SUDAN & NUBIA

The Sudan Archaeological Research Society		Volume 27	2023
Statement concerning Sudan			1
The Kirwan Memorial Lecture			1
Alloying copper, arsenic and tin – the first crucible evid Frederik W. Rademakers, Georges Verly, Kylie Cortebeeck, F		Séverine Marchi	2
Reports			
A desert Middle Nubian amethyst mining camp at Wadi Meredith Brand and Kate Liszka	el-Hudi		24
Archaeological survey in the Melhab basin (Agig district report on the 2023 field season Amanuel Beyin, Ammar Awad M. Abdalla, Fakhri H. Abdalla	•		48
A fortified site to defend the Kerma basin before the Eg Matthieu Honegger and Jérôme Dubosson	yptian conquest		75
New work on landscapes of the Northern Dongola Reach Christopher Sevara, Tim Kinnaird, Ahmed El-Ameen Ahmed and Sam Turner			86
Kerma settlement Site P5, Northern Dongola Reach: report on the 2023 season Steve Mills, Stephen Porter, Paul T. Nicholson, Loretta Kilroe and David Buchs			107
The Meroitic townsite of Kedurma 2023: new findings from the excavations of the cemetery Mohamed Bashir and Claude Rilly			131
Archaeological vegetation mounds in the el-Matas area Northern Sudan – new discoveries Mohammed Nasreldein, Yahia Fadl Tahir and Ikram Madani	_		148
Excavations in the Berber cemetery, the 2022 season an Mahmoud Suliman Bashir	d new chance discoveries in the Be	erber Region	159
Preliminary report on the excavation of Building 1000 at Naga Karla Kroeper and Christian Perzlmeier			172
The Isis Temple at Wad Ben Naga (WBN 300) Pavel Onderka			188
Early Neolithic gouges from north-western Butana: new light on contacts between the Nile and its hinterlands Ladislav Varadzin, Katarína Kapustka and Lenka Varadzinová			207
Studies			
Following the footprints of a jackal from Meroe to London. The origin of British Museum EA68502 Michael H. Zach			214
Replicating prehistoric Sudan: Anthony Arkell's object casts Anna Garnett			219

Chronology, correspondence analysis, and Lower Nubia in the 3 rd century BC: a reassessment of the Meroitic cemetery at Faras Henry Cosmo Bishop-Wright	230
Giraffes at Faras – the exchange of goods and ideas across Kush Loretta Kilroe	247
Darfur focus	
Darfur. Threats and dangers to archaeological sites and possible ways to protect them Ibrahim Musa Mohamed Hamdon	257
We are all for Nyala (KAMAN), South Darfur. A note concerning a local initiative to preserve cultural heritage Ashraf Abdalla	263
The Centre for Darfuri Heritage at Nyala University: a driver for cultural development Gafar A. F. Ibrahim	265
Book reviews	287
Obituaries	291
Biographies	297
Miscellanies	302



Front cover. Block 1000.0049 from Naga (photograph courtesy Karla Kroper).

Above. Pottery jar with decoration of sorghum heads from BMC 60, Berber (photograph courtesy Mahmoud Suliman Bashir).

Sudan & Nubia is a peer-reviewed journal. The opinions expressed within the journal are those of the authors and do not reflect the opinions or views of the Sudan Archaeological Research Society or its editors.

The Meroitic townsite of Kedurma 2023: new findings from the excavations of the cemetery

Mohamed Bashir and Claude Rilly

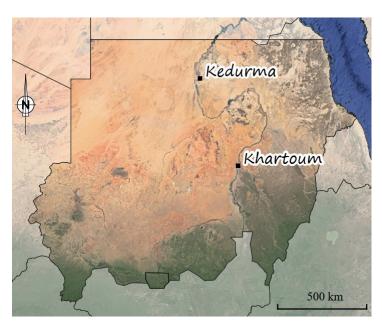


Figure 1. The geographical location of Kedurma (photo by S. Poudroux, © SFDAS 2020).

The Meroitic townsite of Kedurma lies in an open area on the east bank of the Nile, at the extreme northern end of the 3rd Cataract, *c.* 9km north of the Kajbar Rapids and 10km south of Delgo (Edwards 1995, 37). It has long been known as an important Meroitic town with elite residences, industrial areas, residential quarters and a cemetery.

