Spring 5-2014

Pottery and Differential Foodways: An Evaluation of Social Stratification at the Winterville Site (22WS500)

Amy Catherine Geiger
University of Southern Mississippi

The University of Southern Mississippi

Pottery and Differential Foodways:
An Evaluation of Social Stratification at the Winterville Site (22WS500)

by

Amy Catherine Geiger

A Thesis
Submitted to the Honors College of
The University of Southern Mississippi
In Partial Fulfillment
of the Requirements for the Degree of
Bachelor of Arts
in the Department of Anthropology and Sociology

May 2014

Approved by

_____

H. Edwin Jackson, Ph.D., Thesis Adviser
Professor of Anthropology

_____

H. Edwin Jackson, Ph.D., Chair
Department of Anthropology and Sociology

_____

David R. Davies, Ph.D., Dean
Honors College

Abstract

The Winterville archeological site (22WS500) is a Mississippian-era chiefdom that flourished as a political center. Excavations at the site have unearthed ritual artifacts, deliberate burning, and feasting pits that hint at social stratification and other relationships present during the site's occupation. This project analyzed 432 ceramic rim sherds from three separate contexts at the site— Area A, Mound C, and the area between Mounds B and C— and used vessel morphology, orifice diameter, decoration, and tempering to find evidence related to the occurrence of ritual feasting events and other food sharing activities as well as document changes in vessel prominence through time. I conclude that Mound C shows evidence of elite food serving events; Area A displays a wide variety of vessel sizes and an even number of serving/cooking to storage/cooking vessels, which hints at a more common residential lifestyle, but also exhibits patterns that hint at other diverse activities, such as feasting and ritual by another segment of society, as well as a fluctuation in use over time.

Key Words: Winterville, ceramic analysis, foodways, Mississippian Period

Table of Contents

List of Tables

List of Figures

Chapter 1: Introduction

As summarized by Bense (1996), the Mississippian stage of prehistoric Native American culture started in the American Bottoms region in the vicinity of St. Louis and spread through the Southeast. It is a culture period characterized by the emergence and development of more stratified chiefdoms that coincided with the new reliance on maize agriculture, which created the potential for an agricultural surplus that could support this more complex social order. The Mississippian stage is also defined by the appearance of platform mounds supporting public buildings and the residences of the elite segment of society. These sites represent political centers and are generally seen as evidence of increased social stratification. In terms of pottery, shell tempering—adding bits of crushed shell to clay to make the paste easier to work as well as to prevent cracking during vessel firing—emerged as an important technological innovation during this time as well (Bense 1996).

Although general inferences such as these can be made about the Mississippian stage in the Southeast, it is important to keep in mind that there is enormous variation across sites. The Mississippian culture period did not spread to all areas of the Southeast at the same time or in the same way, and different societies adopted different aspects of the Mississippian tradition. Some societies developed into the "typical" complex chiefdoms, which are characterized by increased social stratification and multiple-mound centers with plazas and surrounding smaller farmsteads. Other societies were simple chiefdoms, marked by less social stratification, smaller populations, and smaller single-mound centers with surrounding farmsteads (Lorenz 1996). Variability in power and integration emerged as well; chiefs negotiated power within their chiefdoms in different

ways (Beck 2003). All of this variability is particularly important because, if each site has its own idiosyncrasies, then understanding the various aspects of all sites is crucial to understanding both their purpose and history.

My research focuses on determining vessel function using rim fragments from three separate contexts at the Winterville site. Winterville, once a 23 mound site, is located just north of Greenville, Mississippi in Washington County (see Figure 1). Although village occupations date hundreds of years further into the past, Winterville thrived as a Mississippian-era paramount mound center from about the mid-thirteenth century. The site was first excavated by Clarence B. Moore at the turn of the twentieth century and again by Jeffery P. Brain in the late 1960s for his dissertation research. However, Moore actually carried out very little research-focused excavation at the site; he was mainly interested in finding burials that contained well-preserved ceramic vessels. Brain's interpretations were also very limited, mostly due to time constraints, lack of resources, and a primary focus on understanding the chronology of site occupation and mound

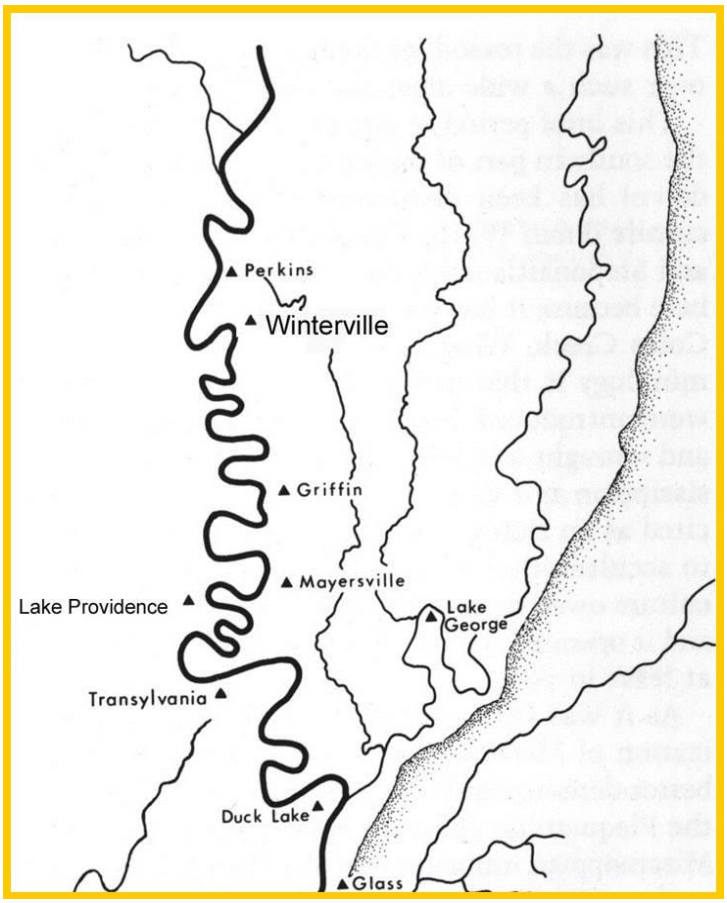

Figure 1: Winterville Location. From Jackson (2006:Figure 1).

construction. Dr. H. Edwin Jackson began a third investigation of the site in 2005, and his research at the site remains an ongoing project.

This project will focus specifically on Area A, Mound C, and the area directly between Mounds B and C, which I have designated "around Mound C". Area A, just to the northwest of

Mound F, was excavated during the 2005 and 2006 summer field schools (see Figure 2). Excavations uncovered burned structures evidenced by postmolds, daub, ash, baked floors and other artifacts and features. This provided support for the conclusion that Winterville was not just a vacant ceremonial center; Jackson (2007:12) instead notes the continuous occupation in Area A is evidenced by the building, burning, and rebuilding of residential structures.

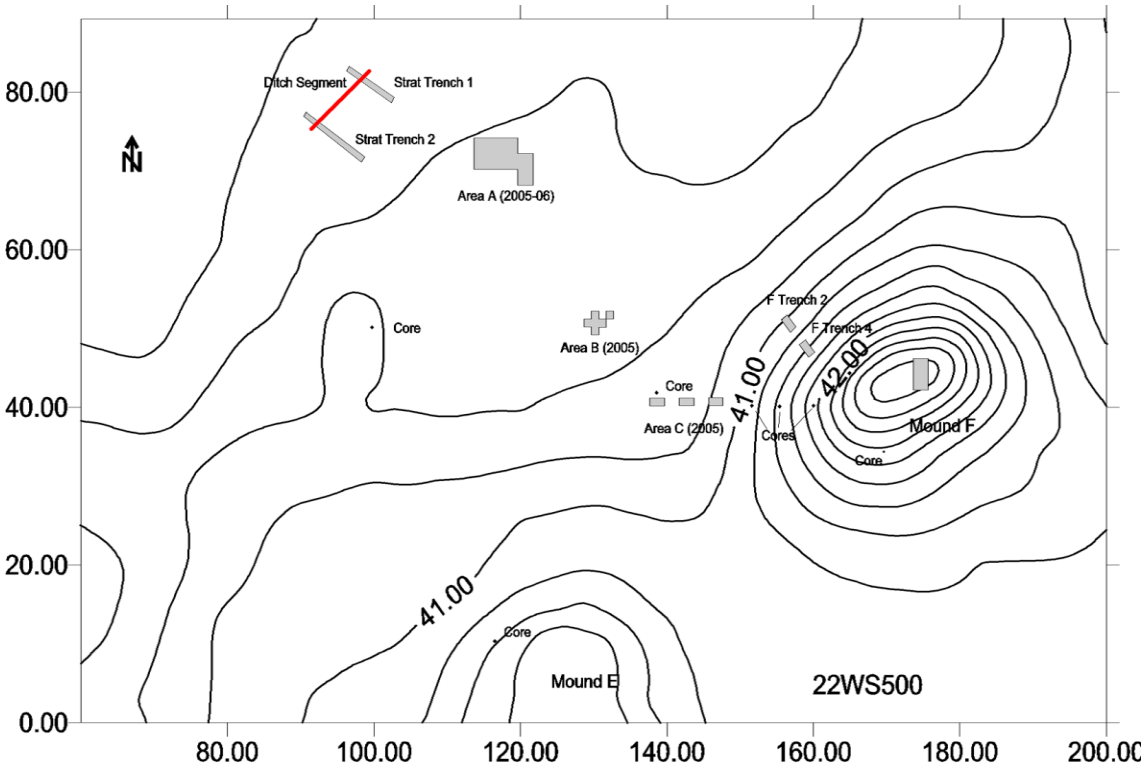

Figure 2: 2005-2006 Excavations. From Jackson (2007:Figure 1).

