

Shovel Testing of the Estatoe Site 9St3

By
Mark Williams
Department of Anthropology
University of Georgia
LAMAR Institute

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Introduction

This simple and short report details three days of shovel testing at the famous Estatoe Site, 9St3, in Stephens County, Georgia. The Estatoe site was acquired by the Stephens County Foundation in the spring of 2002 from its long-time owners, the Hayes family. I thank the Foundation for permission to conduct the brief excavations reported here. Specifically, I thank Roy Collier and Dan McCollum who worked closely with me on the field work, and Joe Ferguson, the Director of the Foundation.

The Estatoe site was the scene of a large and vibrant Cherokee town during the first third of the 18th century. It also likely was occupied by earlier peoples for perhaps a few hundred years earlier. The heavily plowed mound located there was completely excavated in the late 1950s and early 1960s prior to the creation of the Hartwell Reservoir. These excavations were reported in 1961 by Arthur Kelly and Clemens DeBaillou, both then of the University of Georgia. Their report discusses the excavation of the mound and the discovery in it of several rectangular structures, stacked like pancakes one upon the other. Only one or two small excavations were placed in the village area near the mound, and there is no report of those brief village excavations.

The Estatoe site was thought by the Georgia archaeological community to have been lost under the waters of Lake Hartwell for the past four decades. It was not. I was personally elated, since I had visited the site in 1960 as a 12 year old in the company of my family. When I first was contacted in the spring of 2002 by Roy Collier, I was amazed to hear that Estatoe village was still present and intact. When I visited the site that spring, however, it was clear that the river bottom has changed considerably since the time of Kelly and DeBaillou's work and my

childhood. Specifically, the entire bottom is now a 44 year-old forest, instead of a plowed field. It was relatively easy to relocate the area of the mound excavation, however. There is some indication of past looting near this area, but relatively little recent disturbance. There is no indication of a raised mound here at all now. Indeed, the area of the mound is now a slight depression. I am not certain if the excavations were ever formally refilled, but there are no clear indications now of the limits of the former excavation. The entire area around the mound excavation currently is in a mature pine forest that has been devastated in recent years by pine bark beetles. Trees are falling everywhere. The undergrowth consists of one of the thickest and most luxuriant areas of poison ivy I have ever seen (Figure 1). Indeed, this clearly limits, for the present, the seasons for possibly archaeological work at the site.



Figure 1. Area of Mound A with Knee Deep Poison Ivy.

Goals and Methods

It was clear that the first and most important data that needed to be gathered to aid the Foundation in their management of this important historic resource was the size and shape of the village surrounding the mound. In other words, this project was designed to give us some concrete data on the density of archaeological resources present over the bottomland along the Tugaloo River. Thus a plan for systematic shovel testing of Estatoe was implemented. It was well into the winter of 2002-2003, after the poison ivy died back, when the first field trip was scheduled to initiate the shovel testing program. This was conducted with volunteer student help from the Department of Anthropology of the University of Georgia as well as the volunteer help of several Stephens County citizens. This work was initiated place on Saturday, February 8, 2003, and continued on March 8 of the same year. On the first date nine shovel tests were excavated, and the locations of seven of the concrete boundary markers were recorded. All of these location position were recorded using a Garmin GPS III+ unit global position system unit. No attempt was made to put a grid into the very thick woods at the site—it was unnecessary for this project. An external antenna was used with the GPS unit to increase the accuracy of the recorded locations.

Each shovel test averaged 30 centimeters in diameter and was typically excavated to 40 centimeters in depth. In the rich southeastern part of the site, sterile soil was not reached in many of the tests. Futures test with a post hole digger will be necessary in this area. All the soil from each shovel test was screened through 1/4 inch mesh hardware cloth to recover artifacts.

