Human Settlements in the Central Sudan – Case Study Aba Island

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Introduction

The history of scientific archaeological research in Aba Island is a relatively recent development. Research dates back to 1982 when Mahmoud Eltayib conducted limited excavations in the northeast area of Aba Island. Similarly, other rescue excavations were carried out in Aljaser located in the eastern part of the island in 1983. Since then, random archaeological work was conducted in the area, beginning with the current author in 2010 and 2011.

Unfortunately, little was done during the earlier surveys/test excavations, and most of the work focused on describing the sites and surface finds. Moreover, the data gained from these surveys was not enough to give a clear picture of the cultural history of the region in question. Archaeological research during this period was basically survey-oriented, and not unexpectedly, classifications based on surface stratigraphic evidence occupied a central position in the scheme of things. This research orientation was intended to give insights into sequences of events and chronologies. It is important to note that apart from the fact that these archaeological works were scattered (i.e., few and far between), there were no well formulated strategies and/or research designs aimed at clarifying our understanding of the spatial dimension of the culture(s) being studied at both the intra- and inter-site levels. Indeed, lateral-oriented activities involving mapping and survey and some test pits were not considered vital to the operationalization of research work until 2010. Some of the concomitant effects of this development are as follows:

- Artifacts collected from the area appear to remain isolated, without any significant connections between them and a given geographical configuration, thus making it impossible to recreate the extent to which a people had exploited the resources within their environment.
- Establishment of the nature and pattern(s) of the north area’s relations among the peoples in different parts of the island in prehistoric and historic periods remains to be done.

The Geographical Location of Aba Island

Aba is an island near the east bank of the White Nile about 300km south of Khartoum. It is located at N13°21’ E13°13’. The island is about 54km in length from north to south, and 8km wide from east to west. It is situated between the main White Nile in the west and el-Gasir (a small channel of the White Nile) in the east that was constructed of earth and built by Mahdi supporters in 1934.

Objectives of Research

The researcher expects to uncover evidence that may shed new light on the environment and life ways of the people who inhabited the area. The research aims to combine the knowledge and techniques from a variety of disciplines to develop a more complete picture of the past inhabitants of the area, both elite and commoner, as well as to investigate the paleoenvironmental condition in the past.
Problems and Perspectives

Efforts should be made to take into consideration several problems that face archaeologists and other researchers in studying the archaeology and history of Sudan. The assessment of the previous work is done here with great respect and caution. Indeed, one major objective of this work, is to attempt to promote a new appreciation of available or potential archaeological data, especially settlement finds and features, with a view to broadening our horizon of archaeological research in Aba Island and Sudan as a whole.

Until recently, most archaeological work in the Sudan focused on the north region, while separate attempts took place on the White Nile state. In other words, the archaeologists working in the White Nile area are still disappointingly few and largely as a result, systematic archaeological investigations of the entire area remain poor. Closely related to the problem listed above, is the fact that the White Nile State is a vast region, too large for a handful of archaeologists to manage. In addition, the geographical character of the region is extremely complex. For example, the heavy rain and vegetation constitute in themselves distinct obstacles to archaeological fieldwork.

The White Nile is a straight, shallow and remarkably stable river that flows at the very low flood gradient of 1 cm per km in an almost horizontal plain between Kosti and Khartoum. In its lower course it is confined between bedrock outcrops and two enormous low-angle alluvial fans. The White Nile is also constrained by the Blue Nile directly in that, before construction of the Jebel Aulia Dam, the flood level of the Blue Nile controlled the flood level of the White Nile for several hundred kilometers upstream of their confluence. This important control on the level of the White Nile undoubtedly operated in the past.

Another major difficulty is the fact that Aba Island is situated in the humid regions, the soils are acidic, and erosion is generally very pronounced. These factors have adversely affected the preservation of archaeological remains, especially fragile items like bones and organic objects of great time-depth. However, there are still some depositional cases, such as in sandy conditions, where archaeological materials are relatively better preserved. However, archaeologists working on Aba Island are left with just non-perishable materials, such as stone tools and potsherds and little else in the way of human occupation as aids to analyze, reconstruct and interpret. On the other hand, recent archaeological research has shown that people were already living in the southwestern part of the island near Taiba village as early as 3000 BC and perhaps earlier at Dar Assalam village (Adam 2013: 148) (Figure 1).