Mound C, an eroded earthwork at the southwest corner of the site, was excavated in 2009 and 2011. Purposely burned structures, wall trenches, and postmolds were uncovered both on the summit of the mound and in the northern and eastern flanks (Jackson and Kowalski 2010:6-12). A series of at least four structures have been noted at the summit of the mound (Jackson 2012). The numerous lithic remains recovered from this excavation were analyzed in an honors thesis by Barbara McClendon (2012). She noted some interesting patterns at this particular mound, including evidence of institutionalized crafting, the presence of non-local materials, and use wear that was indicative of domestic processes, which she interprets as possible evidence of a more corporate method of ruling by the elite (McClendon 2012: 23-24). Jackson (2012:11) also notes the possible ritual activity at the mound as evidenced by a stained, broken discoidal that could have been used as a paint palette in addition to the deliberate burning of mound structures. Excavation units are pictured in Figure 3.

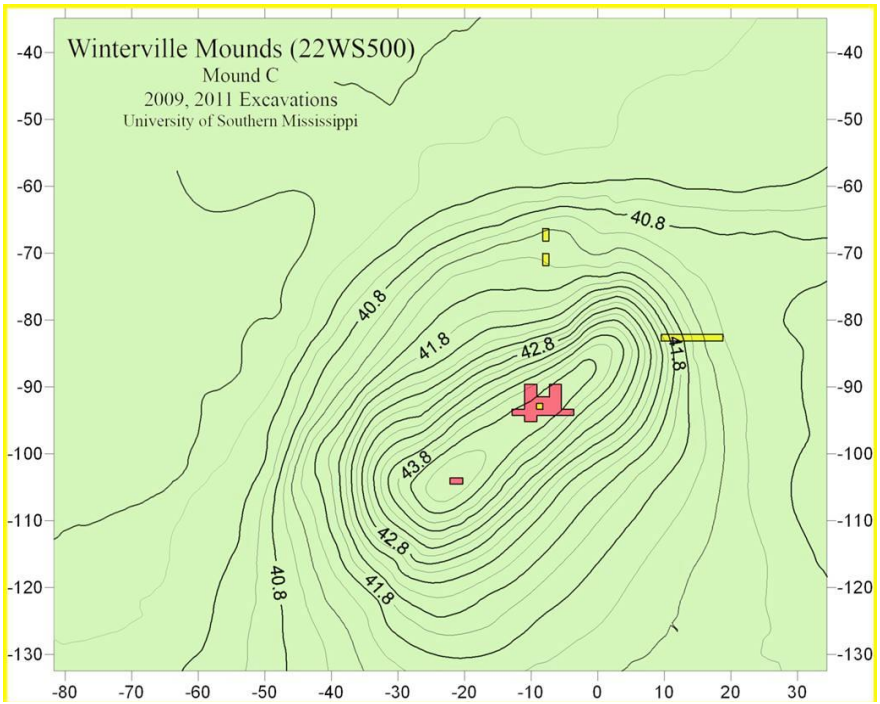

Figure 3: Mound C Excavations, 2009 and 2011. From Jackson (2012).

The area around Mound C was excavated during the 2013 summer field school; analysis of artifacts is still ongoing (see Figure 4). However, it is important to note that Mound B, on the southeastern side of the area in question, was found by Brain (2009 [1989]) to contain burials; Jackson and Kowalski (2010:4) noted that their excavations, although restricted by time, uncovered three superimposed burned floors. The features uncovered at both Mounds C and B may offer insights into the activities of the area around Mound C.

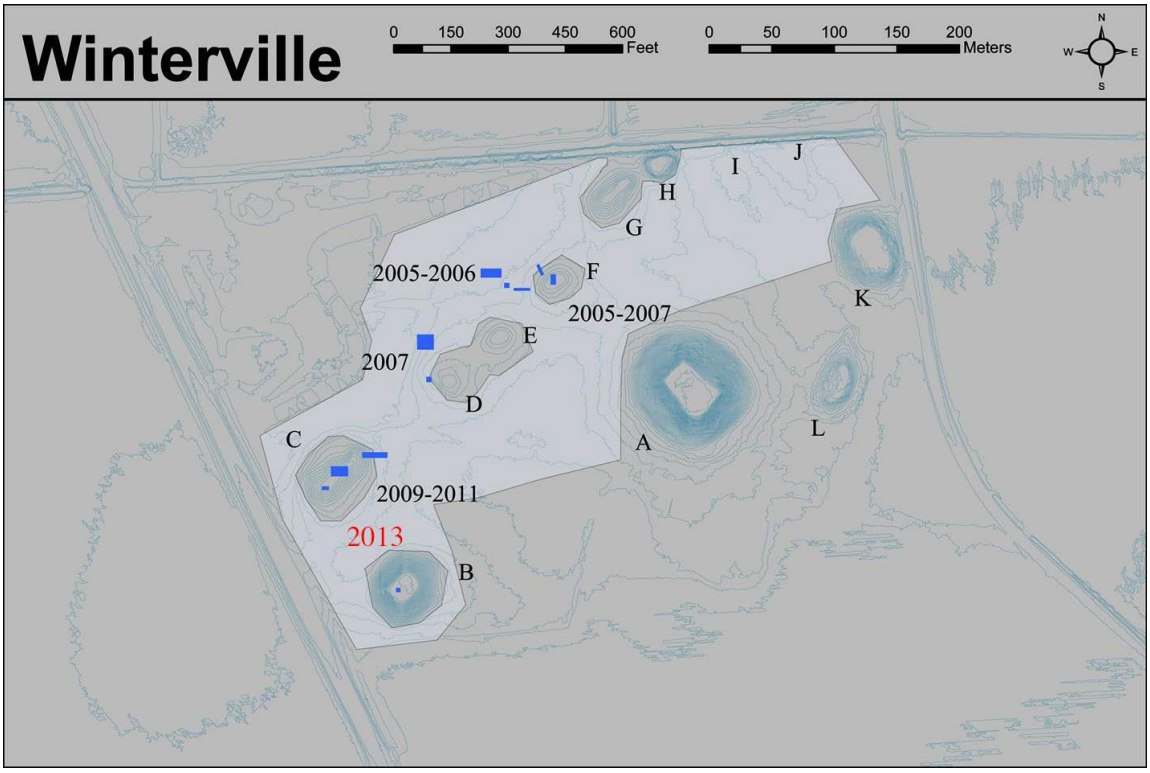

Figure 4: Excavation Locations, 2005-2013. From Jackson (2013).

This site has the potential to contribute greatly to what is known about the Mississippian period in the delta region, especially in terms of social organization and differential foodways. Based on research conducted at other comparable mound centers in the Southeast, I hypothesize that ceramics from the Winterville site will offer evidence of significant social stratification as well as socially-integrative feasting activities. Recent

excavations at the site, which have documented two feasting pits that indicate elite-sponsored feasting throughout Winterville's history, seem to support this hypothesis as well (Kowalski et al. 2009).

Chapter 2: Literature Review

Social stratification has been a significant topic in anthropological research throughout the history of the discipline, and archaeological research in North America has recently begun to explore questions of social stratification and relationships within prehistoric native societies. This is especially true in the Southeast; past excavations have often centered around sites with monumental earthworks, which has created an elite bias in Mississippian-period excavations as well as a tendency to overemphasize social stratification. More recent work has sought to understand daily life and relationships at all levels of society. Through functional analysis of ceramic materials from the Winterville site, I will demonstrate that there was a significant level of social stratification between elite and common members of this society, which was solidified through feasting activities. Although the patterns of social relationships within one society cannot be imposed upon another, demonstrating a high level of variability within this prominent Mississippian mound center would not only indicate the complexity and advanced capabilities of its inhabitants, but it could also provide clues about Mississippian societies in general and provide a basis for comparison with other sites in the area.

