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Certain Aboriginal Remains
OF THE
Northwest Florida Coast
PART II
By CLARENCE B. MOORE

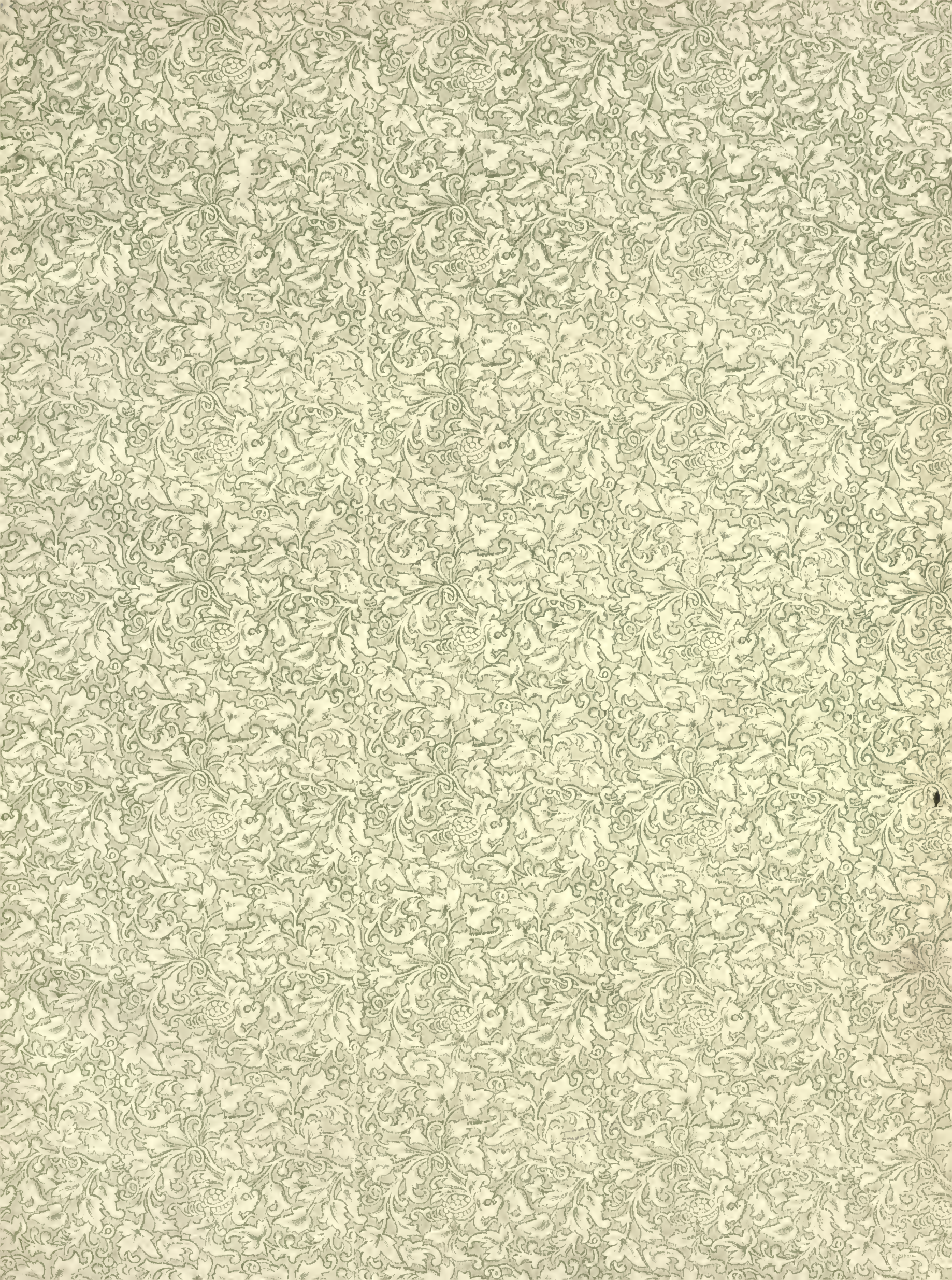


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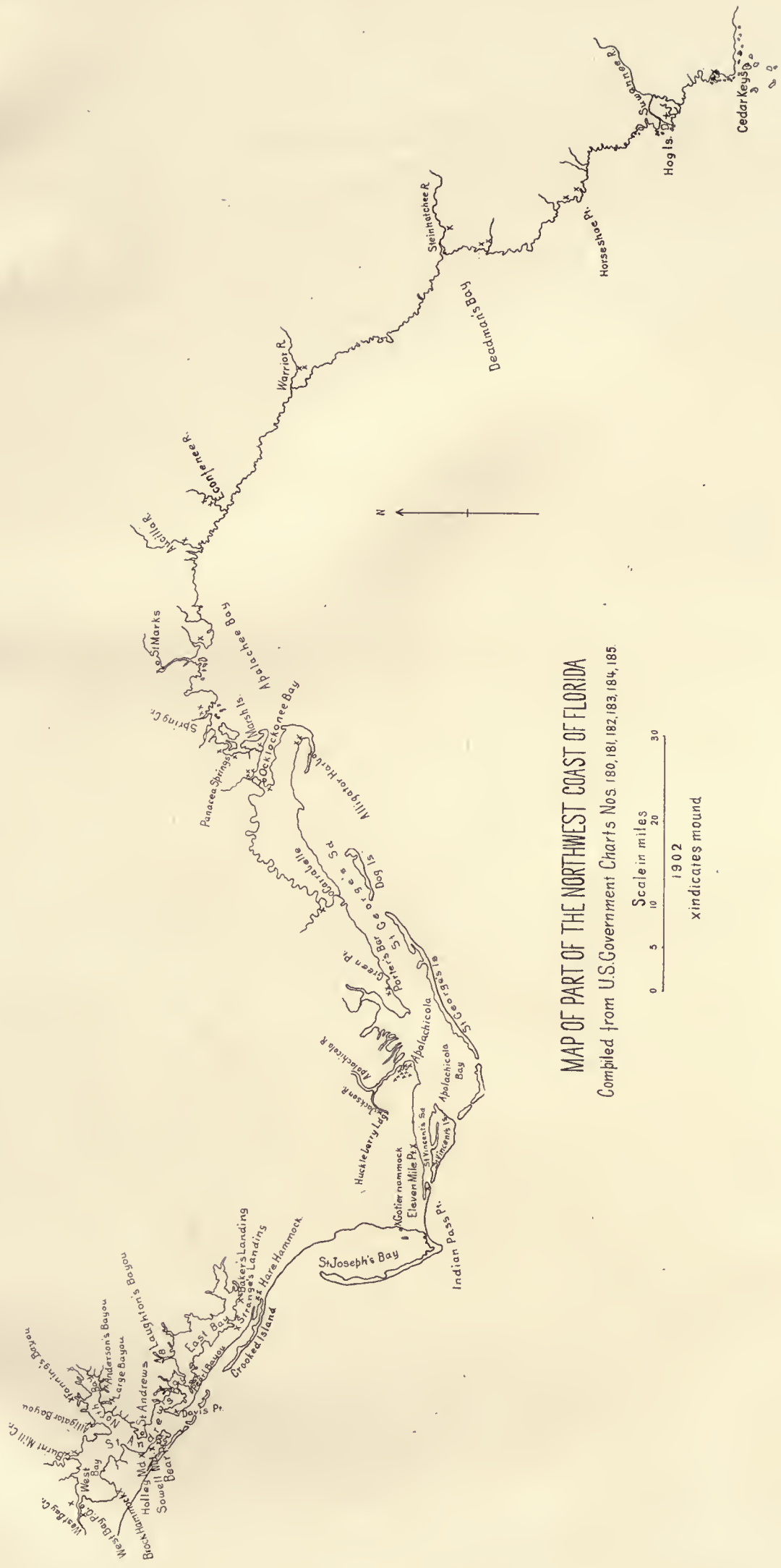
REPRINT FROM THE JOURNAL OF THE ACADEMY OF NATURAL
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PHILADELPHIA, 1902.



PHILADELPHIA :
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53-55 N. 7th St.
1902

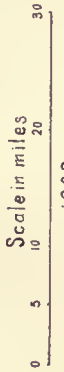
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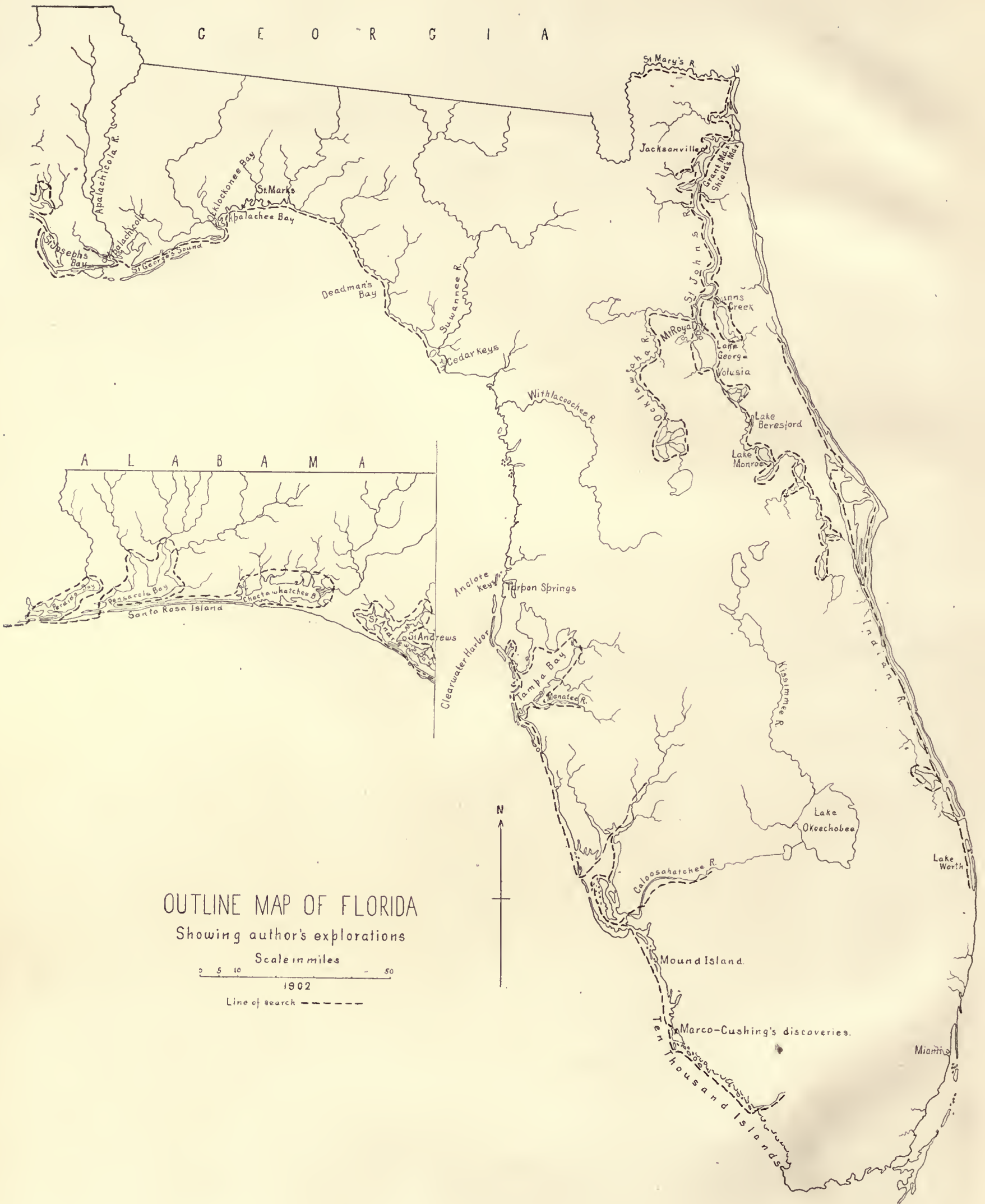
MAP OF PART OF THE NORTHWEST COAST OF FLORIDA

Compiled from U.S. Government Charts Nos. 180, 181, 182, 183, 184, 185



x indicates mound

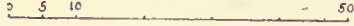
G E O R G I A



OUTLINE MAP OF FLORIDA

Showing author's explorations

Scale in miles



1902

Line of search - - - - -

CERTAIN ABORIGINAL REMAINS OF THE NORTHWEST
FLORIDA COAST.

PART II.

BY CLARENCE B. MOORE.



In the first part of this report, of which this is the second and concluding part, we gave the result of our investigations along a portion of the northwest coast of Florida, beginning at Perdido bay, the coast-boundary between Alabama and Florida, and continuing eastward along Pensacola bay, Santa Rosa sound and Choctawhatchee bay.

In this second part we describe the result of our work going eastward and later, southward, along St. Andrew's bay, St. Andrew's sound, St. Joseph's bay, St. Vincent's sound, Apalachicola bay, St. George's sound, Alligator Harbor, Ocklockonee bay, Apalachee bay, Deadman's bay and the rivers and Gulf coast to Cedar Keys.

Mr. J. S. Raybon, captain of the flat-bottomed steamer from which our researches are always conducted, with a companion, spent a number of months previous to our visit in going over all the territory later investigated by us, locating all known aboriginal remains along our intended route. The names and addresses of owners¹ were sent to us in advance that, permission to dig being obtained previous to our visit, there might be no delay when we found ourselves on the ground. In fact, by traveling after working hours no time was wasted and the four months of the season of 1902 were taken up almost entirely in digging.

From St. Andrew's bay to Apalachee bay, inclusive, with one exception, we investigated every mound the most careful search could locate and, we believe, all that existed, save several small, flat, circular heaps in open pine woods, which experience has taught us were not intended for burial purposes, but as sites for tepees.

Along the coast between the eastern end of Apalachee bay and Cedar Keys, we investigated all the mounds that persistent search had located, but as the shore is swampy in many places and the water is shoal and often studded with masses of lime rock, access is difficult and hence inhabitants from whom inquiries as to mounds can be made are few. Therefore, it is likely some mounds escaped us, but such as were dug by us were probably representative.

We know of no previous scientific work in the district we have gone over; but

¹ Our sincere thanks are tendered owners of mounds investigated by us, who, almost without exception, gave full permission to dig.

unfortunately the mounds were not intact. Not treasure seekers alone have dug into the mounds of St. Andrew's and of Apalachicola, bays, but individuals seeking curiosities to sell, some of whom have come under our personal notice. Still, the size of the mounds in some instances has been a partial protection against a single digger, while ignorance as to where to search has often saved contents of smaller mounds.

As markedly as was the case in the first part of this report, the result of our work this season resolved itself into little more than a study of the aboriginal earthenware of the coast-district investigated by us. Lewis Morgan, sometime an honored correspondent of our Academy of Natural Sciences, has said, we believe, in his "League of the Iroquois", that the advent of earthenware marks the line between savagery and barbarism. Hence it may be considered, in view of the importance of earthenware as an aid to the study of the people, that the returns of our season's work have been sufficient.

All measurements of earthenware reported in this volume are approximate.

It must be borne in mind in respect to process work that reductions in size are made with regard to diameter and not area. If a diagram four inches by two inches is to be reduced one-half, each diameter is divided by two and the reproduction, which is called half size, is two inches by one inch. The area of the original diagram, however, is eight square inches, while that of the so-called half size reproduction is two square inches, or one-quarter the area. To find the actual size of a design shown in diagram, multiply the length and the breadth by two, if the diagram is given "half size"; by three, if "one-third size", and so on.

In a few cases partial restoration of vessels has been attempted, but always in a material differing in color from the original so that the restoration may be readily recognized, and it has been done only when the remainder of the vessel clearly indicated the size and shape of the missing part. All objects found by us, with the exception of certain duplicates sent to the museum of Phillips Academy, Andover, Mass., may be seen at the Academy of Natural Sciences of Philadelphia.

Dr. M. G. Miller, who has been with us in all our previous mound work, determined as to human remains this year and lent his assistance in a general way to all the field work and in putting this report through the press.

Mounds Investigated.

- Mound near West Bay post-office, St. Andrew's bay.
- Mound near West Bay creek, St. Andrew's bay.
- Mound in Brock Hammock, St. Andrew's bay.
- Larger Mound near Burnt Mill creek, St. Andrew's bay.
- Smaller Mound near Burnt Mill creek, St. Andrew's bay.
- Mound near Alligator bayou, St. Andrew's bay.
- Mound near Fanning's bayou, St. Andrew's bay.
- Mound near head of North bay, St. Andrew's bay.
- Mound near Anderson's bayou, St. Andrew's bay.
- Mound near Large bayou, St. Andrew's bay.

- Holley Mound, St. Andrew's bay.
 Sowell Mound, St. Andrew's bay.
 Mounds near Bear Point, St. Andrew's bay (4).
 Cemetery at St. Andrew's, St. Andrew's bay.
 Mound at St. Andrew's, St. Andrew's bay.
 Mound near Davis Point, St. Andrew's bay.
 Mound near Pearl bayou, St. Andrew's bay.
 Mounds near Laughton's bayou, St. Andrew's bay (2).
 Mound near Strange's Landing, St. Andrew's bay.
 Mound near Baker's Landing, St. Andrew's bay.
 Mounds near Hare Hammock, St. Andrew's sound (2).
 Mound in Gotier Hammock, St. Joseph's bay.
 Mound near Indian Pass Point, St. Vincent's sound.
 Mound at Eleven Mile Point, St. Vincent's sound.
 Cool Spring Mound, Apalachicola bay.
 Mounds near Apalachicola, Apalachicola bay (2).
 Pierce Mounds, near Apalachicola, Apalachicola bay (5).
 Singer Mound, near Apalachicola, Apalachicola bay.
 Jackson Mound, near Apalachicola, Apalachicola bay.
 Mound near Huckleberry Landing, Jackson river.
 Mound near Porter's Bar, St. George's sound.
 Mound near Green Point, St. George's sound.
 Mound on Carrabelle river.
 Tucker Mound, Alligator Harbor.
 Yent Mound, Alligator Harbor.
 Mound at Marsh Island, Ocklockonee bay.
 Nichols Mound, Ocklockonee bay (2).
 Mound near Ocklockonee bay.
 Hall Mounds, Apalachee bay (2).
 Mound near Spring creek, Apalachee bay.
 Mound near the Mound Field, Apalachee bay.
 Mound near St. Mark's, Apalachee bay.
 Mound near the Aucilla river.
 Mounds near the Econfenee river (2).
 Mounds near the Warrior river (2).
 Mound near the Steinhatchee river.
 Mounds near Goodson's Fish-camp, Gulf coast (2).
 Mound near Murphy Landing, Gulf coast.
 Mounds near Horseshoe Point, Gulf coast (3).
 Mound on Hog Island, Gulf coast.
 Mound on Pine Key, Gulf coast.
 Mound near the Shell-heap, Gulf coast.

MOUND NEAR WEST BAY POST-OFFICE, WASHINGTON COUNTY.

About one-quarter of a mile WNW. from the village known as West Bay post-office, in a field formerly under cultivation, on property of Mr. George W. Lee of Point Washington, Florida, was a mound about 8 feet in height and 58 feet through the base. This mound, formerly a truncated cone, had been considerably dug into superficially and to a certain extent in a more serious way, but not sufficiently to disturb more than a small portion of the mound.

The mound was totally demolished by us, including its extreme marginal parts.

No interments were found until the central parts of the mound were reached and such as were met with were so badly decayed that almost no trace of them remained. Owing to this it was impossible to determine the form of interment, but a small fragment of femur, lying just beneath the crowns of certain teeth, indicated a bunched burial in that case at least.

Over certain burials, as is often seen in Florida mounds, were deposits of charcoal which cannot have been the remains of continued fires since the bones were not calcined nor the sand reddened by heat.

With one burial was a knife or arrowhead of chert; with another, a thick sheet of mica. In caved sand was a hone of ferruginous sandstone¹ and a large "celt".

Incidentally, we may say that in this report the rocks from which the "celts" discovered by us were made will not be stated. Apparently no new features were presented and in many cases these implements were given to owners of mounds, who wished souvenirs from them.

Beginning almost directly at the margin of the NE. part of the mound, on or near the base, as a rule, vessels of earthenware were met with, sometimes singly and again a number together. This deposit, continuing and broadening to the eastward, extended under the slope of the mound almost to the margin of the summit plateau, where the burials began. At times vessels and quantities of fragments of vessels lay together. These fragments, when collected, often failed to furnish full complement of the vessels to which they belonged, but as parts were found widely separated sometimes, it is likely many vessels had been broken first and then scattered through the mound while it was in process of construction, a custom we have noted in the first part of this report. An example of this practice was noticed in the case of a vessel with five compartments, which had been broken into four parts. One of these parts was met with in digging, several hours before the others which, themselves, were somewhat separated and many feet nearer the center of the mound.

As we had found the case to be before along the northwest coast, the sand in that part of the mound in which the earthenware deposit lay was much darker in color than that of the rest of the mound. During our investigations the present sea-

¹ Our thanks are tendered Messrs. Theodore D. Rand and Lewis Woolman, of our Academy of Natural Sciences, for all determinations of rocks mentioned in this report. As it was not expedient to mutilate specimens for microscopic slides, determinations have not been made with the certainty that otherwise would have been the case.

son so universal was this occurrence of blackened sand in which no particles of charcoal were apparent that a certain amount from the Hall mound, near Panacea Springs, was put aside by us and afterward submitted to Prof. Harry F. Keller, Ph. D., of Philadelphia, who, under date of June 28, 1902, reports as follows:

"The chemical and microscopic examination of the black sand from the mound at Panacea Springs, Fla., shows that the dark color is due to carbonaceous matter which is very probably of animal origin. Most of it is in the form of very minute black particles adhering to the sand. These particles show no distinct structure and are certainly not wood charcoal. When the sand is strongly heated in air, the carbon burns off, leaving a residue nearly white. The black particles are soluble to a considerable extent in caustic potash and in nitric acid, imparting a deep brown color to these solvents, an indication that organic matter is present. A few larger particles which I succeeded in picking by the aid of a lens were incinerated, and the residue gave a strong reaction for phosphoric acid. Could this matter be the product of partial charring or slow decomposition of bone?"

Dr. H. F. Keller submitted the sand to Dr. I. Keller, an expert microscopist, who concurred in the belief that the carbonaceous matter was of animal origin and stated, "I cannot think of anything in the vegetable line that could have produced this result."

Many of the vessels and parts of vessels found by us in this mound, being of ordinary form, of inferior ware and undecorated, will not be particularly described.

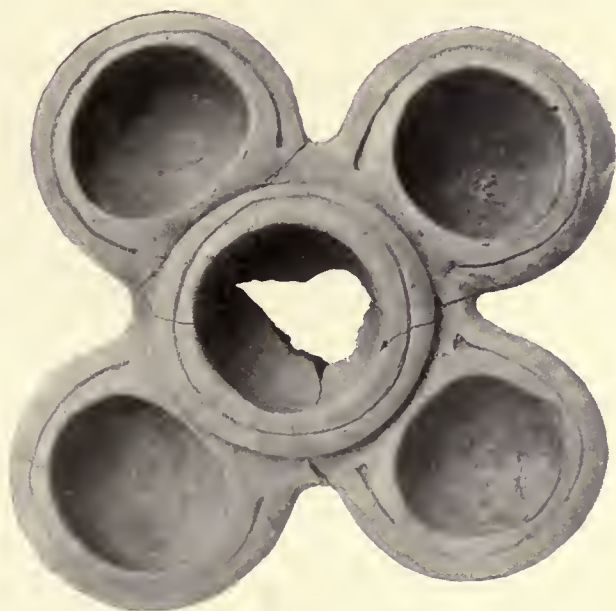


FIG. 1.—Vessel No. 1. Mound near West Bay P. O. (One-third size.)

vessel and the life-form. The head, body and tail are represented by the outlines of the three compartments and to make the resemblance still stronger, horns or "feelers," have projected from the head. Parts of these, missing when found, have

Vessel No. 1.—In Fig. 1 is shown a vessel with five circular compartments, a central one being somewhat raised above the surrounding four. The only decoration is an incised line encircling the middle compartment and one almost surrounding each of the others. The ware is thick and of fairly good quality. The central compartment alone has the basal perforation. Maximum diameter of vessel, 9.5 inches; height, 2.1 inches. We have not met with compartment vessels of this character west of this place.

Vessel No. 2.—Fig. 2 shows an entirely new type, we believe, a combination of the compartment

been restored. The ware, which is thick and fairly good, has traces of crimson pigment at various points. The middle compartment only has the base-perforation. Length, 9.5 inches; height, 2 inches.



FIG. 2.—Vessel No. 2. Mound near West Bay P. O. (Three-fourths size.)

Vessel No. 3.—This vessel, shown in Fig. 3, perforate, undecorated, has a globular body and slightly expanding neck. The rim is trilateral. Height, 8.5 inches; maximum diameter, 7 inches; opening, 5.2 inches.



FIG. 3.—Vessel No. 3. Mound near West Bay P. O. (Half size.)

Vessel No. 4.—Seems to be a life-form, though the mouth is peculiarly placed in relation to the ridge on the back if this latter is intended to represent a dorsal fin. The opening has a portion missing at one side, but as the margin is unimpaired a part of the way, it is not likely much has been broken off. There are traces of crimson paint on the vessel inside and out (Fig. 4). Length, 11.2 inches; height, 6 inches; width, 6.5 inches.

Vessel No. 5.—In Fig. 5 is shown a vessel which, expanding slightly from the base upward, ends in an oblate spheroid. On the lower part of the vessel are incised encircling lines and punctate decoration. Two lines of punctate markings are below



FIG. 4.—Vessel No. 4. Mound near West Bay P. O. (Three-fifths size.)



FIG. 5.—Vessel No. 5. Mound near West Bay P. O. (Five-sixths size.)

the rim. On the other side are small holes for suspension. A mortuary perforation of base is present. Height, 6 inches; maximum diameter, 5.8 inches.



FIG. 6.—Vessel No. 6. Mound near West Bay P. O. (Full size.)

Vessel No. 6.—Part of a compartment vessel of a type new to us is shown in Fig. 6. We cannot say how many divisions there have been. In the part remaining a small one is shown within another.

Vessel No. 7.—A perforate bowl is shown in Fig. 7 giving a good example of handsomely executed pinched decoration, eight rows of which surround the body. Height, 4 inches; maximum diameter, 5.8 inches.

Vessel No. 8.—An interestingly decorated vessel shown in Fig. 8 of somewhat less than 1 pint capacity. The upper part of the body is quadrilateral. The lower part tapers to what was a flat base previous to the mortuary mutilation. The rim projects horizontally with a small handle on two opposite sides.

Vessel No. 9.—A perforate bowl of rather poor ware, of about 1 gallon capacity, has below the rim four encircling rows of impressions made by a triangular point, between two incised lines.

Vessel No. 10.—The upper portion of a vessel of good ware, having below the rim incised and punctate decoration. The design, which shows an animal head with eyes, is once repeated on the vessel (Fig. 9).

Vessel No. 11.—A bowl of about 3 pints capacity, of uniform decoration, incised and punctate. A small animal head projects vertically from the rim (Fig. 10).



FIG. 7.—Vessel No. 7. Mound near West Bay P. O. (Four-fifths size.)

Vessel No. 12.—A vessel of about 1 quart capacity, in form an ovoid truncated at either end, with a flaring five-pointed rim, is shown in Fig. 11.



FIG. 8.—Vessel No. 8. Mound near West Bay P. O. (Half size.)

Vessel No. 13.—A jar of about 3 pints capacity, badly crushed when found. The fragments have been cemented together with partial restoration. The ware is inferior and the incised decoration is rude. A handle or lip projects obliquely from the rim (Fig. 12).

Vessel No. 14.—A vessel of about 3 quarts capacity, found in fragments a number of which were not recovered. The parts have been cemented together and certain restoration has been attempted. The body of the vessel has an oval transverse section; the opening is oval. From one end of the vessel projects a large head, perhaps intended

to represent that of a panther. It certainly bears no resemblance to the head of a bear, of a wolf, or of an aboriginal dog. There is interesting incised and punctate decoration, in part representing conventionalized fore-legs and hind-legs (Fig. 13).

Vessel No. 15.—This vessel, of about the same shape as the one just described, was found broken to fragments from which certain parts of the vessel are missing.

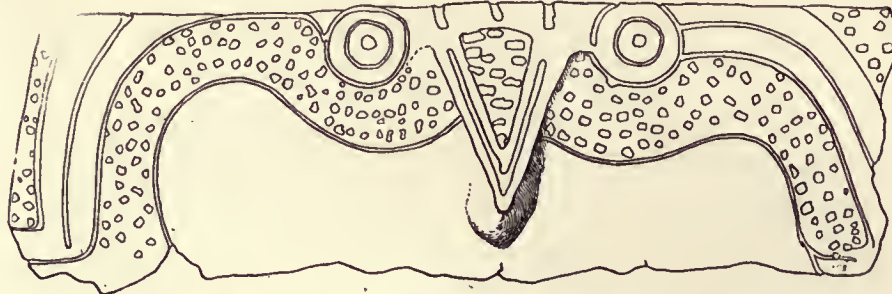


FIG. 9.—Vessel No. 10. Decoration. Mound near West Bay P. O. (Half size.)

Cementing and partial restoration show the body to have been of about 2 quarts capacity, with decoration, incised and punctate, in part representing wings. As the design varies somewhat on either side, complete restoration has been impossible. At either end is a bird's head from which the bill has been broken in part (Fig. 14). On



FIG. 10.—Vessel No. 11. Mound near West Bay P. O. (Half size.)



FIG. 11.—Vessel No. 12. Mound near West Bay P. O. (Half size.)



FIG. 12.—Vessel No. 13. Mound near West Bay P. O. (Half size.)



Fig. 13.—Vessel No. 14. Mound near West Bay P. O. (Seven-eighths size.)



FIG. 14.—Vessel No. 15. Mound near West Bay P. O. (Two-thirds size.)

this vessel are a number of symbols, perhaps representing feathers. Symbols of this class are found on practically all bird-vessels and consist of straight or curved lines with circular or triangular enlargement at one end or at both ends.



FIG. 15.—Vessel No. 16. Mound near West Bay P. O. (Two-thirds size.)

These bird-symbols are sometimes found on vessels apparently having no connection with bird forms, though they may indicate some connection with the bird. On the other hand, as Professor Holmes has shown, the aborigines were not always consistent and the bird symbol at times may have degenerated into an ornament. At all events, the symbols we have described belong normally to the bird.



FIG. 16.—Handle of vessel. Mound near West Bay P. O. (Eight-ninths size.)

Vessel No. 16 is a graceful vessel of about 2 quarts capacity found in small fragments and partly restored. Seemingly, the decoration, incised and punctate, is not uniform. This vessel, made up of four lobes, is shown in Fig. 15.



FIG. 17.—Handle of vessel. Mound near West Bay P. O. (Eight-ninths size.)

Figs. 16, 17, 18, 19 represent four bird-head handles from this mound.

On the base, in the central part of the mound, sometimes together in twos and threes, apart from burials, were sixteen vessels of ordinary type and inferior ware. Some were undecorated; some had an indistinct, complicated stamp; a few had scalloped margins. All had the basal perforation which we believe, without exception, was the case with the vessels of this mound.

These vessels, which in capacity ranged between 2 quarts and four times that amount, were so water soaked and so hopelessly crushed that all hope of saving them was abandoned.



FIG. 18.—Handle of vessel. Mound near West Bay P. O. (Eight-ninths size.)



FIG. 19.—Handle of vessel. Mound near West Bay P. O. (Eight-ninths size.)

MOUND NEAR WEST BAY CREEK, WASHINGTON COUNTY.

This mound, in pine woods on property of Mr. W. M. Sowell of Point Washington, Florida, is about one-half mile in a northeasterly direction from the northern side of the western extremity of West bay, which is one of the subdivisions of St. Andrew's bay (see map). Its diameter of base was 45 feet; its height, 2 feet 9 inches. Careful investigation led to the conclusion that this mound belonged to the domiciliary class.

MOUND IN BROCK HAMMOCK,¹ WASHINGTON COUNTY.

This mound, about 2.5 feet high and 38 feet across the base, was about 3 miles in a S. direction from West Bay post-office and 300 yards, approximately, from the water, on land said to belong to the United States Government. A large excavation had been made in the center previous to our visit. Extensive trenching by us yielded a small, imperforate, undecorated bowl of poor quality and several sherds, bearing the small check stamp or the complicated variety.

Human remains, which were no doubt central, had probably fallen to the lot of the previous digger.

LARGER MOUND NEAR BURNT MILL CREEK, WASHINGTON COUNTY.

This mound, which the owner, Mr. Marion Shypes, who lives nearby, informed us had been ploughed over ten years, stood in a cultivated field on the north side of the creek about 1 mile from the mouth and 200 yards from the water, approxi-

¹ The word hammock, used by Captain Bernard Romans in the latter half of the XVIII century, in his "Concise Natural History of East and West Florida," stands for territory on which grow palmetto, oak and other woods in contradistinction to pine lands, the prairie, the swamp and the marsh. The word is widely employed in Florida.

mately. Its height was a trifle over 4 feet; its basal diameter, 50 feet. Its shape had been the usual truncated cone.

The mound, which showed no trace of previous digging, was totally demolished by us.

Human remains, which were almost reduced to the consistency of paste, were found at eleven points, beginning about 15 feet from the center and consisted of single skulls and skulls with a few long bones.

Once human remains lay near a deposit of earthenware and once a few thin sheets of mica were in association.

In this mound earthenware was met with near the margin of the northeastern side and continued in, on or near the base, singly or in larger deposits of five, seven and ten vessels together until within ten or twelve feet of the center of the mound. But two or three fragments of vessels came from other portions of the mound.

In all, 39 vessels were noted by us, though it is likely some, broken into small pieces and mixed together, were neglected in our count. Many vessels were hopelessly wrecked through the action of water on the inferior ware, while others, taken out entire, are not of a character to merit particular description.

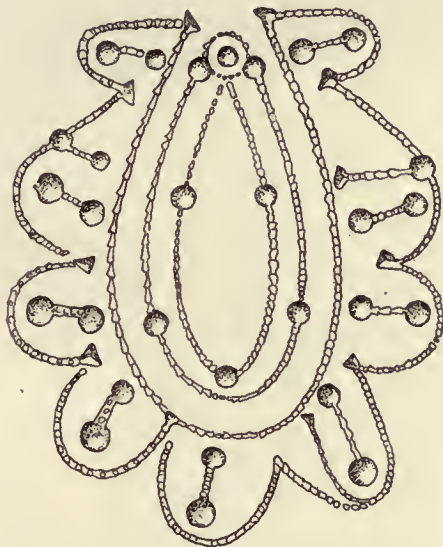


FIG. 20.—Vessel No. 4. Decoration. Larger mound near Burnt Mill Creek. (Half size.)

Vessel No. 4.—A small cup with rounded base having incised decoration on part of the body and on the base, shown diagrammatically in Fig. 20, where it has been necessary to allow a certain expansion to the design on account of its position. Hence the scale given is approximate only.

Vessel No. 5.—An undecorated jar almost cylindrical but expanding slightly at the opening. Height, 9 inches; maximum diameter, 5.7 inches.

Vessel No. 8.—About 1 quart capacity, heart-shaped in section as to the body, with constricted neck and flaring four pointed rim. The decoration, made up of encircling, undulating lines, is similar to that on Vessel No. 5 from the Hall Mound, to be described later.

Vessel No. 15.—Globular with thickened rim, undecorated, of about 2 quarts capacity.

Vessel No. 16.—A hemispherical body with slightly elongated base, part of which has been lost through mortuary breakage. The ware is yellow. The decoration consists of crosshatch design finely incised. At the corners of the spaces between the designs are imprints of a tubular implement, probably a reed (Fig. 21). Maximum diameter, 10.5 inches; present height, 5 inches; diameter of opening, 6.5 inches.

Vessel No. 18 is rather an image of earthenware, almost solid and of considerable weight. This image, representing a male wearing a breech clout, ends at the knees, apparently. The arms are folded across the chest. There are traces of crimson paint on various parts of the body. The upper part of the head, which had begun to crumble owing to the dampness of the mound, received, in addition, a blow from a spade (Fig. 22).



FIG. 21.—Vessel No. 16. Larger mound near Burnt Mill Creek. (About two-thirds size.)

Vessel No. 27.—Of about 1 quart capacity with a body heart-shaped in outline and a neck flaring slightly. The decoration consists of four encircling rows of punctate impressions above an incised line.

Vessel No. 31.—Seemingly, when found, a solid full-length image of the human form which, on removal, fell into an infinite number of small bits of the consistency of paste. These, on drying, became extremely friable and past all hope of restoration.

Vessel No. 32.—This most interesting vessel of the readymade mortuary type, was found in fragments which have since been cemented together with great care and a few missing portions restored, including the upright rim, as to the original shape

of which we are uncertain. The ware is thin and covered with crimson pigment. In addition to the hole in the base, made before baking, there are many other orifices, varying in size and shape, made at the same time as the basal perforation, inaugurating



FIG. 22.—No. 18. Image of earthenware. Larger mound near Burnt Mill Creek. (Three-fourths size.)

to the base, part of which has been knocked out. Two sides are undecorated. Of the other two sides, which have incised decoration, one is shown in the representation of the vessel (Fig. 26); the other, diagrammatically in Fig. 27.

Vessel No. 39.—A jar of about 1 quart capacity with semiglobular body and neck first slightly constricted, then flaring. The decoration, which is between two

a type not found by us to the westward, and but infrequently met with until much farther east along the coast. At either end of the body, which has an elliptical transverse section, probably modelled after the body of a bird, is a bird's head projecting horizontally outward. Below, on one side, a hole has been made with the outline of a wing, which design is not repeated on the opposite side (Fig. 23). Length, 9.5 inches; width, 5.5 inches; height, 9 inches.

Vessel No. 33.—A bowl, oblate spheroid in shape, much flattened, of about 3 quarts capacity, with incised decoration, half of which is shown diagrammatically in Fig. 24, the other half being similar. This vessel, found crushed to bits, has been cemented together and somewhat restored.

Vessel No. 34.—This vessel, found crushed to fragments, parts of which were not recovered, has had a flat base, most of which is now missing through the mortuary mutilation common to the vessels of this mound. The lower part, a truncated cone reversed, supports the body which is made up of three projecting bosses surmounted by incised lines. The neck slopes inward slightly (Fig. 25). Height, 8 inches; maximum diameter, 6.5 inches.

Vessel No. 35.—A quadrilateral vessel of about 1 pint capacity, tapering



FIG. 23.—Vessel No. 32. Larger mound near Burnt Mill Creek. (Nine-elevenths size.)



FIG. 24.—Vessel No. 33. Decoration. Larger mound near Burnt Mill Creek. (One-third size.)



FIG. 25.—Vessel No. 34. Larger mound near Burnt Mill Creek. (Nine-tenths size.)

incised encircling lines, is made up of linear impressions around the neck, six deep in places, in others, seven.



FIG. 26.—Vessel No. 35. Larger mound near Burnt Mill Creek. (Half size.)

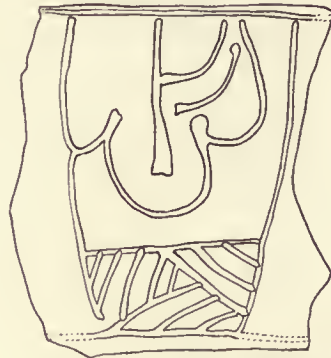


FIG. 27.—Vessel No. 35. Decoration. Larger mound near Burnt Mill Creek. (Half size.)

SMALLER MOUND NEAR BURNT MILL CREEK, WASHINGTON COUNTY.

The mound, said to be on property belonging to the State of Florida, is on ground formerly cultivated, about 1 mile in a northerly direction from the mouth of Burnt Mill creek. This mound, which was leveled by us, had a basal diameter of 28 feet; a height of about 2.5 feet. A hole in the center dug prior to our coming, involved about one-quarter of the mound. If human remains had been spared by decay, they must have occupied this central space as no trace of bones was met with by us. Nor was charcoal present or blackened sand.



FIG. 28.—Sherd. Smaller mound near Burnt Mill Creek. (About two-thirds size.)

Near the margin of the NE. part of the mound, continuing in under the sloping portion, was a deposit of earthenware vessels all within an area not over 7 feet in diameter and, as a rule, in, or almost in, actual contact, many being crushed one into the other. Of these, 29 vessels were recognized as whole or having been entire or nearly so before they were crushed by weight of sand. In addition to our count, however, must be included many other vessels hopelessly broken to small fragments and

intermingled. These vessels, with four exceptions, were bowls, pots and jars, of ordinary type from 1 pint to 2 gallons capacity, approximately, mostly of thin and inferior ware which a long period of soaking had reduced to a sodden condition, unable to withstand the pressure of surrounding sand. A few vessels, however, were of somewhat better quality.



CERTAIN ABORIGINAL REMAINS OF THE NW. FLORIDA COAST. 147

Certain of these vessels had a complicated stamp decoration more or less faint and one, encircling rows made up of oblong imprints about .75 of an inch in length. One had decoration of crimson paint interiorly while others were undecorated. All whose condition allowed determination were noted as having the usual basal perforation, with the exception of a small jar of coarse ware. Certain sherds had circular punctate decoration and one had scroll work deeply incised (Fig. 28).



FIG. 29.—Vessel of earthenware. Smaller mound near Burnt Mill Creek. (Half size.)



FIG. 30.—Vessel of earthenware. Smaller mound near Burnt Mill Creek. (Half size.)

Of vessels found outside the usual run, one undecorated, and of fairly thick ware, is boat-shaped with projections at the extremities.

A vessel of about 1 quart capacity has a spherical body with elongated base. Below the rim is an incised line. There have been four small projections, like rudimentary handles, one on each side a little below the rim, two of which are missing. The decoration is incised and punctate (Fig. 29).

Fig. 30 shows a vessel of about 1 pint capacity, with decoration made with an implement though such decoration is often considered cord-marked.

A sherd with complicated stamp is shown in Fig. 31.

Among the farthest in was a bowl of fairly good ware which pressure of sand had split. This bowl, which lay on its base, still kept an upright position. Standing in the bowl and to a certain extent protected by it, was a rude effigy-vessel of yellow ware, representing a male figure, shown in two positions in Figs. 32, 33. The lower part is wanting through the usual basal mutilation. Present height, 7.5 inches; maximum width, 4.4 inches.

A broken arrowhead or knife, of chert, lay unassociated in the sand.



FIG. 31.—Sherd. Smaller mound near Burnt Mill Creek. (Half size.)



FIG. 32.—Effigy-vessel, front view. Smaller mound near Burnt Mill Creek. (About full size.)



FIG. 33.—Effigy-vessel, rear view. Smaller mound near Burnt Mill Creek. (About full size.)

MOUND NEAR ALLIGATOR BAYOU, WASHINGTON COUNTY.

Alligator bayou joins North bay, a part of St. Andrew's bay on the W. side, about 2 miles up the bay.

The mound, near the head of the bayou which is about one-half mile in length, was on the property of Mrs. Elizabeth J. Daniels, who lives on the place. The mound on low-lying ground and partly surrounded by not far distant water, was very moist as to the sand composing it and in a condition to facilitate decay. It was oblong in shape, 76 feet E. and W. through the base and 50 feet N. and S. Its height was 6 feet 5 inches. It had received but little previous attention from the treasure seekers of the bay. The mound was completely levelled by us.



FIG. 34.—Vessel No. 15. Mound near Alligator Bayou. (Half size.)

Owing to the dampness, no doubt, no trace of human remains was met with by us.

At one place, in a mass of sand of almost inky blackness from admixture of organic matter, was a wooden object resembling a tine of a stag's antler, overlaid with copper. This interesting object, which doubtless accompanied a burial, unfortunately received a blow from a spade.

In another portion of the mound was a pocket of sand made crimson from admixture of hematite. This deep-colored sand called to mind the great deposits at various points in the mound at Mt. Royal described in our reports on the St. John's River Mounds, the rich crimson color differing considerably from the pink tint found in sand having the usual slight admixture of the red oxide of iron.

A barbed arrowpoint of chert, a sheet of mica to which had been given, rather rudely, the outline of an arrowhead and a shell drinking cup were the only other artifacts in the mound, exclusive of earthenware.

About 13 feet in from the margin, on the eastern side of the mound, in sand,

which by its dark admixture of organic matter, contrasted with the yellow sand of other parts of the mound, began a deposit of earthenware, 4 feet across, which, continuing in, on or near the base, broadening to the N. and S., and contracting again, ended about 11 feet from the center, thus having a length of about 14 feet.

The vessels, of which we counted sixty-six, and doubtless some badly crushed and intermingled were left from the score, were upright or tilted at almost any angle, and nearly always in groups crushed into each other or separated by very



FIG. 35.—Vessel No. 24. Mound near Alligator Bayou. (About seven-eighths size.)

small space. All but two, which will have reference later, had the usual basal perforation, at least all whose condition allowed us to determine.

Greatly to our disappointment, the vessels, which in size ranged from a toy bowl holding hardly more than a thimble-full to pots of at least four gallons capacity, were almost exclusively kitchen ware of ordinary shapes and of flimsy material. The majority were undecorated. On but two were incised designs. One vessel was covered with crimson pigment. Many vessels had the complicated stamp but, as a rule, the impress was faint though several patterns new to us were present in the

mound. The small check stamp was absent. Scalloped margins abounded. The condition of most of this pottery, thin and of inferior ware, ground together by pressure of sand after continued soaking for a long term of years, can well be imagined. In most cases our efforts to preserve the fragmentary vessels was baffled, while but few of those saved merit special mention.

Vessel No. 5.—A globular undecorated body of about 1 pint capacity with part of what had been a solid handle projecting upward at an angle. This vessel is of the class modelled after gourds.

