sub-total	0.15	-	-	-	-	-	0.15
Feature 109							
Zone 1	0.03	-	0.01	-	-	-	0.04
Feature 110							
Zone 1	0.06	-	-	-	-	-	0.06
Total	1.00	0.02	0.01	0.03	0.02	<0.005	1.08

Table 13.6. Seed and fruit counts from the Hogue site.

Sample	Maize Kernels	Bedstraw	Bearsfoot	Unknown	Total
Feature 1					
Zone 1a	1	-	-	-	1
Zone 2	1	-	-	-	1
Sub-total	2	-	-	-	2
Feature 5					
Zone 1	-	1	-	2	3
Feature 100					
Zone 1	-	-	1	-	1
Feature 102 (Burial 16)					
Zone 1	-	-	-	1	1
Total	2	1	1	3	7

Chapter 14

Siouan Culture, Chronology, and Process

In this final chapter, we present a chronological synthesis of the north-central North Carolina Piedmont and discuss some of the consequences of Euro-Indian contact upon the piedmont natives. The chronological synthesis summarizes the late prehistoric and historic archaeological phases of the Haw, Eno, and upper Dan river drainages in terms of settlement, subsistence, mortuary patterns, and material culture. Processes of culture contact and change are addressed through the ethnohistorical as well as the archaeological record. Patterns of trade and interaction are discussed in terms of demographic, economic, sociopolitical, and ideological impacts on the piedmont tribes. To bring together as much information as possible, data are included from previous research, much of which has not been published.

Culture Chronology of the Haw and Eno River Drainages

Five archaeological phases have been delineated for the Late Prehistoric and Contact periods within the Haw and Eno river drainages (Table 14.1). The two earliest phases—Haw River and Hillsboro—encompass both drainages and represent aboriginal cultures that preceded the period of sustained contact with Europeans. The latter three phases—Mitchum, Jenrette, and Fredricks—are more restricted geographically, and are attributed to the historic Sissipahaw, Shakori, and Occaneechi tribes, respectively. Our present chronological framework for the Haw River and Hillsboro phases is based upon radiocarbon dates obtained during Siouan project excavations (Table 14.2); the probable chronological positions of the other phases are derived from ethnohistorical records and analyses of European trade artifacts.

Haw River Phase (A.D. 1000–1400)

The Haw River phase represents the Late Prehistoric period in the southern half of the project area. Initially this phase was defined primarily by ceramic attributes, and pottery still provides a handy means of temporally ordering sites represented only by surface collections. However, excavations during 1987 allow us to refine and elaborate other dimensions of the Haw River phase. Excavations in the Dan River drainage also provide comparative data that highlight significant differences between the two drainage systems that are not reflected in their respective ceramic assemblages.

Perhaps the most significant difference between the late prehistoric Dan River and Haw River phases is found in the overall population densities of the two phases. Settlement and community patterns reveal this difference. In addition to the five sites excavated during the course of the Siouan project, over 20 sites have been recorded that produced substantial collections of Haw River phase ceramics. Most appear to represent small settlements comprised of widely dispersed households with associated storage pits, hearths, and burials. A low frequency of pit features and postholes in conjunction with low surface and plowzone artifact densities points to a low population density and a lack of extended site occupation. For example, intensive, systematic auger testing (at 2.5-ft intervals) over a 0.5-acre area at the Guthrie site identified only seven pit features. At the nearby Webster site on the Haw River, extensive auger tests over a 9,000 sq ft area uncovered only a single pit feature. This pattern was duplicated on the Eno River where isolated Haw River phase pits were found at the Hogue site and interspersed with Contact period components at the nearby Fredricks and Jenrette sites.

A somewhat different community pattern is suggested by excavations at the Holt site where a small but compact community appears to be represented. Six tightly clustered pit features comprised the habitation area situated atop a narrow ridge at the confluence of Stinking Quarter and Big Alamance creeks. The total site area is approximately one-quarter acre in extent. As with other Haw River phase sites, the occupation was neither long nor intense. Similar sites are probably located along other ridges and knolls bordering the tributaries of the Haw River. In fact, a similar settlement pattern seems to persist into the subsequent Hillsboro phase in this area.

The only evidence of larger, more long-term settlements during the Haw River phase comes from the Mitchum site. Although defined primarily by a Contact period component, the Mitchum site also contained a thin midden attributable to the Haw River phase. Excavation of this midden and the overlying plowzone yielded numerous Haw River phase potsherds. The density of material points to a longer and more substantial occupation than at other Haw River phase sites. However, because of the substantial historic occupation at Mitchum, the limits and configuration of the earlier component are unclear at this time. It should also be noted that the materials from Mitchum apparently date to the end of the Haw River phase and may indicate the parallel development of larger, more nucleated settlements along the floodplains of the Haw River itself, while scattered homesteads and hamlets

Table 14.1. Chronological framework for the late prehistory and early history of the north-central North Carolina Piedmont.

Drainage Period	Archaeological Phase	Estimated Time Range	Primary Sites Sampled by the Research Laboratories of Anthropology
Haw River Drainage			
Late Prehistoric	Haw River	A.D. 1000–1400	Holt, Guthrie, Webster, Mitchum
Protohistoric	Hillsboro	A.D. 1400–1600	Edgar Rogers, George Rogers
Contact	Mitchum	A.D. 1600–1670	Mitchum
Eno River Drainage			
Late Prehistoric	Haw River	A.D. 1000–1400	Hogue
Protohistoric	Hillsboro	A.D. 1400–1600	Wall
Contact	Jenrette	A.D. 1600–1680	Jenrette
Contact	Fredricks	A.D. 1680–1710	Fredricks
Dan River Drainage			
Late Prehistoric	Dan River	A.D. 1000–1450	Powerplant, William Kluttz, Lower Saratown
Protohistoric	Saratown (Early)	A.D. 1450–1620	Early Upper Saratown, Powerplant
Contact	Saratown (Middle)	A.D. 1620–1670	Lower Saratown
Contact	Saratown (Late)	A.D. 1670–1710	Upper Saratown, William Kluttz

typify the settlements along the smaller tributaries.

The usual features at Haw River phase sites are fairly large, cylindrical storage pits that were refilled with soil and refuse. The exception to this pattern is the Guthrie site where only small pit hearths and basins were identified. Also of note is the fact that the Guthrie site failed to produce any evidence of agriculture. Whether there is a relationship between the absence of storage pits and the absence of domestic plants is unclear at this point. However, at other Haw River phase sites with storage facilities, some evidence of agriculture also was present. Even the single pit feature at Webster produced maize kernels and cupules, and a variety of cultivated plants, including maize, beans, squash, and sunflower, were recovered from the Holt site storage pits. Acorn and hickory also were represented at Haw River phase sites and usually were accompanied by a wide variety of faunal resources suggesting a mixed hunting and gathering economy with some reliance on domestic plant foods.

Burials were recovered from two Haw River phase sites: Guthrie in the Haw drainage and the Hogue site on the Eno River. Although only one poorly preserved skeleton, with a large rock placed near the skull, was found at the Guthrie site, two other shaft-and-chamber pits probably also contained human burials, but all the bones had deteriorated. These pits were widely scattered across the site. In contrast, the burials from the Hogue site were tightly clustered in the eastern section of the site. Six pits produced poorly preserved human bone, whereas three others were similar to burial pits in form and size but lacked skeletal remains. Where bone was present, the skeletons appear to have been flexed. Large rocks, similar to the one in the Guthrie burial, were placed in three of the graves, usually in the area of the feet. All the burial pits were shallow, averaging almost 0.5 ft in depth. Based on the present sample, it is not possible to tell if cemeteries are typical of Haw River phase mortuary patterns. What does seem to be part of the pattern is a lack of burial associations (other than the large rocks that were sometimes placed in the graves).

Pottery of the Haw River phase has been classified into two separate ceramic series. During the first half of the phase (A.D. 1000–1200), as represented by the Hogue site, pottery vessels consisted of large, thick-walled, mostly undecorated conoidal jars with straight or slightly constricted necks. These vessels are interpreted as late manifestations of the Uwharrie series, first recognized at the Uwharrie site (31Mg14) on the Pee Dee River and thought to be the predominant pottery used in the Piedmont region from about A.D. 500 to A.D. 1000–1200. Almost half of all Hogue site sherds were net impressed, followed by brushed (33%), cordmarked (19%), and plain (3%). As with other Haw River phase ceramic assemblages, temper was variable and consisted of medium-to-fine crushed quartz (49%), coarse sand (28%), coarse crushed quartz (18%), and mixed quartz and feldspar (5%). Only a few decorated sherds, displaying notches along the lip and finger pinching along the neck, were found.

By the second half of the Haw River phase, pottery attributes of vessel form, paste, surface treatment, and decoration had changed sufficiently to allow the recognition of a new ceramic series—the Haw River series. Haw River series pottery was found at the Holt, Guthrie, Webster, and Mitchum sites, all of which contain Haw River phase components that date to the fourteenth or early fifteenth centuries A.D. Although the overall morphology of Haw River vessels is generally similar to that of the preceding Uwharrie series, vessel necks are more constricted and decoration of the

Table 14.2. Calibrated radiocarbon dates from the Haw, Eno, and Dan river drainages.

Archaeological Phase Site and Context	Sample No.	Uncalibrated Age (years BP)	Calibrated Dates (years A.D.) Lower Limits 2σ	Lower Limits 1σ	Intercepts	Upper Limits 1σ	Upper Limits 2σ
Haw River Phase (Haw and Eno Drainages)							
Hogue (31Or231b/233), Fea. 108	Beta-36096	1790 ± 200	350	15 (BC)	231	526	640
Fredricks (31Or231), Fea. 30	Beta-20378	1030 ± 60	890	978	997	1026	1156
Hogue (31Or231b/233), Fea. 1	Beta-20380	920 ± 70	980	1020	1044, 1090, 1122, 1139, 1152	1209	1260
Holt (RLA-Am163), Fea. 1	Beta-20379	900 ± 100	904	1003	1133, 1136, 1156	1256	1280
Guthrie (RLA-Am145), Fea. 3	Beta-23507	620 ± 70	1260	1281	1315, 1369, 1386	1408	1430
Webster (31Ch463), Fea. 1	Beta-23506	510 ± 70	1280	1329	1418	1440	1490
Holt (RLA-Am163), Fea. 2	Beta-23508	480 ± 50	1328	1411	1429	1442	1486
Hillsboro Phase (Haw and Eno Drainages)							
Wall (31Or11), Sq. 350R620, PH #3	GX-9834	495 ± 120	1280	1317	1424	1485	1650
Wall (31Or11), Sq. 340R640, PH #1	GX-9719	395 ± 140	1280	1410	1453	1650	1955
Edgar Rogers (RLA-Am162), Fea. 1	Beta-23509	350 ± 50	1440	1450	1494, 1502, 1506, 1605	1637	1650
George Rogers (RLA-Am236), Fea. 7	Beta-23510	350 ± 50	1440	1450	1494, 1502, 1506, 1605	1637	1650
George Rogers (RLA-Am236), Fea. 1	Beta-20381	230 ± 60	1494	1639	1656	1955	1955
Wall (31Or11), Bu. 1-83	GX-9718	220 ± 145	1420	1490	1659	1955	1955
Mitchum Phase (Haw Drainage)							
Mitchum (31Ch452), Fea. 7	Beta-23505	101.2 ± 1.0	1690	1700	1711, 1717, 1884, 1914, 1955	1955	1955
Dan River Phase (Dan River Drainage)							
Powerplant (31Rk5), Fea. 18	Beta-36094	1480 ± 90	390	432	578	645	690
Leatherwood Creek (44Hr1), Fea. 3	UGa-565	1370 ± 80	540	602	652	759	851
Clark (44Pk11), Fea. 1	UGa-1363	935 ± 55	990	1020	1038, 1101, 1117, 1141, 1150	1186	1220
Stockton (44Hr35), Fea. 27	UGa-617	925 ± 60	990	1021	1042, 1093, 1121, 1139, 1152	1191	1256
William Kluttz (31Sk6), Fea. 15	Beta-36091	780 ± 70	1041	1194	1259	1280	1383
Lower Saratown (31Rk1), Fea. 41	Beta-36092	750 ± 60	1161	1222	1264, 1268, 1276	1282	1386
Koehler (44Hr6), Fea. 56	UGa-1364	645 ± 70	1260	1279	1298, 1374, 1378	1394	1420
Dallas Hylton (44Hr20), Fea. 52	UGa-566	635 ± 60	1260	1281	1302, 1372, 1382	1394	1420
Box Plant (44Hr2), Fea. B-15	UGa-619	620 ± 60	1280	1282	1315, 1369, 1386	1405	1420
Koehler (44Hr6), Fea. 106	UGa-1365	610 ± 70	1264	1282	1321, 1367, 1388	1410	1430
Upper Saratown (31Sk1a), Fea. 18	Beta-36089	590 ± 60	1280	1285	1328, 1350, 1391	1413	1430
Wells #1 (44Hr9), Fea. 15	UGa-2831	570 ± 55	1280	1305	1332, 1343, 1394	1417	1440
Koehler (44Hr6), Fea. 122	UGa-1366	545 ± 55	1280	1325	1409	1427	1440
Gravely (44Hr29), TP - 2	UGa-2832	230 ± 70	1490	1532	1656	1955	1955
Philpott (44Hr4), Refuse Pit	UGa-2830	205 ± 55	1526	1647	1664	1955	1955
Saratown Phase (Dan Drainage)							
Early Upper Saratown (31Sk1), Fea. 2	Beta-36090	600 ± 80	1260	1282	1323, 1353, 1363, 1365, 1389	1415	1440
Lower Saratown (31Rk1), Fea. 46	Beta-36093	420 ± 60	1410	1428	1443	1492	1640
Powerplant (31Rk5), Fea. 27	Beta-36095	970 ± 80	893	988	1025	1159	1230

rim and neck is much more widespread. It is also likely that a greater variety of vessel forms are represented by the Haw River series.

Lip notching and the application of finger punctations to the vessel neck continued as the predominant methods of decoration; however, several other decorative treatments also were used, including fine oblique incisions along the lip, single or multiple parallel incisions or brushed bands along the neck, a band of short vertical or oblique incisions around the neck, and incised V's applied to the neck or shoulder. Net impressing became the dominant type of surface treatment, occurring on over 90% of of the Haw River sherds at all four sites. Other surface treatments, such as cordmarked, brushed, and plain, were only rarely observed. Despite this consistency in surface treatment, temper was quite variable, and at each site represented a combination of medium-to-fine crushed quartz, crushed feldspar, mixed crushed quartz and feldspar, and coarse sand. Differences in the frequency distribution of these temper types between sites are thought to reflect mostly local variability in available tempering material rather than functional or chronological differences.

A few *Hillsboro Simple Stamped* sherds also were recovered from Haw River phase features at the Guthrie, Holt, and Webster sites; however, their association with this phase is uncertain. While it is tempting to view these artifacts as being intrusive from later, and perhaps sporadic, occupations at these sites, they may document the beginnings of the Hillsboro phase elsewhere in the region. Given that Hillsboro series pottery appears to have its origins outside the Haw and Eno drainages and may not be associated with an indigenous population (Davis and Ward 1991:42), the appearance of Hillsboro pottery on late Haw River phase sites has significant implications for the timing and nature of the transition from the Haw River phase

to the Hillsboro phase. Specifically, it suggests the coterminous occupation of late Haw River phase and early Hillsboro phase sites in the region between about A.D. 1350 and A.D. 1450. The fact that the earliest known Hillsboro phase site (i.e., the Wall site) was heavily palisaded suggests that this period may not have been entirely peaceful.

Lithic artifacts associated with the Haw River phase consist of small, triangular, chipped stone projectile points referable to the *Caraway Triangular* type, bifacial knives, small bifacial drills, pièces esquillées, chipped chisels, cobble choppers, and a variety of flake tools, including side scrapers, end scrapers, perforators, gravers, denticulates, and utilized/retouched flakes. Other ground stone tools include celts, hammerstones or manos, and milling stones. Collectively, these artifacts reflect a wide range of tasks that involved stone tools. Bone and shell also were fashioned into tools, as evidenced by the bone awls and worked antler recovered from the Holt site and the serrated shell scrapers found at the Webster site.

Hillsboro Phase (A.D. 1400–1600)

The Haw River phase is followed by the Hillsboro phase. This phase encompasses the period during which initial contacts were made between Europeans and southeastern Indians. However, in the study area there is no evidence of any contacts during the Hillsboro phase. European trade goods are totally lacking as are any indications of disruptions caused by disease and depopulation. Hillsboro phase people may have heard distant rumors of the aliens' arrival, but it is highly unlikely that they ever laid eyes on the newcomers (Ward and Davis 1991).

Settlement patterns recognized during the Haw River phase continue into the Hillsboro phase. A few sites appear to represent compact, nucleated villages similar to the pattern suggested for the Haw River phase component at the Mitchum site. The best known example of this community type is the Wall site located on the Eno River near Hillsborough. Over one-fourth of this village, estimated to cover 1.25 acres, has been excavated. These excavations exposed multiple palisade lines, several circular houses, and an extensive midden (Figure 14.1). Based on the size and number of the structures, the replacement rate of wall posts (cf. Warrick 1988), and the multiple palisade alignments, it is estimated that the Wall site was occupied for less than 20 years by a population of 100 to 150 people (Ward and Davis 1991).

Later Hillsboro phase sites usually are small, and are situated along the valley margins or adjacent uplands of small tributary streams. Like Guthrie, Holt, Webster, and Hogue, they seem to represent scattered communities comprised of a few families. None are palisaded. Although Hillsboro phase sites are fewer in number, artifact and pit feature densities increase markedly over those of the earlier Haw River phase settlements. This increased occupation intensity is particularly noticeable during the last half of the Hillsboro phase.

The George Rogers and Edgar Rogers sites provide excavated data that pertain to the late Hillsboro phase. The Edgar Rodgers site, located on Cane Creek, contained a cluster of features and postholes within a 0.4-acre area. Located on a high alluvial terrace overlooking Alamance Creek, the George Rogers site produced a similar array of features and artifacts. In addition, part of a circular house, similar to Wall site structures, was identified. Although this site covers less than an acre, Hillsboro phase artifacts are widely distributed both upstream and downstream from George Rogers.

A new kind of feature makes its debut during the Hillsboro phase. These are large shallow basins rich with deposits of food and other domestic refuse. They have been interpreted as roasting pits or earth ovens used in the preparation of large amounts of food, perhaps associated with community-wide ceremonies. Storage pits, though still present, are overshadowed by these roasting pits. Similar facilities used in the preparation of *tuckahoe* bread by the Virginia Algonquians were described by Strachey:

> They use to rake up a great nomber of them in old leaves and ferne, and then cover all with earth or sand, in the manner of a coal-pit; on each side they contynue a great fier a daie and a night [Strachey, quoted in Swanton 1946:363].

Writing in 1687, the Reverend John Clayton described the preparation of barbequed venison, "that is wrapped up in leaves and roasted in embers" (Clayton, quoted in Bushnell 1907:43).

There is little doubt that the large shallow basins found at the Edgar Rogers and George Rogers sites represent the remains of roasting pits. At least two features at the Wall site (Features 47 and 52) also have been interpreted as "earth ovens" or roasting pits (Petherick 1987:41). Similar facilities were reported from southwest Virginia at the Crab Orchard site (Egloff 1980).

In addition to the large amount of food refuse normally found in these features, ash, charcoal and fire-cracked rocks are also frequently part of their contents. Both plant and animal foods appear to have been carefully wrapped in "leaves and ferne," placed in large basins, covered with earth, and then had a fire built on top. After the "barbeque" was cooked, the debris from the fire and the soil cover was removed. The food was then taken out and consumed nearby. The resulting garbage was simply kicked back into the basins along with ash, charcoal, and heating stones from the cooking fire. A similar scene still takes place today throughout much of the South where pit-cooked

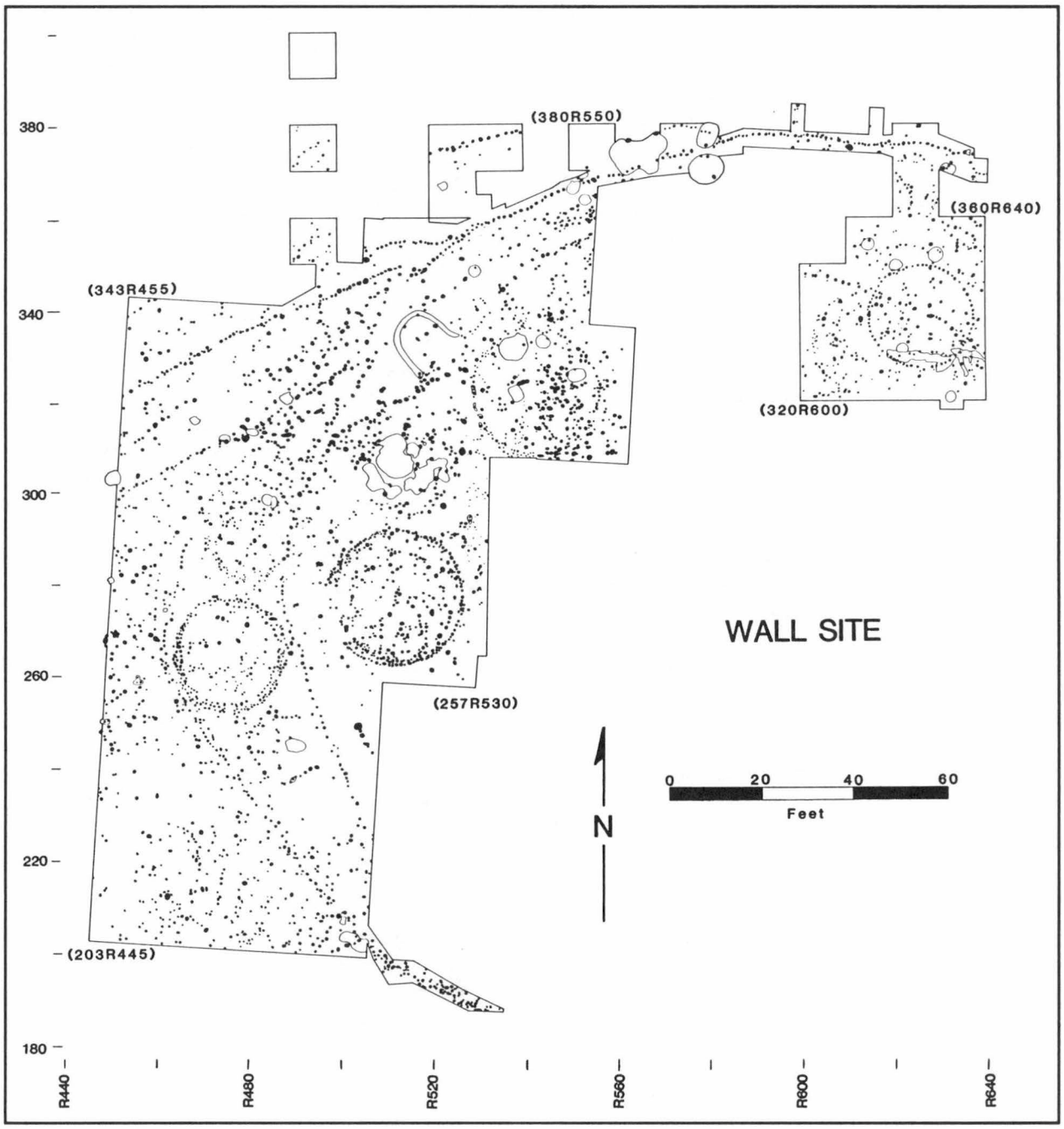

Figure 14.1. Excavation plan at the Wall site.

barbeque is prepared to celebrate homecomings, birthdays, marriages, puberty, and a host of other community rituals. Pork has taken the place of venison, and beer cans and styrofoam plates are discarded instead of turtle-shell cups and broken pots. Yet many of the social components of these ritual feasts have probably changed little during the last 400 years.

Although the ritual consumption of food may have increased during the Hillsboro phase, the kinds of things eaten changed little from the Haw River phase. Corn, beans, and squash were cultivated, while acorns, hickory nuts, and walnuts were seasonally gathered along with wild fruits and berries. Deer provided the mainstay of the meat diet and was supplemented by a variety of small mammals, turtles, and fish. This mixed subsistence base was rounded out by fowl such as wild turkeys and passenger pigeons.

What we know about the mortuary complex of the Hillsboro phase comes from burials excavated at the Wall and Edgar Rogers sites. At the latter only one grave was found, that of a child in a shallow rectangular pit with the head pointing to the east. Perhaps the most interesting feature of this burial was the upper fill zone which was comprised of soil rich in organic

content, including mussel shells and animal bones. This fill was very similar to that of the shallow roasting pits located nearby. Later Fredricks phase burials also contained upper fill zones containing refuse and food remains. This has led to the suggestion that ritual feasting or cleaning may have been part of the mortuary ceremony (Ward 1987). The Edgar Rogers site data suggest that this pattern began during the Hillsboro phase. The Wall site burials, discussed below, further suggest that this behavior may have become part of the mortuary complex early during the Hillsboro phase.

A total of eight burials have been excavated at the Wall site. Most were placed in shaft-and-chamber pits with the head oriented in an eastward direction. At least two of the burials contained rich midden-like deposits of fill in their upper zones. In fact, both were designated as "trash pits" in the field before they were excavated. Both also contained large rocks separating the upper organic fill from the sterile mottle clay fill that covered the bodies. Based on these fill characteristics and associated artifacts, it appears that children and some adult males received the most elaborate treatment at death, a pattern also indicated at the nearby Fredricks site (Ward 1987:107).

Although similarities exist between the Hillsboro phase and Fredricks phase burials, there are notable differences. At the Wall site, graves were widely dispersed and usually were placed inside or adjacent to house structures. This spatial pattern also was observed at Upper Saratown on the Dan River (Navey 1982). However, at the Fredricks site, the graves were located outside the village palisade in at least two cemeteries.

Pottery of the Hillsboro phase is attributed to the Hillsboro ceramic series and was first recognized at the Wall site (Coe 1952). A detailed description of this series is provided by Davis (1987). Unlike the preceding Haw River series which represents mostly large, net impressed jars, the Hillsboro series defines a more varied ceramic assemblage consisting of large, simple stamped and check stamped jars, and smaller, plain and often decorated jars and bowls. In addition to differences in vessel morphology and surface treatment, other attributes of paste and decoration also show little or no relationship to the Haw River series. Because of this obvious discontinuity between these two ceramic series, it is argued that they are derived from two distinct ceramic traditions and likely represent the products of different peoples.

The earliest known Hillsboro pottery assemblage is from the Wall site and appears to date to the mid-fifteenth century A.D. The most remarkable aspect of the Wall site pottery sample is that less than 1.5% (i.e., only 39 net impressed, nine cordmarked, and four fabric marked sherds) of the 3,498 sherds analyzed were not attributed to the Hillsboro series (see Davis 1987:200). As with the late Haw River phase assemblages which showed little evidence of the coming Hillsboro phase, the Wall assemblage likewise contained little hint of the earlier Haw River phase.

Almost 73% of all potsherds from the Wall site were classified as *Hillsboro Simple Stamped*. Of the remaining 27%, 14% were *Hillsboro Check Stamped* and just over 11% were classified as *Hillsboro Plain*. Hillsboro series pottery was mostly tempered with medium-to-fine sand (51%) or finely crushed feldspar (41%) (Davis 1987:201). The Wall site vessel assemblage was dominated by small-to-large, simple stamped jars, followed by large check stamped jars, small cazuela bowls, and small jars with carinated shoulders. Both simple stamped and check stamped jars often had flaring or heavily everted rims, occasionally had folded rimstrips, and were decorated with wide, shallow notches applied to the lip/rim edge.

The *Hillsboro Plain* cazuela bowls and carinated jars have no antecedents in the Haw and Eno drainages and are rare on later Hillsboro phase sites. Most contain a fine paste, are well made, and usually are decorated. Decoration invariably consists of one or more of the following: (1) a single line or multiple lines of small, circular reed punctations around the shoulder; (2) incised or punctated V's extending above and/or below the shoulder (occasionally, incised V's are rounded and appear more like half-circles); and (3) V-shaped notches or circular reed punctations along the lip.

Moderate samples of late Hillsboro phase (i.e., A.D. 1500–1600) pottery were recovered from the George Rogers and Edgar Rogers sites. Because these sites yielded identical radiocarbon ages and are situated in adjacent tributary valleys of the Haw River, they provide an interesting picture of regional ceramic variability during this period. In addition, they appear to represent small vessel assemblages that probably were used for a relatively short period of time.

Perhaps the most fascinating aspect of both ceramic assemblages is that they contained evidence for the use of *Haw River Net Impressed* vessels alongside more typical carved-paddle stamped and smoothed vessels of the Hillsboro series. The evidence was most compelling at the George Rogers site, where a late Hillsboro phase feature contained a large piece of a net impressed jar in direct association with large fragments of simple stamped and check stamped jars. Numerous net impressed sherds were recovered from other George Rogers site features and from features at the Edgar Rogers site. Unlike the net impressed pottery from earlier Haw River phase sites, these sherds often had smoothed interiors and usually were tempered with sand or finely crushed feldspar rather than crushed quartz or coarse feldspar. Interior smoothing and the use of fine temper are both thought to be late characteristics of net impressed pottery in the North Carolina Piedmont.

The greatest difference between the Edgar Rogers and George Rogers assemblages was in the kinds of

Hillsboro series vessels used at each site. The Edgar Rogers assemblage was dominated by large, check stamped jars, followed by simple stamped jars, smoothed jars and bowls, and complicated stamped pottery attributed to the Caraway series. The presence of *Caraway Complicated Stamped* pottery undoubtedly reflects the site's proximity to the Deep River and Uwharrie River drainages where this type is more prevalent. At George Rogers, conversely, simple stamped jars comprised the majority of the vessel assemblage, followed by smoothed jars and bowls, and check stamped jars.

The contrast between the unusually homogenous early Hillsboro assemblage at the Wall site and more varied assemblages found at later Hillsboro phase sites can be viewed as a manifestation of a broader cultural process through which Hillsboro peoples adapted and possibly incorporated the indigenous population into a new cultural complex during the Protohistoric period. From this complex emerged the Sissipahaw, Shakori, and possibly Eno tribes of the late seventeenth and early eighteenth centuries.