Vessel Function

Because the preparation, storage, and consumption of food was a daily concern for Native Americans, analysis of foodways is key to understanding daily life at sites in the Southeast. As noted by Hally (1986:271), food processing was a multi-step process that required different vessels at each step in preparation. Cooking vessels were designed to deal effectively with heating needs of their various contents and serving wares were often larger and more likely to display surface decoration. However, Hally's (1986) article

found that pottery function can actually be determined with a high degree of specificity when entire assemblages are analyzed using a large number of variables related to morphology and mechanical features.

Welch and Scarry (1995:410-412) used a similar process at the Moundville site; they noted that jars are the most abundant cooking and storage vessels and that vessels with constricted orifices were most likely used for storage or cooking. Bowls with flaring rims were especially useful for displaying food during meals. The authors also stated that unburnished, shell-tempered pottery tends to represent a utilitarian ware while burnished or painted pottery would more likely be classified as either a serving or display ware (Welch and Scarry 1995:412). Steponaitis (1983:33-45) tested this interpretation, using laboratory experiments to offer evidence that Mississippian potters chose coarse shell temper for cooking vessels and fine shell temper for non-cooking vessels; fine shell temper resisted mechanical stresses while coarse shell temper was more resistant to thermal stress (Steponaitis 1983:35).

Foodways and Social Stratification

Because discrepancies would be expected between foodways of elite and commoner contexts, interpretations of social stratification within any given site can be made. In an analysis of faunal materials from two elite contexts at Moundville, Jackson and Scott (2003:567) found that low bone fragmentation indicating less processing, diverse taxa, more choice cuts, and the presence of symbolically-charged animal remains were all indicative of a more elite social context. However, the authors also noted that, in conjunction with other types of analysis, even more minor social rankings, as well as different networking strategies, could be identified (Jackson and Scott 2003:568).

Unlike Jackson and Scott (2003), VanDerwarker (1999: 30) did not find a meaningful statistical relationship with reference to species diversity between mound and village contexts at the Toqua site, a late Mississippian mound center in eastern Tennessee; she postulated that this missing relationship was the result of small sample sizes. However, VanDerwarker (1999:31) did note that differential distributions of deer parts and animal classes shed light on the feasting activities at Toqua. In comparison with the village areas of the site, Mound A had a large percentage of fish, an abundant resource that could be brought in large quantities for public events (VanDerwarker 1999:31). Furthermore, village contexts tended to have more high and low utility deer parts, possibly due to field stripping, whereas Mound A contained more high and mid utility deer parts, indicating that deer carcasses were brought to this area relatively whole. VanDerwarker (1999:31) interpreted this as a further indicator that chiefs could have been supplying food items as a way to both negotiate their status and reinforce vertical relationships with other members of society.

Knight (2004) offers both an intriguing look into the variability of "elite" Mississippian behaviors while at the same time warning against using broad terms like elite and commoner to classify intricate and fluid social relationships. Mounds Q and G at the Moundville chiefdom both represent elite residences, and, although domestic refuse was present in both areas, the activities that took place at each mound were vastly different. With an interesting range of crafting artifacts, like ferruginous sandstone saws, awls, sandstone abraders, and greenstone celts as well as evidence related to pigment processing and use, Mound Q is classified as a residential elite mound where skilled crafting took place (Knight 2004: 309-318). By contrast, Mound G is simply defined as a

more “aloof” elite residential mound (Knight 2004: 318). Through this examination, Knight (2004: 318) demonstrates that being an “elite” or “commoner” could be acted out in many different ways, all of which were appropriate to their respective social categories.

These important differences between site contexts are crucial because increased differentiation can indicate an overall increase in social stratification (Knight 2004:305). This is an important step forward in Southeastern archaeological method because using broad social terms tends to simplify more intricate social relationships (Knight 2004: 304-305). Maxham (2000:338) also pointed out that approaching social stratification from a strictly hierarchical standpoint ignores the complex lateral social relationships that also played an important role in Southeastern society. In fact, Maxham (2000) went even further to illustrate that the traditional categories of local or main political center and rural farmstead are too broad to capture the variety of site functions in the Southeast. Her analysis of a vessel assemblage that would typically be classified as one from a rural farmstead seemed to indicate that residents instead gathered there to share food; there was a noticeable lack of domestic refuse (Maxham 2000). Hammerstedt (2005) made a similar observation about the “top-down” approach to Mississippian mound centers through an analysis of the Annis Mound in Kentucky, arguing that artifacts found in the mound features did not fit the “typical” elite patterns. This leads to difficulties in interpreting status in all but the largest mound centers (Hammerstedt 2005).

Location of residence within a site can demonstrate the general status of individuals; the site itself can function as a physical representation of social standing. In his analysis of the general layout at the Moundville site, Knight (1998:47-51) argued that

sites often function as deliberate manifestations of societal relationships. Although he urged caution in attempting to draw accurate readings of social reality from static spatial layouts, Knight (1998) conceded that the deliberate physical relationships illustrated by public architecture and site planning served to both illustrate and reinforce a "particular, arbitrary vision of social reality" (46). In this way, site layout perpetuated the social relationships it was intended to represent. Knight (1998: 47-52) crafted a stunning view of Moundville as a diagrammatic social center with a central plaza bounded on four sides by fifteen mounds in compact rows. The site is organized along lines of bilateral symmetry with alternating small and large mounds around the plaza (Knight 1998:49). Knight (1998: 50) also noted north-south polarity at the site; the largest and most high-status mounds are at the northernmost point of the plaza periphery group. Mound B, the largest and most north-centered mound, was interpreted as the residence of the paramount group. Its central location created a spatial representation of the decreasing status of representative corporate kin groups that also reinforced the necessity of reciprocity and negotiation (Knight 1998: 59).

In their analysis of ceramic material and faunal remains from the Moundville site, Welch and Scarry (1995:402) noted that, in terms of foodways, a significantly higher amount of food processing wastes has been found at farmsteads when compared to elite contexts (Welch and Scarry 1995:410). Furthermore, the authors stated that serving to cooking ratios varied predictably with increasing status; however, display wares were largely absent from the most elite contexts because access to these areas was restricted to only the more elite members of society (Welch and Scarry 1995:413). Knight (2004:314) also noted the effects of restricted access on ceramic assemblages as evidenced by a

lower number of display wares. Because these vessels communicated status and power visually, they would not have been effective in restricted areas because they would not be seen by social competitors or even by lower-status individuals.

Although these areas of restricted social access did exist, Mississippian chiefdoms also reinforced social relationships through ritual and feasting activities. In fact, Wesson (1999) attributed the very existence of the chiefdom system in the southeast as being at least partially a result of the chiefly power over the storage and redistribution of surplus foods. For this reason, cooking to serving ratios of any given assemblage are often interpreted as an accurate way of determining differences between elites and commoners, as demonstrated by Welch and Scarry (1995). This reflects the ability of the elite to mobilize support and food supplies, using reciprocity and feasting activities to negotiate, create, and maintain status.

Contrary to the findings of Welch and Scarry (1995) and Hally (1986), Blitz (1993) stated that decoration, ware, and vessel shape can be similar across archaeological contexts. Instead, he demonstrated that vessel size can be much more informative for social questions. In his analysis of Lubbub Creek, a small single mound and village site in west central Alabama, Blitz (1993:93) found that vessels from elite contexts tended to be larger and, overall, have less size variation than those from common contexts, where daily food preparation demanded a wider variety of vessel sizes. Boudreaux (2010) noted a similar pattern at the Town Creek site in North Carolina, where off-mound sites were represented by a wide range of vessel sizes indicating various domestic activities. Furthermore, he found vessels indicative of only small-group activities in a sub-mound context but noted a high number of large serving and cooking jars representing large

episodes of cooking and feasting activities at the mound summit (Boudreaux 2010:26-27).