On March 8 the second field trip the site continued with volunteer labor. Shovel tests number 10 through 25 were excavated on that date, and GPS coordinates were made on five

more concrete boundary markers. After this session, all the tests and markers were mapped using the Surfer computer mapping from Golden Software. The placement of the 25 shovel tests up to that point had been placed intuitively in an to attempt to obtain an even distribution over the site. Not surprisingly, it became clear after mapping these that there were a few noticeable gaps in the distribution. A third field session was planned for the late winter of 2003 to fill these gaps, but the poison ivy returned before another volunteer Saturday could be arranged. Thus the desired third session was delayed until the winter of 2003-2004. The final session was made on February 21, 2004. On that Saturday volunteers excavated the final ten tests, yielding a total of 35 shovel tests covering the entire portion of the site owned by the Stephens County Foundation.

Incidentally, it is now clear that some portion of the site apparently does continue onto the adjacent lands owned by the U. S. Army Corps of Engineers and administered as part of the Hartwell Reservoir property. It would be appropriate in the future to seek permission from this federal agency to conduct shovel tests on their land to complete our knowledge of the density of material over the entire town of Estatoe.

The locations of the concrete property markers are listed in Table 1. The material from each shovel test was washed and analyzed at the Laboratory of Archaeology of the University of Georgia in Athens. The raw data from the shovel tests is included here in Table 2. The weight of the sherds from the many tests ranged from 0 to a very high 180 grams. The data from both of these sources are presented graphically in a series of maps that follow. All of these were created in the computer program Surfer, mentioned earlier. Figure 2 shows the locations and identification numbers of the property markers placed around the site in ca. 1960 by the Corps of Engineers. The grid coordinates on this map, and all the maps are Universal Transverse

Mercator (UTM) coordinates within Zone 17 of that system. These values are referenced to the 1927 North American Datum. Each of the squares on the map are 100 meters in size, thus each square represents 1 hectare of area.

Figure 3 shows the location of the concrete markers plus the location of the 35 shovel tests made in 2003 and 2004. Each shovel test is numbered as referenced to the data in Table 2. Figure 4 is a similar map within which the size of each dot is a function of the weight of sherds recovered from that shovel test. The sizes are not exactly a linear representations of the weights, however, but a non-linear compressed one. The richest holes would have produced much larger spots, obscuring much of the map. The pattern is clear however. The reader is again referenced to the actual data in Table 2.

Figure 5 shows a color shaded contour map of the same sherd weight data. Note that the program also created estimated density contours in the area owned by the Corps of Engineers. To be clear, however, no shovel tests whatsoever were made on Corps land.

Discussion

The richest area of the site in terms of artifacts is the southeastern finger of the property. Specifically, the area around the mound, adjacent to Shovel Test 1, is the highest on the site. The density is still very heavy southeast of the mound, and northwest of the mound. This finger is associated with an old levee ridge through the bottom at this point, and is roughly 3 hectares in size. This clearly is the main part of the site, and is the most important to preserve into the future.

Of great interest, however, is that there is a light density of pottery over almost the entire

rest of the bottomland at the site. A guess might be that this part of the site was occupied during the height of the Cherokee occupation when a 1721 census says over 600 people were living in the town. More detailed excavation will be necessary to discovery whether this is true or not. There is a modest increase in pottery in the northwestern part of the site as represented by Shovel Test 24.

The areas of the Corps land northeast and southwest of the mound likely have a large density of artifacts, particularly the are to the northeast of the mound. The contour map in Figure 4 shows that the main dense area does not exactly align with the ridge finger on which the mound is located, but courses almost east-west in the area north of the mound. This pattern may prove to be false, however, if the very low data found in Shovel Test 6 proves not to be representative of artifact density immediately west of the mound.