Vessel No. 15.—A globular body of yellow ware, which probably had a flat base. Almost the entire neck, which was flaring, is missing through an old fracture. The decoration, incised, is made up of a series of two concentric circles surrounded by other designs as shown in Fig. 34. Maximum diameter, 8.2 inches.

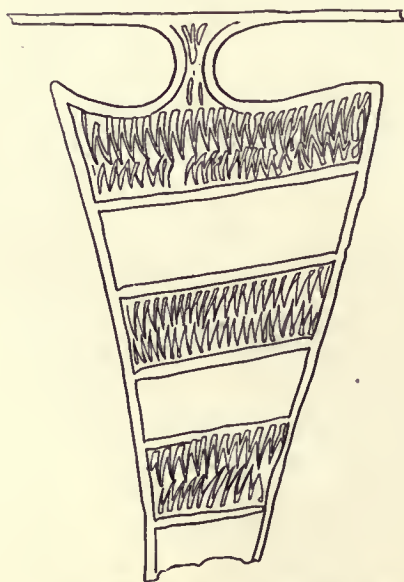


FIG. 36.—Vessel No. 24. Decoration. Mound near Alligator Bayou. (Half size.)

Vessel No. 24.—Of yellow ware, almost semi-globular body, tapering somewhat at the base. The rim flares slightly. The interesting incised decoration consists of two large similar designs on opposite sides, one of which is shown in Fig. 35. There are two smaller designs, also alike, one of which is given in diagram, Fig. 36. Maximum diameter, 7 inches; height, 5.5 inches.

Vessel No. 34.—A small vessel almost a perfect globe, with small aperture and slightly projecting rim. This vessel, of about a pint capacity, when removed from the wet sand was of a bright crimson which faded when dry.

Vessel No. 35.—A pot of yellow ware with scalloped margin. The decoration, a complicated stamp, is distinctly impressed (Fig. 37). Height, 10 inches; maximum diameter, 9 inches.

Vessel No. 44.—Badly crushed, had four small feet.

Vessel No. 64.—A pot of yellow ware expanding slightly toward the rim, which is scalloped. The decoration is a zigzag stamp identical with that shown on a sherd from this mound. Maximum diameter, 10 inches; height, somewhat impaired by loss of the base, 9.8 inches.

Vessels Nos. 65 and 66.—Toy bowls, 2.3 inches and 1.8 inches in diameter, respectively, found together a little apart from the main deposit.

Three sherds with complicated stamp decoration are shown in Figs. 38, 39, 40.

MOUND NEAR FANNING'S BAYOU, WASHINGTON COUNTY.

Fanning's bayou joins North bay from the north about five miles up the bay.

The mound, which had been dug into to a small extent only, was on the edge of a hammock, about one mile in a NW. direction from Anderson P. O., which is



FIG. 37.—Vessel No. 35. Mound near Alligator Bayou. (Half size.)



FIG. 38.—Sherd. Mound near Alligator Bayou. (Half size.)



FIG. 39.—Sherd. Mound near Alligator Bayou. (Half size.)

about two miles up the bayou. The mound was about 3 feet high and about 40 feet in basal diameter. The ownership of the property is in dispute.

The mound, which was totally demolished by us, contained nineteen burials, single skulls with a few long-bones, or long-bones without skulls, or in two cases, two skulls with long-bones. Above certain of these burials was charcoal.

With one burial was a shell drinking cup. Another burial lay near certain vessels of earthenware, but as these vessels were a continuation of a deposit beginning at a considerable distance from the remains, we do not believe the earthenware had any direct connection with them.

An arrowhead of chert and two rude imitations of spearheads in mica were found, not in immediate association with the dead.

The result of our investigation in this mound was the old story with which we have become so familiar. In the extreme margin of the eastern part of the mound, preceded by a deposit of miscellaneous sherds and continuing at intervals to the center, were numerous vessels, broken and whole, undecorated in the main, some having the small check stamp, others incised and punctate decoration. Three vessels only had the complicated stamp and that around the neck alone. A complicated stamp decoration on a sherd is shown in Fig. 41.

All vessels, broken or whole, as far as we could determine, had the usual base-perforation and all lay in masses of sand far darker than the yellow sand of the rest of the mound.

We shall now describe in detail the more interesting vessels from the mound, some of which, taken out in pieces, have been carefully cemented together.

Vessel No. 1.—A vessel of about 3 pints capacity has a circular neck, flaring into a square outline at the rim. The incised decoration, which is repeated on the opposite side with but slight variation, is shown in Fig. 42.

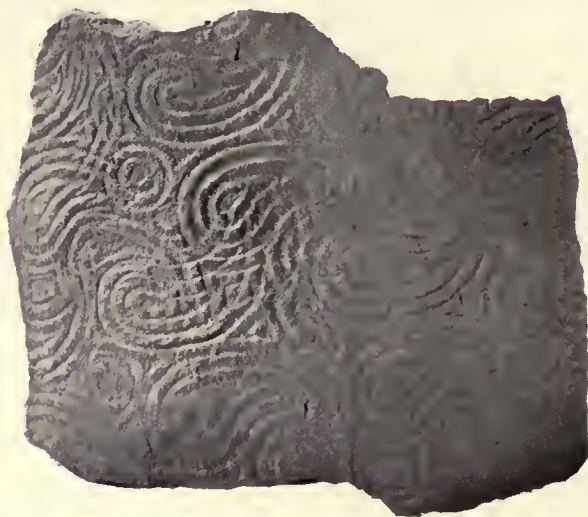


FIG. 40.—Sherd. Mound near Alligator Bayou. (Half size.)



FIG. 41.—Sherd. Mound near Fanning's Bayou. (Three-fourths size.)

Vessel No. 2.—A bowl of curious outline recalling that of a horseshoe were the extremities joined. The body is undecorated. Notches extend around the margin of

the curved portion, while an incised line resembling the symbol of the bird, which, seemingly, is not always confined to bird-vessels, stretches across the straight portion (Fig. 43).

Vessel No. 3.—A gracefully made semiglobular vessel with short, upright, rounded rim, of excellent ware, has four encircling lines of punctate markings around the upper part of the body, about 1 inch apart. Maximum diameter, 10.5 inches; height, 6.5 inches.

Vessel No. 4.—A jar of inferior ware (Fig. 44), 6 inches in maximum diameter with a present height of 9 inches, bears a curious punctate and



FIG. 42.—Vessel No. 1. Mound near Fanning's Bayou. (Half size.)

incised decoration, probably some highly conventionalized figures among which may be recognized the symbol of the bird. The decoration is shown diagrammatically in Fig. 45.

Vessel No. 5.—A bowl of yellow ware of about 1 quart capacity with rude line and punctate decoration as shown in Fig. 46.

Vessel No. 6.—A vase roughly globular as to the body with neck flaring outward and upward. Where the neck joins the body on the outside are two encircling rows of pinched decoration (Fig. 47). Maximum diameter, 7.5 inches; height, 5.5 inches.

Vessel No. 7.—In the central deposit was a curious vessel of thick ware rather carelessly made, the upper portion leaning to one side. On the upper part of the vessel is punctate decoration. There are two holes for suspension (Fig. 48). Height, 7 inches; maximum diameter, 5.8 inches.

Vessel No. 8.—A vase of yellow ware of about 1 quart capacity, found broken into many pieces, a few of which, not



FIG. 43.—Vessel No. 2. Mound near Fanning's Bayou. (Half size.)

recovered, have since been restored (Fig. 49). The decoration, incised, is carefully executed. One-half of it is shown diagrammatically in Fig. 50, the other half being a repetition.



FIG. 44.—Vessel No. 4. Mound near Fanning's Bayou. (Half size.)

inches; maximum diameter, 7.5 inches.

Vessel No. 12.—A bowl with quadrilateral rim bearing incised and punctate decoration as shown in Fig. 53.

Vessel No. 9.—A bowl of inferior ware, about 1 quart capacity, has a cross-hatch design rudely executed. An upright protuberance about .25 of an inch in height, projects from the rim on one side.

Vessel No. 10.—This vessel, of rather soft yellow ware, found badly crushed with certain parts missing, presumably, since the sand was carefully sifted, would hold about 3 quarts. The lower part is semiglobular, slightly flattened at the base. The upper part of the body is hexagonal. The neck expands slightly. The decoration consists of six semicircles over curious incised designs varying but slightly one from another, in fields of punctate markings. Impressions of points fill the spaces between the junction of the ends of the semicircles and the neck (Fig. 51).

Vessel No. 11.—A jar of graceful outline, unfortunately much broken at the base, bearing the check stamp decoration (Fig. 52). Present height, 14.5

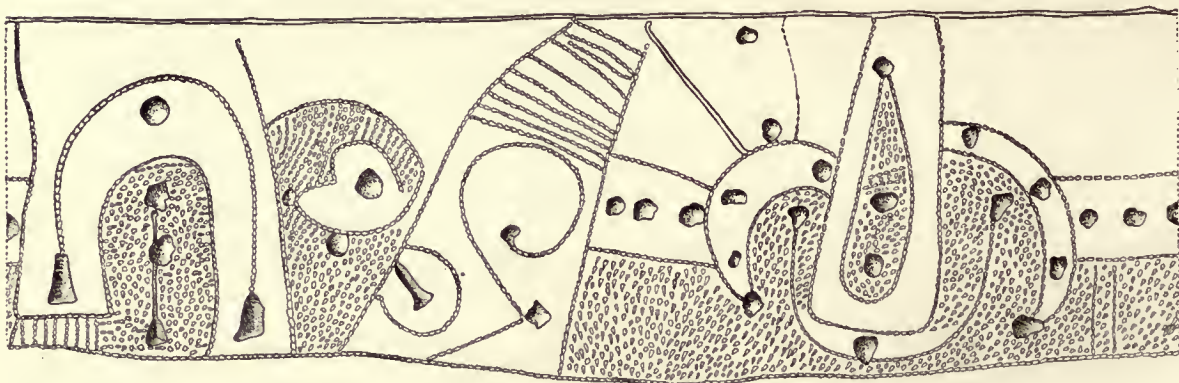


FIG. 45.—Vessel No. 4. Decoration. Mound near Fanning's Bayou. (One-third size.)



FIG. 46.—Vessel No. 5. Mound near Fanning's Bayou.
(Half size)



FIG. 47.—Vessel No. 6. Mound near Fanning's Bayou.
(Half size.)



FIG. 48.—Vessel No. 7. Mound near Fanning's Bayou. (About three-fourths size.)



FIG. 49.—Vessel No. 8. Mound near Fanning's Bayou. (Full size.)

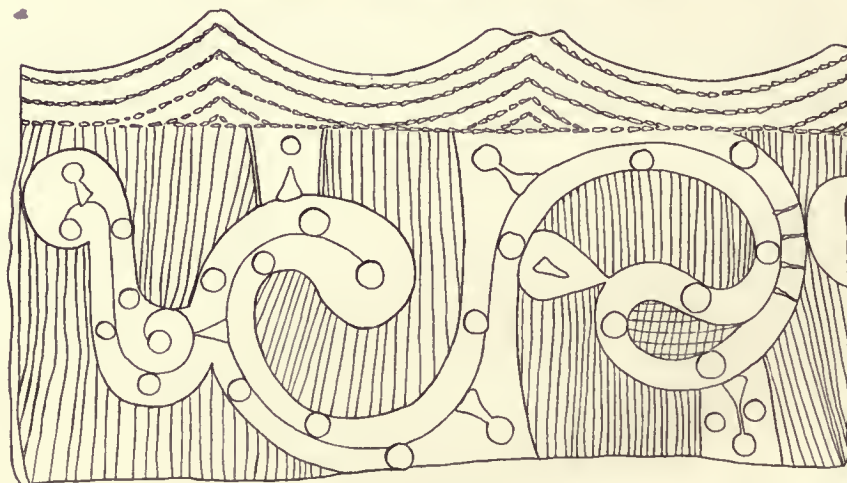


FIG. 50.—Vessel No. 8. Decoration. Mound near Fanning's Bayou. (Half size.)



FIG. 51.—Vessel No. 10. Mound near Fanning's Bayou. (Half size.)



FIG. 53.—Vessel No. 12. Mound near Fanning's Bayou. (Half size.)



FIG. 52.—Vessel No. 11. Mound near Fanning's Bayou. (One-third size.)

MOUND NEAR THE HEAD OF NORTH BAY, WASHINGTON COUNTY.

This mound, seemingly intact, was in pine woods about one-half mile in a WSW. direction from the home of Mr. W. M. Brooks, the owner, on the shore near the head of North bay.

The mound, about 2 feet in height and 38 feet across the base, was entirely dug through by us.

Human remains were met with in sixteen places and consisted of single skulls, skulls with long-bones, etc. No artifacts lay with the burials.

Unassociated, was an arrowpoint or knife, of red chert and, near the surface, lay a cube of lead sulphide about 2.5 inches in each of its dimensions.

Vessel No. 1 was met with at the extreme verge of the NW. side of the mound. The body is rounded, the rim flares slightly. The ware is most inferior. This vessel, which has four feet and faint traces of decoration, is without the basal perforation.

In the margin of the eastern part of the mound were numbers of sherds, several of good ware, many bearing the small check stamp. Among these, several feet apart, were portions of a dish of excellent ware, undecorated. In common with all the vessels in this mound, except the one first described, it had the basal perforation.

Vessel No. 3.—Triangular, with rounded corners, with slight traces of punctate and incised decoration. A handle fastened by pressure on the clay before baking is missing and was not present with the vessel. Length, 4.5 inches; height, 2 inches.

Ten other vessels were in the same deposit, all within a few feet of each other. Some were broken; all were of ordinary form, without decoration or with a rude check stamp, or, in one case, with rough incised lines.

There was no central deposit in this mound, but considerably farther in than the vessels just noted were two others, or parts of them, in fragments. Their decoration, seemingly, was conferred by basket work.

MOUND NEAR ANDERSON'S BAYOU, WASHINGTON COUNTY.

Anderson's bayou joins the E. side of North bay about 5 miles up. The mound, on property belonging to Mr. A. J. Gay, whose home is not far distant, is in thick hammock about 50 yards from the eastern side of the bayou and about one-quarter of a mile up. The height of the mound was 2 feet 4 inches; its basal diameter, 55 feet. The mound, into which three comparatively small holes had been dug prior to our visit, was completely leveled by us. It proved to be of yellow sand, except in the neighborhood of earthenware, where the sand had the customary darkened appearance.

Presumably, human remains to a certain extent had disappeared through decay as burials were found in four places only. These consisted of three skulls, together; certain small pieces of a skull; a skull with a few pieces of long-bone; and several fragments of long-bones without a skull. There were also in the mound a few bits of calcined bone, but none of a size large enough to determine whether they were human or otherwise.

There were present in the mound, unassociated with human remains, though bones may have decayed in their immediate vicinity: a bead of red argillite, nearly cylindrical, .85 of an inch in length and .55 of an inch in maximum diameter; two small fragments of sheet copper, near the surface; a sheet of mica; four bits of rock together. In association were bits of rock, pebble-hammers, smoothing stones, broken hones, four bits of *Fulgur*; a pebble with a semicircular space worn in the side, and numerous pebbles.

We have frequently found in the mounds round or cylindrical pebbles seemingly too small for use as pebble-hammers. These pebbles, often lying together as though at one time deposited within a receptacle, we believe to have been sling-stones. Cabeça de Vaca¹ says the Indians began "to throw clubs at us and to sling

¹ Chapter X, p. 37. Buckingham Smith's translation.

stones." In the original Spanish the words "*tirar piedras cō hondas*" are used, so there can be no doubt as to the meaning of the author.

Two bits of pottery with small check stamp were in the body of the mound. In the margin of that part of the mound embraced between NE. and S. of E.,



FIG. 54.—Vessel of earthenware. Mound near Anderson's Bayou. (About four-fifths size.)

the usual deposit of pottery, made for the dead in common, began and continued in, at intervals, to the center of the mound. The vessels, which lay along the base and were unassociated with burials, all had, as far as noted, the usual basal perforation. Many were badly crushed and the ware of nearly all was most inferior. With two

exceptions, no incised decoration was present in the mound, all other vessels being undecorated, or bearing the complicated stamp.

A feature in the mound was the presence of a number of bases of vessels lying unassociated, which showed that the knocking out of basal portions in fulfilment of the mortuary rite was sometimes attended to at the mound and the bases scattered throughout the sand.

A quadrilateral vessel, with sides tapering somewhat to the base, which is flat, has a decoration similar on each side, shown in Fig. 54. Height, 9 inches; maximum diameter, 7 inches.

With the vessel just described, which came almost exactly from the center of the mound, was another with decoration of broad, incised lines, shown in Fig. 55.

Three sherds with complicated stamps are shown in Figs. 56, 57, 58; also a vessel with the same type of decoration, which we believe came from this mound, though the label formerly upon it has disappeared (Fig. 59).



FIG. 55.—Vessel of earthenware. Mound near Anderson's Bayou. (Half size.)



FIG. 56.—Sherd. Mound near Anderson's Bayou. (Four-fifths size.)



FIG. 57.—Sherd. Mound near Anderson's Bayou. (Four-fifths size.)



FIG. 58.—Sherd. Mound near Anderson's Bayou.
(Four-fifths size.)



FIG. 59.—Vessel of earthenware. Mound near Anderson's Bayou. (Six-sevenths size.)

MOUND NEAR LARGE BAYOU, WASHINGTON COUNTY.

Large bayou unites with North bay about 3 miles up, on the E. side of the bay. The mound, on property of Mr. A. J. Gay, owner of the Anderson's bayou mound, is in an old field about one-half mile in a southerly direction from the head of the bayou.

This mound, about four feet high and fifty feet across the base at the present time, has been dug into for years and objects of interest are reported to have been taken from it. Much of the remainder was dug down by us.

Ten bunched burials were met with, one having two skulls.

On the base, below human remains, well in on the western slope of the mound, was a quadrilateral vessel with incised decoration similar on each side. Maximum diameter, 5.4 inches; height, 3.3 inches.

Near a burial was a considerable number of sherds, probably a vessel crushed to fragments.

Also with a burial was an undecorated toy pot, having a perforation of the base, as had all vessels found by us in this mound.

Well in on the western side, on the base, together, both badly crushed, were a pot with a complicated stamp decoration and an undecorated bowl, also mica. No bones were present with these, but presumably a burial had disappeared through decay.

At the very verge of the eastern part of the mound, with no bones associated, were a number of vessels extending in and over toward the NE. These vessels, pots and bowls, were undecorated or bore the small check stamp. Many were badly crushed. It is impossible to say how far into the mound this deposit may have extended, owing to the great amount of previous digging.

There were also in the mound portions of two compartment vessels; a pebble-hammer and a smoothing stone.

HOLLEY MOUND, WASHINGTON COUNTY.

This mound, about two miles in a westerly direction from Bear Point, in an old field, the property of Mr. John C. Holley, who lives on the place, is about 100 yards from the water. According to Mr. Holley the mound had sustained no previous digging, with the exception of two small holes dug by members of his family, which yielded nothing except a few bones in fragments.

This mound, 2.5 feet high and 50 feet across the base, was totally dug down by us.

Seven burials were met with, the first 11 feet in from the NE. margin of the mound, on the base as were all with one exception. The remaining burials continued in at intervals until the center of the mound was reached.

Burial No. 1.—Part of a pelvis covered by a *Fulgur perversum* having the mortuary perforation. Presumably other bones of the deposit, not thus protected, had disappeared.

Burial No. 2.—Small decaying fragments of a femur and of a tibia, side by side.

Burial No. 3.—In a shallow grave below the base of the mound were fragments of a skull and bits of two femurs.

Burial No. 4.—A small fragment of decaying bone.

Burial No. 5.—Bits of two femurs and of one tibia.

Burial No. 6.—The remains of a skull.

Burial No. 7.—Decaying fragments of a cranium.

We believe that other burials had disappeared from the mound through decay, but think such were from the neighborhood of those we have described, as no discolored earth or sign of interment of any sort was found in other portions of the mound.

Exactly in the same line with the burials, but beginning at the margin, in blackened sand, were many sherds, and fourteen vessels, three or four together at times, some whole, some crushed to pieces.

Vessel No. 1.—An imperforate bowl of about 1 quart capacity, of inferior yellow ware, having an almost uniform incised and punctate decoration around the upper part (Fig. 60). This vessel, unlike all others in the mound, had no basal perforation.



FIG. 60.—Vessel No. 1. Holley mound. (Half size.)
base which is flat.

Vessel No. 2.—A compartment vessel with four divisions on one plane and a fifth in the center, somewhat above the rest (Fig. 61). The central compartment has a basal perforation which does not show in the half-tone. Length, 8.7 inches; width, 7.1 inches; height, 2.3 inches.

Vessel No. 3.—A pot of about 1 quart capacity, undecorated, almost cylindrical, expanding slightly toward the



FIG. 61.—Vessel No. 2. Holley mound. (About three-fourths size.)



FIG. 62.—Vessel No. 8. Holley mound. (Half size.)

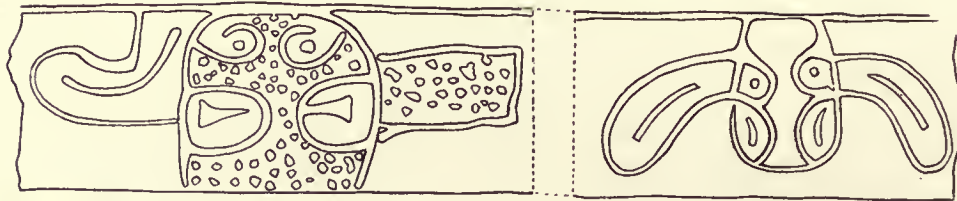


FIG. 63.—Vessel No. 8. Decoration. Holley mound. (Half size.)



FIG. 64.—Vessel No. 12. Holley mound. (Half size.)



FIG. 65.—Sherd. Holley mound. (Three-fourths size.)

Vessel No. 4.—Globular, about 3 quarts capacity, thickening at the rim. The decoration is a faint complicated stamp.



FIG. 66.—Sherd. Holley mound. (Half size.)

Vessel No. 8.—Quadrilateral, of yellow ware, broken into many fragments when found. The rim, which turns inward nearly at right angles, has incised decoration. There are incised and punctate designs on three sides, that on the fourth having been worn away. The bowl with the decoration on one side is shown in Fig. 62, while the designs on two other sides are given diagrammatically in Fig. 63.

Vessel No. 12.—A vase made to hold about 3 quarts, with hemispherical body and neck at first constricted, then flaring, around which is a complicated stamp decoration (Fig. 64). With this vessel were sheets of mica.

The complicated stamp designs on two sherds are shown in Figs. 65, 66.

SOWELL MOUND, WASHINGTON COUNTY.

This mound, on property of Mr. Jesse Sowell of West Bay P. O., Florida, is in scrub about 1 mile in a westerly direction from Bear Point. Previous to our visit a trench 12 feet across had been dug from the northern margin of the mound almost to the center. The height of the mound was 4.5 feet; the basal diameter, 50 feet. A great depression whence the sand for the mound had been taken was at its southern margin. All parts of the mound, not before dug, were carefully gone through by us, beginning at the extreme outer limit.

On the extreme eastern margin burials were encountered consisting of flexed skeletons, bunched burials, scattered bones and masses of bones, one of these masses having no less than six skulls. These burials extended without intermission until the center of the mound was reached.

At first the attempt was made to keep count of the burials, but the difficulty to determine where one ended and another began forced us to limit ourselves to a tally of skulls only, and of these there were one hundred and twenty-one.

All burials but three were confined to the eastern part of the mound between the margin and the center, and were, to a certain extent, superficial, lying between a few inches and 2 feet from the surface. Three burials came from the western part of the mound, one 19 feet from the margin, the other two a few feet farther in. Two of these burials were on the base. One was about 2.5 feet from the surface.

The bones in this mound were in a far better state of preservation than are

those usually found by us, and, in consequence, a number of crania, now belonging to the Academy of Natural Sciences, were saved.

Many of these skulls showed great antero-posterior flattening as by compression from boards, while some gave evidence of early constriction by a band, a concave depression being evident. A selected skull from this mound is shown in Fig. 67. Captain Bernard Romans, who was familiar with this part of Florida, writing in the



FIG. 67.—Skull showing artificial flattening. Sowell mound. (Two-thirds size.)

latter part of the XVIII century, tells¹ us that in his time the Choctaws bound bags of sand to the heads of male children. In this mound, however, all skulls which were in a condition to allow determination, showed flattening.

All skeletons but one which lay on the back with the legs drawn up under the thighs, were closely flexed, some lying on the right side, some on the left. With certain burials were a small number of oyster shells.

¹ "Concise Natural History of East and West Florida."

With the skeleton of a child were many small shells (*Marginella apicina*),¹ perforated for use as beads.

A pendant of igneous rock was found unassociated with human remains and a smoking pipe of steatite lay in sand thrown out by previous diggers.

Beginning with the burials and continuing with them until the end, were great numbers of sherds, parts of vessels and vessels unbroken or crushed but with full complement of parts. This deposit of earthenware, which included 53 vessels entire or, when broken, with all but small parts present, began at the margin with great numbers of sherds, undecorated or having the check stamp as a rule. Next came a few scattered vessels and, shortly after, the first burials were found. Thence on, earthenware and burials continued more or less closely associated, a burial at times being almost in direct contact with two or three vessels.

All earthenware in this mound, as far as noted, had the usual base-perforation, as did a shell drinking cup associated with the pottery, and lay in sand blackened with organic matter.

Though much of the ware in this mound was broken, perhaps through close contact, vessels sometimes being one within another, and once even a vessel, contained in another, itself held a third, yet a considerable amount was recovered intact, or nearly so. Unfortunately, the decoration, mainly incised and punctate, only four vessels having the complicated stamp, does not average as high from an artistic point of view as does that from certain other mounds in this district.

We shall now describe the more notable vessels from this mound.

Vessel No. 1.—Almost an inverted truncated cone in shape with punctate decoration shown in Fig. 68. There are holes on opposite sides for suspension. Height, 3.1 inches; maximum diameter, 2 inches.

Vessel No. 3.—Of ordinary form with two encircling bands, the upper formed of three rows of upright linear impressions; the other, a little less than 1 inch below, of two rows of larger impressions of the same style.

Vessel No. 5.—A pot of about 1 pint capacity, covered with rows of small circular impressions, probably made with the end of a reed.

Vessel No. 14.—Oblate spheroid with incised and punctate decoration as shown in Fig. 69. Height, 4.3 inches; maximum diameter, 10.5 inches.

Vessel No. 18.—Ovoid, has for decoration three encircling rows of punctate linear impressions. In addition to the basal perforation, two others have been made on the side.



FIG. 68.—Vessel No. 1. Sowell mound.
(Full size.)

¹ All shells referred to in this report have been determined by Dr. H. A. Pilsbry, of the Academy of Natural Sciences.



FIG. 69.—Vessel No. 14. Sowell mound. (Two-thirds size.)

Vessel No. 19.—A jar of about 1 quart capacity, undecorated but of somewhat unusual form. Part of the neck is missing. There are two perforations, which may have been for suspension.

Vessel No. 23.—An undecorated vessel holding about 1 pint, in shape resembling two much-flattened spheres, one upon the other. There have been two perforations for suspension, one of which is now included in a broken portion.

Vessel No. 25.—A pot of inferior ware of about 6



FIG. 70.—Vessel No. 25. Sowell mound. (One-quarter size.)

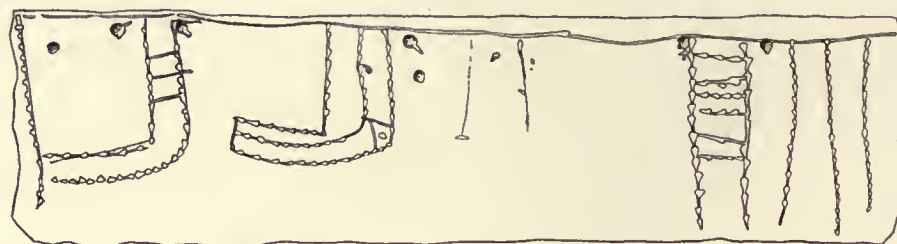


FIG. 71.—Vessel No. 28. Decoration. Sowell mound. (One-third size.)

quarts capacity, having around the upper part of the body a series of roughly incised designs, all similar, consisting of diagonal parallel lines between parallel upright ones (Fig. 70).

Vessel No. 28.—A pot of about 1 quart capacity, with rude decoration shown diagrammatically in Fig. 71.

Vessel No. 29.—A pot rather rudely decorated with incised horizontal and diagonal lines, which enclose similar designs on two opposite sides of the vessel (Fig. 72).



FIG. 72.—Vessel No. 29. Sowell mound. (Half size.)

Vessel No. 31.—A three-lobed vessel holding about 1 quart, with three rudimentary bird-heads on the rim at the junction of the lobes (Fig. 63). The decoration, incised, extending over the sides and bottom of the vessel, is shown diagrammatically in Fig. 74.

Vessel No. 32.—Has for decoration a series of parallel diagonal lines at angles to each other, rudely executed.

Vessel No. 33.—Of about 2 quarts capacity, had a piece missing, the result of aboriginal breakage, as a perforation for repair is near the margin of the fracture. The missing portion has since been restored by us (Fig. 75). The incised design is repeated around the vessel.



FIG. 73.—Vessel No. 31. Sowell mound. (Full size.)

Vessel No. 36.—Of about one-half pint capacity, tapering sharply to the base and somewhat toward the aperture. There is a faint decoration of incised curved lines (Fig. 76).

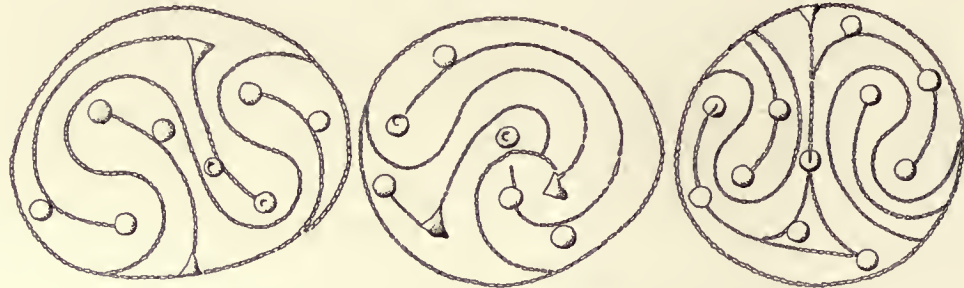


FIG. 74.—Vessel No. 31. Decoration. Sowell mound. (One-third size.)

Vessel No. 41.—A small triangular bowl, undecorated and of inferior ware.

Vessel No. 43.—A vessel of oval section longitudinally, of about 3 pints capacity, covered with crimson pigment inside and out, having at one end a fantastic representation of the head of a bird and, at the other, the conventional tail (Fig. 77).



FIG. 75.—Vessel No. 33. Sowell mound. (Seven-eighths size.)

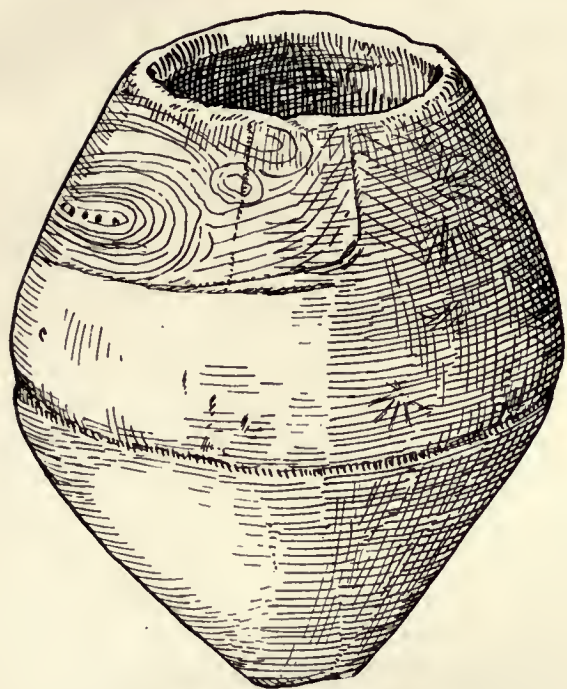


FIG. 76.--Vessel No. 36. Sowell mound. (Full size.)



FIG. 77.--Vessel No. 43. Sowell mound. (Half size.)



FIG. 78.--Vessel No. 46. Sowell mound. (Half size.)



FIG. 79.--Sherd. Sowell mound. (Four-fifths size.)

Vessel No. 44.—An undecorated vessel of inferior ware, holding about 1 pint, with globular body and upright quadrilateral neck.

Vessel No. 46.—Rather heart-shaped in outline of body, with neck slightly expanding and surrounded by incised parallel lines. From the rim extend four equidistant horizontal projections. The ware is inferior (Fig. 78). Height, 7 inches; diameter of body, 6.6 inches.

Vessel No. 49.—A flattened sphere with upright rim, with decoration much similar to that on Vessel No. 14 from this mound.

A sherd with complicated stamp decoration is shown in Fig. 79.

In the pottery deposit were several parts of a vessel of better quality of ware and more artistic decoration than characterized any other earthenware from this mound. On one fragment is the head of a duck, not projecting from the rim but in relief on the side.

MOUNDS NEAR BEAR POINT, WASHINGTON COUNTY.

In thick hammock, about 100 yards from the water and one-quarter of a mile from Bear Point, approximately, on property of Lieutenant-Commander Francis H. Sheppard, U. S. N., retired, of St. Andrews, Fla., was a mound which had undergone but little digging previous to our visit. Its basal diameter N. and S. was 60 feet and 50 feet E. and W. Its position on a slope made its height somewhat deceptive. On one side the altitude was but 20 inches. On the opposite side, the east, its height was about 4 feet. It was completely dug down by us.

The first burial was found in the NE. part of the mound, 7 feet in from the margin. Other burials were met with in the same direction, continuing in or a little to the eastward or to the NNE. Near the center one burial to the N. was noted. One lay in the center. These burials, twelve in all, had occasionally a few oyster shells in the sand above them. Three skeletons were closely flexed on the right side and one on the left. One skeleton occupied a squatting position. There were three bunched burials and scattered bones were found in three places. A few decaying fragments were all that remained of one burial.

All bones were badly decayed. No skulls were saved, though fragments were met with sufficiently large to show that cranial compression had been practised.

A "celt" of volcanic rock lay with a burial. Another, about 4 feet distant from human remains, also of volcanic rock, 9 inches long and two inches across the cutting edge, tapered gracefully to a blunt point .5 inch in diameter at the other end.

A ball of lead sulphide was found unassociated.

A number of sherds, undecorated, with the check stamp or with the complicated stamp, were in the NE. margin of the mound and continued into the mound, lying here and there. Near the center of the mound was an undecorated vessel in fragments and at the center was a small undecorated vessel, resembling the longitudinal section of a gourd. Part of the handle, which was solid, is missing. There is a basal perforation.

Near this mound, to the westward, is a considerable shell deposit composed of irregular ridges having a maximum height of 7 feet. There is also a circular enclosure of shell. These deposits are said to be the largest of the kind until the great shell-heaps begin a few miles to the north of Cedar Keys, and this was confirmed by our observations later.

Still farther westward are three flat mounds, which careful digging indicated to belong to the domiciliary class.

CEMETERY AT ST. ANDREWS, WASHINGTON COUNTY.

For a considerable time citizens of St. Andrews and visitors to that town have admired a collection of aboriginal earthenware in the possession of Mr. Isaac Godard, living at that place. Mr. Godard informed us that while digging in an enclosure adjoining his home, he had come upon vessels of earthenware and, with the aid of a rod, he had located and secured about twenty of them.



FIG. 80.—Vessel of earthenware. Cemetery at St. Andrews. (About two-thirds size.)

According to Mr. Godard, certain smaller ones among these vessels lay with burials, while others, bowls, were over skulls. In two cases human remains lay in bowls each covered by an inverted vessel.

With Mr. Godard's permission, the field, a small one, surrounded by an irregular, circular shell ridge, 2 feet to 4 feet high and about 170 feet in diameter, was carefully sounded by us. Mr. Godard's search, however, had been a thorough one and only a single vessel rewarded our investigation. This one, a bowl, lay base

uppermost about 3 feet from the surface. No bones were found beneath it, but it is our confident belief that infant remains, placed there originally, had disappeared through decay.

The bowl, of a type very familiar to us during our investigations of the preceding year, is dark in color with incised decoration representing, probably, a highly conventionalized animal head with a circle presumably intended for an eye. This design occurs six times. In addition, there are two pairs of curved figures, possibly representing legs, while two sets of animal jaws and teeth, in combination, appear but once (Fig. 80). This last is a new feature to us, though single sets of jaws on bowls in the district to the westward are common enough. Maximum diameter, 11 inches; height, 5.5 inches.

This discovery of a cemetery is of some interest, establishing, as it does, the existence of urn-burials at a point farther to the eastward than had been noted before.

MOUND AT ST. ANDREWS, WASHINGTON COUNTY.

This mound, in the western limits of the town, on property of Mr. J. A. Moates, living nearby, literally has been dug to pieces. After a short trial, investigation was abandoned by us. The mound seems to have been elliptical in outline originally, about 110 feet along the base NE. and SW. and 58 feet NW. and SE. The height, probably, was about 7 feet.

MOUND NEAR DAVIS POINT, CALHOUN COUNTY.

This mound, much dug into before our visit, lay in hammock land on property of Mr. Hawk Massaliner, colored, who lives on the place. Its height was about 2 feet 9 inches; the basal diameter, 45 feet. It was completely dug down by us.

On the extreme eastern margin were burials and numbers of parts of different vessels, mostly undecorated, some bearing the check-stamp. The burials and earthenware continued in to the center of the mound, the area of deposit broadening somewhat to the SE.

As the digging continued burials became more numerous for a while, and several were found included between the limits NE. and W. by S., though the deposit of earthenware which farther in included whole vessels and broken vessels of which all parts were present, and many sherds, was not present with burials in that part of the mound.

One small vessel, however, lay SW. of the center.

The mound was largely composed of sand blackened by admixture of organic matter, thus excavations made and filled previous to our visit were hard to locate, the sand being of the same color, therefore data, burial by burial, were not collected. The closely flexed form, the bunch, scattered bones and masses of bones were found in abundance. No skulls were recovered entire, but large fragments showed flattening of the frontal and occipital portions.

One burial, a bunch, lying under oyster-shells, as was often the case with inter-

ments in this mound, had a left femur which had sustained fracture at an early period and had united with little inconvenience to the subject, an occurrence somewhat out of the usual run in aboriginal times, judging from other fractures found by us in mounds. This femur was sent to the United States Army Medical Museum, Washington, D. C.

With one or two burials in the mound were parts of human bones, some discolored by fire, some charred and one or two calcined, but this evidence of the use of fire in no case extended to the entire burial, nor even to a considerable part of it, making it evident that cremation had not been practised, but rather the use of fire, ceremonially, which had occasionally burned a small portion of the bones.

Of artifacts in the mound there were, exclusive of earthenware, a mass of rock about twice the size of a closed hand, having on one side a pit 2.5 inches in depth and about 1.5 inches in diameter, and on the other side three small pits and a concave area produced by wear; a mass of lead sulphide, pitted on one side, evidently by use as a hammer; two graceful celts, one found with a burial, the other in caved sand; thirty-seven pointed columellæ of large marine univalves, found with a burial.

There were also in caved sand a small fragment of sheet copper badly carbonated, and a piece of sheet copper about 7 inches square, broken on three sides, which had formed part of a square or oblong ornament with a central perforation surrounded by punctate markings. The margin of the sheet had been carefully turned over and hammered down. On the metal were traces of a vegetable fabric in which the bones, which the copper accompanied, had been wrapped.

The copper, analyzed by Prof. Harry F. Keller, Ph.D., contained small quantities of iron and a faint trace of silver. Lead, arsenic, antimony, bismuth, nickel, etc., were entirely absent. This copper, then, is native copper, of a purity above that of any copper made from the sulphide ores found in Europe, especially in former times.

Incidentally we may say it is now eight years since we made public in the second part of our "Certain Sand Mounds of the St. Johns River, Florida," results of many careful analyses of native copper and of copper from the mounds, and showed chemically that most of the copper of the mounds could not have been produced in Europe, but was native copper, hammered out from nuggets or masses by the aborigines. These conclusions were accepted, we believe, by all who do not prefer an unsupported opinion to weight of evidence. At all events, no effort has been made, based on analyses, to controvert our deductions.

The Davis Point mound was filled with roots of the palmetto, doubly destructive to earthenware in that, while tearing it apart themselves, they compel from the investigator heavy blows of axe and spade, fatal to neighboring earthenware. This fact and the aboriginal custom to break vessels and scatter their parts throughout the mound, which markedly had prevailed in this mound, made it so that but three vessels were taken out unbroken, even as to parts unaffected by basal perforation. This is especially to be regretted as the ware of this mound, if we exclude the check-

stamp on certain coarse sherds, was of the incised and punctate variety which demands more originality and artistic ability than does the complicated stamp so prevalent in the mounds of this district.

Vessel No. 1.—This vessel, of excellent yellow ware, shown in Fig. 81, lay with a mass of bones. On the upper portion punctate markings constitute a field on which two rattlesnakes with highly conventionalized heads appear in relief. In this connection it is interesting to compare the rattlesnake decoration on the two vessels from the Hall mound, described and figured later, where heads much



FIG. 81.—Vessel No. 1. Mound near Davis Point. (About six-sevenths size.)

less conventionalized are given. Between the rattlesnakes, on either side, is an incised figure somewhat resembling a flying bird, shown in diagram (Fig. 82). The wings, if such they are, of one point downward; one wing of the other is raised. On examining the vessel, however, one can see the outline, faintly incised, of a lowered wing, which could not be completed owing to lack of space and, therefore, a raised wing was substituted. Beneath one rattlesnake is a rude cross shown in the half-tone. There are handles projecting obliquely from the rim, connecting with the heads of the snakes. Maximum diameter, 7 inches; height, 5.5 inches.

Vessel No. 4.—A small cup shown in Fig. 83.

Vessel No. 7.—A rude life-form of about 1 quart capacity (Fig. 84).

Vessel No. 8.—A vessel of about 1 quart capacity with rounded body and neck first constricted, then flaring. The decoration consists of incised perpendicular lines, probably intended to be parallel (Fig. 85).

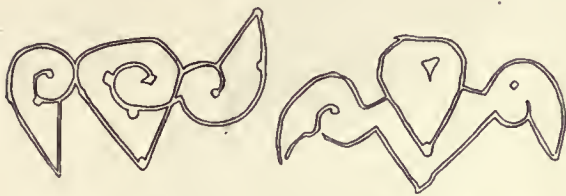


FIG. 82.—Vessel No. 1. Decoration. Mound near Davis Point. (Half size.)

Vessel No. 11.—Part of a vessel with interesting incised decoration shown in Fig. 86.

Vessel No. 12.—A jar of excellent red ware with a body of heart-shaped section and a neck first constricted, then expanding. There are two similar groups of incised decoration on the neck. A part of the rim has been restored (Fig. 87). Height, 8.5 inches; maximum diameter, 6.2 inches.

Vessel No. 14.—The lower half of a small effigy-vessel (Fig. 88), which has represented a human figure wearing a breach-clout adorned with ornaments on the



FIG. 83.—Vessel No. 4. Mound near Davis Point. (Full size.)



FIG. 84.—Vessel No. 7. Mound near Davis Point. (Half size.)



FIG. 85.—Vessel No. 8. Mound near Davis Point. (Half size.)

side and back. Careful, but unsuccessful, search was made for the missing portion of the figure.

Vessel No. 17.—This vessel, globular in shape, with oval aperture (Fig. 89) has a capacity of about one quart. The decoration, incised, representing wings and tail,



FIG. 86.—Vessel No. 11. Mound near Davis Point. (Twelve-thirteenths size.)



FIG. 87.—Vessel No. 12. Mound near Davis Point. (Half size.)

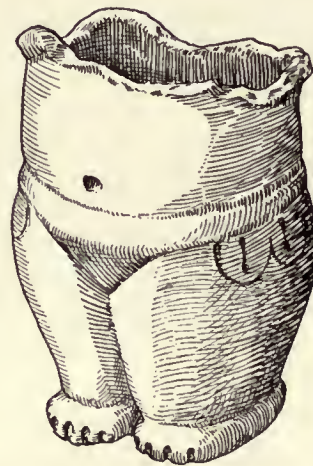


FIG. 88.—Vessel No. 14. Mound near Davis Point. (Two-thirds size.)

includes a design on the breast (Diagram, Fig. 90). The head of a bird projects from one side.

Vessel No. 18.—A jar with faint check-stamp ornamentation (Fig. 91). Height, 11 inches; maximum diameter, 4.8 inches.

Vessel No. 19.—This vessel, of unusual shape, found crushed to bits and with portions missing, has been cemented together with restoration. The decoration is coarsely done (Fig. 92).



FIG. 89.—Vessel No. 17. Mound near Davis Point. (About full size.)

Vessel No. 20.—A bowl of about 2 quarts capacity, found broken into many pieces, some of which were not present with the rest. The decoration, which is on the upper part, consists of a zigzag and a meander, in places, running through a field alternately cross-hatch and punctate.

In Fig. 93 is shown a bird-head handle which, when found, contained nine flat bits of earthenware constituting a rattle within the head. Rattling vessels of this sort are rare along the northwest Florida coast, one having been found by us last year and three during the present season.

In Fig. 94 is shown a sherd of most excellent ware with bird-head handle and incised representation of a wing.