Conclusion and Justification of Research

The overall variety of social relationships within sites prevents the formation of a specific conclusion that will apply to all sites within a given area. As a political center, the Winterville site was probably home to a permanent elite population, most likely residing on (or near) mounds (see Figure 5). This also suggests that a less-elite or commoner population lived either elsewhere at the site or in nearby farmsteads. Because Winterville is a larger center more comparable to that of Moundville than Lubbub Creek, I expect the variety of vessel morphologies and functions, particularly whether they are cooking or serving ware, will be sufficient to broadly define the foodways of elite and commoner contexts. Based on the work of previous researchers in the Southeast as well as evidence of ritual and feasting activities

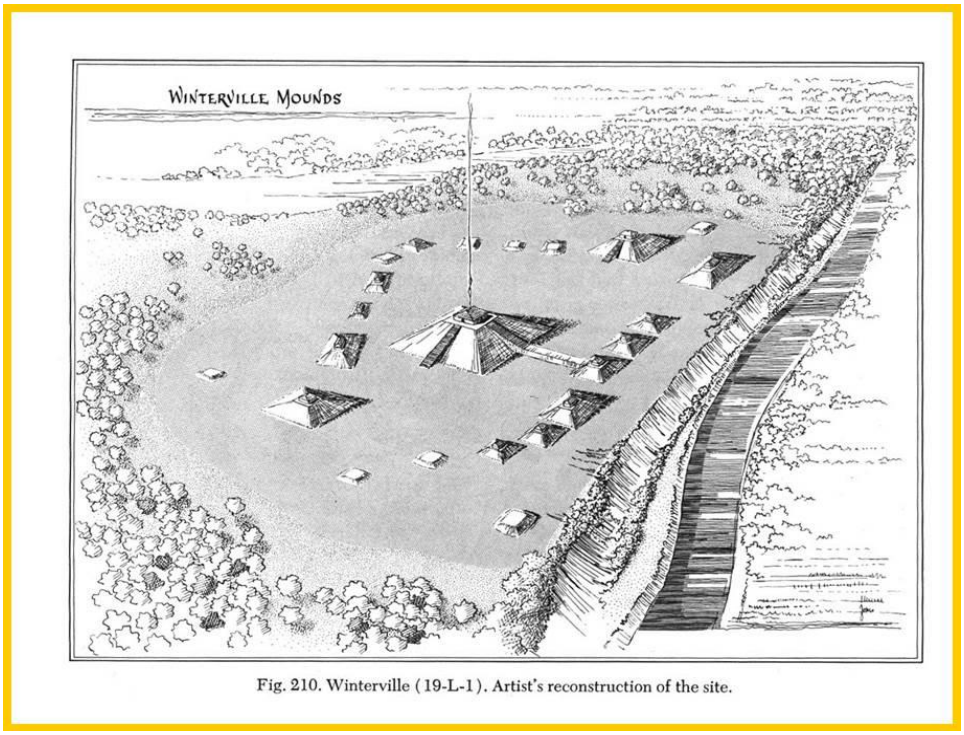

Fig. 210. Winterville (19-L-1). Artist's reconstruction of the site.

Figure 5: Artist's Interpretation of Winterville. From Phillips (1970: Figure 210).

recently uncovered at the site, I infer that Winterville will show enough vessel variety to indicate the presence of a ranked social hierarchy that was solidified through elite-supported feasting activities.

Although the reality of social stratification is not as simple as the preceding statements indicate, understanding the differences in food preparation and serving activities between these two basic segments of society could potentially offer a wealth of information regarding the role of food in daily life and ritual. In turn, this information could provide a basic indication of how much power or influence elite members of society had over the less-elite population as well as how social relationships were defined and maintained through food-related activities. In addition, an analysis of differential foodways in these two separate social and physical contexts would contribute to the knowledge of settlement patterns as defined by social differences. The sheer variety of social relationships within the broader category of "elite" itself necessitates this research. However, the large number of social relationship-driven research questions still left unanswered for the Winterville site also makes this project relevant.

Chapter 3: Methodology

Ceramics are an abundant, relatively well-preserved, and telling archaeological resource. Both elites and commoners depended on pottery, so sherd analysis is adaptable to answering questions about social variation, especially in terms of food-related activities. There has been an abundance of ceramic-based analysis relating to the Mississippian period in the Lower Mississippi Valley, so there is an exceptionally large body of knowledge from which I have drawn in both my analysis and interpretation of ceramic data.

Figure 6: Excavations at Mound C. Unpublished photograph, Winterville Archaeological Project, H. Edwin Jackson.

The ceramics from Area A and the earlier excavations from Mound C, as seen in Figure 6, had already been analyzed in terms of type-variety and rim sketching. Although some rims had already been measured for rim diameter and/or classified as either bowl, jar, plate, or bottle, most rims had not yet been fully analyzed. The first phase of my project involved reviewing the written records for these ceramics and pulling the rims for a second analysis so that my work would be consistent. Only rim sherds large enough to be functionally classified were used in this analysis, and any of these sherds large enough to provide information about vessel orifice diameter were measured to the nearest centimeter using a vessel rim board.

In creating my standards for vessel classification, I relied on the work of Hunter B. Johnson (2003) as well as photos of ceramics from Phillips (1970) and Phillips, Ford, and Griffin (2003 [1951]). These rims were a crucial piece of evidence in my later examination of elite versus commoner ceramic variation because certain vessels are interpreted as serving wares and others as cooking wares. General vessel size was also determined from orifice diameter, as this important characteristic offers clues about vessel function as well as the size of the group being fed.

All information about these sherds was entered into an Excel spreadsheet for ease of recording and sorting. In light of new (and later than expected) radiocarbon dates from Mound C, earlier grog-tempered sherds had to be classified as secondary inclusions from mound building activities. In order to keep this research chronologically "clean", these same early sherd types were also omitted from analysis of Area A and the area around Mound C.

New analysis was also done with sherds excavated by anthropology students during the 2013 summer field school. All recovered artifacts, including non-ceramic materials, had already been washed, sorted, labeled, and bagged. I assigned the ceramic to their respective types and varieties and recorded the data. The type-variety method for the Lower Mississippi Valley was first compiled by Phillips (1970), and only minor adjustments to his variety descriptions have been made over the years (Williams and Brain 1983). This method sorts sherds based on paste and decorative characteristics, when applicable. In order to better understand chronology, the assigned varieties can also be placed into sets as defined by Williams and Brain (1983).

Due to time constraints, only usable rim sherds were typed and sorted for this

analysis; further work will be done typing the rest of the recovered sherds in the future. Unfortunately, only a few rim sherds had been preserved well enough to provide the information relevant to this project. Each rim sherd was individually typed and bagged, both for my ease of access and for the clarity for future students and researchers. Bags had already been labeled with unit coordinates and excavation level, and this information was carefully recorded on inventory sheets, along with the number of rim sherds found for each type. Each bag was recorded on its own inventory sheet, and great care was taken to keep the sheets in order by catalog number. These measures ensured that data was not accidentally mixed from different parts of the excavation area itself or even from other areas of the site. Most importantly, specific notes were taken of any rim fragments or decorated sherds present in the sample, and sketches of the rim fragments were drawn on the back of the inventory sheets for future reference and analysis.

The final phase of this project included an examination of the ratios of cooking wares to storage wares to serving wares in each area, which gave me a good idea of the basic variation, if present, in ceramic use between elite and less-elite contexts. This variation acted as a general indicator of the differences in foodways between the two areas; based on my review of the current literature, elites would possess more serving ware than commoners as a result of hosting meals. Also, vessels in the commoner context should display a greater range of size variation, which is consistent with the need for more diverse vessels in a common domestic environment. Because both function and size were taken into consideration, there are some sherds that were used in the sample for which orifice diameter could not be determined; these sherds are still analyzed in terms of function but are excluded from the size analysis.

Additionally, I made notes of all decorated sherds found in the sample in order to see if there was a significant difference in the abundance of these decorated ceramics between the two areas. This information was relevant in further defining serving wares, as certain decorations tend to be associated with these vessels because they were seen by a larger number of people and meant to impress those who saw them.

Chapter 4: Results

Of the 595 sherds looked at in this project, 432 were actually used during this analysis: 110 from Area A, 293 from Mound C, and 29 from the area around Mound C (see Table 1). Jars were further divided into standard (globular body, constricted neck, flared rim), straight neck (globular body, constricted neck, straight/vertical rim), and restricted (globular body, constricted neck, inward slanting rim); bowls into simple (hemispherical), sloping (deep, slanted walls), flaring (outflared walls), and semi-globular (slightly restricted orifice); and plates into standard plate/shallow bowl and "wavy rim" platter. Bottles were only classified, rather generally, as bottles. Although the number of usable rims from the area around Mound C is largely unhelpful

Vessel Type		Area A	% of sample	Mound C	% of sample	around Mound C	% of sample
Bowl	Simple	27	24.55	100	34.13	7	24.14
	Sloping	1	0.91	16	5.46	0	0
	Flaring	18	16.36	22	7.51	1	3.45
	Semi-Globular	6	5.45	20	6.83	1	3.45
Jar	Standard	36	32.73	75	25.6	4	13.79
	Straight Neck	9	8.18	15	5.12	8	27.59
	Restricted	4	3.64	0	0	4	13.79
Bottle	General	7	6.36	11	3.75	2	6.9
Plate	Shallow Bowl/Plate	2	1.82	21	7.17	1	3.45
	"Wavy Rim" Platter	0	0	13	4.44	1	3.45
Total		**110**	100	**293**	100	**29**	100

Table 1: Instances of each Vessel Form by Area.

for comparative analysis, they are included in the subsequent tables and overall analysis for the small insights they are able to offer.