The site was first discovered in 1937 by A. Blackman during excavations for the Egyptian Exploration Society at Sesebi. He reported the existence of a poorly preserved red brick temple with at least one stone gate and a large mudbrick building in the settlement (Blackman 1937). The site was also mentioned in the Antiquity Service archives in 1989, but no

report was published on it; it also appeared on the Sudan Survey Department map of the Mahas region as a Meroitic site in the village of Kedurma (Edwards 1995, 37). In 1989, the Department of Archaeology University of Khartoum Mahas Survey Project conducted the first archaeological survey in the region and accurately documented the site (Edwards and Osman 1992, 86-88).

The Meroitic cemetery is located *c*. 200m northeast of the settlement and covers an area of *c*.350x150m. The cemetery has not been fully investigated. However, limited excavations have been carried out. In the 1990s, part of the cemetery was uncovered by the Mahas Survey Project of the University of Khartoum. It was reported that the site had been significantly damaged by the construction of an irrigation canal. A preliminary ground survey of the surface features of the settlement was carried out and part of the disturbed areas of both the settlement and the cemetery were cleared along the line of the canal (Edwards 1995, 38). Four cemeteries were excavated there to expose surviving archaeological material and to assess the condition of the remains (Edwards and Osman 1992, 86-88). However, as funding for the project was limited, no further work took place after the survey. In 2018, two more graves were excavated by the University of Khartoum as part of a student training program (Bashir 2019, 30). All the excavated graves were located in the southern part of the cemetery.

Recent excavations

New systematic excavations by the University of Khartoum began in 2021 with support from the National Geographic Society and in 2023 with support from the Michela Schiff Giorgini Foundation and the British Institute in Eastern Africa. A total of 50 graves were excavated over two field seasons. The excavations were preceded by surface surveys and drone flights to determine the boundaries of the cemetery and to create a general map of the site.

Bashir, M. and C. Rilly 2023 [http://doi.org/10.32028/SN27pp131-147].

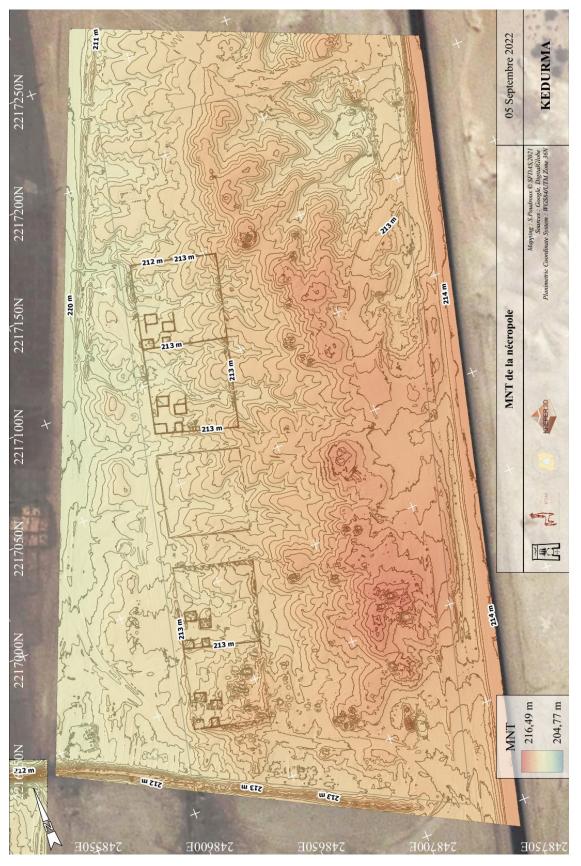


Figure 2. Contour map of the cemetery site, by S. Poudroux $\ensuremath{\texttt{@}}$ SFDAS, 2020.