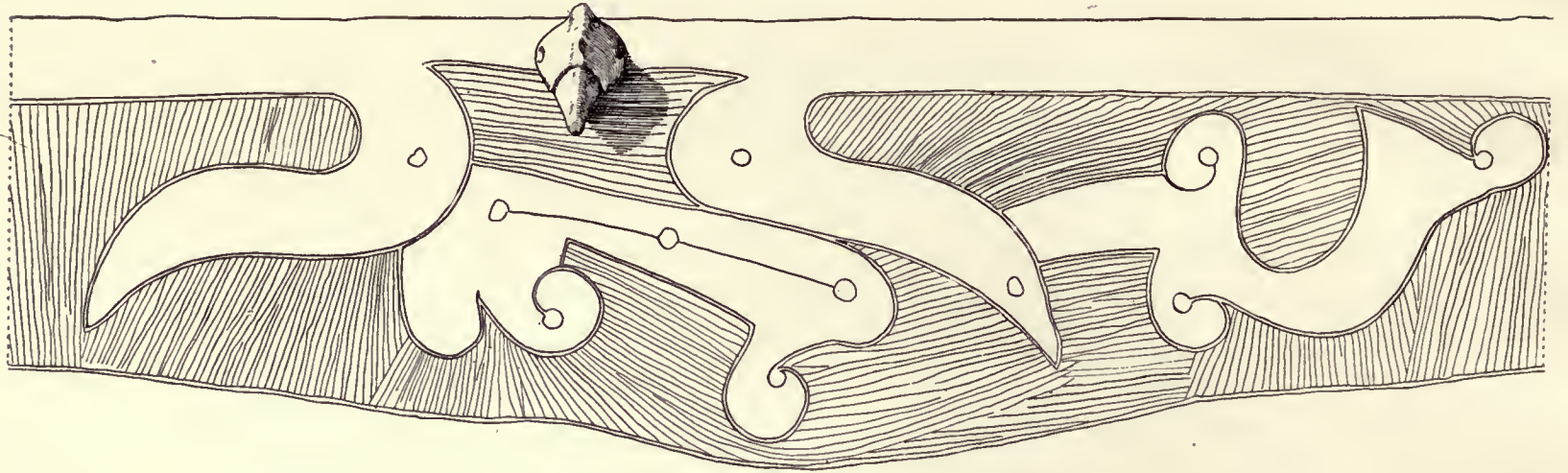


FIG. 90.—Vessel No. 17. Decoration. Mound near Davis Point. (Half size.)



FIG. 91.—Vessel No. 18. Mound near Davis Point. (One-fifth size.)



FIG. 92.—Vessel No. 19. Mound near Davis Point. (Full size.)

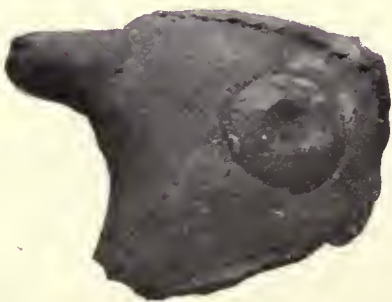


FIG. 93.—Handle of vessel. Mound near Davis Point. (Three-fourths size.)



FIG. 94.—Sherd. Mound near Davis Point. (Half size.)



MOUND NEAR PEARL BAYOU, CALHOUN COUNTY.

Pearl bayou joins East bay, a part of St. Andrew's bay, on the south side about 5 miles from the entrance to East bay. The mound, as to whose ownership we are in ignorance, is within sight of the water in a field formerly cultivated, but now overgrown, about 1 mile in an easterly direction from Pearl bayou.

The mound formed no exception to those of this district, having been dug into in many places. It was 40 feet across the base and about 3.5 feet in height. It

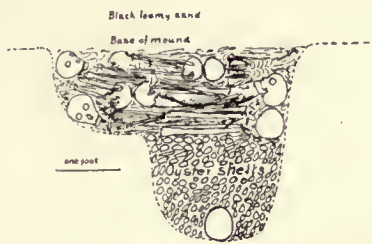


FIG. 95.—Section of grave. Mound near Pearl Bayou.

was completely dug through by us with the exception of a part of the western portion, where digging was discontinued after a large percentage had been gone through without finding burial or artifact.

Burials and numerous sherds were encountered in the eastern margin. The burials which, later, extended in a scattering way to the SE. and one even so far as N., continued to be met with in great numbers in the eastern part of the mound until the center was reached, after which none was found. The marginal burials were closely flexed on the right side or on the left, but later such a mass of bones was present that the form of burial was hard to determine. Presumably, the burials were of the flexed variety, overlapping and underlying each other in greatest confusion. No skull was saved, though some were sufficiently entire to allow determination as to cranial compression. This compression, plainly distinguishable in some, was much less so in others, while certain ones showed no trace of it.

In the outer portion of the mound, especially, though their presence was noted among the burials farther in, were many small shallow graves into which the burials had been forced. A number of interments were covered with oyster-shells. Under a mass of burials with which were numbers of shell drinking cups, some perforated as to the base and some not, was a grave containing a single skeleton, running below the base, filled with oyster-shells (Fig. 95).

A feature in this mound was the number of shell drinking cups present, numbers being found together at times.



FIG. 96.—Lancehead of chert. Mound near Pearl Bayou. (Full size.)

Usually closely associated with burials were eight celts, gracefully shaped as a rule and tapering to a blunt point opposite the cutting edge, the longest having a length of 10.2 inches. . One had an edge so blunt, though smooth and rounded, that it would seem to have been made for a purpose other than to cut.

There were also in the mound: a barbed arrowhead of chert, found with a burial; mica in several places; a large hammer-stone.

In caved sand was a beautifully wrought barbed lance-head of chert, 5.6 inches in length and .25 of an inch in maximum thickness (Fig. 96).

After the marginal sherds, a few feet farther in, associated with a great mass of bones, continuing to the center of the mound from the eastern part, at times extending to the NE. on one side, to ESE. on the other, were numbers of vessels and parts of vessels and deposits of sherds mixed together. Many of the fragments,



FIG. 97.—Sherd. Mound near Pearl Bayou.
(Four-fifths size.)



FIG. 98.—Sherd. Mound near Pearl Bayou.
(One-third size.)

no doubt, belonged to vessels intentionally broken and scattered through the mound by the aborigines at its building.

Thirty-three vessels were noted by us as found entire or having nearly a full complement of fragments. As a rule the ware was inferior and little care seemed to have been taken with the decoration. The check-stamp was present on a few vessels and on many sherds. The complicated stamp was sparingly represented. Two specimens are shown in Figs. 97, 98.

We shall now take in detail the most noteworthy vessels, all of which but three had the basal perforation.

Vessel No. 2.—A pot with a small check-stamp as decoration. The ware is extraordinarily thick and heavy.



FIG. 99.—Vessel No. 10. Mound near Pearl Bayou. (Full size.)

Vessel No. 6.—A small cup or bowl with four rudimentary feet. A line of punctate markings surrounds the rim. On opposite sides are perforations for suspension.

Vessel No. 10.—A most artistically shaped vessel of superior ware, of about 2



FIG. 100.—Vessel No. 11. Mound near Pearl Bayou. (Half size.)



FIG. 101.—Vessel No. 13. Mound near Pearl Bayou. (Half size.)

quarts capacity. The body is almost trilobate, the upright neck is nearly circular with undulating margin. The base is flat. The decoration, carefully done, consists of a series of incised

lines (Fig. 99).

Vessel No. 11.—A cup almost cylindrical, flaring slightly. At four equidistant points on the rim have been small protuberances, probably rudimentary bird-heads, of which three yet remain. The decoration, which is uniform all around, consists of various designs made of combinations of the symbol of the bird (Fig. 100).

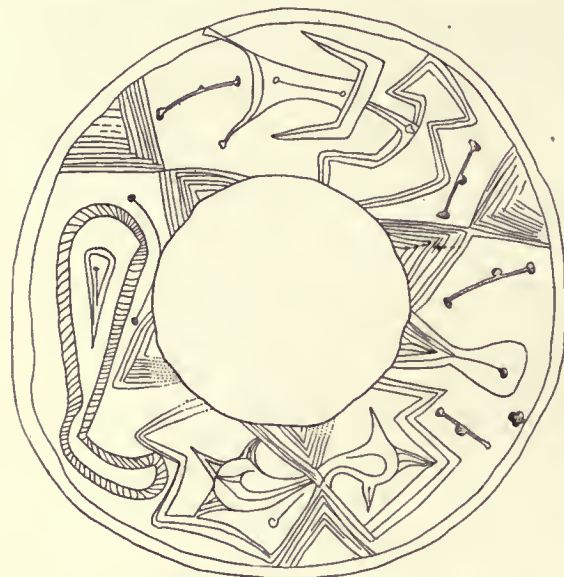


FIG. 102.—Vessel No. 15. Decoration. Mound near Pearl Bayou. (One-third size.)

Vessel No. 13.—A bowl without basal perforation, an elongated oval in longitudinal section. A line of punctate impressions is below the margin,



FIG. 103.—Vessel No. 23. Mound near Pearl Bayou. (Half size.)

also a rather rude incised decoration on either side and the length of the base. There is but one hole for suspension (Fig. 101).

Vessel No. 15.—Is of about 2 quarts capacity and semi-globular as to the lower

part. The upper portion, on which is incised decoration, shown in diagram in Fig. 102, turns inward.

Vessel No. 23.—Roughly heart-shaped with flattened base (Fig. 103). The aperture is elliptical. Two and one-half inches apart, on the same side, are perforations for suspension, a method of placing these holes new to us when this vessel was found, but met with by us a number of times afterward, along the coast. The decoration consists of crimson paint at either end of the vessel, on the outside.



FIG. 104.—Vessel No. 28. Mound near Pearl Bayou. (Eight-ninths size.)

Between, at first glance, seems to be an undecorated space, though, on closer inspection, traces of pigment are apparent, and might indicate that a band had surrounded the vessel, friction against which had worn away the paint.

Vessel No. 27.—A bowl of red ware found in many pieces. The decoration consists of two incised curved lines on one side and on the other, two designs roughly made composed of four concentric circular lines around a number of punctate markings.

Vessel No. 28.—A vessel found in fragments and since put together with slight restoration is a life-form representing a duck with head in relief, *repoussé* wings and tail on which is incised and punctate decoration including the symbol of the bird (Fig. 104).

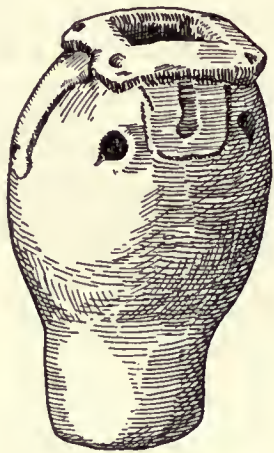


FIG. 105.—Vessel No. 29. Mound near Pearl Bayou. (Two-thirds size.)

Vessel No. 29.—A rudely made quadrilateral vessel with imperforate base and two holes for suspension beneath the rim on the same side. The decoration consists of circular punctate markings at each corner of the almost square aperture and designs in relief on the four sides below the rim (Fig. 105).



FIG. 106.—Vessel No. 33. Mound near Pearl Bayou. (Half size.)

Vessel No. 33.—An undecorated quadrilateral vessel with flat base and a projection at each corner. There are perforations for suspension on opposite sides (Fig. 106).

One bowl, broken when found, held a pot in which was a still smaller one lying on its side.

MOUNDS NEAR LAUGHTON'S BAYOU, WASHINGTON COUNTY. MOUND A.

Laughton's bayou unites with East bay on the north side about seven miles up. The mound was about one-half mile in a southerly direction from the head of the bayou, in a field, the property of Messrs. P. F. and C. T. Parker, of Parker P. O., Florida.

The mound, which had sustained a considerable amount of previous digging, was, before its complete demolition by us, 3.5 feet in height and 45 feet across the base.

In the same field were considerable shell deposits much spread by the plough, including a circular shell enclosure.

As we had anticipated, sherds and large parts of vessels were encountered at the very margin of the eastern slope of the mound. The deposit continued in 4 or 5 feet, accompanied here and there by complete vessels or some from which small parts only had been broken, and by a number of pots and bowls or considerable parts of them, very badly crushed. No other earthenware was met with in the mound.

Of the nine vessels recovered in fair condition, three only call for description.

Vessel No. 2.—A quadrilateral bottle with flat base and upright neck, around which is decoration in relief (Fig. 107).

Vessel No. 3.—Has a globular body somewhat elongated toward the base, which is flat. The upper part is surrounded by a complicated stamp rudely impressed.

Vessel No. 6.—A small bowl of inferior ware decorated with a sort of meander made up of a number of almost parallel lines rudely incised. In this mound was no check-stamp decoration, though the complicated stamp, one example of which is shown in Fig. 108, was abundantly found. All vessels were of inferior ware and decoration, and all had the basal perforation. Near certain vessels lay sheets of mica.

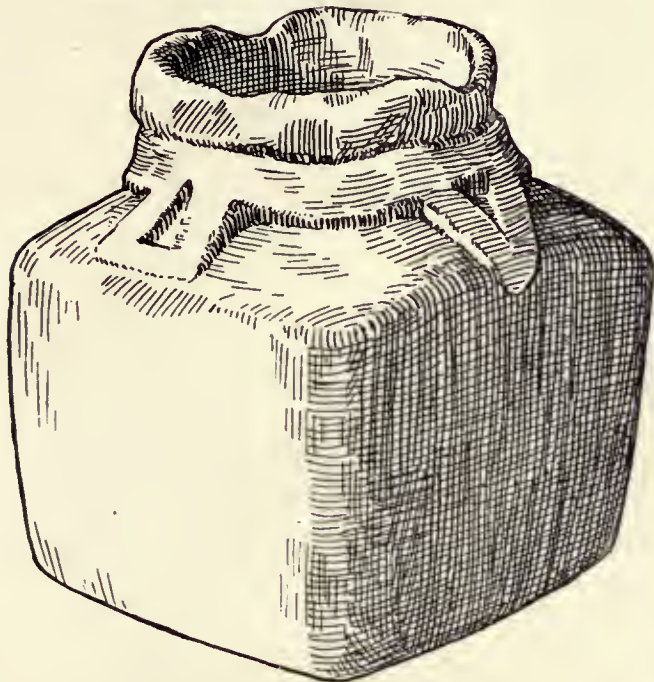


FIG. 107.—Vessel No. 2. Mound A, Laughton's Bayou.
(Full size.)



FIG. 108.—Sherd. Mound A, Laughton's Bayou.
(Three-fourths size.)

No human remains were met with until within a few feet from the center when burials were encountered once to the N. and six times to the NE. and E., all badly decayed, at times traces alone remaining in the sand. Two skulls lay together; one lay alone. One skull had traces of bones in association.

MOUNDS NEAR LAUGHTON'S BAYOU, WASHINGTON COUNTY. MOUND B.

This mound, in hammock land, on the eastern side of the creek which enters the bayou at its head (mound A was on the W. side) was about one-half mile in a SW. direction from the head of the bayou, also on property of the Messrs. Parker. A trench about 5 feet broad had been carried in from the western margin to the center of the mound, previous to our visit. The mound, which was 7 feet high and 43 feet in basal diameter, was entirely dug through by us with the exception of the former trench and a small part of the mound bordering it.

The inevitable deposit of sherds and broken vessels was encountered at the extreme verge of the eastern slope, but in less numbers than was usually the case. The full complement of fragments of not over ten or twelve vessels were found, but none was recovered entire. These vessels, which were of inferior ware and decora-

tion, continued on toward the center of the mound, never immediately with burials, but sometimes in their vicinity, perhaps two or three feet away.



FIG. 109.—Vessel No. 1. Mound B, Laughton's Bayou. (Six-sevenths size.)

A number of fragments of vessels had the basal perforation made before baking.

But two vessels worth detailed description were taken by us from this mound.

Vessel No. 1.—This vessel, of eccentric form, elliptical in cross section, bears traces of crimson pigment inside and out; on one side is raised decoration, on the other, the same pattern is shown but with deeply incised lines. Two holes are on the same side of the vessel for use for suspension or attachment (Fig. 109). Perforations thus placed, the reader will recall, were found by us in a vessel in the mound at Pearl bayou. From this time on we were destined to meet a number of them.

Vessel No. 2.—A fine example of the "freak," or ceremonial, ready-made, mortuary ware, having not only a perforation made in the base before baking, but holes throughout the body of the vessel. The vessel represents a horned owl with feather markings around the head, *repoussé* wings and the conventional tail (Fig. 110). One horn, missing from the vessel, has been restored. Height, 10.3 inches; maximum diameter, 7.3 inches.

Part of a vessel with a rude bird-head projecting from the end has a number of circular holes at either side of the neck (Fig. 111).

Burials, nine in number, were confined to the E., SE. and ENE. parts of the mound, beginning near the margin and continuing in to the center. Some were badly decayed, rendering impossible a determination as to the form of burial. The closely flexed burial and the bunched were present in the mound in several instances. In some cases oyster-shells lay over burials in the mound and once over a shallow grave beneath the base.

With two burials were gracefully shaped "celts", near one of which lay also a number of shells (*Marginella apicina*), pierced for use as beads.

The ceremonial use of fire was clearly emphasized in this mound. Near one burial lay a mass of charcoal and the sand was discolored by heat, though the bones showed no trace of it. The central portion of the mound, extending several feet in



FIG. 110.—Vessel No. 2. Mound B, Laughton's Bayou. (About six-sevenths size.)

all directions, seemed to be discolored by fire, though charcoal in masses was not present, and made into a sort of cement through admixture of ashes. The material was so tough that a pick rather than a shovel was needed.



FIG. 111.—Sherd. Mound B, Laughton's Bayou. (About half size.)

No trace of human remains was present in other parts of the mound. We are constrained to believe that cemeteries exist around St. Andrew's bay, whose position we have been unable to locate.

MOUND NEAR STRANGE'S LANDING, CALHOUN COUNTY.

This mound, in hammock land, about one-half mile in a westerly direction from the landing, on East bay, is on property belonging to Mr. William Strange, living nearby.

The mound, which was about 4 feet high and 38 feet across the base, was the



FIG. 112.—Vessel No. 1. Mound near Strange's Landing. (About full size.)

usual truncated cone in shape and had been very symmetrical until persons previous to our visit dug a trench 22 feet long and 6 feet broad from the western margin toward the center. The remaining parts of the mound were largely dug through by us.

At the very edge of the slope of the eastern side of the mound was the usual deposit of sherds and large fragments of vessels with whole vessels and others somewhat broken. This deposit continued in along the base until the former trench was reached, not far from the center of the mound, and was made up of vessels placed in the sand singly or in twos or threes. The deposit lay apart from the burials and was evidently a general one put in for the dead in common. Among the sherds some bore the check-stamp and a few examples of the complicated stamp also were present. All vessels had the basal perforation.

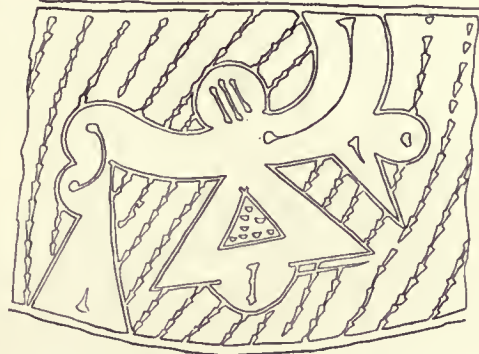


FIG. 113.—Vessel No. 1. Decoration. Mound near Strange's Landing. (Half size.)

Vessel No. 1.—A life-form representing a bird, ovoid in shape with circular



FIG. 114.—Vessel No. 2. Mound near Strange's Landing. (Eight-ninths size.)



FIG. 115.--Vessel No. 5. Mound near Strange's Landing. (About full size.)



FIG. 116.--Vessel No. 6. Mound near Strange's Landing. (Six-sevenths size.)

aperture. The head projects from one end, the wings are circular and in relief; the decoration is punctate and incised (Fig. 112). The incised decoration representing the tail is shown in diagram in Fig. 113. Length, 7 inches; width, 5 inches; height, 4 inches.



FIG. 117.—Vessel No. 7. Mound near Strange's Landing. (Full size.)

Vessel No. 2.—Shown in Fig. 114 is another life-form, also a bird with projecting head and tail and incised and punctate decoration. The wings and legs are plainly shown. A part of the bill has been restored by us.

Vessel No. 4.—A gourd-shaped vessel, of excellent ware, with oval aperture, undecorated.

Vessel No. 5.—A bowl of light-colored ware, decorated on the upper part with

five crescentic figures enclosing a crosshatch design (Fig. 115). Maximum diameter, 7.5 inches; height, 3.8 inches.

Vessel No. 6.—A handsome globular vessel of about 2 quarts capacity, of excellent ware, decorated with a meander running through a field of punctate markings (Fig. 116).

Vessel No. 7.—In shape an inverted, truncated, four-sided pyramid with slightly rounded corners and edges. The rim, about 1 inch in breadth, projects inward horizontally (Fig. 117). The decoration,

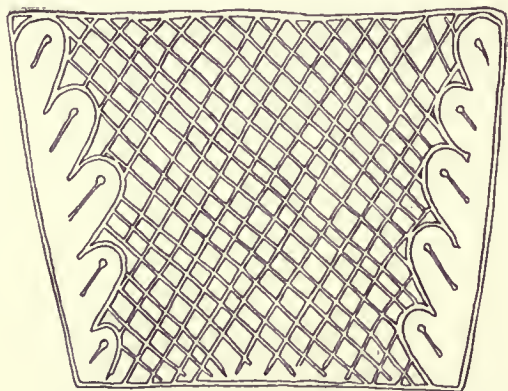


FIG. 118.—Vessel No. 7. Decoration. Mound near Strange's Landing. (Half size.)

incised, is similar on two sides. Of the three different designs, one is simple cross-hatch, one is shown in the half-tone, and the third is given diagrammatically in Fig. 118.

But five burials were met with, and these were in the NE. and N. parts of the mound.

Burial No. 1.—In a shallow grave below the base was a skeleton closely flexed under oyster-shells, with the skull badly crushed, as were all found by us in this mound.

Burial No. 2.—A bunch of bones with four skulls, under oyster-shells.

Burial No. 3.—A closely flexed skeleton lying on the base of the mound, with no shells in association.

Burial No. 4.—In a shallow grave, closely flexed, was a skeleton with skull badly broken, but not sufficiently so to prevent evidence of flattening being apparent. This burial did not lie under oyster-shells, but was covered with a mass of small conchs (*Fulgur pugilis*).

Burial No. 5.—A closely flexed skeleton covered by sand alone.

A large and well-made "celt" lay within a few feet of one of the burials.

MOUND NEAR BAKER'S LANDING, CALHOUN COUNTY.

The mound, about 400 yards WSW. from the landing, East bay, is in hammock land, on property of Mr. Jonah Baker, living nearby.

The mound, which was 5 feet 4 inches high and 72 feet in basal diameter, had been woefully dug into. Besides several trenches, a hole in the center, 22 feet by 25 feet, involving the entire summit plateau, had been put down by former diggers. The eastern slope, however, was practically intact. Deep depressions at points adjoining the base of the mound showed whence material for its making had come. In an adjoining field was a shell deposit including a circular enclosure of shell, now almost ploughed away.

Nearly the remainder of the mound was dug through by us resulting in the finding of nine burials, all but one under considerable quantities of oyster-shells.

These burials were: one at full length on the back; one on the back, extended to the knees, the legs being flexed back; one flexed on the left side with the legs at right angles; one cut off at the knees by the aborigines in making another grave;



FIG. 119.—Sherd. Mound near Baker's Landing.
(Four-fifths size.)



FIG. 120.—Sherd. Mound near Baker's Landing.
(Half size.)

three too decayed for determination; scattered bones in shell above a burial; a single skull lying on the base of the mound, without the usual covering of shell.

While no skulls were in a condition to preserve, those in a partial state of preservation showed no flattening.

But one burial, the lone skull, lay in the eastern part of the mound, the others being mainly in the western.

A few sherds lay at the beginning of the eastern slope and farther in, here and there, the last near the center, were seven or eight vessels of inferior ware, all in fragments but two. The majority were undecorated, the check stamp and incised decoration not being found by us in this mound. Several bore complicated stamps, one of which resembles that on a sherd shown by us in Part I of this report as coming from the great mound at Walton's Camp. Two sherds with complicated stamp decoration are shown in Figs. 119, 120.

LARGER MOUND IN HARE HAMMOCK, CALHOUN COUNTY.

St. Andrew's sound, so-called, is a long arm of water between the mainland and a narrow strip of land bordering the sea, known as Crooked Island. As these are the names made use of on the chart, we have adopted them, though the filling of a pass at the eastern end of the strip of water made it a sound no longer and joined Crooked island to the mainland.

The mound lay about one-half mile inland from a point near the eastern extremity of the sound, on property of Mr. Joseph Dyer, of Wetappo, Florida. The mound, which was pleasingly symmetrical, the usual truncated cone in shape, with a height of 7.5 feet and a basal diameter of 56 feet, had escaped the ravages common to the mounds of this district, partly through being more difficult of access than others, and partly through the presence of modern burials in the summit plateau. The only signs of previous digging were two or three small holes and a narrow trench on the western side, which continued superficially across the top.

The mound was levelled by us with the exception of a small part of the western margin and of a portion 10 feet square in the western part of the body of the mound, where modern burials were thickest. During a long period before our digging was discontinued no trace of earthenware or aboriginal interments had been found.

Aboriginal burials, as noted by us, numbered thirty-one and included, as to form, the lone skull; the bunch; close flexion on the side; one skeleton in a squatting position; scattered bones; and masses of bones continuing in on the same level. These masses, though each counted as one burial, in all cases represented a number of individuals.

Certain skulls showed flattening while in others it was not marked.

The first interment was found at the margin of the mound, almost due east and as the digging continued, burials were met with exceptionally as far to either side as north and south, though the great majority lay with a deposit of earthenware in the eastern and southeastern parts of the mound. No burial was met with farther than 16 feet from the margin.

The burials in nearly every case lay beneath masses of shells, not oyster-shells, however, such as we have found to be the case in other mounds, but small conchs (*Fulgur pugilis*).

With a number of burials were shell drinking cups (*Fulgur perversum*), sometimes immediately on the skull, and with certain interments were "celts," two in one instance. In all, seven of these hatchets and part of another were met with, some not immediately with burials.

There were present also in the mound, exclusive of earthenware: a fossil shark's tooth; mica; a fragment of a graceful, barbed lancehead, 4 inches long; a gorget of ferruginous sandstone with two perforations for suspension (Fig. 121).

The earthenware of this mound was in better condition than usual in this district, while the decoration was much above the average. The deposit began in contact with the first burial in the eastern margin of the mound, as stated, and continued in about 15 feet, sometimes associated with burials and sometimes at a distance from them, but always in an area where they were most frequent. Incised and punc-

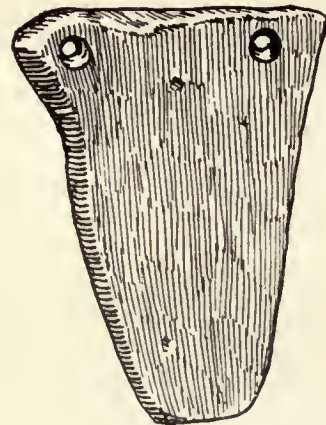


FIG. 121.—Gorget. Larger mound near Hare Hammock. (Full size.)



FIG. 122.—Vessel No. 1. Larger mound near Hare Hammock. (About five-sixths size.)

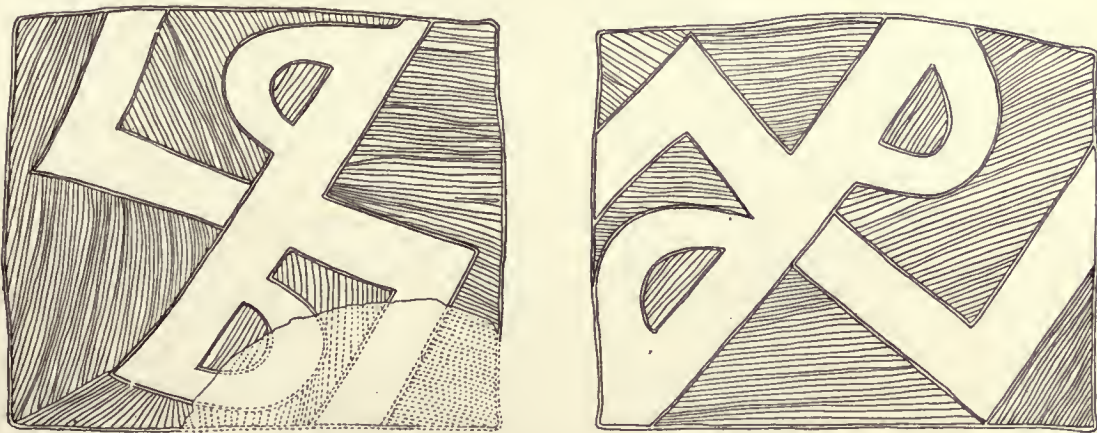


FIG. 123.—Vessel No. 1. Decoration. Larger mound near Hare Hammock. (Half size.)

tate decoration was largely represented; the complicated stamp less frequently; while the check stamp was found with a deposit of sherds in the beginning.

Of the twenty-four vessels met with by us, some of which were badly broken but have since been cemented and restored, we shall describe only the more noteworthy, omitting fragments with ordinary decoration and vessels of common type.

Vessel No. 1.—This vessel, shown in Fig. 122, is almost cubical, with the upper part inverted and ascending to an elliptical opening. On two opposite sides have been bird-head handles, one of which, missing when found, has been restored. The



FIG. 124.—Vessel No. 2. Larger mound near Hare Hammock. (About full size.)

decoration, incised, is nearly identical on two sides, one of which is shown in the half-tone. On the other sides are striking designs to a certain extent recalling the swastika. It will be noted by referring to the diagram (Fig. 123) that one-half of the swastika is represented on each design, but the remaining half not alone has its extremities in the form of loops, but these loops turn in the wrong direction. Length, 7.8 inches; width, 7 inches; height, 5.7 inches.

Vessel No. 2.—A handsome vessel of yellow ware with hemispherical body and inverted rim, on which is punctate decoration and two small horizontal projections. Somewhat below the rim there is an encircling projection, octagonal, tending slightly

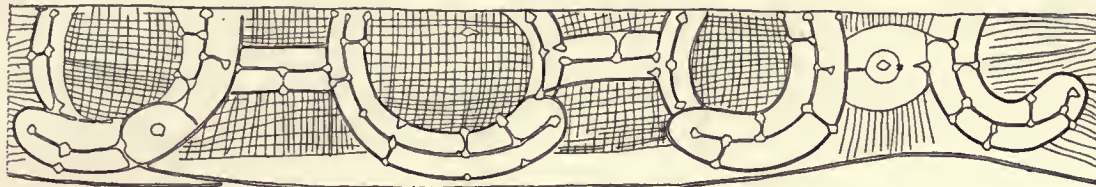


FIG. 125.—Vessel No. 2. Decoration. Larger mound near Hare Hammock. (One-third size.)



FIG. 126.—Vessel No. 6. Larger mound near Hare Hammock. (Full size.)

upward (Fig. 124). The decoration of the body, incised, not uniform, is shown in diagram in Fig. 125.

Vessel No. 4.—A pot with decoration about 2 inches broad below the rim, consisting of encircling rows of roughly triangular punctate markings, finely lined at the base.



FIG. 127.—Vessel No. 11. Larger mound near Hare Hammock. (Full size.)

Vessel No. 6.—An effigy-vase representing a male figure, which, in addition to several parts missing through early breakage, unfortunately lost one part of the head through a blow from a spade, necessitating restoration. The figure is in a squatting position with folded arms. A breech-clout encircles the loins and runs

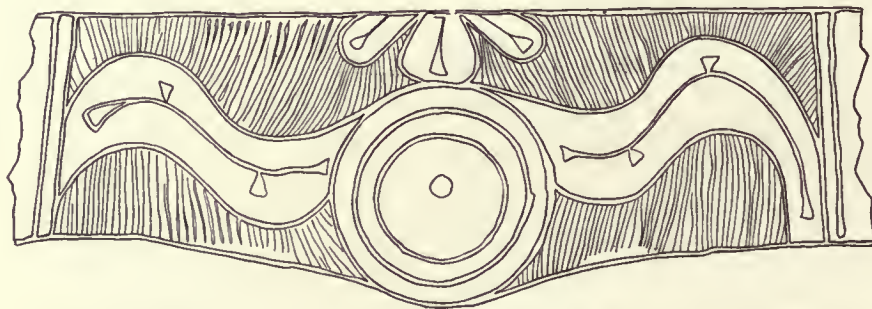


FIG. 128.—Vessel No. 11. Decoration. Larger mound near Hare Hammock. (Half size.)

between the legs. An unusual feature is that the head extends upward several inches above the rear portion of the vessel. The capacity is about 1 quart. There are four perforations for suspension (Fig. 126).

Vessel No. 8.—A bowl of somewhat over 1 quart capacity, triangular in hori-

zontal section with rounded corners. The sole decoration consists of two encircling incised lines about one-half inch apart, below the rim.

Vessel No. 9.—A vessel of about 1 pint capacity, undecorated, with globular body, slightly expanding neck and oval aperture. The rim has been elongated into two projecting points, one of which is missing.

Vessel No. 10.—A small, undecorated cup, the only vessel without basal perforation coming from this mound. It lay directly with human remains, somewhat beyond the area of the earthenware deposit.



FIG. 129.—Vessel No. 13. Larger mound near Hare Hammock. (About full size.)

Vessel No. 11.—A vessel of about 1 pint capacity, diamond-shaped with rounded corners, with aperture of similar outline and base almost flat (Fig. 127). The decoration, incised, shown diagrammatically in Fig. 128, covers one-half of the vessel and probably represents a bird with head and body much conventionalized.

Vessel No. 13.—A vase with globular body and flaring neck surmounted by a thickened hexagonal rim (Fig. 129). The decoration, incised and not uniform, is

shown diagrammatically in Fig. 130. Height, 4.8 inches; maximum diameter, 5 inches.

Vessel No. 14.—This unique vessel of excellent red ware, almost a truncated pyramid in form, has on one side a *repoussé* human figure standing with back turned to the observer, grasping with either hand the rim of the vessel (Fig. 131). The opposite side, showing the head and the face looking across the rectangular aperture, is shown in Fig. 132. The decoration on the two remaining sides of the vessel is given in Fig. 133. There are two holes, on the same side, for suspension.

Vessel No. 16.—A vessel of superior ware, in shape a truncated sphere, undeco-

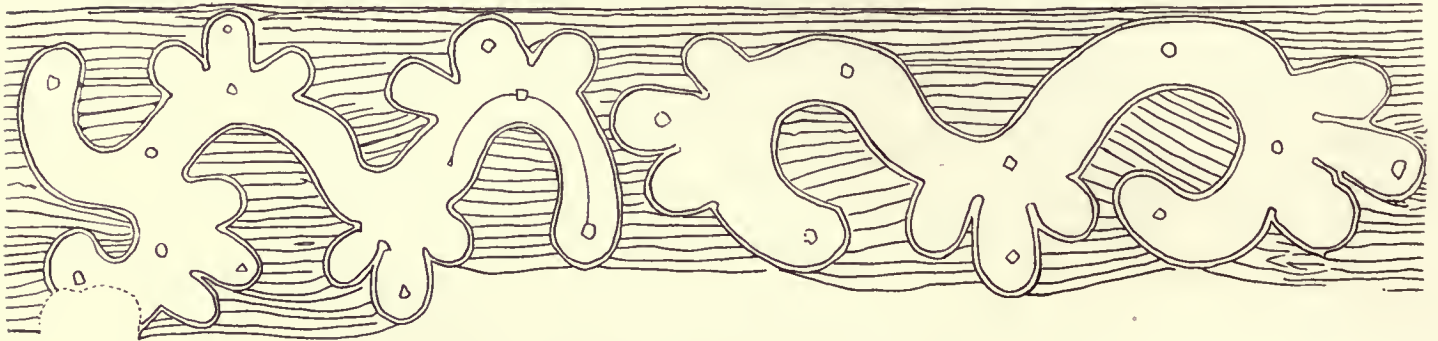


FIG. 130.—Vessel No. 13. Decoration. Larger mound near Hare Hammock. (Half size.)

rated as to the body. The rim, which bears four incised designs, is inverted and slightly depressed. Capacity about 3 quarts (Fig. 134).

Vessel No. 17.—A bowl of superior ware, of elliptical longitudinal section, with thick rim slightly projecting laterally and rounded points at either end. The decoration consists of crimson paint on the inside. Maximum diameter, 9.3 inches; width, 7.8 inches; height, 3 inches.

Vessel No. 18.—A thick bowl of excellent ware, undecorated save for traces of crimson pigment on the inside.

Vessel No. 23.—An interesting little vase with globular body and oblong aperture, having a duck's head in relief on each of two sides below the rim. The decoration on the other two sides, which probably represents wings, is almost identical. There are two holes for suspension (Fig. 135). Maximum diameter, 3.7 inches; height, 2.8 inches.

Vessel No. 24.—Globular body with flaring neck around which is a complicated stamp decoration.

Vessel No. 25.—Part of a vessel found in fragments. A portion of the body has been restored. The body, in addition to line and punctate decoration in which the bird symbol often appears, has been covered with crimson paint. From one side an object which seemingly projected somewhat, has disappeared. The opposite side, where, perhaps, was an identical object, was missing. From the rim on the back of the vessel projects an upright bird-head. In front, another head has a hollow bill to allow the passage of a liquid (Fig. 136). This feature is new in all our mound work.



FIG. 131.—Vessel No 14. Larger mound near Hare Hammock. (Full size.)



FIG. 132.—Vessel No. 14. Another position. Larger mound near Hare Hammock. (Full size.)

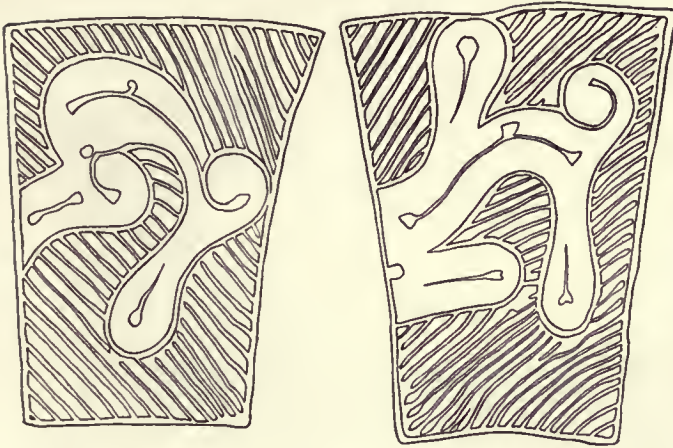


FIG. 133.—Vessel No. 14. Decoration. Larger mound near Hare Hammock. (Half size.)



FIG. 134.—Vessel No. 16. Larger mound near Hare Hammock. (Half size.)



FIG. 135.—Vessel No. 23. Larger mound near Hare Hammock. (Full size.)

SMALLER MOUND IN HARE HAMMOCK, CALHOUN COUNTY.

This mound, in dense growth of trees and vines, lay about 400 yards from the larger mound. Its basal diameter in an easterly and westerly direction was 50 feet and 36 feet in a northerly and southerly. It had escaped all previous digging.

Owing to unavoidable circumstances a portion of the eastern end only of the mound was dug by us. However, the earthenware deposit seemed to have come to an end sometime previous to our departure.

With a burial was a handsome weapon of light gray chert, 6 inches long and 1.7 inches in maximum width (Fig. 137).

Not immediately connected with human remains was a thick sheet of mica, roughly given the shape of a spearhead.



FIG. 136.—Vessel No. 25. Larger mound near Hare Hammock. (About full size.)

In the eastern margin were the usual sherds and vessels, broken and whole, of which the following will be particularly described.

Vessel No. 2.—A jar with flat base and body almost cylindrical, expanding slightly. There is slight constriction at the neck and upright rim. Below the rim is a band of rough complicated stamp decoration about 1 inch in breadth.

Vessels Nos. 3 and 4.—Small oblate spheroids found together. One has a decoration of rudely executed incised lines extending from margin to base. The other has carelessly executed incised and punctate decoration extending a distance of about 1 inch below the rim. Both vessels have perforations for suspension, on opposite sides, and both are imperforate as to the base, the only ones from this mound exempt from mutilation so far as noted by us.

Vessel No. 5.—A vessel of rather coarse ware, with an unusual decoration consisting of deep impressions at regular intervals over the entire surface. The base is

flat (Fig. 138). Height, 6.5 inches; maximum diameter, 4.8 inches; orifice, 1.4 inches.

A sherd from this mound, with complicated stamp, is given in Fig. 139.

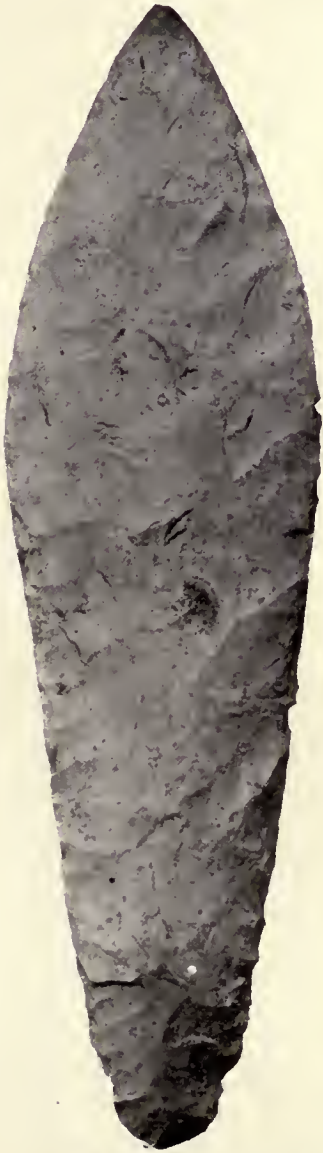


FIG. 137.—Weapon of chert. Smaller mound near Hare Hammock. (Full size.)



FIG. 138.—Vessel No. 5. Smaller mound near Hare Hammock. (Half size.)



FIG. 139.—Sherd. Smaller mound near Hare Hammock. (Three-fourths size.)

MOUND IN GOTIER HAMMOCK, CALHOUN COUNTY.

This mound, famous for successful relic searches in it, lay about one-half mile in NE. direction from Conch island, which is near the SE. extremity of St. Joseph's bay. The island is about one-quarter mile from shore and the mound about an equal distance farther in.

The mound, which has been practically dug to pieces, one relic hunter or treasure seeker filling the hole made by another, had been a truncated cone of dark sand. At the time of our visit, when it was completely demolished by us, its height was 5 feet; its diameter of base, 60 feet.

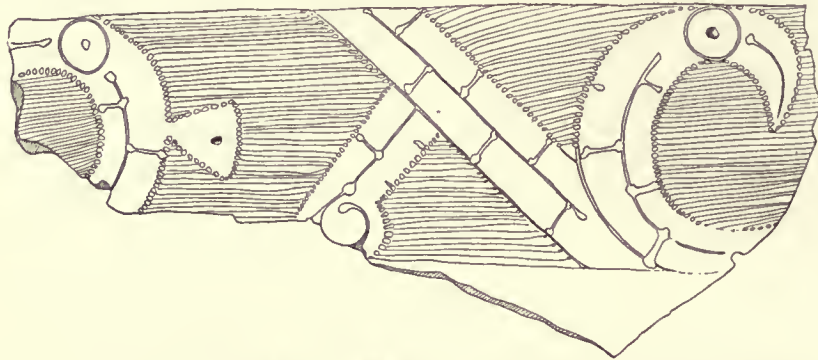


FIG. 140.—Decoration on a sherd. Mound in Gotier Hammock. (One-third size.)

Remnants of the mound found intact by us yielded a few bunched-burials. Several shallow graves below the line of the base, held human remains too badly decayed to determine positively the form of burial, though judging from the restricted lengths of the graves, they, too, contained the bunched burial. No artifacts were with the burials except a rude, undecorated, imperforate toy bowl.

A coarse, undecorated pot of about three pints capacity, with basal perforation, lay alone.

A four-sided cup with flat base, of about 1 pint capacity, lay in the sand alone.

Unassociated, near the base, was a perforate vessel of about 3 quarts capacity, semi-globular body, upright and slightly flaring rim. Around the neck is complicated stamp decoration.



FIG. 141.—Sherd. Mound in Gotier Hammock. (Three-fourths size.)

While all vessels from this mound were of most inferior quality, numbers of sherds were of excellent yellow paste and decorated with crimson paint or with incised designs, showing that the aborigines who built the mound could hold their own in pottery making with any in this region.

One sherd, shown in Fig. 140, lay with others in undisturbed sand.

In Fig. 141 is shown a complicated stamp design from this mound.

MOUND NEAR INDIAN PASS POINT, FRANKLIN COUNTY.

This mound, on property of Mr. James L. Smith, living nearby, lay among sand-blows and dunes near the Gulf shore, about three quarters of a mile in a WSW. direction from the Point. Its outline was irregular. Its height was difficult to

determine owing to its irregular surface; perhaps 3 feet would be a fair average. The diameter of base E. and W. was 49 feet and 53 feet N. and S. A small amount of digging had been done by others shortly before our visit. The mound was totally demolished by us. It consisted of white sand, grayish sand, and yellow sand at the bottom with no regularity of stratification.