Serving, Storing, or Cooking?

Using the same categorizations as Livingood (2010), jars and bottles were classified as storage/cooking vessels due to the non-serving nature of their restricted orifices, and bowls and

plates were categorized as serving/cooking vessels because of their wide orifices. These functional categories are by no means specific, but by taking into account that vessel form may not be restricted to one particular activity (Sinopoli 1991), they do provide a vision of the activities in each area of the site without taking too many liberties with the actual data. The results of this broad characterization can be seen in Figure 7.

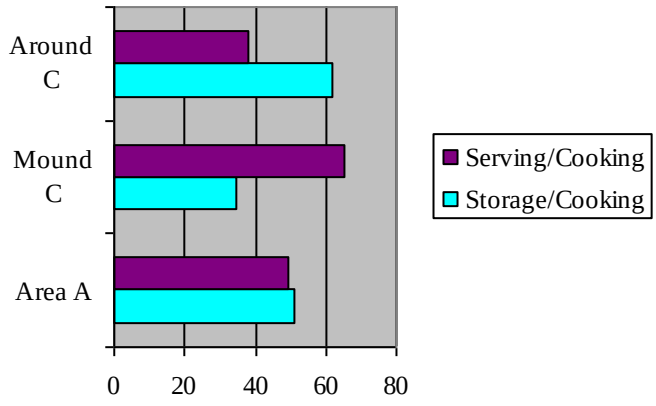

Figure 7: Comparative Vessel Function.

The vessels recovered in Area A split almost 50/50 into storage/cooking and serving/cooking functions, which is a typical distribution pattern for a residential area. By contrast, Mound C had a significantly higher percentage (65.5%) of serving/cooking vessels, which would be expected in a more elite area.

Although the area around Mound C did show more functional similarities with Area A than with Mound C, the small sample size makes this interpretation questionable. Using a larger ceramic sample from the Pevey and Lowe-Steen sites, Livingood

(2010:101) suggests that areas with a higher storage/cooking ratio may be associated with feasting in certain deposits, but the fact that the area around Mound C is just a general midden deposit rules out this interpretation. It is, however, a possibility that the area around Mound C hosted activities that were in support of the meals and other events at Mound C.

Chi-square calculations were also done for serving and storage vessels to test the statistical significance of these results. The differences between Area A and Mound C ($\chi 2=7.24$, $p=0.01$) as well the differences between Mound C and the area around Mound C ($\chi 2=17.95$, $p=<.0001$) were statistically significant; vessel form in Area A and around Mound C was not statistically significant ($\chi 2=2.53$, $p=0.12$).

These broad categories are helpful for capturing overall trends in the absence of whole pots and cooking residues, but more specific interpretations can be made within the data as well. While coarse shell-tempered pottery is used for both serving and cooking vessels, Bell Plain, a finer shell-tempered ware, is used almost exclusively in non-cooking vessels. In the area around Mound C, jars, bottles, and plates were exclusively executed with Mississippi Plain var. *Yazoo* pastes, and most bowls (6 of 9) were Bell Plain var. *Holly Bluff* wares. In Area A, there were more coarse than fine shell tempered bowls, and all jars were made with Mississippi Plain var. *Yazoo* paste. Two of the simple bowls represented were Bell Plain var. *Bell*, which belongs to a late ceramic set and may be a trade vessel. One plate was coarse shell tempered and the other was Bell Plain var. *Holly Bluff*. Three bottles were fine shell tempered and four were coarse.

A more interesting pattern occurs at Mound C. Of 158 bowls, 20 are executed on Bell Plain var. *Holly Bluff* wares and one is Bell Plain var. *Bell*; the rest are tempered

with coarse shell. Of 21 standard plates, only two are fine shell tempered, and all but one of the "wavy rim" platter forms are executed on coarse shell tempered paste. Of 11 bottles, only two are tempered with fine shell. All jars are coarse shell tempered wares. These results are a bit unexpected; one would hypothesize that Mound C should have more fine shell tempered serving wares due to the higher need for serving vessels in this area, if indeed it was an elite residence. Research at the site has shown that Mound C may have been the locus of domestic, ritual, and crafting activities, which could have influenced this vessel tempering pattern. Furthermore, the pattern could be due to chronological factors; *Holly Bluff* paste became prevalent after 1350 AD. Future research into vessel temper at other Winterville mounds could be used to better understand this trend.

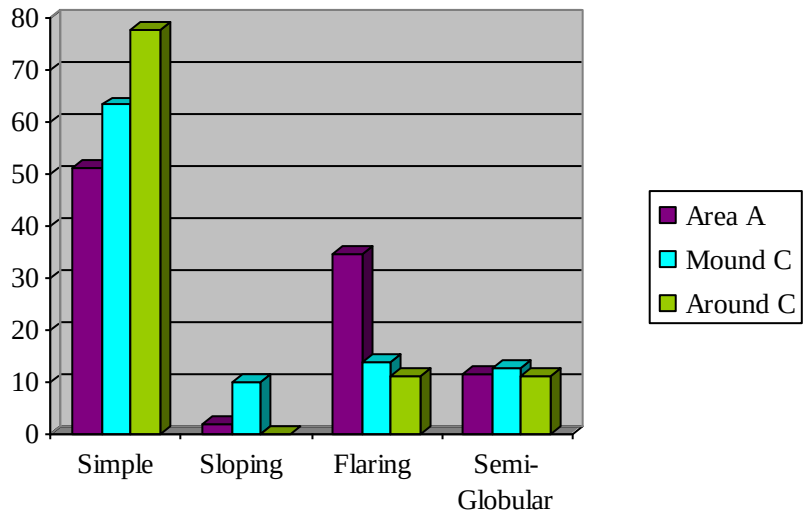

Figure 8: Percentage of Bowl Types by Area.

In terms of form and function, a few more specific inferences can be made. The sloping bowl is a vessel that is particularly useful for serving large numbers of people. Its more frequent occurrence in Mound C could indicate a need for feeding more people than the serving vessels of Area A (see Figure 8). Interestingly, the flaring bowl, which is described by Welch and Scarry (2005) as being a good serving vessel for displaying and

presenting food, makes up a larger percentage of Area A's bowl sample than Mound C's. This could mean that the serving-related activities of Mound C were more focused on quantity than presentation, but a more comprehensive understanding of the common vessel types at Winterville is needed before concrete conclusions can be drawn.

Another interesting serving vessel in terms of form is the wavy rim platter found almost exclusively at Mound C. Generally large, this decorative platter is tempered with coarse shell and was most likely used as a serving vessel. Given its complete absence from Area A and single occurrence in the area around Mound C, this vessel may have been restricted to elite usage and could possibly be used as a marker for more elite or special areas within the site.

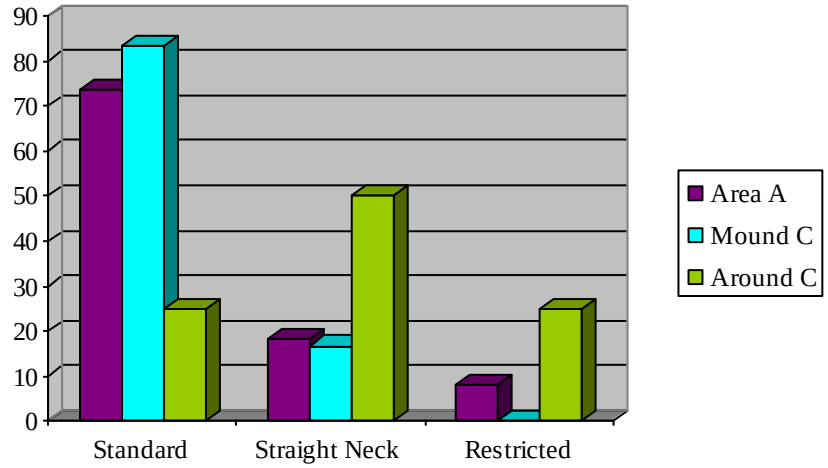

Figure 9: Percentage of Jar Types by Area.

Jars were classified as either standard, straight neck, or restricted, largely based on the physical similarities of the jar necks. The sample from Mound C is dominated by the standard jar form (see Figure 9), which could suggest less variation in vessel form due to fewer food processing activities. Area A also boasts a high percentage of the standard jar type, but straight neck jars and restricted jars are also more numerous in this area than in the Mound C sample.