The preservation problems discussed above, along with other problems, makes the task of establishing stratigraphic sequences difficult. Aba Island is divisible into zones on the basis of soil types and topography as follows:
1. Mud soils that are very common in most parts of the area;
2. sandy soil in most parts of Eastern Aba Island;
3. combination of heavy plants, grass, and sand in the north and far southeast side of the island; and
4. the bank of the Nile that erodes during the annual floods and has lost most artifacts, the colour of the stratigraphy, and any features that were present.

The above description was derived from oral traditions and ethnographic sources and observations during fieldwork. Such models, if carefully applied to archaeological situations, can fill the gaps in our knowledge of the past for the island and the whole of Sudan and its neighbor, South Sudan.

Methodology

The main fieldwork methodology was to conduct a comprehensive survey in the island. Archaeological materials were collected from the sites, and will be studied in detail later. Related geological, ethnographical and historical information from the island were also noted during this season.
Archaeological Sites

The researcher conducted two seasons of archaeological survey in 2010 and 2012. During the survey, the area was divided into three sections: north, central and south, in order to facilitate and organize the work. I recorded a total of 11 sites that revealed the depth and history of the various cultures of this area.

Perhaps it is important to note here that we need to complete the archaeological survey in the area on the west bank to set the island in its context. The survey was limited to the island, which complemented the two seasons of field work already carried out on the east bank, and what was found launched another new series of investigative work that began in 2012.

Aba Island is host to one of the first major archaeological projects on the White Nile, far from northern Sudan where most archaeological research is concentrated. The sites consist of different archaeological materials that belong to different time periods from the Neolithic to the Meroitic.

Most of the sites discovered in Area 1 are completely covered by shells, stone tools, grinding stones and hammers. Human bones were also found, but the skeletons were destroyed. There are many pottery sherds on the surface, dominated by red and brown examples; most bearing different types of decoration with numerous shapes and sizes belonging to the Neolithic period.

Charred animal bones and fish remains were also noted on the surface. However, a large part of the site has been destroyed by local residents through digging and taking soil to use for constructing new buildings and to grow tall plants. However, when looking in the area of Aba Island from the surface, all of the sites feature only desolate, low-lying mounds with scatterings of artifacts, including lithic tools and fragments of pottery that hint that something was here in antiquity.

The work was conducted from north to south, with the first sites discovered and recorded at the northern limit of the island. Details of the sites are as follows (Adam 2013: 142-148).
Northern Sites

These sites lie in the districts of et-Tamreen and Karsh Alfeel and extend a distance of 28km. The three archaeological sites recorded in this area are:

Karsh Alfeel site (Goz Abbas): N13°20’9.97” E32°36’13.9”. This site lies on the northern limits of et-Tamreen (known locally as Goz Abbas). It is a small mound 600m in length and 250m in width, which slopes a little from east to west. The site is flanked by a group of small pools on both sides to the north and west, and it has been dug by various people. The surface is completely covered by shells, stone tools, grinding stones and hammers. Some human bones were also found, but the skeletons were destroyed. There are many pottery sherds on the surface, dominated by red and brown examples, most bearing different types of decoration. There are also some pieces of charred animal bones, and some skeletal remains of fish. However, a large part of the site has been destroyed by local residents through digging and taking soil to use to construct new buildings (Figure 2).

Et-Tamreen 1 (North): N13°20’6.56” E32°36’55.2”. Located in the northeastern part of the village, this site is relatively elevated, and contains some pottery and the remains of stone tools, especially cores and flakes. There are some fossilized bones but they are few and poorly preserved as a result of the erosion of the site’s surface by vehicular traffic and pedestrians.