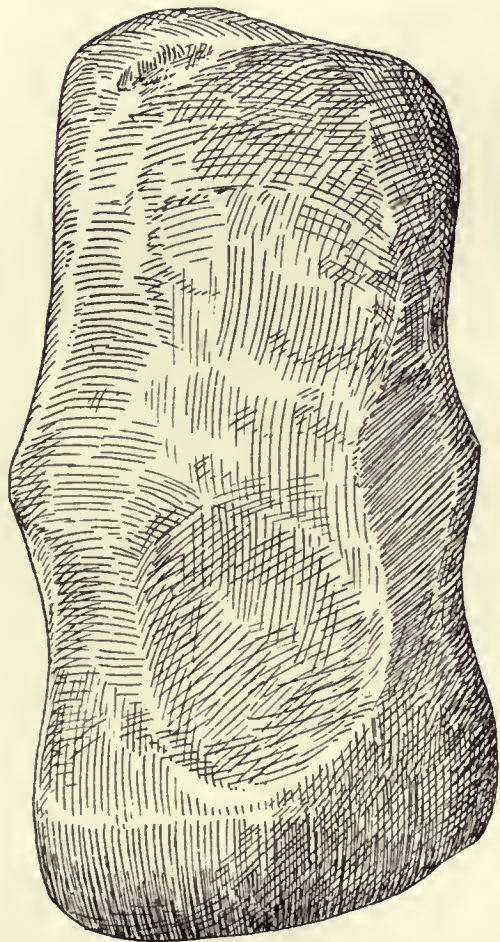


FIG. 142.—Hatchet. Mound near Indian Pass Point. (Full size.)

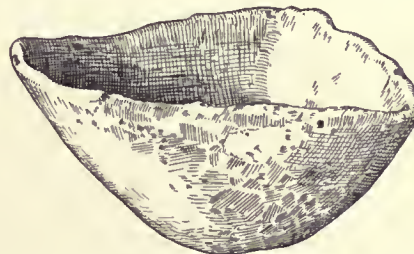


FIG. 143.—Vessel No. 1. Mound near Indian Pass Point. (Half size.)

Burials began at the extreme margin on the south side and in the southeastern part of the mound a little farther in. No burials were found in the western and northern parts until the central portion of the mound was reached.

The burials, which were all of the bunched variety, were very numerous but were not counted by us, as masses of loose bones often lay in contact with each other, making it impossible to say where one burial ended and another began. Many skulls had marked anterior and posterior flattening.

In this mound was no marginal deposit of artifacts, such as were found being

almost in immediate contact with burials. There were found: three pebbles lying with one pebble-hammer; conch-shells; several shell drinking cups; one *Fulgur perversum* of the heavy variety, with blunted beak showing use as a tool; a bit of hematite; a hone of ferruginous sandstone, roughly diamond-shape, 17 inches long and 8 inches in its broadest part; two arrowheads or knives, of chert; twenty-seven "celts," some gracefully wrought, others less carefully made. One of these differed markedly from the usual type in that places for fastening were evident on either side (Fig. 142).

The earthenware of the mound was of inferior quality in the main, and, with the exception of a few sherds, began at a considerable distance in. The check stamp was represented on fragments, but no ware bearing the complicated stamp came from the mound. One sherd of good quality showed part of a design in relief. Here and there, as the digging progressed, vessels, mainly undecorated, were found near the burials. At the center of the mound was a deposit of between fifteen and twenty vessels, the majority undecorated, many broken and so mixed as to prevent an exact count.



FIG. 144.—Vessel No. 2. Mound near Indian Pass Point. (Half size.)

The basal perforation is present in all the vessels from this mound, with two or three exceptions.

The most interesting ware will be described separately.

Vessel No. 1.—A three sided, rude, undecorated, imperforate bowl (Fig. 143). Height, 2.2 inches; maximum diameter, 4.5 inches.

Vessel No. 2.—Globular, with a small part missing through an early fracture which has been restored. The decoration is incised (Fig. 144). Maximum diameter, 7 inches; height, 5.7 inches; diameter of aperture, 4.5 inches.

Vessel No. 3.—Undecorated, an inverted acorn in shape. There are holes for suspension below the rim on opposite sides.

Vessel No. 4.—A vase rather heart-shaped in section as to the body, with flaring neck. The surface, with the exception of the neck, is covered with incised decoration including the bird symbol, often repeated. A rudimentary head extends above the rim on one side (Fig. 145). The decoration, shown diagrammatically in Fig. 146, is repeated on the opposite side. Height, 6 inches; maximum diameter, 5.6 inches.



FIG. 145.—Vessel No. 4. Mound near Indian Pass Point. (About full size.)

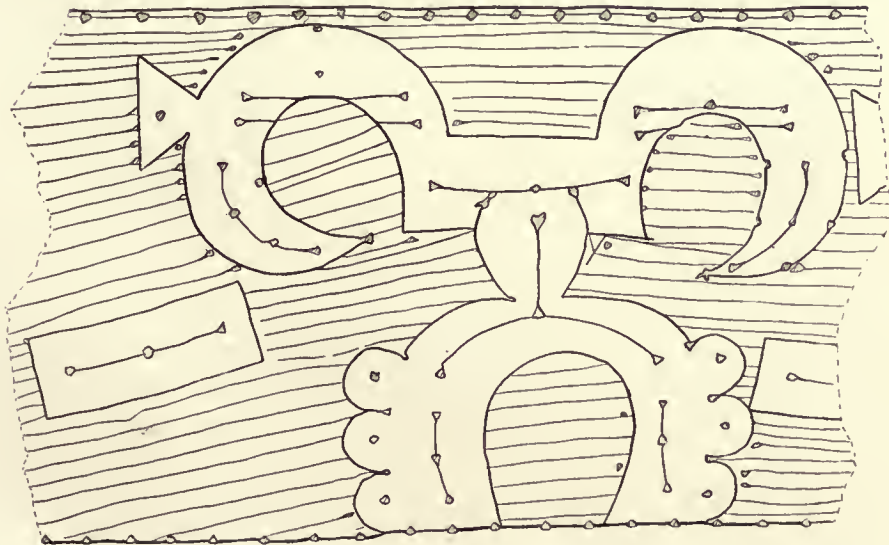


FIG. 146.—Vessel No. 4. Decoration. Mound near Indian Pass Point. (Half size.)

Vessel No. 5.—A truncated globe with rude incised decoration consisting of groups of parallel perpendicular lines about 2 inches long, each group somewhat less than 1 inch apart. This vessel has a capacity of somewhat over 1 quart.



FIG. 147.—Vessel No. 6. Mound near Indian Pass Point. (Half size.)

Vessel No. 6.—A quadrilateral vessel of one quart capacity, with rounded aperture and flat base has for decoration, series of zigzag lines (Fig. 147).

Vessel No. 7.—A quadrilateral vessel of heavy ware, with flattened base and rounded corners, of about 2 quarts capacity. The neck, about 1 inch in height, is upright.

A little below the surface, not associated with human remains, was part of an old-fashioned chisel-pointed spike of brass, of a kind

formerly used in ship-building.

MOUND AT ELEVEN MILE POINT, FRANKLIN COUNTY.

This Point, on St. Vincent's sound, taking its name from its distance from the town of Apalachicola, has on it a mound on property of Mr. G. A. Patton, resident on the place. There are various shell deposits in the neighborhood and heaps of shell extend for a distance along the shore.



FIG. 148.—Sherd. Mound at Eleven Mile Point. (Three-fourths size.)



FIG. 149.—Sherd. Mound at Eleven Mile Point. (Two-fifths size.)

The mound, in woods on the verge of a cultivated field, was seamed with trenches and riddled with holes, most of which, however, were superficial.

What was left of the mound had a basal diameter of 50 feet; a height of about

3 feet. The mound was completely demolished by us. Beginning at the very margin of the southeastern portion, unassociated with burials, which were more centrally located, were various vessels, singly or in pairs, and parts of vessels and numerous sherds. These offerings extended a number of feet in toward the center.



FIG. 150.—Vessel of earthenware. Mound at Eleven Mile Point. (Half size.)



FIG. 151.—Vessel of earthenware. Mound at Eleven Mile Point. (Half size.)



FIG. 152.—Vessel of earthenware. Mound at Eleven Mile Point. (Half size.)

Still farther in, usually apart from interments, were several other vessels in different parts of the mound. Sherds were undecorated; incised, sometimes with cross-hatch; or, in several cases, had a complicated stamp. Two of these are shown in Figs. 148, 149. Several vessels also bore the complicated stamp and all had the basal perforation.

We shall describe in detail the most noteworthy vessels.

A compartment vessel with circular division in the center, in a plane above four similar compartments, one of which, missing when found, has been added with the aid of a mixture composed of beeswax, whitelead, powdered soapstone, resin, linseed oil, and turpentine, which we have found very useful in work of this kind. This vessel has been sent to the Peabody Museum, Cambridge, Mass.



FIG. 153.—Decoration on vessel of earthenware. Mound at Eleven Mile Point. (One-third size.)

A four-sided vessel of about one-half pint capacity, otherwise undecorated, has small protuberances at each upper corner of the body and companion ones on the rim immediately above. The ware is inferior.

A vessel with semiglobular body and short incurving neck has incised decoration as shown in Fig. 150. The capacity is about 1 pint.

A vessel of eccentric shape, somewhat resembling that of a dumb-bell, undecorated save for an encircling incised-line below the rim, has two holes for suspension on opposite sides (Fig. 151).

A bottle with neck curiously disproportionate in length, of inferior ware and rudely made, has a height of 6.7 inches, a maximum diameter of 3.6 inches (Fig. 152).

A vessel made to hold about one quart, has a semiglobular body and a slightly flaring neck about 1.25 inches in height. There is a curious punctate decoration shown in diagram in Fig. 153.

COOL SPRING MOUND, APALACHICOLA, FRANKLIN COUNTY.

In the western outskirts of Apalachicola is a mound which, as might be expected, has long been the center of attack for avaricious or curious persons. Material from one trench or excavation has been thrown into others, thus preserving the mound from demolition. Its present height is about 7.5 feet; its diameter of base, about 90 feet. On the surface of the mound, where former diggers had thrown them, were many sherds much resembling in material and ornamentation the ware we found during our preceding season's work between Perdido and Choctawhatchee bays, including a part of a vessel in the form of a frog.

About two-thirds of the mound were dug down by us including much disturbed material. On the base of the mound and two or three feet above it were a number of burials consisting of trunks of skeletons extended on the back with thighs and legs sometimes drawn up against the body or drawn up at right angles to the trunk, or extended laterally. These forms, with slight variations, were met with nine times, and burials disturbed by our own or by former diggers indicated a like method of burial. A single skull and a skull with a humerus were found. No bones were in a condition to preserve. The only artifacts encountered with burials were a bit of mica with one skeleton and a well-made lance-head of chert, 4.75 inches in length, beneath the chin of another.

In the marginal part of the mound, which had been dug through by others, were many sherds: undecorated; with incised and punctate decoration, sometimes in combination; the complicated stamp, in a few cases; the check-stamp, once or twice; looped handles; handles representing heads of quadrupeds or of birds; animal legs in relief on the sides. Deeply scalloped margins were abundant.

A "celt" lay unassociated in the sand.

MOUND NEAR APALACHICOLA, FRANKLIN COUNTY.

In a cultivated field, about one-half mile in a westerly direction from the town, on property of the Cypress Lumber Company, of Apalachicola, is a mound much spread by the plow. Its diameter of base is about 100 feet N. and S. and 80 feet E.

and W., approximately. The height is about 2 feet. Nearby is a shell-field while a shell-heap of considerable size is distant about 75 yards in an ENE. direction.

Ten excavations in various parts of the mound yielded no result other than to show the mound to have been built of sand on a base of shell, presumably as a place of abode.

CEMETERY MOUND, APALACHICOLA, FRANKLIN COUNTY.

This mound, in Magnolia Cemetery at Apalachicola, about 5 feet high, was demolished by us, with the courteous permission of the City Council.

The mound, the usual truncated cone, was composed of white sand in places and of grayish sand in others, with oyster-shells centrally, near the base.

The mound, which had sustained much previous digging, seemingly, contained but two whole skeletons and three others from which parts had been cut away.

Unassociated, was a circular ear-plug of lime rock, covered with sheet copper on one side, with a diameter of 1.6 inches, of the type figured by us in a former report as coming from Mt. Royal, Fla.

In midden refuse, near the base, was a bone pin about 8 inches long and from the same deposit, as a rule, came a number of sherds, undecorated or bearing the check stamp.

PIERCE MOUNDS, NEAR APALACHICOLA, MOUND A.

The Pierce Mounds, five in number, lie from 1 mile to 1.5 miles to the westward of Apalachicola, on property belonging to Mr. Alton Pierce of that place.

MOUND A, the southwesternmost of the group, which had undergone but insignificant previous digging, had at base a diameter of 96 feet E. and W. and 76 feet N. and S. The diameters of the summit plateau in the same directions respectively were 40 feet and 34 feet. The plateau, however, had been much broadened and the height of the mound somewhat reduced to prepare for interments made in recent times. The height of the mound which was completely demolished by us, was 8 feet.

The body of the mound was of yellow sand, the basal portion being of sand discolored by fire and by organic matter, often mixed with oyster-shells. There was no regular stratification, but irregular layers of oyster-shells were present throughout, in places.

Throughout the mound it was noted that the great majority of burials lay in shell, but it seemed to us that this was owing to the fact that the majority of burials were well down toward the base where the shell was, rather than that the association was intentional. Such burials as were higher in the mound usually lay in the sand.

As the mound was practically undisturbed at our coming, data as to burials were taken with great care. The relative position of the ninety-nine found by us, which, however, stand for a much greater number of skeletons, is shown in the plan (Fig. 154). We may say here, and it applies to all other mounds opened by us, that when enough of a bone remains to make its identification certain, we often speak of it as present, for the reason that it was there when the burial took place. Also, when we write of skeletons in mounds, we do not wish to imply that these skeletons were

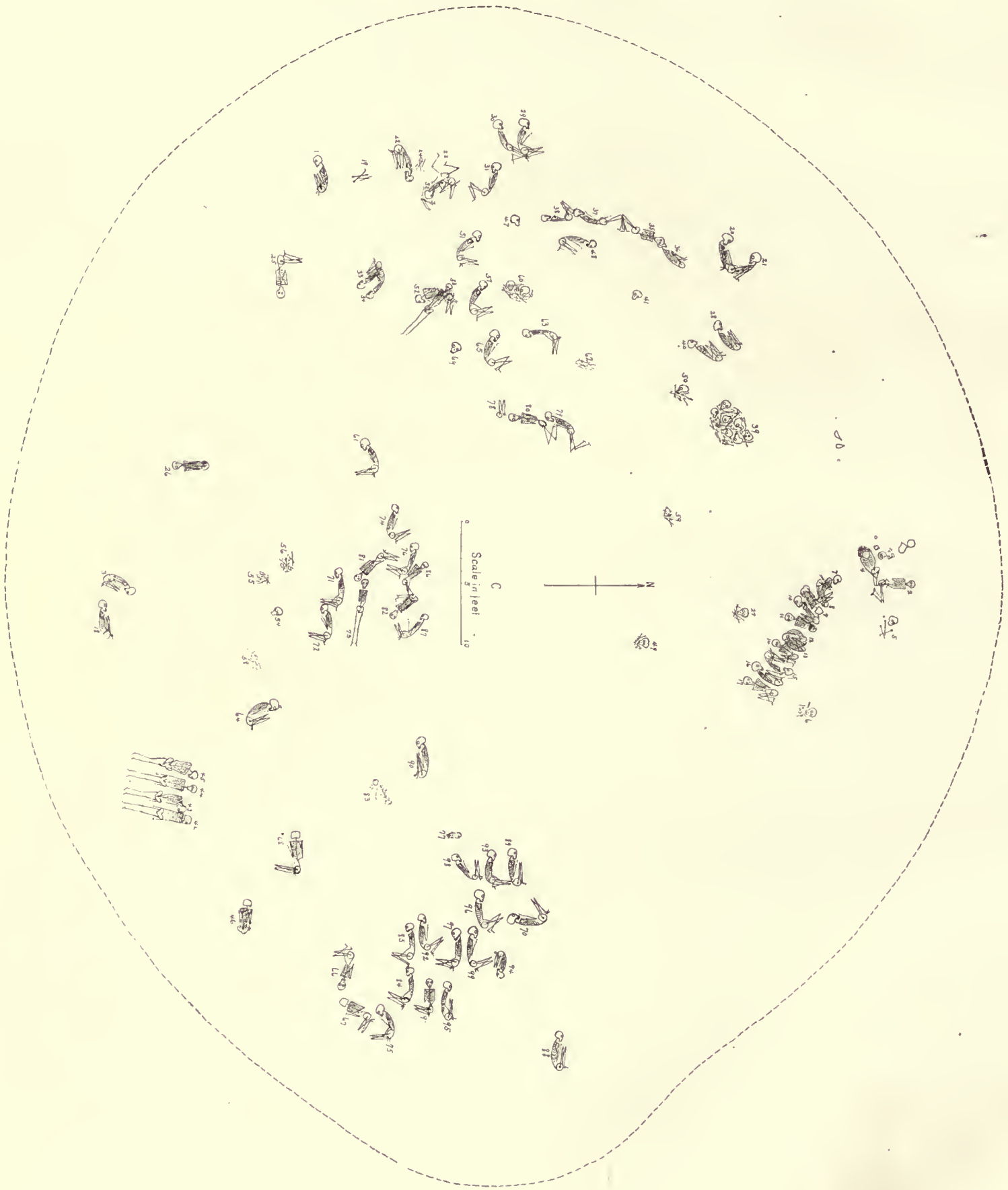


FIG. 154.—Plan of Mound A. Pierce mounds, near Apalachicola.

interred covered with flesh, but rather, after being exposed for a period, as was the custom with southern aborigines, that they were buried without the flesh but in the main held together by ligaments. Missing bones or bones misplaced, occasionally, show this to be true.

Heads of skeletons pointed in all directions. A few skeletons were closely flexed. The majority, however, had the thighs at right angles to the trunk, with legs drawn up toward the thighs. Unless especially noted, burials were as follows: flexed on the left side, 33; flexed on the right side, 25; flexed on the back, 3; full length on back, 2; infants' skeletons, badly decayed, 2; skulls with fragments of



FIG. 155.—Vessel with Burial No. 2. Mound A. Pierce mounds, near Apalachicola. (About full size.)

bone, 3; lone skulls, 3; scattered remains, 9; aboriginal disturbance, 1; recent disturbance, 1; skull in caved sand, 1.

The following are not included in the above.

Burials No. 7 to No. 17, inclusive, a group comprising eleven skeletons variously flexed with skulls pointing in different directions, but mainly toward the central part of the mound. These skeletons were in a layer of shell, from 1 foot to 1.5 feet in thickness, about 1 foot above the base. With this shell, above the bodies, were blackened masses composed of charcoal, calcined shell, ashes, etc. These masses did not seem to be remains of fires which had been made and allowed to burn at the

places where the ashes and charcoal were found, but to have been brought while still burning and placed on or near the skeletons, as such bones only were charred as were in contact with the material. None of the bones was calcined, nor did the sand and shell about these masses of material show evidence of fire. Throughout the mound were many such places, showing the use of fire away from the mound during the ceremony of interment.

Burial No. 39, a mass of human bones, including seven skulls, lay in the body of the mound, with remains of fire above and sand mixed with shell below.



FIG. 156.--Vessel with Burial No. 2. Mound A. Pierce mounds, near Apalachicola. (Two-thirds size.)

Burials No. 42 to No. 45, inclusive, four skeletons at full length, side by side in a shallow grave beneath the base, with heads in the same direction.

All bones in this mound were in bad condition through decay, but one skull being saved.

Belonging to Burial No. 52 was a femur showing a repaired fracture of the upper third, with some shortening of the bone. This was sent to the United States Army Medical Museum at Washington, D. C.

Seldom before have we found a mound so full of promise as to yield of artifacts at the start, and so disappointing during the remainder of the investigation.

Burial No. 2, (see plan) a skeleton partially flexed on the left side, lay in the northern slope of the mound, 2.5 feet from the surface. Under the thorax were many fragments of part of a vessel with a decoration of incised lines, and crimson paint in places. Three feet to the west was a vessel, upright, of about six quarts capacity, of undecorated ware, in fragments through pressure of sand.



FIG. 157.—Vessel with Burial No. 2. Another view. Mound A. Pierce mounds, near Apalachicola. (Two-thirds size.)

Immediately back of this one was another of about the same size, undecorated, with part of the bottom knocked out. About 1 foot farther in the mound, on its side, lay a vessel of yellow paste with two compartments, one of which, crushed by sand and roots, has been cemented together. The decoration consists of incised lines and bands of crimson paint as shown in Fig. 155. But one compartment has the basal perforation. Height, 4.6 inches; maximum diameter, 7.1 inches; diameter of a single aperture, about 3 inches.

In contact with this double cup was a curious spiral vessel shown in two positions in Figs. 156, 157.

Though this vessel, at first glance, resembles a ram's horn, we do not believe it to have been modelled after one.

In the first place, it is our opinion that the origin of the vessel antedates the appearance of sheep in Florida.

Secondly, there are marked points of difference in appearance between the vessel and the horn of a ram. The corrugations are not encircling but leave a smooth space the length of the lower part of the vessel. The distal end is rounded and does not taper to a point as is the case in a horn. As to the aperture, we must bear in mind it is open, of necessity, and may not be called upon to bear testimony as to resemblance.

There are grub-worms in Florida as long as, or longer than, the little finger of a male hand and fully equal in diameter. Their extremities are rounded. The deep corrugations covering their backs and sides end at the belly. As these worms lie dead on the surface, we have seen them in the exact position shown in the vessel. Besides, worms were of some importance along the Gulf coast in early days, being an article of diet at times, according to Cabeça de Vaca.

We are convinced, then, that this vessel represents a life-form and is modelled after the grub-worm. Height, 6.9 inches; maximum diameter of body, 2.9 inches; diameter of opening, about 3 inches; width of entire vessel, 7.8 inches.

About 6 inches distant from the worm-effigy were four arrowpoints or knives, in association, three of chert, one of quartzite, while 10 inches to the south were fragments of an almost cylindrical vessel of yellow ware. The base, which had been flat, is missing. The decoration, punctate and lined, has crimson paint in places, distinguishable in the half-tone (Fig. 158). The diagram (Fig. 159) shows, with other symbols, a pair of open hands, the backs turned outward, the thumbs thrust back. Maximum diameter, 5.1 inches; diameter of opening, 4.3 inches; height of vessel, 5.3 inches.

The widespread emblem of the open hand was found by Mr. Cushing on a mussel shell, among his wonderful discoveries at Marco, and the open hand appears on a vessel from Alabama.¹

Considering the comparatively large number of burials but few articles lay immediately with the dead.

With Burial No. 60, two skulls with certain bones mingled, lay a "celt" about 11 inches in length, immediately beneath one of the skulls.

Burial No. 63, a skeleton flexed at about right angles on the right side, had near it a beautifully smoothed pendant of a fine grained slate rock, 6.5 inches in length, .6 of an inch in maximum diameter, grooved at one end for suspension, of a type to be figured later in the account of the Yent mound.

In a grave, beneath the eastern slope of the mound, 6 feet below the surface, lay Burial No. 66, flexed at right angles on the left side. Along the right humerus

¹ Report Bureau of Ethnology. 1882-83, p. 433.



FIG. 158.—Vessel with Burial No. 2. Mound A. Pierce mounds, near Apalachicola. (About full size.)

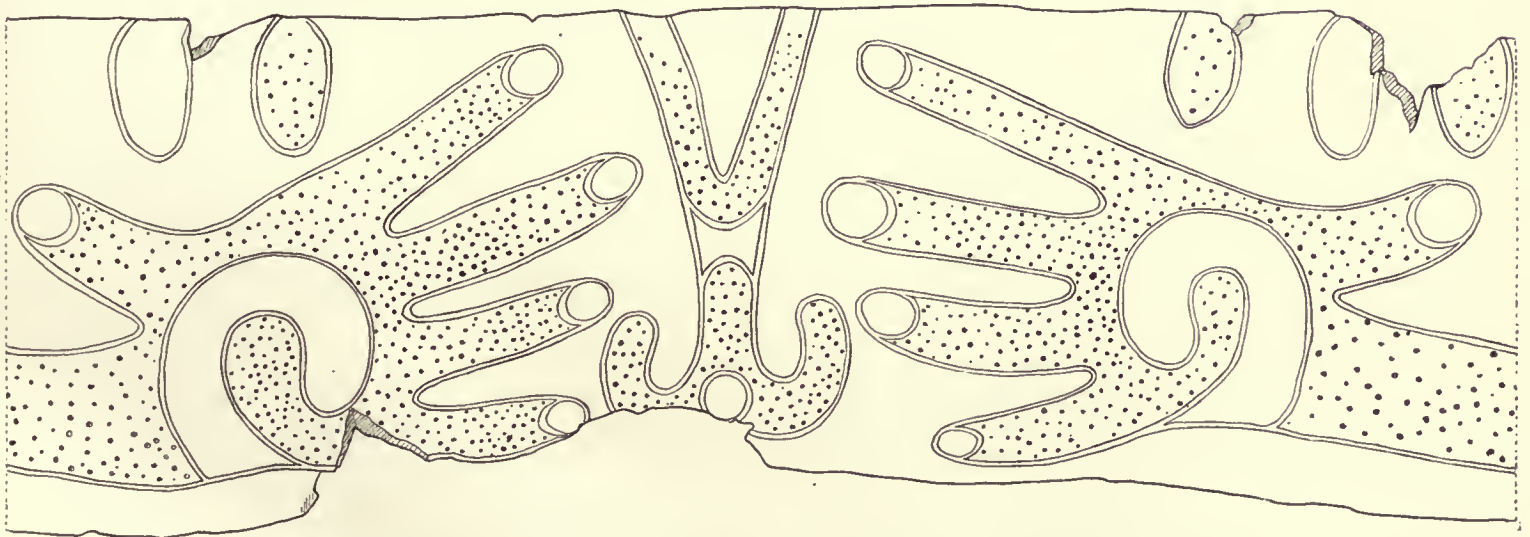


FIG. 159.—Vessel with Burial No. 2. Decoration. Mound A. Pierce mounds, near Apalachicola. (Half size.)

lay an ornament of sheet copper, 10 inches long and 1.7 inches broad, bent around and overlapping on itself, making a flat tube about .8 of an inch in diameter. The metal, almost entirely transformed into carbonate, fell into bits upon removal. At the neck of the skeleton were found perforated pearls and fragments of others.

Burial No. 81, a skeleton flexed to the right, on the base, 8 feet below the surface, had, at either shoulder a disc of sheet copper so badly carbonated and corroded that the original size could not be determined.

At the center of each of the sheet copper discs, on one surface, is a layer of silver. This layer is not fairly thick, and regular as to its margin as would be the case if a coin or sheet silver had been shaped and fastened on, but is very thin and radiates marginally as though a small nugget, placed on the copper and hammered out, had remained through force of the blows.

We are indebted to Mr. Warren K. Moorehead, whose great discovery of copper objects of aboriginal make in the Hopewell mounds, Ohio, is so well known, for the information that several ornaments of sheet copper were found in the Hopewell altars, which were covered with a thin layer of silver. These may be seen in the Field Columbian Museum, Chicago.

While the existence of sheet copper ornaments of purely aboriginal provenance is now admitted by all who possess a schoolboy's knowledge of chemistry,¹ the presence of silver in a mound, as a rule, shows "white contact" on the part of the aborigines who built the mound, but such is not always the case. Silver is sometimes visibly present in "Lake" copper which is native and Lake Superior is known to have been the main source of aboriginal supply of copper. To cut this free silver from the native copper would be easy, though the supply would be small. Mr. Moorehead informs us that he found in the effigy mound of the Hopewell group a bit of native silver, hammered flat, which is now in the Field Columbian Museum. No indication of contact with Europeans was present in the Hopewell mounds.

While Mr. Moorehead was conducting investigations in 1897 for the Ohio State Archaeological and Historical Society, in Pickaway County, Ohio, in a small stone box were found five nuggets of silver, weighing six and one-quarter ounces, in the aggregate. This unique discovery shows the aborigines to have been possessed of silver nuggets in all probability before the coming of the whites, since no artifact of European make was met with during the work.

The method of fastening the silver on the sheet copper ornaments found by us, and the irregular outline and thinness of the hammered silver would, in our opinion, argue aboriginal workmanship and a supply more scanty than would have been the case had silver bullion and coins been forthcoming from the whites through barter or through shipwreck. When to these facts we add that no object surely of white provenance came from the mound in which these ornaments were, there are good grounds to consider these copper and silver ear-plugs to be of purely aboriginal make. They are the first of the kind to be found in Florida, we believe.

¹ "As to Copper from the Mounds of the St. Johns." "Certain Sand Mounds of the St. Johns River, Florida," Part II. By Clarence B. Moore.

A few shell beads lay near a skeleton of an infant.

With Burial No. 93, a skeleton flexed on the left side, were a few shell beads

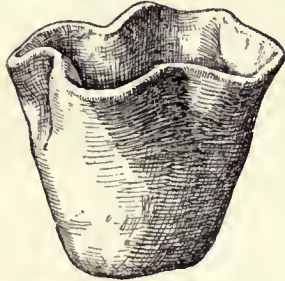


FIG. 160.—Vessel with Burial No. 93. Mound A. Pierce mounds, near Apalachicola. (Half size.)

near the neck, and at the shoulder, an undecorated, imperforate vessel of about one-half pint capacity (Fig. 160).

A burial had a sheet of mica near the head.

Certain scattered bones lay in sand colored with hematite.

Loose in the sand were: a number of drinking-cups wrought from *Fulgur perversum*, several with perforated bases; two arrowheads or knives, of chert; a rude chipped chisel of chert; a small pendant rather roughly made; the usual quota of hammer-stones, pebble hammers, pebbles, broken hones, etc.; two pointed implements made from the axis of *Fulgur*; a few shell beads in caved sand; also in caved sand, a fragment of sheet copper with fluted decoration, badly carbonated; on the base, among the shells, a gorget of bone, elongated oval, made from the femur of a bison,¹ perforated for suspension at one end, 7.1 inches long, 2 inches in maximum width (Fig. 161).

Also unassociated was a small vessel with globular body, constricted neck and flaring rim around which is a series of notches. A rude meander decoration surrounds the body. One of four feet is lost through a basal perforation.

In debris was part of a smoking pipe of earthenware of the platform, or "Monitor," type.

A curious fragment of earthenware lay alone in the sand. The decoration is partly incised and partly made with a crescentic point. Two and five-tenths inches are of solid ware; above seems to be the beginning of the base of a cup (Fig. 162).

In fallen sand in the SSE. slope of the mound was a globular vessel of about 1 quart

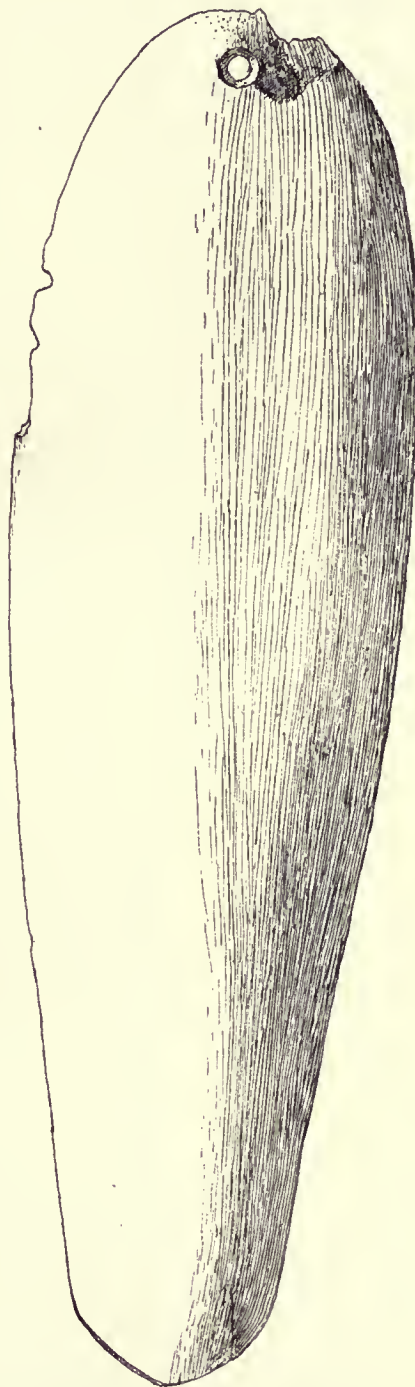


FIG. 161.—Gorget made from the femur of a bison. Mound A. Pierce mounds, near Apalachicola. (Full size.)

¹ Kindly identified by Prof. F. A. Lucas of the U. S. National Museum.

capacity, in pieces which have since been cemented together. The base is perforate.

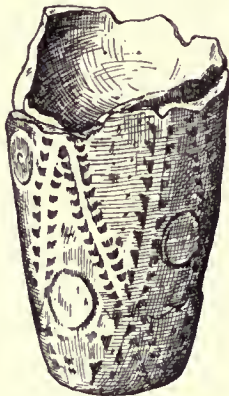


FIG. 162.--Sherd. Mound A. Pierce mounds, near Apalachicola. (Half size.)

The decoration consists of upright parallel bars of crimson paint rudely applied. With this vessel were many fragments representing parts of three or four vessels, all decorated with crimson pigment. In association with these was a vessel with the rim slightly broken, which, at first glance, seemed to be an upright cylindrical cup placed within a bowl. Around the body and even on the base is a repetition of an incised and punctate design with crimson pigment, in addition. The neck is crimson inside and out. There is a basal perforation (Fig. 163). Height, 5.2 inches; maximum diameter of body, 4 inches; diameter of opening, 3 inches.

With fragments of ware were a small undecorated



FIG. 163.--Vessel of earthenware. Mound A. Pierce mounds, near Apalachicola. (Full size.)



FIG. 164.—Vessel of earthenware. Mound A. Pierce mounds, near Apalachicola. (Five-sevenths size.)

imperforate pot with four feet and a rude vessel of about 1 quart capacity, with flaring rim and seemingly cord-marked decoration. Three of four feet have been removed by a basal perforation.



FIG. 165.—Sherd. Mound A. Pierce mounds, near Apalachicola. (Half size.)

Unassociated, in the eastern slope of the mound, lay the wreck of a curious, undecorated vessel of very inferior ware, which has since been restored. The body is annular and flattened and has at equidistant points three necks resembling inverted truncated cones (Fig. 164). Diameter of body, 6.2 inches; central opening, 2 inches.

A sherd with a complicated stamp of a pattern new to us is shown in Fig. 165.

Together, near a great fireplace, on the base of the mound, were: a shell drinking cup; two canine teeth, one of which Prof. F. A. Lucas has identified as the left lower canine of a wolf, *Canis*

occidentalis, and the other as the left lower canine of a puma, *Felis concolor*; and a shell (*Glycymeris americana*, Defr.). Near these or with them were: many fragments of deer bones; one canine of a carnivore; part of a lower jaw of a small rodent; a mass of shell, resembling a large imperforate bead; a rude shell gouge.

A neatly made gouge of shell, with the upper end missing, lay unassociated in the sand.

PIERCE MOUNDS, NEAR APALACHICOLA, MOUND B.

This mound, with a height of 16 feet and a basal diameter of about 100 feet at the present time, showed traces of previous digging on every side. In addition, much of the marginal parts had been hauled away for use in an adjoining cultivated field. On this mound were many palmettoes, much prized by the owner, which precluded a full examination. Such work as was done at various points showed the mound to be of sand with slight admixture of shell. A superficial skeleton lay near the margin.

About fifty yards eastward of Mound B, in a field covered with scattered shells, some trenching was done by us resulting in the discovery of three skeletons at full length. Our work here was discontinued at the request of the owner, who did not wish to have unproductive soil brought to the surface.

In this field is a mound commonly believed to be of shell throughout. It is said by some that the shell extends to a depth of about 2 feet only, after which sand is encountered. As the shell is used for the streets of the town, digging into the mound is not encouraged.

PIERCE MOUNDS, NEAR APALACHICOLA, MOUND C.

This mound, elliptical in outline, with flat top, about 6.5 feet high, has a diameter of 90 feet east and west and of 74 feet north and south.

Starting from the margin, a trench 35 feet long and from 13 feet to 15 feet wide, was continued to within 3 feet of the center. Part of the way, the trench was run along the base of the mound, but it having become evident that the mound was built upon a shell-heap, the useless throwing back of shell was discontinued and the sand alone was removed.

Three skeletons were met with, two flexed, and one, that of an infant, disturbed by the digger. With this skeleton were a few small shells used as beads.

Loose in the sand were various sherds with small check stamp. Pinched decoration and complicated stamp also were represented. One small sherd bore semi-circular impressions made, perhaps, by a portion of a reed.

PIERCE MOUNDS, NEAR APALACHICOLA, MOUND D.

This mound, in thick scrub, has a height of 20 inches. The diameter of base is 40 feet. It is composed of sand blackened with organic matter and has local layers of shells of the oyster and of the clam.

The mound, which was about one-half dug away, proved to be a dwelling site. Sherds of good quality, some with pinched, some with incised, decoration, but mainly of the small check stamp, were present.

PIERCE MOUNDS, NEAR APALACHICOLA, MOUND E.

This mound, which is much spread, has basal diameters of 76 feet N. and S. and 82 feet E. and W. The height is 3.5 feet.

Fourteen holes, each about 3 feet square, were dug to the base. The mound is composed of sand of various shades without admixture of shell. Nothing was found save a single fragment of pottery. The mound was evidently domiciliary.

SINGER MOUND, NEAR APALACHICOLA, FRANKLIN COUNTY.

This mound, totally demolished by us, was about 1.5 miles in WNW. direction from Apalachicola in a cultivated field, the property of the late Mr. Joseph Singer of that place.

The mound, almost intact, the usual truncated cone in shape, had a height of 5.5 feet; a diameter of base of 65 feet.

The upper portions were of white sand, which probably was the yellow sand of the middle parts of the mound, bleached by sun and rain. Above the base was a stratum of sand blackened by fire, increasing in thickness until the maximum, about 2.5 feet, was reached in the central part of the mound.

Burials, nineteen in all, were met with from the marginal parts of the mound to the center. The bones, as a rule, were so decayed that parts only remained. A few burials were in better condition.

Burial No. 15, the skeleton of a young person, lay in the black layer near the base and was the only burial found at a depth greater than 2.5 feet from the surface. This skeleton was partly flexed on the left side.

Burial No. 10 had been held together in part by ligaments, much of the skeleton being in order, though part of a scapula lay with the legs. Over this skeleton were a few oyster-shells, as was the case with a number of burials in this mound.

Burial No. 14 was a skeleton at full length on the back with certain other human bones lying across the legs.

All other burials were fragmentary. Several lone skulls were met with, and once an isolated portion of a femur.

No pottery came from this mound with the exception of a few sherds, undecorated or with the check stamp, evidently introduced with the sand.

Two gracefully wrought celts, each about 8 inches in length, lay separate and unassociated.

JACKSON MOUND, NEAR APALACHICOLA, FRANKLIN COUNTY.

About 2.5 miles in a WNW. direction from Apalachicola, in the verge of woods, on property of Mr. Scipio Jackson, colored, resident on the place, was a mound which was completely demolished by us. This mound, made of sand of vari-

ous colors, irregularly placed, had a height of 9 feet. Its basal diameter N. and S. was 72 feet and 66 feet E. and W. Six excavations, all insignificant, had been made previous to our visit.

A feature of the mound was the comparatively central position of the burials. With the exception of a small pocket of calcined fragments of human bones, no trace of human remains was met with until a point 15 feet from the center of the mound was reached, and the majority of the twenty-six burials noted by us were still more central.



FIG. 166.--Smoking pipe of earthenware. With Burial No. 3. Jackson mound. (About full size.)

All burials were badly decayed, sometimes only crowns of teeth, small bits of unidentified bone and even mere traces of bone, remaining in the sand. Single skulls, skulls with a few long-bones and certain long-bones without a skull, were present.

Burial No. 2, a skull and parts of two long-bones, had in association sand colored with hematite and four arrowheads or knives, of chert.

Burial No. 3, a crushed skull on certain long-bones, better preserved than other burials in the mound, lay at a depth of 18 inches from the surface. With this burial were a bit of pottery, one pebble and two smoking pipes of earthenware. One of these pipes (Fig. 166), ornamented around the margin of the bowl and at the base,

has a diameter of bowl of 3.5 inches. The other, with a small, rude decoration of incised lines, is 2.5 inches across the bowl, within which is carbonized material, tobacco or a substitute for it (Fig. 167). As the other burials in the mound were at considerable depth, some lying on the base, it is possible that this burial was intrusive, especially as the bones were in so much better condition than the others in the mound. We may say that the presence of smoking pipes with a burial would not of necessity prompt us to consider it a recent interment, since we are convinced that



FIG. 167.—Smoking pipe of earthenware. With Burial No. 3. Jackson mound. (Full size.)

pipes were in the possession of the aborigines long previous to the coming of the whites. We have personally found pipes in too many mounds in which no article of European make was present, to come to any other conclusion, and it is our belief that a contrary opinion is held by those only who have never engaged in field work.¹

With the exception of a hammer-stone with one burial and a large, flat pebble with another, no additional artifacts were found with the dead, though it is our belief that certain pockets of very dark sand near the center of the mound, near which objects were met with, were places where burials had been.

In sand blackened by organic matter, 5 feet from the surface, lay a hammer-stone with a small corroded disc of sheet copper or of brass, too badly carbonated for analysis.

Extending a certain distance in from the margin, along the base or just above it, in the E. and NE. parts of the mound, scattered here and there, and not closely associated, were many sherds and numerous vessels of earthenware. These vessels had the mortuary perforation of base almost without exception. In the great majority of cases the vessels were imperfect through breakage before interment and

¹ For the opinion of a veteran field worker see "Archæological History of Ohio," page 588, *et seq.*, by Gerard Fowke, Columbus, Ohio, 1902.

the few vessels found whole, with the exception of the mortuary perforation, of course, were, save one, undecorated and of inferior ware. This exception was a vessel bearing a complicated stamp decoration about 2 inches wide, below the margin (Fig. 168). A number of imperfect vessels and sherds also bore the complicated stamp. One of these is shown in Fig. 169.



FIG. 168.—Vessel of earthenware. Jackson mound. (Half size.)



FIG. 169.—Sherd. Jackson mound. (Half size.)

Three vessels, separate, were found more centrally located in the mound, though not immediately associated with burials, than was the general deposit of earthenware which came to an end before interments were met with. One is an undecorated vessel of about 1 pint capacity, of excellent ware, having the form of a gourd. Part of the handle is broken and missing. Another (Fig. 170), with semi-globular body with incised and punctate decoration, had two necks and two orifices, where similar necks, which have since been restored, had been. The base is imperforate. Maximum diameter of body, 6.3 inches; height, with neck, 6.6 inches.

The third vessel, an undecorated pot of about 1 pint capacity, has a certain amount of bitumen which, melted at one time, has hardened on the base. This glue-pot, of necessity, has no basal perforation. We know bitumen to have been in common use among the aborigines, and Cabeça de Vaca tells how he went to what is now the Alabama frontier and acquired in trade various articles, including cement, which was, doubtless, bitumen.

Also in the E. and NE. parts of the mound and comparatively near the margin, presumably deposited for the dead in general were: a soapstone pipe of the common rectangular block pattern and fourteen hatchets, or "celts", ranging in length

between 2.5 inches and 11.25 inches. Many of these are rudely made though some are carefully smoothed and taper gracefully to a blunt point opposite the cutting edge. Certain of these hatchets lay in pairs.

With the "celts" were two double bladed hatchets, probably of granitoid rock, much weathered, 6 inches and 4.8 inches in length, respectively, showing where a central fastening had held them to a handle.



FIG. 170.—Vessel of earthenware. Jackson mound. (Seven-ninths size.)

Also unassociated there came from the mound hammer-stones, whetstones and hones.

Together were: one pebble rudely chipped to resemble a small hatchet; two

rounded pebbles; two smooth pebbles; a spear-head with broken point; a pebble grooved at one end for a pendant; and a neat little pendant also grooved at one end.

One pebble-hammer, three pebbles, one chert arrowhead or knife lay closely associated, while eight pebbles and pebble-hammers were found together in another place.

A lance-head of chert, 5.2 inches in length, lay in the outer part of the mound among the hatchets.

Two graceful and keen-pointed arrow-or lance-points of chalcedony, lay together.

Also in the mound were: two arrowheads; one small lance-point; a bit of quartz crystal; a pendant of quartz crystal, with the part above the groove broken off; a mass of galena, 2.5 inches by 2 inches, rounded and flattened at the ends as though by use as a hammer.

A fact worthy of note in this mound is that, with the exception of one small pocket of calcined human bones found by us on the Alabama river, that in the Jackson mound is the westernmost example of cremation met with by us.

MOUND NEAR HUCKLEBERRY LANDING, FRANKLIN COUNTY.

Jackson river empties into the Apalachicola about 5 miles above the mouth of the river which enters the bay of that name near the town of Apalachicola.

Huckleberry landing is about 2 miles above the junction.

About 100 yards from the landing, on the south side of the river, in hammock land, on property of Mr. David Silva, resident nearby, was a mound which had undergone a certain amount of previous digging, though not sufficient greatly to impair the scientific value of our investigation.

About 100 yards northwest from the mound were a shell-field and numerous aboriginal shell deposits composed mainly of shells of a small clam (*Rangia cuneata*). One of these deposits, from 1 to 3 feet in height, nearly oval in shape, is 120 feet E. and W. and 180 feet N. and S., inside diameter. Other shell deposits lie to the eastward of the mound.

The mound, which was entirely dug through by us, was 5 feet 4 inches in height and had a basal diameter of 38 feet E. and W. and 52 feet N. and S. It was composed of sand with no regular stratification. In places, especially toward the base, were various deposits of a clayey sand exceedingly tough and forming almost a matrix. In this material often were shells of the kind present in the adjacent shell deposits, while other pockets and small layers of these shells were present in the looser sand also.