Lithic artifact assemblages from Hillsboro phase sites are similar to those associated with the preceding Haw River phase, and reflect a generalized stone tool technology that was widespread throughout the North Carolina Piedmont during the Late Prehistoric period and which persisted well into the Contact period. Triangular projectile points, which dominate the Hillsboro tool assemblage, are only slightly smaller than Haw River phase points and still fit within the *Caraway Triangular* type. The prevalence of small equilateral triangular points that Coe (1952:311) observed at the Wall site was not duplicated at either the George Rogers or Edgar Rogers sites. Other chipped stone tools, aside from utilized and retouched flakes, were rare and include bifacial drills, chipped hoes, cobble choppers, pièces esquillées, side scrapers, perforators, and gravers (see Tippitt and Daniel [1987] for a discussion of the Wall site lithic assemblage). Other ground stone artifacts from Hillsboro phase sites include hammerstones, celts, chunkey stones, and disks. Pottery disks also occur on Hillsboro phase sites.

Unlike the preceding Haw River phase, substantial evidence exists for pipe-smoking during the Hillsboro phase. Most Hillsboro pipes were tubular or onion-shaped and are well-represented at the Wall site (Coe 1952). This unique pipe form appears to have no antecedents within the Eno and Haw drainages but becomes a common style throughout much of the Piedmont during the Contact period.

Another difference with the earlier Haw River phase is the widespread use of shell and bone to manufacture tools and ornaments. Bone tools recovered from the Wall site as well as the George Rogers and Edgar Rogers sites include awls made from bone splinters, deer bone, and turkey bone, deer metatarsal beamers, polished pins and needles, and antler flakers. Shell artifacts found at Hillsboro phase sites consist of serrated mussel shell scrapers and a variety of marine shell ornaments, including circular shell pendants, large columella beads, both large and small disk beads, and marginella beads (see Hammett 1987).

Mitchum Phase (A.D. 1600–1670)

The Mitchum phase is attributed to the Sissipahaw tribe that lived along the Haw River and is represented by the Mitchum site. In fact, all three Contact period phases in the Haw and Eno drainages (i.e., Mitchum, Jenrette, and Fredricks) are represented by a single site. During the Mitchum and Jenrette phases, this lack of sites seems to the result of consolidation and perhaps the intensification of a more nucleated pattern of settlement begun during the early Hillsboro phase.

Excavations at the Mitchum site, which was probably occupied after 1650, indicate a palisaded village of less than 1.5 acres. A single house structure, measuring approximately 20 ft in diameter, was uncovered. While comparable sites have not been found, depopulation resulting from the introduction of European diseases is not viewed as a causal factor. At the Mitchum site where a large area (3,500 sq ft) was exposed, only two burials were found. This burial density is more in line with that of the Wall and other Hillsboro phase sites than with the later Contact period Fredricks and Saratown phases where burial densities increase dramatically.

Interaction with European traders apparently had little effect on the daily life of the Mitchum site inhabitants. Evidence of contact consists primarily of glass beads and brass bells and beads. Subsistence practices changed little, if any, from those of the preceding Hillsboro phase. Deer was the most important meat source and was supplemented by a variety of small mammals. The Haw River provided fish, turtles, and mussels to the diet. There was no evidence of the use of Old World domesticated animals, nor is there any indication that participation in the peltry trade had a significant impact on the exploitation of animal resources. Native crops continued to be cultivated and wild plant foods were seasonally harvested. Charred peach pits provided the only dietary evidence of contact with foreigners.

Mitchum phase features are poorly understood. Perhaps because of the sandy soil at the Mitchum site, most of the subsurface facilities were vague and not well defined. Storage pits and smudge pits comprised the only feature categories that were unambiguous.

Except for the substitution of glass beads and brass ornaments for shell beads and ornaments, mortuary practices during the Mitchum phase seem to have changed little from those of the preceding phases. Bodies were still flexed and placed in shaft-and-cham-

ber pits located near houses.

Pottery of the Mitchum phase and the Jenrette phase within the Eno drainage is attributed to a single ceramic series—the Jenrette series. This series clearly developed out of the preceding Hillsboro series and suggests a close relationship between the Mitchum and Jenrette phase populations. At the Mitchum site, the Jenrette series assemblage was dominated by small-to-medium plain jars and bowls, and large simple stamped jars. Decoration of pottery vessels was less common than during the Hillsboro phase and consisted primarily of lip notching and applying circular reed punctations to the lip, neck, or shoulder of plain vessels, and paddle-stamping the lip of simple stamped jars. As with the preceding Hillsboro series, both sand and finely crushed feldspar were used as temper.

Although relatively few stone tools were recovered from feature contexts at the Mitchum site, the assemblage composition appears to be very similar to earlier Hillsboro phase assemblages, with one exception. Seven gunflints, including five made from local rock, were recovered during the 1983 and 1986 excavation at Mitchum. The lack of lead shot and other gun parts (except for a single frizzen spring fragment from the plowzone), and the apparent absence of other iron tools at the site, suggests that the Sissipahaw were not yet receiving sufficient quantities of European-made weapons and edged-tools to affect their native tool technologies. Most of the other European-made artifacts found at the Mitchum site reflect a limited range of ornaments that were being traded into the Haw River valley and include brass bells, rolled brass or copper beads, and mostly white and blue, small glass beads.

New and milder forms of non-native tobaccos, perhaps introduced from the West Indies, may be indicated by the presence of finely-made elbow pipes. These terra-cotta and white clay specimens resemble European kaolin pipes; however, they lack mold seams and appear to be made from local clays. They exist alongside more traditional forms. We suggest, as an hypothesis, that the addition of new varieties of pipes and an increase in their numbers may reflect a shift in smoking etiquette. What was sacred and ritually prescribed behavior during the Late Prehistoric period became more secular and widespread during the Contact period, particularly after 1650. These new kinds of pipes first appear during the Mitchum and middle Saratown phases and increase in popularity, along with kaolin pipes, during the subsequent Jenrette, Fredricks, and late Saratown phases. Although milder tobaccos may have been leisurely smoked in terra-cotta or kaolin pipes, the native *Nicotiana rustica* probably continued to be smoked in traditional pipes during curing and purification rituals (cf. Swanton 1946:383–384; also see Chapter 12 for a more detailed discussion).

Jenrette Phase (A.D. 1600–1680)

The Jenrette phase is probably associated with the Shakori Indians visited by John Lederer in 1670 (Cumming 1958). Like the Mitchum phase, the Jenrette phase is currently defined on the basis of excavations at a single site—the Jenrette site. At the end of the 1990 field season, approximately 10,000 sq ft had been excavated at the Jenrette site, located adjacent to the Fredricks site on the Eno River. This area exposed two well-defined, wall-trench structures and a palisade. The palisade appears to enclose a village area of approximately 0.5 acre. Although numerous pit features were excavated, only one represented a Jenrette phase burial. As was the case with the Mitchum site, the lack of burials strongly suggests that European diseases had not reached the Eno River area during the Jenrette phase.

The domestic structures at Jenrette are slightly larger than Fredricks phase houses. However, the wall-trench construction technique reflects affinities to the Fredricks phase and contrasts with the single-post structures of the earlier Hillsboro phase at the Wall site. Single-post construction techniques also were used during the Mitchum and Saratown phases. The Jenrette houses are somewhat smaller than the structures at Wall, Mitchum, Upper Saratown, and Lower Saratown. At this point, it is not clear what these differences mean; however, they may suggest a closer relationship between the Jenrette and Fredricks phases than between Jenrette and contemporary phases to the north and south.

All of the structures excavated at sites in the Siouan area reflect a common "bower" or "wigwam" type of construction. Whether set in individual holes or trenches, the upper portions of the wall posts were bent and their tops tied together to create a framework for the roof. The entire structure was then covered with thatch, bark, or waddle-and-daub, depending on the season. In plan, the houses range from nearly circular at the Wall site and Upper Saratown to nearly rectangular at Jenrette. Contrary to Petherick's (1987) assertion, we see no evidence for separate "summer" and "winter" houses.

Although a large amount of faunal and ethnobotanical remains were recovered from the Jenrette site, there were no pronounced differences between these samples and samples from the preceding phases in terms of the relative importance of various species. White-tailed deer continued to provide the majority of the meat in the diet. Acorns, hickory nuts, and walnuts were important wild plant resources, while corn, beans, and bottle gourds were planted in fields around the village. Sumpweed also was cultivated, giving Jenrette the distinction of providing the most recent evidence of domesticated sumpweed in the eastern United States (see Gremillion, Chapter 12). Peach pits represent the only non-native food resource in the diet.

During the Jenrette phase, storage pits and food preparation facilities described as "roasting pits" or "earth ovens" comprise the majority of the subsurface features. Most storage facilities were located near houses and in some cases were dug into the floors of houses. The presence of storage or curatorial facilities has been used to argue for site abandonment during part of the year (DeBoer 1988; Ward 1985).

A characteristic shared by the storage pits at the Jenrette, Fredricks, and Upper Saratown sites, as well as other piedmont sites, is the fact that they were always rapidly filled once they were no longer suited for their primary purpose. In many cases, this was accomplished by using soil removed during the preparation of a new facility. As this soil slumped, domestic refuse was often tossed into the pit to fill the resulting depression. In other cases, abandoned storage pits were completely filled with lenses of refuse produced over a short period of time.

These filling episodes, as well as the preparation of new facilities, may have been part of community-wide celebrations involving feasting activities and cleaning and renewal ceremonies similar to the busk celebrated throughout the Southeast. These community rituals are believed to have originated during the Hillsboro phase and intensified during the Jenrette phase. By the time of the Fredricks phase, the archaeological manifestations of ritual behavior appear as part of the mortuary complex (cf. Ward 1987).

The large, shallow roasting pits described for the late Hillsboro phase continued to be used during the Jenrette phase and are believed to be further evidence of feasting activities associated with community rituals. Similar facilities have been found at both Upper Saratown and Lower Saratown on the Dan River; however, large roasting pits were no longer being used by the time of the Occaneechi occupation at the Fredricks site. Nor do they seem to be characteristic of the final Sara occupation at the William Kluttz site. Their absence on late Contact period sites may reflect a breakdown in community celebrations brought on by disease and depopulation.

The flexed, shaft-and-chamber burial form of the Haw River, Hillsboro, and Mitchum phases changed little during the Jenrette phase. However, as was the case at the Mitchum site and Lower Saratown, burial associations reflect the beginnings of trade with the English. Grave goods consisted primarily of small, usually white, seed beads that probably were sewn on burial garments.

An increase in pipe smoking, observed during the Mitchum phase, also is reflected during the Jenrette phase. Numerous fragments of terra-cotta stems and bowls were recovered from Jenrette features along with more traditional forms. Many of the terra-cotta bowls display fine, rouletted designs similar to those described on "Tidewater" pipes found throughout the Middle Atlantic region (cf. Heite 1973; Kent 1984). Similar pipes also were common at sites that date to the middle and late Saratown and Fredricks phases. Although the origins of these pipes—colonial, native, or African-American—may be debated, their temporal placement seems secure. In fact, we suggest that finely made, terra-cotta pipes are excellent horizon markers for the period between 1650 and 1700 in piedmont North Carolina and Virginia.

Pottery of the Jenrette phase, like that of the Mitchum phase, is attributed to the Jenrette series; however, the Jenrette site pottery is thought to be the product of Shakori potters. At the Jenrette site, almost half of the pottery had plain or roughly smoothed exteriors; most of the remaing sherds were simple stamped. Brushed and cob impressed sherds also were present but were rare. The primary difference between Jenrette series pottery at the Jenrette and Mitchum sites was the greater use of finely crushed quartz temper by Jenrette site potters. Other attributes of vessel form and decoration are quite similar between the two assemblages. What distinguishes the pottery of both phases from the earlier and ancestral Hillsboro series is that Jenrette series pottery usually is more crudely made (as evidenced by poorly executed stamping and roughly smoothed surfaces), has larger amounts of coarser temper, and represents heavier vessels with thicker walls.

The Jenrette stone tool assemblage contained numerous small triangular projectile points. Almost half of these were very small, asymmetrical, irregularly retouched flakes that appeared to have been quickly manufactured with little effort. Several other flake tools also were represented and include utilized and retouched flakes, pièces esquillées, drills, perforators, gravers, denticulates, spokeshaves, end scrapers, and side scrapers. Celts, chipped hoes, large milling stones, and other cobble tools also are part of the Jenrette tool assemblage. As with the Mitchum phase, European trade does not seem to have impacted the native stone tool technology in any substantial way.

Jenrette phase tool-making technologies employing shell and bone as raw materials show strong continuity to those of the preceding Hillsboro phase, and it is likely that such continuity also would be seen in the contemporary Mitchum phase given better preservation conditions. Serrated mussel shell scrapers, disk beads fashioned from marine shell, bone beamers, split-bone awls, and worked antler all were well represented at the Jenrette site. Given the general absence of such artifacts within the subsequent Fredricks phase, these artifacts can be viewed as the final expression of the indigenous boneworking and shell-working tradition within the region.

Fredricks Phase (A.D. 1680–1710)

The Fredricks phase defines the archaeological

remains of the Occaneechi after they moved from the Roanoke River to the Eno River following Bacon's Rebellion in 1676. Like the preceding Mitchum and Jenrette phases, the Fredricks phase also is represented by only a single site—the Fredricks site—located near Hillsborough. We believe this is the site of the "*Achonechy* Town" visited and briefly described by John Lawson in 1701 (Lefler 1967:61). The small, palisaded village was completely excavated between 1983 and 1986 (Figure 14.2), and the results of these excavations laid the groundwork for the investigations reported in this monograph (Dickens et al. 1987; Ward and Davis 1988).

By the time of Lawson's visit, European diseases and warfare had decimated the Occaneechi and other piedmont tribes. Archaeologically, this decimation is indicated by the small size of the settlement and a very high crude mortality rate. A single palisade of small posts, some placed in wall trenches, enclosed no more than 10–12 houses of wall-trench and single-post construction. Probably fewer than 75 individuals lived in the village at this time (Davis and Ward 1991; Ward and Davis 1991). Based on a detailed analysis of burials in the cemetery located just outside the palisade, Hogue (1988:99) calculated a crude mortality rate of 57 (per 1000). This compares with a crude mortality rate of 38 computed for the late prehistoric Shannon site (44My8) on the Roanoke River in southwest Virginia and a rate of 48 calculated for the middle Saratown phase population at the Upper Saratown site (Hogue 1988). There can be little doubt that by the time of Lawson's visit, the northern piedmont tribes had suffered severe depopulation.

Although the Fredricks phase represents a time of dramatic disruption and upheaval, a surprising degree of continuity is reflected in the subsistence data. As was seen during the Mitchum and Jenrette phases, the peltry trade and the introduction of European tools and trinkets seem to have had a minimal impact on the day-to-day subsistence of the Occaneechi. Deer continued to be the favorite meat source, supplemented by turkey, fish, turtle, and various small mammals. Only one bone each of pig and horse attest to the European presence (Holm 1987:245). The only evidence of the use of Old World plants during the Fredricks phase consists of a single watermelon seed and numerous peach pits, both probably introduced indirectly by the Spanish (Gremillion 1989a).

Although most native traditions appear to have remained intact during the Fredricks phase, trade between Indians and Whites intensified considerably during the last quarter of the seventeenth century. This is seen primarily in the grave goods associated with the Occaneechi burials. Knives, hoes, kettles, and guns were added to the beads and ornaments common during earlier phases of the Contact period. The shaft-and-chamber pits that had served as receptacles for the dead for hundreds of years were abandoned in favor of rectangular, straight-sided graves dug with the aid of metal tools. Bodies were still flexed and wrapped, but the burial pits were no longer placed in and around dwellings. The Fredricks site burials were carefully aligned and interred in at least two cemeteries located adjacent to and outside the palisade surrounding the small village. The existence of separate cemeteries may reflect the amalgamation of different ethnic groups forced to band together as a consequence of depopulation; or, more likely, they may reflect episodes of epidemics and a recognition of the contagiousness of Old World diseases (Ward 1987; Ward and Davis 1991).

Pottery of the Fredricks phase is attributed to the Fredricks series (Davis 1988) and is represented by two types—*Fredricks Plain* and *Fredricks Check Stamped*. *Fredricks Plain* represents a variety of vessel forms, including small jars, large storage jars, and small bowls. *Fredricks Check Stamped* vessels, conversely, apparently functioned primarily as cooking jars and secondarily as storage jars. While the Fredricks series most likely developed out of the carved-paddle stamped pottery tradition represented by the Jenrette series, and also may have its origins in the earlier Hillsboro series, stylistic and technological differences between the Jenrette series and the Fredricks series indicate that these two series are only distantly related. Unlike Jenrette series pottery which represents relatively heavy, thick-walled vessels with coarse temper, poorly stamped or smoothed exteriors, and the frequent use of simple stamping, Fredricks vessels invariably were tempered with fine sand, had very thin walls, and had exteriors that were either smoothed or check stamped. Decoration, when present, consisted solely of fine, oblique incisions or linear impressions along the vessel lip and occurred only on check stamped vessels. The remarkable consistency in style and manufacture evidenced by most of the Fredricks site pottery suggests that it may be the product of one or a few potters. Although some simple stamped pottery was recovered from Fredricks phase features, these sherds probably are associated with the adjacent Jenrette site. Other pottery found at the Fredricks site, including a cordmarked bowl and a large section of a cordmarked, conoidal jar, most likely represent trade vessels.

Because the Occaneechi are known from the ethnohistoric record to have resided on the Roanoke River prior to their settlement along the Eno River, the characteristics of the Fredricks site ceramic assemblage pose an interesting problem. No plausible antecedents to the Fredricks series were identified during reconnaissance surveys and site excavations conducted within the Buggs Island Reservoir (now Kerr Lake)—the historically documented home of the Occaneechi prior to 1676 (Miller 1962; UNC-RLA site files). In fact, no historic Indian village sites were identified on Occan-

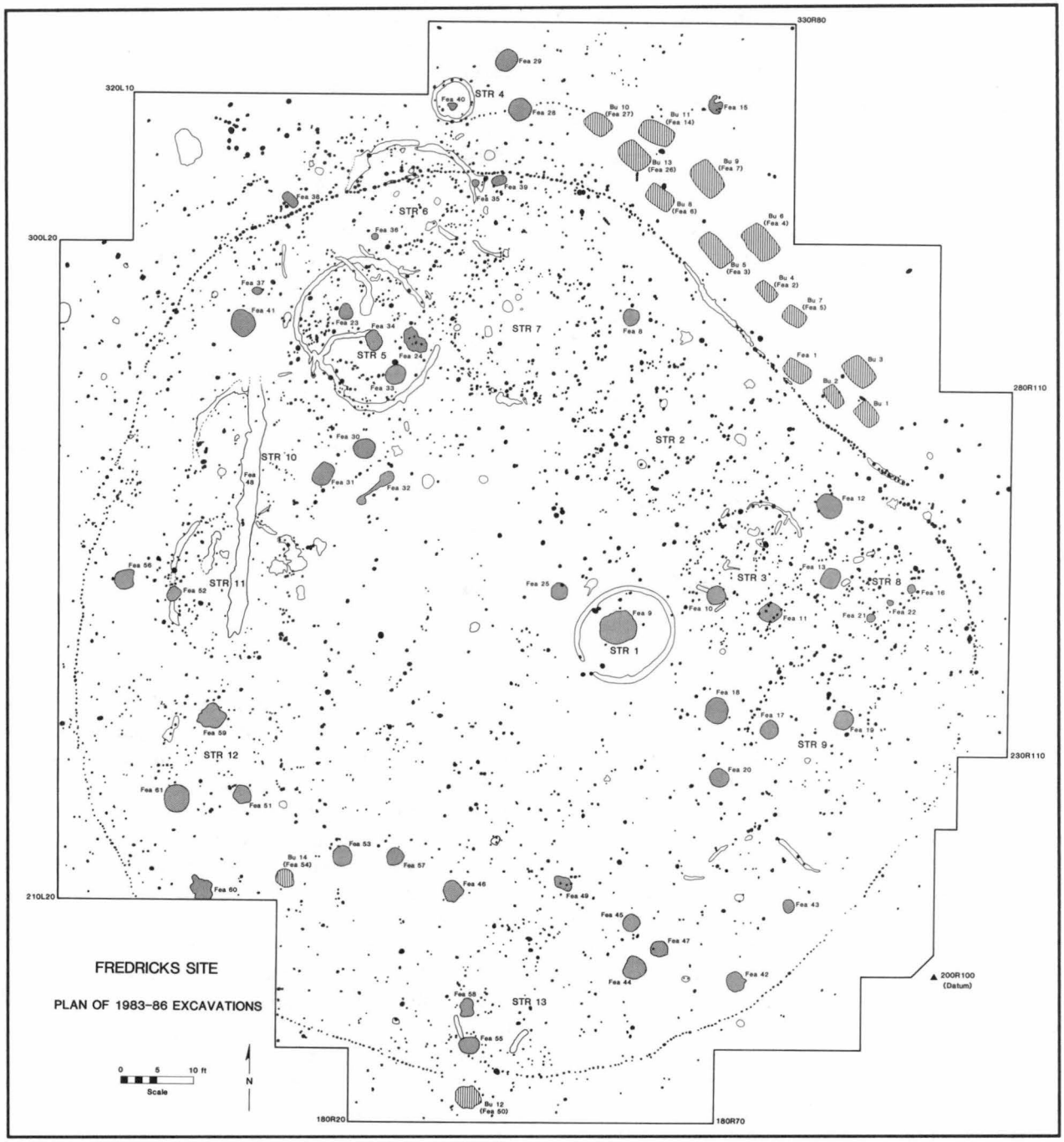

Figure 14.2. Excavation plan at the Fredricks site.

eechi Island, although there is evidence from a private collection of a Contact period site on Nelson Island, immediately upstream from Occaneechi Island (Keith Egloff, personal communication). While it is likely that the pre-1676 Occaneechi potters also produced carved-paddle stamped pottery, there is no way to substantiate this. Because the late prehistoric pottery of the Occaneechi Island area (i.e., the predominantly net-impressed Clarksville series) bears no similarity to the Fredricks series, it is possible that the Occaneechi had only recently settled here when Edward Bland's Appomattuck guide first made reference to them in 1650 (Bland 1651:12–13). If so, the ceramic similarities that do exist—largely related to the use of carved instead of net-wrapped malleating paddles—between the Fredricks series and the Hillsboro and Jenrette series may indicate a late prehistoric homeland for the Occaneechi closer to the Eno, Flat, and upper Haw river valleys.

Despite the introduction and widespread use of European-made weapons and metal tools during the Fredricks phase, the overall character of the Fredricks

lithic artifact assemblage conforms to a generalized stone tool tradition that can be traced back to at least the beginning of the Late Prehistoric period. Small triangular projectile points continued to be made and used to tip arrows, and other tasks such as hide-working, woodworking, plant food processing, and possibly bone-working still employed stone tools such as bifacial drills, perforators, gravers, scrapers, utilized and retouched flakes, manos, and milling stones. Interestingly, comparatively fewer stone tools were recovered from the Fredricks site, and those that were found displayed considerable variability in both form and raw material. Although this may be due in part to sample contamination from earlier occupations at the adjacent Jenrette and Hogue sites, it also may reflect recycling of both tools and raw materials from these and other sites (see Eastman, Appendix A). Many projectile points were similar in size and raw material to those recovered from Haw River phase features at the Hogue site. Recycling is not unique to the Fredricks phase, but is reflected in most piedmont lithic assemblages that date to the Late Prehistoric or Contact periods.

Other aspects of native technology were only poorly represented at the Fredricks site. Bone tools were virtually absent; most of the worked bone fragments that were found represented handles of iron trade knives (Holm 1987). Numerous shell ornaments, including two gorgets, columella beads, disk beads, wampum, and runtees, were recovered at the Fredricks site; however, all of these probably were manufactured by coastal groups and traded to the Occaneechi (Hammett 1987). Serrated shell scrapers, common at earlier Hillboro phase and Contact period villages within the Eno and Haw drainages, and marginella beads were conspicuously absent at Fredricks. The general picture that emerges is that the Occaneechi were not heavily involved in either shellworking or boneworking, and met their needs for ornamental items largely through trade.

Culture Chronology of the Upper Dan River Drainage

The cultural pattern that emerged after about A.D. 1000 in the upper Dan River drainage is recognized as the Dan River phase. This phase is coeval with the Haw River phase to the south. Its chronological position is reasonably well established by radiocarbon dates from both Siouan project excavations and several sites excavated by Richard Gravely in southern Virginia (Tables 14.1 and 14.2). The close of the Late Prehistoric period and the Contact period, from about A.D. 1450 until the early eighteenth century, is represented by the Saratown phase. This archaeological phase has been further divided into three subphases—early, middle, and late—based upon differences in artifact assemblages (including the introduction of European trade goods) and more substantial changes in settlement and mortuary patterns.

Dan River Phase (A.D. 1000–1450)

Perhaps because of extensive bottomland development, the Dan River and its tributaries were occupied throughout the Late Prehistoric and Contact periods by a much larger population than that of the Haw and Eno drainages. However, this population does not appear to have coalesced into substantially larger villages until the late Dan River phase (ca. A.D. 1300). Early Dan River phase settlements appear to have consisted of scattered household clusters with associated pit features and burials. Excavations at the Powerplant site suggest a linear community of houses strung out parallel to the banks of the Dan River. A similar community pattern is indicated at the Leatherwood Creek site (44Hr1) in Henry County, Virginia. A dispersed population is also indicated by relatively sparse artifact densities at early Dan River phase sites. Not surprisingly, these settlements are very similar to the Haw River phase communities to the south.

Subsistence remains from the Powerplant site suggest a mixed economy of hunting, gathering, and agriculture. Although both the faunal and botanical samples from this site were small, a variety of resources were utilized. Of particular note is the fact that maize was found in almost every feature. Other cultigens included beans and sunflower, clearly indicating the importance of agriculture during the early Dan River phase.

Early Dan River phase features are also similar to those of the Haw River phase. Large storage pits and large shallow basins predominate; however, these usually contain secondary deposits with modest amounts of cultural material. When compared with later pit facilities, these suggest less intense activities lacking the ritual component of many of the later features.

The one burial excavated at the Powerplant site was flexed and placed in a simple oval pit. It contained no grave goods and is similar to burials from the early Haw River phase Hogue site. Although shaft-and-chamber burial pits were found at the Guthrie site, it appears that at the early end of the Dan and Haw River phases, simple pit interments may be more characteristic. Grave goods are usually lacking in both phases.

Pottery of the Dan River phase is attributed to the Dan River series. This ceramic series was originally defined by Joffre Coe and Ernest Lewis based on excavated pottery samples from the Lower Saratown site and was thought to be associated with the historic Sara Indians (Lewis 1951; Coe 1952; Coe and Lewis 1952). More recent investigations, however, have

shown that the pottery used in the original series definition was not produced by the historic Sara, but instead was probably made by their ancestors four centuries earlier (see Chapter 11). Analyzed pottery samples from clearly historic contexts at Lower Saratown, Upper Saratown, and the William Kluttz site all indicate that most pottery of the Dan River series was no longer being used by the seventeenth-century Sara.

As originally noted by Coe and Lewis (1952), certain chronological trends can be recognized within the Dan River series. These trends are directly linked to the idea that Dan River pottery represents an intermediate stage in ceramic development from "traditional Uwharrie types to the later Catawba-Lamar styles" (Coe and Lewis 1952:1). Early Dan River pottery has been recovered through excavation at the Powerplant site near Lower Saratown and at the Leatherwood Creek (44Hr1) and Stockton (44Hr35) sites in southern Virginia. At the Powerplant site, Dan River pottery often contained crushed quartz (as opposed to sand) temper and usually exhibited heavy scraping of the interior vessel surface. Most of these potsherds appear to represent large storage and cooking jars with subconoidal bases, slightly constricted necks, and flaring rims. Although a majority of the Powerplant site sherds were net impressed, other surface treatments such as cordmarking, smoothing, cob impressing, and brushing also were used. Vessel decorations included notching along the vessel lip, a band of multiple incised, smoothed, or brushed lines around the neck, and a single band of fingernail pinches or punctations around the neck.

Later Dan River series pottery is represented at Lower Saratown (including the 1938 excavations) and the William Kluttz site. Several other sites in southern Virginia, including the Koehler (44Hr6), Box Plant (44Hr2), Dallas Hylton (44Hr20), and Philpott (44Hr4) sites, also have produced late Dan River pottery. This pottery conforms more closely to the original Dan River series statement (Coe and Lewis 1952) and represents large storage and cooking jars with constricted necks and flaring rims as well as smaller bowls. At Lower Saratown and the William Kluttz site, potsherds from Dan River phase features were mostly (80–90%) net impressed; the remaining sherds were cordmarked, cob impressed, or smoothed. Although a majority of the potsherds from both sites were from vessels with heavily-scraped interiors, less than a third contained crushed quartz temper; most were tempered with coarse to fine sand. Vessel decoration was both more common and more varied than at the earlier Powerplant site. The lips of jars were commonly modified by notching, incising, and reed punctations. Both reed and fingertip punctations also were used to form simple linear designs around the vessel neck and shoulder. Incised and brushed bands frequently were used to decorate the neck area of Dan River jars, and more complex incised designs employing arcs and triangles were occasionally used.

Lithic artifacts were recovered from Dan River phase contexts at all three sites investigated on the Dan River and suggest a pattern of stone tool manufacture and use similar to that described earlier for the contemporary Haw River phase. In addition to numerous small, triangular projectile points that are generally referable to the *Caraway Triangular* type, other formalized and *ad hoc* tool types also are represented, including: drills, side scrapers, end scrapers, spokeshaves, gravers, pièces esquillées, utilized and retouched flakes, cobble choppers, and hammerstones. Other tool types, such as bifacial knives, large chipped hoes, ground stone celts, and large perforated soapstone disks, are well represented in artifact collections from Dan River phase sites elsewhere in the region.