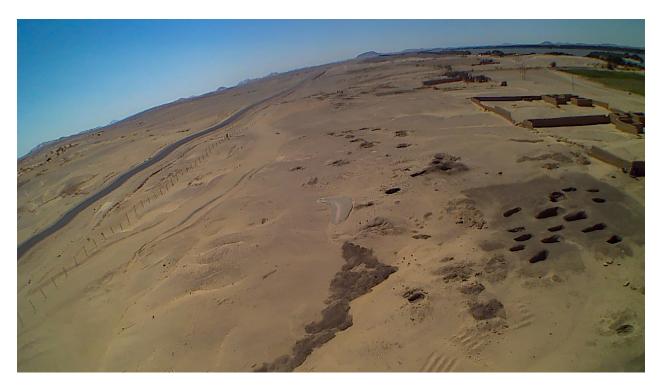


Figure 3. An aerial view for Grid 5 during excavations.

As there are no visible traces of superstructures associated with the graves on the surface, a second step was to conduct a geophysical survey in the selected areas of the cemetery, of which 12 grades were covered, to test whether this geophysical technique could identify graves below the ground surface. As the extent of damage/denudation to the original surface is not known, the number of graves that may have been originally covered remains uncertain, with the exception of the southern part of the cemetery. However, magnetometry results indicate that at least some of the graves were probably built over. For this reason, work began with extensive surface clearance to locate the graves in some of the above-mentioned grids. By the end of the season, a total of 50 graves had been excavated and recorded. This is only a sample of the total number of Meroitic graves in the cemetery, which could be more than a thousand. This paper reports on the excavated graves in Grid number 5, where the Meroitic funerary stela was found.

Research context

The archaeological excavation was carried out in four selected grids in different areas of the cemetery following the geophysical survey. Grid numbers 1 and 3 in the southern part and 5 and 12 in the northern part of the cemetery. Most of the excavated graves had a subterranean base from which a sloping ramp led down to a burial chamber, which lay in an east-west direction and coaxial with the access path. The entrance to the chambers was walled up or closed with stone slabs and mud bricks. The body was buried lying on its back in an east-west direction with the head facing upwards, north or south. At least 35 graves contained between two and five bodies.

On the basis of the substructures, eight basic types can be distinguished, described as follows:

- a. Rectangular pit with many variants, without a niche for the corpse and; with an additional niche (or niches);
- b. Axial chamber tombs, described as typically Meroitic tombs with a descendary leading into the chamber, including descendary with steps and without steps;
- c. Side-chamber tombs;
- d. Tomb with a single vaulted chamber;

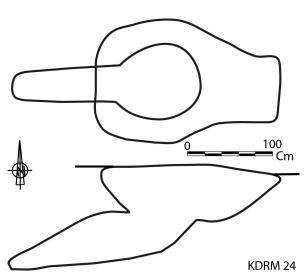




Figure 4. Grave KDRM24 (illustrations by M. Hayati).

- e. Shallow-pit graves;
- f. Mastaba graves;
- g. Chapel superstructures.

This in addition to interconnected chamber Grave number 7, which was fully documented this season.

Excavation of Grid 5

This grid is located in the northern part of the cemetery, where robbers have left a dump from illegal excavations of at least five graves. Systematic excavation of 13 graves was carried out this season after the surface was cleaned and the lifting material was reported.

KDRM24

Substructure: The general shape of the tomb is a cave-like tomb with a sloping incline 2.60m long and 1.40m wide. The original burial chamber was on the east side and had a length of 1.80m, a width of 0.90m, and a depth of 1.10m. The grave was covered with a coarse layer of sand, which was then mixed with sand and mud. It seems that the west side of the tomb was on a low surface through which water could

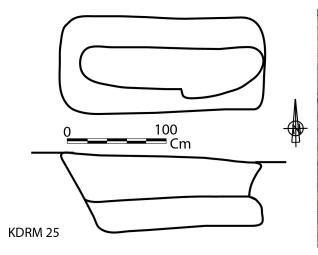




Figure 5. Grave KDRM25 (illustrations by M. Hayati).