Recommendations

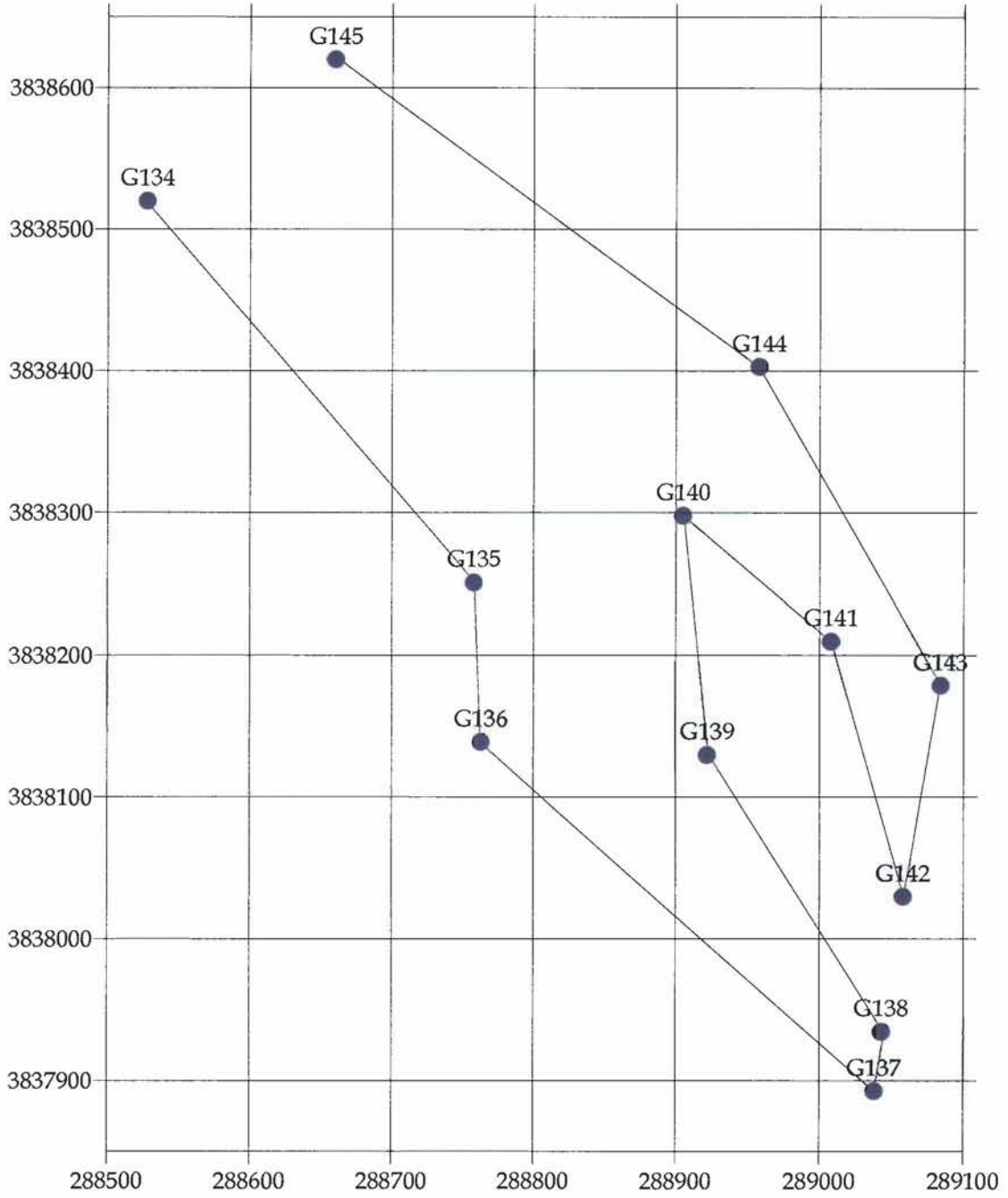
Based upon the observation that no area of the bottom seems completely devoid of artifacts, any construction in the bottom must be preceded by formal archaeological excavations of that area. In other words, significant archaeological remains might exist anywhere in the bottom. Clearly, however, the broad open area ca. 400 meters northwest of the mound has a lower density of artifacts than any other part of the bottom.