Burials, of which we found thirty-four, began near the margin on the eastern side and continued at intervals until the body of the mound was reached, where they became more numerous. In other parts of the mound burials were not met with beneath the slope. A few of the burials were near the surface. Some were 4.5 feet down while one was lower still. So often did the bones lie in the tough clayey material, of which we have spoken, that it seemed as though this clayey sand had been put in expressly with the burials. Those that did not were the superficial burials, with one exception, to be referred to later. Upon several occasions burials

of single skulls came from the mound like great balls of clay, the skulls being within the masses.

Eleven burials were of flexed skeletons, some turned to the right, others to the left. The flexion in this mound was much closer in character, as a rule, than was that noted by us in the Jackson mound, though several examples of loose flexion were met with. The heads of the skeletons pointed in all directions. Twelve burials consisted of lone skulls, while the remaining eleven interments were made up of skulls with a few bones; various bones without skulls; several aboriginal disturbances where parts of skeletons had been removed in making place for others; a mass of bones containing three skulls; one burial which fell in caved sand.

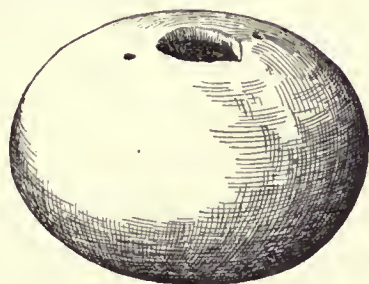


FIG. 171.—Vessel of earthenware. Mound near Huckleberry Landing. (Half size.)



FIG. 172.—Smoking pipe of earthenware. With Burial No. 22. Mound near Huckleberry Landing. (Full size.)

Beneath the center of the base of the mound was a burial included in our list, consisting of a skull, a tibia and a piece of bone belonging to the fore-arm. This burial lay in sand below the level of the clayey deposit and was, perhaps, the initial interment.

Burial No. 1, a flexed skeleton, had marks of serious inflammation, and Burial No. 2, also flexed, showed a similar condition of several bones. This person, the fragmentary condition of whose bones precluded identification as to sex, seemed to have been peculiarly unfortunate as a radius had an ununited fracture whose rough surface with a certain amount of surrounding callous, showed death to have intervened before the parts could unite. This radius was sent to the Army Medical Museum, Washington, D. C.

But few artifacts lay with the bones. With one was a pebble-hammer; with another a pebble.

Burial No. 8, consisting of a skull and two thigh bones, had somewhat above it a rude, undecorated vessel with perforate base. Extending from this vessel in a northerly direction for 2.5 feet was a deposit made of several considerable parts of coarse undecorated vessels of ordinary types and many sherds from various vessels, some undecorated, one with a small check stamp and a number with complicated stamps. On the northernmost sherd, a large one, lay a single skull.

With burial No. 21, one femur and two tibiae, was an undecorated spheroidal vessel of compact ware, 3.6 inches in diameter and 2.6 inches in height. The circular aperture is but .8 of an inch in diameter. On either side are small perforations for suspension. There is a basal perforation (Fig. 171).

With Burial No. 22, a partial flexion on the right side, was a smoking pipe of earthenware with bowl and portion for the stem, circular in shape and at right angles to each other. Each orifice is about 1 inch in diameter (Fig. 172). This burial was fairly well preserved and, being near the surface, may have been an intrusive one.

With Burial No. 23, bones disturbed by caving sand, was a pear-shaped "sinker" or pendant, wrought from a quartzose pebble, with the smaller end grooved for suspension.

Burial No. 26, a skeleton flexed on the left side, lay 4 feet 7 inches down, a few feet from the center of the mound. At either side of the head, was a disc of sheet copper about 2.7 inches in diameter having a central incused space with a small perforation in the middle, surrounded by a *repoussé* margin. Behind each disc, that is between the disc and the skull, was a disc of earthenware about 1.7 inches in diameter, having a small central perforation. On the outside of one of the copper discs there remains a knot formed from a cord or a sinew. It is evident, then, that these objects were ear-plugs, the copper being worn on the outside of the ear while the earthenware disc, fastened to the copper one, remained at the back of the lobe of the ear.¹ We are unable to say whether or not the two discs comprising each ear-plug were permanently fastened and the smaller disc buttoned through a hole in the lobe of the ear. Very likely this was the case since we know the custom among the aborigines to have a great opening in the lobe of the ear, obtained from Peru northward.

Burials Nos. 29 and 30 had each a turtle-shell in association. These shells, each about 7 inches across, if used for rattles, must have contained perishable material as no pebbles were met with inside.

Burial No. 31 had near it an undecorated vessel of poor material and ordinary type, having the usual basal perforation.

In this mound were no deposits distinctly marginal, as objects put in for the dead in general were found in all parts of the mound and at all depths.

¹ We found two earthenware discs of this kind and fragments of sheet copper, in a low mound near Helena, Lake Co., Fla., and described them in our "Certain Sand Mounds of the Ocklawaha River, Florida," Journ. Acad. Nat. Sci., Phila., Vol. X, but did not know their use at that time.

Many sherds found singly and probably of accidental introduction were present, as were numbers of others in close association, probably substitutional offerings. Some were undecorated, two or three bore the small check stamp, while many had the complicated stamp decoration. Three of these are shown in Figs. 173, 174, 175. Incised decoration was practically unrepresented.



FIG. 173.—Sherd. Mound near Huckleberry Landing. (Half size.)

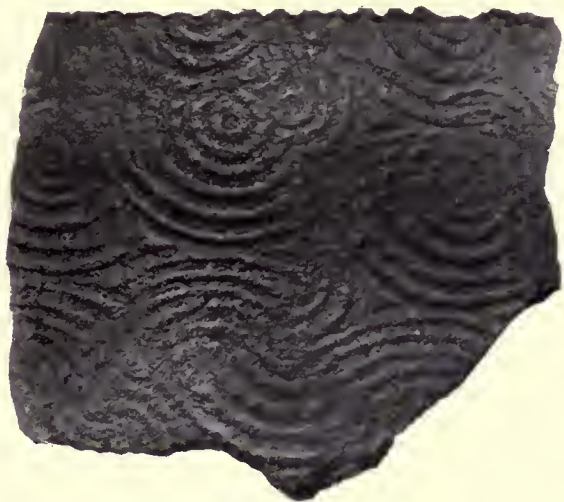


FIG. 174.—Sherd. Mound near Huckleberry Landing. (Half size.)

Seven vessels lay unassociated with burials. Five are undecorated; one, somewhat imperfect, has a complicated stamp and is of material superior to the rest. Five have basal perforations. Five are of ordinary type as to form.

Vessel No. 6, shown in Fig. 176, is undecorated, imperforate, circular in transverse outline.



FIG. 175.—Sherd. Mound near Huckleberry Landing. (Half size.)

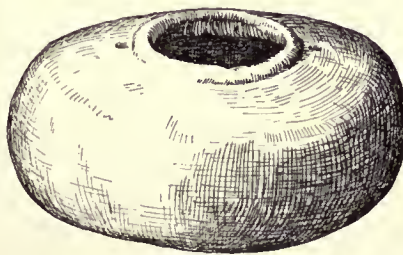


FIG. 176.—Vessel No. 6. Mound near Huckleberry Landing. (Half size.)



FIG. 177.—Knife of chert. Mound near Huckleberry Landing. (Full size.)

Vessel No. 7, an urn with slightly scalloped margin of which parts are missing, has a complicated stamp decoration. The base is perforated.

Vessel No. 10, a small pot, undecorated, has four feet.

Rudimentary feet are on the bottom of part of a small vessel found unassociated in the sand and two feet are on half a vessel broken longitudinally.

A smoking pipe of earthenware of the "Monitor" type lay unassociated. Part of the mouth-piece which presumably was as long as the projection on the opposite side of the bowl, is missing through an early fracture. Present length, 4.25 inches; height, 2 inches; diameter of bowl, .7 of an inch.

Throughout the mound were numbers of pebble-hammers, hammer-stones, pebbles and several broken hones. In one instance twenty pebbles and pebble-hammers lay together. There were present also many small masses of chert, possibly "wasters."

Four hatchets, or "celts" lay unassociated.

A sheet of mica lay just below the surface.

With seven pebbles and pebble-hammers was a large flake of chert, probably used as a knife.

Loose in the sand, was a knife of chert, perhaps formerly an arrowhead from which a considerable part had broken longitudinally, involving the margin of the shank. The broken side has been carefully chipped to remove the thick surface left by the fracture (Fig. 177).

MOUND NEAR PORTER'S BAR, FRANKLIN COUNTY.

This mound, in thick scrub, is on property of Mr. T. J. Branch, living on the place, situated one mile west of Green Point and a short distance from Porter's Bar.

The mound, which had sustained but little previous digging, had deep depressions in places around it whence the sand used in its building came. Its outline was somewhat irregular, it being much steeper toward the east where it bordered a brook than on the west where it sloped to the level of the surrounding country. Its basal diameters were 60 feet and 78 feet; its height was between 10 feet and 11 feet. It was totally dug down by us.

The mound was composed of irregular strata and masses of sand, sometimes white, sometimes yellow, and in places blackened with organic matter. This black sand was particularly noticeable in the eastern part of the mound from the margin in as long as the principal deposit of pottery was met with.

Beginning at that part of the margin of the mound included between W. and NW. and extending shortly after to SW. was a layer of oyster shells, of irregular thickness, on the base of the mound. This layer, from 1 foot to 2.5 feet in thickness, covering about one-quarter of the area of the mound, was purposely made and not a shell-heap antedating the building of the mound. There were also two or three local pockets of shell, each about 3 feet square and having the same thickness as the principal layer.

Human remains lay in all parts of the mound, which was contrary to our usual

experience and, as a rule, were on or near the base, though some were higher in the mound. A certain number lay below the shell layer, while others were just above it. Scattered bones lay here and there among the shells. Superficial burials, after the mound had reached a considerable height, were not present.

There were noted by us in the mound sixty-eight burials, including the closely flexed, the loosely flexed, the bunch, the lone skull, scattered bones, one burial in a

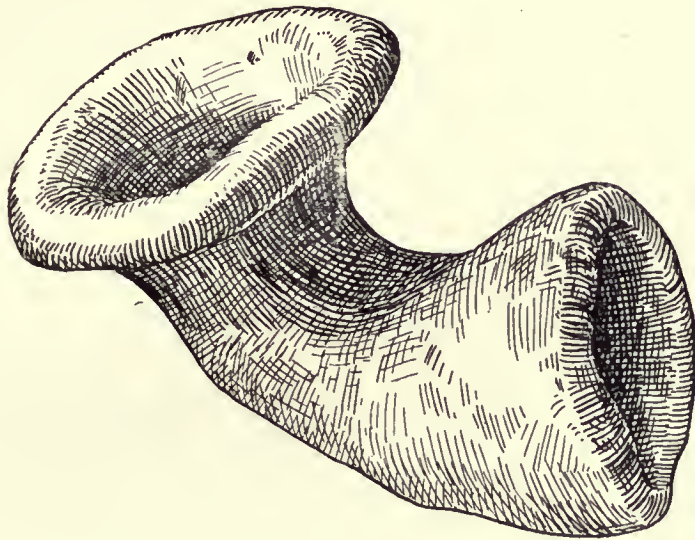


FIG. 178.—Smoking pipe with Burial No. 60. Mound near Porter's Bar. (Full size.)

squatting position and one pocket of calcined fragments of human bones, which resembled the deposits of cremated bones in Georgia where many fragments, all calcined, lie together. Cabeça de Vaca tells¹ us "it is their custom to bury the dead unless it be those among them who have been physicians, and those they burn."

Though the state of the burials was such through decay and pressure of sand that no skulls were preserved, yet a number, though fragmentary, permitted examination as to cranial compression. In but one case was compression noted and then to a moderate degree only.

Burial No. 23 consisted of badly decayed bones in a shallow grave below the base. With them was a rude lancehead.

Burial No. 27, a skull and some badly decayed bones had sand colored with hematite in association, as did a number of other burials in the mound.

Burial No. 49 had teeth alone remaining. With these were a small earthenware vessel and a smoothing stone.

Burial No. 50, a lone skull, had with it a hammer-stone, a small stone pendant, a bit of sandstone, a pebble-hammer and three cutting implements made from columellæ of large marine univalves.

Burial No. 54, a lone skull, had in association a small earthenware vessel (No.

¹ The Narrative of Alvar Nuñez Cabeça de Vaca, translated by Buckingham Smith. Washington, 1851, pg. 49.

87) intact as to the base, which was the case with several pots and bowls, all diminutive, found directly with burials in this mound.

Burial No. 59 was a skeleton in a squatting position on the base. With it were: a pendant of shell; an arrowhead or knife, of jasper; a small undecorated clay smoking pipe; clam shells; six pendants,¹ one bottle-shaped and grooved, made from a quartz pebble, five of ordinary types, one of these of red indurated shale and four of igneous rock.

Burial No. 60, a flexed skeleton, had with it an undecorated smoking pipe of clay with comparatively small bowl and flaring rim (Fig. 178).

Burial No. 63, bones disturbed by caving sand, had nearby five implements, some for cutting, some for piercing, made from columellæ of large marine univalves; three shell gouges, one without a cutting edge; a bit of sandstone and a pebble-hammer.

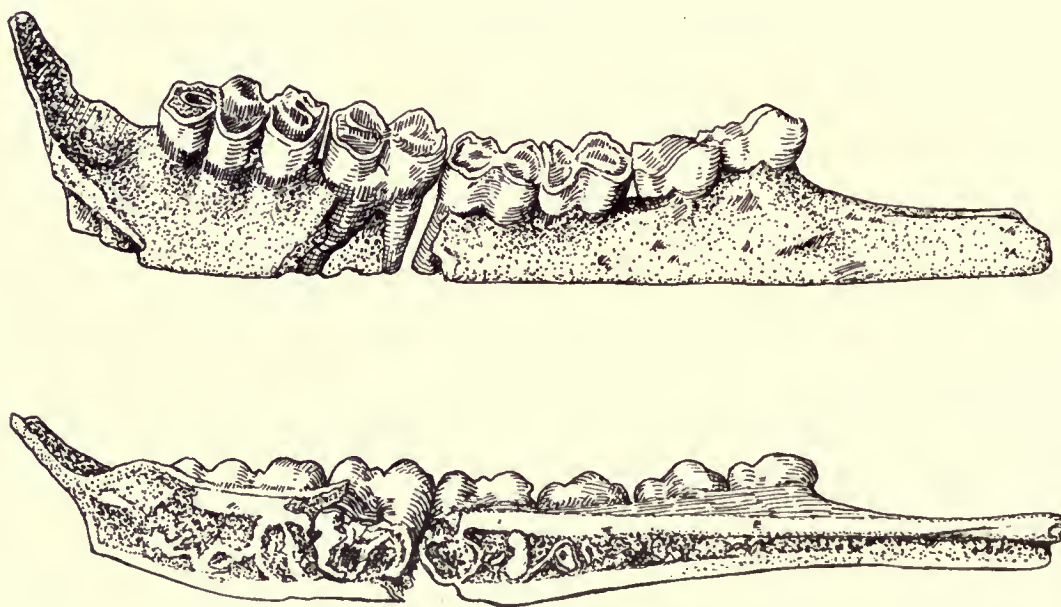


FIG. 179.—Part of deer jaw cut off at base. Two positions. Mound near Porter's Bar. (Full size.)

Burial No. 64, a partly flexed skeleton, lay on the base of the mound. With it were: a small chisel, probably of volcanic rock, somewhat broken; a triangular hammer-stone, rudely grooved for a handle; and four shell gouges.

With other burials were: two "celts;" the small vessels of which we have spoken; and a number of hammer-stones, smoothing-stones and shell drinking cups.

Apart from burials were: three "celts;" a flake of chert, probably a knife; several arrow and lanceheads, some of chert, some of quartzite; mica; shell drinking cups; a lump of galena, of considerable size, apparently having seen service as a hammer; a pendant, probably of igneous rock; a number of shell implements badly

¹ As to the uses made of plummetts, see "Archæological History of Ohio." Fowke, pg. 556, *et seq.*

decayed as a rule; bitumen, in one instance; plumbago; and the quota of hones, hammer-stones, smoothing-stones, pebble-hammers, usually present in mounds.

With a number of artifacts fallen in caved sand and probably at one time associated with a burial, were three jaws of small rodents, also two parts of a lower jaw of a deer, with the base cut away to leave a flat surface (Fig. 179).

We three times found jaws of large carnivores treated this way, in mounds of the Georgia coast and suggested in our report¹ that they had been thus treated to facilitate insertion into wooden masks.

Mr. Cushing at Marco found "certain split bear and wolf jaws neatly cut off"² so as to leave the canines and two bicuspids standing. On the jaws were traces of cement. Mr. Cushing believed these jaws to have been let into war-clubs, which may well have been the case with teeth of large carnivores, but hardly so where jaws of deer were used.

Mr. Moorehead found in Ohio mounds human jaws treated in the way we have described, some with perforations in addition, and regards them as ornaments.³

From all this, the reader has doubtless come to the conclusion, and rightly, that the use made of these curiously treated jaws is still an open question.

A feature often noticed in the mounds, namely the tendency to place with the dead objects no longer of use to the living, was illustrated in this mound by the finding with a burial, of eight arrow- and lance-points, five of chert, three of quartzite. Of these, five wanted either a shank or a barb; of the remaining three, two were in the rough.

In caved sand was part of an ornament of sheet copper.

Broken into several parts by palmetto roots which had penetrated it, was a curious object of impure kaolin,⁴ almost cylindrical, with a certain rounded enlargement at either end. This object, which is 11 inches long and has a middle diameter of 2.5 inches and of 3 inches at either end, had been carefully smoothed at one time and still, in places, shows traces of decoration in low relief. A similar object, found in a much better state of preservation, will be figured and described in our account of Mound B, Warrior river.

Including with whole vessels those which were broken but had full complement of parts, and others from which but small parts were missing, ninety vessels came from this mound. The ware was most inferior, as a rule; the decoration poor in design and rudely executed. Undecorated vessels predominated and, as a rule, when decoration had been attempted, it consisted of the complicated stamp, usually rudely and irregularly applied. The use of this form of decoration, even when carefully executed, is always unfortunate in a mound, since it is likely to take the place of incised design which calls for greater originality. Furthermore, many of the vessels with complicated stamp were not covered as to the entire body, but had only a

¹ "Certain Aboriginal Mounds of the Georgia Coast," pp. 65, 88, 112. Journ. Acad. Nat. Sci. Phila. Vol. XI.

² Proc. Am. Philosoph. Soc. Vol. XXXV, No. 153, pg. 45. Phila., 1897.

³ "Primitive Man in Ohio," pg. 226, *et seq.*

⁴ Kaolin is found in Florida.

comparatively narrow band of the decoration on or below the neck. This form sufficiently ornamental when carefully done, is much less so when the stamp is irregularly and faintly applied.



FIG. 180.—Vessel No. 9. Mound near Porter's Bar. (Full size.)

Although a number of sherds and several vessels were found in the southwestern margin of the mound at the very start, yet the great majority of the vessels lay in the eastern portion and were included within the first fifteen feet of the slope. With these were the usual sherds. Farther in, in the same direction, were certain other vessels extending along the base like the rest, but with these were no piles of

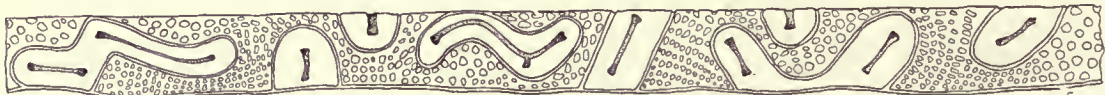


FIG. 182.—Vessel No. 9. Decoration. Mound near Porter's Bar. (Half size.)

sherds such as marked the deposit of ware in the outer portion of the mound. There was no central deposit.

We shall now describe the most noteworthy of the vessels. Unless otherwise stated, the usual basal perforation is present, all without it being included in our list.

Vessel No. 4.—Has a decoration of vertical parallel lines, rudely executed.

Vessel No. 9.—A bowl of excellent ware, of about 1 quart capacity, colored crimson inside and out (Fig. 180), with incised and punctate decoration in which appears the symbol of the bird, shown in diagram (Fig. 181).

Vessel No. 10.—A toy vessel with globular body and flaring quadrilateral neck.

Vessel No. 11.—Is of eccentric shape as shown in Fig. 182. Unfortunately, a part of the neck is missing from an early fracture.



FIG. 182.—Vessel No. 11. Mound near Porter's Bar. (Half size.)

Vessel No. 15.—An undecorated imperforate cup.

Vessel No. 18.—Has a hemispherical body and slightly flaring neck (Fig. 183), around which is an incised and punctate decoration shown in (Fig. 184) in which the punctate markings have been accidentally omitted from the rectangular space in the right upper portion.

Vessel No. 21.—A curious wedge-shaped vessel, a form new to our mound work. The decoration, incised, is practically the same on either side (Figs. 185, 186). Height, 8.5 inches; maximum diameter, 4.8 inches.

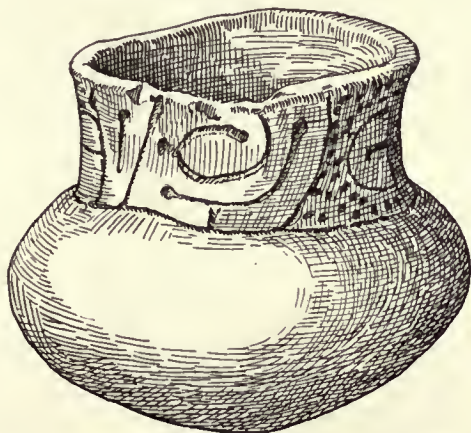


FIG. 183.—Vessel No. 18. Mound near Porter's Bar. (Two-thirds size.)

Vessel No. 29.—A little bowl of inferior ware, having below the rim a band about 1.5 inches in breadth, made up of series of rudely incised perpendicular lines, of diagonal lines and of horizontal lines.

Vessel No. 30.—This vessel, undecorated save for a single encircling incised line a short distance below the rim, consists of an upper part somewhat elliptical in horizontal section, placed upon a flattened sphere (Fig. 187).

Vessel No. 33.—This handsome trilateral vessel (Fig. 188), unfortunately found broken into many pieces, probably represents some quadruped in incised and punctate

tate decoration as conventionalized fore-legs and hind-legs are clearly shown (Fig. 189). An animal head is probably missing from the rim in front.

Vessel No. 35.—A bowl of about one-half pint capacity, with incised decoration on one part only, shown diagrammatically in Fig. 190.

Vessel No. 36.—Portions of a compartment vessel, scattered throughout the mound. Parts are missing.



FIG. 184.—Vessel No. 18. Decoration. Mound near Porter's Bar. (Half size.)

Vessel No. 60.—An imperforate pot.

Vessel No. 61.—A water-bottle with a most interesting incised design representing some highly conventionalized form. In addition to the "killing" in the base, a small hole has been knocked in the side of the vessel, involving the decoration to a very limited extent. Diagram (Fig. 191) shows the design with slight restoration.



FIG. 185.—Vessel No. 21. Mound near Porter's Bar. (Half size.)



FIG. 186.—Vessel No. 21. Another view. Mound near Porter's Bar. (Half size.)



FIG. 187.—Vessel No. 30. Mound near Porter's Bar. (Half size.)



FIG. 188.—Vessel No. 33. Mound near Porter's Bar. (Eight-ninths size.)

Vessel No. 63.—The piece knocked from the bottom of this pot was found lying within it, as was the case with another vessel in this mound.

Vessel No. 66.—A bowl of about 1 pint capacity, of red ware, with a handle in the form of a rather rude owl-head looking inward, which, with the exception of crimson paint, inside and out, is the only decoration.

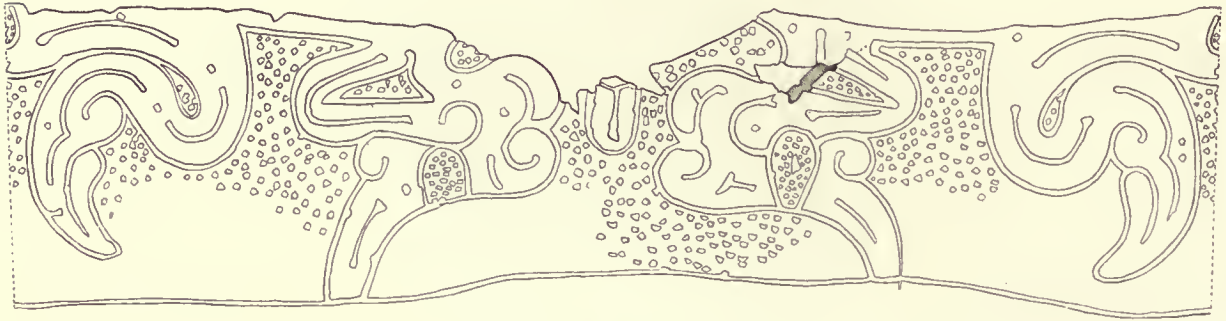


FIG. 189.—Vessel No. 33. Decoration. Mound near Porter's Bar. (One-third size.)

Vessel No. 69.—An imperforate pot with a rough complicated stamp around the neck.

Vessel No. 71.—A graceful undecorated vessel, ovoid in shape, with holes below the rim, for suspension (Fig. 192).

Vessel No. 74.—A shallow bowl 5 inches in diameter, to which a part, missing when found, has been added. There has been incised and punctate decoration over the base, part of which is wanting. A conventionalized animal paw, however, still



FIG. 190.—Vessel No. 35. Decoration. Mound near Porter's Bar. (Half size.)



FIG. 191.—Vessel No. 61. Decoration. Mound near Porter's Bar. (Half size.)



FIG. 192.—Vessel No. 71. Mound near Porter's Bar. (Half size.)

remains. The head of an aboriginal dog is represented as looking inward from the rim (Fig. 193). Cabeça de Vaca and the chroniclers of De Soto refer to aboriginal dogs in Florida. Skeletons from the mounds show these dogs to have resembled collies, with somewhat broader jaws.

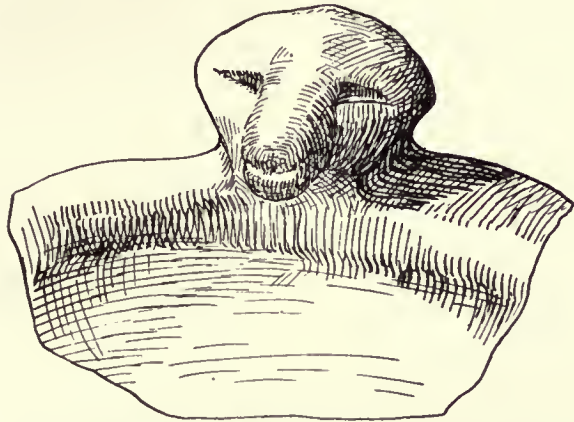


FIG. 193.—Vessel No. 74. Mound near Porter's Bar. (Full size.)

With this vessel was the astragalus of a deer. Such knuckle-bones were used in games.¹

Vessel No. 75.—A life-form from which the head and part of the tail unfortunately are missing, is shown in Fig. 194. The decoration, similar on either side, represents fur and conventionalized fore-legs and hind-legs. Judging from the flat tail, possibly the representation of a beaver is intended.

Vessel No. 78.—A little bowl, lenticular in shape, of less than one pint capacity, imperforate, lay with a burial. The decoration consists of



FIG. 194.—Vessel No. 75. Mound near Porter's Bar. (Half size.)

Vessel No. 82.—A vessel, somewhat globular in shape, of about 1 gallon capacity, having a complicated stamp decoration around the upper part (Fig. 196).

Vessel No. 87.—Imperforate, of red ware, of somewhat less than one-half pint

¹ For details, see "Chess and Playing Cards," by Stewart Culin, pg. 826, *et seq.* Report U. S. National Museum for 1896.

capacity. From the center of the base a small knob protrudes. There are holes for suspension (Fig. 197).

Vessel No. 88.—A small vessel intact as to the base, with perforations for suspension (Fig. 198).

Vessel No. 89.—A vessel of about 1 pint capacity, elliptical in longitudinal section, the major sides incurving toward the margin. There are holes on the same side for purpose of attachment. The only attempt at decoration is on the side shown in Fig. 199. The part to the left is very suggestive of an effort to portray a quadruped whose fore-legs are in line and also the hind-legs. The head and tail are shown. The figure to the right may represent a bird.



FIG. 195.—Vessel No. 78. Decoration. Mound near Porter's Bar. (Half size.)



FIG. 196.—Vessel No. 82. Mound near Porter's Bar. (Two-fifths size.)



FIG. 197.—Vessel No. 87. Mound near Porter's Bar. (Full size.)

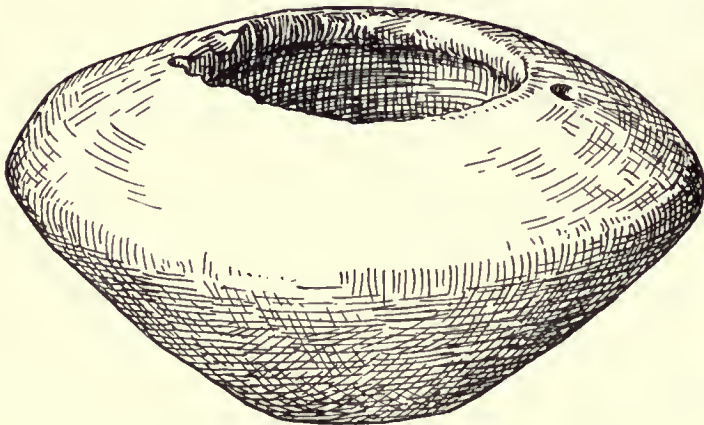


FIG. 198.—Vessel No. 88. Mound near Porter's Bar. (Full size.)



FIG. 199.—Vessel No. 89. Mound near Porter's Bar. (Half size.)

Vessel No. 90.—A compartment vessel consisting of a long division with a smaller one on either side. A part broken from one end has been filled in (Fig. 200).



FIG. 200.—Vessel No. 90. Mound near Porter's Bar. (Three-fourths size.)

Certain pieces of an effigy-bottle representing the human form, with the head unfortunately absent, were recovered from the mound. The arms and the hands are in relief. Each finger is distinctly shown.

The check stamp was present in the mound but once and, as it lay among the shell, it was probably introduced with it.

Figs. 201, 202, 203, show three sherds with complicated stamp from this mound.

MOUND NEAR GREEN POINT, FRANKLIN COUNTY.

This mound, also on property of Mr. T. J. Branch, was in a field formerly cultivated, a short distance in a SW. direction from the mound just described. There was no sign of previous digging, but members of the family informed us that during cultivation certain relics had been laid bare by the plough. The height of the mound was 2 feet, though on the western side it was necessary to go down 5 feet to reach undisturbed sand. The basal diameter was 62 feet. The mound was completely dug through.

It was composed of sand, light in color as a rule, but blackened with organic

matter in certain places. There were many small deposits of oyster-shells here and there throughout the mound, and scattered shells lay in the sand. In two or three cases oyster-shells lay with burials, but as there were so many cases where they did



FIG. 201.—Sherd. Mound near Porter's Bar. (Half size.)



FIG. 202.—Sherd. Mound near Porters Bar. (Three-fourths size.)



FIG. 203.—Sherd. Mound near Porter's Bar. (Three-fourths size.)

not and as local deposits of shell were so numerous, it is entirely possible that the proximity of the shells to the burials was accidental. Burials were in all parts of the mound but were especially numerous in the central portions.

There were in all eighty burials, as a rule closely flexed skeletons, though loosely flexed skeletons, lone skulls, bunches of bones and scattered bones were met with. No flattening was noticed in the case of any skull whose condition was such as to allow determination.

With burials in different parts of the mound were single vessels of earthenware; also a deposit of thirteen beneath a skeleton in the western part of the mound and a deposit of three vessels, near human remains, a little east of the center.

There were also in the mound, hones, hammer-stones, smoothing-stones, pebble-hammers and kindred objects which it is hardly necessary to describe in detail.

With one burial, among other things, were two rounded ends of "celts" which had no doubt been put in substitutionally, a part for the whole, a most economical method and one widely practised by the aborigines, as we have seen.

There were present also a number of lanceheads and projectile points, all but one or two of which were more or less broken or unfinished. Three "celts" lay with burials. Two of these had the cutting edge so badly chipped that prolonged grinding would have been necessary before use.

Forty-four water-worn pebbles, slingstones no doubt, lay together, and a number of burials had with them shell drinking cups mostly having the basal perforation. Some of these cups were carefully wrought, the whole beak of the shell being ground away, giving the shell a graceful and cup-like appearance.

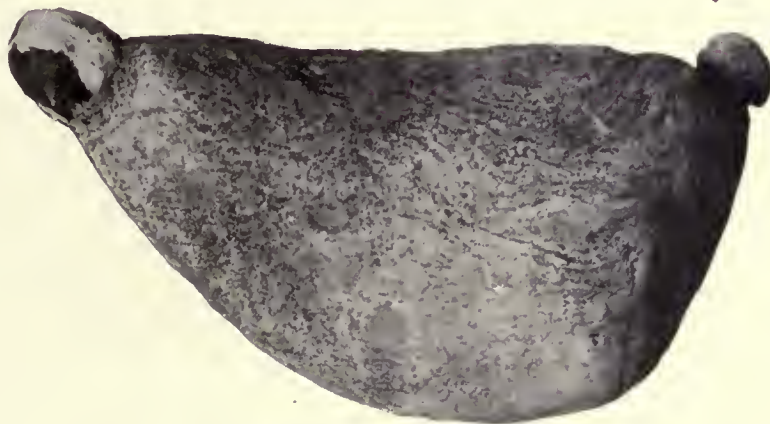


FIG. 204.—Pendant of shell. Mound near Green Point. (Full size.)

Between two burials were: a number of decayed mussel-shells; bits of sandstone; unfinished shell gonges; a rude cutting implement of chert; a bone of a small mammal; fragments of shell; two rectangular pieces of fossilized wood; a number of collumellæ of large marine univalves; sections of columellæ carefully rounded as though for large beads in block; sandstone hones; fragments of various rocks, mostly chert; a small triangular piece of sandstone sharpened as for piercing; a barbed arrowpoint; a small marine shell; an object resembling in shape the tine of a stag horn, a recent formation containing small marine shells; two discs of shell, each about 3.5 inches in diameter, evidently the first stage in the making of gorgets;

two shell discs much smaller; a diamond-shaped section of the body whorl of a large univalve; a pendant made from a marine columella, 5.5 inches in length; a small gouge of shell; a heavy ornament of shell with two ends grooved for suspension (Fig. 204), 4 inches long and 2 inches thick. With these objects were many bits of stone and of shell of no particular interest.

Another mortuary deposit consisted of: bits of shell; a large columella worked to a point; another, unworked; one carefully ground to a cutting edge, which, however, is badly chipped; a bit of volcanic rock, a part of an implement; a chipped pebble; three bits of sandstone; a small mass of hardened clay, seemingly; a small part of a "celt"; three sections of a columella, probably beads in block; a rectangular piece of rock, 7 inches long; parts of two under-jaws of small rodents; a pendant of shell of ordinary demijohn form; a pendant of clam-shell, roughly triangular in shape, grooved at one end for suspension; five triangular gouges with rounded lower corners made from the body whorl of *Fulgur*; forty-three similar implements with undressed sides and unground edges, the first step in the making of a gouge, the nature of this latter deposit showing the aboriginal mind to be fully alive to the fact that the departed would have ample leisure in the life to come.



FIG. 205.—Sherd. Mound near Green Point.
(Half size.)



FIG. 206.—Sherd. Mound near Green Point.
(Three-fourths size.)

Contrary to our usual experience, a general deposit of vessels was found on the western side of this mound and another large deposit farther in on the same side, while no other vessels were met with, except immediately with the dead, and these were well in toward the center.

The earthenware of this mound, on an average, was distinctly inferior to any we had met with so far on the coast. The vessels, when decorated, bore, as a rule, the complicated stamp, often faintly and irregularly impressed. In Figs. 205, 206,



FIG. 207.—Sherd. Mound near Green Point. (Half size.)

207, 208, are shown four fragments of vessels more clearly stamped than the average and with designs new to us.

Ineised decoration was met with but three times, on two sherds and on a vessel.

A feature of the mound was the presence of four feet on a considerable percentage of the vessels and scalloped margins on a large number. Curiously enough, neither of these characteristics was especially noted in the neighboring mound. In all, about forty vessels were met with, nearly all of which were in pieces or fell apart upon removal. Of the deposit of thirteen vessels of which we have spoken, but one was taken out entire. It was apparent that the commonest kitchen ware had been placed with the dead.

We give in detail a description of the more interesting among the vessels. All are perforated as to the base unless otherwise described.

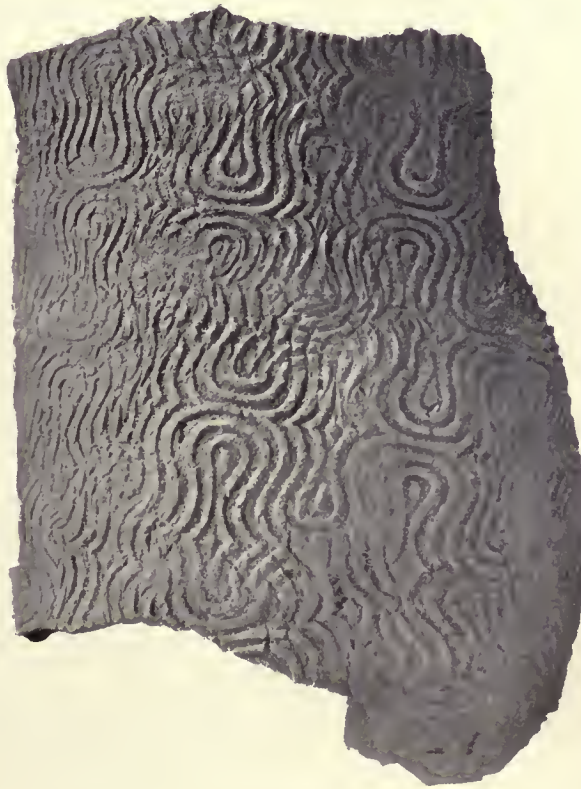


FIG. 208.—Sherd. Mound near Green Point. (Half size.)



FIG. 209.—Vessel No. 9. Mound near Green Point. (Nine-elevenths size.)

Vessel No. 1.—A globular bowl with faint complicated stamp and notches on the rim, small and near together, presenting almost a serrated appearance.

Vessel No. 2.—A pot with scalloped rim, having four rudimentary feet. The basal perforation is made carefully to one side of the feet, a practice to which the aborigines were not given, as a rule, in this mound, as a number of bases with feet upon them, which had been knocked from vessels, were found scattered through the mound.

Vessel No. 3.—Undecorated, of eccentric form. The lowest part is almost cylindrical but expands somewhat from the base which is flat. The upper part has been hemispherical, probably. A part of it is missing.

Vessel No. 4.—An oval jar of about 3 gallons capacity, with scalloped rim and zigzag complicated stamp.

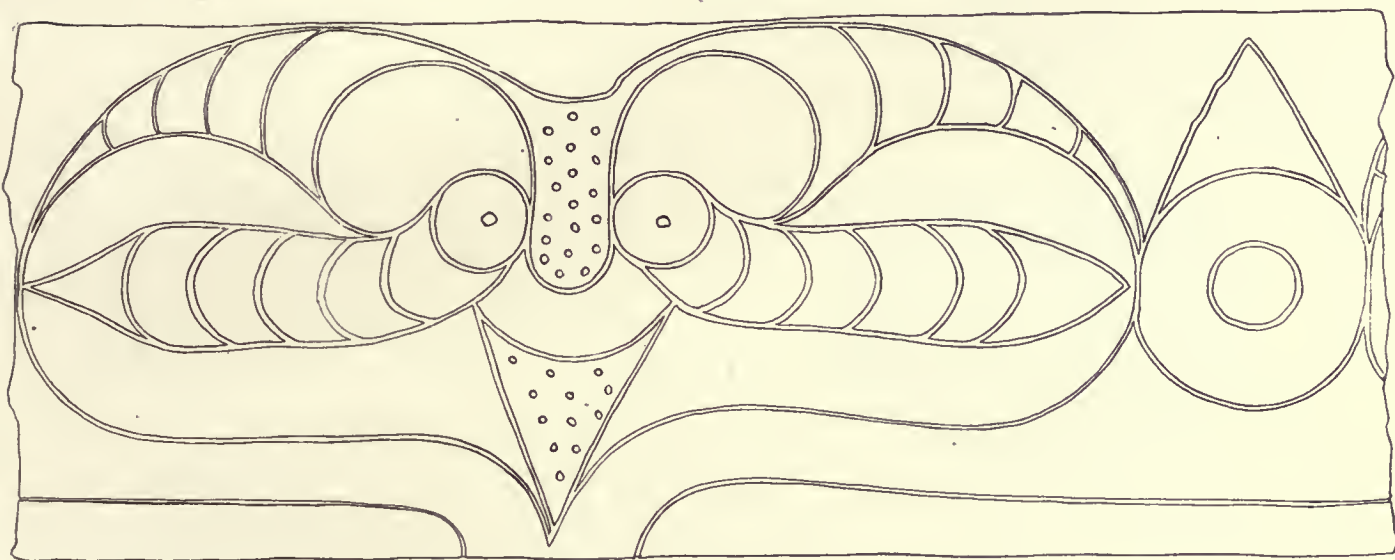


FIG. 210.—Vessel No. 9. Decoration. Mound near Green Point. (Half size.)

Vessel No. 5.—A pot of about 5 gallons capacity, with scalloped rim and complicated stamp decoration. It fell into bits upon removal. With it was a knucklebone of a deer. A similar bone lay with another vessel in this mound.

Vessel No. 6.—A large vessel found in pieces. The decoration was seemingly the impression of basket-work.

Vessel No. 7.—Small, imperforate, undecorated, with flaring rim and four rudimentary feet.

Vessel No. 9.—This vessel (Fig. 209), consists of an undecorated cylinder supporting a much flattened sphere, from which is a flaring neck with scalloped margin. The decoration, which is incised and painted, consists of two similar designs, one of which is shown in diagram (Fig. 210). Height, 8.8 inches; maximum diameter of body, 8.7 inches.

Vessel No. 10.—A vase of inferior ware, of about 1 quart capacity, with ovoid body, flaring neck and scalloped rim, undecorated (Fig. 211).

Vessel No. 12.—A frail vessel of about 1 pint capacity, elliptical in horizontal section, with rim slightly flaring, having on one side an impression resembling the foot of a bird. On the opposite side the circular portion of the foot is given without the claws (Fig. 212).



FIG. 211.—Vessel No. 10. Mound near Green Point. (One-third size.)



FIG. 212.—Vessel No. 12. Mound near Green Point. (Half size.)

General Gates P. Thruston suggests that this hole in pipes was made to facilitate the cleaning of the bowl and that the hole was plugged during smoking. This seems a probable solution of the question. We are unable to say whether this pipe is stone or earthenware thoroughly baked, and experts, consulted on the subject, have not been able to decide without mutilating the specimen.

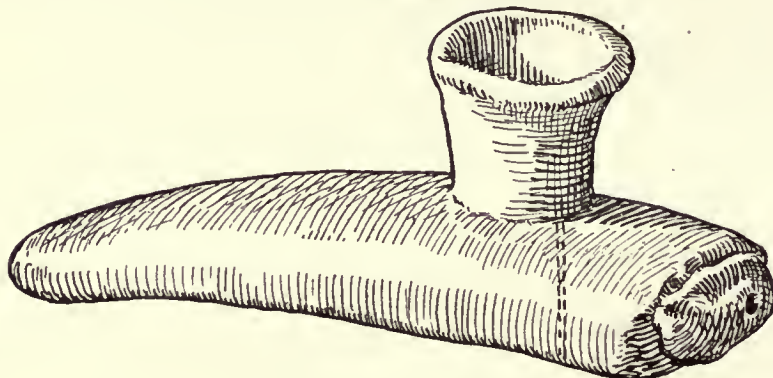


FIG. 213.—Smoking pipe. Mound near Green Point. (Full size.)

Part of an earthenware smoking pipe lay unassociated in the sand.

From caved sand came part of a smoking pipe of the "platform," or "Monitor," type. A part of one end has been broken off and the endeavor to cut off the rough projecting portion to leave an even surface to join the two parts has been begun but not completed.

In addition to the customary perforation extending through one end of the platform to the bowl, there is another running from the base of the bowl to the base of the platform below (Fig. 213). We wrote to Mr. Warren K. Moorehead as to this curious feature, who most obligingly addressed twelve prominent collectors of this country and forwarded the replies to us.

Smoking pipes with holes accidentally made by the slipping of drills are well known, as are some instances of this carefully made basal perforation. Mr. H. P. Hamilton, of Two Rivers, Wis., kindly forwarded for our inspection two smoking pipes, one showing the accidental perforation, the other the intentional one in the base.

MOUND NEAR CARRABELLE, FRANKLIN COUNTY.

Within sight of the water, on the right hand side going down the Carrabelle river, about 1.5 miles by land in NW. direction from Carrabelle, is a mound 45 feet across and about 1.5 feet high, which had been much dug into before our visit. On the surface were small fragments of human bones. Considerable trenching yielded nothing of interest.

TUCKER MOUND, FRANKLIN COUNTY.

In sight of the water, which was about 200 yards distant, about one mile from the lower end of Alligator Harbor, on the north side, on property, the ownership of which is uncertain, was a mound about 80 feet in diameter N. and S. and 86 feet E. and W. The slope on the eastern side was much more gentle than elsewhere, forming a graded way. The height of the mound from the general level on the west side was 8.5 feet. A measurement taken near the center, from the surface to the base, showed 9.5 feet.