Et-Tamreen 2: N13°20’29.1” E32°36’25.2”. This site is located in the centre of et-Tamreen village, bounded to the east by roads and some houses, and by the small mosque of et-Tamreen on the west. It is a semi-circular mound elevated slightly, with a length of 400m from east to west and a width of about 300m, containing multi-colored but very eroded pottery. Many large shells and some stone tools were also found.
Central Aba Island Sites

This area extends for a distance of 13km, and includes most of the residential neighborhoods and different institutions of the island which has led to the disappearance of most of the archaeological sites and the loss of natural features and their contexts. Two sites were noted:

*El-Gargoor site: N13°18’15.4” E32°36’24.8”.* Located to the south of the Universe Mosque in the middle of el-Gargoor (a local name, meaning ‘shells’, because there are a lot of shells on the site), the area has a very steep slope from the middle of the slope to the west and it is surrounded by houses on all sides. Many crushed pottery sherds were found; some incomplete examples were colored black and decorated with a variety of zigzag lines and others were decorated with dots and circles in regular shapes. Also found was an ivory object with an incomplete hole decorated with semi-circular lines. A skeleton was found on the surface accompanied by some fragments of beads and an archer’s loose that was uncovered due to the rainwater washing over the whole site. On its surface was a dense concentration of snail shells (Figure 3).

*Wad er-Rada’a site: N13°18’6.54” E32°37’15.8”.* Located southeast of the police station, this site extends for a distance of 2km along the Wad Alradaa’ Canal and 1km to the west of el-Gasir. Here were found some parts of artificial structures near the home of the administrative officer and others to the west of the police station, together with a spread of some fragments of stone and a very few crushed pottery sherds.

The Southern Sites of Aba Island

The sites in this area, which extends for a distance of 15km between the villages of Dar es-Salaam and Taiba at the southern limit of the island, includes six sites:

*Dar es-Salaam (Goz Abdebrasoul): N13°16’6.24” E32°36’9.98”.* This site is located about 800m west of the village of Dar es-Salaam facing the Nile, flanked by farms on the south and the north, and it has a length of 900m from north to south and is about 400m wide. The site is a low rounded mound, sloping a little toward the north and south.

There are some pottery sherds on the surface of different colours and forms. Some pots were found almost complete, but were eroded because of high humidity, as a result of exposure from falling from the bank of the Nile River (Figure 4). There are also some lithic tool fragments and grinding stones, especially the upper grinder. It was observed that the
stone tools were made in different shapes.

A large part of the site has been destroyed owing to the movement of vehicles and agricultural expansion, while the eastern part was disturbed by animal-pens and a store was built for different crops on another part of the site.

**Taiba 1: N13°13′43.8″ E32°38′39.0″.** Located at the southwestern tip of Taiba on the edge of the Nile, the site is a mound that extends for about 700m among the village houses, which were constructed over large parts of the site especially on the east side. There is some surface material on the site including pottery, mostly red, and some shells of large sizes and different shapes, as well as many stone tools that are spread over large areas. The Nile water has affected the colour and shape of archaeological material, especially the pottery.

**Taiba 2 (el-Fareeg): N13°13′37.4″ E32°38′42.1″.** Located a little to the south of Taiba 1, this site consists of a small mound on which there are a variety of stone tools and a few decorated pottery sherds. It was noted that the site was partially destroyed due to urban and agricultural expansion.

**Taiba East: N13°12′7.58″ E32°39′00.9″.** This site is located about 700m east of the Nile in the eastern part of Taiba village, to the west of the main road. It comprises a small semi-circular kom around 40m in diameter. There are many large fragments of stone, pieces of charcoal and fossilized bones on the surface. Also found were some pieces of iron that had been corroded by water that covers some parts of the site during the flood season each year.

**Taiba Farms: N13°12′7.39″ E32°38′9.20″.** Located in the southern part of the Taiba area at the entrance to the farms facing the Nile, the site has a length of about 1km, and ranges in width between

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**Figure 4:** Pottery sherds from Dar es-Salam site.
200-300m. Some pottery was found, decorated with straight lines and other sherds were decorated with dots, but these were very few in number. There are also some snail shells. A long stretch of the site along the Nile was noted, but it is much destroyed by the movement of vehicles and new farms that border the site from the east, together with the continuing action of the Nile flood every year (Figure 5).

Taiba (Goz es-Sameen): N13°12’29.4” E32°39’30.8”. This is located in the eastern part of the village. It is a mound of some elevation which extends for a distance of 1.5km from north to south and has a width of around 800m. It is the largest site discovered on the island, delimited by a stream on both the eastern and southern side. Spread on the surface of the site is a huge collection of pot sherds of numerous shapes and sizes belonging to the Neolithic period (Figure 6).