There is no particular advantage archaeologically to be gained by reopening the mound excavation anytime in the near future, if ever. It would be desirable to conduct some test excavations in the rich midden area northwest of the mound at some point. This work should be conducted as a series of 2 by 2 meter excavation squares. Many post molds from many time

period would be expected here however, and their overlapping nature would make the identification of specific structures in that area of deep midden difficult.

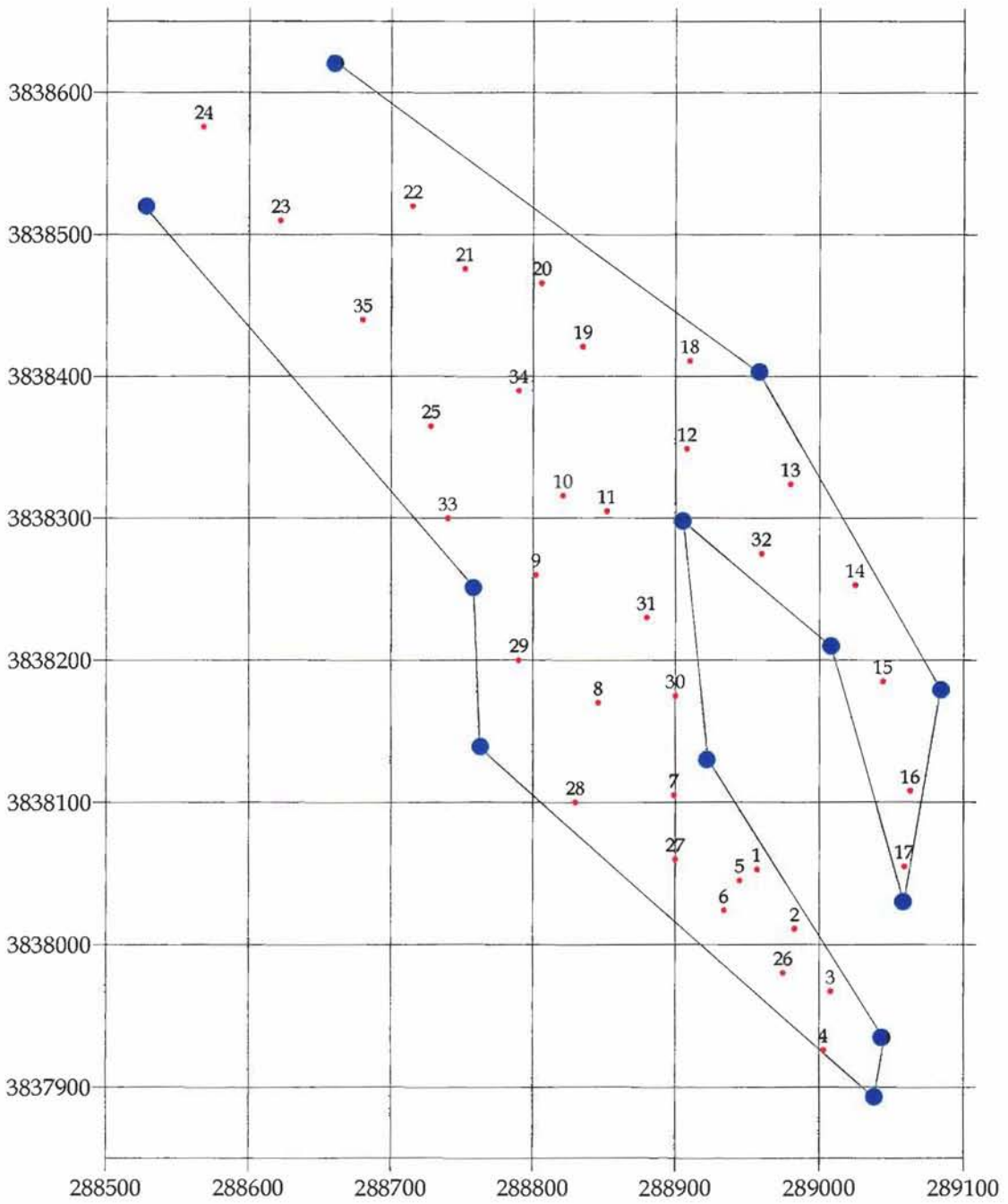
Finer grained shovel testing everywhere on the site would be a useful project for the future. At present the interval is on the order of 50-100 meters, and very large interval. As a general rule, there can never be too many shovel tests on a site such as this one. It may be possible to identify the locations of single houses in the area away from the mound if additional tests were made. On the other hand, the amount of labor necessary to decrease the interval between shovel tests would go up significantly as the interval decreases to 20 meters or smaller.