One of the more interesting aspects of Dan River material culture is the variety of bone, shell, and clay tools and ornaments that were used. Most of our information about Dan River boneworking, shellworking, and ceramic art comes from the various sites within the Smith and Mayo river drainages of southern Virginia that were investigated during the 1960s and early 1970s by Richard Gravely (see Gravely 1983). These include: Leatherwood Creek (44Hr1), Box Plant (44Hr2), Belmont (44Hr3), Philpott (44Hr4), Koehler (44Hr6), Dallas Hylton (44Hr20), and Stockton (44Hr35). Most of these sites represent habitation sites or villages and span the duration of the Dan River phase. Some of the bone artifacts that were recovered from feature contexts at these sites include awls, pins, needles, fish hooks, beamers, gouges, antler flakers, antler picks, turtle carapace bowls and cups, and a variety of beads. Mussel shells were fashioned into serrated scrapers; shell from the marine whelk was used to make long columella beads, shorter barrel and disk beads, circular gorgets, and pendants; and a variety of other beads were made from marginella and olive shells. Clay also was used to make beads, dippers or spoons, cups, disks, and elbow pipes (among other forms).

Early Saratown Phase (A.D. 1450–1620)

The Saratown phase is divided into three sub-phases based primarily on changes in settlement patterns, pottery styles, and the intensity of interaction between native populations and English traders. Most of the data used in defining the Saratown phase were collected during extensive excavations prior to the current project. The early Saratown phase (ca. 1450–1620) is known primarily from excavations at the Early Upper Saratown site (31Sk1) located on the Dan River near the mouth of Town Fork Creek. Excavations were conducted here during 1981 by archaeologists from the Research Laboratories of Anthropology (Wilson 1983). Like many of the sites on the Dan River, Early Upper

Saratown had suffered extensive looting during the mid-1960s. The middle Saratown phase (1620–1670) is based primarily on excavation results from the Lower Saratown site (31Rk1) (see Chapter 9). Extensive excavations at the Upper Saratown site between 1972 and 1981 (Wilson 1983), as well as excavations at the nearby William Kluttz site (see Chapter 11), provide the data that define the late Saratown phase (1670–1710). Both of these sites also were extensively looted during the 1960s.

Although there is no evidence of a population decline during the early Saratown phase, the overall number of sites does decline from that of the preceding Dan River phase. However, the size and occupational intensity of early Saratown phase villages is considerably greater than that of the earlier villages. Apparently the small, hamlet-like communities of the Dan River phase coalesced to form large, palisaded villages on the banks of the Dan near the mouths of the major tributaries. The Early Upper Saratown site, located near the confluence of Town Fork Creek and the Dan River, covers some 2.5 acres, and has an extensive midden and numerous pit features. Excavations and surface collections suggest that this is one of the richest, most intensively occupied sites in the entire region (Wilson 1983; Davis and Ward 1991). After fall plowing, the site is clearly visible from a distance as a large circular expanse of dark, organically stained soil.

The 1981 excavations at Early Upper Saratown consisted of a 1,250-sq-ft trench positioned to intersect the southeastern section of the palisade. Within the trench, a possible 20-ft segment of the palisade was uncovered along with sections of two possible house walls. Forty features and six burials also were excavated. Most of the features consisted of large, straight-sided or bell-shaped storage pits. Other pits features included "earth ovens," shallow basins and depressions, and hearths. Wilson (1983:379) observed that these features were very similar to those excavated at the later Upper Saratown site (31Skla). From the descriptions in the field records, we can add that these features also are similar to those excavated at Lower Saratown.

An analysis of the faunal remains from Early Upper Saratown revealed the exploitation of a variety of resources from varied habitats. White-tailed deer and black bear provided the bulk of the useable meat, followed by racoon, beaver, turkey, and mountain lion. Turtles also were an important meat source. In comparing a Dan River phase faunal assemblage from the Reedy Creek site (44Ha22) with that from Early Upper Saratown, Wilson (1983:531–542) suggested a shift from a focal, specialized subsistence orientation to a more diverse utilization of animal resources during the later period. Wilson's hypothesis is further supported when the Early Upper Saratown faunal assemblage is compared with that of the Powerplant site. At Powerplant, large mammals such as bear and mountain lion were absent; and, with the exception of deer, turkey, and box turtle, none of the meat-producing species were represented by more than a single individual (see Chapter 10).

Plant food utilization during the early Saratown phase cannot be directly assessed because no ethnobotanical samples have been analyzed. However, given the results of the analyses of Dan River and middle Saratown phase samples, there is no reason to suspect that early Saratown phase samples would present drastically different patterns of plant food utilization. The only difference that might be hypothesized is an increase in the importance of agricultural production. The relatively large size of the settlement and the apparent intensity of the occupation suggest that agriculture may have been more important than in the preceding and succeeding phases. There is little doubt that this was the case when compared with the hamlet-like communities of the early Dan River phase. The current data indicate that a process of agricultural intensification began during the Dan River phase and probably reached its peak just prior to the first contacts with Europeans. A similar trend toward increasing agricultural production also may be seen during the Haw River and Hillsboro phases.

Mortuary behavior during the early Saratown phase is known only from the excavation of six graves at Early Upper Saratown. Four of these were placed in shaft-and-chamber pits while the other two were interred in simple pits. All but one of the burials was identified as subadults. The one adult was a female between 20 and 30 years old at the time of death. The most interesting characteristic of these burials is the large amount of accompanying grave goods, particularly associated with the shaft-and-chamber pits. Hundreds of bone and shell beads, along with bone awls, shell hair pins, three conch shell "rattlesnake" or "Citico" gorgets, serrated mussel shells, and a pottery vessel, accompanied these individuals (Wilson 1983:379–385). One of the graves also contained a copper bar gorget that had preserved part of a pine bark covering.

The richness of these burial offerings stands in sharp contrast to those of the earlier Dan and Haw River phases, although burials from the Koehler and Belmont sites in Virginia suggest the beginning of a similar pattern during the late Dan River phase (Gravely 1967, 1976). And the absence of any European trade materials contrasts markedly with the large amount of trade goods (primarily glass beads) found in the late Saratown phase burials at Upper Saratown located a few hundred yards to the south. The mortuary complex also reinforces the changes suggested by shifts in settlement and community patterns and subsistence. That is, during the early Saratown phase, Dan River peoples were integrated into relatively large,

nucleated villages with some degree of specialization and socio-political stratification, climaxing developments begun late in the Dan River phase. This may well represent the apogee of Siouan cultural development in the Dan River valley. After the middle Saratown phase, the presence of large numbers of glass beads and other European trinkets heralds the arrival of alien diseases, massive depopulation, and cultural decline.

Our present knowledge of early Saratown phase pottery comes from Jack Wilson's (1983:386–413) analysis of 87 rimsherds, rim and associated vessel sections, and complete pots recovered during the 1981 excavation of Early Upper Saratown. In his analysis, Wilson proposed the creation of a new ceramic series—the Oldtown series—to accommodate the seemingly distinctive pottery found at this site and at nearby Upper Saratown. Our subsequent excavations at Lower Saratown and the William Kluttz site also have produced pottery that conforms to the Oldtown series, and thus support Wilson's argument that this ceramic series, and not the Dan River series, is associated with the historic Indian occupation along the Dan River.

Unlike the ceramic assemblages of the earlier Dan River phase which were comprised mostly of net impressed jars, only 38% (n=33) of the vessels in the Early Upper Saratown sample were net impressed and most of these had a fine sand-tempered paste and smoothed interiors. Smoothing and burnishing, conversely, together comprised almost 43% (n=37) of the sample, and about 11% of the vessels exhibited simple stamped (n=7) or complicated stamped (i.e., filfot scroll) (n=2) exterior surfaces. The remaining vessels were either corncob impressed (n=5), cordmarked (n=2), or brushed/scraped (n=1). Over 90% of all vessels had smoothed or burnished interiors, and most had a hard compact paste that was either untempered or contained very fine sand. In addition to typical Dan River decorative techniques such as rim notching, finger pinching, and stick punctation, other new kinds of vessel decoration involving rim castellations, lip burnishing, and filleted applique strips were used by the potters at Early Upper Saratown.

A majority of the Oldtown vessels were jars; however, they often had rounded rather than conical bases and lacked the constricted neck form commonly found on Dan River jars. Bowls were more prevalent than during the preceding Dan River phase, and several of these represent new vessel forms. Of the 24 bowls in the sample, 11 had a carinated or cazuela-type rim and nine were hemispherical or semi-hemispherical in shape. Both of these are new vessel forms within the Dan River drainage and, along with the presence of burnishing, carved-paddle stamping, and new decorative techniques employing fillet applique strips, reflect an introduction of new pottery styles, probably from the Catawba drainage to the south. The fact that net impressing continued to be a predominant method of surface treatment suggests that these new styles blended with the indigenous Dan River pottery-making tradition to form the Oldtown series (see Wilson 1983:387).

Tippitt and Daniel (1987) analyzed a sample of 676 lithic artifacts from four refuse pits at Early Upper Saratown; unfortunately, this sample consisted mostly of debitage and did not provide a firm basis for characterizing stone tool technology during the early Saratown phase. Their analysis, along with an inspection of other lithic artifacts recovered from this site, suggests a pattern of stone tool use similar to that described for the preceding Dan River phase. Lithic artifacts from the site include numerous small triangular projectile points (often serrated and usually made on flakes with minimal alteration), drills, side scrapers, end scrapers, denticulates, spokeshaves, perforators, celts, hammerstones, and utilized/retouched flakes. Many of the projectile points and flake tools apparently were made on older Archaic flakes, as evidenced by the presence of patinated surfaces on these artifacts. In most respects, this pattern of assemblage composition and recycling behavior persisted until the late Saratown phase and is manifested in the lithic artifact samples found at Lower Saratown and Upper Saratown.

Although other aspects of technology and material culture during the early Saratown phase have not yet been studied, a few general observations can be made based on a cursory examination of excavated artifact samples. Numerous bone artifacts, mostly representing awls, beamers, and antler flakers, were recovered from Early Upper Saratown and reflect the persistence of the rich boneworking tradition of the Dan River phase. Several serrated mussel shell scrapers also were recovered, as well as various marine-shell disk beads, small columella beads, and a large fragment of a marine whelk. Significantly, two circular shell gorgets with a stylized rattlesnake motif also were recovered. This type of gorget occurs primarily in the Appalachian Summit area and surrounding region and has been regarded by some as a diagnostic artifact associated with the sixteenth-century chiefdom of Coosa (Smith 1989). The occurrence of these gorgets at Early Upper Saratown is consistent with the interpretation, made above, that the Oldtown series pottery reflects a southerly influence; however, it certainly does not provide support for the Coosa argument. Finally, several fired clay artifacts, including elbow pipes, animal effigies, clay spoons, beads, and numerous pottery disks, were recovered. With the exception of pottery disks, these artifacts also show continuity with the preceding Dan River phase.

Middle Saratown Phase (A.D. 1620–1670)

The middle Saratown phase is represented at Lower Saratown (31Rk1) located on the Dan River, just below

the mouth of the Smith River. The hallmark of this phase is the first arrival of European goods in the northern Piedmont. Although the Spanish supposedly traveled through the region several decades earlier, their visits left no discernible traces in the archaeological record. Even the early seventeenth-century English settlements on the James River meant little to the piedmont tribes. It is doubtful that many natives living along the Dan River during the middle Saratown phase ever laid eyes on Whites or felt the deadly sting of their diseases. The few beads and trinkets that found their way into native villages were probably passed along from Indian to Indian through traditional trade networks.

The limited excavations at Lower Saratown do not allow detailed statements regarding community patterning, and the lack of surface visibility over large expanses of the bottoms around the site prevented an accurate assessment of the presence of other nearby settlements. However, Byrd's 1733 description of the area around Lower Saratown being covered with tall grass and not forest (Wright 1966:398) suggests that later villages also were located in the near vicinity. If the fields had been abandoned at the end of the middle Saratown period, the 50 to 70 years intervening before Byrd's journey would have provided ample time for mature stands of timber to develop. In all likelihood, the Lower Saratown vicinity also contains an array of later sites similar to those found at Upper Saratown.

The two superimposed, single-post structures uncovered at Lower Saratown are more similar to wall-trench and single-post structures on the Eno and Haw rivers than to the late Saratown phase structures at Upper Saratown. Although the Upper Saratown houses also were constructed by setting individual posts in holes, they were almost perfectly circular in outline. In fact, Upper Saratown houses share more affinities with the Hillsboro phase Wall site structures than with those at Lower Saratown.

Middle Saratown phase features at Lower Saratown, however, point to strong ties with the late Saratown phase facilities at Upper Saratown, as well as other protohistoric and Contact period sites on the Piedmont. Large, shallow roasting pits or "earth oven" indicative of community-wide food preparation activities were common and usually were located around the periphery of the village. These facilities do not appear to have been recycled. Circular storage pits and small cob-filled smudge pits also are characteristic of the middle Saratown phase. These have counterparts throughout the Siouan area from the Late Prehistoric through the late Contact periods. As with the storage facilities discussed previously, the middle Saratown pits were quickly filled with soil and refuse after they were no longer suited for their primary purpose.

The single middle Saratown phase burial excavated at Lower Saratown points to a continuation of the shaft-and-chamber type grave that began at least as early as the early Dan River phase. The relatively small number of grave goods contrasts with the extensive use of shell beads and ornaments during the early Saratown phase. The few rolled copper or brass beads associated with the burial are clear evidence of the beginnings of trade with the English. No doubt these specimens arrived through a traditional exchange network and not through direct meetings between Indians and Europeans.

Nor did this early indirect contact with English traders affect subsistence in any discernible way during the middle Saratown phase. The rich assortment of food remains from Lower Saratown points to a varied diet balancing wild plant and animal resources with indigenous crop production. As was the case during the early Saratown phase, turtles, mussels, and fish from the Dan River provided an important supplement to the terrestrial diet of deer, turkey, and bear. Maize was abundant and ubiquitous. Beans also were grown, along with squash. However, sunflower and other common Eastern North American cultigens were not harvested (see Chapter 9). Variety seems to be the key word in describing both the early and middle Saratown phase diets. And this variety resulted from the exploitation of native resources, not from the introduction of foreign plants and animals.

Although there is no direct evidence for the use of nonlocal plant foods, there is indirect evidence that may suggest the use of imported strains of tobacco during the middle Saratown phase. Most of the pipes at Lower Saratown were of the traditional onion bowl or elbow form; however, a few terra-cotta and white clay specimens also were recovered. We suggest that these latter varieties are horizon markers for the middle seventeenth century. Both types resemble English kaolin pipes in form and seem to parallel the introduction of milder West Indian tobaccos and the adaptation of smoking as a leisure activity. In the Haw drainage, similar pipes make their first appearance during the Jenrette and Mitchum phases and increase in popularity, along with imported kaolin pipes, during the Fredricks phase. Finely made terra-cotta or white clay pipes also frequently occur during the late Saratown phase at Upper Saratown (for a more complete discussion, see Chapter 12).

The pottery assemblage from Lower Saratown was similar in composition to the one observed by Wilson (1983) at Early Upper Saratown. If a majority of the Dan River sherds from middle Saratown phase features are associated with the historic occupation of the site, then the assemblage can be characterized as follows. Most (57%) potsherds had smoothed or burnished surfaces, reflecting an increase in this surface treatment during middle Saratown times; conversely, only 31% of all sherds were net impressed, compared with 38% at Early Upper Saratown. This percentage may

actually be much lower if a substantial number of these sherds reflect sample contamination from the earlier Dan River phase component. Other surface treatments represented in the sherd sample include cordmarked (2%), cob impressed (6%), brushed (5%), simple stamped (1%), check stamped (2%), and complicated stamped (<1%). Compared with the early Saratown phase assemblage at Early Upper Saratown, these data indicate a substantial increase in smoothing, a more modest increase in brushing or scraping, and the declining importance of net impressing, cob impressing, cord marking, and simple stamping. Check stamping, which occurs for the first time, became a much more prominent surface treatment by the close of the late Saratown phase. Although overall vessel morphology and decoration show strong continuity to earlier Saratown phase pottery, there appears to be less variety of shapes, and fewer vessels were decorated. Small jars with simple, flaring rims were common and usually were smoothed and undecorated. Cazuela bowls were rare and usually were decorated by incising and small reed punctations. Large plain, net-impressed, cob-impressed, and simple-stamped jars, also common within the assemblage, often were modified by notching the lip or smoothing the rim. Many of the *Oldtown Plain* jars also were decorated with vertical, brushed bands that extended from the rim to the vessel shoulder.

Other aspects of Sara technology involving the use of stone, bone, shell, and clay to produce implements and ornaments also show strong continuity with Early Upper Saratown. A variety of simple flake tools were made, often using large, patinated flakes or Archaic projectile points scavenged from the sites of earlier settlements. Numerous small triangular points and bifacial drills also were used. Other stone tools included ground stone celts, chipped hoes, manos and milling stones, numerous hammerstones, and large cobble choppers.

The bone artifact assemblage from Lower Saratown represents the final manifestation of the rich boneworking tradition begun during the Dan River phase. This assemblage contained numerous awls of various forms, beamers, antler flakers, needles, fish hooks, turtle carapace cups, and beads. Likewise, various tools and ornaments still were being made out of shell, including mussel shell scrapers, both large and small cut disk beads, and probably marginella beads. Significantly, by the time Upper Saratown was occupied some 30–50 years later, both boneworking and shell working had declined considerably and few such tools or ornaments were being used. This demise of these native technologies mirrors that seen in the Eno valley at the close of the seventeenth century. In the case of shell working, shell beads were quickly replaced by glass beads, rolled brass beads, and wampum from the tidewater Virginia area once the Virginia fur and deerskin trade developed. The small number of glass beads and rolled brass beads recovered from several Lower Saratown features evidences the beginnings of contact between the Sara and Europeans.

Late Saratown Phase (A.D. 1670–1710)

By 1670, the flow of English goods reaching the inhabitants of the Dan River valley increased dramatically. It is also during the late Saratown phase that European diseases struck with devastating force, making many of the excavated villages appear more like cemeteries than habitation sites. The most extensive work has been at the late Upper Saratown site (31Skla) located near the confluence of the Dan River and Town Fork Creek. Excavations began here in 1972 and continued until 1981 (Ward 1980; Wilson 1983). When this work ceased, over 16,000 sq ft of the village had been uncovered, revealing 225 features, 111 human burials, four palisade alignments, and all or portions of at least 13 houses (Wilson 1983:414) (Figure 14.3). At the nearby Madison Cemetery site, located near the confluence of the Mayo and Dan rivers, a similar-sized excavation uncovered 120 burials. The graves were so tightly packed that the amateur archaeologist conducting the excavations thought he had uncovered a cemetery rather than a village (Gravely 1969:11). The end of the late Saratown phase is represented at the William Kluttz site, located just downstream from Upper Saratown and thought to have been occupied between 1690 and 1710. Here, numerous shallow graves clustered in a cemetery area attest to the continuing devastation of alien diseases.

As evidenced at the Upper Saratown and William Kluttz sites, community patterns changed drastically during the late Saratown phase. At Upper Saratown, occupied during the first half of the phase, communities consisted of palisaded villages occupied by between 200 and 250 individuals living in circular houses. The houses at Upper Saratown contained roughly 700 sq ft of living space and were constructed by setting individual posts in the ground. The saplings were then pulled together and tied in wigwam fashion to create a framework for the walls and roof. This framework was then covered with skins, bark, or thatch in varying degrees, depending on seasonal climatic fluctuations. These structures are very similar to those of the early Hillsboro phase Wall site. This construction technique is like that of the middle Saratown phase houses, but the almost perfectly circular outline of the Upper Saratown houses contrasts with the more oval-shaped structures from Lower Saratown.

Although no structures were found at the William Kluttz site, the distribution of artifacts and features suggest a markedly different community pattern by the end of the seventeenth century. By this time, the communities no longer consist of compact, palisaded

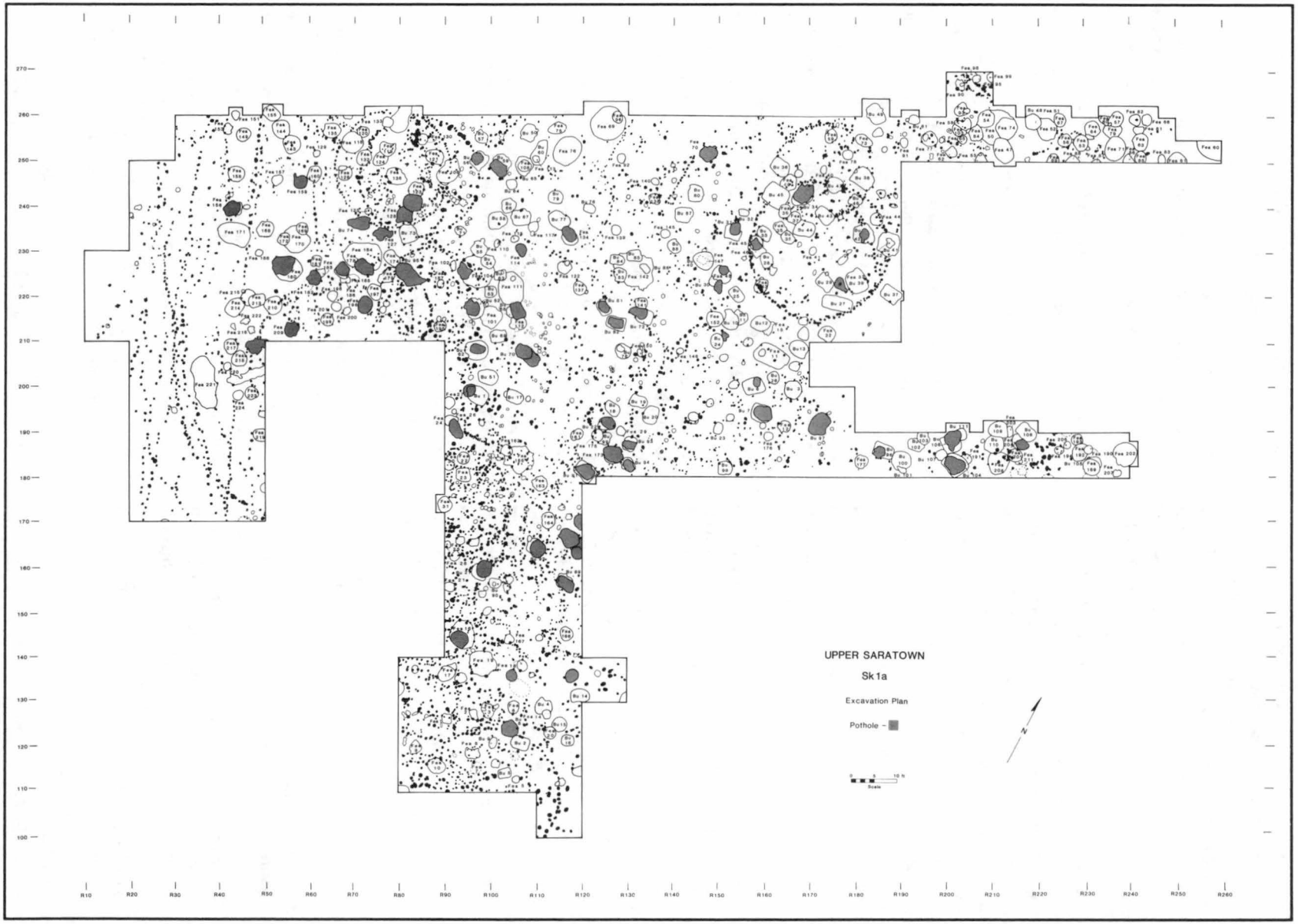

Figure 14.3. Excavation plan at Upper Saratown.

villages but rather of widely dispersed households. The William Kluttz site extends over an area approximately 6.5 acres in extent, compared with Upper Saratown which covers only about 1.5 acres. Also, the level of occupational intensity was considerably less at the William Kluttz site than at Upper Saratown or sites dating to the early and middle Saratown phases. Ceramic evidence further indicates that fragments of ethnically diverse Siouan tribes may have merged with the Sara to form dispersed refuge communities such as the William Kluttz site.

Late Saratown phase features are known primarily from the Upper Saratown site. The most characteristic features are large, deep, and almost perfectly circular storage facilities. These pits are usually over three feet in diameter and often as deep. Typically they contain stratified fill deposits rich in food remains and other domestic refuse. Large roasting pits or earth ovens also were frequently encountered during the Upper Saratown excavations. These are identical to those described for the late Hillsboro, Jenrette, and middle Saratown phases. Usually these large cooking facilities were located around the periphery of the village, near the palisades, and it is believed that they were used to prepare large amounts of food consumed during ritual celebrations (Ward 1980; Wilson 1977).

The basic subsistence pattern described for the earlier protohistoric and historic Siouan phases continued into the late Saratown phase. There appears to have been a balance between wild and domestic food resources. Corn, beans, squash, and gourds were cultivated in the rich bottoms of the Dan River and, at Upper Saratown, peaches were a popular Old World addition (Wilson 1977). The large number of storage pits at Upper Saratown, probably used for caching or hiding as much as for storage, indicates frequent village abandonment in the pursuit of wild game, particularly the white-tailed deer (Ward 1985). Like other Contact period Siouan phases, there is no evidence that European animals played any meaningful role in the subsistence cycle during the late Saratown phase.

As with community patterns, mortuary patterns also reflect dramatic changes during the late Saratown phase. At Upper Saratown and the Madison Cemetery site, graves were placed within and around domestic structures. Usually these were deep shaft-and-chamber pits, with the "central chamber" type occurring most frequently. Bodies were flexed and often accompanied by large amounts of European ornaments, particularly glass beads and copper trinkets (Navey 1982). Toward the end of the late Saratown phase, however, a drastic change took place.

Excavations at the William Kluttz site uncovered a cemetery containing numerous, very shallow pit burials. Most of these were subadult burials that did not contain any associated artifacts. It almost seems as if the energy required to maintain traditional mortuary practices could no longer be mustered. The isolation of the dead in a cemetery also may indicate an understanding of the contagiousness of the alien microbes, a lesson perhaps learned earlier at Upper Saratown. The fact that most were subadults points to their death resulting from a single epidemic since the adult survivors from Upper Saratown would have had some immunity to new waves of European diseases.

One of two shaft-and-chamber burials found at the William Kluttz site was that of a young male outfitted in European attire, with a pistol in his belt. Although most of the dead, at least those in the cemetery, received comparatively little attention, this grave suggests that some individuals did warrant special treatment. And the fact that this individual was a young adult male reinforces the pattern of differential status identified for the Occaneechi during the Fredricks phase (Ward 1987).

Our knowledge of the pottery used during the late Saratown phase comes from Jack Wilson's (1983:425–454) analysis of 102 rimsherds, rim and vessel sections, and whole pots from Upper Saratown (ca. 1670–1690), and from the assemblage of 52 vessels and vessel sections recovered from Feature 10 at the William Kluttz site (ca. 1690–1710). Pottery from both sites was largely referable to the Oldtown series and apparently represents the final manifestations of this series. Approximately half of all vessels at each site have smoothed or burnished surfaces, and less than one-fourth are net impressed. Significantly, these net impressed potsherds usually exhibit very fine net impressions not seen on earlier Dan River phase pottery. At Upper Saratown, most of the remaining vessels had scraped or brushed surfaces (12%) while vessels with cob impressed (2%), simple stamped (2%), check stamped (3%), and complicated stamped (3%) surfaces only infrequently occurred. Conversely, most of the other vessels from Feature 10 at the William Kluttz site were check stamped (17%), followed by simple stamped (4%), complicated stamped (2%), and brushed (2%). As was discussed in Chapter 11, some of the check stamped and simple stamped vessels at William Kluttz show strong technological and stylistic similarities to pottery being made by other piedmont groups and may be products of non-Sara peoples living at the site.

The vessel assemblage from Upper Saratown reflects a variety of forms and sizes. Wilson (1983:426–427) characterizes most vessels as "long-necked" jars with slightly everted rims; other vessel types include open-mouthed jars with flaring rims, cuspidor-style jars, hemispherical and sub-hemispherical bowls, semi-conical bowls with straight to slightly incurved rims, and cazuela bowls. Jars have rim diameters that range from 13 cm to 38 cm (mean=28 cm) while bowls usually are smaller with diameters of

10 cm to 28 cm (mean=17 cm). Decoration usually was confined to the vessel lip and consisted mostly of V-shaped notches, fingertip notches, and circular punctations. More elaborate incised and punctated designs occurred along the rims and shoulders of cazuela bowls.

Except for differences in the relative frequency of minority surface treatments, the Feature 10 vessel assemblage from the William Kluttz site is, as expected, remarkably similar to the Upper Saratown assemblage. Over three-fourths of these vessels were jars with slightly everted or flaring rims and occasionally were decorated by simple notching of the lip. Most jars represent large cooking or storage vessels that are greater than 30 cm in rim diameter; however, a few much smaller jars also were found. Both cazuela and simple hemispherical bowls were recovered, and were decorated with incised and punctated designs that also occur on Upper Saratown bowls.

Clearly the most significant aspect of change in Sara material culture during this period was the proliferation of European trade goods. Whereas only a few glass and brass beads were recovered at Lower Saratown, many thousands of such artifacts were found at Upper Saratown. In fact, some burials contained over 30,000 glass beads. Other trade artifacts from Upper Saratown include: brass bells, bottle glass fragments, cut brass ornaments and gorgets, brass finger rings, an iron knife, an iron hoe, two pair of scissors, a spoon, numerous scrap pieces of brass and iron, and a few gunflints and lead shot. Many of these other artifacts, and most of the iron artifacts, came from two burials that may postdate the major village occupation at the site. When compared with the trade artifact assemblage from the Fredricks site, it is clear that the Upper Saratown traders received mostly ornaments and trinkets from the English and not the full range of utilitarian goods and weapons that was available to the Occaneechi. As will be shown later, the difference in trade artifact inventories between these two sites is important to understanding the relationship between the Occaneechi and their neighbors, and it suggests that the Occaneechi, as middlemen in the trade, effectively controlled access to weapons and certain other goods by more remote tribes. If the contents of Burial 12 at the William Kluttz site and the numerous rumors of guns and gun parts found by relic hunters at that site are any indication, the Occaneechi's control of the trade was short-lived. By about 1700, the Sara apparently were receiving a great variety of trade goods, including metal tools and weapons. Access to these goods is well illustrated by Burial 12, the burial of a young adult male. This grave contained a pistol, an iron knife, a brass wire C-bracelet, buttons at the right wrist and below both knees (suggesting European-style garments), a leather belt with a large brass buckle, lead shot, iron nails, and both glass and purple wampum beads that apparently decorated a shirt or coat.