A range of grinding stones in large numbers and of different sizes was found, especially the upper grinders, and some well-made cylindrical hammer stones. The use of different types of stones in the manufacturing process was noted. The remains of elaborate stone axes were also found spread in high density on the surface of the site. However, most of the axes were broken as a result of the passage of vehicles (Figure 7).

A Preliminary Analysis of the Samples from the Island

Pottery. The most important items amongst the pottery samples found were those pieces decorated with stripes, vertical or crossed, corrugated, and painted black, dark brown or red. These are very similar to examples found in areas of central Sudan and along the White Nile, where the pottery was painted black, red and brown, which represented typical local features. Most of this material dates to the Neolithic period. Other examples are similar to Meroitic pottery, but these are relatively few in number compared with the Neolithic pottery. However, the final identification of the Aba Island pottery samples depends on the completion of the study of other samples on the eastern and western

Figure 5: Pottery sherds from Taiba Farms.
bank of the White Nile and comparison with other pottery samples in the Sudan National Museum in Khartoum and with other similar sites studied previously.

There was a large collection of handmade prehistoric pottery from the Neolithic period in Sudan. Based on this collection and pottery collected from the site’s surface, we can say that people lived at Aba Island for over 3000 years, from about 3000 BC to AD 200. The pottery being recovered now is consistently from the early 3rd millennium BC.

**Stone Tools.** A variety of lithic tools and grinding stones, especially upper stones, were found on the island. In addition, a large number of polished stone axes were collected. The use of different types of raw materials was noted, some materials are not available in the region, which means that it was brought from a distance in the form of raw material for the manufacture of the tools. While we cannot deny or confirm the existence of contacts between the White Nile and remote areas outside its borders, relationships with local areas such as the site of Jebel Tomat, Kosti and others might have existed in the past (Haaland 1987).

**Organic Materials.** These include snails and shells in diverse forms and sizes, which are scattered over most locations. The snails and shells may be due to the proximity of the Nile, and the presence of ponds and pools in the area. The snails and fresh water shellfish represent the most important source of nutrition for people who lived near the river banks and water bodies during earlier periods and are still used as food in some parts of the study area, apart from the existence of some small pieces used for ornaments. Also found were accessories or tools made of ivory, including specific types of artifacts that are similar to those found with tribes in the region especially the Shilluk tribe.
Figure 7: Lithic tools, hammer, and hand axes from Goz es-Sameen.
Conclusions

Scientific studies of settlement archaeology of different parts of Aba Island face a number of problems ranging in nature from inadequate facilities to lack of archaeological work in the area. Up to now, no well-equipped dating laboratory is available in Sudan to process materials, and samples collected from archaeological work have to be sent abroad for processing. This delays the rate at which archaeological information is put into its proper time perspective.

Also, it seems that a great deal more time and attention is paid to the later phases of human settlement history than the earlier period. Consequently, much more is known of prehistoric settlements in Aba Island and the White Nile as a whole. A considerable amount of work has been done for these phases on the eastern bank of the White Nile by Khider Adam Eisa (2002). One reason for this interest in the later phase seems to rest in the fact that there is a meeting point between historic settlement archaeology and oral traditions for the region generally, and the fact that people can identify much more easily with this phase because it is more recent and by this fact closer to our time.

Despite the nature of the soil chemistry (acidic soil) lithic tools are still better preserved than organic objects. But there are some problems in the ancient settlements buildings, because of the different building materials as well as techniques of construction as most of these buildings are constructed over the archaeological sites in the area.

Development in recent years have shown that these problems are now being solved by indigenous archaeologists. For example, abundant oral tradition and ethnographic resources in the whole White Nile State are being profitably harnessed.

This is with the view to clarify our understanding of aspects of the people and their archaeological settlement in Aba Island. Archaeological work confirms the richness of the island through the ages. The existence of pottery and grinding stones indicates that the area has in the past had conditions suitable for the practice of agriculture with the production of food, and intensive stable human occupations at least since the Neolithic (3000 BC) to the Meroitic period (AD 200) and beyond.

Therefore, much more archeological work and analysis needs to be done before interpretations and conclusions can be drawn of the exact date of the settlements in the area. However, we will continue and take more samples for the specialists to examine and to determine the exact date and history of the island.

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Bibliography

Adam, Ahmed Hussein Abdelrahman


Eisa, Khider Adam

Haaland, R.