For more detailed work at many parts of the site, something must be done to begin obliterating the poison ivy, particularly in the area near the mound. The hand screening of the soil from any potential excavation units near the mound could be downright dangerous until this vegetative villain is brought under control!

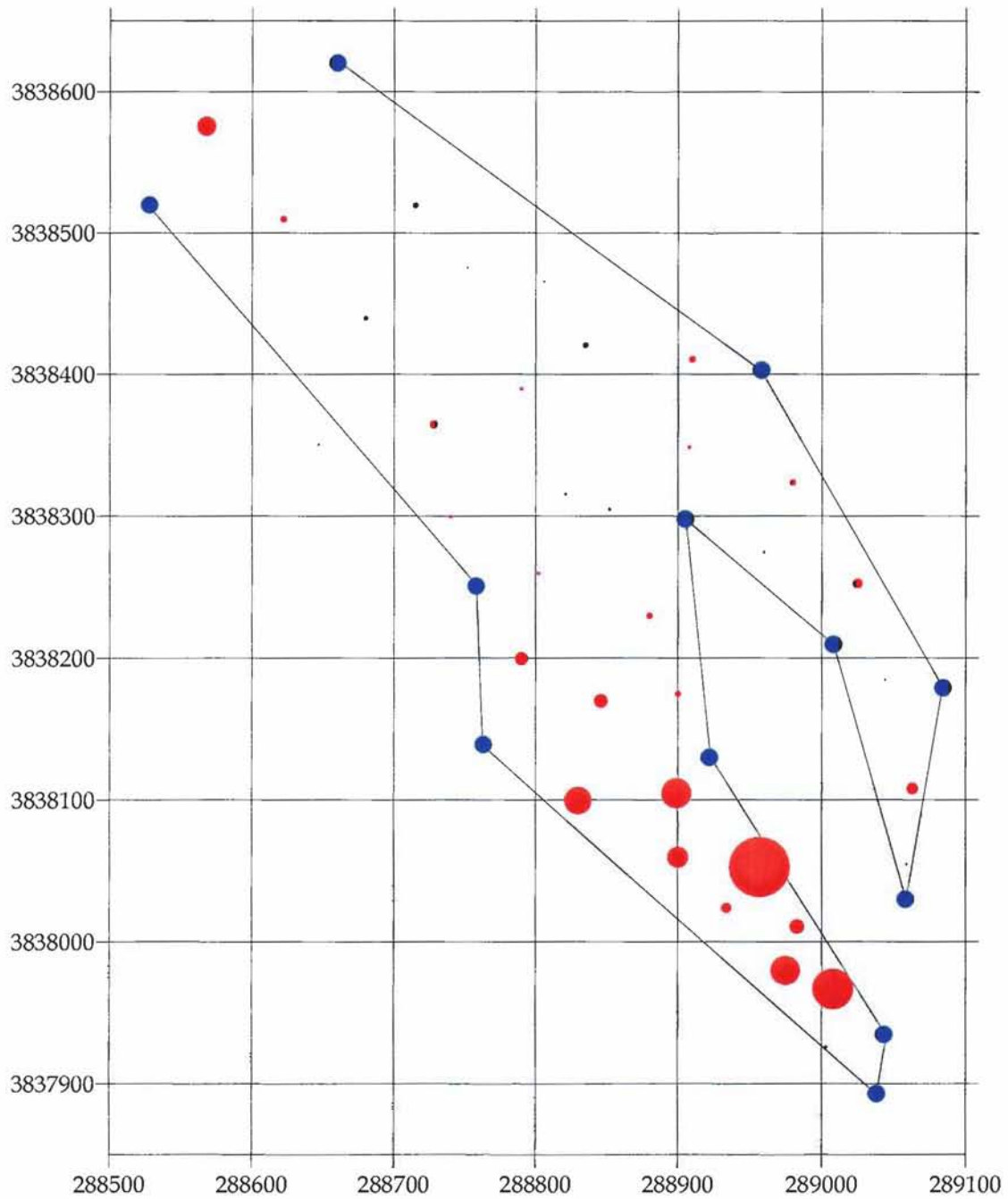


Estatoe, 9St3

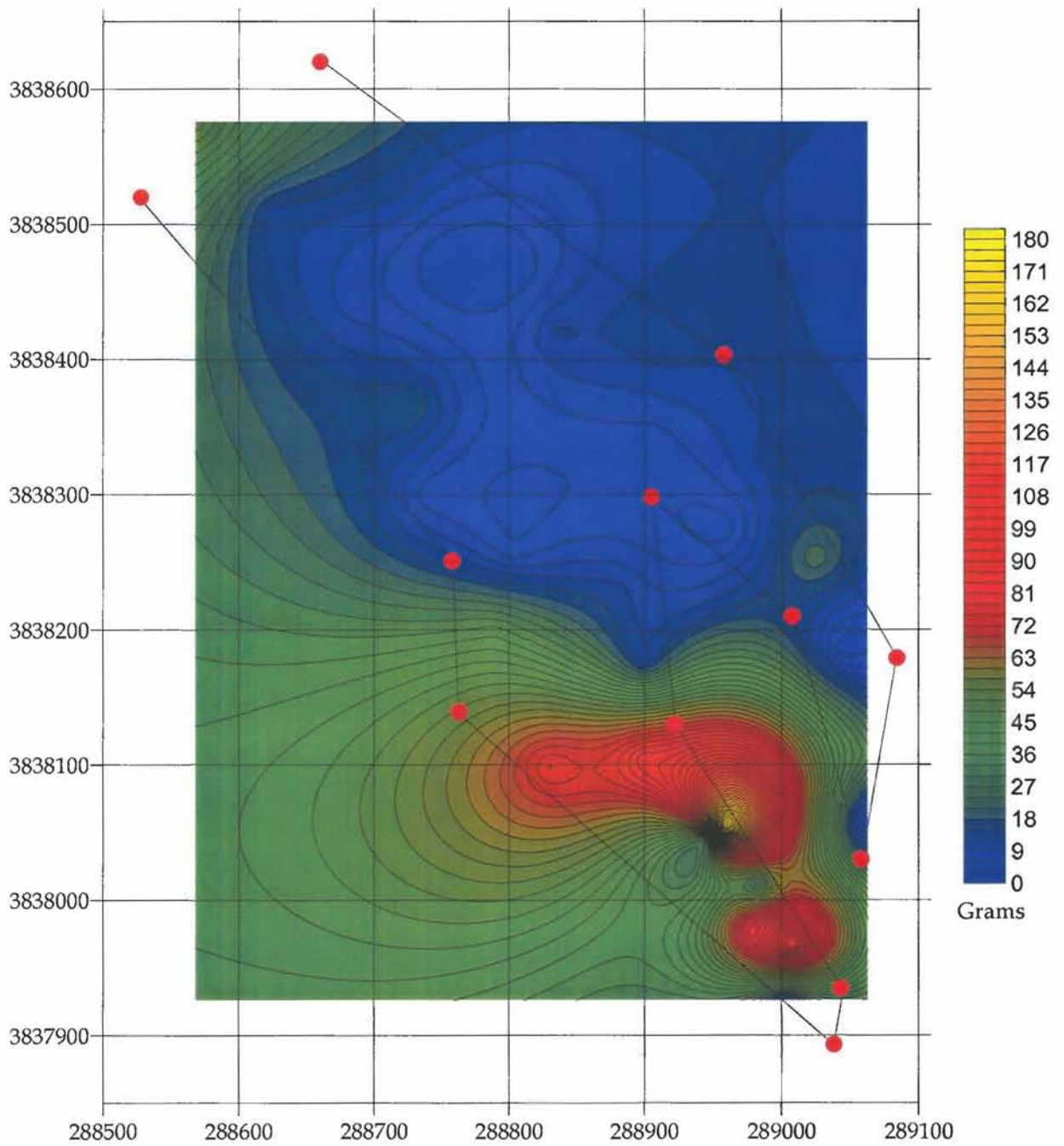
Location of Concrete Property Boundary Markers