At various points around the mound were excavations whence the sand came for the building. The mound was entirely demolished by us.

The discovery of burials began at the very margin and continued in, being strictly confined to the eastern and southern sides included between the compass points NE. and SW. In the other parts of the mound were neither burials nor artifacts, with the exception of one undecorated vessel partly broken, probably an accidental introduction. Here we have a striking example of the great quantity of sand piled in certain mounds simply to round out a part used for interments.

Burials, which were mainly in the eastern part of the mound, decreased in number as the digging continued and disappeared entirely 9 feet from the center. Especial care was taken by us as to method and position of interments, since this mound, which was of considerable size, was almost intact at our coming, having in it but two or three holes and these were less than one yard in each of their three dimensions.

Seventy-nine burials were noted by us, including the flexed; the bunched, which sometimes had several skulls; the lone skull; and scattering bones.

Many skulls were past determination as to flattening. The majority of those whose condition permitted a decision distinctly showed flattening but certain others just as distinctly did not.

Burial No. 2, consisting of two decayed fragments of bone, had with it two barrel-shaped beads of galena (lead sulphide) each about .9 of an inch in length and .85 of an inch in maximum diameter. Though cubes of galena are often present in mounds as are masses of the material showing use as hammers, we have but once before, to our recollection, met with an ornament of galena, namely, a bead in the great mound at Mt. Royal, Putnam Co., Fla. With the two beads was a "celt." Incidentally, we may say seven of these implements came from the Tucker mound, all directly with burials except two in whose neighborhood, possibly, bones had disappeared through decay. All these "celts" but one were in marginal parts of the

mound, though on or near the base with the original burials, the one exception being under the slope and no wise near the center.

Burial No. 6.—Fragments of bones with which were many conch-shells, not drinking cups, simply the shells (*Fulgur perversum*).

Burial No. 22.—Three skulls with a bit of tibia. With these were a number of large clam-shells and parts of clam-shells showing wear, which probably had been used as tools for cutting and scraping.

With a number of burials in this mound were similar implements of clam-shell.

Burial No. 26.—A closely flexed skeleton lying at the bottom of a grave at the base of the mound which at this point was 5 feet in height. Above the skeleton, which was one of those having a "celt" in association, were 2.5 feet of yellow sand totally differing in color from the gray sand of that part of the mound where the grave was. It would seem as though this grave had been made and filled with sand of another color in a part of the mound but 2.5 feet in height when the grave was made and that later, an additional 2.5 feet had been added to the mound.

Burial No. 28.—A lone skull with charcoal nearby.

Burial No. 30.—A lone skull with a few small shell beads.

Burial No. 33.—A flexed skeleton with two perforated shell drinking cups. A number of such cups were found in the mound but as a rule lying with deposits of earthenware, unassociated with burials.

Burial No. 36.—A lone skull had shell beads and a rude implement of chert.

Burial No. 48.—A flexed skeleton had oyster-shells above it as did Burial No. 57, a flexed skeleton in a shallow grave. These two burials were exceptional in this respect in this mound.

Unassociated with bones were: two small masses of galena; a stone chisel, somewhat broken; mica.

In caved sand was a small fragment of thin sheet copper bearing small *repoussé* designs.

Although there was no marginal deposit of earthenware vessels in the mound, yet the aboriginal custom to place pottery for the dead in general in the eastern portion of mounds, obtained also in this one. Though a number of sherds were found at the start, no vessel was met with until the digging had reached a point 26 feet ESE. from the center where lay together a number of interesting vessels. The deposit of ware continued in between NE. by N. and SE. by S., sometimes single vessels, sometimes a number together. There was no deposit at the center, the last vessel found being 8 feet from it, and but few were met with for some feet farther back.

The vessels, sixty-two in all, whole, nearly so or in a condition to permit reconstruction, all show the basal perforation. As a rule, the ware was inferior and decoration, when present, was usually the complicated stamp, often carelessly applied.

The feature of the mound in respect to earthenware was the presence of many flat bases, even on pots and bowls, where the bases are usually rounded. As usual, numbers of fragments of parts of vessels and whole vessels, crushed together in inextricable masses, lay with whole vessels or with those broken but keeping their form until removed.

We give a detailed description of the most interesting ware.

Vessel No. 1.—This boat-shaped vessel, of about 1 quart capacity, parts of which were found some distance from each other, has since been cemented together, with a certain amount of restoration. At either end is the head of a duck in relief (Fig. 214).

Vessel No. 2.—This interesting bird-effigy, entire, save for a small basal perforation, has incised decoration on the wings and back, the well-known bird symbol. The aperture is at the base of the neck (Fig. 215). Height, 8 inches; breadth, 5.5 inches.



FIG. 214.—Vessel No. 1. Tucker mound. (Seven-eighths size.)

Vessel No. 3.—Is of about 1 quart capacity and is without decoration save for the protruding head, probably intended to represent that of a wild cat or of a panther (Fig. 216).

Vessel No. 4.—A bowl in fragments, having the check-stamp decoration. This instance, with a single sherd in addition, was the only example of this style of decoration noted by us in the mound.

Vessel No. 6.—Of about 2 quarts capacity, with *repoussé* ridges around the body which has been painted crimson (Fig. 217).

Vessel No. 15.—A quadrilateral vessel with circular upright rim, having in each corner an oblong space, *repoussé*, upon which has been a complicated stamp, now very indistinct.

Vessel No. 19.—An undecorated vase of red ware, hemispherical body with long cylindrical neck ending in four pointed corners.

Vessel No. 20.—A small bowl of inferior ware, with a rude dentate design surrounding the upper part, enclosing punctate impressions (Fig. 218).

Vessel No. 21.—A vase of hemispherical body, with constricted neck decorated with upright parallel ridges, ending in a square rim having incised symbols of the bird (Fig. 219).



FIG. 215.—Vessel No. 2. Tucker mound. (Two-thirds size.)

Vessel No. 22.—This vessel, shown in Fig. 220, is undecorated save for the effigy of the head of a horned owl overlooking the aperture. Length, 8.4 inches; breadth, 6.6 inches.

Vessel No. 25.—Shown in Fig. 221, has a spherical body surmounted by a long, flaring rim. The decoration, incised and punctate, is given in diagram (Fig. 222). Height, 7.2 inches; maximum diameter, 5.4 inches.



FIG. 216.—Vessel No. 3. Tucker mound. (Half size.)



FIG. 217.—Vessel No. 6. Tucker mound. (Half size.)

Vessel No. 28.—A vessel of about 1 pint capacity, with complicated stamp decoration around the neck.

Vessel No. 29.—Somewhat similar in style to the preceding, with a deeper band of complicated stamp decoration around the upper part (Fig. 223).

Vessel No. 31.—A jar with globular body and long neck slightly flaring, surrounded by a complicated stamp decoration (Fig. 224). Height, 8.7 inches; maximum diameter, 5.9 inches.

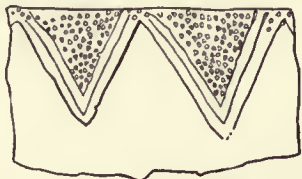


FIG. 218.—Vessel No. 20. Decoration. Tucker mound. (Half size.)

Vessel No. 36.—This vessel, crimson in color, found crushed to pieces, has been cemented together with slight restorations. It is particularly interesting as belonging to the



FIG. 219.—Vessel No. 21. Tucker mound. (Half size.)



FIG. 220.—Vessel No. 22. Tucker mound. (Full size.)

ready-made mortuary class and has a hole in the base made before baking, as are those in the body and neck of the vessel. This vessel is notable as not being a life-form, to which class ceremonial vessels in this district usually belong. The



FIG. 221.—Vessel No. 25. Tucker mound. (Full size.)



FIG. 222.—Vessel No. 25. Decoration. Tucker mound. (Half size.)

decoration is incised scrolls with punctate and other markings (Fig. 225). Height, 7.3 inches; maximum diameter, 8 inches.

Vessel No. 37.—This vessel, crimson inside and out, was found badly crushed and with parts missing. Cemented together and somewhat restored it seems to be a representation of a shell. On the opposite sides are convolutions similar to those shown in Fig. 226. There have been two perforations for suspension, on one side. Height, 4.2 inches; transverse diameter, 4.8 inches.



FIG. 223.—Vessel No. 29. Tucker mound. (Full size.)



FIG. 224.—Vessel No. 31. Tucker mound. (Half size.)

Vessel No. 38.—Part of a compartment vessel which had originally four circular divisions surrounding a fifth placed on a level above.

Vessel No. 44.—A bowl of excellent ware. The decoration, incised, is shown in diagram in Fig. 227. Maximum diameter, 9.5 inches; height, 6.5 inches.

Vessel No. 57.—A pot almost cylindrical, with flat, square base (Fig. 228). The incised decoration showing the bird symbol often repeated, is given diagrammatically in Fig. 229.



FIG. 225.—Vessel No. 36. Tucker mound. (Five-sevenths size.)

YENT MOUND, FRANKLIN COUNTY.

This mound, belonging to the Yent estate, Mrs. James Pickett, of Carrabelle, executrix, was in an old field, now overgrown, about one half mile in a southeasterly direction from the Tucker mound.

The mound, beginning SSW. sloped gently upward in a NNE. direction, a dis-



FIG. 226.—Vessel No. 37. Tucker mound. (Full size.)

tance of 68 feet and, continuing at a level 13 feet, had a descent of 25 feet before reaching the flat ground at the NNE., thus having a major axis of 106 feet along the base. At its broadest part, beneath the level portion, the mound was 74 feet across. There were deep excavations at several places along the border of the mound, whence sand had been taken to build it. The height, above what seemed to be the general level, was 7.5 feet.

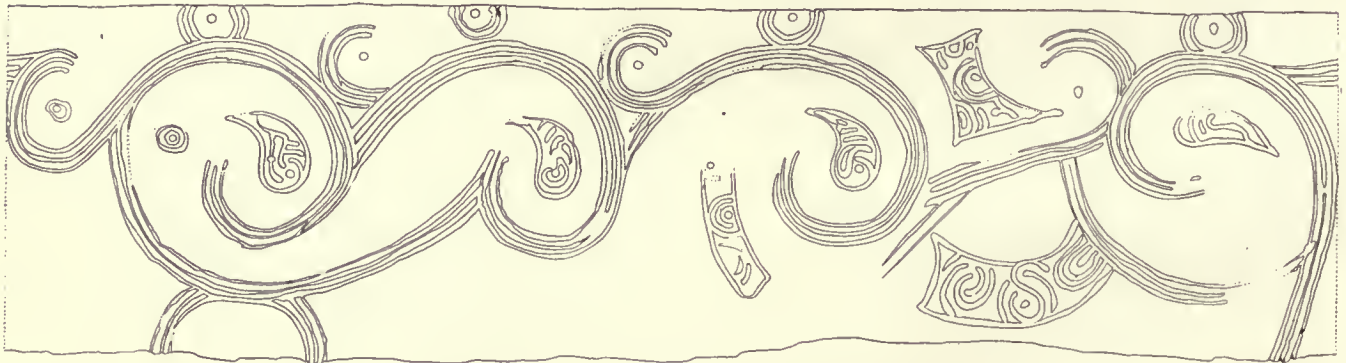


FIG. 227.—Vessel No. 44. Decoration. Tucker mound. (One-quarter size.)



FIG. 228.—Vessel No. 57. Tucker mound. (About full size.)

The mound, which had sustained almost no previous digging, was totally demolished by us.

Human remains were met with in seventy-four places, lying throughout the mound from the very margin, sometimes below the base in graves, along the base, and in the body of the mound, but seldom superficially. There were present

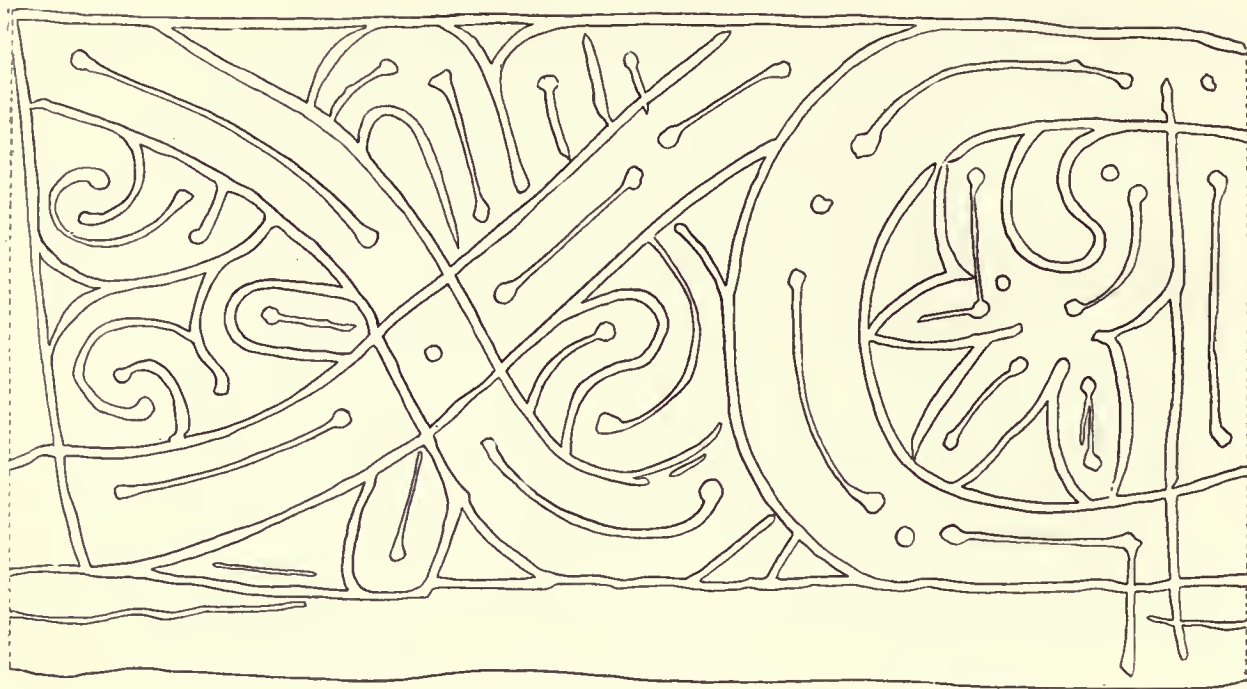


FIG. 229.—Vessel No. 57. Decoration. Tucker mound. (Half size.)

the closely flexed skeleton, the bunch, the lone skull, scattered bones, and skeletons forced into small graves, showing partial flexion at times and, again, disarranged bones with the skull above. There were also bones in caved sand, whose form of burial was not determined, in two or three cases. Though no skulls were saved from this mound, a number were in a condition to allow determination as to cranial flattening. There was no evidence that it had been practised.

Around the great majority of burials were large clam-shells with sometimes a mingling of conchs (*Fulgur perversum*).

Proportionately, the greatest number of burials were marginal, in graves, and with these burials were the most interesting objects in the mound.

With Burial No. 2, a bunch, was a "celt" with a cutting edge 3.5 inches across, while the opposite end tapered gracefully to a blunt point scarcely 1 inch in diameter.

Three other "celts" lay with burials and a small one with a pendant came from a grave where no bones were found though, presumably, lapse of time in wet sand below the base of the mound may account for their absence.

With Burial No. 3, a bunch, were: a canine of a large carnivore; two sheets of mica, roughly shaped to resemble lanceheads; a clam-shell showing wear. A number of such clam-shells with part of the side removed, some with a cutting edge, were met with in this mound.

Burial No. 5, a bunch, had a triangular pebble about 5 inches long, with the greater end showing much use as a hammer.

With Burial No. 8, a mixture of bones, some belonging to an adult, some to a child, near the skull of each was a graceful pendant probably of slate, each about 4.5 inches in length, of the type of a larger one from this mound, to be figured later.

Burial No. 13, a flexed skeleton, had with it four pebbles.

Burial No. 15, a bunch, had with it a rattle made of a turtle-shell holding a number of rather carefully flattened bits of chert.

Burial No. 19, a skull with a single femur, lying in a grave, had a rude earthenware pot some distance above. Probably this association was accidental, as in no other case in this mound was earthenware found with a burial.

With Burial No. 27, a flexed skeleton, were 33 pebbles.

Burial No. 39 consisted of a pit of considerable size, below the base, in which were the flexed skeletons of three adults and parts of skulls and other bones of three infants or children, the remaining bones of these skeletons having doubtless disappeared through decay. At the wrist of one of the adult skeletons were twenty-nine perforated bits of shell, some neatly shaped; seventy-six teeth of the large porpoise (*Turriops turrio*), kindly identified by Prof. F. A. Lucas, of the National Museum, all perforated, some through the enamel, but nearly all through the base of the tooth; and eight pieces of bone, all perforated and more or less rudely made to resemble teeth. With these was a small imperforate tooth of a shark of the present geological period. A selection of these ornaments is given in Fig. 230, the shell being to the left, the bone to the right.

As is so often the case with children in mounds, those in this grave had been especially favored. With one was a pendant, probably of slate, about 5 inches long, of the same pattern as the one next to be described, having bitumen still adhering to the groove. With another was the most interesting pendant it has been our fortune to take from a mound. The material is probably slate. The length is 8.75 inches (Fig. 231). The remaining skull had beside it a gorget of shell cut in the shape of a fish. There are two holes for suspension (Fig. 232). In this grave were also a few shell beads.

Burial No. 42, near Burial No. 39, resembled it in being a large grave below the base, but while No. 39 had a few clam-shells only, scattered here and there above it, this grave was filled in with almost a solid mass of them. The grave contained the flexed skeletons of two adults and the bones of an infant or child, badly crushed, with which was the tooth of a fossil shark, 2 inches long, perforated for use as a pendant.

Burial No. 54, a bunch of bones belonging to an adolescent, had inverted over the skull a perforated shell drinking cup.

With Burial No. 72, bones which fell in caving sand, were fragments of a sheet copper ornament corroded through and through.

With other burials were hammer-stones, hones, pebbles, masses of chert and five or six arrowheads or knives, one of chalcedony, one of quartzite, the remainder of chert.

Also in the mound, in caving sand, so that the proximity to bones could not be



FIG. 231.—Pendent ornament of stone. Yent mound. (Full size.)

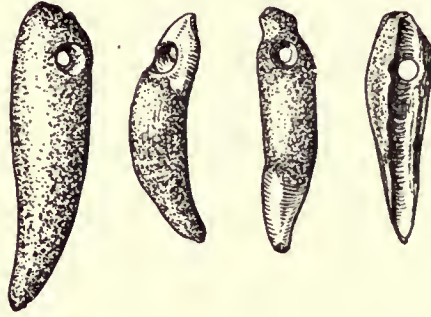


FIG. 230.—Ornament of shell, ornaments of porpoise teeth and ornament of bone. Yent mound. (Full size.)

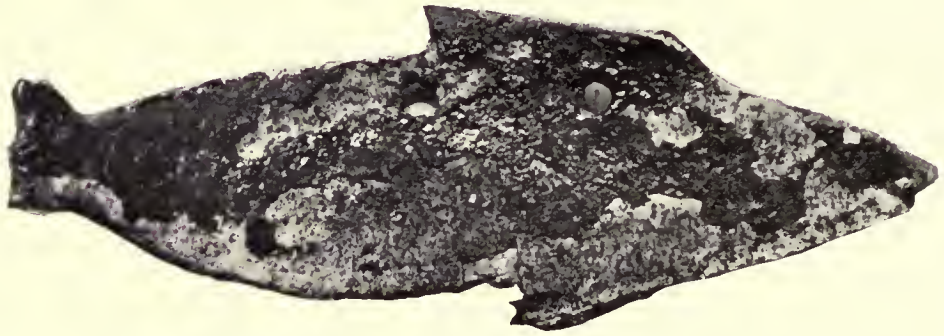


FIG. 232.—Gorget of shell. Yent mound. (Full size)



FIG. 233.—Vessel No. 22. Yent mound. (About full size.)

determined, or in undisturbed sand with no bones present, though they may have gone through decay, were, singly or associated in considerable numbers: masses of chert; rounded hammer-stones of chert; hones of sand-stone; pebbles; pebble-hammers; smoothing stones; a mass of quartz, roughly chipped; several arrow-heads or knives; a handsome pendant 4.5 inches long, similar to the others we have described; part of a "Monitor" pipe of soapstone, highly polished; a pendant chipped from a quartz pebble; a demijohn-shaped pendant made of ferruginous clay-stone; a globular pendant with an arm for suspension projecting from either end; a rude globular pendant of hematite from which the grooved portion has broken; a globular pendant of decomposed material; a barbed lancepoint of brown chert, somewhat over 4 inches in length; a knife of light-brown chert, with curved cutting edge, nearly 9 inches long, from which about 1 inch of the point is missing; shell drinking cups; an ornament of ferruginous sandstone, about 2.5 inches long and 1.5 inches broad, flat on one side, convex on the other, with an unfinished perforation on either face below the middle of one of the longer sides; rude discs of shell; three shark's teeth of the present geological period, two with perforations; double pointed instruments made from axes of marine univalves; three small fossil shark's teeth without perforations; a sheet of mica, rudely given the outline of a lancepoint; rectangular masses of silicified fossil wood, 7 or 8 inches in length, determined by Mr. Lewis Woolman of The Academy of Natural Sciences of Philadelphia, to have belonged to a coniferous tree. One of these was roughly sharpened to a cutting edge; the others had seen service as pestles or hammers.

The earthenware in this mound, of which sixty-seven specimens were noted by us, discarding parts of vessels and heaps of sherds, consisted of common types and of inferior ware. The vessels lay, as a rule, near the base, often numbers together. The first deposit was found at the very margin of the ENE. part of the mound. Later, a considerable deposit lay somewhat in from the margin in the SW. side, while here and there single vessels were encountered throughout the mound. Numbers of vessels lay near the center, short distances apart.

The majority of vessels, undecorated, or with a complicated stamp applied in a faint and slovenly manner, were dropping to pieces when removed. Incised decoration was met with in but five instances and of these but one showed earnestness of endeavor. The features of the earthenware of the mound were the presence of four feet on a large percentage of the vessels and the number of toy pots and bowls found singly, here and there, in the sand, one of which had a diameter of but 1.5 inches.

With but few exceptions all vessels had the basal perforation.

Vessel No. 19.—Small, undecorated, imperforate.

Vessel No. 20.—A toy vessel of very coarse ware, with four feet and rude incised decoration.

Vessel No. 21.—An undecorated vessel of common type, with four feet and notches around the rim, imperforate.

Vessel No. 22.—A cup of heavy ware, with flat, circular base and inward slope to the sides. The decoration consists of punctate impressions around the rim and, a short distance apart, series of upright parallel rows of punctate markings (Fig. 233.)

Vessel No. 28.—A bowl of ware more solid than that of the majority from this mound. The incised decoration is shown in diagram in Fig. 234.

Vessel No. 31.—A vase of rough inferior material, with four feet. The body consists of four *repoussé* lobes. The neck, upright, flares slightly near the margin. There is no decoration.

Vessel No. 37.—A toy bowl having below the rim an encircling incised line with parallel incised perpendicular lines between it and the rim.

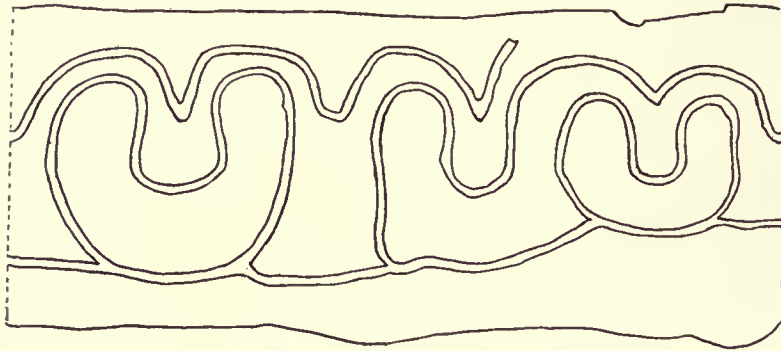


FIG. 234.—Vessel No. 28. Decoration. Yent mound. (Half size.)

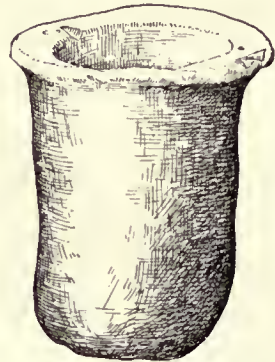


FIG. 235.—Vessel No. 40. Yent mound. (Half size.)

Vessel No. 40.—Cylindrical with flat base, and rim .4 of an inch wide extending horizontally. There are perforations on opposite sides for suspension (Fig. 235).



FIG. 236.—Vessel No. 45. Yent mound. (About full size.)

Vessel No. 45.—A graceful vase of yellow ware, whose basal perforation has removed one of its four feet. The rim is crimped. The decoration consists of perpendicular parallel bands made up of incised crescentic markings (Fig. 236).



FIG. 237.—Vessel No. 55. Yent mound. (Half size.)



FIG. 238.—Vessel No. 62. Yent mound. (Half size.)

Vessel No. 55.—A vessel of ware so solid that three heavy blows of a spade chipped but did not shatter. The form is nearly globular with a certain elongation at one side. The aperture, near which are two holes for suspension on opposite



FIG. 239.—Vessel No. 67. Yent mound. (Full size.)



FIG. 240.—Sherd. Yent mound. (Three-fourths size.)

sides, is but .8 of an inch in diameter. The decoration, incised and punctate, with light-colored material inset, consists of a rudely executed design, evidently symbolical, four times repeated (Fig. 237). Height, 4.2 inches; maximum diameter, 4.5 inches.

Vessel No. 62.—A vessel of inferior ware, with four feet. The decoration seemingly is cord-marked (Fig. 238).

Vessel No. 67.—The most carefully decorated vessel in the mound, with flat base on which the decoration on the body is continued. A part of the body and neck, missing when found, has been restored (Fig. 239).

A sherd from this mound is shown in Fig. 240.

MOUND ON MARSH ISLAND, WAKULLA COUNTY.

Marsh Island is the northeastern boundary of Ocklockonee bay. The mound was in full sight of the water about 100 yards distant, on property of the Rayker family of Crawfordville, Fla. The usual deep excavations near the mound were present and extensive shell deposits were in the neighborhood.

The mound, which gave little evidence of previous digging, oblong with rounded corners, was 96 feet through the base in an easterly and westerly direction, 68 feet in a northerly and southerly, and had a height of 7 feet. The mound was entirely demolished by us.

Human remains were present at 106 points and their discovery began at the very margin of different parts of the mound. Many burials lay in the eastern portion, but interments in graves below the base were much more numerous on the western side. But few burials were met with in the northern and southern parts of the mound.

There were twenty-five lone skulls, some in little graves of their own below the base, and, in two instances, two skulls lay together without other bones. The flexed burial was met with in twenty-eight instances and the bunch was present forty-four times, counting under this heading masses of bones indiscriminately mixed, including numbers of skulls. There were also several disturbances of remains, probably aboriginal, and cases where bones fell in caved sand before the form of burial was determined. There was also one urn burial.

The question of cranial flattening in this mound will be discussed later.

Thirteen burials lay under oyster-shells sometimes few in number, sometimes in a solid mass. Noteworthy burials, including all associated with artifacts, were as follows:

Burial No. 20—A lone skull had with it a graceful "celt."

Burial No. 24 had a bit of chert in association.

Burial No. 37, a flexed skeleton, lay in a grave below the base. With it was a mass of plumbago, deeply pitted.

Burial No. 38.—A lone skull lay with a "celt."

Burial No. 51, in a grave beneath oyster-shells, consisted of three flexed skeletons, two on the same level, one somewhat above. With them was the knucklebone of a deer.

Burial No. 59, a mass of bones including fourteen femurs and four skulls.

Burial No. 66, a flexed skeleton, had with it a bit of plumbago.

Burial No. 70, four skulls and a lot of long-bones, 2.5 feet below the surface. With them were a pair of scissors and other articles, of iron or steel, badly rusted, glass beads, one large shell bead, one copper or brass sleigh-bell, eleven tubular beads of sheet brass, with overlapping edges. Dr. Harry F. Keller, who made a qualitative analysis of one of these beads, writes: "The tube surrounding the cord is brass. Beside a large proportion of zinc, it contains considerable quantities of lead, silver and iron."

Burial No. 85, about 2.5 feet down, had seven skulls and eighteen femurs with other bones. One small glass bead lay with them and doubtless others were in the sand.

Burial No. 92, had seven skulls with other bones. Articles of iron and of steel were in association.

Burial No. 93, a bunch, had a stone implement with a rude cutting edge, two pebbles and two pebble hammers.

Burial No. 104 had certain burnt and calcined human bones mixed with others unaffected by fire. Above, in the sand, extending a considerable distance upward were masses of charcoal. This may have been a case of cremation or of proximity to ceremonial flames.

Burial No. 105, near the surface, had eleven skulls and many other bones. With them were three copper or brass sleigh-bells, articles of rusted iron or steel and three shell hair-pins.

Burial No. 91, a true urn-burial, was of much interest to us, in that it carried the occurrence of the custom so much farther east in Florida.

About 3 feet from the surface, that is to say 3 feet to where the base of the under vessel rested, was an imperforate bowl of solid, but rather coarse ware, 6.75 inches high and 10.75 inches in maximum diameter. The decoration, incised, is carelessly executed. Within the bowl were the bones of an infant. Around each humerus was a bracelet of sheet brass, about 2.25 inches in diameter and 2 inches wide, having two perforations on either side to regulate the diameter by aid of a cord or sinew. Over the bowl, inverted, was another bowl of similar ware and with decoration as carelessly done, imperforate, with two projections at either side. Maximum diameter, 12 inches; height, 4.7 inches (Fig. 241).

In the Marsh Island mound was shown in an interesting way, in our opinion, the use often made of a mound for intrusive burial. In this mound nearly all burials lay below the base in graves or on the base, or not far above it but no burial of this class had with it a single object of European provenance.

Five burials came from near the surface and one from a pit whose base was 4 feet below the surface, but whose filling in from the surface down was clearly marked by admixture of masses of charcoal.

Of these six burials (we are omitting the urn-burial) four had with them various articles unmistakably obtained from the whites, and glass beads, which

undoubtedly belonged to another of them, were found in the sand near where it had lain. The sixth burial came from near the surface in much caved sand and associated objects could not be definitely located.

The 106 burials in the mound represented a great number of skulls. Of these skulls a large percentage were so crushed that no determination as to flattening could be arrived at, but on no skull coming from on or near the base was any sign of flattening noticed, while the skulls belonging to the six burials to which we have already referred were as follows:



FIG. 241.—Urn-burial (Burial No. 91.) Mound at Marsh Island. (Half size.)

Burial No. 61.—One skull, flattened.

Burial No. 70.—Four skulls, all badly crushed.

Burial No. 85.—Seven skulls. In the evening of the day when this burial was removed, while writing our amplified notes, we found no reference to cranial flatten-

ing in connection with this burial, in the note book used by us at the mound, but it was the strong impression of the one who removed the bones and of ourselves, who saw the bones removed, that such skulls as were not badly crushed, showed flattening and that our failure so to state in our notes was an omission, simply.

Burial No. 92.—Seven skulls, six of which showed flattening; the other was badly crushed.

Burial No. 104.—Three skulls, one flattened, two crushed.

Burial No. 105.—Six skulls flattened; five hopelessly crushed.

Here, then, we have clearly enough, superficial burials with flattened skulls and European artifacts on one hand, and on the other, original burials whose skulls showed no flattening and with which were no articles giving evidence of European contact.

Two "celts" fell in caved sand, doubtless from the neighborhood of human remains.

There were also in the mound, unassociated when found: a few fragments of chert; a small bit of plumbago; mica; scattered pebbles; a deposit of twenty-four pebbles, sling-stones, no doubt; pebble-hammers; hones; a bit of shell; a rude cutting implement; a handsomely made disc of quartzite, cup-shaped on either side, 3 inches in diameter, .85 of an inch in thickness. Each concavity has a depth of .25 of an inch. While objects of this sort are not uncommon in other parts of the country, this is the first found by us during our mound work.

Sand, pink from admixture of hematite, was in the mound in one or two places, unassociated with burials.

At the eastern margin of the mound were a few sherds, one of excellent ware, showing incised decoration. There were also parts of four vessels with practically similar ornamentation consisting of rude animal heads upright around the rim with incised lines and punctate markings below.

Four or five undecorated pots and bowls were found here and there in the mound, unassociated with human remains.

On the eastern side, 24 feet in from the margin, began a deposit of earthenware which, spreading a little to either side, continued in a distance of about 13 feet. These vessels, lying along the base in masses of black sand, as a rule away from human remains, had the basal perforation with three exceptions.

Forty-four vessels were noted by us, accompanied by the usual sherds. The ware was most inferior, so porous in cases that water actually could be pressed from



FIG. 242.—Vessel No. 1. Mound at Marsh Island. (Half size.)

it. The majority of vessels, entirely undecorated or bearing a faint complicated stamp, fell into bits on removal. Incised decoration was most infrequently met with.

Vessel No. 1.—A bowl, with inverted rim, is of exceptionally good ware for this



FIG. 243.—Vessel No. 2. Mound at Marsh Island. (About two-thirds size.)

mound. The decoration, incised, consists of six rude diamonds enclosing four formed by single incised lines and two by double ones. Upright and central in each diamond, in a field of horizontal parallel straight lines is the emblem of the bird

Between the lower parts of the diamonds are triangles, sometimes of one line, sometimes of two, containing horizontal parallel lines. Capacity about 1 quart (Fig. 242).

Vessel No. 2.—A ceremonial vessel of inferior ware, representing the head, body and tail of a bird. In addition to the basal perforation made before the hardening of the clay, there are similarly constructed holes in the body of the vessel. The exterior surface has been covered with crimson paint (Fig. 243). Height, 10.2 inches; maximum diameter, 6.5 inches.



FIG. 244.—Vessel No. 20. Mound at Marsh Island. (Five-eighths size.)

Vessel No. 7.—A compartment vessel or part of one, found almost in a pulpy condition.

Vessel No. 8.—A large flattened sphere of red ware, undecorated, which crumbled to bits on removal.

Vessel No. 20.—A compartment vessel having a large central compartment rising above four smaller ones (Fig. 244). A cross-section is shown in Fig. 245.

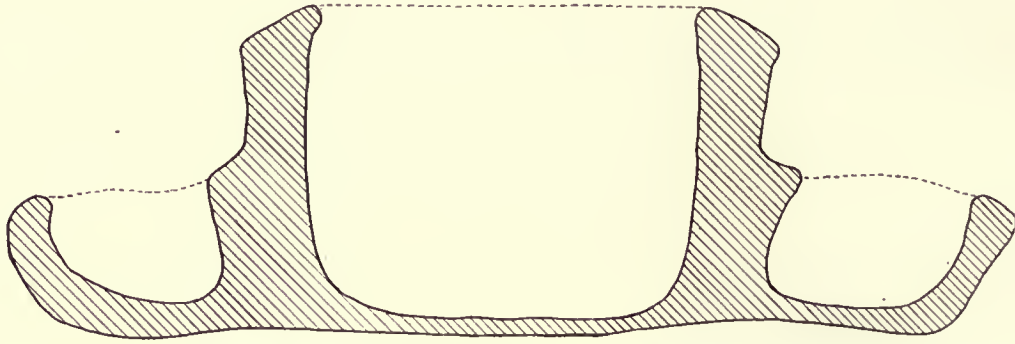


FIG. 245.—Vessel No. 20. Vertical section. Mound at Marsh Island. (Half size.)



FIG. 246.—Vessel No. 31. Mound at Marsh Island. (About three-fourths size.)

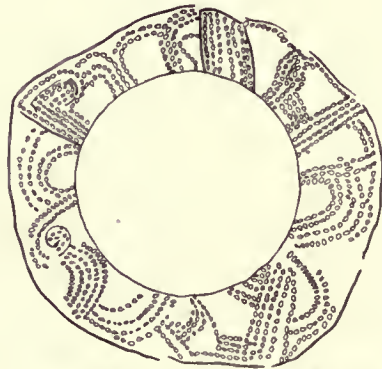


FIG. 247.—Vessel No. 37. Decoration. Mound at Marsh Island. (One-third size.)



FIG. 248.—Sherd. Mound at Marsh Island. (Four-fifths size.)

Vessel No. 33.—A pot of yellow ware, of about 1 pint capacity with four encircling lines of oblong impressions below the rim.

Vessel No. 34.—Two parts of this vessel, having no surface indicating the former junction, were found some distance apart. The restoration is an arbitrary one as the length of the cylinders which joined the globular extremities could be estimated only (Fig. 246).

Vessel No. 36.—A large pot 15 inches across the mouth, which fell into bits before farther measurement could be obtained.

Vessel No. 37.—A vessel of ordinary form, with rude punctate markings below the rim, shown diagrammatically in Fig. 247.

A sherd from this mound with complicated stamp is shown in Fig. 248.

NICHOLS' MOUND, WAKULLA COUNTY.

The estate of Mr. Eli Nichols is situate on the north side of Ocklockonee bay near where the Sopchoppy river unites with the bay.

The principal mound, in a cultivated field not far from Mr. Nichols' residence, is about one-half mile from the landing, in a northerly direction.

The mound, which had suffered no digging except from insignificant efforts of children on the place, was 5.5 feet in height and had a basal diameter of 100 feet save to the SW. where a graded way 12 feet long and about 22 feet across, joined it.

It was our belief from the start that this mound, which covered an area disproportionate to its height and which had a great level summit plateau, had been made for domiciliary purposes. To assure ourselves of the fact, however, and to learn, if our surmise proved true, whether or not a dwelling site had been used for burial purposes, as we have sometimes found to be the case, twenty men on an average worked for two days on the mound, trenching in every direction.

The mound, of dark brown sand, had a thin layer of small clam-shells (*Rangia cuneata*) along the base and, beginning at a certain distance in, another layer of the same kind of shells, about 1 foot in thickness which, at the starting point, was about 1 foot below the surface but three times that depth at the center of the mound.

Burials were all superficial. In the slope and in the outer part of the summit plateau they lay just below the upper shell layer and in each case the layer had been cut through to bury them. In the more central part of the mound the burials lay above the shell layer.

Thirty-three burials were met with during the trenching. Twenty-two were closely flexed. One lay on the back with the knees flexed upward. Six were not exactly determined as to form of burial owing to disturbance either aboriginal in making another grave or by recent digging or by caving sand. Four lay at full length on the back, in each case the feet pointing toward the margin of the mound. Whenever skulls were in a condition to be examined artificial flattening was noted.

Burial No. 7.—A flexed skeleton had a femur the neck of which had formerly sustained a fracture. This bone was sent to the United States Army Medical Museum, Washington, D. C.

Three burials had each a "celt;" one had shell beads while with several were pebble-hammers and flakes of chert.

Unassociated and near the surface, as were all artifacts found in this mound, were three "celts," two together; a bit of chert, with a cutting edge; a mass of galena, considerably larger than a closed hand; a bit of chert, roughly rounded; an interesting finger-ring which seemed to us made from the vertebra of a large fish, as a small groove or band surrounded it. This ring was sent to Prof. F. A. Lucas of the National Museum who kindly devoted considerable time to it. Professor Lucas reports the ring to be a veritable puzzle. It is not bone or shell or vegetable ivory. "It is very likely some large palm seed like the so-called 'sea beans' that come to the Florida coast, and this would account for the curious band, almost continuous, that runs around the rim."

Several sherds were present in the mound, coming probably from midden refuse. The complicated stamp and the small check stamp were represented and there was also a handsome fragment of excellent ware decorated with a circular band of crimson, in which was a circle of punctate markings. One sherd bore a loop-shaped handle.

In sight of Mr. Nichols' house, in an easterly direction from it, was a low ridge in pine woods, seemingly of artificial origin. A few human bones and the base of an undecorated pot were the sole results of careful trenching.

In a field bordering the water, also belonging to Mr. Nichols, near the landing was a mound 34 feet across the base and 4 feet high, through which a small and shallow trench had been dug previous to our visit. In the neighborhood of the mound, both in the field and along the shore, are numerous deposits of shell, some of the oyster but mainly of a small clam (*Rangia cuneata*). All remaining parts of the mound were demolished by us without discovery of artifacts or burials.

This mound was made of mud, probably from the river, with a small admixture of sand and was so solid that picks and axes were employed in its demolition.

MOUND NEAR OCKLOCKONEE BAY, WAKULLA COUNTY.

At the southwestern extremity of Ocklockonee bay are ridges of sand unusually high for this level district. On one of these, at the top, is a mound about 18 inches high and 35 feet across approximately. It had been thoroughly dug into from all sides. Fragments of human bones and bits of aboriginal ware lay on the surface. No investigation was attempted by us.

HALL MOUND, PANACEA SPRINGS, WAKULLA COUNTY.

Panacea Springs, a health resort with many mineral springs, is at the head of King's bay, a part of Apalachee bay.

In pine woods and scrub, about 1 mile in a northeasterly direction from the land-

ing at the Springs, near a large shell-heap, is a mound on property of Mr. Thomas H. Hall, the owner of the Springs, who resides on the place.

The mound, of circular outline, had a basal diameter of about 60 feet. A former excavation in the center of the summit plateau, though filled, seemingly had lessened the original altitude. At the time of our visit the mound was eight feet high. The excavation, the only one previous to our own, was circular with a diameter at the top of from 10 to 12 feet. At a depth of 4 feet it was 8 feet across. It had a diameter of 2 feet 5.5 feet down, where it ended. Joining the mound on the western side was a causeway 60 feet long, 24 feet of which was a graded ascent at the western end. The remainder of the causeway was level until its union with the mound. The causeway, about 5 feet in height, was 47 feet wide at the start, diminishing about 10 feet later, owing to great excavations on either side, whence sand for the causeway or mound had been taken.

The mound was totally demolished by us as was the causeway with the exception of the 24 feet of slope, which were trenched by six men without result save the discovery of a recent burial with parts of a coffin and nails.

We shall first take up the causeway. No burials were found in the marginal parts or in the sides. In the southwestern part, at the union of the slope with the flat surface, was a bunched burial near the base. About 30 feet in from the end of the causeway and about 5 feet from the surface, was a small bunch of bones including a skull. Near these lay two pendants, one of igneous rock, the other made from a quartz pebble, each about 2 inches in length. Their shape is roughly ellipsoidal, each with an extended end around which is a groove for suspension. Near the base, at different points, were two lone skulls.

Under the sloping sides of the causeway were several vessels from which considerable parts were missing. Had it not been that the basal perforation was present in them there would have been grounds to consider them broken and cast aside during the making of the mound.

A number of vessels, none equalling in excellence of ware or decoration the better vessels of the mound proper, were found in the main, or flat portion of the causeway. Some of these will be particularly described with the vessels from the mound proper.

There were also in the causeway one shell drinking cup and two masses of plumbago, deeply pitted.

In the mound proper, beginning at the very margin of the eastern side and confined almost exclusively to that side, were thirty-one burials, including, as to form, the flexed, the bunch, the lone skull. Several were too badly decayed to allow determination and several others came down in caved sand. So badly decayed were the bones that no whole skull or considerable part of a skull was met with, but careful examination of such fragments as were found, discovered no sign of flattening.

The custom to put oyster-shells over burials was chiefly honored in the breach in the Hall mound. Several burials had a few shells lying with them, but two or three only had masses of oyster-shells above them, such as we have found elsewhere.

Practically no artifacts lay with burials. It would seem as though friends of the departed, in placing the general tribute of earthenware, which we shall speak of later, considered themselves released from farther duties in the matter.

Near Burial No. 1, a small bunch with a few oyster-shells, were two "celts."

Burial No. 2, a few bones, had a small number of shell beads and beads were with Burial No. 12, a bunch.

Burial No. 3 had two earthenware vessels nearby but, as a general deposit of earthenware was in that part of the mound where the burial lay, the proximity may have been accidental.

A feature in the mound was the comparative absence of material ordinarily met with. The usual hones, masses of chert and the like were absent. There were found: one "celt" in caved sand; two small masses of lead sulphide; two pebble-hammers; one smoothing stone; one hammer-stone; one bit of plumbago; one perforated shell drinking cup. In a quantity of sand dyed with hematite, the only occurrence in the mound of the red oxide of iron noted by us, was a sheet of mica, shaped to resemble a lancehead.

Beginning at the very edge of the mound, almost due E., and extending slightly toward the N. and toward the S. as the digging advanced, was a deposit of earthenware unassociated with burials, on or near the base, in masses of dark sand sometimes almost of inky blackness. The result of the analysis of this sand is given elsewhere in this report.

This earthenware, as usual, was made up of vessels badly broken of which all parts were present; of single portions of vessels; and of fragments which, when put together, formed only part of a vessel. Here and there with these were specimens of unbroken ware.

Sixty-eight vessels or large parts of vessels, whole and broken, were noted by us in the mound and in the causeway. Had the average of excellence of ware and of workmanship of all vessels in the mound equalled that of the first twenty found by us and of the sherds among which they lay, the record of the mound would have been unique, since many pieces fully held their own with the best ware of the Gulf. As it is, the Hall mound may be considered to hold its own with any opened by us.

The occurrence of this excellent ware was during the digging of the first few feet and the entire deposit of earthenware, which had degenerated into ordinary types, undecorated or with the complicated stamp, practically ended at a point about 22 feet in from the margin, though a few vessels were met with later. All this deposit, so far as noted, had the basal perforation made before or after baking of the clay. There were present, however, here and there in various parts of the mound and of the causeway vessels near the surface or at all events much higher than the general deposit which, as we have stated, lay along the base. A few of these scattered vessels had the basal perforation, but the majority had not, ten having been found without it.

Among the sherds, near the margin of the mound, were many birdhead handles, and fragments of ceremonial vases through the bases and bodies of which perforations had been made before baking.