Despite evidence for the introduction of European-made iron tools by the close of the late Saratown phase, the Sara still relied heavily upon stone working for many of their tools. Small triangular projectile points to tip their arrows were produced in large quantities, and other stone tools such as bifacial drills, perforators, denticulates, retouched flakes, chipped hoes, celts, adzes, hammerstones, milling stones, and abraders met many of their butchering, hideworking, woodworking, agricultural, food processing, and other needs. Other aspects of native technology, however, did decline in importance during the late Saratown phase. Few bone or shell tools, common during the preceding middle Saratown phase, were recovered from either Upper Saratown or the William Kluttz site.

Although some of these tools—such as beamers, awls, cups, needles, and scrapers—may have been replaced by European trade items, there does not appear to be any compelling artifactual evidence for such a replacement. Instead, many of these tools probably were now being made of wood, gourd, cane, or some other perishable material. It is also possible that the introduction of European woven fabrics made many hideworking implements obsolete.

Euro-Indian Contact and Culture Change

Numerous traders and explorers crisscrossed the North Carolina Piedmont during the seventeenth and early eighteenth centuries (see Merrell 1989). Some, like John Lederer, searched for the "Indian Sea," but most sought new markets for their "edged tools" and trinkets. These early Englishmen did not come to conquer or to proselytize the natives but rather to make them commercial partners in a worldwide exchange network. On the surface, these motives seem harmless enough. Yet the arrival of foreign traders presaged a tidal wave of cultural and biological devastation. After only a few decades, the piedmont tribes were so riddled by disease and warfare that once autonomous peoples were forced to band together and reorganize their societies in a desperate effort to survive.

Still, this rapid process of biological and cultural devastation on the Piedmont went unnoticed by most Euroamericans, and the few who did recognize the plight of the natives considered it only important enough to rate an occasional footnote in their documents. Below, we will review some of these historical "footnotes" in light of the archaeological data presented in the previous chapters. In particular, we will focus upon two separate but intertwined vectors of change—trade and disease—resulting from the cultural collision between natives and foreigners.

Euro-Indian Trade

The archaeological and ethnohistorical records provide ample evidence that trade between piedmont Indians and Europeans did not begin much before the first half of the seveneenth century and was not carried out on a regular basis until after about 1670. Although early Spanish explorers may have come close to Siouan territory a century earlier, their brief visits had no noticeable impact on these "back-country" tribes. They left behind no trinkets or tools, nor did their diseases spread among the villages along the Dan, Haw, and Eno rivers. It was not until the English established a firm foothold in the Virginia colony that any attention was directed toward the interior tribes of the Piedmont. And from the beginning, this attention was focused on one tribe in particular—the Occaneechi.

By comparing the archaeological record of trade from the Fredricks site—the last known village of the Occaneechi—with that of other late seventeenth-century Siouan villages such as Upper Saratown, important insights may be gained concerning economic and political conditions on the Piedmont at this time. When coupled with sketches from the written documents, a clear picture emerges of the dynamics of change that were set in motion by the interaction between tribes and traders.

The unique position of the Occaneechi and their efforts to maintain power through intimidation is perhaps best portrayed in the writings of John Lederer and Abraham Wood. Lederer, who visited the Occaneechi and their neighbors in the summer of 1670, provides two observations that are of particular importance. The first account was of an incident that he witnessed while in the Occaneechi's village on the Roanoke River. The day following his arrival, a Rickohockan ambassador and five attending Indians visited the Occaneechi, presumably to establish trade relations but possibly on their way toward the Virginia traders at Fort Henry. According to Lederer (1672:14), during evening festivities held in their honor "the Room was suddenly darkned, and for what cause I know not, the *Rickohockan* and his retinue barbarously murthered" (Lederer 1672:14). Given that other interior tribes such as the Cherokee were attempting to establish direct trading contacts with Virginia during the early 1670s, it is quite possible that this turn of events was brought about by the discovery of the Rickohockan ambassador's true intentions.

Equally telling of Occaneechi control in the trade is Lederer's advise to would-be traders. For trading with frontier Indians such as the Occaneechis, Lederer recommends

> a sort of course Trading Cloth . . . Axes, Hoes, Knives, Sizars, and all sorts of edg'd tools. Guns, Powder and Shot, etc. are Commodities they will greedily barter for: but to supply the Indians with Arms and Ammunition, is prohibited by all English Governments . . . . To the remoter Indians you must carry other kinde of Truck, as small Looking-glasses, Pictures, Beads, and Bracelets of Glass, Knives, Sizars, and all manner of gaudy toys and knacks for children [Lederer 1672:26–27].

Lederer's observations here probably were more a reflection of the *status quo* imposed by the Occaneechi than the unsophisticated desires of their southern and western neighbors. And, while guns were contraband, this prohibition clearly had little impact on the Occaneechi themselves (Merrell 1982:91). As will be seen shortly, this dichotomy in trade goods outlined by Lederer conforms closely to the archaeological evidence available for these groups.

A similar portrayal of Occaneechi trade influence and control through intimidation is evidenced in Abraham Wood's account of the ill-fated James Needham and Gabriel Arthur expedition in 1673–1674 (Alvord and Bidgood 1912:209–226). This expedition was undertaken to establish direct trade with the Tomahitans or Overhill Cherokees. On their first trip westward from Fort Henry, Needham and Arthur were met by several Occaneechi and forced to turn back. Their second attempt was more successful, and beyond the Occaneechi village they met up with a large contingent of Tomahitans who were on their way to the Occaneechi. Despite Occaneechi attempts to breed ill will between the Tomahitans and the Virginians, nine Tomahitans proceeded eastward to Wood's plantation while Needham, Arthur, and the remaining Tomahitans headed west toward the mountains.

Following a lengthy journey across the Carolina Piedmont and mountains, the party finally reached the Tomahitans' village, probably located on the Little Tennessee River in eastern Tennessee. After a short stay, Needham and 12 Tomahitans returned to Wood's plantation in Virginia while Gabriel Arthur stayed behind to learn the language. Once business with Wood was completed, James Needham and his Tomahitan companions again set out for the Overhill settlements to retrieve Arthur.

In the events that followed, the Occaneechi demonstrated how far they were willing to go to maintain their hegemony. Apparently they were not keen on the idea of the Tomahitans establishing direct trade ties with the English. Such an arrangement would have not only subverted their role as middlemen with the Tomahitans but, perhaps more importantly, it also would have sent a loud message to other Siouan groups like the Sara that they no longer needed the services of the Occaneechi. Such a direct connection with the English also meant that the Occaneechi's neighbors could supply themselves with firearms and ammunition, Colonial law notwithstanding.

At the Occaneechi village, Needham was joined by several Indians including an Occaneechi trader named Indian John or Hasecoll. The party journeyed from Occaneechi to Aeno, then westward to Sarrah and the Trading Ford on the Yadkin where Hasecoll murdered Needham. After mutilating Needham's body and pronouncing his distaste for the English, Hasecoll instructed the Tomahitans to return home and kill Gabriel Arthur. Although Arthur's life was spared, his return trip to Virginia was fraught with danger from the now-hostile Occaneechi. When Arthur and 20 accompanying Tomahitans finally reached Sarrah on their return trip the next year, they were confronted by four Occaneechi. Though small in number, these four frightened and intimidated the Tomahitans to the point of abandoning all the goods they had brought to trade with the English and running back to the security of their mountain homes. Gabriel Arthur himself only narrowly escaped death.

On the surface, it is difficult to understand how such a small group of Occaneechi could cause so much trouble for the more numerous Tomahitans. However, it is important to remember the words of Abraham Wood, who noted that the Occaneechi "are strongly fortified by nature and that makes them soe insolent for they are but a handfull of people, besides what vagabonds repaire to them it beeing a receptakle for rogues" (Alvord and Bidgood 1912:225). Furthermore, the Occaneechi's supply of arms and ammunition made them "the Mart for all the Indians for att least 500 miles" (Wood, quoted in Merrell 1982:91). No doubt the four Occaneechi at Sarrah were well armed not only with guns and shot but also with a violent and pugnacious reputation.

From the preceding discussion, it is apparent that the Occaneechi possessed and actively maintained a unique level of political and economic power. Furthermore, the ethnohistoric record strongly implies that the Occaneechi controlled access to English goods being sought by neighboring tribes. We will now see to what extent Occaneechi influence is manifested in the archaeological record. This will be done by comparing trade artifact assemblages from Upper Saratown and the Fredricks site.

A total of 325,716 trade artifacts were recovered from features and burials at Upper Saratown (Table 14.3). Most artifacts from feature fill represent items that were discarded or lost, whereas those from burials (excluding artifacts mixed in the fill) are associated with clothing or grave associations. Glass beads were by far the most common artifact type and comprised all but 937 of all trade artifacts found. Most beads came from burial contexts and represent the non-perishable remains of beaded mortuary garments. In several instances, these garments were extensively decorated with tens of thousands of small blue and white glass seed beads. Other kinds of beads only occasionally were used. Large glass beads, particularly opaque blue, white, and blue with white stripes, sometimes were used in necklaces and bracelets.

Copper and brass ornaments were the next most common artifact class and comprised almost 87% of the remaining trade artifacts. As with beads, these occurred primarily with burials and (in descending frequency) include: rolled tubular beads, bells, rings, conical tinklers, circular gorgets with central perforations, and triangular janglers. Other identifiable trade items were rare and include: green bottle glass fragments, lead shot, gunflints, iron nails, two pairs of scissors, an iron knife, an iron hoe, and a brass spoon. Interestingly, the scissors, knife, and spoon, along with most of the brass bells, rolled tubular beads, and over 40,000 glass beads, were recovered from a single burial and may post-date the main site occupation. Although no gun parts were found in feature or burial contexts, and gunflints and shot only rarely were found, it it clear from an incised representation of a trade musket found on a potsherd that the Sara were familiar with these new weapons.

In addition to these trade items, numerous small scraps of copper, brass, and occasionally iron were found in widely scattered contexts, and suggest that the recycling of these relatively scarce metals by the Sara was extensive.

The wealth of material goods observed among the Occaneechi by Lawson (Lefler 1967:61) led him to remark that "no *Indians* [have] greater Plenty of Provisions than these." Lawson most likely was referring to the stores of English manufactures possessed by the Occaneechi. If so, this statement suggests that much of the material wealth that the Occaneechi accumulated as middlemen in the trade was brought with them to their new home on the Eno River. Regardless, comparisons of the archaeological remains at the Fredricks site with historical accounts of what the Occaneechi were likely receiving in trade 10 to 20 years earlier on the Roanoke River show no significant differences.

A total of 12,911 trade artifacts were recovered from Occaneechi features and burials at the Fredricks site (Table 14.3). Although this sample is numerically smaller than that obtained at Upper Saratown, it represents a material wealth not found on any other Contact period site in piedmont North Carolina. In simplest terms, this wealth is reflected by a far greater proportion of utilitarian goods to ornamental items (Figure 14.4). Glass beads are still the most frequent trade artifact class; however, the ratio of glass beads to other trade artifacts is only 14:1 at Fredricks, whereas it is 416:1 at Upper Saratown. It appears that beadworking, particularly using small glass beads to decorate clothing, was not pursued with the intensity that it was among the Sara. Furthermore, a high percentage of the glass beads found at Fredricks were large

Table 14.3. European Trade Artifacts from Feature and Burial Contexts at Upper Saratown and the Fredricks Site.

Artifact Type	Material	Upper Saratown	Fredricks
Awls	Iron	-	2
Axes	Iron	-	5
Beads	Copper/Brass	519	3
Beads	Glass	324,779	11,790
Bell Frags.	Copper/Brass	-	2
Bells	Copper/Brass	149	33
Bottle Frags.	Glass	28	48
Bottles	Glass	-	2
Bracelet	Copper/Brass	-	2
Buckle Frags.	Copper/Brass	-	6
Buckle Tang	Iron	-	1
Buckles	Copper/Brass	-	3
Buckles	Pewter	-	9
Button	Copper/Brass	2	1
Buttons	Glass	-	11
Buttons	Lead	-	3
Buttons	Pewter	-	6
Cones	Copper/Brass	18	-
Cut Ornaments	Copper/Brass	5	-
Cooper's Tool	Iron	-	1
Ember Tenders	Iron	-	2
Fishhook	Copper/Brass	1	1
Fishhook	Iron	-	1
Flakes	Glass	9	6
Gorgets	Copper/Brass	6	-
Gun	Iron	-	1
Gun Springs	Iron	-	2
Gunflints	Flint	10	47
Hoes	Iron	1	5
Hook	Iron	-	1
Indet. Frags.	Copper/Brass	-	3
Indet. Frags.	Iron	34	98
Jews Harps	Iron	-	3
Kettle	Copper/Brass	-	1
Kettle Frags.	Copper/Brass	-	1
Knife Blades	Iron	-	8
Knife Handles	Bone/Wood	-	9
Knives	Iron	1	14
Lead Shot	Lead	26	410
Lead Sprue	Lead	-	27
Mirror Frag.	Glass	-	1
Nails	Iron	8	39
Pendant	Copper/Brass	1	-
Pin	Copper/Brass	-	1
Pipe Frags.	Kaolin Clay	-	146
Pipes	Kaolin Clay	-	4
Pipes	Pewter	-	4
Porringers	Pewter	-	3
Projectile Point	Glass	1	-
Rings	Copper/Brass	30	-
Scissors	Iron	2	6
Scrap	Copper/Brass	6	-
Scrap	Lead	-	8
Scrap	Pewter	-	2
Sheet/Strip	Copper/Brass	74	22
Sheet/Strip	Indeterminate	1	-
Sheet/Strip	Iron	3	85
Snuff Box	Copper/Brass	-	2
Snuff Box	Iron	-	1
Spoons	Copper/Brass	1	3
Tack	Copper/Brass	1	-
Tack	Iron	-	1
Thimble	Copper/Brass	-	1
Wire Coil	Copper/Brass	-	2
Wire Frags.	Copper/Brass	-	12
Total		325,716	12,911

Cornaline de Allepo beads that probably were strung on necklaces, bracelets, and anklets.

Eleven hundred and twenty-one trade artifacts other than glass beads were recovered from features and burials at the Fredricks site. In contrast to Upper Saratown, only a small minority of these were ornaments. Almost 60% of all identifiable trade artifacts were associated with firearms and include: 437 pieces of lead shot and lead sprue, 47 gunflints, two gun springs, and a dog-lock musket occurring as a burial association. Numerous gunflints and gun parts also were recovered from plowzone excavations. Pipes and pipe fragments also were common and comprised about 18% of identified trade artifacts. While most of these were kaolin, pewter pipes and molded pipes of non-kaolin clay also were well represented. In striking contrast, very few kaolin pipe fragments were recovered from all excavations at Upper Saratown.

Likewise, metal and glass implements, instruments, and containers were well represented at Fredricks and comprise almost 14% of identified trade artifacts. Iron implements include 39 nails (most likely used as awls), 31 knives or knife fragments, six pairs of scissors, five axes, five hoes, two ember tenders, two awls, two fishhooks, and a cooper's tool. Three Jews harps also were found. Other metal artifacts include three brass or latten spoons, a brass thimble, and a brass fishhook. Containers are represented by 54 green bottle glass fragments and two whole bottles, three pewter porringers, three brass or iron snuff boxes, and a brass kettle.

Ornaments were the least frequent class of trade artifacts. Most of these artifacts represent finished ornaments or clothing fasteners and include: 35 brass bells; 21 brass, glass, lead, and pewter buttons; 19 brass and pewter buckles; two brass wire coils possibly

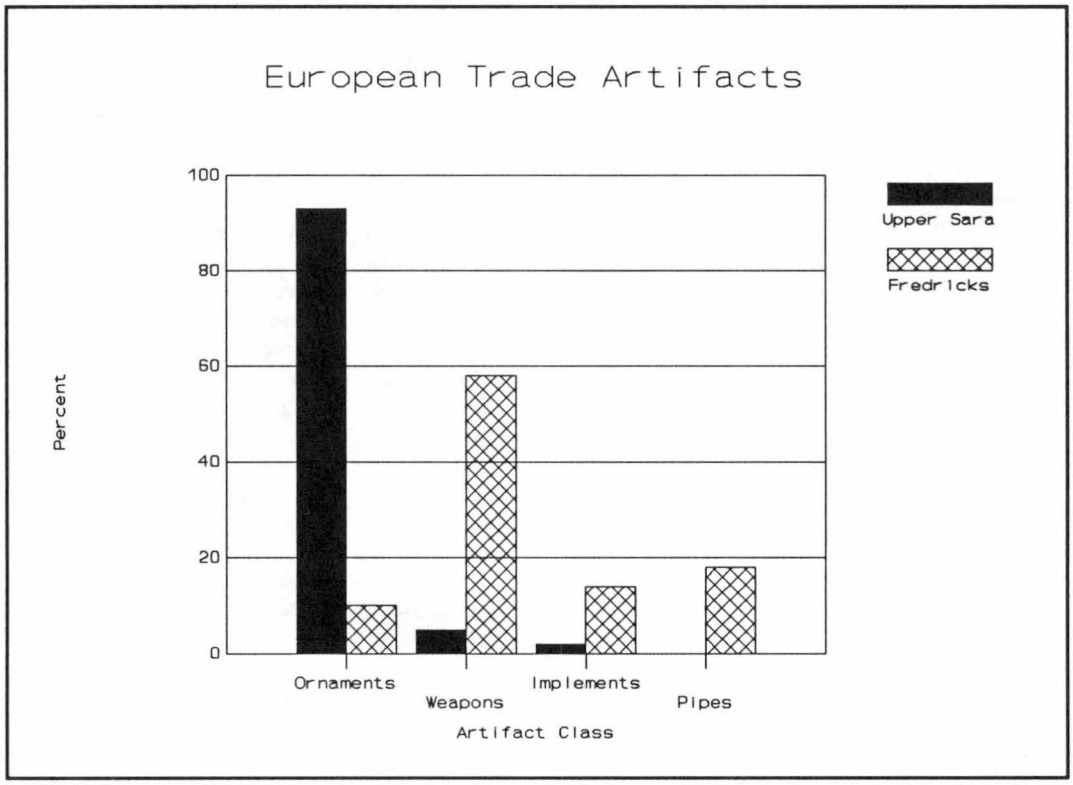

Figure 14.4. Comparison of trade artifact assemblages from Upper Saratown and the Fredricks site.

used as ear ornaments; two brass wire C-bracelets; and two brass tubular beads.

Finally, numerous unidentifiable or scrap pieces of iron, brass, pewter, and lead were recovered. Many of these pieces are quite large compared to similar metal fragments found at Upper Saratown. When viewed alongside the numerous usable implements and containers that occur as burial accompaniments, it becomes readily apparent that the Occaneechi, unlike the Sara, were not lacking in trade goods nor were they compelled to recycle or conserve what they received in trade.

The latter half of the seventeenth century was a period of rapid and fundamental change for the Indians along the colonial frontier of Virginia and North Carolina. In 1650, the Virginians were only beginning to explore territories to the west and south that were in firm control of the native population. For groups such as the Occaneechi, the earlier Wainokes, and the later Tuscaroras, this period also offered unprecedented opportunities, through trade and the acquisition of firearms, to obtain and exert considerable economic and political power. All of these groups were located along the ever-advancing colonial frontier and thus were in a position where they might control or at least influence contacts with more remote tribes. The Occaneechi, being positioned astride the principal trading path out of Fort Henry, were particularly successful in this respect.

What the archaeological record shows is that the Occaneechi not only acquired material wealth from trading with the Virginians; perhaps more importantly, they were able to dictate the kinds of European manufactures that were available to their neighbors. Viewed in this context, John Lederer's curious assertion that the remote Indians trade for beads, bracelets, gaudy toys, and knacks says more about the selected contents of the trader's pack than it does the desires of the native consumer. By controlling access to firearms and using intimidation when necessary, the Occaneechi were able to maintain their dominant position as middlemen. Significantly, when their downfall came in 1676, it was not at the hands of their deprived "trading partners" but by the superior force of Nathaniel Bacon and his well-armed militia.

The Impact of Old World Diseases

Like foreign trade, alien diseases also left an indelible mark on the archaeological record of the piedmont Siouans. No less subtle than the gun parts and metal tools found at Contact period villages are the scores of burials that blanketed villages like Upper Saratown and filled the cemeteries at Occaneechi. Not only did the native populations lack biological resistance to the new European diseases, but the intensification and spread of traditional trade networks to accommodate the flow of European goods and deerskins also facilitated the spread of deadly diseases. By 1701, most native

societies in the Piedmont had disintegrated, and John Lawson could remark that there was not the "sixth Savage living within 200 miles of our Settlements as there were fifty years ago" (Lefler 1967:252). The question, then, is not whether European diseases devastated the native population, but rather when these epidemics arrived and how the Siouans coped with their deadly consequences.

Today, many researchers in the Southeast (e.g., Ramenofsky 1987; Smith 1987) generally support the position taken by Henry Dobyns (1983) who believes that waves of pandemics swept through the interior Southeast soon after the arrival of the first Spanish explorers. Diseases spread from population to population on their own momentum, without the necessity of face-to-face contacts between natives and foreigners (Dobyns 1983:13). Others (e.g., Blakely and Detweiler-Blakely 1989; Henige 1989; Milner 1980; Snow and Lanphear 1989) have suggested that rather than continental-wide pandemics on the heels of the Spanish entradas, the spread of Old World diseases depended on a number of local and regional factors. Population densities, community size, and the degree and nature of the contacts between natives and foreigners all affected the timing, speed, and scope of the devastation of diseases such as smallpox, measles, and influenza. Both of these positions depend heavily on historical and ethnographic data.

The data presented in the previous chapters provide an excellent opportunity to approach the impact and timing of Old World diseases on a regional level by supplementing the sketchy historical record with a heavy dose of archaeological fact. If the Spanish arrival in the New World ushered in waves of pandemics from Mexico to Maine, as suggested by Dobyns, then we would expect to find some evidence of this devastation in the Siouan area during the late Hillsboro phase. Yet, at sites like George Rogers and Edgar Rodgers, there is no evidence of intensified mortuary activity. After augering extensive areas and focusing excavations in sections of the sites where subsurface pits were located, only a single burial was found at the Edgar Rodgers site. Nor was there any evidence of a breakdown or disruption in other aspects of culture during the Hillsboro phase. Patterns of subsistence, settlement, and material technology continued much as they had during the preceding Haw River phase. If anything, settlements became more populated, subsistence more intense and diversified, and ceramic and lithic traditions more elaborate. This pattern is most clearly expressed at the Wall site which represents a relatively large, nucleated settlement that was occupied for a fairly long period of time (cf. Petherick 1987; Ward and Davis 1991).

Using negative evidence, it could be argued that we simply failed to find cemeteries located away from the habitation areas or, as some have proposed, diseases so weakened infected populations that they could no longer bury their dead (Ramenofsky 1987; M. Smith 1987). The first argument can never be completely dismissed because of the nature of archaeological data. However, it should be pointed out that except for the early Haw River phase Hogue site burials and the late Contact period cemeteries at the Fredricks and William Kluttz sites, Siouan burials were typically placed in and around houses, in proximity to other domestic features. The eight burials excavated at the Wall site fit this pattern (Ward 1987:107). Because domestic areas were targeted for extensive auger tests at all of the sites investigated during the course of the project, it seems unlikely that the lack of evidence for increased mortuary activity during the late Hillsboro phase resulted from inadequate samples. It should also be pointed out that we have found cemetery areas at the Fredricks, Hogue, and William Kluttz sites.

Siouan project data strongly suggest that even during the most devastating epidemics, the dead continued to be buried. The villages of Upper Saratown and the Madison Cemetery site on the Dan River were decimated by diseases during the latter half of the seventeenth century (Hogue 1988; Navey 1982; Ward and Davis 1991). Still, the dead were buried in a traditional manner with full ceremony. Deep pits were arduously dug into the stiff subsoil clays, and the bodies were laid to rest with all the respect and attention shown before the advent of Old World epidemics.

Only at the William Kluttz site, which represents the last desperate gasp of the Sara on the Dan River, is there evidence that the decimation had become so great that it affected the burial of the dead. Here, children and subadults were interred in shallow pits within a cemetery, apparently with little attendant ritual. Adult graves, however, were placed away from the cemetery and displayed deep, traditional pit forms. Burial goods indicate that those individuals were given their last rites in a traditional manner. Even during the worst of times, the dead were still buried, and more often than not, with full ceremony.

These data alone may not be entirely convincing, and contrary arguments could still be made with regard to the reliability of the excavation samples and the possibility of drastically altered mortuary patterns. However, when the burial density data from sites of the sixteenth and early seventeenth centuries are compared to burial densities from late seventeenth century sites, the differences are so striking that they cannot be explained away by sampling error. At Jenrette, over 10,000 sq ft of the palisaded village has been excavated, exposing numerous pit features and three structures. Yet, only one grave dating to the Jenrette phase occupation has been found. Augering and excavation in an extremely rich area of Lower Saratown also uncovered a single burial. In contrast, the graves were so thick at late-seventeenth-century Upper Saratown

that it was virtually impossible to dig a 10-ft by 10-ft excavation unit without uncovering the top of a burial pit (Figure 14.3). At the roughly contemporary Madison site, the high frequency and density of graves led an avocational archaeologist to mistakenly name the site "Madison Cemetery" (Gravely 1969). The number and concentration of burials on sites post-dating 1670, compared with earlier sites, makes it clear that diseases and not sampling error or changing burial practices are the culprits responsible for the difference.

Although Euro-African diseases were slow in entering the North Carolina Piedmont, their end result was no less devastating than if they had swept across the foothills with the arrival of the early Spanish explorers. By 1740, when the first White settlers began venturing into the northern Piedmont, they met no resistance from the native tribes. In fact, they met few natives. Over a period of less than 100 years after the first Virginia traders bartered their wares, the villages of the Sara, Occaneechi, Eno, Sissipahaw, Tutelo, Saponi, and Shakori lay vacant, surrounded by abandoned fields that were soon to be tilled by the newcomers.

Concluding Remarks

By viewing the archaeological data of the Siouan project against the background of the ethnohistorical record, it has been possible to create a composite picture of native life on the Carolina Piedmont during the seventeenth century with a high degree of clarity and focus. At first glance, this picture appears to be one of explosive and dramatic change. Yet, as one moves in for a closer look, it becomes clear that change was tempered by stability and that many native traditions established centuries earlier persisted in the face of the devastation wrought by contact and interaction with Euro-Americans.

The data, analyses, and interpretations presented in this monograph are not meant to be the final word—the end of the journey among the native tribes of the Piedmont begun by John Lederer and John Lawson 300 years ago. Rather, they are presented in the hope that they will spark a new beginning in scholarly efforts to better understand and appreciate the rich heritage that these often forgotten people have left us. Like Lawson and Lederer, we have explored new territories and traveled uncharted paths, but we probably still understand precious little of the unwritten past.

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Appendix A

Seventeenth-Century Lithic Technologies on the North Carolina Piedmont

by
Jane M. Eastman

The seventeenth century was a time of marked change in the lifeways of Native Americans in eastern North America. The establishment of permanent European settlements and trading posts along the east coast led to episodes of exploration, intercultural contact, warfare, trade, and disease. These interactions shaped the future of both native and European populations. On the North Carolina Piedmont, Siouan-speaking tribes became involved in the Virginia-Carolina fur and deerskin trade during the second half of the seventeenth century. This study focuses on the impact of contact-era trade and the introduction of metal tools and European weapons on native technologies. Ethnohistoric and archaeological data are examined in an effort to identify and interpret technological change in the context of seventeenth-century Native American-European interaction on the North Carolina Piedmont.

The questions addressed here concern changes in the production and use of stone tools by piedmont tribes during the seventeenth century. First, did the types or quantities of stone tools employed by the Indians change during the Contact period? If so, can these changes be linked to the development of the Virginia-Carolina fur and deerskin trade or to the introduction of metal tools and European weapons? Second, did changes occur in the manufacturing methods or morphology of small triangular projectile points. If so, can these changes be linked to the fur and deerskin trade and are these changes temporally diagnostic?

The stone tool assemblages used in this study were recovered during archaeological excavations conducted from 1983 to 1989 by the University of North Carolina's Siouan project. These field investigations centered on the Haw, Eno, and Dan river drainages in North Carolina and provided data for studying culture change among native peoples on the North Carolina and southern Virginia Piedmont (Dickens et al. 1987:1). After the first two field seasons, a preliminary study of changes in stone-tool assemblages from five sites was made by Tippitt and Daniel (1987). The present study builds upon their research and includes assemblages from 11 additional sites excavated between 1987 and 1989. Stone artifacts from the Wall site, though analyzed by Tippitt and Daniel, were excluded from the present study due to the lack of artifacts from pit features at the site.

Ethnohistoric and Chronological Framework

The seventeenth-century accounts of piedmont Siouans are few and represent only distorted snapshots of what was a very dynamic period; however, these accounts do provide some very informative glimpses into the processes of change that occurred at specific places and times during the first decades of contact. Explorations and observations made by Virginia colonists have been incorporated into the organizational framework of this study and are presented as a series of contact periods. Each period, as shown in Figure A.1, is given a beginning and ending date that generally can be applied across the Piedmont. I do not, however, intend to suggest that changes were occurring at the same time throughout the study area. Because changes occurred at different times and rates in different places, these archaeological periods are intended to reflect similar stages within the process of culture change experienced in each drainage.

Late Prehistoric Period (A.D. 1000–1400)

The archaeological components of this period predate European contact. In the Haw and Eno drainages, late prehistoric occupations are represented by the Haw River phase (A.D. 1000–1400). Most of these settlements consist of scattered households located on floodplains or terraces overlooking floodplains (Simpkins and Petherick 1986:16–17). Population density appears to have been low in the area during this period. I examined Haw River components from four sites located along the Haw River and its tributaries: Guthrie, Holt, Mitchum, and Webster. In addition, three Haw River samples from the Eno River valley also were analyzed: Jenrette, Hogue (East), and Hogue (West).