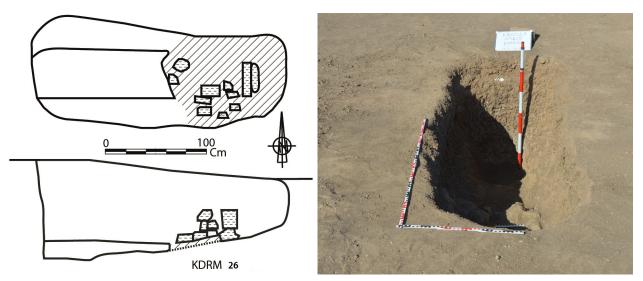


Figure 6. Grave KDRM26 (illustrations by M. Hayati).

enter the interior of the tomb, so some washed out or eroded pottery sherds and bones were found at the entrance of the tomb. Some bricks were found in the fill, which may have served as an entrance barrier.

Burial: A skull was also found, probably pulled from inside the burial chamber. Traces of eroded wood were found, probably belonging to a coffin or wooden box. Two other skulls were located in the burial chamber, which means that it was a multiple burial.

Finds: A small pottery sherd, bones and some palm seeds were also present.

KDRM25

Substructure: This tomb is a rectangular pit with a lateral niche at the bottom of the tomb. The general dimensions of the tomb are 2.10m long, 0.80m wide and 0.80m deep. At a depth of 0.20m, remains of a building appeared, which seems to be part of the vault of the tomb, damaged except for a 0.75m long and 0.43m wide part. At a depth of 0.45m, a regular pit 1. 32m wide was uncovered, more pronounced in the western part of the tomb.

Burials: A skull was found at a depth of 0.7m.

Finds: A broken pottery vessel was located at a depth of 0.15m. Another part of the base of a pottery vessel was recovered at a depth of 0.7m.

KDRM26

Substructure: This tomb is located in the southwest corner of the grid. It consists of a sloping descendary at least 2m long with a tapering axial chamber to the east, with a width of 0.8m and a depth of 1.1m. It has a wall of 0.35m in length. At a depth of 0.35m, stone slabs and remains of mud bricks were found, which often formed the closure of the tomb. The first stone was 0.7m long and 0.58m wide, while the second was 0.25m long and 0.4m wide. After the stone blocks were moved, the remains of a mud-brick wall were found, indicating that bricks and stones were used together to close the entrance of the tomb.

At a depth of 0.40m, many scattered bones were found in the pit. At a depth of 0.60m, a piece of glazed pottery was found. Excavations continued and mud brick remains were found on the east side of the grave.

Burial: The burial chamber was 1.30m long and 0.70m wide. The dimensions of the bricks used for the entrance were 0.8x0.7m.

Finds: No materials have been found that can be associated with this grave, except for the piece of glazed pottery found in the filling of the tomb.

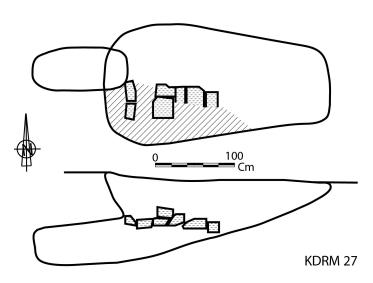




Figure 7. Grave KDRM27 (illustrations by M. Hayati).

KDRM27

Substructure: This tomb is located in the north-eastern corner of the grid. It is a rectangular pit grave with a cavity in the east-west direction, 2.1m long and 1.2m wide. It was regularly excavated on a natural hard clay soil. The surface of the grave was characterised by soft, white sandy soil, sometimes mixed with gravel grains, medium-sized stones, some crushed pottery sherds and the remains of eroded human bones. All these components could have been displaced from their original location.

Burial: At a depth of 0.4m, a layer of rubble emerged, consisting of half mudbricks, small stones, pottery sherds and parts of a human skeleton, randomly distributed inside the tomb and reaching a depth of 0.8m. The entrance to the burial chamber appeared at this depth in the form of a narrow round opening on the west side of the tomb. Its width was 0.3m and its length 1m. Another regular structure made of mud bricks appeared on the side of the southern sector of the cemetery, which could have been part of the chamber entrance or an additional extension from the outside.

Finds: Remains of a human skeleton, wooden fragments, various pottery sherds and vessels of good quality were found at the entrance of the burial chamber.