We shall now describe in detail the most noteworthy vessels from the Hall mound.

Vessel No. 1.—A bowl of excellent heavy yellow ware of about 3 pints capacity (Fig. 249), with complicated incised and punctate decoration consisting of two series, one on either side, separated by undecorated spaces (diagram, Fig. 250).



FIG. 249.—Vessel No. 1. Hall mound. (Full size.)

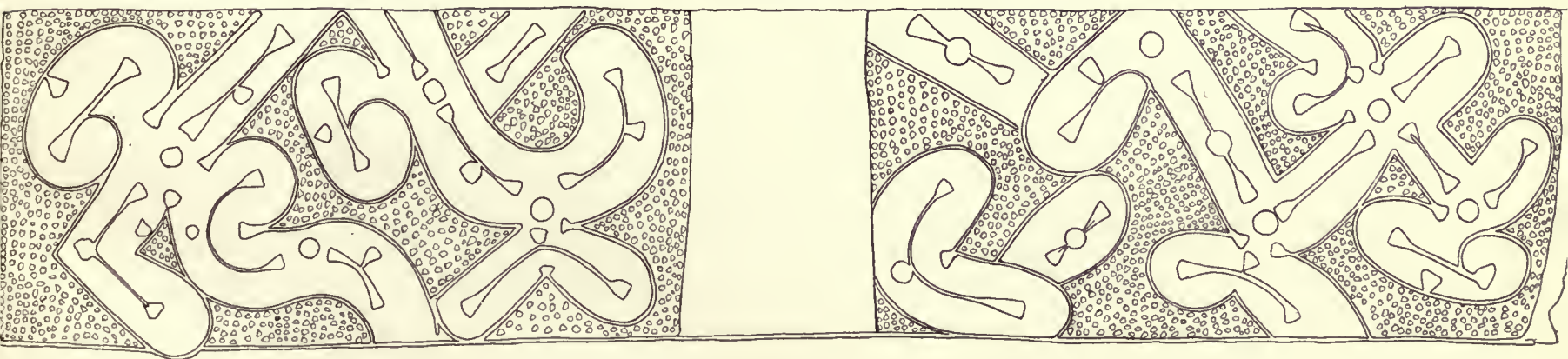


FIG. 250.—Vessel No. 1. Decoration. Hall mound. (Half size.)

Vessel No. 3.—A vase of interesting shape having three lobes joined by a cylinder to a much flattened sphere (Fig. 251). The decoration, incised and punctate, is practically the same on two of the lobes, with a certain variation on the third.



FIG. 251.—Vessel No. 3. Hall mound. (About full size.)

On the upper part of the vessel the design is repeated on the opposite side. There have been two holes for suspension. Height, 6.5 inches; maximum diameter, 5 inches.

Vessel No. 5.—A bowl of about 2 gallons capacity, found crushed but since put

together. There is incised decoration on the upper part of the body as shown in Fig. 252.

Vessel No. 6.—Near the surface was a vessel of thick ware, made up of two circular compartments, one higher and broader than the other. Both are perforated (Fig. 253).



FIG. 252.—Vessel No. 5. Hall mound. (One-third size.)

Vessel No. 7.—A cylindrical body surmounted by a bird-effigy. The wings, *repoussé*, are decorated with the symbol of the bird. The head, that of a duck, is rather rudely done. The tail projects. This vessel belongs to the class made expressly for burial with the dead, having a hole in the base and four triangular



FIG. 253.—Vessel No. 6. Hall mound. (Full size.)

holes in the body made when the clay was soft (Fig. 254). Height, 9 inches; maximum diameter of body, 7.7 inches.

Vessel No. 8.—A much flattened sphere of yellow ware with circular aperture originally about 1 inch in diameter, but now elongated on two sides owing to the breaking away of the margin on either side by a cord or sinew used for suspension.



FIG. 254.—Vessel No. 7. Hall mound. (About three-fourths size.)

The decoration, shown in Fig. 255, is rudely executed. A material, probably yellow clay, has been inset in the line and punctate markings.

Vessel No. 10.—A bird-effigy vessel with the upper part of the body and head missing, when found. The body has since been restored and a head found not far distant in the mound, and seemingly belonging to the vessel, has been added. The ware is inferior. The outside has a covering of crimson paint. Throughout the body are triangular holes made before baking, as was the small triangular one in the base (Fig. 256).



FIG. 255.—Vessel No. 8. Hall mound. (About five-sixths size.)

Vessel No. 11.—A bowl of about 2 gallons capacity has four incised designs, those on opposite sides being similar. The two different designs are shown diagrammatically in Fig. 257.

Vessel No. 12.—An oblate-spheroidal body with upright neck (Fig. 258). The decoration, incised to an unusual depth, complicated and interesting, is shown diagrammatically in Fig. 259. It will be remarked that seven groupings running downward resemble each other, with minor points of difference only, and that three groupings extending upward are also much alike, though not entirely so. There are four blank spaces which the aboriginal artist, presumably, did not take time to fill. The vessel, found crushed into many fragments, has been carefully cemented together.

Vessel No. 13.—This vessel, a bird-effigy, belonging to the ready-made mortuary variety, had, when found, a considerable part of the body and tail broken and

absent. These portions have since been restored (Fig. 260). Around the lower part of the vessel is a rattlesnake in relief, given diagrammatically in Fig. 261, with head, rattles and button distinctly shown. On the head and tail of the reptile are symbols of the bird. While these may be intended to designate the plumed serpent,



FIG. 256.—Vessel No. 10. Hall mound. (About two-thirds size.)

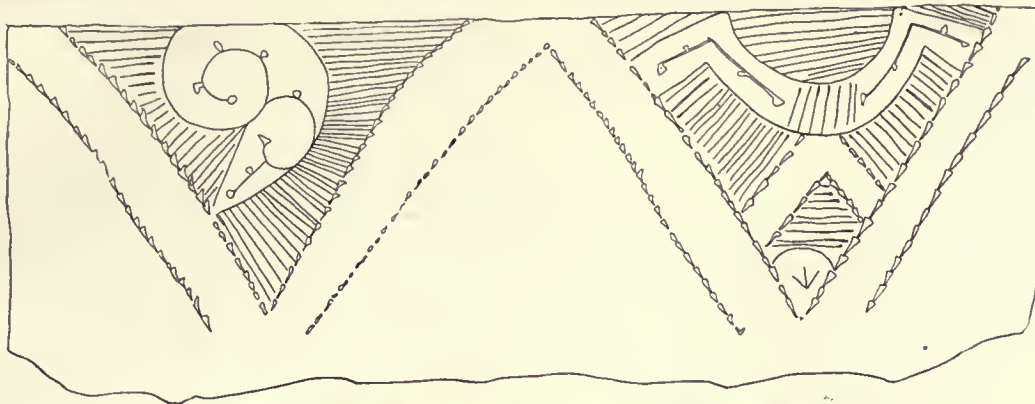


FIG. 257.—Vessel No. 11. Decoration. Hall mound. (One-third size.)



FIG. 258.—Vessel No. 12. Hall mound. (Half size.)



FIG. 259.—Vessel No. 12. Decoration. Hall mound. (One-third size.)



FIG. 260.—Vessel No. 13. Hall mound. (About three-fifths size.)

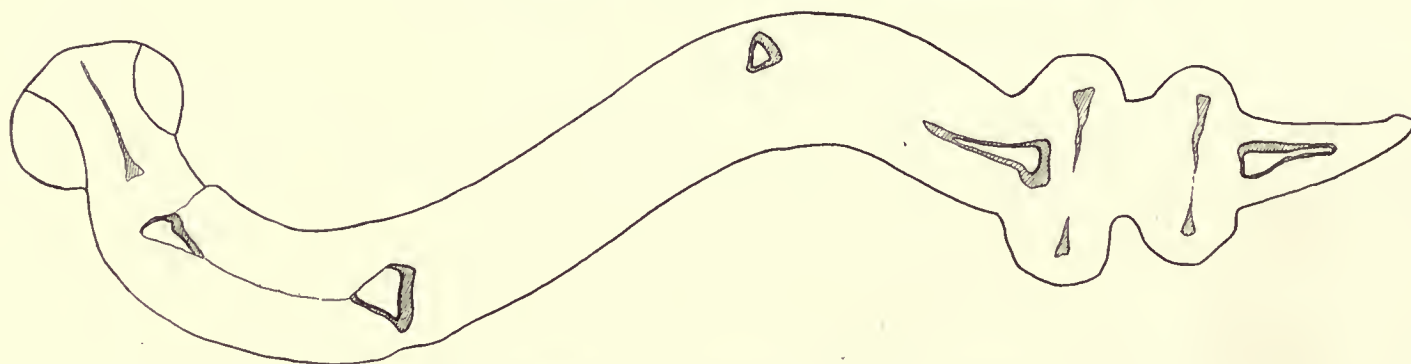


FIG. 261.—Vessel No. 13. Decoration. Hall mound. (Half size.)

which is sometimes depicted in aboriginal art,¹ yet, as we have stated, Professor Holmes has shown that the aborigines were not always consistent in their decorations. Hence the bird symbol in this case may have been used as an ornament solely. In the former part of this report, we spoke of the reverence shown the rattlesnake by Florida Indians, as recounted by William Bartram, and cited the statement by Captain Romans, when writing on Florida, that he had never seen a savage wittingly injure a snake. Adair speaks of the veneration of southern Indians for the serpent and we are told how the aborigines of the St. Johns river, Florida, treated with every mark of respect the head of a serpent cut off by a soldier of de Gourgues.²



FIG. 262.—Vessel No. 16. Hall mound. (Half size.)

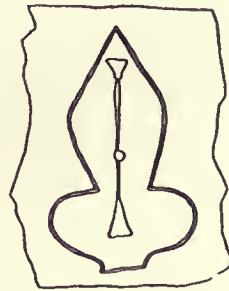


FIG. 263.—Vessel No. 16. Decoration. Hall mound. (Half size.)

Vessel No. 16.—A quadrilateral cup with rounded corners and curved rim. Part of the base, which has been flat, is missing (Fig. 262). The decoration shown in the half-tone is uniform throughout, save at one place, where a species of trefoil occurs (diagram, Fig. 263).

Vessel No. 17.—A vase of about six quarts capacity, of excellent yellow ware, having a carefully executed incised decoration as shown in Fig. 264. On the rim are four projections, perhaps rudimentary effigy-handles.

Vessel No. 20.—Another example of ready-made mortuary ware of the usual half-baked clay. In form the vessel is an inverted truncated cone having above it an effigy of a horned owl. The wings, broken in parts, when found, have been cemented, with missing portions restored. There are a ready-made perforation of base and triangular openings at various places in the body of the vessel (Figs. 265, 266).

Vessel No. 26.—This vessel, with imperforate flat base, fell with caving sand. In form the vessel is a truncated pyramid inverted. The rim, which has slight incised

¹ Two superb examples of the highly conventionalized plumed serpent were found by us engraved on vessels in a mound in Cooper's field, not far from Darien, Ga., and are described in our "Certain Aboriginal Mounds of the Georgia Coast."

² "La Reprinsse de la Floride," par le Capitaine Gourgues. Cited by Brinton.

decoration, projects somewhat inside and out. The decoration, incised, consists of series of parallel lines, three such series on one side, four on the side shown in Fig. 267. There are two perforations below the rim on the same side.

Vessel No. 27.—An imperforate compartment vessel which fell with caving sand, presumably from a superficial part of the mound. A central compartment rises above four surrounding ones (Fig. 268).

Vessel No. 28.—A vessel of 6 quarts capacity, quadrilateral with rounded corners and square imperforate base, slightly concave. The decoration consists of an incised encircling line below the rim. This vessel fell with Vessel No. 27.



FIG. 264.—Vessel No. 17. Hall mound. (Six-sevenths size.)



FIG. 265.—Vessel No. 20. Front view. Hall mound. (Six-sevenths size.)

Vessel No. 30.—Of eccentric form, undecorated (Fig. 269). Height, 8.8 inches; maximum diameter, 5 inches.

Vessel No. 32.—From near the surface came an interesting imperforate vessel having a large circular compartment raised above three others with a fourth com-



FIG. 266.—Vessel No. 20. Side view. Hall mound. (About seven-tenths size.)

partment missing. This vessel, we believe, has been a life-form, a semi-circular compartment at either side of the main one standing for wings, while a more pointed one behind indicates the tail. Unfortunately, the compartment representing the head is the missing one.



FIG. 267.—Vessel No. 26. Hall mound. (Half size.)

Vessel No. 35.—A cylindrical vessel of yellow ware of about 2 quarts capacity, the decoration consisting of an arrangement of zigzag bands and diamond-shaped figures (Fig. 270). Certain bands and the larger diamonds are the yellow color of the ware, while other bands and the smaller diamonds are colored crimson. This vessel somewhat recalls many others of the same shape recently found in southwestern United States.

Vessel No. 39.—A hemispherical body and constricted neck around which runs a band of complicated stamp decoration (Fig. 271).

Vessel No. 42.—A pot of about 3 quarts capacity, having a complicated stamp decoration as shown in Fig. 272.

Vessel No. 50.—Quadrilateral with square, imperforate base and constricted neck. Around the upper part of the body is a band of complicated stamp decoration about 1.5 inches broad. This vessel fell from near the surface in caving sand.

Vessel No. 53.—A vessel of solid yellow ware with flat imperforate base, with decoration consisting of designs each composed of three concentric triangles, the inner one in each case being deeply cut. There are two holes on opposite sides for suspension (Fig. 273).

Vessel No. 57.—A vessel of about 3 pints capacity, undecorated save for a graceful scallop around the rim.

Vessel No. 63.—Has three compartments as shown in Fig. 274. The ware is unusually heavy. This vessel, which is imperforate, came from caving sand in the causeway. Length, 8.5 inches; height, 1.7 inches.

Vessel No. 64.—An effigy of the human figure from the waist down, parts of which were missing when found, the remainder having been restored. This may have been an entire figure which, broken later, has had the irregular margin of the fracture smoothed down to allow the remainder of the vessel still to be of use (Fig. 275).

Vessel No. 65.—This bowl, of inferior ware, found badly broken in the causeway, is of interest in that it presents a combination consisting of a decoration in relief beneath the rim and a faint complicated stamp extending 2 inches farther below (Fig. 276).

With Burial No. 23, in a pit below the base, were two skulls at opposite sides

of the grave. With them was a large effigy of the head of a horned owl, colored crimson, broken from a vessel, no parts of which were present in the grave. The pointed horns have the inner portion excised (Fig. 277).

In Figs. 278, 279, 280 are shown three bird-head handles found unassociated in the mound.

In Fig. 281 is given part of a vessel from this mound which has had beautifully incised decoration, in part representing wings with the symbol of the bird. Side by side on the fragment, are two heads probably modelled after that of a vulture. The



FIG. 268.—Vessel No. 27. Hall mound. (About five-sixths size.)

bill of one, missing when found, has been restored. In the heads, which are hollow, are small objects which rattle when shaken.



FIG. 269.—Vessel No. 30. Hall mound. (Five-sixths size.)

The lower part of a vessel, from which certain parts were missing, badly broken, has been cemented together and proves to have belonged to a vessel in all probability similar to No. 13 from this mound. Around this fragment winds a rattlesnake in

relief whose body twists twice upon itself. Restored portions of the serpent are shown in broken lines (diagram, Fig. 282).

An effigy of the human head, in relief, covered with crimson paint, which has projected from the rim of a vessel, was found alone in the mound in the sand near the surface. No fragments were in association nor was any part of a vessel found later, from which it seemed that this head might have come. This fact is much to be regretted as the modelling of the head is excellent (Fig. 283). A part of one cheek and a portion of the nose received blows from a spade.



FIG. 270.—Vessel No. 35. Hall mound. (Four-fifths size.)



FIG. 271.—Vessel No. 39. Hall mound. (Half size.)



FIG. 272.—Vessel No. 42. Hall mound. (Half size.)



FIG. 273.—Vessel No. 53. Hall mound. (Half size.)



FIG. 274.—Vessel No. 63. Hall mound. (Five-sixths size.)



FIG. 275.—Vessel No. 64. Hall mound. (Half size.)



FIG. 276.—Vessel No. 65. Hall mound. (Two-fifths size.)



FIG. 277.—Handle of vessel. Hall mound. (About full size.)



FIG. 278.—Handle of vessel. Hall mound.
(About two-thirds size.)



FIG. 279.—Handle of vessel. Hall mound.
(About two-thirds size.)



FIG. 280.—Handle of vessel. Hall mound.
(Three-fourths size.)



FIG. 281.—Sherd. Hall mound. (Half size.)



FIG. 282.—Rattlesnake on sherd. Hall mound. (One-third size.)



FIG. 283.—Handle of vessel. Hall mound. (Full size.)

MOUND AT PANACEA SPRINGS, WAKULLA COUNTY.

This mound, in full view of the landing at the Springs, has a height of 4 feet and a basal diameter of 75 feet, approximately. It had been badly dug into before our visit.

It was examined by us with permission of Mr. Hall, owner of the large mound in the neighborhood.

Many trenches showed the mound to have been domiciliary in character. Except at one place, where, for a considerable area and depth, it was red from the action of a large and long-continued fire, the material of the mound was black, but not of the same character as the dark sand found with mortuary deposits in other mounds, this material being probably from low-lying ground nearby.

MOUND NEAR SPRING CREEK, WAKULLA COUNTY.

Spring creek runs into Oyster bay, a part of Apalachee bay. The landing on Spring creek is where the great springs, which give the creek its name, pour into it.

This mound, in hammock, on property of Mr. N. R. Walker of Crawfordville, Fla., is somewhat over one mile in a northeasterly direction from the landing at the springs in Spring creek.

The mound, in the form of a ridge, slopes gently upward from E. to W., attaining its greatest height, 8 feet, near the western end, after which the ascent is comparatively abrupt. The diameter of base, longitudinally, is 104 feet; transversely it is 68 feet. The mound, which was seemingly intact, had various deep depressions along its margin, whence sand had come for use in its construction.

Twenty-five men digging two days, first went through marginal parts without result of interest, and then gridironed the mound with trenches in all directions.

No general deposit of earthenware was met with and only nine burials were encountered. It was clear to us that many interments must have disappeared from the mound through decay since so few were met with, and also because a number of objects were found unassociated with human remains, but lying in pockets of dark-colored sand where presumably bones had been. Such objects included: an elongated, pear-shaped pendant; mica in a number of places, some sheets rudely given the outline of lanceheads; half of a gorget; two pendants and part of one, lying together; a slab of fossilized wood; and the usual quota of bits of chert, hammerstones, pebble-hammers and the like.

Near the margin was a rude, undecorated pot with the basal perforation. Parts of the rim were missing.

Near the surface, at different points, were two undecorated bowls, badly broken.

About 4 feet from the surface, at the western end, where the mound was highest, were two oblate spheroids of earthenware, evidently parts of the same vessel. The lower one, imperforate, is undecorated. The upper one has a neat, uniform design, the incised lines and punctate markings of which are filled with a yellow material as shown in Fig. 284. We cannot say to a certainty that the vessel was originally as

shown in the figure as the margins of the fracture had been carefully smoothed and offered no surface into which the parts could be fitted.

We shall give the burials in detail.

Burial No. 1.—A few crowns of human teeth, with two rude arrowheads; three bits of sandstone; one pebble, flat, oblong, with corners evidently artificially rounded; a rude smoking pipe of clay, of ordinary type.

Burial No. 2.—A few human teeth.

Burial No. 3.—Two small fragments of bone with two sheet-copper earplugs having central bosses in concave spaces. The reader will recall that with earplugs found by us in the mound at Huckleberry Landing were discs of pottery which, going back of the lobes of the ears, held the copper discs in place. Presumably discs answering the same purpose as the pottery ones, in this case, had been made of wood.

Burial No. 4.—Fragments of bone, with crowns of human teeth. With these were: a pebble; a bit of sandstone; an arrowhead or knife, of chert; a small fragment of some implement or ornament.

Burial No. 5.—A few fragments of human bones, with a chip of chert; an arrowhead or knife, of chert; a small curved knife and a lancehead, of the same material; and one pebble.

Burial No. 6.—Traces of bone, with two decayed bits of shell, a pebble and part of a shell drinking cup.

Burial No. 7.—Fragments of bone, with a coarsely-made smoking pipe; the lower half of a "celt"; a fragment of shell; a much decayed shell gouge; a double-pointed implement made from the columella of a marine univalve.

Burial No. 8.—Traces of bones, with an unevenly made pendant of ordinary type.

Burial No. 9.—A few bits of bone, with a soapstone smoking pipe of the usual shape; a pebble; a shark's tooth of the present geological period.



FIG. 231.—Vessel of earthenware. Mound near Spring Creek. (Full size.)

MOUND NEAR THE MOUND FIELD, WAKULLA COUNTY.

The mound, very symmetrical, was in hammock land on the border of cultivated ground known throughout the region as the Mound Field. The mound was about two miles in NE. direction from the landing on Spring creek, on property belonging to Mr. N. R. Walker, the owner of the Spring creek mound.

The mound had a height of about 9 feet above the surrounding level, though a measurement taken when the mound was in process of demolition, from the summit plateau to undisturbed sand at the base, gave an altitude of about 11 feet.

The outline of the base was circular, with a diameter of 61 feet. Across the the summit plateau was 15 feet. A graded way about 15 feet wide joined the mound on the west, making the slope less steep on that side than on the others. The length of the causeway before union with the margin of the mound was 18 feet.

There had been but little previous digging in the mound which, with the exception of a small portion under two great trees, was thoroughly leveled by us.

Burials were found in twenty one places only, all in the eastern half of the mound, and included the bunch, the single skull, and, on several occasions, two skulls lying side by side. All these burials but two were near the surface, and all were so badly decayed that no determination as to cranial flattening was possible. Two, from near the base, consisted of a bit of femur in one place and two decaying long-bones in another. As the mound throughout was composed of dark, rich, loamy sand and the undisturbed sand beneath was dark brown, we feared, in the early stages of the digging, that we might have passed over graves beneath the base, so few burials were met with. The comparative absence of burials in the body of the mound, however, and the fragmentary condition of those which were found, added to the fact that a great area of the base was dug through to sand unmistakably undisturbed, convinced us that burials were not being passed over. We believe that such burials as may not have been found in the mound and in graves below it, had disappeared through decay.

With the exception of a bit of femur which lay near a vessel of earthenware, perhaps belonging to a pottery deposit, no artifacts were found with the dead.

Four "celts" lay near the surface, singly, as did a lancehead of chert. There were also in the mound: a large, flat pebble used for smoothing; another flat pebble roughly chipped on two sides; mica in several places; and, together, a smoothing stone, a bit of sandstone and two rough chert arrowheads or knives.

Beginning in the eastern margin and extending to the center of the mound, along the base and just above it, was the usual deposit of earthenware.

In this deposit, fifty-eight vessels, all perforate but two or three, were noted, though many others, broken and scattered, must have escaped us. These vessels may be divided into five classes.

1.—Pots and bowls of ordinary form, mostly of moderate size or small, undecorated, the majority found broken or falling into bits on removal. This class outnumbered all the rest.

2.—Vessels of ordinary shape, with incised or punctate decoration, a small class

with roughly executed work of simple pattern. A sherd, however, of most excellent ware, equalling anything we have found to the westward, was met with by us, as was part of a bowl, bearing a duck's head in relief and a carefully executed symbolical design (Fig. 285).

3.—Vessels of fairly good ware, small, as a rule, with encircling bands of com-

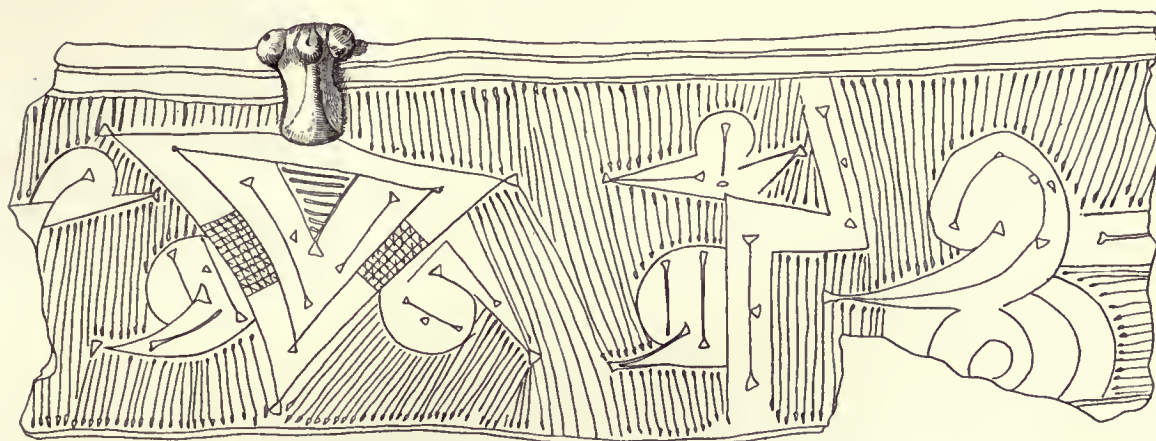


FIG. 285.—Sherd. Decoration. Mound near Mound Field. (Half size.)



FIG. 286.—Vessel No. 2. Mound near Mound Field. (Eight-ninths size.)

plicated stamp decoration below the rims. None of this class, ten in all, was found until that part of the base was reached which lay beneath the summit plateau. The decoration on most of these vessels had been executed with much greater care than was the case with the majority of those bearing this sort of decoration found by us



FIG. 287.—Vessel No. 7. Mound near Mound Field. (About two-thirds size.)

in other mounds and hence was more deeply impressed and lacked the confusion of design which arises from a double impression on parts of the decorated surface.

4.—This class was made up of vessels coated with crimson pigment, as a rule effigy-vessels, often of birds, and was of the ceremonial, or “freak,” variety with basal holes made before the baking of the clay and with perforations of various shapes made at the same time through the body of the vessel. This ware, whose destination was understood at the time of manufacture, and consequently was but half baked and most inferior, was recovered by us in masses of fragments only, some past restoration.



FIG. 288.—Vessel No. 27. Mound near Mound Field. (Two-thirds size.)

5.—Two effigy-vessels, of better ware than that of which the ceremonial vessels were made, did not belong to that class, as holes knocked through the bases after baking and absence of perforations in the bodies, clearly testified. The aborigines had devoted more care to ware destined for their own use than to that turned out for the service of others in the “happy hunting grounds.” Human nature is ever the same.

The following vessels merit particular description.



FIG. 289.—Vessel No. 29. Mound near Mound Field. (Five-sixths size.)

Vessel No. 2.—A vessel of about 2 quarts capacity, of solid ware, with decoration of lines of punctate markings, starting from the rim and converging around an undecorated, elliptical space at the base (Fig. 286). There are perforations for suspension, one at either side of the rim.

Vessel No. 7.—An interesting vessel of the ceremonial variety, covered with crimson pigment, found crushed to fragments. It has been cemented together, with restoration of the tail and a small part of the body (Fig. 287). Maximum diameter, 8.3 inches; height, 9.4 inches.



FIG. 290.—Vessel No. 31. Mound near Mound Field. (Five-sixths size.)

Vessel No. 10.—A bowl of about 1 quart capacity, a part of the rim missing, with decoration much resembling that on Vessel No. 5 from the Hall mound.

Vessel No. 16.—A pot having below the rim two parallel, encircling lines containing parallel, perpendicular lines, all very rudely executed.

Vessel No. 22.—Parts of a ceremonial vessel past restoration, as were a number of others in this mound.

Vessel No. 23.—A bowl of about 1 pint capacity covered with crimson paint inside and out.

Vessel No. 27.—A trilateral bowl with rounded corners, of about 6 quarts capacity, having a small bird-head looking inward. The decoration, which includes the bird-symbol, consists of the two designs shown in the half-tone (Fig. 288) thrice repeated, with but slight modifications.

Vessel No. 29.—A ceremonial vessel with rounded base in the center of which is the usual ready-made perforation. There are also openings around the body. Vertically from the rim rises the head of an owl, from which the beak and part of an ear have scaled away (Fig. 289).



FIG. 291.—Vessel No. 33. Mound near Mound Field. (Half size.)



FIG. 292.—Vessel No. 36. Mound near Mound Field. (About two-thirds size.)

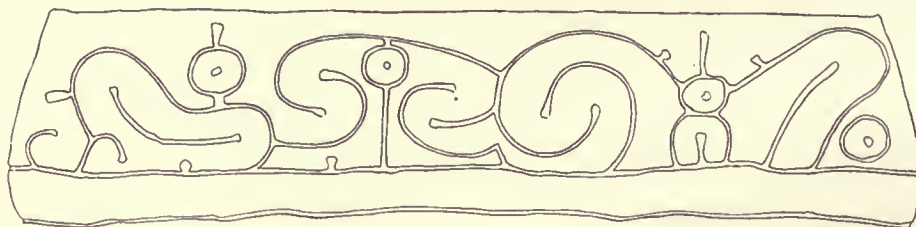


FIG. 293.—Vessel No. 36. Decoration. Mound near Mound Field. (One-third size.)



FIG. 294.—Vessel No. 37. Mound near Mound Field. (About two-thirds size.)



FIG. 295.—Vessel No. 39. Mound near Mound Field. (About four-fifths size.)



FIG. 296.—Vessel No. 42. Mound near Mound Field. (About five-sixths size.)

Vessel No. 30.—A bowl of about 1 quart capacity, decorated with crimson pigment, with bird-head at one end and conventional tail at the other. The wings are somewhat in relief and are farther indicated by incised lines and certain portions left free from the coloring of the rest of the vessel, showing the yellow ware. Part of the bill is missing. A hole has been knocked through the base.

Vessel No. 31.—Of about 2 quarts capacity, of solid ware but rather carelessly made, having eight *repoussé* ridges of irregular shapes and sizes around the body. The outside is covered with crimson pigment. A hole has been knocked through the base (Fig. 290).



FIG. 297.—Vessel No. 44. Mound 1 near Mound Field. (Five-sixths size.)

Vessel No. 33.—Is of rather coarse ware, with a small bird seated on one side. There has been a certain amount of restoration (Fig. 291).

Vessel No. 36.—The upper part of a vessel of superior ware, shown in Fig. 292, heart-shaped in section, showing traces of crimson pigment, on the outside. The lower part of the vessel was vainly sought by us. The incised decoration is shown diagrammatically in Fig. 293.



FIG. 298.—Vessel No. 45. Mound near Mound Field. (Four-fifths size.)

Vessel No. 37.—This interesting vessel consists of a sphere flattened on one side, on which is placed an effigy of a horned owl. There is a perforation in the base, made before baking (Fig. 294). Height, 11.4 inches; maximum diameter, 10 inches.

Vessel No. 39.—A vessel of about 2 quarts capacity, with complicated stamp decoration around the neck (Fig. 295).

Vessel No. 42.—A vessel of good, solid ware, with complicated stamp decoration on the neck (Fig. 296).

Vessel No. 44.—An effigy-vessel of about 2 quarts capacity, representing an animal, probably a deer, judging from the horns, the cloven hoofs and the short tail. The hind-legs are *repoussé*, while the fore-legs, slightly *repoussé*, were made by the addition of material pressed upon the surface. There is crimson pigment inside and out. There are two holes for suspension and one knocked through the base. There has been a certain amount of restoration (Fig. 297).

Vessel No. 45.—An effigy-vessel representing a horned owl with head and tail protruding, and *repoussé* wings. The vessel has been decorated with crimson pigment, while on the wings are perpendicular, incised lines filled with light-colored



FIG. 299.—Vessel No. 45. Mound near Mound Field. (Four-fifths size.)

material (Figs. 298, 299). This vessel does not belong to the ready-made mortuary class as a hole has been broken through the base after completion of the vessel. Height, 8 inches; maximum width, 10.5 inches.

Vessel No. 47.—A bird-efigy vessel with incised decoration on wings, tail and back. The head is missing through an early fracture. This vessel was made with open base (Fig. 300):

Vessel No. 50.—A cup of about 1 pint capacity with clearly defined complicated stamp decoration (Fig. 301).



FIG. 300.—Vessel No. 47. Mound near Mound Field. (Eight-ninths size.)



FIG. 301.—Vessel No. 50. Mound near Mound Field. (Half size.)



FIG. 302.—Vessel No. 55. Mound near Mound Field. (One-third size.)



FIG. 303.—Vessel No. 56. Mound near Mound Field. (About eight-ninths size.)

Vessel No. 55.—A handsome bowl of excellent yellow ware, of about 3 gallons capacity, with encircling band of complicated stamp decoration, below the rim, which, of unusual shape, bears incised decoration (Fig. 302).

Vessel No. 56.—Has a distinct complicated stamp below the rim (Fig. 303).

There was in this mound part of a vessel of excellent ware carefully smoothed,

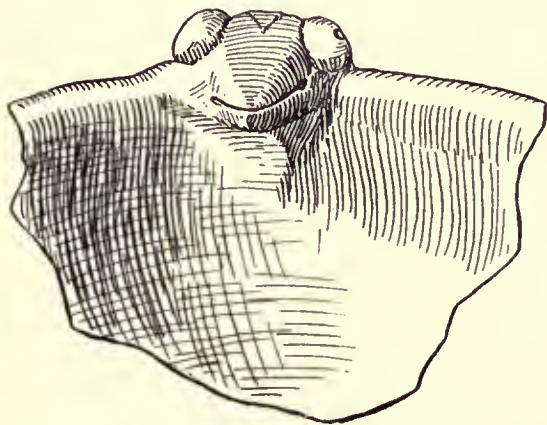


FIG. 304.—Sherd. Mound near Mound Field.
(Full size.)



FIG. 305.—Sherd. Mound near Mound Field.
(Three-fourths size.)

which, on the outside, has well executed incised decoration and the head of a duck in relief. A curious feature of this head is that a part of it, projecting inward, has been given a mouth, which, taken in conjunction with the rear portion of the eyes belonging to the head in front, gives the appearance of the head of an animal (Fig. 304).

A part of a ceremonial vessel, found alone, has a highly conventionalized bird's head (Fig. 305).

MOUND NEAR ST. MARKS, WAKULLA COUNTY.

This mound is about 2 miles in a northeasterly direction from the light-house at the mouth of the St. Marks river, on ground formerly cultivated, the property of Mr. William Harrell, of St. Marks, Fla.

The mound is on an extensive ridge erroneously believed by many to be artificial. There are considerable shell deposits in the neighborhood. The mound, circular in outline, 3 feet high and 40 feet across the base, had been subjected to but little previous digging. It was totally demolished by us.

Though the sand was dryer than that usually met with in mounds of this section, yet human remains were found by us in the mound but once, a bunch in the eastern margin. Presumably a number of others had disappeared through decay.

In two places was much sand dyed with hematite.

Unassociated were two "celts" found separately, several sheets of mica, and a

few pebbles. Three shell drinking cups, all perforate, lay with the earthenware deposit.

At the eastern edge of the mound began a deposit of earthenware, the usual sherds, large fragments and whole vessels, placed here and there in black sand along the base, through an area about 8 feet across, and continuing well in toward the center. Among the sherds the check stamp was represented, and various forms of punctate impressions as well as carefully incised work. Neither on sherd nor on vessel did the complicated stamp appear, which probably accounts for the considerable number of interesting vessels present in so small a mound.



FIG. 306.—Vessel No. 2.—Mound near St. Marks. (Half size.)

Vessel No. 2.—A quadrilateral vessel of about 1 quart capacity, with rounded corners. The decoration is made up of punctate lines, and incised lines on the rim. On each of two opposite sides of the opening is a hole for suspension (Fig. 306).

Vessel No. 3.—A bowl with incised and punctate decoration included in four designs around the upper part of the vessel, with undecorated spaces between. The larger are almost identical, as are the smaller. One of each is shown dia-

grammatically in Fig. 307. Maximum diameter, 11.5 inches; height, 8.4 inches.

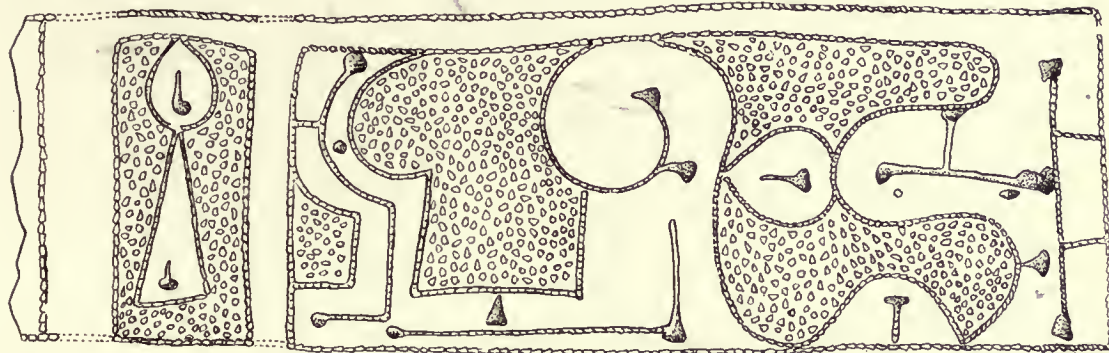


FIG. 307.—Vessel No. 3. Decoration. Mound near St. Marks. (Half size.)

Vessel No. 4.—A bowl of about 1 gallon capacity, of yellow ware, badly discolored, as were all vessels from this mound, with incised and punctate decoration almost identical on opposite sides (Fig. 308).

Vessel No. 6.—A four-lobed vessel with square aperture, shown in Fig. 309, having incised and punctate decoration almost identical on two opposite lobes, the remaining two being undecorated. There are holes for suspension.



FIG. 305.—Vessel No. 4. Mound near St. Marks. (Nine-tenths size.)

Vessel No. 7.—A bowl of about 3 quarts capacity, with inverted rim on which are two small protuberances probably indicating heads. There are two designs, almost similar, with a smaller one between. One of the larger and the small one are shown diagrammatically in Fig. 310.

Vessel No. 8.—A large undecorated bowl of heavy ware, with considerable thickening at the rim.

Vessel No. 9.—A vessel originally with five circular compartments, the central one above the rest. One compartment is missing. This vessel came from the western part of the mound, alone.



FIG. 309.—Vessel No. 6. Mound near St. Marks. (Eight-ninths size.)



FIG. 310.—Vessel No. 7. Decoration. Mound near St. Marks. (One-third size.)

Vessel No. 10.—This four-sided vessel of about 3 pints capacity, of yellow ware, deeply stained, has incised and punctate decoration consisting of four designs, all alike, on the corners and, on two sides, similar designs, one of which is shown in the half-tone (Fig. 311). The decoration is deeply stained and obscured. On two sides are heads of birds in relief, presumably of the ibis. Formerly the pink ibis, now



FIG. 311.—Vessel No. 10. Mound near St. Marks. (About full size.)

almost exterminated in Florida, was well known there and must have contributed largely to the head-dress of the warriors. At Stowe island, where the Sisters' creek enters the St. Johns, near the mouth of the river, were found, in the spring of 1895, in the great shell-heap which was then being removed, human bones with large pink feathers in association, which probably belonged to the pink ibis. We inspected this discovery in person.

Vessel No. 11.—A four-lobed vessel of red ware, of about 2 quarts capacity. Two of these lobes have each three semi-circular, parallel lines, while one has four. Under these lines, on one lobe, is additional decoration (Fig. 312).



FIG. 312.—Vessel No. 11. Mound near St. Marks. (One-third size.)

Vessel No. 12.—A small undecorated bowl which came from the northern part of the mound, apart from the pottery deposit.

Vessel No. 13.—A quadrilateral bowl holding somewhat over 1 quart, having crimson pigment inside and out. The four corners of the rim project upward nearly one inch.

Vessel No. 14.—A four-lobed vessel found in fragments.

Vessels from this mound had the basal perforation.

MOUND NEAR THE AUCILLA RIVER, TAYLOR COUNTY.

This mound, on property of Mr. B. F. Lewis, of Monticello, Florida, is in sight of the river, on the right hand side going up, about 2.5 miles from the mouth. A small stable of logs, with an enclosure in front, covers a part of the mound, beginning at the margin on the north side and extending well in to the summit plateau. The mound had been much worn by the trampling of animals, and probably by wash of water, as in time of freshet it is said to be the only place of refuge for stock in the vicinity. The height of the mound, at present, is 6.5 feet, though at one time it must have been considerably greater. The diameter of the base, 64 feet, has been



FIG. 313.—Handle. Mound near the Aucilla river.
(Three-fourths size.)



FIG. 314.—Vessel No. 1. Mound near the Aucilla river.
(Full size.)

increased at the expense of the height. Over the surface of the mound, lying loose or half imbedded in it, are masses of lime rock, varying in size from that of a human head to irregular masses perhaps 1 foot by 2 feet by 1 foot. This lime rock is found off the shallow Florida coast, beginning east of St. Marks and in the small rivers which enter the Gulf, in that district.

As it was not our purpose to injure this place of refuge, our investigation was chiefly devoted to the eastern part of the mound, though other parts were accorded due attention.

The mound was curiously constructed, being made in the upper parts of clayey

sand, black and tenacious, probably from adjacent swamps. Below this, varying from 1 to 2 feet in thickness, was a stratum of clay more densely packed as it approached the center, until, under the summit plateau, the removal necessitated the use of a mattock or of a grubbing-hoe.

Throughout that part of the mound investigated by us, sometimes near the base, but usually not far from the surface, were scattered masses of lime rock similar to those we have described. These masses, as we shall see, often accompanied burials, but sometimes they lay unassociated with human remains.

During our work, seventeen burials, much decayed, were met with in various parts of the mound. Of these, fourteen burials were near the present surface of the mound and three flexed burials, unaccompanied by rocks, lay almost on the base. Of the superficial burials, eight were bunched, lying under masses of rock, and four were of the same class of burial, without rocks. One flexed burial lay beneath rocks, while two skulls, together, were surrounded by them.



FIG. 315.—Vessel No. 3. Mound near the Aucilla river. (Nine-tenths size.)

With the exception of several bits of chert, no artifacts lay directly with the dead. Somewhat apart from them, separately, were: one chert arrowhead or knife; a lancehead or dagger, of chert, 4.5 inches long; many chips of chert, scattered here and there; several perforated shell drinking cups. These cups lay with the pottery deposit and probably were considered mortuary vessels.

At a short distance from the margin of the mound, in the eastern part as usual, began a small deposit of earthenware with the usual sherds and portions of vessels. The sherds, in the main, were of excellent quality. The check stamp was represented but once or twice. There were also the effigy-head of a dog (Fig. 313) and

one of an owl. Two large loop-shaped handles also were present. There was basal perforation in each entire vessel found by us.

The deposit lay along the base and numbered fourteen vessels or large parts of vessels. When our work was discontinued the deposit seemed to be ending and the fact that such vessels as might be found would lie in solid clay on which a mattock was used of necessity, rendered the ending of our work less of a disappointment.



FIG. 316.—Vessel No. 7. Mound near the Aucilla river. (About full size.)

Vessel No. 1.—A neat little cup with octagonal rim and carefully executed incised and punctate decoration, one-half of which, shown in Fig. 314, is duplicated on the opposite side.

Vessel No. 2.—Has a band of complicated stamp decoration below the rim.

Vessel No. 3.—A bird-effigy vessel of excellent ware, showing traces of decoration with crimson paint. There is also an incised and punctate design representing a wing, on either side, and markings on the tail. The head represents that of a



FIG. 317.—Vessel No. 8. Mound near the Aucilla river. (Four-fifths size.)

turkey or a turkey-buzzard. In it are objects which rattle when shaken. There are two holes for suspension (Fig. 315). Diameter of body, 4.5 inches; height, 3.3 inches; length, 8.2 inches.

Vessel No. 5.—An undecorated bowl of yellow ware, of about 1 quart capacity. The base is flat.

Vessel No. 7.—A compartment vessel of inferior ware, with a small circular compartment near the center, surrounded by three others, two of which are oval in outline, the other, crescentic (Fig. 316). This vessel may represent a face with eyes, nose and mouth.

Vessel No. 8.—This impressive looking bird-effigy vessel, with head disproportionately small, and extended wings (Fig. 317) has incised and punctate decoration on the tail, shown diagrammatically in Fig. 318. Length, 11 inches; breadth, 12 inches; height, 8 inches;

Vessel No. 10.—This asymmetrical vessel of four compartments, has had three

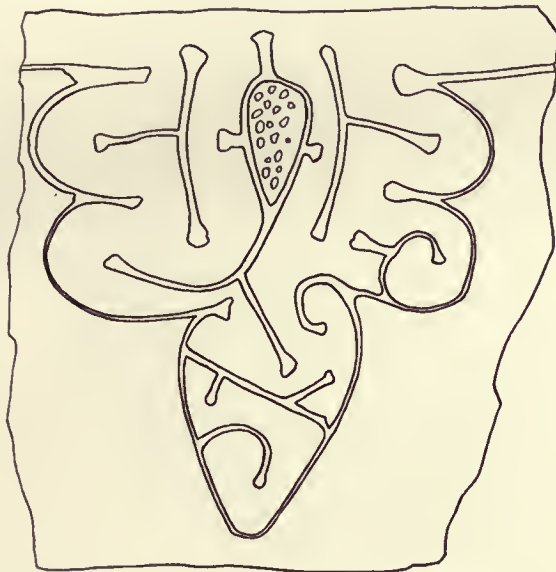


FIG. 318.—Vessel No. 8. Decoration of tail. Mound near the Aucilla river. (Half size.)

compartments in line, the central one square and raised somewhat above the other two, one of which has a curved margin. The other has a large portion missing (Fig. 319). The fourth compartment has the outline of a spread wing and would lead us to suppose that this was a compartment effigy-vessel, were a similar wing on the opposite side, but none is, or has been, there. Nevertheless, the vessel may be of the class we speak of, since the aborigines were not always consistent. In a low mound near Jacksonville, Florida,¹ we found a vessel with five compartments, which unquestionably represents a bird. The head, body, tail and wings are clearly outlined, yet the open wings point in opposite directions.