Population density appears to have been greater in the Dan drainage during the Late Prehistoric period, with evidence of large fortified communities during the Dan River phase (A.D. 1000–1450). Davis and Ward (1991) have suggested that these community plans may represent defensive responses to Iroquois raiding or possibly increased intertribal competition for productive agricultural land. Dan River phase components from

		Haw River Drainage		Eno River Drainage		Dan River Drainage	
Period	Date	Phases	Components	Phases	Components	Phases	Components
	A.D. 1710						
Late Contact				Fredricks	Fredricks		
						late Saratown	William Kluttz
	A.D. 1680						
Middle Contact				Jenrette			Upper Saratown
					Jenrette		
	A.D. 1660						
			Mitchum				
Early Contact		Mitchum		?		middle Saratown	Lower Saratown
	A.D. 1600						
						early Saratown	
Protohistoric		Hillsboro	Edgar Rogers George Rogers	Hillsboro	Wall		Early Upper Saratown Powerplant
	A.D. 1400						
			Webster Guthrie				Lower Saratown William Kluttz
Late Prehistoric		Haw River	Mitchum	Haw River		Dan River	
					Jenrette		
			Holt		Hogue (East) Hogue (West)		Powerplant
	A.D. 1000						

Figure A.1. Archaeological sequences for the Haw, Eno, and Dan river drainages.

three sites were included in this study: Lower Saratown, Powerplant, and William Kluttz.

Protohistoric Period (A.D. 1400–1600)

The Protohistoric period covers the era of initial contact and exploration of North America by Europeans; however, there is no archaeological evidence of a European presence in the study area during this period. In the Haw and Eno drainages, protohistoric occupations are represented by the Hillsboro phase. Hillsboro phase sites included in this study—Edgar Rogers and George Rogers—represent small hamlets, though some Hillsboro phase settlements in the study area such as the Wall site were compact, nucleated villages.

In the Dan drainage, the early Saratown phase (A.D. 1450–1620) is represented by the Early Upper Saratown site. This village sustained a large resident population, perhaps larger than any previous Dan River phase settlement. A second protohistoric component from the Powerplant site was included in this analysis and apparently represents a more dispersed settlement.

Protohistoric sites in the study area yield very small numbers of European glass beads. The low frequency of these trade items and the lack of any direct contact or sustained trade with Europeans during the period indicates that there should not have been any significant impacts on Siouan technologies.

Early Contact Period (A.D. 1600–1660)

During this period, Jamestown was settled and indirect trade for animal pelts was established between Virginia colonists and piedmont Siouans. Goods were moved between the Tidewater and the Piedmont through native exchange networks. By 1650, the focus of Virginia traders had shifted from the Chesapeake region to the area southwest of the Tidewater, and the first recorded exploration in that direction was attempted. The intercultural trade that occurred during the first sixty years of English settlement in Virginia (from 1607 to ca. 1670) was infrequent and probably had little impact on the daily activities of Indians living on the North Carolina Piedmont.

In addition to glass beads, beads fashioned from imported brass or copper appear for the first time at archaeological sites on the Piedmont during this period; however, no European weapons or metal tools have been recovered from sites of this period. Therefore, Early Contact period sites may yield evidence for the initial impact of the fur and deerskin trade, without any extraneous effects from the introduction of European technology.

The Mitchum phase (A.D. 1600–1670) represents an Early Contact period occupation in the Haw drainage. The Mitchum site was a compact, palisaded village, probably occupied by members of the Sissipahaw tribe between A.D. 1650 and A.D. 1670.

The only Early Contact period site included in this study from the Dan drainage was Lower Saratown. This component defines the Middle Saratown phase (A.D. 1620–1670) and represents a village that was similar in plan to late Dan River phase villages.

Middle Contact Period (A.D. 1660–1680)

The decades between 1660 and 1680 represent a transitional period in the relations between piedmont Indians and the Virginia colonists. During the 1660s and early 1670s, the Occaneechis were situated on an island in the Roanoke River and asserted themselves as powerful middlemen in the trade. This deterred any direct contact between piedmont Indians and the Virginia colonists. In his travel journal, recorded in the spring of 1670, John Lederer described the Piedmont tribes as "remote Indians" who were unsophisticated traders (Cumming 1958:41). Lederer, and presumably the Occaneechis as well, was able to gain a hefty profit from trade with them. Lederer also noted that many of these remote groups were ignorant of firearms. Lederer's comments indicate that the Occaneechis were able to control the types of goods that passed into the interior. Metal tools and European weapons were among the items prevented from reaching the piedmont Siouans (see Chapter 14).

The decade of the 1670s marks the turning point in European-Indian interaction in the Piedmont. As the decade progressed, both Virginia traders and piedmont Indians became increasingly bold in their attempts to circumvent the Occaneechis and establish a direct trade. In response, the Occaneechis became more desperate to preserve their position. An exploration made by James Needham into Cherokee country in 1673 encountered resistance on the part of the Occaneechis and resulted in the murder of Needham by his Occaneechi guide (Alvord and Bidgood 1912:210–225).

The explorations of Lederer and Needham ushered in an era of intense interaction that focused on the burgeoning Virginia fur and deerskin trade. The Occaneechis were routed in 1676 at the onset of Bacon's Rebellion and, thereafter, no barrier remained between Virginia and the Piedmont. The defeat of the Occaneechis not only allowed the Virginia traders greater access to the Piedmont, but it also left the way open for the Seneca to intensify their raiding in the region. The Middle Contact period represented a new era of interaction in the Piedmont and brought about two challenges for native technological systems: (1) the production of ever-increasing amounts of furs and hides; and (2) defense against attack from northern groups often armed with European firearms.

One Middle Contact component along the Eno River—the Jenrette site—has been investigated. This palisaded village is thought to have been occupied ca. A.D. 1670 and may represent the village of "Shakor" visited by John Lederer during his expedition through the Piedmont (Cumming 1958). In addition to glass beads and rum bottle fragments, lead shot was recovered from eight pit features at the site, although no gun parts or other metal tools were found.

One Middle Contact site on the Dan River—Upper Saratown—has been investigated. The site has been partially excavated and stone tools from 11 pit features were included in this study. This village represents a more extended occupation than the Jenrette site. The large numbers of burials at the site may reflect the impact of a European-introduced epidemic (Ward and Davis 1991). The quantity of trade goods at Upper Saratown indicates that the Saras were heavily involved in the fur and deerskin trade at this time. Given the evidence of disease and intensive trade, it is likely that much of this trading was conducted directly between the Saras and Virginia traders, and the transactions may have occurred at Upper Saratown itself. The majority of European trade goods from the site are ornamental objects, such as glass and copper or brass beads, gorgets, and pendants. European-manufactured materials such as bottle glass, copper or brass, and iron were being experimented with during this period. One glass projectile point and two copper or brass points have been recovered from Upper Saratown. Small iron fragments are present in many pit features and may represent the use and recycling of metal tools. In addition to these iron fragments, three edged metal tools (a hoe, an axe, and a pair of scissors) were found in two burials at the site; however, it is uncertain if these burials are associated with the main occupation of the site.

Middle Contact assemblages should yield evidence for the impact of intensive trade. The Upper Saratown assemblage also may yield evidence for the initial effects of the incorporation of European technologies, as iron appears to have been a highly conserved resource.

Late Contact Period (A.D. 1680–1710)

The Late Contact period was one of great cultural disruption for the piedmont Indians. Soon, pack trains of up to 100 horses in length, with each horse carrying 150–200 pounds of trade goods, traversed the interior south of Virginia (Bassett 1970:235). Participation in the fur and deerskin trade increased and the use of European weapons and metal tools became widespread. A less welcome consequence of this cultural interaction was the transmission of European diseases to interior populations. Epidemics disproportionately affected the most robust adults between the ages of fifteen and forty and, thereby, struck political and social leaders, as well as those who contributed most to village subsistence (Kupperman 1980). Depopulation brought about the need for village consolidation. In addition, intertribal hostilities continued. William Byrd, a prominent Virginia trader, reported that the "Indians [were] at

Table A.1. Characteristics of archaeological periods.

Period	Type of Contact With Euroamericans	Trade Relations With Virginia Traders	Types of European Goods Found in Pit Features
Late Contact	sustained and direct	trading in Piedmont villages via packhorse trains	glass beads, green bottle glass, kaolin pipes, wire or sheet brass, cast brass items, metal fragments, iron implements, gun parts, gunflints, lead shot
Middle Contact	direct but infrequent	trading via Occaneechi middlemen with some direct trading	glass beads, green bottle glass, kaolin pipes, wire or sheet brass, cast brass items, metal fragments, gunflints, lead shot
Early Contact	probably none	trade goods received indirectly through native networks	glass beads, wire or sheet brass
Protohistoric	none	very little evidence of European goods in Piedmont	glass beads
Late Prehistoric	none	none	none

war with each other" and that the Seneca were raiding "incessantly" in the Dan drainage during this period (Bassett 1970). Signs of cultural disruption and the effects of technological change should be apparent in archaeological assemblages from this period.

The Fredricks site, located near present-day Hillsborough, represents the Occaneechi village that was situated along the Great Trading Path from Virginia in 1701. The Occaneechis settled at this location after abandoning Occaneechi Island in the Roanoke River some time after Bacon's Rebellion in 1676.

The Late Contact period William Kluttz site probably represents the final Sara occupation in the Dan River area. Limited excavations at the site revealed that an ethnically diverse population may have occupied households dispersed across the floodplain. The large number of infant and child burials at the site indicates that epidemic diseases continued to ravage the Dan drainage during this period.

The ethnographic and chronological framework for this study was devised with the knowledge that explanations for any changes in stone-tool assemblages are to be found in broader historical and cultural processes. Explanations for changes in Siouan technology are grounded in answers to questions such as: what type of contact with Euro-Americans was experienced by the occupants of each site?; how did these contacts affect relations between the village and other Indian communities?; and what European materials were recovered from each site and how might these items have been incorporated into native technologies? Table A.1 presents the contextual framework which will govern the interpretations presented in this study.

Artifact Assemblages

With artifact assemblages from these 15 sites, an attempt was made to identify changes in the use and production of stone tools during the contact era. In order to gain tight temporal control, my analysis was limited to artifacts recovered from pit features that could be confidently assigned to a defined archaeological phase. Tables A.2 and A.3 present the distribution of stone tools by chronological period for each study area. Tool categories (as shown in Tables A.2 and A.3) were determined on the basis of unique combinations of implement blank and working edge forms. For detailed descriptions of individual tool categories, see McManus (1985).

Artifact Density

In discussing the historic Onondaga, Bradley (1987:123–125) noted that the quantity of both flaked and ground stone implements on seventeenth century sites declined dramatically as the quantity of metal increased. He suggested that by mid-century the occurrence of stone projectile points and other flaked tools had shrunk to "vestigial proportions." To determine whether the development of the fur and deerskin trade and the introduction of European weapons and metal tools led to any major changes in the production of stone tools at piedmont sites, the density of stone artifacts per cubic foot of excavated feature fill was

Table A.2. Distribution of stone artifacts from the Haw and Eno river drainages.

Artifact Category	Late Prehistoric		Protohistoric		Early Contact		Middle Contact		Late Contact	
	no.	%	no.	%	no.	%	no.	%	no.	%
Debitage										
Decortication Flake	213	11.2	49	2.7	57	22.5	116	8.8	162	11.7
Int./Bif. Thinning Flake	1407	73.9	1402	78.0	127	50.2	681	51.6	948	68.5
Shatter Fragment	13	0.7	11	0.6	12	4.7	4	0.3	85	6.1
Flake (Archaic)	11	0.6	0	0.0	0	0.0	13	1.0	0	0.0
Other Flakes	0	0.0	1	0.1	0	0.0	0	0.0	0	0.0
Core	29	1.5	29	1.6	6	2.4	35	2.6	10	0.7
Raw Material	3	0.2	0	0.0	0	0.0	2	0.2	0	0.0
Chipped Stone Tools										
Projectile Point (Archaic)	3	0.2	1	0.1	0	0.0	4	0.3	2	0.1
Projectile Point (Woodland)	4	0.2	0	0.0	1	0.4	12	0.9	1	0.1
Small Triangular Point	31	1.6	64	3.6	9	3.6	214	16.2	42	3.0
Projectile Point (Indet.)	7	0.4	15	0.8	5	2.0	1	0.1	15	1.1
Preform	4	0.2	3	0.2	0	0.0	0	0.0	3	0.2
Biface	6	0.3	27	1.5	0	0.0	1	0.1	12	0.9
Chipped Hoe	1	0.1	2	0.1	1	0.4	2	0.2	0	0.0
Chipped Chisel	1	0.1	0	0.0	0	0.0	0	0.0	0	0.0
Chipped Axe	1	0.1	0	0.0	0	0.0	0	0.0	0	0.0
Chipped Disk	0	0.0	0	0.0	1	0.4	0	0.0	7	0.5
End Scraper	5	0.3	1	0.1	1	0.4	1	0.1	0	0.0
Side Scraper	2	0.1	1	0.1	1	0.4	0	0.0	1	0.1
Denticulate	0	0.0	0	0.0	1	0.4	0	0.0	0	0.0
Wedge	3	0.2	3	0.2	1	0.4	17	1.3	0	0.0
Graver	3	0.2	2	0.1	0	0.0	2	0.2	0	0.0
Perforator	4	0.2	1	0.1	0	0.0	4	0.3	3	0.2
Drill	2	0.1	2	0.1	1	0.4	11	0.8	0	0.0
Utl. & Ret. Flakes	125	6.6	172	9.6	21	8.3	178	13.5	20	1.4
Large Cobble Tools										
Cobble Chopper	13	0.7	3	0.2	0	0.0	0	0.0	13	0.9
Hammerstone	2	0.1	0	0.0	1	0.4	0	0.0	12	0.9
Worked Slab	1	0.1	0	0.0	0	0.0	2	0.2	0	0.0
Mano	0	0.0	0	0.0	0	0.0	0	0.0	4	0.3
Hammerstone/Mano	4	0.2	2	0.1	4	1.6	6	0.5	0	0.0
Anvil/Milling Stone	1	0.1	0	0.0	3	1.2	10	0.8	4	0.3
Pitted Cobble	0	0.0	0	0.0	0	0.0	0	0.0	2	0.1
Utilized Cobble	0	0.0	0	0.0	0	0.0	0	0.0	1	0.1
Polished Cobble	0	0.0	0	0.0	0	0.0	0	0.0	4	0.3
Abrader	0	0.0	2	0.1	0	0.0	0	0.0	0	0.0
Ground Stone Tools										
Ground Stone Disk	0	0.0	0	0.0	0	0.0	0	0.0	11	0.8
Chunkey Stone	0	0.0	0	0.0	0	0.0	0	0.0	2	0.1
Ground Celt	3	0.2	0	0.0	0	0.0	1	0.1	0	0.0
Stone Pipe	0	0.0	0	0.0	0	0.0	0	0.0	1	0.1
Engraved Stone	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0
Ground Stone (Indet.)	2	0.1	5	0.3	0	0.0	3	0.2	18	1.3
Total	1904	100.0	1798	100.0	253	100.0	1321	100.0	1383	100.0

Table A.3. Distribution of stone artifacts from the Dan River drainage.

Artifact Category	Late Prehistoric		Protohistoric		Early Contact		Middle Contact		Late Contact	
	no.	%	no.	%	no.	%	no.	%	no.	%
Debitage										
Decortication Flake	214	12.0	52	7.7	154	11.5	45	6.6	208	10.1
Int./Bif. Thinning Flake	1421	79.7	520	76.9	961	71.7	483	70.4	1562	76.1
Shatter Fragment	28	1.6	23	3.4	16	1.2	37	5.4	70	3.4
Flake (Archaic)	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Other Flakes	3	0.2	1	0.1	0	0.0	0	0.0	11	0.5
Core	8	0.4	3	0.4	25	1.9	0	0.0	28	1.4
Raw Material	2	0.1	0	0.0	1	0.1	0	0.0	2	0.1
Chipped Stone Tools										
Projectile Point (Archaic)	4	0.2	2	0.3	5	0.4	1	0.1	2	0.1
Projectile Point (Woodland)	0	0.0	0	0.0	0	0.0	0	0.0	1	0.0
Small Triangular Point	59	3.3	43	6.4	101	7.5	67	9.8	87	4.2
Projectile Point (Indet.)	10	0.6	2	0.3	2	0.1	10	1.5	4	0.2
Preform	2	0.1	3	0.4	0	0.0	3	0.4	0	0.0
Biface	10	0.6	9	1.3	3	0.2	3	0.4	6	0.3
Chipped Hoe	0	0.0	0	0.0	1	0.1	0	0.0	0	0.0
Chipped Chisel	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Chipped Axe	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Chipped Disk	0	0.0	0	0.0	2	0.1	0	0.0	4	0.2
End Scraper	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Side Scraper	1	0.1	0	0.0	1	0.1	0	0.0	0	0.0
Denticulate	0	0.0	1	0.1	0	0.0	3	0.4	2	0.1
Wedge	1	0.1	0	0.0	0	0.0	0	0.0	0	0.0
Graver	3	0.2	0	0.0	0	0.0	0	0.0	0	0.0
Perforator	0	0.0	2	0.3	1	0.1	1	0.1	5	0.2
Drill	1	0.1	0	0.0	6	0.4	6	0.9	3	0.1
Spokeshave	1	0.1	0	0.0	1	0.1	0	0.0	0	0.0
Utl. & Ret. Flakes	15	0.8	11	1.6	37	2.8	14	2.0	32	1.6
Large Cobble Tools										
Cobble Chopper	0	0.0	0	0.0	2	0.1	0	0.0	0	0.0
Hammerstone	0	0.0	4	0.6	0	0.0	8	1.2	0	0.0
Worked Slab	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Mano	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0
Hammerstone/Mano	0	0.0	0	0.0	15	1.1	0	0.0	15	0.7
Hammerstone/Anvil	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0
Anvil/Hammerstone/Mano	0	0.0	0	0.0	0	0.0	1	0.1	0	0.0
Anvil/Milling Stone	0	0.0	0	0.0	2	0.1	0	0.0	2	0.1
Pitted Cobble	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Utilized Cobble	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Polished Cobble	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Abrader	0	0.0	0	0.0	0	0.0	0	0.0	1	0.0
Ground Stone Tools										
Ground Stone Disk	0	0.0	0	0.0	1	0.1	2	0.3	2	0.1
Chunkey Stone	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Ground Celt	0	0.0	0	0.0	0	0.0	0	0.0	1	0.0
Stone Pipe	0	0.0	0	0.0	0	0.0	0	0.0	0	0.0
Stone Bead	0	0.0	0	0.0	0	0.0	0	0.0	1	0.0
Engraved Stone	1	0.1	0	0.0	0	0.0	0	0.0	0	0.0
Ground Stone (Indet.)	0	0.0	0	0.0	4	0.3	0	0.0	4	0.2
Total	1784	100.0	676	100.0	1341	100.0	686	100.0	2053	100.0

Table A.4. Density of stone artifacts per cubic foot of feature fill from sites in the Haw and Eno river drainages.

Period	Estimated Feature Volume	Artifact Frequency	Artifact Density
Late Contact	199	713	3.6
Middle Contact	110	564	5.1
Early Contact	52	108	2.1
Protohistoric	44	413	9.3
Late Prehistoric	77	1269	16.4

Table A.5. Density of stone artifacts per cubic foot of storage pit fill from sites in the Dan River drainage.

Period	Estimated Feature Volume	Artifact Frequency	Artifact Density
Middle Contact	105	490	4.6
Early Contact	67	454	6.7
Protohistoric	101	446	4.4
Late Prehistoric	199	1183	5.9

examined. Feature volume was estimated from scale drawings of excavated pit features. As these pits do not conform to simple geometric shapes, calculations were based on the closest geometric approximation of the recorded pit shape.

In an attempt to make the artifact samples more comparable, only pit features believed to represent abandoned storage pits were considered in this exercise. Ward (1980:220) has suggested that the fill in abandoned storage pits at the Upper Saratown site represents secondary disposal of refuse originally discarded within and around houses. Contents of this type of pit feature at other sites in the study area indicate that abandoned storage pits were filled in a similar manner across the Piedmont (Petherick 1987; Ward and Davis, this volume). Given this practice, the daily production and use of stone tools should be reflected in the density of stone artifacts from abandoned storage pits. Tables A.4 and A.5 present the density of stone artifacts from the Haw-Eno and Dan drainages, respectively. The Late Contact component at the William Kluttz site in the Dan River drainage contained no storage pits and is not represented in Table A.5.

A casual perusal of the tables reveals a lot of variation in the density of stone tools among the assemblages. In addition to the amount of stone tools produced and used at a site, the density of artifacts in pit features may be affected by the overall intensity of the site's occupation, such that some sites may contain dense deposits of artifacts while others contain deposits with relatively few artifacts. To account for this intersite variability the density of a second artifact class was considered. Potsherds are the most ubiquitous artifacts on late prehistoric and historic aboriginal sites in the Piedmont and are felt to be an adequate representation of the relative density of artifacts at any given site. The density of sherds in each assemblage was calculated to provide the pattern of expected variation in artifact density due to intersite differences in occupation intensity. The density of sherds is intended to serve only as a general indicator of the density of the site's deposits.

In Figures A.2 and A.3, the density of stone artifacts is plotted against the density of sherds. As shown in Figure A.2, the pattern of variation in the density of stone artifacts is similar to that of sherd density in the Late Prehistoric through Middle Contact period assemblages. I suggest that this similar variability reflects overall differences in the sites' deposits, rather than any major difference in tool production. The Late Contact Fredricks site assemblage differs from the other Haw and Eno River assemblages in that the density of sherds is high (18.4 per cubic foot), while the density of stone artifacts is low (3.6 per cubic foot). The density of sherds accurately reflects the richness of the site's deposits (see Dickens et al. 1987). Although other artifact classes are well represented at the site, relatively few stone artifacts are present.

A different pattern emerges in the Dan drainage. The density of stone artifacts varies little, between 4.4 per cubic foot in the Protohistoric assemblage to 6.7 in the Early Contact assemblage. Likewise, the density of sherds in the Late Prehistoric, Protohistoric, and

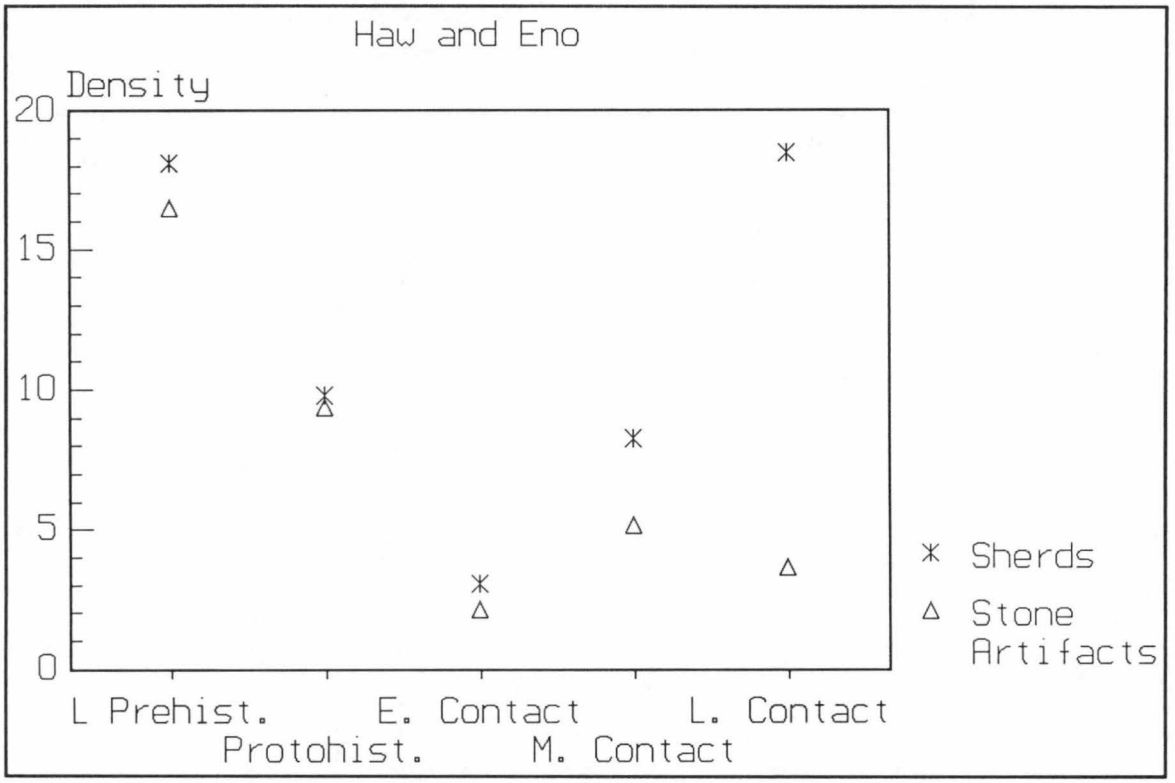

Figure A.2. Density of stone artifacts and sherds per cubic foot of storage pit fill from sites in the Eno and Haw river drainages.

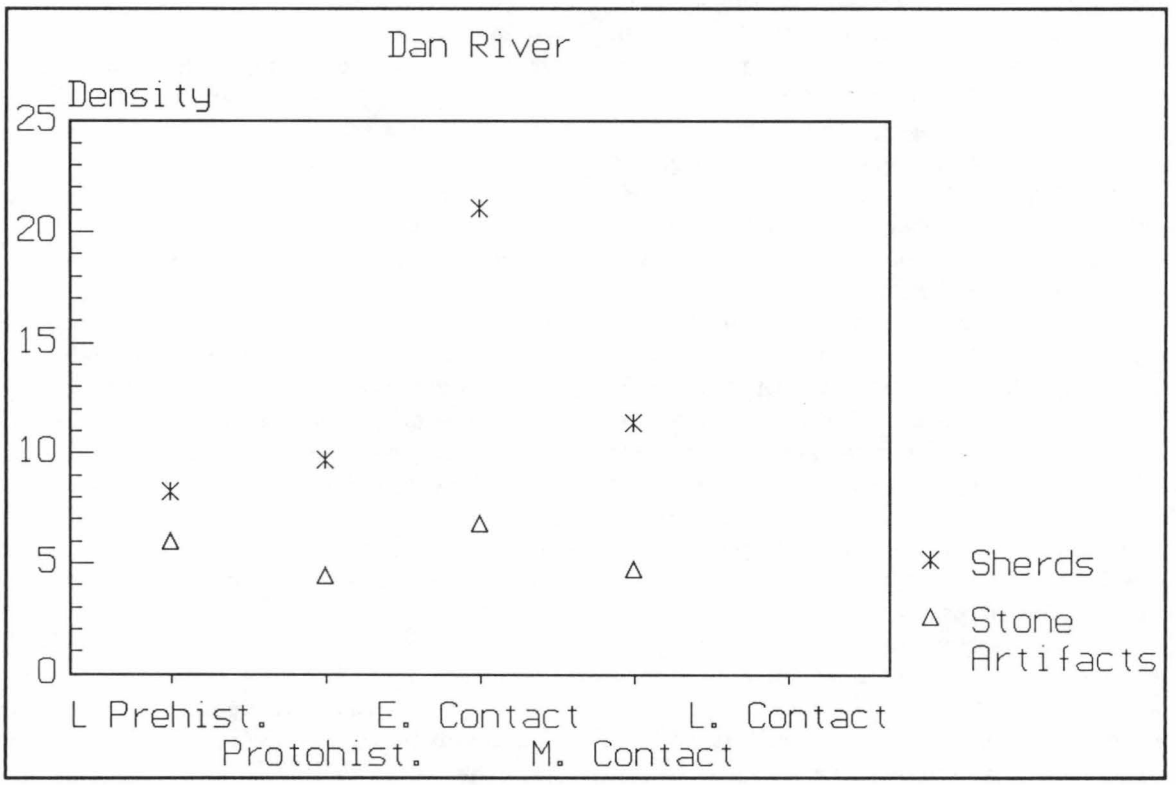

Figure A.3. Density of stone artifacts and sherds per cubic foot of storage pit fill from sites in the Dan River drainage.

Middle Contact period assemblages remains fairly stable, varying between 8.2 and 11.3 per cubic foot. The density of sherds in the Early Contact, Lower Saratown assemblage is 20 per cubic foot, nearly twice that of any other Dan River assemblage. This high sherd density results from the inclusion of a large number of coarse net-impressed potsherds in the Early Contact period features. These net-impressed potsherds are probably associated with the earlier Dan River phase occupation at the site (see Chapter 9). The Early Contact village was built on top of an earlier Dan River phase midden. The coarse net-impressed sherds were probably unintentionally excavated from the midden by the occupants of Lower Saratown and discarded along with the pottery that they had produced and used at the village.

It is reasonable to assume that, in addition to ceramics, the Saras would also have encountered stone artifacts in the Dan River midden. Why, then, are there also not twice as many stone artifacts in the Lower Saratown storage pits? The explanation appears to be that the flakes and other stone artifacts encountered in the Dan River midden were re-used by the occupants of Lower Saratown. While old potsherds may not have been very useful, old flakes could have easily been worked into usable tools. This hypothesis is supported by the presence of tools with fresh flakes scars on patinated surfaces.

During this exercise, two assemblages were characterized by high sherd densities and relatively low stone artifact densities: the Fredricks site assemblage and the Lower Saratown assemblage. Though the William Kluttz site was not included in this exercise, it is characterized by a similarly high sherd density (13.8 per cubic foot) and low stone artifact density (3.8 per cubic foot). This characteristic in the Early Contact, Lower Saratown assemblage appears to result from an artificially high sherd density and possibly the re-use of earlier debitage. What might account for this characteristic in the Late Contact, Fredricks and Kluttz site assemblages? I suggest that by the Late Contact period the use of metal tools and European weapons resulted in a decline in the number of stone tools produced and used at sites in the Piedmont.