KDRM28

Substructure: It is a rectangular pit tomb with a lateral niche on the south side. The grave extends



Figure 8. Grave KDRM28.

in an east-west direction and is 1.4m long, 0.5m wide and 85m deep. Some sandstone slabs and bones were recovered from the backfill.

Burial: The burial niche is 1.4m long, 0.25m wide and 0.35m deep. A well-preserved skeleton without a skull was found in an outstretched supine position, the head to the west.

Finds: No materials were found in this grave.

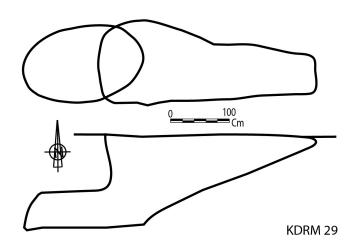




Figure 9. Grave KDRM29 (illustrations by M. Hayati).

KDRM29

Substructure: This tomb had already been opened by robbers, so it was further excavated. The tomb is cave-like and slopes from east to west, widening towards the west. The total length of the tomb was 3.5m, 1.5m, minimum width 0.8m and maximum depth 1.6m. The opening of the chamber appeared circular, with a diameter of 0.7m, a length of 2m to the west, a maximum width of 1.3m, and a height of 0.6m. The opening of the tomb was a small hole. It slopes gradually towards the interior of the tomb.

Burial: At a depth of 0.65m, the remains of four scattered skeletons were uncovered. Inside the chamber, scattered skeletal remains were found, representing different parts of the skeletons. The chamber was affected by water infiltration; this phenomenon probably occurred when the Nile level rose during the flood season. The skeletal remains were collected and a sample taken from the coffin for further examination.

Finds: At a depth of 0.30m, a piece of a ceramic vessel was found, which was apparently a small pot. It was broken, but the neck and the handle were visible. A very fine and well-polished ceramic cup was also found, painted with geometric signs on the rim. A corroded wooden coffin was also found in the chamber, badly damaged by water penetration.

KDRM30

Substructure: The grave is located near the centre of the grid in the northern part of the cemetery. The general shape after the removal of the first layer, which consisted of white sand, was a rectangular pit with a burial chamber extending from east to west. The filling of the grave





Figure 10. Grave KDRM30 during excavation and the stela.

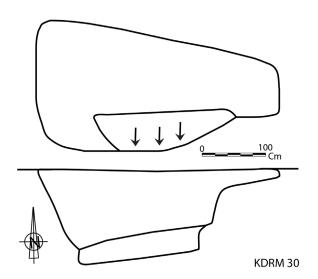




Figure 11. Grave KDRM30 (illustrations by M. Hayati).

consisted of sandy clay soil mixed with dense remains of human bones, pottery sherds, and stones. During the excavation, traces of a cross-sectioned masonry structure of the tomb made of mud bricks and regular sandstone came to light. Parts of a complete ceramic vessel resembling a vase were uncovered, and right next to it parts of a cylindrical sandstone were found, which later turned out to be a tombstone in Meroitic cursive writing in a good state of preservation.

Burial: At a depth of 0.5m, the true extent of the tomb came to light, so that its length was 3.5m and its width 2.1m. The tomb consists of a rectangular pit and a lateral niche cut into the base of the pit on the southern side. A small projection was left in the southern part to support the roof of the chamber. Traces of wood were found at a depth of 1.1m, indicating that it was probably a wooden coffin. Remains of at least two skeletons were found. The final depth of the tomb was about 1.2m and ended with a layer of stone forming the grave.

Finds: A Meroitic grave stela with cursive writing was found together with pottery sherds (see Annex).

KDRM31

Substructure: The tomb is cave-like and oriented east-west, with the entrance to the east. The total length of the tomb is 2.8m, its width is 0.8m at the end and 1.1m at the entrance. The grave is 1m deep.





Figure 12. Grave KDRM31.

Figure 13. Grave KDRM32.

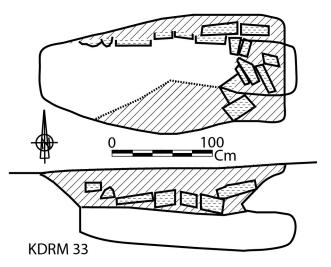




Figure 14. Grave KDRM33 (illustrations by M. Hayati).