Analysis of Decorated Sherds

An analysis of vessel decoration trends adds more enticing clues to questions of vessel function. As stated earlier, decorated vessels are usually indicators of a more highly-prized, less utilitarian vessel because more time was put into the design. For this reason, it would be expected that Mound C would have more decorated sherds than Area A; the area around Mound C was not included in this analysis because the small sample size would skew the data. However, Area A had more decorated sherds than Mound C in all broad vessel categories except plates; although Area A is shown in the chart to have 50% decorated plates, the sample size was only 2, so the data is deceptively skewed (see Figure 10).

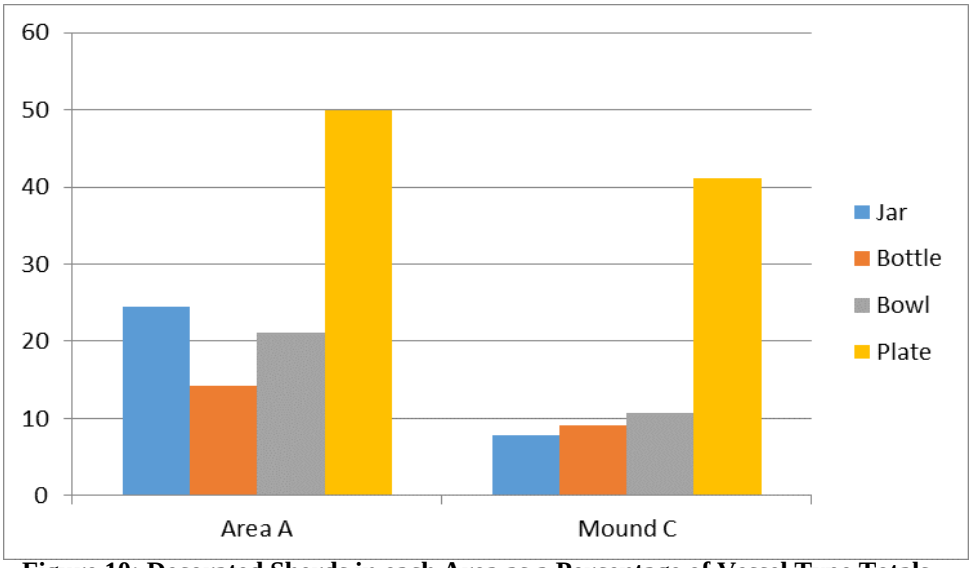

Figure 10: Decorated Sherds in each Area as a Percentage of Vessel Type Totals.

In Area A, the most common decorated vessel was the jar, and decorations were generally restricted to the vessel neck, although they sometimes extended onto the vessel shoulder. Plates were the most highly decorated vessel at Mound C, which could indicate the importance of this serving vessel in the area; however, it is important to note that "wavy rim" platters were included in this analysis as decorated sherds because of their rims. The unexpectedly higher frequency of decorated sherds in Area A could be

due to a number of variables. Decoration, per se, may not be a good marker for elite activity at Winterville as decorated pottery is a common feature of Mississippian sites in the Lower Yazoo Basin. Because decorated serving vessels were so highly represented at Mound C, it may be that the number of decorated serving vessels would serve as better indicators of elite activities, although further research at the site would be needed to test this hypothesis. Furthermore, although detailed notes were not taken for every sherd, decoration, especially on serving vessels, from the Mound C context tended to be of higher quality than those in Area A. Actual foodways, social organization, and status are complicated concepts that are constantly negotiated and reinforced through time; therefore, the presence or absence of decorated vessels may not be the best method for understanding the nuances of society.

Some decorated sherds were also temporally diagnostic and therefore offer clues both to refine the timeline of occupation in each area as well observe how vessel use may change over time. In the area around Mound C, only three diagnostic sherds were analyzed; two date to the Winterville II to Lake George I phases (1300-1425 AD) and one dates to the Winterville I phase (1200-1300 AD), which was the time when most mound building was taking place at the site. These sherds do not offer any clues about changes in vessel form or frequency over time.

At Area A, a more interesting pattern occurs. Diagnostic sherds range from the Winterville I phase to the late Lake George phases with the most sherds (7 out of 13) dating to the Winterville II to Lake George I phases. The two earliest diagnostic sherds from this sample, both of which date to the Winterville I mound-building phase, are bowls. Only two of the seven vessels that represent the Winterville II to Lake George I

phases are bowls (the rest are jars). Decorated sherds from the latest phase are all jars, but the two Bell Plain *var. Bell* simple bowl sherds also date to the Lake George II phase. This transition from more serving to storing/cooking vessels over time in the assemblage plus the appearance of late phase trade vessels seems to indicate that Area A was a locus for numerous activities, rather than just being restricted to a "residential" area.

Temporally diagnostic sherds at Mound C range from the Winterville II to the Wasp Lake phases in the proto-historic period, but, like Area A and around Mound C, the vast majority of sherds represent the years from 1300-1425 AD. There is no obvious evidence for changes in vessel form over time, and, because serving vessels are the most frequently decorated vessels in the Mound C assemblage, bowls dominate the timeline through all phases.

Vessel Size

Following the ideas of Blitz (1993), I analyzed vessel orifice diameter in each of the areas in an effort to find whether vessel size was a telling marker of foodway activity and social stratification at the Winterville site (see Figures 11-14). I focused the

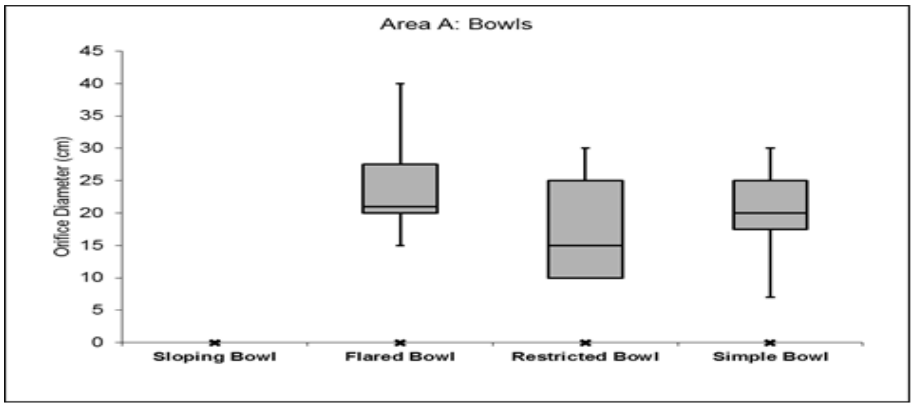

Figure 11: Range of Bowl Orifice Diameter by Form at Area A.

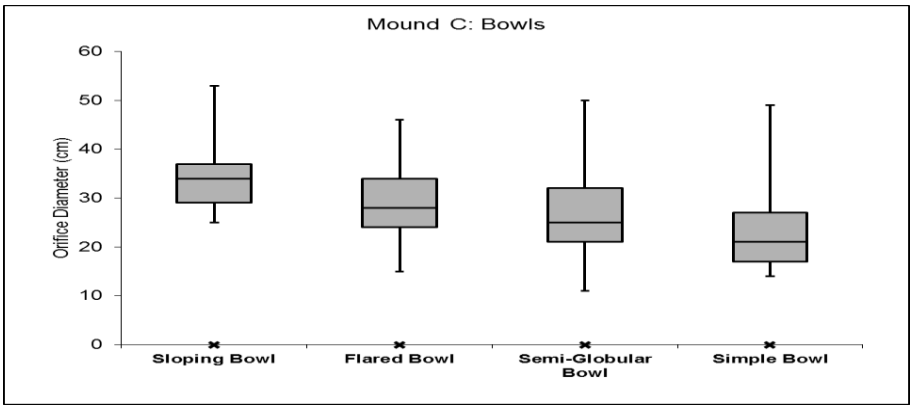

Figure 12: Range of Bowl Orifice Diameter by Form at Mound C.

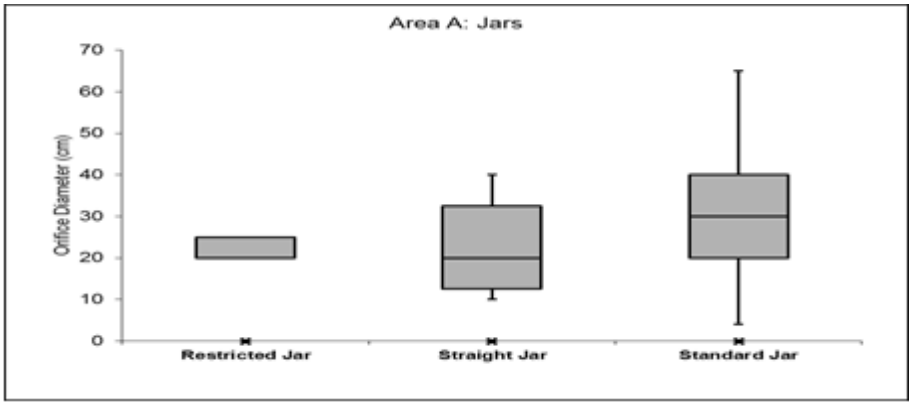

Figure 13: Range of Jar Orifice Diameter by Form at Area A.