Assemblage Composition

Given that no major changes occurred in the relative frequency of stone tools on piedmont sites until late in the trade era, I was interested in determining whether the types of tools produced and used were affected by the development of the fur and deerskin trade. In an effort to identify changes in the composition of stone-tool assemblages over time, the distribution of tool types from each period was compared. Artifacts were divided into four techno-functional categories: debitage (including all flakes and shatter fragments), small triangular projectile points, other chipped-stone tools, and ground-stone artifacts and large cobble tools. The graphs in Figures A.4 and A.5 plot the logarithm (base 10) of the relative frequency of each techno-functional category. Debitage constitutes more than 90% of some assemblages and graphical representations of such skewed data are often unsatisfactory. Cleveland (1985:84) suggested that the resolution of such graphs can be improved by scaling the data in exponential fashion. A result of the logarithmic transformation is a reduction in the apparent variability of the debitage category. For this reason, debitage will be discussed separately.

An interesting pattern is present in the distribution of artifact categories. The frequency of chipped-stone tools increased from the Protohistoric through the Middle Contact periods, then declined in the Late Contact period. A similar pattern in present in the distribution of small triangular projectile points. Note the high frequency of small triangular projectile points in the Middle Contact assemblages. Projectile points account for 16.2% of the Middle Contact Jenrette site assemblage in the Eno drainage and 9.8% of the Upper Saratown assemblage from the Dan drainage. This peak in projectile point frequency is followed by a marked decline in their frequency during the Late Contact period. Projectile points account for only 3% of the Late Contact Fredricks site assemblage and only 4.2% of the William Kluttz site assemblage.

Increased participation in the fur and deerskin trade would have placed a greater emphasis on hunting and hide-processing activities. This emphasis may be reflected in the increased frequency of small chipped-stone tools and projectile points in Middle Contact assemblages. However, as small triangular projectile points have been found embedded in human bone as well as animal bone at Middle Contact sites, the high frequency of projectile points may not only reflect an adaptation to intensified hunting, but also to increased intertribal hostilities. During the Middle Contact period, piedmont Siouans found themselves increasingly confronted with adversaries armed with European firearms. In the first half of the 1670s the Occaneechis were struggling to maintain their position as middlemen and resorted to acts of violence to keep the piedmont Siouans from pursuing direct trade. During the second half of the decade hostile bands of Seneca warriors began to harass Siouan communities in the Piedmont. Without regular access to firearms, the Siouans may have needed large supplies of arrows to defend against attack from groups with firearms.

It is also notable that large ground-stone and cobble tools are well represented in Late Contact assemblages. Bradley (1987:125) recognized a similar pattern among the historic Onondaga. Abrading stones and food-processing tools remained in use, while chipped-stone tools were replaced by metal counterparts. Similarly, in the Piedmont, multi-purpose cobble tools that

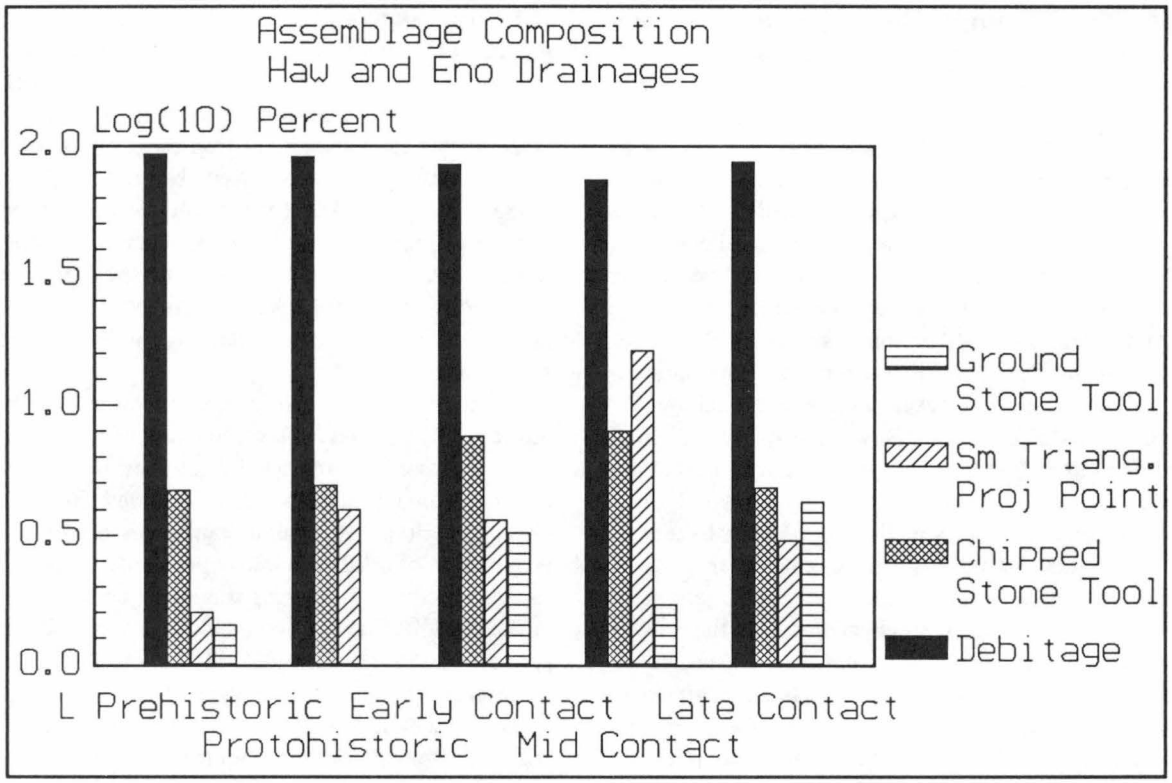

Figure A.4. Composition of lithic assemblages from sites in the Haw and Eno river drainages.

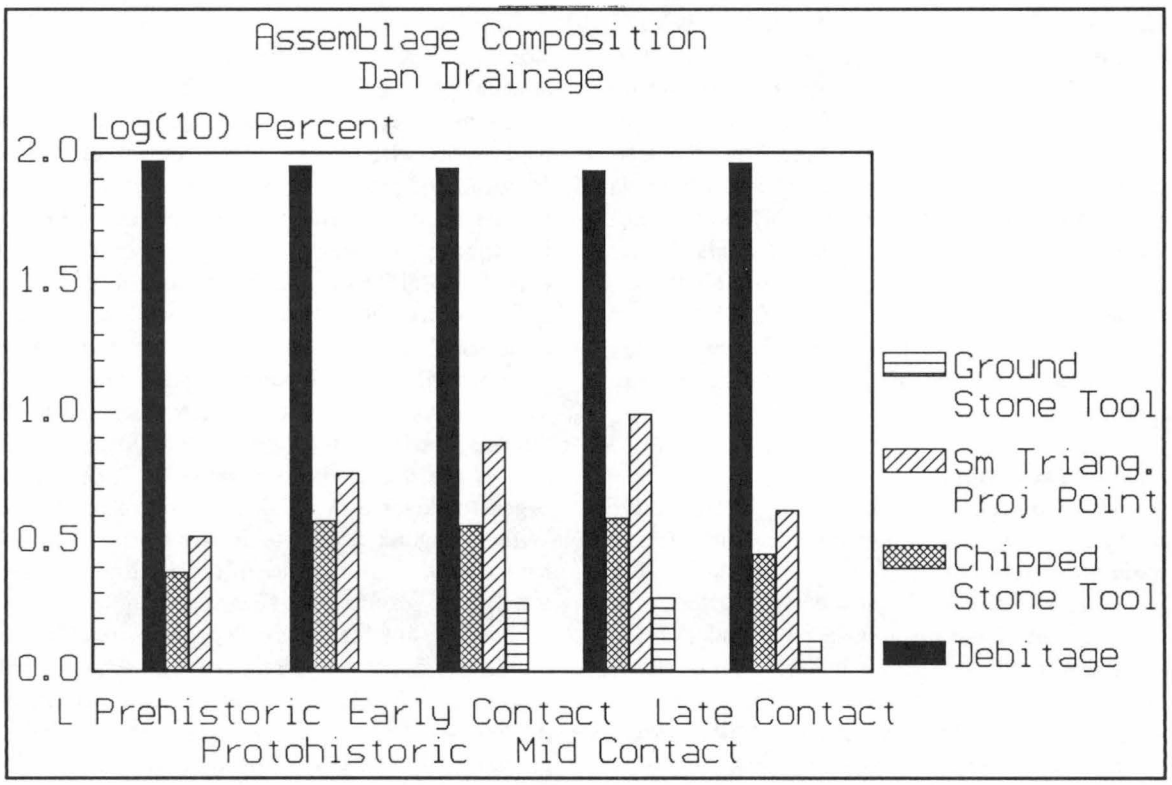

Figure A.5. Composition of lithic assemblages from sites in the Dan River drainage.

probably functioned as hammerstones, anvils, and manos remained important elements of Late Contact period technologies.

To best illustrate the distribution of debitage, all stone tools were combined into a single category and debitage was divided into utilized and unworked flake categories. Utilized flakes show evidence of retouch or damage along the flake margins suggestive of use as expedient tools. Unworked flakes represent the discarded waste from flintknapping. Figures A.6 and A.7 present bar charts of the relative frequency of each category.

The pattern of increased frequency of stone tools from the Protohistoric through Middle Contact periods shown in Figures A.4 and A.5 is duplicated here. Figure A.6 indicates that, in the assemblages from the Haw-Eno drainages, the percentage of utilized flakes follows a similar pattern of increase during the Protohistoric and Early Contact periods. The Middle Contact assemblage contains the highest percentage of utilized/retouched flakes (13.5%). I believe that this pattern may reflect the adaptation of the stone-tool technology to the ever-increasing production of deerskins and hides through the Middle Contact period. Though the hide and skin trade only increased during the Late Contact period, the dependence on expedient stone tools appears to have declined with utilized flakes compiling only 1.4 percent of the assemblage. This situation reflects the widespread adoption of edged metal tools at the Late Contact Fredricks site.

Figure A.7 shows a slightly different pattern in the Dan drainage samples. The percentage of utilized flakes increased slightly from the Late Prehistoric through Early Contact periods. The Middle Contact assemblage, however, contains a smaller percentage of utilized flakes than does the Early Contact assemblage. The large collection of trade goods in the Middle Contact Upper Saratown assemblage attests to Saras' active participation in the skin and hide trade. Though only a few iron tools have been recovered at the site, iron appears to have been a highly-curated material at the site, with small fragments occurring in several features. The smaller number of utilized flakes at Upper Saratown could result from increased use of iron for cutting and scraping edges at the site. The Late Contact assemblage from the William Kluttz site contains a slightly smaller percentage of utilized/retouched flakes.

An examination of the composition of lithic assemblages has revealed that Middle Contact assemblages are characterized by a high frequency of small chipped-stone tools and a low incidence of unworked flakes. The types of small chipped-stone tools that occur most frequently at Middle Contact sites are utilized/retouched flakes. These expedient tools could have been used to butcher animals and prepare hides and skins. Of the more formalized tools, drills and wedges are the most numerous at Middle Contact sites. These tools are commonly associated with hide-processing, bone working, and various other craft activities. Their abundance may reflect an intensification of craft production at Middle Contact sites.

The Late Contact assemblages are characterized by relatively few stone artifacts, low frequencies of chipped-stone tools and projectile points, and a high incidence of discarded, unworked flakes. With the establishment of direct trading after 1680, regular supplies of metal tools and European weapons were available to Siouan groups in the Piedmont. The incorporation of edged metal tools is associated with a decline in the frequencies of utilized flakes and other chipped-stone tools in Late Contact period assemblages. The presence of firearms at Late Contact sites is similarly accompanied by a marked decrease in the frequency of projectile points. Hogue (1988:163) reported that the two instances of violent trauma observed in the skeletal population at the Late Contact Fredricks site resulted from European weapons.

Gunflints

One change in Siouan lithic technologies that is unquestionably associated with European contact was the addition of gunflints to the chipped-stone tool assemblage. Kent (1983:30–31) reported that bifacial gunflints of aboriginal manufacture occurred on Seneca sites in western New York and Susquehannock sites of south-central Pennsylvania during the second quarter of the seventeenth century. After 1675, European gunflints began to supplant these bifacial flints and by 1700 aboriginally manufactured gunflints became quite rare on Northeastern sites. Kent (1983:28) suggested that

> native-made gunflints can be viewed as simply a modification or readaptation of the chipped-stone tool which they were so accustomed to produce—namely, the triangular arrowhead. . . . [T]hese gunflints were made by Indians with the deeply ingrained motor habits for making triangular arrowheads; the difference being that the final product had a square or round, instead of triangular, outline.

In this manner, although bifacial gunflints represent a new type of tool, their presence does not indicate a deviation from prehistoric manufacturing techniques.

Aboriginal gunflints from piedmont North Carolina sites occur not only in the bifacially-manufactured form described above (Figure A.8*a–b*), but also as flakes with only lightly retouched edges (Figure A.8*c–d*). Flakes used as gunflints can be distinguished from other utilized flakes by the presence of crushed edges and tiny step-fractures commonly found on the edges of gunflints. The use of appropriately shaped flakes of locally available stone for gunflints is not discussed in

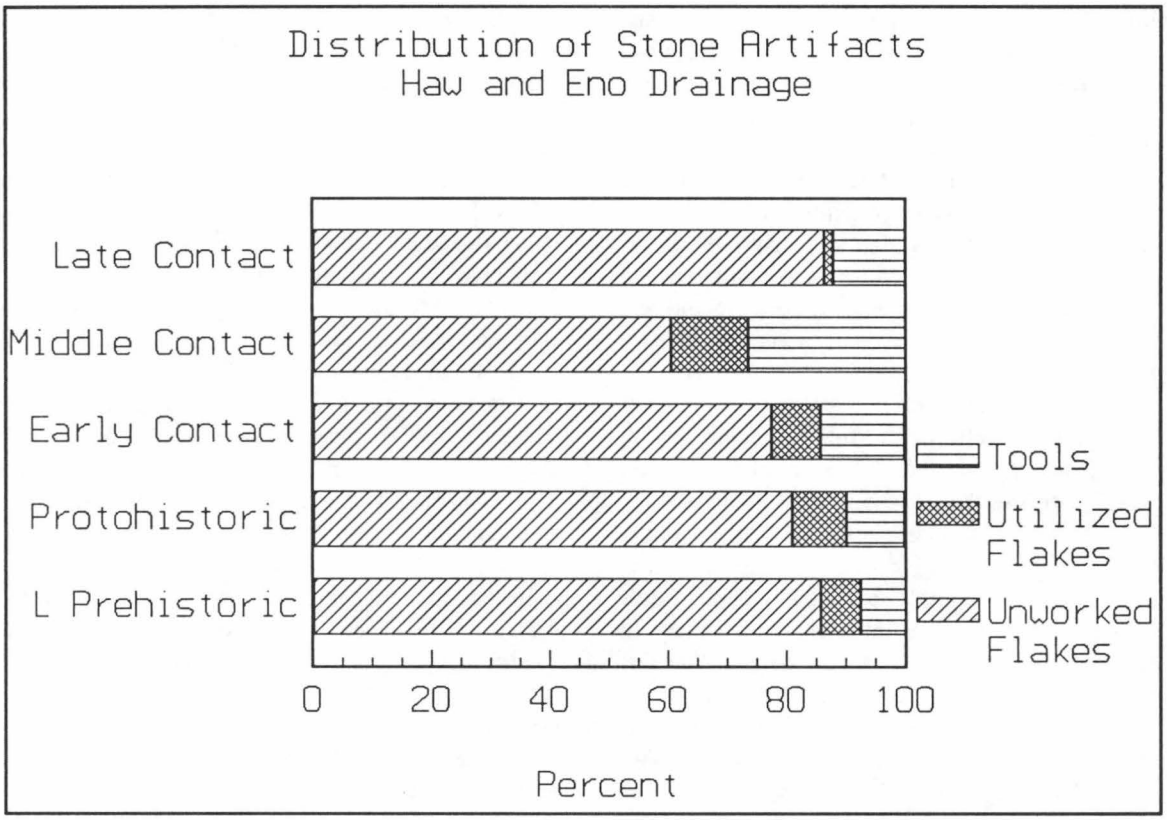

Figure A.6. Distribution of debitage and stone tools from sites in the Haw and Eno river drainages.

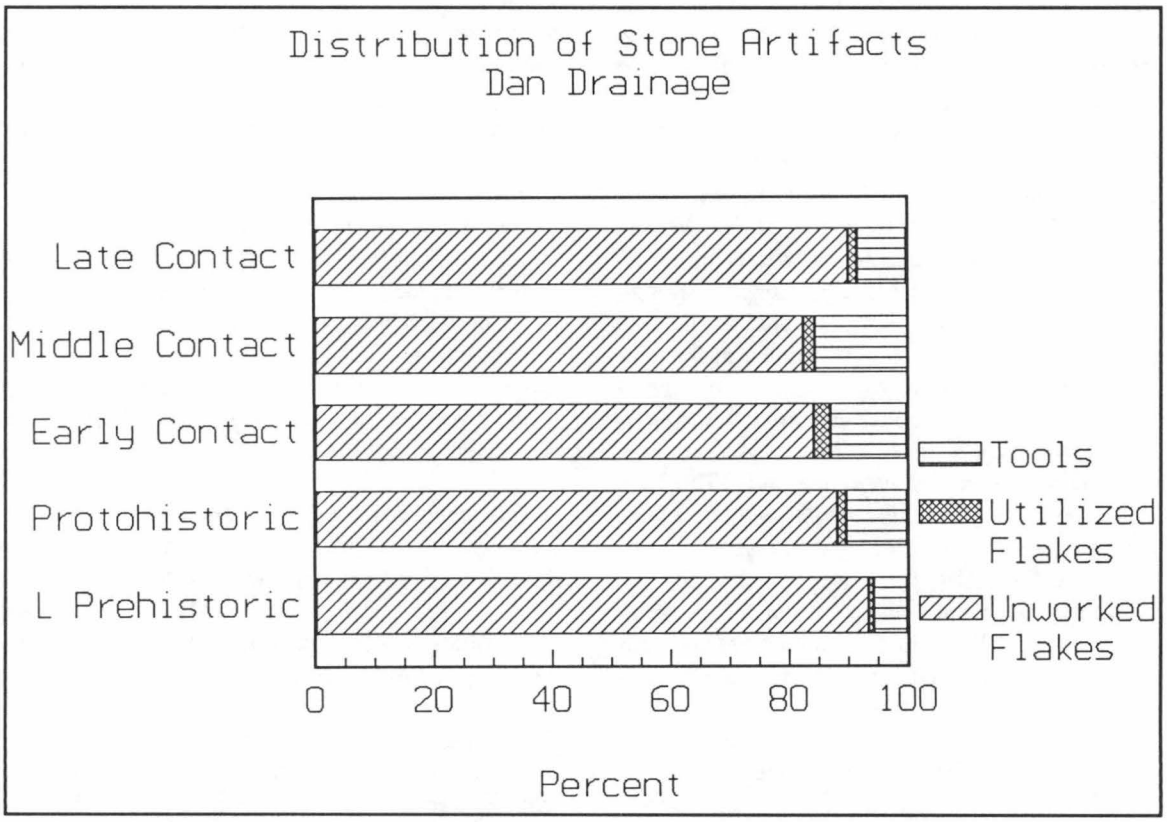

Figure A.7. Distribution of debitage and stone tools from sites in the Dan River drainage.

Table A.6. Percentages of gunflint types from sites in the Haw and Eno river drainages.

Period	Bifacial	Flake	Wedge-Shaped	French Blade	European Indeterminate	Frequency
Middle Contact (late)	15.2	12.0	55.3	13.4	4.1	217
Middle Contact (early)	28.6	71.4	-	-	-	7
Early Contact	14.3	57.1	28.6	-	-	7

Table A.7. Percentages of gunflint types from sites in the Dan River drainage.

Period	Bifacial	Flake	Wedge-Shaped	French Blade	European Indeterminate	Frequency
Middle Contact (late)	14.3	28.6	28.6	28.6	-	7
Middle Contact (early)	37.5	25.0	12.5	-	25.0	16
Early Contact	50.0	37.5	-	12.5	-	8
Protohistoric	33.3	66.7	-	-	-	3

the literature on eastern Indian sites, but given the widespread use of expedient flake tools, I doubt that the practice was rare.

Tables A.6 and A.7 show the percentages of gunflint types from all excavated contexts (including plowzone) from sites in this study. The bifacial and flake types of gunflints were aboriginally manufactured, while wedge-shaped (Figure A.8*e*) and blade (Figure A.8*f*) gunflints were manufactured in Europe. The distribution of gunflint types in the Piedmont follows the general pattern reported for the Northeast, with European-manufactured gunflints becoming the dominant type in the Late Contact period.

The large number of gunflints at the Late Contact Fredricks site is indicative of the degree to which the Occaneechis were involved in trade for European manufactures even after they moved to the Hillsborough area late in the seventeenth century. In 1673, Abraham Wood remarked on the quantity of firearms at their village site on the Roanoke River and suggested they could supply firearms to all groups within 500 miles (Merrell 1982:91). The quantity of gunflints in the Fredricks site assemblage and evidence of lead shot production at the site (see Carnes 1987) indicates that their affinity for firearms did not diminish over time. These factors clearly reveal that the Occaneechis were accustomed to owning and operating European firearms, apparently more so than any other group in this study.

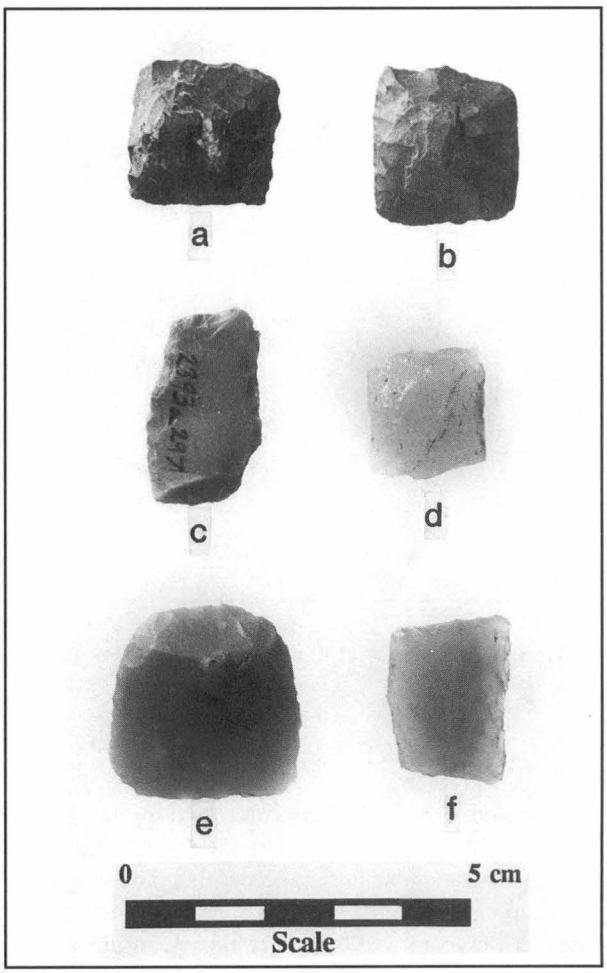

Figure A.8. Gunflints from piedmont Siouan sites.

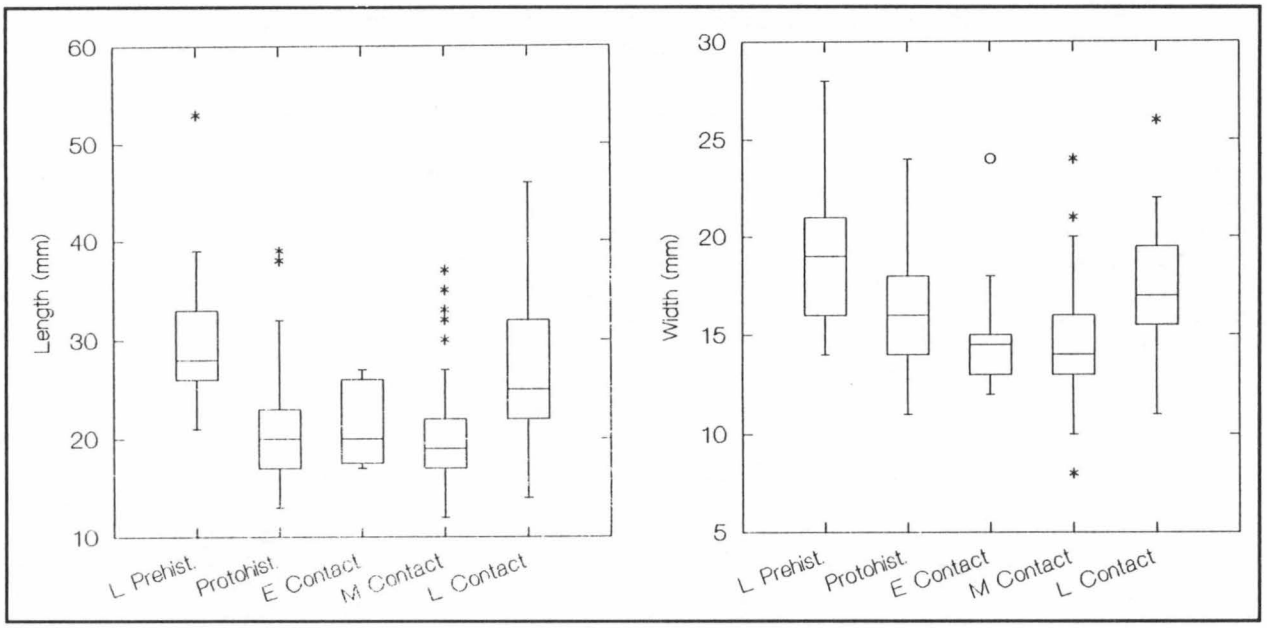

Figure A.9. Box plots of triangular projectile point length (left) and width (right) for the Haw and Eno river drainages.

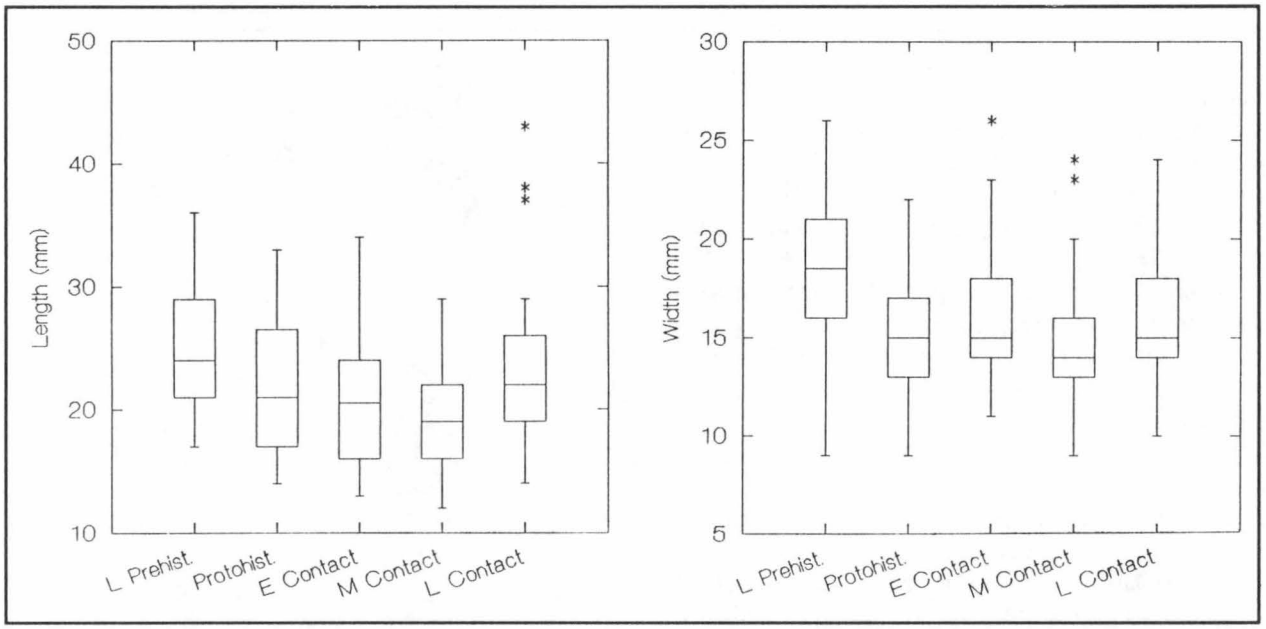

Figure A.10. Box plots of triangular projectile point length (left) and width (right) for the Dan River drainage.

Projectile Point Morphology

A second line of inquiry addressed in this study concerned changes in the manufacturing and morphology of triangular projectile points. The projectile point typology defined by Coe (1964) for the North Carolina Piedmont indicates a trend toward decreased size in triangular projectile points over time. The issue is re-examined here using the expanded data set produced by the Siouan project research.

Projectile Point Size

The box plots in Figures A.9 and A.10 present summaries of length and width for triangular projectile points from sites in the Haw-Eno and Dan drainages. The graphs indicate that the size of triangular points does change in a regular, patterned fashion. The general trend is toward smaller points from the Late Prehistoric through Middle Contact period. The trend

Table A.8. Distribution of triangular projectile point types from sites in the Haw and Eno river drainages.

Period	Biface		Retouched Flake	
	no.	%	no.	%
Late Contact	29	67.4	14	32.6
Middle Contact	80	37.7	132	62.3
Early Contact	5	25.0	9	75.0
Protohistoric	52	75.4	17	24.6
Late Prehistoric	28	84.9	5	15.1

Table A.9. Distribution of triangular projectile point types from sites in the Dan River drainage.

Period	Biface		Retouched Flake	
	no.	%	no.	%
Late Contact	27	31.0	60	69.0
Middle Contact	29	44.6	36	55.4
Early Contact	38	38.0	62	60.0
Protohistoric	24	52.2	22	47.8
Late Prehistoric	34	57.6	25	42.4

then reverses with larger points occurring at Late Contact sites. Most triangular points in Late Prehistoric and Late Contact assemblages are significantly longer and wider than those points manufactured during the interim periods. A comparison of the box plots also reveals that Late Prehistoric assemblages display the greatest variation in point size, while Middle Contact assemblages tend to display the least variation in size.