Burial: The burial chamber is 1.8m long and has an entrance 0.6m long and 0.9m wide. The tomb was found in a disturbed state. The robbers removed two large stones that closed the entrance. Many bones were found scattered outside the burial chamber, including long bones and vertebrae.

Finds: No finds were made inside the tomb, except for an undecorated pottery sherd.

KDRM32

Substructure: This tomb is located in the north-eastern part of the grid; it is a cave tomb with a sloping descendary. The tomb extends over 2.2m in an east-west direction and 1.3m in a north-south direction. The southern sector of the tomb was lined with mud bricks, which formed a cover for the burial chamber, as they appear to have been cut into a rectangular shape 0.35m wide and 2m long. The final depth of the tomb was 0.4m.

Burials: Numerous bones were found in the easternmost sector of the tomb. A human skeleton without a skull was found in the burial chamber, extending from west to east, with the head to the west.

Finds: Unpolished, wheelmade redware pottery sherds were found.

KDRM33

Superstructure: This is a looted tomb on the south-western side of the grid. It is obvious that the tomb was completely covered with mudbricks. It has a similar shape to the rectangle or so-called vaulted tombs in the site.

Burial: The general shape of the tomb after excavation is a deep pit 1.3, 2.2m long and 1m wide. No bones were found in it.

Finds: The tomb was found to have been looted and only an area 0.7m long and 1m wide remained of the superstructure. No materials were found.

KDRM34

Substructure: This tomb is in the extreme north-eastern corner of the grid. It has the general shape of a rectangular pit with a lateral niche on its north side. The total length of the tomb is 2.3m, its width 0.6m and its depth 1m. The inner chamber of the tomb was 1.9m long, 0.5m wide and 0.2m deep. The grave was filled with fine sand, which could indicate an earlier excavation. Scattered bones were found at a depth of 0.6m. A skull was found on the north wall of the grave at a depth of 0.4m, which represents a disturbance. **Burial:** From this depth the tomb began to widen. The length of the tomb at a depth of 0.75m was 2.4m and its width 0.75m. The inner camber was 1.9m long, 0.5m wide and 0.2m deep. On the north-eastern side



Figure 15. Grave KDRM34 (illustrations by M. Hayati).

of the tomb, three blocks of white sandstone were found, arranged vertically to conceal the legs of the buried person. As the excavation continued, traces of small bones and a scattered skull were uncovered. Then the remains of a skeleton emerged, lying with its head to the west. This grave turned out to contain four individuals buried one on top of the other in a wooden coffin, remains of which are still preserved. All parts of the skeletons were found in a good state of preservation, except for the skulls. The position of the skeletons was stretched out or lying on the right side, facing west, hands over the pelvis. The lowest burial of the tomb was a woman wearing two iron anklets, which were strikingly large.

Finds: Apart from a piece of palm leaf woven in the shape of a basket, there were no other finds in the tomb.

KDRM35

Substructure: East-west oriented tomb with a sloping descendary. The dimensions of the tomb are 3m in length, 1.2m in width and 0.4m in depth. The grave entrance was closed with mud bricks and some sandstones. There were traces of water in the burial chamber, which affected the preservation of the chamber. The chamber was oriented east-west, 2m long, 0.8m wide and 1.2m deep.

Burials: a large quantity of scattered bones and some pottery sherds on the fill, indicating an ancient robbery. Two skulls were found in the fill at a depth of 0.4m - one of them distinguished by brown, soft hair and possibly from a juvenile.

Finds: No materials were found.



Figure 16. KDRM35 during excavation.



Figure 17. KDRM54.

KDRM54

Substructure: This is a small grave at the eastern end of the grid, found robbed. It is a rectangular pit with a lateral niche on the south side. Its length is 1.5m and its width 0.5m, the depth 0.8m.

Burial: Only a few vertebrae were found.

Finds: No finds were found.

Discussion

The excavations have brought to light new details about the burials that characterise the site of Kedurma and show that burial practises changed and evolved according to people's life situations. The excavated graves reveal how burial practises can express social identities.