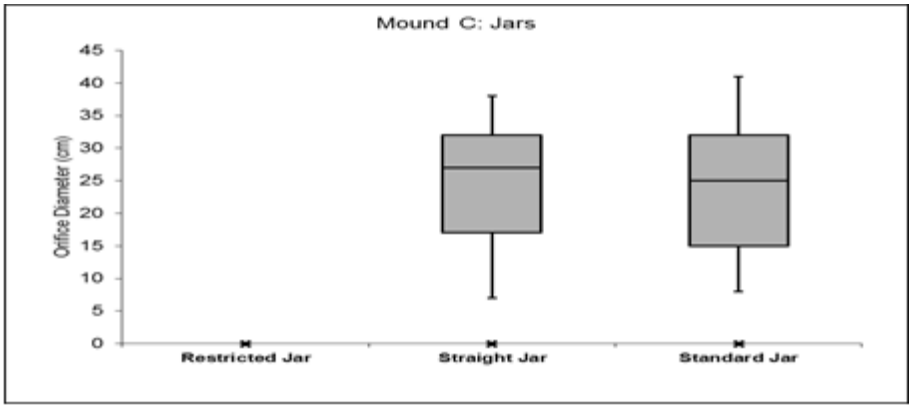

Figure 14: Range of Jar Orifice Diameter by Form at Mound C.

individual vessel analysis on Area A and Mound C due to the small sample size of the 2013 material.

The smallest vessels in each category may have had ritual or other specialized functions. Jars tended to have a more standard vessel orifice, which could mean that they had similar uses or that neck form is not an effective way infer vessel morphology or function. The median bowl orifice diameters from Mound C seemed to neatly fit with the morphological characteristics they had been assigned. Area A had a less straightforward bowl pattern in which the median bowl orifice diameter tended to cover a wider measurement range. Once again, this could be a result of the need for a wider range of vessel sizes in a domestic setting.

In general, the range in vessel size was not nearly as significant between Area A and Mound C as I had hypothesized, but there is support for the differences expected between residential and elite contexts. As evidenced by the comparative box and whisker plots (see Figures 15-17), Area A tends to have a much greater general variety of vessel.

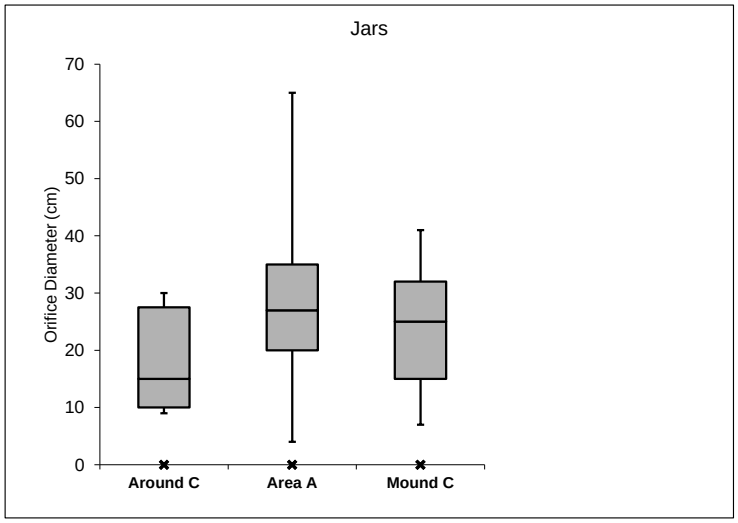

Figure 15: Comparative Analysis of Jar Orifice Diameter in All Areas.

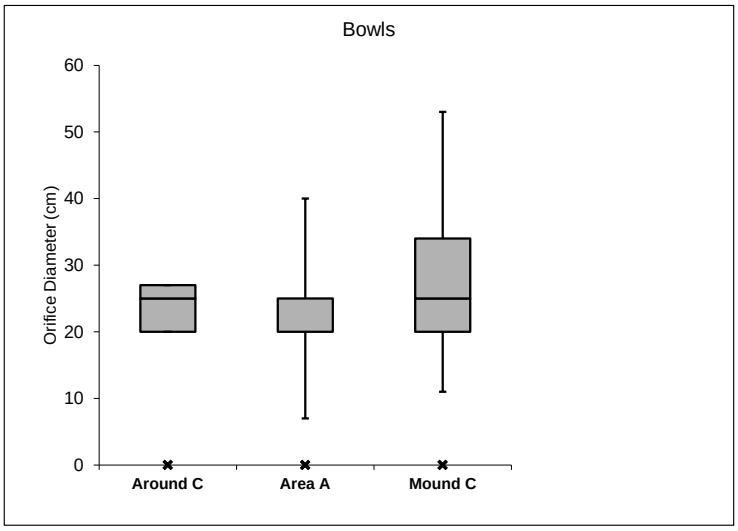

Figure 16: Comparative Analysis of Bowl Orifice Diameter in All Areas.

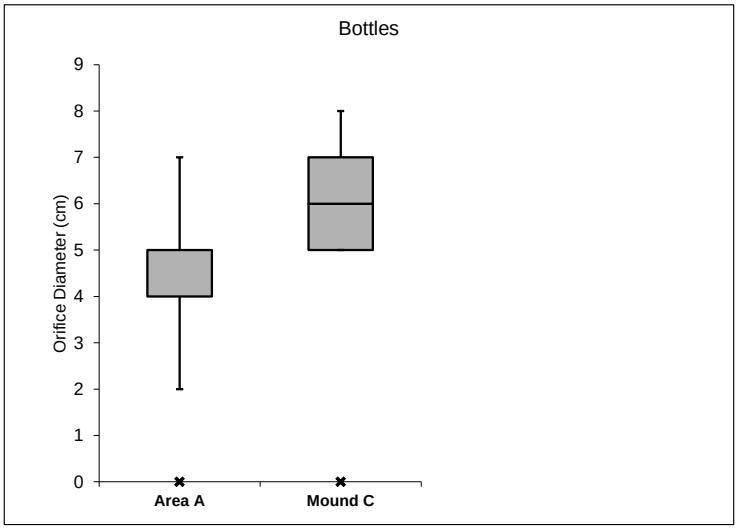

Figure 17: Comparative Analysis of Bottle Orifice Diameter at Area A and Mound C.

sizes than does Mound C, which fits with Blitz's (1993:93) idea that daily residential food preparation calls for a much wider variety of vessel forms. Although the difference in jar size between the two areas was not statistically significant (Mann-Whitney U=975, .249), it does appear that a pattern is emerging in which Area A has the larger jar orifice diameter, which could be in support of food preparation for mound activities. The larger average bowl size at Mound C is statistically significant (Mann-Whitney U=1039, .008)

and could be evidence of the need to serve food to larger groups. Unfortunately, a similar comparison could not be made with plates in the two areas due to the small sample size from Area A.

Chapter 5: Discussion

The discrepancies between what would be expected from refuse at a mound and off-mound context and what was actually found in this project further evidence that status is not a black and white concept. Personal preference, styles, multiple vessel uses, and time all combine to make ceramics and foodways a complicated concept that is impossible to fully understand from the static archaeological record. It is also difficult to understand the role of the individual and horizontal societal relationships through such materialistic approaches (Cobb 2003).

Even so, Mound C's significantly greater percentage of serving/cooking to storing/cooking combined with a smaller overall variety of vessel sizes, larger bowls, and numerous unique wavy-rim serving platters seem to be indicators of elite social patterning. Area A had more decorated sherds, but the even split between storage/cooking and serving/cooking vessels, large variety of vessel sizes, and smaller overall serving vessel size seems to point to a more common, residential social patterning. Even so, the appearance of the late trade serving vessels (Bell Plain *var. Bell*) indicates that other types of activities, apart from domestic life, seem to be occurring in this area, which could be evidence of feasting or ritual by a different segment of the society than what is seen at Mound C. The possible change in vessel use over time as indicated by temporally diagnostic rim sherds in this area also points to the possibility of increasing social stratification after mound building activities and/or some sort of change in what was happening at Area A throughout the site's occupation. In fact, the amount of evidence recovered at Area A that points to a fluctuation in use over time warrants further research.

One limitation in this research was a common archaeological problem: the lack of

any whole or significantly preserved vessel fragments, both for analysis and comparative study. The small size of the analyzed fragments, usually only 4-9% of the vessel rim and even less of the vessel itself, gave few clues about the shape of the vessel body. Conclusions about function were drawn from the shape of the vessel rim, neck, and surviving segment of the vessel body and were largely based on the pictures found in works like Phillips (1970) and Williams and Brain (1983). Because all conclusions about vessel shape and function had to be made based on vessel forms from comparable Mississippian sites, there is the possibility that these vessels were not used in the same way at Winterville.