Projectile Point Manufacture

Tippitt and Daniel (1987:232) indicated that many of the projectile points in their data set were made from flakes rather than bifacial preforms. These points represent small flakes that have been shaped to form a triangle by unifacial or bifacial retouch along the margins (see Figure A.11). Tables A.8 and A.9 present the distribution of bifacial and "retouched flake" projectile points from the assemblages. Table A.9 indicates that in the Dan drainage there was a patterned change in manufacture from bifacial reduction to flake retouching over time. Most Late Prehistoric and Protohistoric projectile points were bifaces, while most later points were retouched flakes. In the Haw-Eno drainages the same pattern of change occurs from the Late Prehistoric through Middle Contact periods. However, 67.4% of points from the Late Contact period Fredricks site were bifacially manufactured. The Fredricks site projectile point assemblage deviates from the regional trends in terms of size and manufacture.

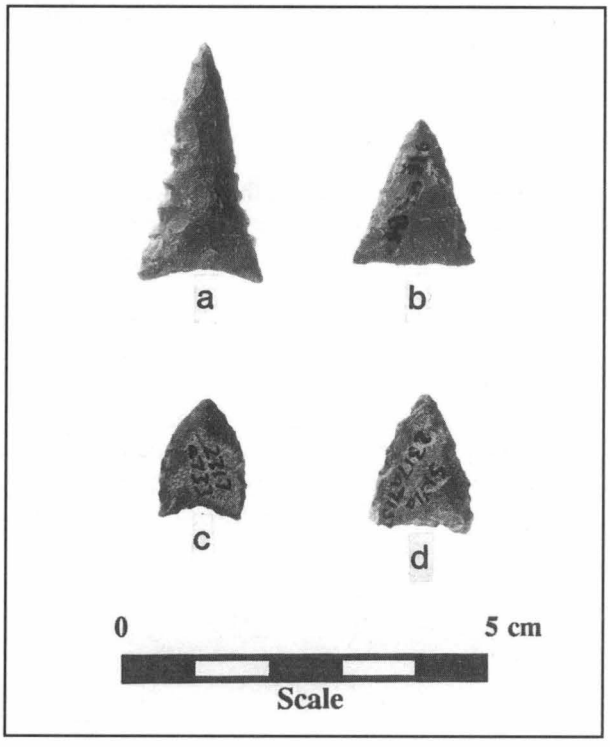

Figure A.11. Protohistoric bifacial projectile points (a-b) and Middle Contact retouched-flake projectile points (c-d) from piedmont Siouan sites.

Comments on Projectile Point Morphology

Middle Contact sites on the Piedmont produced large quantities of triangular projectile points that were very similar in size. The majority of these points

represent small, thin flakes with little edge modification. Previously, it was suggested that large quantities of points may have been required during the Middle Contact period for intensive hunting or defense against armed attack. The consistency in size and simplicity of manufacture of Middle Contact projectile points may have resulted from a "gearing-up" strategy in which many points were produced at a given time.

Triangular projectile points recovered from Late Contact period features at the Fredricks site tend to be larger than points from other contact period sites and, as a whole, the assemblage also displays greater variation in size. Bradley (1987:125) noted a similar pattern at historic Onondaga sites. He commented that by 1650 triangular point assemblages reflect a similar "eclectic diversity in both shape and material." The systematized production of projectile points during the Middle Contact period was not practiced at the Fredricks site. Triangular projectile points recovered from Late Contact period features most closely resemble Late Prehistoric points in regard to their size and manufacture. It is possible that the Occaneechis were recycling projectile points from earlier village sites. Located within a few hundred feet the Occaneechi village were earlier Late Prehistoric and Contact period village sites that may have served as potential sources for stone tools.

Coe's (1952, 1964) projectile point typology for the northern Piedmont includes the small, equilateral-triangle "Hillsboro" type for the Historic period. The Siouan project has provided the opportunity to refine this typology. The Hillsboro phase, recently demonstrated to be associated with the Late Prehistoric and Protohistoric periods, is characterized by well-made bifacial points, which corresponds well to the type defined by Coe.

The present analysis demonstrates that most Contact period sites in the northern Piedmont are characterized by less formalized triangular points that are simply flakes with retouched edges. Such projectile points are defined here as belonging to the *Jenrette Small Triangular* type. This triangular projectile point type becomes the dominant form after A.D. 1600 and is best represented by assemblages from the Middle Contact period. The Jenrette assemblage from the Eno drainage included 132 specimen with a median length of 19 mm, median width of 14 mm, and a median thickness of 4 mm. The artifact sample from 11 pit features at Upper Saratown on the Dan River contained 36 specimen with a median length of 17 mm, a median width of 14 mm, and a median thickness of 3 mm. The majority of these points are made from flakes of fine-grained metavolcanic materials, such as rhyolite and tuff, though some are made from quartz.

Conclusions

During the fourth quarter of the seventeenth century, the impact of European settlement in tidewater Virginia and the development of the Virginia-based fur and deerskin trade on native Siouan populations in the Piedmont was profound. This study suggests that during this period of rapid change, piedmont Indians modified their stone-tool technologies to meet the challenges and opportunities that were encountered. The pursuit of more intense, direct trade with the Virginia colony and the accompanying increase of intertribal hostilities during the Middle Contact period required the production of a great number of projectile points and small chipped-stone tools. To accommodate this increased production, tool forms were simplified and most were little more than retouched flakes.

Iron appears to have been a highly curated material at the Middle Contact Upper Saratown site and its use may be reflected in a decline in the frequency of cutting and scraping tools of stone. The incorporation of European metal tools and weapons during the Late Contact period resulted in a decline in the production and use of stone tools, especially at the Fredricks site. The tool types most affected by the incorporation of metal tools and weapons were projectile points and utilized or retouched flakes. This study indicates that there may have been a decline in the use of the bow and arrow and expedient stone tools after 1680 on the North Carolina Piedmont.

Appendix B

Paleoethnobotanical Evidence of Change and Continuity in Piedmont Subsistence

by
Kristen J. Gremillion

Archaeological investigations undertaken from 1986 to 1989 as part of the Siouan project produced a large body of paleoethnobotanical data from sites in the Eno, Haw and upper Dan river drainages. Collections of plant remains from these sites span the period from about A.D. 1000 to A.D. 1710. In conjunction with previous paleoethnobotanical research at the Fredricks, Wall, and Mitchum sites, the analyses of these data have focused on change and continuity in plant use by piedmont Siouans during the Late Prehistoric and Contact periods. One goal of the following discussion is to summarize the major conclusions obtained from these paleoethnobotanical investigations. An additional aim is to propose an evolutionary framework for explaining the considerable continuity that is reflected in archaeological evidence of plant use as well as aspects of cultural change.

The paleoethnobotanical data forming the basis for the interpretations presented here are discussed in detail in the earlier chapters of this monograph and in Gremillion (1986, 1987, 1988, 1989a). Full descriptions of laboratory methods and quantification procedures also appear in these sources. All analyses are based upon flotation sample results. All plant remains are represented by either actual or estimated quantities of material greater than about 0.7 mm in size. The use of estimated quantities avoids the bias created when ratios are based on values obtained using different sorting criteria (e.g., seeds sorted from all size classes compared to nutshell representing only 2 mm and larger fragments). For comparative purposes, site totals are used in most cases to examine temporal trends. Graphic presentations of these summary data order sites chronologically, but it should be pointed out that some sites probably were occupied concurrently and that the time intervals between site occupations vary. Where significant variation in quantity or sample size between features or feature types introduces potential bias into intrasite comparisons, this bias is discussed.

Several methods of comparison are employed; each of these has its own special applications, advantages, and disadvantages. Ratios of various kinds, including percentages and comparison ratios, can be used to measure the replacement of one item by another over time. Ratios of plant food quantities to quantities of wood charcoal are useful in that they account for the effects of different frequency of burning at sites (Miller 1988). Calculating density of food remains per unit volume of soil removes some of the bias introduced by different sample sizes. However, the use of density comparisons alone can lead to incorrect interpretations of differential plant use at sites that experience different rates of charcoal deposition (due, for example, to variation in population concentration). Calculating ubiquity (the percentage of samples or contexts in which an item occurs) is useful for simultaneously comparing more than two classes of plant remains that are quantified in different ways (e.g., numbers of seeds and grams of nutshell); however, this measure does not take quantity into account, and therefore has limited utility for comparisons of relative quantities of foods used as opposed to the frequency of their use (Popper 1988). Because of their unique strengths and weaknesses, each of these comparative techniques will be employed for specific purposes.

Three aspects of human-plant interaction have been identified as both potentially sensitive to contact-related change and accessible to paleoethnobotanical investigation (Gremillion 1989a). The first of these includes responses to temporal variation in availability of plant resources. One such response—the scheduling of subsistence activities—is likely to have been modified to reallocate more time and energy to deer hunting and other trade-related activities. The impact of any such trend on plant exploitation can be inferred from changes in the archaeological distribution of seasonally available taxa. In addition, seed assemblages may provide clues to patterns of periodic abandonment of sites as well as the seasonal round of plant utilization. Another relevant aspect of subsistence is the exploitation of the heterogeneous mosaic of vegetation that was available locally. Differential use of plant communities would change if disturbance of existing vegetation was intensified either directly by European travellers and colonists, or by modification of aboriginal land management techniques. The frequency of plant remains indicative of different community types (including agricultural fields and gardens) can be used to assess their importance as sources of plant foods. Both responses to seasonal and spatial variability in plant resources have consequences for diet composition, a third area of investigation. Diet composition would have been modified in response to factors such as depopulation (resulting in reduction in size of cooperative work groups) and the addition of introduced plants to the diet. A careful assessment of the subsistence importance of different plant foods over time is needed

to isolate any postcontact trends. Of various paleoethnobotanical indicators of change, the acceptance of new plants is the one easiest to interpret as contact-related. However, change and continuity in the use of indigenous seed crops and the relative importance of nuts and maize might have causal connections to aspects of contact that, though more subtle, are also worthy of investigation.

Seasonality and Scheduling

In temperate climates, plant resources vary in abundance during the year. This fluctuating pattern of availability calls for organized responses on the part of human populations, usually with respect to the scheduling of subsistence activities. Ethnohistoric accounts (Campbell 1959; Lefler 1967; Major 1849; Williams 1930) attest to the existence of regionally variable, cyclical subsistence patterns that matched group activities to plant availability and the work requirements of agriculture. Although the "seasonal round" of activities varied regionally, two features are common and would have been especially sensitive to the introduction of trade networks: the winter deer hunt and storage of plant foods.

Among some southeastern groups the attractions of wealth to be gained in the deerskin trade led to a temporal extension of the winter hunt (Wright 1981). Direct evidence of Contact period hunting patterns in the northeastern Piedmont is provided by the faunal record. However, we might also expect indirect effects of hunting patterns on plant use to be visible archaeologically. If the sexual division of labor among piedmont groups allocated most agricultural work to women, extended hunting forays by males would not necessarily affect planting or harvesting activities. However, if whole villages decamped for the winter hunt, scheduling conflicts could occur if the hunting season was extended at one or both ends.

If an extension of the winter hunt occurred, and if this activity took precedence over agricultural tasks, scheduling conflicts would reduce the subsistence importance of crops. Maize and other cultigens should therefore be relatively poorly represented at sites postdating the establishment of high-volume trade between the English and interior groups (e.g., at the William Kluttz and Fredricks sites). Variation in representation of cultigens as percentage of seeds and of plant food remains is considerable over time, with no clear pattern emerging (Figures B.1 and B.2). If quantities of maize are compared to quantities of wood charcoal in order to control for intersite variation in the frequency or duration of fires, the maize-to-wood ratio peaks at Lower Saratown, with sites both earlier and later exhibiting relatively low values (Figure B.3). For the upper Dan drainage alone, relative quantities of cultigens drop in the Late Saratown phase, whereas in the Eno and Haw drainages, they increase somewhat in the Fredricks phase. On the upper Dan especially, paleoethnobotanical evidence does not rule out the disruption of agricultural activities by scheduling conflicts. In all drainages, however, datasets representing the last aboriginal occupations of the Piedmont are limited in number. Decreased agricultural activity is at least plausible for the upper Dan. If it did occur, its causes were probably complex, though scheduling conflicts may have played a role.

Along with scheduling, the storage of plant foods is a common strategy for coping with seasonal fluctuations in resource availability. In the Southeast, maize, hickory nuts, acorns, and some fruits were often dried and stockpiled in subterranean pits or in above-ground cribs (Campbell 1959:15; Cumming 1958:13–15; Lefler 1967:23; Major 1849:74; Van Doren 1928:168, 321). Stores were consumed in late winter, spring, and early summer, when plant foods were relatively scarce in the environment.

The frequency and type of storage is partly a function of seasonal settlement patterns, and consequently should be sensitive to changes in scheduling stimulated by trade with the English. If subterranean storage is positively correlated with periodic site abandonment and the need for concealment (DeBoer 1988, Ward 1987), its frequency should be highest among populations with high mobility, such as historic piedmont populations actively engaged in deer hunting for trade. In fact, subterranean storage is fairly common at sites both early and late in the temporal sequence, with Hillsboro phase sites having the lowest frequency of storage pits (Gremillion 1989:84–85). Hillsboro phase sites also have the lowest percentage of seeds of plants that fruit primarily in spring and early summer (e.g., little barley, maygrass, bedstraw, strawberry, and bramble) (Figure B.4). This fact implies that spring and early summer activity at these sites (Wall, George Rogers, and Edgar Rogers) was less productive of seeds than activity during this time of year at either earlier or later sites. The three sites that cluster between about A.D. 1650 and A.D. 1680—Lower Saratown, Mitchum, and Jenrette—have the highest percentages of spring and summer seeds. In fact, their representation exceeds that expected if a hypothetical site were occupied year-round and equal quantities of seeds of each taxon deposited in features (about 20% spring/early summer and 80% late summer/fall)—a pattern exhibited by the Fredricks site. If the effects of sample size on seed occurrence are diminished by comparing numbers of seeds to soil volume, the same three sites still have the highest spring/summer seed percentage, although the differences between sites are generally of lower magnitude.

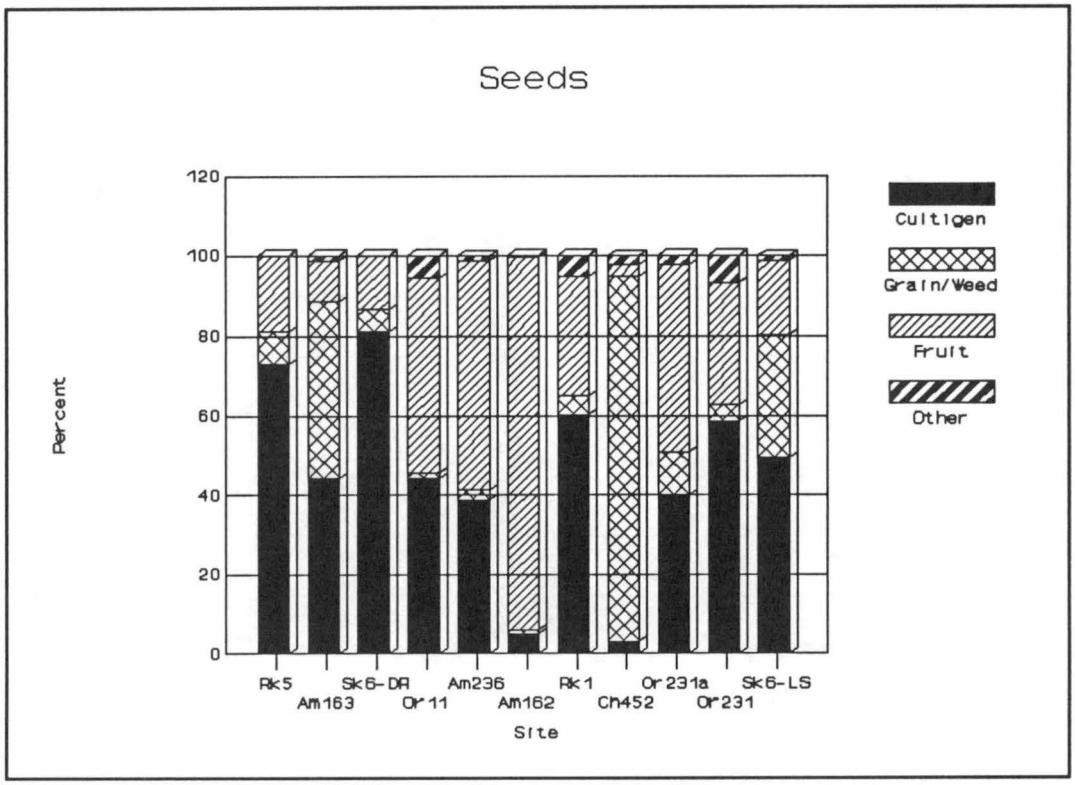

Figure B.1. Percentage distribution of identified seed categories by site.

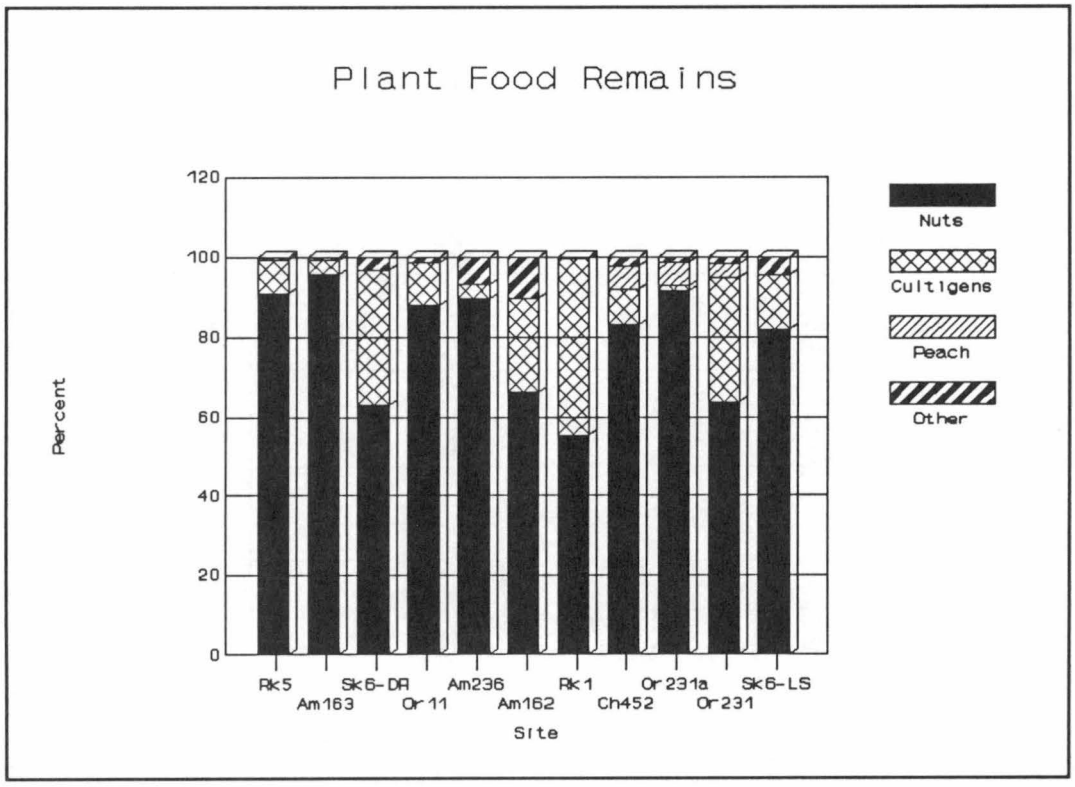

Figure B.2. Percentage distribution of plant food remains by site.

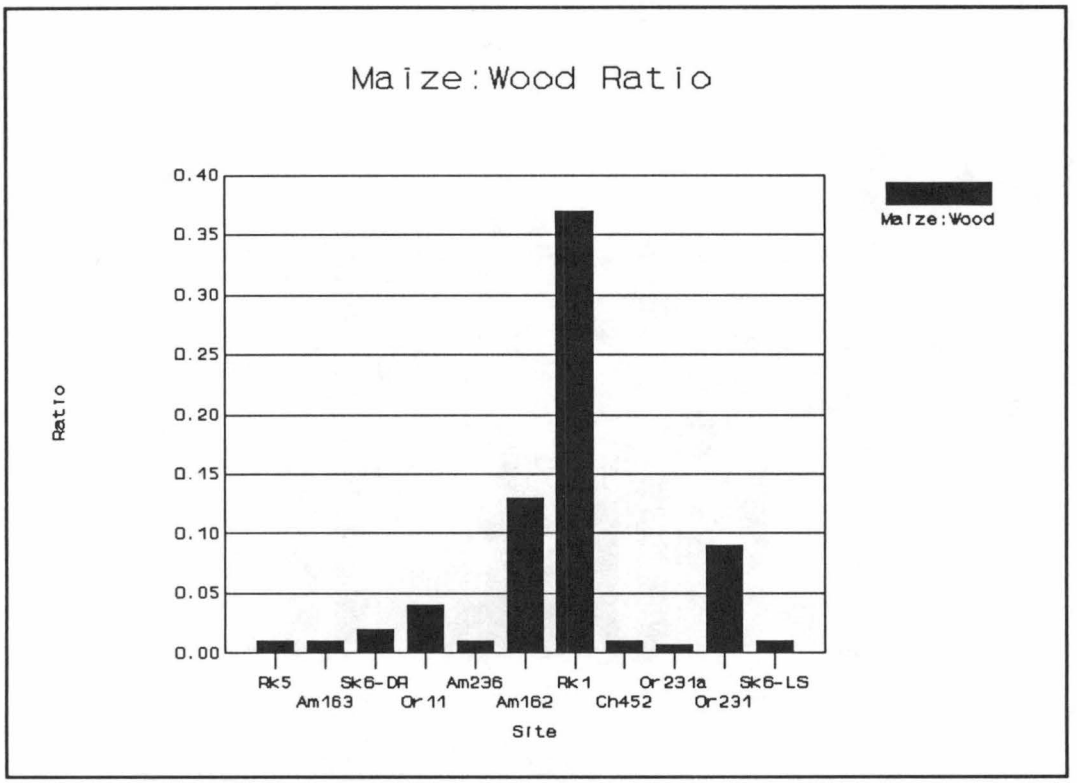

Figure B.3. Ratios of maize weight to wood weight by site.

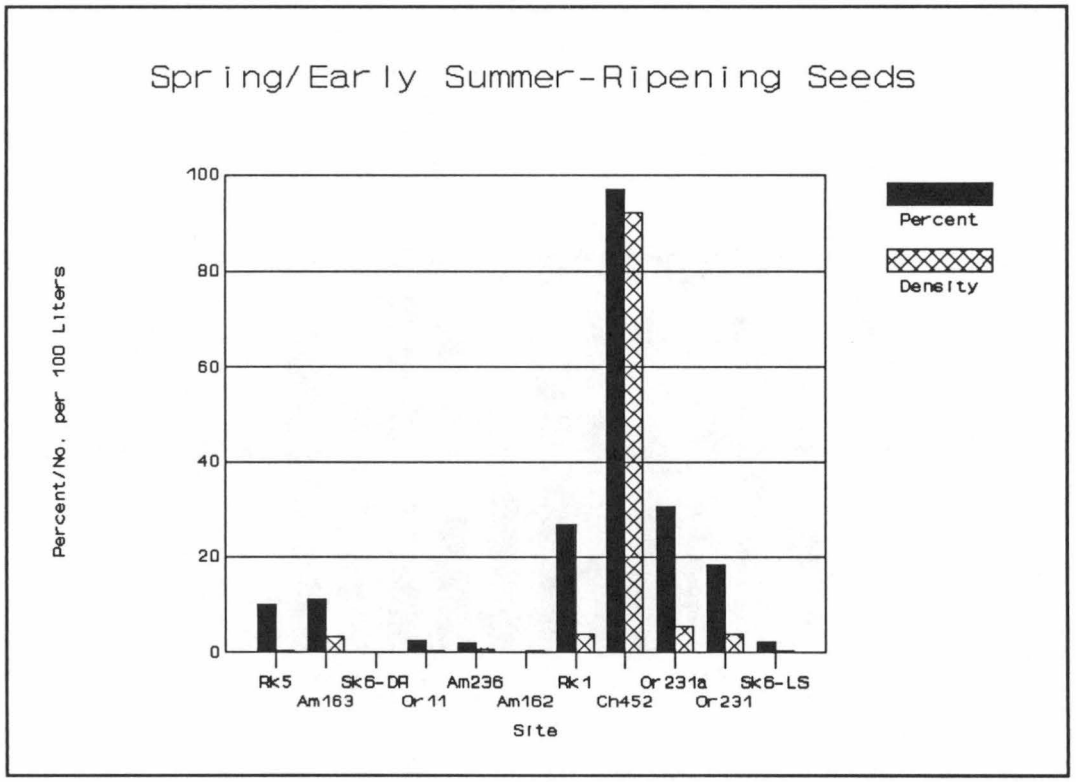

Figure B.4. Percentage and density distributions of spring/early summer-ripening seeds by site.

If seasonal abandonment of Hillsboro phase sites was uncommon, as the low frequency of concealed storage facilities seems to indicate, why do their seed assemblages not reflect a balanced deposition of seeds year-round? A plausible explanation for this pattern is that only some individuals remained at these sites during spring and early summer, providing protection for surplus stored in granaries. If most of the population did not return until after spring planting, spring and summer seeds should be limited in quantity. Reaggregation before that time, however, would have produced seed profiles more like most of the later sites. The absence of seeds which ripen during the late fall, winter, and early spring reflects seasonal patterns of production in the environment and cannot be used to infer either human presence or absence from a site. The relative abundance of spring and summer seeds at Mitchum, Fredricks, Lower Saratown, and Jenrette indicates that food processing did take place at these sites during those seasons. However, this evidence does not preclude site abandonment from about November to March.

A common response to food scarcity among hunter-gatherers and subsistence agriculturalists is to expand the diet to include less desirable foods (Colson 1979). In the eastern United States, spring and early summer was a time of plant food scarcity between harvest and mid-summer, when most fruits began to ripen. Fishing was a common springtime activity that served to supplement dwindling supplies of maize and nuts (Lefler 1967:162; Major 1849:73). In addition, small grains were sometimes planted (Major 1849:73). Most groups presumably had knowledge of a set of alternative foods and subsistence activities that could be brought into play when primary resources had limited availability (White 1983:30).

Archaeological evidence for the use of secondary resources during the lean season is available from the Mitchum site. There, a single feature contained large numbers of maygrass grains, accompanied by smaller quantities of little barley. These two "cool-season" grasses utilize stored energy from the previous year to fuel a growth spurt (Doebley 1984). They fruit in April, May, and June, long before most grasses and other food plants are ready to eat. This pattern of availability is partly responsible for their importance prehistorically in Kentucky (Cowan 1978, 1985) and Illinois (Asch and Asch 1985). Recently, these two plants (which often occur together in archaeological deposits) have been reported from the North Carolina mountains (Gremillion 1989d), western Piedmont (Gremillion 1989c), and the outer Coastal Plain (Paul Gardner, personal communication 1989) in contexts ranging from the Middle Woodland to Contact periods. At Mitchum, the feature that produced the largest quantities of little barley and maygrass contained only spring and summer seeds (Gremillion 1989a). This deposit indicates harvesting of these two plants (which were probably crops, judging by their history as such elsewhere in the East) early in the year, when other foods were scarce and stores were possibly dwindling.

Because Mitchum is a relatively late site and contains abundant peach (an introduced plant), it illustrates the survival into postcontact times of a traditional strategy for coping with food scarcity. None of the other sites contain such compelling evidence of this pattern, although small quantities of maygrass and/or little barley were recovered from the Holt and Edgar Rogers sites, and from the Dan River phase component at Powerplant (Gremillion 1989a). Little barley and maygrass have not been found at Contact period sites other than Mitchum. The strategy of harvesting native grasses was employed at least occasionally in the Piedmont before the Contact period, judging by the occasional deposition of grains. The Mitchum site's large quantities may reflect an unusual incident of preservation (e.g., a basket of grains spilled into a fire). Alternatively, the Mitchum site population may have experienced unusual levels of dietary stress, and so resorted to traditional "second line" foods.

Summary

In general, the paleoethnobotanical evidence is rather inconclusive regarding changes in seasonal use of plant resources. The percentage of cultigens declines somewhat in the upper Dan drainage from the Middle to Late Saratown phases, a change expected if (but not only if) trade-related activities conflicted with agricultural tasks. The ratio of maize to wood, however, does not indicate such a trend. Disruption of agricultural activities in the Contact period is best considered as a plausible, but unconfirmed, hypothesis. Paleoethnobotanical data shed little light on the question of seasonal site abandonment. Although the representation of spring/summer seeds contrasts considerably between certain Late Prehistoric and Contact period sites, this variability has no relevance to absences in the winter and early spring, when seeds of non-stored foods are not likely to make their way into the archaeological record under any circumstances. Use of stored foods early in the warm season was sometimes supplemented by native grasses. These grasses are associated with a prehistoric agricultural tradition in the East and were utilized as seasonal resources even after maize became the dominant cultigen in the Piedmont. Use of native grasses occurred at least sporadically both prehistorically and historically. Their high visibility at Mitchum, along with relatively low quantities of maize and nutshell (Gremillion 1989a), may indicate unusual dietary stress during the season of plant food scarcity.

Responses to Spatial Heterogeneity

Resources are unevenly distributed in space as well as in time. Plant communities in the Piedmont ranged along a continuum from minimally disturbed to heavily disturbed, with relatively mature forest communities at one end and highly managed, anthropogenic communities like fields and gardens at the other. Although the precise distribution and extent of various plant communities in the past cannot be determined, some assumptions can be made regarding the prevalence of disturbance. While human alteration of vegetation had not reached today's levels, anthropogenic—that is, human-created—habitats such as gardens, fields, and old fields were probably important components of the landscape.