The burial practises observed in the excavated tombs are in many cases a clear indication of general Meroitic traditions, while other elements seem to be linked to specific local Lower Nubian regionalisation, such as the tombs with a simple rectangular pit and a sloping descendary (KDRM27, 29, 31, 32), which were a common construction in Meroitic Lower Nubia. The same type was found at Sai (Francigny 2010, 52) and on the island of Arduan (Edwards and Osman 2000, 62). This type of tomb has been attributed to a tribal or proto-state elite during the late Meroitic period and the advent of Christianity in Lower Nubia (cf. Obłuski 2008, 529; El-Tayeb and Kołosowska 2005, 11-23).

Several tombs had a rectangular pit with many variants, such as a lateral niche, for example KDRM25, 28, 30, 34, and 54. Parallels were found in Akad (Abdelrahman 2009, 104), the Fourth Cataract region (Wolf and Nowotnick 2006, 22; el-Tayeb and Kołosowska 2005, 66; Ginns 2007, 21). Furthermore, this burial pattern has also been found in Sai and Sedeinga (Francigny 2009, 96; Rilly and Francigny 2013, 64) and was continuously present in Lower Nubia from the Meroitic period (cf. Rilly and Francigny 2012).

Graves with a ramp leading to the burial chamber in the shape of a foot - KDRM24 and 35 - are usually attributed to the Late Meroitic period (cf. Griffith 1925, 145; Vila 1976, 109; Emery and Kirwan 1935, 417ff; Vila 1978, 48). This type showed multiple variations, combining Meroitic and Lower Nubian traditions and developing into a type with an east-west orientation (cf. Obłuski 2008, 529). This type has been found on Sai Island (Francigny 2009, 95) as well as in the southern cemetery of Jebel Ghaddar near Old Dongola (Zurawski 1987, 41-46), in Kawa (Welsby 2001, 68-69, figs 5-6), in the Fourth Cataract region (El-Tayeb and Kołosowska 2005, 46) and Gabati (Edwards 1998, 15-17).

Tombs with a single vaulted chamber, such as KDRM33, are usually associated with Lower Nubian sites, although there are many variations. This type is found at Missiminia (Tomb 314, Vila 1980, 21, Type V, 26), Serra East, where low mounds were built over the burial pits of some tombs, in front of which chapels were built (e.g., Williams 1993, 162-163), Gebel Adda (Huber and Edwards 2012, 87) and Amara West (Cemetery D, Tombs G101, G106 and G305, Binder *et al.* 2010, 42), as well as at Tombos (Smith 2003, 142-145, fig. 6.9). In some of the latter examples, access was via a staircase and additional chambers were located away from the vaulted rooms.

Finally, KDRM26 consisted of a sloping descendary at least 2m long with a tapering axial chamber at the eastern end. A similar example was found on Arduan Island (Edwards and Osman 2000, 63).

Human remains were found in most of the excavated graves. On the basis of this excavation, it is now possible to establish that at least two to five individuals were buried in the burial chamber in about 35 graves of the total excavated in the cemetery, most probably sequentially. The skeletons could also have been buried in different phases. The presence of multiple burials in the excavated graves could indicate the reuse of the graves during different historical periods or be associated with some kind of family group, reflecting the long use of the same cemetery areas. This practise has interesting implications for the chronology of the cemetery, as the graves may have been reused over a long period of time (Edwards 1998).







Figure 18. selected pottery from the excavated graves.

All the excavated graves were aligned roughly eastwest. The deceased usually lay on their back with their hands over their pelvis. The skeletons were often covered with different types of shrouds, remnants of which were still preserved. The head always lay to the west, except in the case of KDRM24, where it was placed to the east. The wooden remains in most of the excavated graves confirm the use of wooden coffins in the cemetery.

Most of the excavated tombs did not contain complete grave goods. This is simply due to the looting that took place over time. We believe that the looting may have taken place shortly after burial, when the grave goods were still known to the living (cf. Francigny 2020, 602). This is in addition to the more recent looting activities in the region.