This research was further limited by the lack of available comparative data from the area around Mound C. As more excavations are done in the future around Mound C, new and better analyses should be done in order to better understand this area and its relation to the other parts of the site. Future excavations of other mound and off-mound areas could also open the door for more comparative ceramic analyses, which would help to paint a more accurate picture of food storage, preparation, and presentation as well as elite behaviors and status negotiation and reinforcement. The three areas analyzed in this study are also ripe for future analyses with regard to other artifacts and features. Having a more complete understanding of artifact and feature abundance, use, and meaning could allow for more accurate interpretations of these complex social interactions. More focused efforts toward understanding common vessel morphology at the Winterville site would help to refine future interpretations about vessel use.

Chapter 6: Conclusion

Ideally, my interpretations of the ceramic data at the Winterville site provide preliminary answers to questions related to ceramic usage and the foodways of this particular society as well as open future discussions for defining and understanding the types of activities that took place in these areas. This analysis has supported the hypothesis that ceramic patterns at Winterville would reveal social stratification at the site, and there is some evidence of serving or other feasting activities at Mound C. Furthermore, this research has opened the door for new research at Area A. Ceramic evidence seems to indicate that a variety of activities took place in this area over time, and further analyses could help further define this space. There is clearly some division in terms of the foodways that took place in different areas of this mound center, and vessel function, especially an examination of serving/cooking to storing/cooking, seems to be the clearest way to highlight these differences.

Differences in vessel sizes and frequency offer other interesting clues. The significant size difference in serving vessels at Mound C seems to indicate that feasting or ritual activities involved serving a large number of individuals. It is also interesting that the size differences between jars at Area A and Mound C were not statistically significant; until more analysis is done, this information remains inconclusive. Decorated and temporally diagnostic sherds complicated my original ideas about what would be found in the two areas, but these artifacts have contributed significantly to further understanding Area A at the site and have created new and intriguing research questions. The analyses completed in this project contribute to the overall knowledge about the complex social hierarchies and interactions in Mississippi period societies in the Lower

Mississippi Valley.

References Cited

Beck, Robin A.
2003 Consolidation and Hierarchy: Chiefdom Variability in the Mississippian Southeast. *American Antiquity* 68(4):641-661.

Bense, Judith A.
1996 Overview of the Mississippian Stage in the Southeastern United States. *Revista de Arqueología Americana* 10:53-71.

Blitz, John H.
1993 Big Pots for Big Shots: Feasting and Storage in a Mississippian Community. *American Antiquity* 58(1):80-96.

Boudreaux, Edmond A.
2010 A Functional Analysis of Mississippian Ceramic Vessels from Town Creek. *Southeastern Archaeology* 29(1):8-30.

Brain, Jeffrey P.
2004 *Tunica Archaeology*. Papers of the Peabody Museum of Archaeology and Ethnology, Vol. 78. Peabody Museum Press, Cambridge.
2009[1989] *Winterville: Late Prehistoric Culture Contact in the Lower Mississippi Valley*. Archaeological Report, 23. Jackson: Mississippi Department of Archives and History.

Brown, Ian W.
1985 *Natchez Indian Archaeology: Culture Change and Stability in the Lower Mississippi Valley*. Archaeological Report, 15. Jackson: Mississippi Department of Archives and History.
1998 Decorated Pottery of the Lower Mississippi Valley: A Sorting Manual. [S.l.]: Mississippi Archaeological Association.

Cobb, Charles R.
2003 Mississippian Chiefdoms: How Complex? *Annual Review of Anthropology* 32:63-84.

Hally, David J.
1986 The Identification of Vessel Function: A Case Study from Northwest Georgia. *American Antiquity* 51(2):267-295.

Hammerstedt, Scott W.
2005 Mississippian Status in Western Kentucky: Evidence from the Annis Mound. *Southeastern Archaeology* 24(1):11-27.

Jackson, H. Edwin
2006 The 2005 Excavations at Winterville Mounds (22WS500), Washington County, Mississippi. Report submitted to the Mississippi Department of Archives and History Box 571 Jackson, Mississippi.
2007 The 2006 Excavation at the Winterville Mounds (22WS500), Washington County, Mississippi. National Geographic Society Committee for Research and Exploration, Grant No. 8007-06.
2012 Excavation of Mound C at Winterville: Chronology, Function and Taphonomic Impacts. Paper presented at the Southeastern Archaeological Conference, Baton Rouge.
2013 The Winterville Archaeological Project: 2005-2013. Presented at the Winterville

Museum Consultation Meeting, Winterville, MS.
Unpublished photograph, Winterville Archaeological Project.

Jackson, H. Edwin, and Jessica Kowalski
2010 Chronology and Function of Mound C, at Winterville: A Report on the 2009 Season. Paper presented at the Joint Annual Meeting of the Louisiana Archaeological Society and the Mississippi Archaeological Association, Monroe.

Jackson, H. Edwin, and Susan L. Scott
2003 Patterns of Elite Faunal Utilization at Moundville, Alabama. *American Antiquity* 68(3):552-572.

Johnson, Hunter B.
2003 A Functional Comparison of Pottery Vessel Shapes from Bottle Creek. In *Bottle Creek: A Pensacola Culture Site in South Alabama*, edited by Ian W. Brown, pp. 156-167. University of Alabama Press, Tuscaloosa.

Knight, Vernon James
1998 Moundville as a Diagrammatic Ceremonial Center. In *Archaeology of the Moundville Chiefdom*, edited by Vernon J. Knight and Vincas P. Steponaitis, pp. 44-62. University of Alabama Press, Tuscaloosa.
2004 Characterizing Elite Midden Deposits at Moundville. *American Antiquity* 69(2): 304-321.
2010 *Mound Excavations at Moundville: Architecture, Elites, and Social Order*. The University of Alabama Press, Tuscaloosa.

Kowalski, Jessica, H. Edwin Jackson, Diana Flosenzier, and Peter VanDyck
2009 The Refuse of Elite Ritual and Politics in the Winterville Chiefdom. Paper presented at the 74th Annual Meeting of the Society for American Archaeology, Atlanta.

Lindauer, Owen, and John H. Blitz
1997 Higher Ground: The Archaeology of North American Platform Mounds. *Journal of Archaeological Research* 5(2):169-207.

Livingood, Patrick C.
2010 *Mississippian Polity and Politics on the Gulf Coastal Plain: A View from the Pearl River, Mississippi*. University of Alabama Press, Tuscaloosa.

Lorenz, Karl G.
1996 Small-Scale Community Organization in the Big Black River Valley of Mississippi. *Southeastern Archaeology* 15(2):145-171.

Maxham, Mintcy D.
2000 Rural Communities in the Black Warrior Valley, Alabama: The Role of Commoners in the Creation of the Moundville I Landscape. *American Antiquity* 65(2):337-354.

McClendon, Barbara
2012 An Analysis of Lithic Debitage From Mound C at the Winterville Mounds Archaeological Site (22WS500). Unpublished honors thesis, Department of Anthropology and Sociology, University of Southern Mississippi, Hattiesburg.

Phillips, Philip
1970 *Archaeological Survey in the Lower Yazoo Basin, Mississippi, 1949-1955*. Papers of the Peabody Museum of Archaeology and Ethnology Vol. 60, No. 1. Harvard University, Cambridge.

Phillips, Philip, James A. Ford, and James B. Griffin
2003[1951] *Archaeological Survey in the Lower Mississippi Alluvial Valley, 1940-1947.* University of Alabama Press, Tuscaloosa.
Sinopoli, Carla M.
1991 *Approaches to Archaeological Ceramics.* Plenum Press, New York.
Steponaitis, Vincas P.
1983 *Ceramics, Chronology, and Community Patterns: An Archaeological Study at Moundville*. Academic Press, New York.
VanDerwarker, Amber M.
1999 Feasting and Status at the Toqua Site. *Southeastern Archaeology* 18(1):24-34.
Welch, Paul D., and Margaret Scarry
1995 Status-Related Variation in Foodways in the Moundville Chiefdom. *American Antiquity* 60(3):397-419.
Wesson, Cameron B.
1999 Chiefly Power and Food Storage in Southeastern North America. *World Archaeology* 31(1):145-164.
Williams, Stephen, and Jeffrey P. Brain
1983 *Excavations at the Lake George Site, Yazoo County, Mississippi 1958-1960.* Papers of the Peabody Museum of Archaeology and Ethnology Vol. 74. Harvard University, Cambridge.