Estatoe, 9St3
Shovel Test Locations and Numbers



Estatoc, 9St3
Relative Weights of Sherds per Shovel test



Estate, 9St3
 Contour Map of Sherd Weight from Shovel Tests

Number	North	East	Date
G136	3838139	288763	8-Feb-03
G137	3837893	289038	8-Feb-03
G138	3837935	289043	8-Feb-03
G139	3838130	288922	8-Feb-03
G140	3838298	288905	8-Feb-03
G141	3838210	289008	8-Feb-03
G142	3838030	289058	8-Feb-03
G144	3838403	288958	8-Mar-03
G143	3838179	289084	8-Mar-03
G145	3838620	288660	8-Mar-03
G134	3838520	288528	8-Mar-03
G135	3838251	288758	8-Mar-03

Table 1. Concrete Boundary Marker Locations

ST Number	North	East	Sherd Number	Sherd Weight	Date
1	3838053	288957	103	179.06	8-Feb-03
2	3838011	288983	25	38.64	8-Feb-03
3	3837967	289008	71	117.80	8-Feb-03
4	3837926	289003	4	3.45	8-Feb-03
5	3838045	288945	23	28.80	8-Feb-03
6	3838024	288934	16	24.71	8-Feb-03
7	3838105	288899	77	86.50	8-Feb-03
8	3838170	288846	19	36.59	8-Feb-03
9	3838260	288802	1	3.41	8-Feb-03
10	3838316	288821	2	2.76	8-Mar-03
11	3838305	288852	4	3.20	8-Mar-03
12	3838349	288908	4	5.47	8-Mar-03
13	3838324	288980	1	11.87	8-Mar-03
14	3838253	289025	20	23.38	8-Mar-03
15	3838185	289044	2	0.47	8-Mar-03
16	3838108	289063	23	28.58	8-Mar-03
17	3838055	289059	0	0.00	8-Mar-03
18	3838411	288910	6	13.82	8-Mar-03
19	3838421	288835	7	12.56	8-Mar-03
20	3838466	288806	0	0.00	8-Mar-03
21	3838476	288752	0	0.00	8-Mar-03
22	3838520	288715	5	12.44	8-Mar-03
23	3838510	288622	9	14.06	8-Mar-03
24	3838576	288568	47	53.58	8-Mar-03
25	3838365	288728	9	18.33	8-Mar-03
26	3837980	288975	100	84.18	21-Feb-04
27	3838060	288900	82	58.71	21-Feb-04
28	3838100	288830	58	78.64	21-Feb-04
29	3838200	288790	29	34.35	21-Feb-04
30	3838175	288900	5	12.16	21-Feb-04
31	3838230	288880	7	13.50	21-Feb-04
32	3838275	288960	1	1.06	21-Feb-04
33	3838300	288740	6	4.09	21-Feb-04
34	3838390	288790	4	4.45	21-Feb-04
35	3838440	288680	4	8.09	21-Feb-04

Table 2. Shovel Test Data.