Both theoretical and empirical studies in community ecology emphasize the relatively high productivity of early successional communities—that is, ones that have recently been disturbed by human activities or natural causes. Disturbances create extensive boundaries between plant communities, thereby increasing local species diversity (Runkle 1985). Plants that colonize disturbed, ecologically open habitats typically display a reproductive strategy oriented toward rapid reproduction of large numbers of offspring (Horn 1974). Even plants adapted to more mature communities tend to be more productive in successional habitats (Yarnell 1982). The production of edible seeds and fruits by such species enhances the value of successional communities to humans. Their attractiveness for game animals as well as human populations accounts for the deliberate disturbance of existing vegetation by Indians. The use of fire as a tool for creating and maintaining disturbed communities has been amply documented for the Southeast (Hammett 1986). These facts indicate that human-disturbed plant communities were probably common and frequently utilized by piedmont groups.

In the eastern United States, European settlement had various effects on vegetation. In New England, both the disturbance of forests by encroaching settlers and loss of old fields as the native population declined altered the abundance of plant resources (Cronon 1983). Both direct and indirect effects of contact on vegetation (and, ultimately, on plant use) might be expected in the Piedmont as well. If either European settlement or aboriginal hunting and gardening patterns caused an expansion of anthropogenic habitats, such changes should be visible archaeologically. The assumption is made that representation of plants from a given habitat in cultural contexts indicates to some extent the spatial extent of that habitat locally as well as human exploitation of it.

Comparison of the density and ubiquity of plant taxa from different community types supports the contention that subsistence activities placed considerable emphasis on disturbed habitats and forest edges (Gremillion 1989a). This bias is evident throughout the temporal sequence. Although forest taxa make a strong showing at most sites, the nut trees that account for most of the identifications counted are actually much more productive in open situations in full sun than beneath a closed canopy (Munson 1986, Yarnell 1982). Weed and edge taxa vary in representation between sites, but there is no clear directional trend.

Certain species are particularly good indicators of the presence, and perhaps the relative abundance, of disturbed plant communities. Maypops, which produces an astringent citrus-like fruit, frequently colonizes agricultural fields, old fields, and other open habitats. Its frequency at sites in the Southeast increases along with that of cultigens and woody taxa that prefer disturbed habitats (Gremillion 1989b). Maypops is most abundant at contact sites and absent from most prehistoric sites in the Piedmont (Gremillion 1989). This pattern may in fact indicate increasing disruption of plant communities by human groups, incidentally creating more prime habitat for maypops. The presence of maypops at the Wall and Lower Saratown sites indicates the likelihood of a precontact origin for the intensified disturbance of vegetation that becomes more evident in Contact period assemblages. Sites with abundant maypops also produced the largest paleoethnobotanical samples, a fact which also may explain some of the variability in its representation.

Any direct impact of European settlement on vegetation patterns in the Piedmont was limited by the considerable spatial distance between aboriginal villages and English farms and towns. Permanent European settlement of the Piedmont did not commence until about 1740, after the latest of the Siouan project sites had been abandoned (Robinson 1979:176). Before that time, aboriginal land management had more local environmental impact than the wanderings of European traders, surveyors, and explorers.

Summary

Piedmont populations favored disturbed vegetation communities as sources of plant foods. Most of the fruits and all of the crops they utilized grew in such habitats. Deliberate attempts to maintain vegetation at early stages of succession enhanced the subsistence potential of scrub communities, forest edges, and old fields. Agriculture was an extreme form of management resulting in a highly artificial ecosystem that required human intervention in order to persist. Anthropogenic and other disturbed communities remained both extensive and important as sources of plant foods. The occurrence of maypops at late sites may indicate increased disturbance of vegetation; however, its presence is not restricted to sites with evidence of contact and may be partly a reflection of the larger sizes of paleoethnobotanical samples from later sites.

Diet Composition

Responses to temporal variability and spatial heterogeneity in resource distribution structure subsistence behavior and therefore influence diet composition. In addition, the number and types of plant resources used and their relative importance for a particular population are a function of other immediate environmental and historical factors such as the introduction of new plants. Other aspects of diet composition, such as the relative importance of various plant foods, would have been potentially sensitive to environmental change. Paleoethnobotanical evidence of diet composition in general should therefore be examined for temporal trends during the Contact period.

Acceptance of Old World domesticates occurred throughout North America as European exploration and settlement proceeded. In the northeastern Piedmont, only two occur archaeologically. Watermelon was found only at Fredricks and Upper Saratown (Gremillion 1989a). Its limited occurrence archaeologically is in part due to the fact that its seeds were unlikely to have been carbonized in fires, and its rind is too fragile to survive burning. However, ethnohistoric documents attest to the popularity of watermelon among Indians of the eastern United States (Blake 1981; Campbell 1959). The other plant adopted by piedmont groups was the peach. Although it always co-occurs with trade goods, peach probably diffused independently of direct contact between Indians and Europeans. Although some direct trade occurred between Europeans and interior groups in the seventeenth century, indirect trade through native middlemen predominated before the late 1600s (Waselkov 1986, 1989). Peach, first introduced to Florida and Georgia by the Spanish in the 1500s (Ruhl 1988; Sheldon 1978), probably moved by the same means, if not by way of precisely the same networks. Peach often escapes from cultivation and thrives without human assistance, a fact that contributed to its spread amongst Indian groups.

Peach is found in the Eno and Haw drainages at sites postdating about 1650 (Figure B.2). In contrast, no peach was recovered from most sites in the upper Dan drainage, although it was quite abundant at the Upper Saratown site (Wilson 1977). Since peach is a low-cost resource and in fact was adopted on the upper Dan River by the late seventeenth century, it seems unlikely that it would not have been utilized if available. Trade assemblages are similar at sites both with and without peach pits (such as the roughly contemporaneous Mitchum, Jenrette, and Lower Saratown sites). However, foods might have been exchanged by different means than ornaments were. Before 1670, more southerly groups living in the Eno and Haw drainages may have had greater access than the Sara to trade networks linking aboriginal groups indirectly to Spanish sources. Such a pattern would explain the earlier appearance of peach at the more southerly sites (Gremillion 1989a). Length of site occupation is also relevant, since several years' growth are required before fruits are produced.

Despite its popularity, peach was not a staple food. Its incorporation into the diet did not necessitate changes in scheduling or abandonment of traditional foods. Both peach and watermelon germinate spontaneously and grow well with minimal husbandry. Peach trees can produce fruit within three to five years after germination, yielding rapid returns for a very low (or even nonexistent) initial investment. Both species had aboriginal analogues (various fruit trees and cucurbits, ecologically similar to peach and watermelon, respectively). Thus, incorporation of these species into the diet took the form of the incorporation of new elements into an existing pattern. The abundance and variety of fleshy fruit seeds at Contact period sites (Gremillion 1989a) indicates that neither of the newcomers replaced other foods, although they may have modified the relative importance of some fleshy fruits. Neither introduced domesticate was a staple; both were productive and low-cost additions to a largely traditional suite of plant foods.

Other than the addition of these two novel resources, the same types of plant foods were used by piedmont Indians before and after contact. The number of resources used deserves scrutiny because of indications that among some groups, diet expansion or contraction occurred in response to European-caused game scarcity, depopulation, and other contact-related factors (Merrell 1982; Cronon 1983). Comparison of the richness of plant food assemblages—that is, the number of taxa recovered—is complicated by the fact that richness in paleoethnobotanical assemblages is often positively correlated with sample size (Leonard 1989). Comparison of number of taxa and sample size (measured as soil volume) for 11 Siouan project sites produced a high positive correlation between the two variables ($r=.898$, $p=.001$). Fredricks had an unusually strong influence on this statistic. Removal of this case from the sample resulted in a lower, but still significant, positive correlation between sample size and richness ($r=.628$, $p=.05$). Thus, it can be concluded that sample size has a considerable effect upon the richness of paleoethnobotanical assemblages at Siouan project sites. If sample size variability is controlled by comparing number of taxa to soil volume, the resulting pattern is one of greatest richness at two late prehistoric components—the Dan River phase occupation at the William Kluttz site and the Haw River phase occupation at the Holt site (Figure B.5). Other sites have similar values for the most part and, with the exception of the late Saratown phase compo-

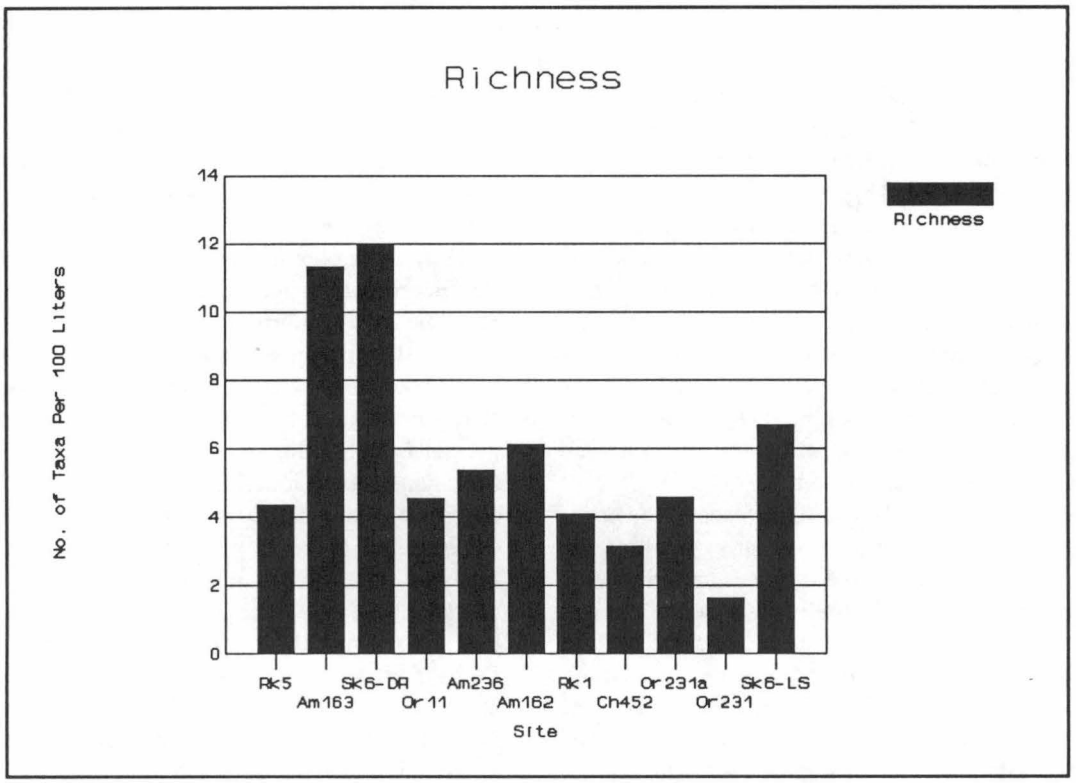

Figure B.5. Richness of plant remains by site.

nent at the William Kluttz site, tend to decline approaching the latter end of the temporal sequence.

What might explain this variability in number of plant resources? First, it is important to note the unevenness of this apparent trend, indicating fluctuation as well as directional change. Where a decline in resource richness is apparent, several explanatory hypotheses can be proposed. Human populations tend to add resources to the diet as population expands, until the point is reached where intensification of one or a few resources is necessary (Christensen 1980). Although the effects of declining population on diet breadth are seldom studied, the opposite response might occur if population trends were reversed. If, in fact, population decline does stimulate narrowing of diet breadth, a decrease in the number of plant resources used by piedmont populations might reflect a response of reduced populations to reduced energetic and caloric needs. Smaller communities would be able to meet these needs by using only the most highly ranked resources. Involvement in trade might also be expected to result in a narrowing of the resource base if some seasonal subsistence activities were abandoned (Cronon 1983). Loss of traditional information about "second line" plant foods as older people died in large numbers would also limit the use of relatively low-ranked resources.

Even if some of the samples from later sites have fewer plant resources than might be expected given their large size, the variety of fleshy fruits, nuts, and cultigens represented is considerable. Fredricks and Lower Saratown both produced most of the plant foods represented at earlier sites in the region (Gremillion 1989a). If any plant resources were dropped from the diet, they cannot be identified until larger samples from earlier sites are available.

The traditional staple foods, cultigens and nuts, remained important throughout the temporal sequence. Maize was the most important crop, although common bean and pepo were also grown. Bottle gourd, identified at the Jenrette site, provided containers. There is little indication of long-term change in the representation of maize or of cultigens in general. Various measures of their subsistence importance suggest differences between sites which, translated into a diachronic framework, imply fluctuation rather than any directional trend (Figures B.1 to B.3). Cultigens increase in relative quantity in the upper Dan drainage between pre-A.D. 1100 (i.e., Powerplant site) and post-A.D. 1200 (i.e., Dan River phase component at the William Kluttz site) occupations. This finding supports the plausibility of intensification of maize agriculture after about A.D. 1350 (Davis and Ward 1989) although more samples from earlier components are needed to thoroughly assess this development.

Nuts were also a staple food source. Of the nutshell types recovered, hickory shell is especially durable and probably was often preserved during the processing of

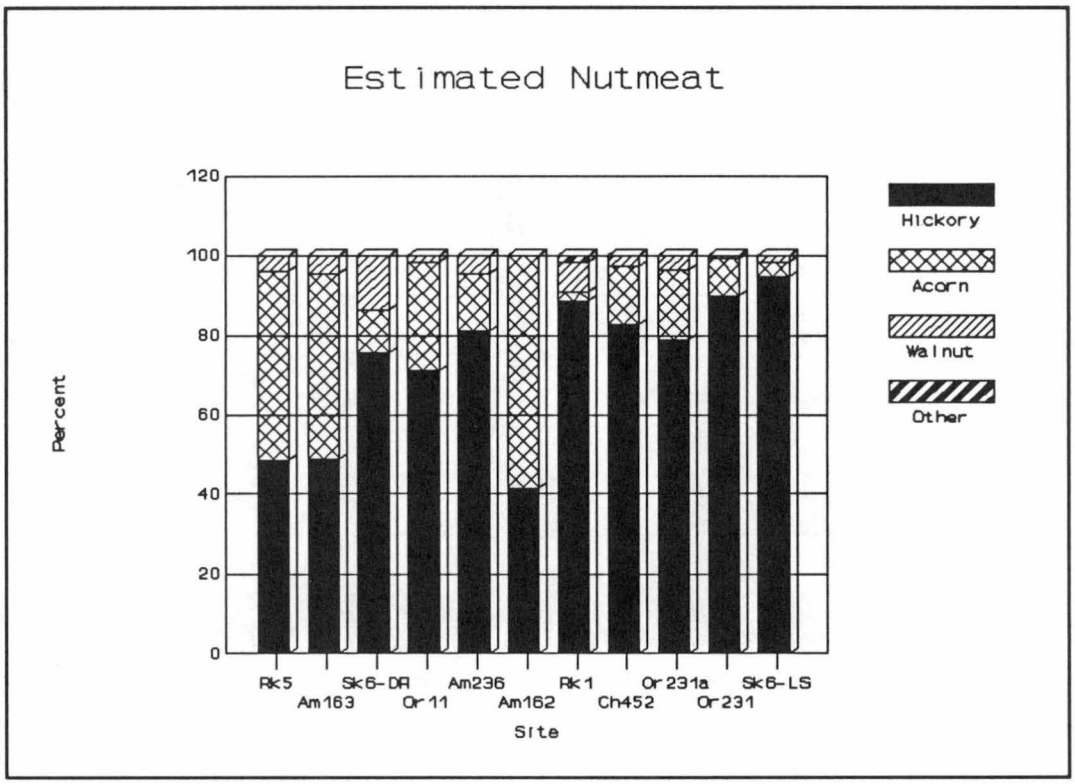

Figure B.6. Percentage distribution of nut types (based on estimated nutmeat quantiles) by site.

hickory "milk" (Major 1849:129; Williams 1930:439). Acorn is found in a high percentage of features at most Siouan project sites, but its quantities are often rather low (Gremillion 1989a). Acorn shell fragments easily and has a higher meat-to-shell ratio than hickory. Consequently, relative quantities of hickory and acorn shell are not good indicators of their relative subsistence importance. One way to adjust for different food-to-nonfood ratios is to convert nutshell quantities to estimated nutmeat quantities using percentage waste figures provided by Watt and Merrill (1975). Resulting percentages of all nut types based on these estimated food quantities are presented in Figure B.6.

Even considering adjustments for its high meat-to-shell ratio, acorn is increasingly replaced by hickory. This trend is especially clear in the upper Dan drainage (Gremillion 1989). Conversion factors that assume a higher meat-to-shell ratio for acorn, such as Yarnell and Black's (1985), would result in acorn being better represented than hickory at most sites. The relationship between hickory and acorn is difficult to interpret, but the two were probably of similar importance in both drainages prehistorically. The use of these two resources presumably fluctuated along with year-to-year variation in productivity. The replacement of acorn by hickory seems to have begun before contact and may be the local manifestation of a trend that coincided with the development of maize as the primary crop plant of the region. Acorn, which is nutritionally similar to maize (being high in carbohydrates and low in protein) but more expensive to process than hickory, was largely replaced by hickory in Mississippian times (Gremillion 1989a:246; Yarnell and Black 1985).

The relative importance of maize and nuts is difficult to assess due to differences in preservation potential; however, changes in the relative abundance of these two types of food can be traced over time by comparing quantities directly. Variability in the maize-to-nutshell ratio between sites is considerable (Figure B.7). Over time, the relative abundance of these two types of food remains fluctuates without displaying a clear directional trend. Nuts (especially hickory which gained importance in the Contact period) and maize were nutritionally complementary. Hickory nuts are high in protein and fat, whereas maize and other starchy crops are high in carbohydrates (Gremillion 1989a:246). Despite the high potential productivity of maize agriculture, mast resources were not abandoned in its favor, probably due to the nutritional qualities of the latter and the fact that their collection did not necessarily conflict temporally with crop harvests.

Unlike nuts, indigenous seed crops were largely replaced by maize. Sumpweed and sunflower seeds of cultigen size (Yarnell 1978; B. Smith 1987) were found at both early and late sites, but only in small quantities. The sumpweed from Jenrette is the latest archaeological occurrence of this now-extinct domesticated variety of *Iva annua*, once an important crop in the eastern

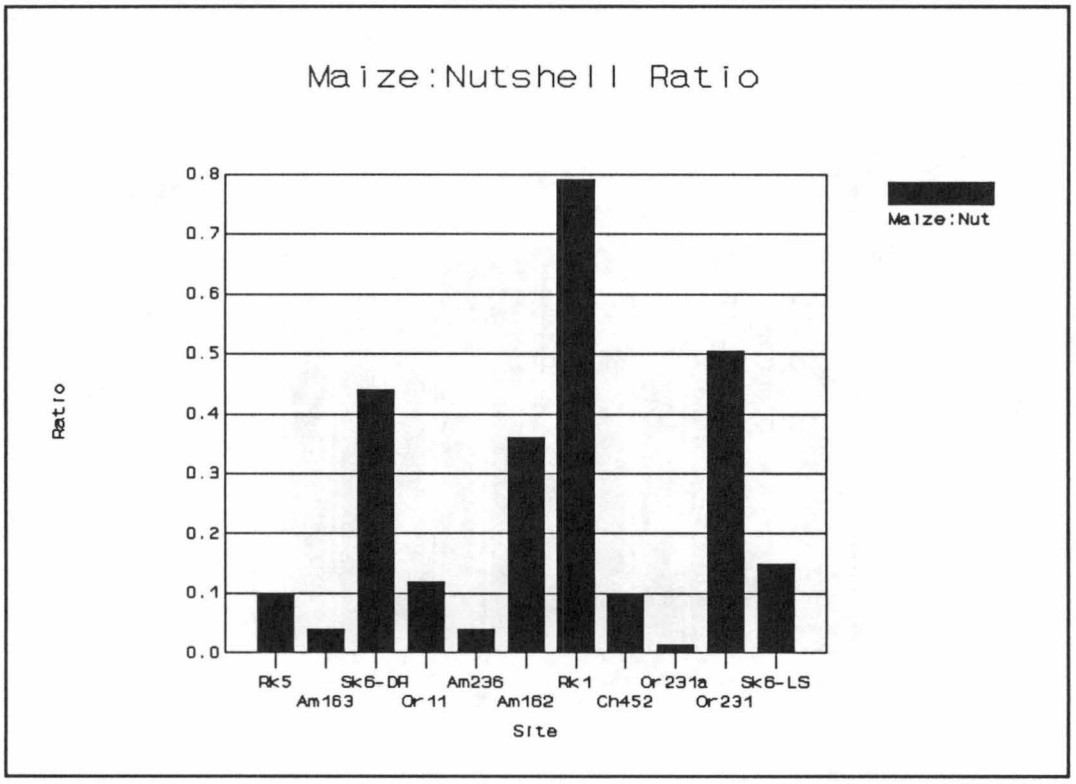

Figure B.7. Ratios of maize to nutshell by site.

United States before the introduction of maize (B. Smith 1987). Maygrass and little barley also occur at several Siouan project sites, but only in small quantities except at Mitchum.

It is impossible to determine whether indigenous eastern North American crops declined in importance after the introduction of maize without knowing more about their subsistence role during the Early and Middle Woodland periods. We know that little barley and maygrass were utilized at 31Ce41 in Cherokee County, a site whose Middle Woodland component otherwise indicated a strong focus on hickory nuts and no utilization of cultigens (Gremillion 1989d). In central Tennessee, northern Alabama, Kentucky, and west-central Illinois, indigenous seed crops including sunflower, sumpweed, little barley, maygrass, and chenopod were utilized as early as the Late Archaic period. By the Early and Middle Woodland periods, agricultural systems based upon these crops had become well-established in many parts of the Eastern Woodlands (B. Smith 1987). Whether or not piedmont populations participated in the development of these systems will remain in doubt until the relevant paleoethnobotanical work is done. However, evidence from the Siouan project indicates no post-contact trends in the utilization of indigenous crops except perhaps some evidence that they were more persistent in the Eno and Haw drainages than along the Dan (Gremillion 1989a:204). Sunflower and sumpweed, if they were ever important, probably were replaced to a large extent by maize as its productivity increased. Maygrass and little barley were more likely to retain importance due to their role as lean-season resources.

Summary

During the Contact period, piedmont populations added at least two new plant to the existing resource base. Although resulting in a minor expansion of diet breadth, adoption of these domesticates did not necessitate re-ordering of subsistence priorities. There is some evidence of declining richness of plant resources. Such a change would be expected given a loss of traditional information about useful plants or a decline in population. A variety of ecological and demographic factors might produce a similar narrowing of diet breadth. Despite this apparent change, Contact period sites exhibit a varied set of plant resources. Both maize and nuts remained important, though acorn was replaced to some extent by hickory. This trend was probably initiated prior to contact. Indigenous crops were only used occasionally in the Late Prehistoric and Contact periods, although maygrass and little barley were seasonally important for at least some populations. Whatever their subsistence role before about A.D. 1000, indigenous seed crops were utilized at least occasionally thereafter. Their persistence in the Contact period is more evident at Eno and Haw drainage sites than on the upper Dan.

Discussion and Conclusions

Overall, considerable continuity in plant use is evident at the Siouan project sites. Scheduling of subsistence activities and storage of plant foods followed seasonal fluctuations in resource availability. Late summer and fall were peak times for harvesting, collection, and processing of plant foods. Successional plant communities were exploited more extensively than less disturbed vegetation. Although the relatively mature forest contained oaks and hickories, these taxa were more productive in open habitats. Throughout the period studied, cultigens (especially maize) and nuts were staple foods and various fleshy fruits provided dietary supplements. Indigenous eastern North American seed crops were used occasionally, perhaps in times of dietary stress. The two introduced species that were readily adopted cost little to produce and had ecologically similar analogs among the aboriginal suite of cultigens.

Despite the continuation of this basic plant-use pattern, possible shifts in seasonal mobility and diet are suggested by paleoethnobotanical evidence. Reduced mobility during the Hillsboro phase may be indicated by the relatively low frequency of storage pits. Seed assemblages cannot confirm or refute this hypothesis of village abandonment during the winter months, but do indicate some activity at most sites between March and November. Although intensification of deer hunting stimulated by cross-cultural trade would result in the increased mobility suggested by the prevalence of storage pits, so might other settlement shifts not associated with contact. The fact that late prehistoric populations utilized subterranean storage emphasizes the potential importance of such alternative explanations. Fluctuation in deer populations or cessation of hostilities with other groups, for example, would have been likely to stimulate seasonal abandonment of villages.

Inferred changes in diet composition can be explained largely in terms of relative costs and benefits. Both introduced crops were inexpensive to produce and neither was a staple. Their addition did not entail the exclusion of traditional foods from the diet or changes in the scheduling of subsistence activities. Although a product of intercultural exchange, the adoption of peach and watermelon does not indicate a systemic change in piedmont subsistence as a result of contact.

An apparent decrease in richness of the plant resource base might be more revealing of complex cultural change. Assuming this trend is empirically valid, it reflects some narrowing of diet breadth. Since diet breadth tends to expand as population grows, it might be expected to narrow somewhat as a result of population decline such as that which affected piedmont populations in the late seventeenth century. Loss of cultural information as older individuals died in unusually high numbers, accompanied by social disruption and group fragmentation, would also act to limit the resource base to highest-ranked and best-known plants.

The declining importance of acorn and the limited use of native crops were trends that were probably initiated before contact. Both are related to the intensification of maize agriculture. Maize is both highly productive and nutritionally similar to acorns and starchy grains such as chenopod. In addition, acorns are relatively costly to process compared to hickory. The oily grains—sunflower and sumpweed—are more rich in protein (although of low quality) than maize, a fact which may explain their continued occasional use.

The most evident changes in plant use in the project area are explicable in terms of cost functions. But how can the considerable continuity in subsistence in the face of extensive environmental change be explained? At the very least, trade goods and new exchange networks, and later disease and depopulation, should have had devastating effects on aboriginal subsistence. In evolutionary terms, the presence of Europeans created a series of environmental perturbations. Modifications of environmental conditions typically change selection pressures, which ultimately results in the alteration of trait frequencies and perhaps establishment of a new cultural pattern.

Thus the explanation of cultural continuity becomes necessary. Theories of cultural evolution such as that of Boyd and Richerson (1985) provide a useful framework for explanation of both continuity and change. Boyd and Richerson's approach contrasts with the adaptation-oriented models frequently found in the archaeological literature (Leonard 1989) by emphasizing evolutionary processes such as selection and the cultural analogs of gene drift and gene flow. Their model also incorporates distinctive cultural evolutionary processes such as the inheritance and transmission of traits acquired through learning. This selection-oriented approach avoids some of the pitfalls encountered when directional selection resulting in adaptation is used as the basic explanatory model. It might prove particularly useful for the Piedmont, where an adaptation-through-acculturation model seems to be inappropriate.

Overall continuity in key aspects of subsistence can be examined first in terms of the primary types of evolutionary forces at work. Change is never inevitable. Boyd and Richerson emphasize the importance of "cultural inertia"—that is, the tendency of historical patterns to be replicated in cultural trasmission. Cultural traits may be selected from the available pool of information due to direct experience of the benefits of different variants, the association of traits with successful individuals, or frequency of traits. Collectively, these processes are termed "biased transmis-

sion." However, biased transmission and guided variation (the transmission of traits acquired through learning) are generally weak. Many studies in the social sciences point toward the strength of cultural inertia (Boyd and Richerson 1985:56–60). If we accept that cultural information tends to be transmitted with little modification between generations, the conservatism of piedmont groups with respect to so many elements of European influence becomes more understandable. Experience of material goods and plants and their benefits resulted in their adoption. Otherwise, traditional cultural information (about social organization, values, and subsistence) was to a large extent maintained.

Selection is another key process in cultural evolution, but one that does not inevitably result in change. Stabilizing selection is an important force in genetic evolution. In a relatively stable environment, populations achieve a reasonably good "fit." In these situations, directional selection slows down or ceases entirely. In nature, environments fluctuate but at varying rates and degrees of magnitude, sometimes allowing stabilizing selection to dominate. For example, the maintenance of a varied set of plant resources might have been favored due to its risk-reduction attributes. Too great a decline in the number of plant resources included in the diet would have subjected populations to nutritional stress and failure to cope adequately with the natural environment. As a consequence, selection favored maintenance of a diverse resource base and transmission of cultural information about its value and use.

Overall, directional selection is not greatly in evidence for postcontact Siouan populations, at least as far as plant use is concerned. Some of the environmental changes brought about by the European presence had only indirect impact upon interior groups. Intermediary aboriginal populations may have acted to buffer, as well as to transmit, elements of change. Trade contacts were largely indirect until the occupations of the latest sites studied. Although material goods made their way into the interior before the late seventeenth century, religious ideas, cultural values, and agricultural traditions were slow to influence piedmont Indians. The delay of English settlement in the Piedmont until after most Indian groups had dispersed limited the potential effects of added environmental disturbance upon aboriginal subsistence. In many respects, selection pressures for piedmont populations did not change after contact as much as might be anticipated because the relevant environmental changes had only limited impact, at least initially.

Disease is one of the environmental changes that apparently had considerable effect, particularly upon population size. With high mortality, the size of cooperative work groups may have sometimes fallen below optimal levels. Changes in the sex ratio would also influence the ability of any group to perform certain subsistence tasks. Aggregation of remnant populations in the East has been documented historically (M. Smith 1987:59) and may be reflected in some Siouan project ceramic assemblages (Davis 1987, 1988; see also Chapter 11, this volume). Such adjustment of village population size would have allowed traditional subsistence activities to be carried out. Compensatory factors such as aggregation probably account for subsistence continuity in the face of environmental changes not buffered by distance or intermediaries. Aggregation may reflect cultural inertia in the form of information about acceptable village size, ones that were strongly favored by selection.

The concepts of stabilizing selection and cultural inertia seem to be particularly applicable to the case of subsistence continuity and change among piedmont Siouans. Changes did indeed occur, but disruption of traditional patterns of plant utilization was minor despite the influx of trade goods and the effects of disease. Innovations (such as new plants) seem to have been used alongside aboriginal cultural elements without displacing them. Selection apparently favored transmission of existing cultural information for the most part, and resulted in the continued use of traditional plant foods and strategies for coping with temporal and spatial variation in resource availability. Ethnic extinction rather than acculturation was the ultimate outcome of contact for piedmont groups. Although individuals remain who trace their ancestry to local Native American groups, cultural continuity has been broken. With it has gone a system of traditional knowledge about agriculture, land management, and the uses of wild plants that served the Indians of the Piedmont well.