Vessel No. 11.—Somewhat over one-half of a vessel which had been made up of two hemispherical cups of solid ware, each of nearly one pint capacity. The part found by us was imperforate.

Vessel No. 14.—A large pot with complicated stamp decoration, badly broken. Immediately above it lay a mass of lime rock. We carefully examined the interior of this vessel for human remains, but found none. As a similar mass of rock lay beside the pot it is probable that the presence of the two masses was accidental.

¹ "Additional Mounds of Duval and of Clay Counties, Florida." Privately printed, Phila., 1896, pg. 13, Plates I and II.



FIG. 319.—Vessel No. 10. Mound near the Aucilla river. (Three-fourths size.)

MOUNDS NEAR THE ECONFENEE RIVER, TAYLOR COUNTY.

About 200 yards in the hammock, in a northerly direction from the "fish-camp," which is about 3 miles up the Econfenee river, on the left hand side, going up, is a mound 3.5 feet high and 50 feet across the base. This mound, the only place of refuge for stock, from the water of storm tides, was occupied by a family who had erected a small house on a portion of the western part and an out-door kitchen on part of the eastern side.

The mound was carefully trenched, with the exception of the part on which the house stood, digging being carried on within the kitchen.

The mound, of white sand, yielded nothing in the way of artifacts with the exception of a pebble-hammer, an arrowhead or knife and several bits of chert.

In the western slope was a burial consisting of a skull and, at a short distance, the lower part of a skeleton with the feet, however, turned toward the skull. As the skull was small and the other bones were small and delicate, it is likely all belonged to the same individual.

About 1 mile farther up the river and 50 yards in, from the left bank going up, approximately, on the edge of hammock land was a mound 2 feet high and 32 feet across the base. Thorough trenching yielded nothing beyond a few masses of lime rock in the center of the mound.

MOUNDS NEAR THE WARRIOR RIVER, TAYLOR COUNTY. MOUND A.

These mounds, on property belonging to the East Coast Lumber Co., Watertown, Fla., John Paul, Esq., President, were in dense undergrowth near a tract formerly under cultivation, known as the Pope Field. This field is about 2.5 miles in an easterly direction from the mouth of the Warrior river and 300 yards distant, approximately, from the south side of the stream.



FIG. 320.—Vessel No. 2. Mound A, Warrior river. (About three-fourths size.)

Mound A, the more northerly, with a circular basal outline, had a diameter of 65 feet. Its height above the general level was 9.5 feet, though deep excavations along the margin, gave an appearance of considerably greater altitude.

On the surface of the mound, especially on the eastern and southern parts, beneath which most of the earthenware and burials lay, were slabs and thick masses of lime rock, water-worn, doubtless brought from the neighboring stream. Subsequently, when the mound was completely demolished, similar masses were found



FIG. 321.—Vessel No. 3. Mound A, Warrior river. (Eight-ninths size.)

here and there somewhat below the surface. These masses were often much larger than those described as being in the mound near the Aucilla river.

Mound A was of yellow sand except where pottery deposits lay, where it was much darker in color.

Human remains were found twenty-nine times and, as some of the burials were badly decayed, it is possible that others had entirely disappeared. As usual, there were present the bunch, the flexed burial and the lone skull. A few burials, falling in caved sand, did not afford data as to their form.



FIG. 322.—Vessel No. 4. Mound A, Warrior river. (About five-ninths size.)

Of the twenty-nine burials, many of which were on or near the base, nine lay immediately beneath the rocks, but in each case these burials were superficial, the least so being an interment 3.5 feet deep, almost in the middle of the summit plateau, around which had been many masses of rock, instead of the customary two or three. This burial had been disturbed by the only previous digging in the mound, a hole 4 by 2 by 6 feet deep, which had cut away part of the skeleton. In addition to this case, those under rocks, in this mound, were two bunched burials; two flexed burials; two skulls together; two skulls with long-bones, together; a lone skull; and bones which fell in caved sand.

No skulls were saved from this mound, but certain ones permitted determination as to the existence of cranial compression. None was evident.

With one burial was a "celt;" with another, a flat rectangular gorget, probably

of fine-grained, garnetiferous schist, 1.1 inches broad by 3 inches in length, having two perforations. An arrowhead or knife, of chert, lay with a vessel of earthenware, and three perforated shell drinking cups were found in the line of the earthenware deposit. These, exclusive of earthenware, were the only artifacts noted by us in the mound, the usual bones, hammers and the like, not being met with.

Near the margin, on the north side, a vessel covered with crimson paint was found, crushed to bits.

Soon after the digging was begun, S. by E. in the mound were found a number of sherds, all of excellent ware and some with interesting and carefully executed incised decoration. No vessels, however, were found until a point had been reached about 10 feet in from the margin, where the sherds had been, when four vessels were found together. About 2.5 feet distant was a burial, which, however, we do not connect directly with the earthenware, since these vessels, as we have said, presumably belonged to the general deposit. This deposit lay on, or near, the base.

After these four vessels, for a period, none was met with, but later, as the digging progressed, others were encountered in ones and twos until the central portion of the mound was reached where were a considerable number, singly, here and there.

While the vessels in this mound were all of superior ware, with the exception, of course, of the ceremonial or ready-made mortuary ones, where excellence of material is not looked for, a point was markedly noticeable in this mound, as it had been in nearly all others of this district, namely, that the best and most interesting vessels are found among the first, and, therefore, must have been placed on the outskirts of the general deposit. Almost invariably, undecorated vessels or vessels bearing the complicated stamp, lie thickest toward the center, while interesting pieces, which called for care and individuality in execution, are found among the first when the pottery deposit is reached.

Twenty-four vessels came from this mound, of which the following offer features of interest. All not otherwise described have the basal perforation.

Vessel No. 1.—A flattened hemispherical vessel, badly crushed, with crimson paint for its only decoration.

Vessel No. 2.—An interesting bowl having the extended head of a vulture with a conventional tail, opposite it and, on either side, a wing in relief. Curiously enough, this vessel, which is of the ready-made mortuary variety, is imperforate as to the base, but has three round holes on either side of the body (Fig. 320). Maximum diameter, 12.5 inches; height, 5.5 inches.

Vessel No. 3.—A human-effigy vessel, found broken into fragments, with portions missing. There are two small holes front and two back for suspension and a hole knocked through the bottom of one leg. Part of the face, with the nose, has been restored (Fig. 321). Height, 11 inches; width, 6.7 inches; thickness, 4.3 inches.

Vessel No. 4.—A bird-effigy vessel of the ceremonial variety, with head thrust forward, and a conventional tail. The wings, which are in relief, have three perforations made before baking and there is also a basal perforation made at the same time.

A portion of the beak is missing owing to the scaling off of small fragments, a frequent occurrence in vessels of this inferior, mortuary ware (Fig. 322). Diameter of body, 8 inches; height, 6.5 inches.



FIG. 323.—Vessel No. 8. Mound A, Warrior river. (Two-thirds size.)

Vessel No. 5.—A vase with pinched decoration around the neck.

Vessel No. 7.—A vessel of yellow ware, somewhat stained, so exactly resembling a gourd that a countryman visiting the mound, believed it to be one containing water for the men.

Vessel No. 8.—A vessel of thick ware, decorated with crimson paint on the upper portion, is surrounded by seven projections. Above these are four designs, all similar, each including a vertical bird symbol. These designs are connected by

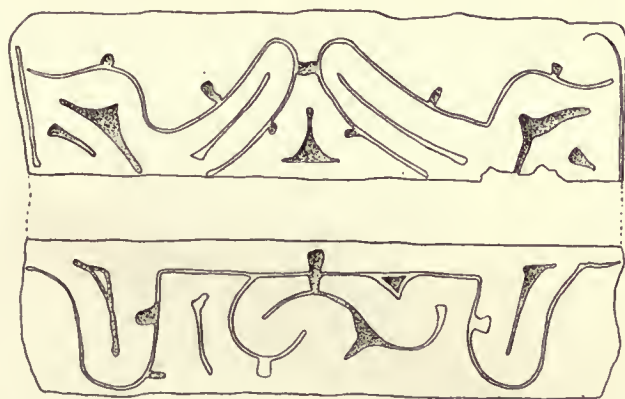


FIG. 324.—Vessel No. 13. Decoration. Mound A, Warrior river. (Half size.)



FIG. 325.—Vessel No. 20. Mound A, Warrior river. (Two-fifths size.)



FIG. 326.—Vessel No. 22. Mound A, Warrior river. (Full size.)



FIG. 327.—Vessel No. 23. Mound A, Warrior river.
(Half size.)



FIG. 328.—Handle. Mound A, Warrior river.
(About two-thirds size.)

punctate markings (Fig. 323). This vessel, whose capacity is about 1 quart, is a highly conventionalized life-form, the knobs representing projecting organs.

Vessel No. 9.—A large pot with complicated stamp decoration, in fragments.

Vessel No. 10.—A small imperforate vessel with quadrilateral body, flat base and round upright neck encircled by a complicated stamp decoration.



FIG. 329.—Sherd. Mound A, Warrior river.
(Two-thirds size.)

Vessel No. 11.—An undecorated gourd-shaped vessel of yellow ware, with a small perforation in the side in addition to the usual one in the base. This vessel, of unusual size to find intact, was recovered by us from the mound without injury. Maximum diameter, 14.8 inches; height, 14.3 inches.

Vessel No. 12.—A large pot bearing the complicated stamp, found in fragments.

Vessel No. 13.—A bowl of about 1 quart capacity, with a rim turned inward and upward, bearing incised animal symbols,

including the fore-legs and hind-legs, as shown diagrammatically in Fig. 324, where the distance between the two designs on the vessel is ignored.

Vessel No. 14.—A small undecorated vessel, lenticular in longitudinal section.

Vessel No. 18.—A much flattened sphere with high neck, slightly flaring, around which is complicated stamp decoration.

Vessel No. 20.—A pot bearing a clearly impressed complicated stamp (Fig. 325).

Vessel No. 22.—A handsome vessel of excellent ware, highly polished, of somewhat less than 1 quart capacity. The decoration, raised and incised, may be highly conventionalized fore-legs and hind-legs (Fig. 326).

Vessel No. 23.—Is undecorated, imperforate, of about 1 quart capacity (Fig. 327).

Fig. 328 shows an animal head which has served as a handle for a vessel.

A complicated stamp decoration is given in Fig. 329.

MOUNDS NEAR THE WARRIOR RIVER, TAYLOR COUNTY. MOUND B.

This mound, in thick hammock, about 200 yards in a southerly direction from Mound A, was of irregular outline, with major and minor diameters of 76 feet and 54 feet, respectively. Its height was about 7 feet. There were great excavations in places around the margin, whence sand for the erection of the mound had come.

There had been no previous digging.

Owing to the marginal excavations to which we have referred, it was impossible to determine, from its appearance, just where the mound began, therefore twenty men were placed around it in a circle whose diameter exceeded that of the mound,

and trenches, each about 3 feet across, were continued in the direction of the center until the exact margin of the mound was located.

Contrary to the usual course of events in our work in this district, when the trenches had gone 2 or 3 feet into the mound, earthenware vessels were met with in the western and southern parts. These vessels were not accompanied by sherds and did not lie together in a deposit, but had been placed here and there, singly.

After this discovery, the trenches in the western half of the mound were joined and the total demolition of that part of the mound began.

Shortly after this junction of the trenches on the western side, the trenches in two-thirds of the eastern side were joined and continued until the mound was dug down.

Not until the trenches had gone a distance of 22 feet into the remaining third of the eastern part, was anything of interest met with, when the discovery of a vessel of earthenware, caused the union of the remaining trenches.

Soon after the first junction of the trenches, that is 2 or 3 feet in from the margin, burials were met with in the W., NW. and SW. outskirts of the mound and, later, in part of the eastern portion. While burials were met with here and there in the parts of the mound we have referred to, none was found in the remaining portion of the eastern part until the center of the mound had almost been reached.

In all, thirty-five burials were counted by us, the majority in small bunches, though solitary skulls were present and, rarely, two skulls together.

The flexed burial was not noted.

Neither in our field notes, where the burials are described one by one, nor in our amplified notes, always written immediately at the end of the investigation of the mound, do we find any reference to cranial compression in connection with the burials in this mound. Neither do we recall the discovery of any cranial flattening, and it is our belief that none was met with.

The sand in this mound was not discolored in any way. It was remarkably dry and caved readily. On the surface lay a single mass of lime rock, and in the mound were a few similar masses unassociated with burials, while twice only, burials lay beneath them. A few oyster-shells were with two other burials, but not in the way we have noted in places to the westward where masses of shells lay over bones.

With one burial was sand colored with hematite. Another burial lay near three vessels of earthenware, while mica and a pebble lay together with human remains.

Unassociated with human bones, together, were: four pebble-hammers; two flat pebbles; eight chips of chert; seven very rude arrowheads or knives, of the same material, three with points missing.

In another place where no bones were met with, though they may have disappeared through decay, were: a long flake, intended for a knife; an arrowhead or knife; another with the point missing; a small knife with curved edge. All these were of chert.

There were also in the mound: a large tooth of a fossil shark, showing no

mark of use in a handle; a large slab of ferruginous sand-stone; a lancehead of chert, 4 inches long and nearly 3 inches in maximum diameter, so rudely made that it would seem that mortuary deposits of inferior quality, made expressly for the dead, were not confined to vessels of earthenware.



FIG. 330.—Object of kaolin. Mound B, Warrior river. (About five-sevenths size.)

We have referred to a curious object of impure kaolin, found by us in the mound near Porter's bar. An object exactly similar in shape, carefully smoothed and enlarged at either end, about 9.5 inches long, was present in this mound. It, also, has suffered through the chipping off of portions, but not to the same extent as had the other (Fig. 330). As is the case with the other, traces of decoration in low relief are visible in places. This curious object, the second found, would seem to belong to a class perhaps of ceremonial batons. It is certain that a material so soft could not have been chosen for any practical use. Dr. H. F. Keller, to whom a part of the object was submitted for analysis, writes: "It consists of an intimate mixture of kaolin and finely-divided silica. The constituents are silica, alumina, oxide of iron, moisture, and traces of magnesia. A rough determination of the silica yielded 75%, which is 27% in excess over the amount present in pure kaolinite. The proportion of iron, too, is considerable. Under the lens the powdered substance appears quite homogeneous, but under higher powers it shows crystalline particles of two kinds, as well as dark specks."

There was also in the mound a rectangular mass, seemingly of clayey material, with rounded corners and a small groove at either end, about 6 inches long.

The earthenware in this mound did not lie in black sand, nor was there any general mortuary deposit, four vessels together in the southern margin being the nearest approach to one.

The ware, in marked contrast to that of the neighboring mound, was of poor quality and undecorated or bore the complicated stamp, as a rule. Incised decoration was encountered in three instances only, among the forty vessels noted by us,

and in each case the work was unambitious and careless in execution.

The features of the earthenware in this mound were the large number of vessels with inturned rims and, consequently, comparatively small openings; and the unusual percentage of imperforate bases present, no less than 22 of these being included among the 42 vessels met with, and others badly broken, may have been imperforate also. Marginal vessels, as a rule, were perforate; of the first twelve vessels found, but one had the base intact. Most of these vessels came from the south and southeastern margins and perhaps were in place of a general deposit.

In this mound were no ceremonial vessels and, consequently, no basal perforation made previous to baking.



FIG. 331.—Vessel No. 4. Mound B, Warrior river. (Nine-tenths size.)

The following vessels are worthy of particular notice, those omitted being, as a rule, undecorated or bearing the complicated stamp in well known patterns.

Vessel No. 4.—Of about 1 pint capacity, with horizontal ears extending one from either side, beneath the rim. There is roughly incised decoration (Fig. 331). There is a basal perforation.

Vessel No. 5.—Of red ware, undecorated, with cylindrical body, rounded base and upper end constricted to form a small opening. This vessel, of about 1 quart capacity, fell into many pieces on removal.

Vessel No. 7.—Has the base and lower part of the body knocked out, in performance of the customary mutilation. This vessel, of about 3 pints capacity, has

the upper part turning inward and upward, about 1.5 inches, forming an aperture of about 2.5 inches (Fig. 332). The decoration, incised, the only example in the mound not subsidiary, is shown diagrammatically in Fig. 333.

Vessel No. 11.—A small bowl with flat base and clearly defined complicated stamp decoration (Fig. 334).

Vessel No. 14.—Considerable parts of a bowl of yellow ware, in fragments,



FIG. 332.—Vessel No. 7. Mound B, Warrior river. (Five-sixths size.)

having as decoration lines, triangles and circular markings, all in black pigment. This is the first example, we believe, of the use of black paint on earthenware found during our mound work, though, as the reader is doubtless aware, this form of decoration was in vogue among the aborigines in various parts of the country. Portions of this vessel were found scattered over an area of about 4 feet by 12 feet, showing that the individual having in charge the immolation of the vessel, went at the work with a will.

Vessel No. 16.—Of about 1 gallon capacity, undecorated and rounded at either end (Fig. 335).

Vessel No. 17.— A most interesting vessel of heavy red ware, with five compartments, consisting of a circular, central compartment raised above the level of the rest, with two truncated, triangular ones on opposite sides and two triangular ones on the remaining sides. Projecting from the end of one compartment is the head of a bird, decorated on the upper side only. The opposite end, the tail, unfortunately, is missing. On the body of the vessel the bird-symbol appears in many places (Fig. 336). This vessel, the central part of which was filled with charcoal, and a compartment on either side, with sand blackened by fire, would seem to be a connecting link between the com-

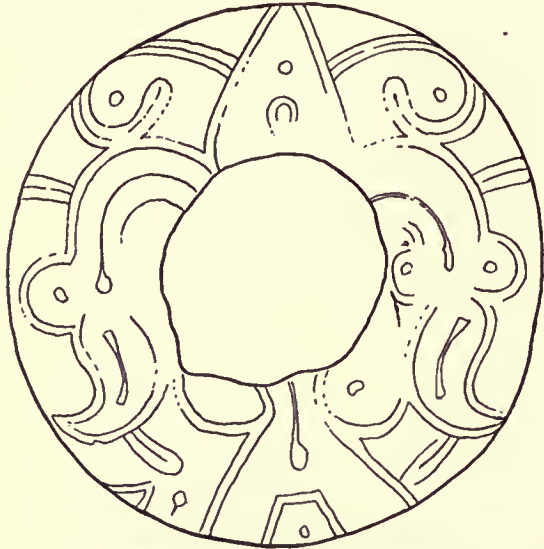


FIG. 333.—Vessel No. 7. Decoration. Mound B, Warrior river. (Half size.)



FIG. 334.—Vessel No. 11. Mound B, Warrior river. (Half size.)

partment vessel and the bird-effigy vessel, the other being where the bird is given in outline of the compartments only. Diameter across wings, 10.2 inches; height, 2.5 inches.

Vessel No. 20.—A neat, imperforate, undecorated bowl of less than 1 pint capacity, greatly thickened at the rim.

Vessel No. 21.—Red ware, imperforate, with the rim inturned somewhat. On the upper part are three encircling lines made up of upright punctate impressions. The capacity is about 1 quart.

Vessel No. 24.—A small pot, imperforate, with rude complicated stamp, and three feet on the base instead of four, the usual number in this part of Florida.

Vessel No. 26.—A small, undecorated, imperforate bowl, elliptical in longitudinal section.



FIG. 335.—Vessel No. 16. Mound B, Warrior river. (One-third size.)



FIG. 336.—Vessel No. 17. Mound B, Warrior river. (About seven-tenths size.)

Vessel No. 31.—An imitation of a gourd, which is made complete by the yellow color of the ware and a rusty appearance imparted by age, seen in places on the vessel and often met with on the natural gourd. The capacity is about 2 quarts (Fig. 337).

Vessel No. 38.—An imperforate, undecorated vessel of about 2 quarts capacity, scaphoid in shape. There are traces of crimson pigment exteriorly.



FIG. 337.—Vessel No. 31. Mound B, Warrior river. (Four-fifths size.)

A point of interest impressing itself on us in connection with Mounds A and B, near the Warrior river, is that here, at Alligator Harbor and near Spring creek, two mounds of considerable size are at each of these places in close proximity one to the other. In each of these pairs of mounds one was symmetrical, while the other was in the form of a ridge. From the symmetrical mound, in each case, came ware much superior to that found in the asymmetrical ridge.

MOUND NEAR STEINHATCHEE RIVER, LAFAYETTE COUNTY.

The mound, in thick scrub, is about one-quarter of a mile in a SE. direction from Rock Landing, which is about 4 miles above the mouth of the river. The height is 4.5 feet; the diameter of base, 62 feet.

Extensive digging was first done around the margin, showing the sand to be bright yellow with no trace of discoloration. One sherd only was met with.

Next the mound was dug centrally, with four large trenches radiating to the margin. One sherd was found and sand discolored by hematite, in one place. In three places, rather superficially, were bits of badly decayed bones.

MOUND NEAR GOODSON'S FISHCAMP, LAFAYETTE COUNTY.

The site of the fishcamp is on a small water-way extending in from the Gulf, about 2 miles in a SE. direction from the mouth of the Steinhatchee river.

The mound, in pine woods, on the edge of the sawgrass marsh, on property of the East Coast Lumber Company, was much spread by trampling of cattle. A few fragments of human bone lay on the surface. Its height was 4 feet; its basal diameter, 66 feet. Apparently, there had been no previous digging.

The mound was trenched in every direction by us and dug marginally and centrally. The sand was bright yellow with no sign of that darkening which so often accompanies an earthenware deposit. A single skull was found 1 foot below the surface, and a small bunched burial elsewhere at about the same depth.

A large stone hatchet lay 6 inches beneath the surface.

A globular vessel of inferior ware, with a perforation knocked through the base, having faint punctate decoration below the rim, lay alone about 6 inches down.

A carefully made discoidal stone of quartzite, with a small concavity in the base which is somewhat broader than the upper part, lay unassociated. This discoidal stone is of interest, in that it is the first found by us in peninsular Florida, in which this mound is, though we have met with the type in abundance in Georgia to the eastward, and in Alabama to the westward.

MOUND NEAR BEAR HAMMOCK, LAFAYETTE COUNTY.

This mound, in pine woods, on the eastern edge of Bear Hammock, about 3 miles in a SE. direction from the mouth of the Steinhatchee river, on the property of the East Coast Lumber Company, was intact at the time of our visit. Its height was 4.5 feet; its basal diameter, 52 feet.

Thorough trenching showed the mound to be of bright yellow sand. No burial or artifact was met with.

MOUND NEAR MURPHY LANDING, LAFAYETTE COUNTY.

Murphy Landing is on the coast about 2 miles above Horseshoe Point.

The mound, in a field formerly under cultivation, the property of the East Coast Lumber Company, about one-quarter mile from the Gulf, had a height of 4 feet 3 inches; a basal diameter of 52 feet. The outline was circular. We heard of previous digging in the mound, but as we saw no trace of it, presumably, it was insignificant.

The mound, which was of light sand with a dark streak at the base, was completely demolished by us.

Human remains were met with at thirty-six places, and included the lone skull, the bunch and the flexed burial. No skull was in a condition to keep, but a number

showed that no cranial compression had been practised. Burials were first met with in the eastern margin, but, later, were encountered throughout the mound. In the eastern part of the mound, after a number of single burials had been met with, a layer of bones was encountered extending in, toward the center, a considerable distance. This deposit, which was counted as a single burial, had with it much sand dyed with hematite.

In the western part of the mound, about midway between the margin and the center, began a thin layer of oyster-shells on which lay several burials. Two burials lay with oyster-shells, locally. Two others had "celts" nearby, while with two more were a few small shell beads.

Unassociated, was a nodule of chert, the shape of a finger slightly bent and about its length, with double its diameter. At one end is a certain amount of chipping, seemingly preliminary to making a cutting tool. There were also in the mound an arrowhead of chert and a ball of lime rock about 1 inch in diameter.

Earthenware was represented in the mound by a few sherds of markedly inferior ware, some having a slight admixture of sand in the clay. In the way of decoration sherds bore the small check stamp, a rude punctate marking and, in one case, a pinched design. A small, undecorated bowl, with a hole knocked through the bottom, fell with caved sand.

MOUNDS NEAR HORSESHOE POINT, LAFAYETTE COUNTY.

These mounds, in thick hammock, on property of the East Coast Lumber Company, lie near the edge of the marsh, somewhat to the north of Horseshoe Point. A visitor would find it to his advantage to follow a road about two miles in a northeasterly direction from the landing.

The principal mounds, three in number, lie in sight of one another and are near considerable shell deposits. A large fresh-water pond is nearby and a natural waterway to the Gulf, doubtless available for canoes, ends in sight of the mounds, which are surrounded now, as no doubt they were in former times, by hammock-trees, including tall palmettoes and magnolias.

The mound nearest the Gulf was built on the end of a shell-heap, a part of the mound extending over to the general level beyond. Its outline was circular; its diameter, 40 feet; its height above the shell-heap, 6 feet. A great trench had been dug from the SE. margin to the center. The remainder of the mound was practically demolished by us.

A number of burials were met with at various points in the mound. No flattening was apparent on the skulls, which, however, were not in a condition to save.

Mainly from the western side and from near the center, comparatively near the surface, were ten vessels of inferior ware, all found singly. None of these bore incised decoration, save one, which had two encircling lines. One sherd, however, of the few found in the mound, was of excellent ware and bore a carefully incised conventionalized bird's wing.

Vessel No. 1.—A vessel of about 3 quarts capacity, shown in Fig. 338, with four projections, perhaps indicating a highly conventionalized life-form. The upper part of the body is painted crimson; the lower has the natural yellow color of the ware. Part of the base has been knocked out.

Vessel No. 2.—A bowl of about 2 quarts capacity, with three encircling lines of triangular punctate markings. There is a basal perforation.

Vessel No. 3.—A large undecorated vessel of yellow ware, modelled after a gourd, with a portion missing.

Vessel No. 4.—A vessel with oblate spherical body and high upright neck bearing



FIG. 338.—Vessel No. 1. Mound near Horseshoe Point. (One-third size.)



FIG. 339.—Vessel No. 4. Mound near Horseshoe Point. (Half size.)

ing a distinct complicated stamp (Fig. 339). The base is missing through mortuary mutilation.



FIG. 340.—Vessel No. 6. Mound near Horseshoe Point. (Half size.)

Vessel No. 5.—Another large vessel modelled after a gourd, found in fragments.

Vessel No. 6.—A double vessel of yellow ware, also of the gourd pattern (Fig. 340). There is a basal perforation.



FIG. 341.—Vessel No. 10. Mound near Horseshoe Point. (Two-fifths size.)

Vessel No. 7.—A small, imperforate vessel, with rude, punctate decoration.

Vessel No. 8.—An undecorated, perforate bowl of about 6 quarts capacity, scaphoid in shape, with red paint inside and out.

Vessel No. 9.—Small, undecorated, with four-lobed body. There are two holes for suspension; also a basal perforation.

Vessel No. 10.—Of heavy ware, undecorated, of about 1 pint capacity. In form this vessel resembles an inverted acorn. There are two holes for suspension and a perforation in the base (Fig. 341).

The next mound was a ridge 80 feet long by 58 feet across. The maximum height was 6 feet. The highest portion was carefully trenched by us, yielding beside a number of burials, three "celts," two of which are of a chisel-form, and a small undecorated bowl with basal perforation.

The third mound, circular in outline, 3 feet 4 inches high, 54 feet across the base, furnished one broken arrowhead as the result of careful trenching. This mound was probably domiciliary.

MOUND ON HOG ISLAND, LEVY COUNTY.

Hog Island is a small key between the eastern and western passes into the Suwanee river.

The mound, but a short distance from the marsh, is in a dense mass of trees, bushes, and palmetto scrub. Its height is 9 feet 3 inches; its basal diameter, about 50 feet.

This mound seemed to be a shell-heap covered with from 12 to 18 inches of sand. A hole put in by a former digger, showed only shell, as did a large cavity caused by the fall of a great tree. Trenches put in by us reached shell almost immediately, and, after considerable digging in this material, the investigation of the mound was abandoned.

MOUND ON PINE KEY, LEVY COUNTY.

Pine Key, a small island, lies about one-quarter of a mile from a great shell-heap on the mainland. This shell-heap, visible at a long distance from the Gulf, the northernmost of the great shell-heaps of the west coast, lies about 5 miles in a northerly direction from Cedar Keys.

Pine Key, largely marsh, has a certain amount of solid ground rising from 2 to 3 feet above the general level. About one-quarter acre of this higher ground had been used as a sort of burial place, or cemetery. There had been considerable previous digging, and fragments of human bones and bits of earthenware of the most inferior quality lay scattered over the surface.

The cemetery was trenched in all directions.

In places, bones lay in profusion, while again burials were met with singly, the flexed burial, the bunch and the lone skull being represented. No cranial flattening was noticed. The remains, as a rule, were about 1 foot below the surface, though several burials were met with at a depth of 3 feet.

A "celt" was found not far from the surface, as were a shell drinking cup with a basal perforation, and many sherds, all of poor ware, undecorated in the main, though the check stamp and the complicated stamp were represented.

Also near the surface was the lower part of a ceremonial, mortuary vessel having a basal perforation made before baking. The portion found resembled an inverted cone. Just above the base were two deep, encircling grooves made when the clay was soft. The ware and workmanship were of the coarsest description.

MOUND NEAR THE SHELL-HEAP, LEVY COUNTY.

This mound is in thick scrub, about 300 yards from the homestead of Mr. W. R. Young, who lives on the great shell-heap, to which we have referred, and is the owner of the mound in the rear. This mound, 6.5 feet high, 64 feet through its circular base, had been dug into from the NE. margin previous to our coming, a trench 6 feet wide having been carried to the center where it broadened to include a space about 10 feet in diameter. A few fragments of human bones and two or three bits of rude earthenware lay on the surface.

Seven large trenches made by us, not all of which were entirely carried to the base, some having been abandoned when results of others were noted, showed the mound to be mainly of oyster shells irregularly placed.

At the center a measurement from the top showed 18 inches of sand, 22 inches of shell, 14 inches of sand, 1 foot of shell, in order, going down. Beneath, was undisturbed sand. The mound probably was built on rising ground, as its height, taken from the margin, is not accounted for by these measurements.

On the south side of the mound trenching showed 18 inches of sand on top, with a solid mass of shells below, and other trenches gave but slightly varying results.

No human remains or artifacts were met with in our digging, though one bit of human bone, just below the surface, projected from the side of the former trench.

At Cedar Keys our mound investigation for the season was brought to an end.

A continuation of our work farther south hardly would have been consistent with the title of this report. Moreover, Mr. J. S. Raybon, captain of our steamer, who had worked so successfully for us to the northward and to the westward, had been unable to locate any new mounds of importance between Cedar Keys and

Tampa bay. It is only fair to say, however, that owing to the lack of inhabitants along that part of the coast, from whom inquiry could be made, certain mounds may have escaped him. Besides, several years before, we had covered the territory from Tampa almost to Clearwater Harbor (see outline map) with but negative results, while two men in our employ, one of whom was very familiar with the coast, had searched from Tampa to Anclote Key, finding only mounds previously located and dug into by Mr. S. T. Walker,¹ whose researches were continued still farther north without discovery of importance.

Mr. Cushing,² it is true, opened a mound at Tarpon Springs, in which he found fragments of interesting ware, but we believe this mound to have been an exception to the general run of mounds from Cedar Keys southward. Just north of Cedar Keys the great shell-heaps of the west coast begin, and neither on the east coast, where large shell-heaps are throughout, nor in the territory of the great shell-heaps on the west coast have we found the contents of mounds to be of much interest.

As we have stated, our work of last season ended at the eastern extremity of Choctawhatchee bay and began this year at the western end of St. Andrews bay, in direct continuation (see map).

During our season's work certain points were brought to our attention.

Going eastward along the coast, we saw the waning influence of Alabama and of the middle Mississippi district as to composition of ware, the admixture of shell³ entirely disappearing, none having been met with by us east of Choctawhatchee bay, which marks also the easternmost limit of the polished, black ware of Mississippi, as found by us.

¹ Smithsonian Report, 1879.

² Proceedings American Philosophical Society, Vol. XXV, No. 153.

³ In a thoughtful article in the "American Antiquarian," May and June, 1902, entitled "Primitive Ceramic Art in Wisconsin", the author of that paper is inclined to believe that a mineral substance, and not pounded shell, is used to temper earthenware through parts of the mound region, where hitherto we have been led to believe pounded shell was used.

To determine this matter, we submitted to Prof. Harry F. Keller, Ph. D., a fragment of thick, porous earthenware found by us in Alabama, which contained a considerable amount of what we have always considered broken shell used for tempering.

Dr. Keller's report is as follows :

June 24, 1902.	
"The analysis of the carefully picked material (shell) from the specimen of earthenware from Alabama gave the following results:	
Insoluble in dilute acid,	3.09%
(Silica and ferruginous clay)	
CaO (Lime)	54.07
MgO (Magnesia)	.19
MnO (Manganous oxide)	.09
Fe ₂ O ₃ (Ferric oxide)	.11
CO ₂ (Carbonic anhydride)	41.58
P ₂ O ₅ (Phosphoric anhydride)	.62
Moisture	.11
	99.86

"The small amounts of the oxides of iron and manganese may be derived from adhering matrix. The insoluble residue contains traces of carbonaceous matter."

Here we have almost pure carbonate of lime, showing the scaly fragments in the earthenware to be shell.

The growing influence of Georgia in decoration became noticeable also, the complicated stamp, the specialty of that State and of territory to the northward, coming more and more into use. Such being the case, we should look for the clay tempered with coarse gravel, the well-known "gritty ware" of Georgia, but it is not present.

The earthenware of the northwest Florida coast is purely aboriginal in style. Probably most of the mounds there ante-dated the coming of the whites, and where they did not, their builders saw too little of the strangers to suffer modification in their art. It is true that some writers have cited the presence of feet on aboriginal vessels as an indication of European influence, and such vessels are often met with in the mounds of the northwest coast, but we have seen vessels with feet, in various localities, in too many mounds in which no European artifacts were found, to coincide with this idea.

In material and decoration the pottery of the Florida northwest coast averages far above that of such mounds of peninsular Florida, in which earthenware is met with.

For one reason or another, the occurrence of earthenware vessels is infrequent in the burial mounds of the coast of peninsular Florida. We have searched almost the entire east coast between the Georgia boundary and Lake Worth without finding a single vessel, and our good friend, the late Andrew E. Douglass, devoted many seasons to mound work along the east coast, going even as far as Miami, with a like result.

On the west coast, Mr. Cushing found fragments of important vessels in the mound opened by him at Tarpon Springs, but from near that point southward, almost to the end of the peninsula, we saw not a single vessel of earthenware, though there are a few fragments in the shell-heaps.

It is true Mr. Cushing found several vessels of earthenware in the muck at Marco, with his great discovery of objects of wood, but the vessels were few in number and unimportant as to shape and decoration.

Presumably, then, the custom to inter earthenware vessels with the dead obtained but little, if at all, along the Florida east coast, and the lower half of the west coast of peninsular Florida. If, in these districts, vessels to any extent were put into the mounds, these vessels were of wood and perishable.

Superior as is the earthenware of the northwest Florida coast to most of that of the peninsula, it does not excel a few of the finest specimens met with by us in the mounds of the St. Johns river. A duck-vessel¹ from near the mouth of the St. Johns; sherds of excellent paste and superior decoration, from near Dunn's creek² (see outline map); still more beautiful ones from a neighboring mound; part of a vessel and a handle representing a vulture's head, beautifully incised and showing the fine yellow of the paste, alternating with crimson pigment, from a mound near Lake Monroe, hold their own with the finest earthenware of the northwest coast of Florida.

¹ "Certain Sand Mounds of Duval County, Florida." Plate LXXXIII.

² "Certain Sand Mounds of the St. Johns River." Part I, Pl. II, Fig. J. Incidentally, at this mound was the southernmost occurrence of ware bearing the complicated stamp decoration.

We have two hypotheses to offer to account for this:

1.—That the aborigines of the peninsula possessed fine ware, but did not, as a rule, inter it with the dead.

It must be borne in mind that the natives of the peninsula did not make great mortuary deposits of earthenware as did those of the Florida mainland, the vessel earthenware being simply one of a great number of objects from which selection was made. Fewer vessels were put into the mounds, and as earthenware was not so exclusively a mortuary selection, perhaps less attention was paid to the quality of that taken for burial. Besides, the interment of "freak," or ceremonial, ware, which is always inferior to the other ware of the district where it was used, was more largely practised in the peninsula than it was on the northwest coast and, therefore, the pottery of the peninsular mounds may not be representative.

2.—That the finest vessels of the peninsula were importations.

From the island of Marco, southwest Florida, we got two large bird head handles, of excellent design, found alone, one representing the head of a turkey, the other that of a predatory bird. Around one of these heads a groove had been made to permit use as a pendant. The other head had doubtless served a similar purpose, as circular spaces, through which a cord could pass, had been left, at the time of manufacture, through the neck and through the bill. Not only was the workmanship of the heads markedly that of the middle Mississippi district or of the Gulf, but the ware was what is known as shell-tempered, which ware was in use in the districts we have named, but not in peninsular Florida. These heads were doubtless importations, and other fine specimens of ware may have been importations also.

On the whole we are inclined to believe that the best ware found in the peninsula was exceptional and perhaps got there through barter. The lower average of excellence of sherds in the peninsula argues a supply of inferior vessels, and the fact that the "freak," or ceremonial, ware is so much below the standard of that of the northwest coast might indicate a lower quality for vessels of other classes also. Had the natives of the peninsula possessed vessels of the highest grade in great numbers, we believe, in one way or another, more indication of it would have come to light.

In the first part of this report we spoke of a mortuary custom prevailing in peninsular Florida¹ to knock a hole through the base of a vessel, presumably to "kill" the pot, that its soul might accompany that of the dead man. We spoke of a refinement of this custom, and described vessels of fantastic form and flimsy material made expressly for interment with the dead, in the bases of which holes

¹ In the "American Antiquarian," Sept.-Oct., 1902, is a paper by Mr. Francis U. Duff, on the antiquities of the Mimbres valley, New Mexico, describing, among other things, the finding of "large bowls inverted over the crania of the departed. Each of these bowls, before being deposited in the grave, had a small hole broken in its bottom." It is interesting to note the occurrence of the mortuary perforation of the base of vessels in this remote region so far removed from where this mortuary custom flourished at its fullest. In the Mimbres valley, however, bowls were not inverted over lone skulls or skulls with a few scattered bones, as they were in the graves of the Florida northwest coast, but were placed over skulls interred with their skeletons.

had been made previous to the baking of the clay. Incidentally, we found this "freak," or ceremonial, ware in the peninsula, from the mouth of the St. Johns river to Lake Beresford (see outline map), going southward, and in the lake district at the head of the Ocklawaha river.

A few examples of this ready-made "freak" ware were met with by us east of Pensacola bay during our work last season. During this year's investigation, as our readers may recall, examples of this form were found in increasing numbers, and individual vessels were often of much greater size than anything of the kind we had met with to the westward on the coast, or, incidentally, in peninsular Florida, save in the mounds of Volusia, south of Lake George.

As our work progressed more to the east, a new feature in "freak" ware was encountered. In the mounds of St. Andrew's bay two vessels of a new type, and fragments of similar ones, were found, while farther to the east vessels of this kind were encountered in considerable numbers. These vessels were life-forms, usually, but differed from other life-forms of the same district, in that they were inferior to them as to ware and workmanship, and that they had various perforations made previous to baking, in the body of the vessel as well as the customary one in the base.¹

An interesting custom noted with but few exceptions along the northwest coast was the placing in the mounds of general deposits of earthenware, nearly always in the eastern part of the mound. These deposits were found in darkened sand, often at the very edge of the mound, and continued with the blackened sand, a few vessels together, in toward the center or to it. Sometimes the deposits were met with at some little distance in from the margin, but nearly always in the eastern side of the mound.

These masses of blackened sand in which the general deposits of earthenware lay were noticed by us in the mounds during our former season's work and were referred to by us in Part I of our report. So almost universal was the juxtaposition of darkened sand and general deposits of ware in the mounds, during our work this season, that considerable thought was devoted by us to the matter. Sand of this

¹ Among numbers of small "freak" vessels found by us in the Grant mound, near the mouth of the St. Johns river, was part of a vessel filled with perforations, like a sieve. We are uncertain whether or not this vessel should be included in the same class as those having occasional perforations in the body.

The incense-cups of Mexico and of Central America, though they have perforations of the body, made before baking, do not seem to us to be of the same class as these large vessels from northwest Florida, which have basal perforations in addition to those in the body. These latter vessels with their ready-made body-perforations would seem to be intimately connected with the ceremonial vessels of peninsular Florida, since both classes possess the perforation of the base, made before the baking of the clay, though the vessels of peninsular Florida do not show the body-perforations which are probably only an amplification of the mortuary perforation of the base. Therefore, as the ceremonial vessels of peninsular Florida, being without body-perforations, could not have served as incense-burners, it is not likely that the ceremonial vessels of northwest Florida, which are so nearly related to the others, though possessed of body-perforations, were intended for the burning of incense.

The Twentieth Annual Report of the Bureau of American Ethnology will consist of Prof. W. H. Holmes', "The Pottery of the Eastern United States," a most admirable memoir, part of which it has been our good fortune to see in manuscript.

We earnestly advise those interested in the subject of aboriginal ware carefully to study this memoir, on its appearance.

kind was often carefully examined by us for charcoal, but none was found, nor was adjacent sand burnt or discolored as by fire. In our account of the mound at West Bay post-office, in the early part of this volume, we have stated that a sample of this blackened sand, examined chemically and microscopically, showed its color to be due to carbonaceous matter, very probably of animal origin, and that the material, in all probability, could not have come from anything in the vegetable line. As this report is not intended for popular reading, in all probability our readers are as able to draw conclusions as we are. It would seem to us, however, that masses of animal matter, incinerated in a way to escape mixture with charcoal, have been mingled with sand which was placed in that part of the mound devoted to deposits of earthenware, put in for the dead in common. What these masses of flesh consisted of we are unable to decide. If the flesh belonged to lower animals and the bones were not removed before burning, and it seems unlikely that they should have been, the incineration must have been complete, as particles of half-burnt bone are not present in the sand.

If we suppose, on the other hand, that the flesh which we know was sometimes stripped from human skeletons when taken from the dead-house, was cremated, the absence of particles of bone can be accounted for. We think this latter supposition the more probable since aboriginal cremation did not seem to reduce bones in a thorough way, judging from our rather extensive experience of the matter in the mounds of Georgia.

Burials of human remains, also, were in greater numbers in the eastern portions of the mounds, sometimes being there and in the central parts, exclusively. In other cases, however, human remains were met with throughout the entire mound.

No new feature as to form of burial was noted during this season's work. The lone skull, the bunch, the flexed burial, the burial at length were met with; also loose bones scattered here and there. The urn-burial, also, was found in two localities.

The question of urn-burial in Florida is an interesting one since we know the custom to have been largely in vogue in Alabama and in Georgia, and yet there is no evidence¹ of the extension of the custom into peninsular Florida.

We have seen how large bowls were put over skulls at Perdido bay, the boundary between Alabama and Florida, and how the custom, continuing eastward into Florida, was noted along Santa Rosa sound and at the eastern extremity of Choctawhatchee bay, where, also, in one instance, an inverted bowl was found covering another bowl containing human remains.

This season we have remarked the existence of a cemetery with urn-burials still farther east, at the town of St. Andrews, and have found a single urn-burial in a mound on Ocklockonee bay farther yet to the eastward, though still on the mainland.

Beyond this point, in all Florida, we have met with no example of urn-burial, nor is there one on record.

¹ With the exception of a statement made in a newspaper by an investigator of a single mound and omitted from his official report.

Cremation, which we met with so frequently in Georgia, but saw but once during our work on the Alabama and Tombigbee rivers, was not noted by us during our first year's work along the northwest Florida coast, and but twice, unmistakably, during this, our second year's work. In the peninsula of Florida we have not met with true cremation where it was evidently the purpose to burn the body as a form of burial, such cremation as is found there apparently being where single bones or parts of skeletons have lain in close proximity to ceremonial fires. These fragments of burnt bone are often found lying with bones unaffected by fire, while, at times, a skeleton is seen to have the bones of one arm burnt or calcined, or sometimes a portion of the skull, and the like.

Cremation, then, as a form of burial, cannot be said to have obtained in peninsular Florida and was practised but occasionally in the mainland, or northwestern portion.

There seems to be a possible explanation for this occasional occurrence of cremation in a district where inhumation was so generally practised. Cabeça de Vaca, who, as the reader is aware, spent some years among the aborigines of the northwest Florida coast, tells us that persons there in general were buried, but that doctors were cremated. In our work on the mounds of the Georgia coast we pointed out that this statement could not apply to that part of the country, since cremation was very widely practised there, and, moreover, often included the bodies of infants. But along the northwest Florida coast, the district of which Cabeça de Vaca's statement was made, the result of our investigations seems to bear out the assertion.

It was our intention, another season, to carry our investigation from Mobile bay westward along the coast, in the endeavor to trace connection between that district and the region we have covered to the east.

Since our return, this spring and summer (1902), Mr. J. S. Raybon, captain of our steamer, who has in previous years so successfully located mounds for us, went over part of Mobile bay and most of the Mississippi coast.

A few mounds rewarded his search on the eastern shore of Mobile bay, but along the coast of Mississippi, apart from shell-heaps, almost nothing was met with.



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