Although the chronological classification of the graves in the cemetery will probably be refined in future work, it is striking how many different grave types are found in a relatively limited area. Such diversity is known from Lower Nubian sites such as Amir Abdallah and Sai (Fernandez 1980; Rilly and Francigny 2012)

Finds from the excavated graves include iron anklets in KDRM34 and the Meroitic stela in KDRM30. Pottery included two fragments of cups decorated with stamps and floral motifs, a sherd of a painted bowl on a light surface, and a fragment of a vessel painted with a scorpion.

The techniques of these materials provided the first clue for dating the cemetery. According to David (2019, 88), the production of fine ceramics emerged in the first decades of the 1st century AD, when Meroitic potters integrated various techniques and forms from the Roman Empire into their own repertoire and adapted the methods of stamp decoration to their own iconography.

The discovery of the stela in Tomb KDRM30 proves the importance of the site as a Meroitic centre in the north. This discovery fills a geographical gap in terms of written sources between Kerma and Sedeinga/Sai. The well-preserved pigments of this stela look similar to those of the stela of Ataqelula found in Sedeinga in

2015 (Rilly and Francigny 2018, 73). Moreover, the stela is considered one of the most important datable objects among the artefacts from the cemetery, which places it in the middle of the $3^{\rm rd}$ AD according to palaeographic analysis.

Apart from its historical importance as a site, there is an urgent need for further research on this site, which is increasingly threatened by human activities such as looting and destruction (Bashir 2019; 2021).

Part of the cemetery has already been damaged, exposing a number of brick pyramids and at least 50 other tombs. Added to this is the looting of livelihoods. While the much-needed continuation of research on site is impossible due to the current war in Sudan, the comprehensive analysis of the records obtained so far is the best way to support our understanding of the site, to increase our knowledge of the Meroitic period and thus to highlight the importance of the archaeological heritage currently under threat in Sudan.

Appendix. The stela of Tardodebala

Claude Rilly

Conventions:

Superscript numbers indicate the lines.

Dotted letters (for example x) are uncertain.

Letters in half brackets (for example [0]) are certain, but hardly legible.

Illegible letters are represented by dots into full brackets: [.].

Invocation

¹Wos: went²pneqeli: So³ri: wetrri Oh Isis (untranslatable epithet)! Oh Osiris, the supreme one!

Nomination

⁴Trodeblowi:

This is Tarodebala.

Paternal filiation

⁵Yiloneli: te⁶rikelowi:

S/he was begotten by Yiloneli

Maternal filiation

Pitel: te⁷dxelowi:

S/he was born of Pitela.

Social description

wom<ni>thl: yetmde⁸lowi:

S/he was related to a chief priest of Amun.

xrpxel: yetmdelowi:

S/he was related to a city governor.

⁹ateqi: yetmdelowi:

S/he was related to a priest.

Sxder: 10 yetmdelowi

S/he was related to Shakhadera (?).

benb: Atiyete¹¹l: yetmdelowi:

S/he was related to Benaba (or to a benaba-official) in Atiye (Sedeinga).

Side[.]pb: yetmde12lowi

S/he was related to Side.paba

gorenel: yetmdelowi:

S/he was related to a royal scribe.



Figure 19a. The stela in situ.



Figure 19b. The stela after cleaning.

pe [.]¹³ armi[.]kelo:
S/he was???
mlomrto:
S/he was a good person of his/her city

Benediction C

xmlorlandholkte:
May you serve him/her a good meal.

Benediction A

ato; mhe psohte:
May you make him/her drink abundant water.

Benediction B

at mhe p¹⁵rsiarkete

May you make him/her eat abundant bread.

Comments

The text can be dated on palaeographical grounds (Transitional C/Late A) to the second half of the 3rd century AD. The majority of the funerary texts from Karanog, Sai Island, and Sedeinga are dated to the same period. The Kedurma stela is of fine workmanship. It is similar to the most beautiful stelae from Sedeinga, especially the stela of the Lady Ataqelula found in 2015, which also retained its pigments. On the Kedurma stela, the winged sun-disc flanked with snakes has partly kept its pigments made of yellow and red ochre. Traces of red colour can be also seen in the signs of the first lines of text. There is no doubt that the owner of such a beautiful monument belonged to the highest levels of the late Meroitic society of Kedurma.

This sandstone stela comprises 15 lines of text in cursive Meroitic script. Unexpectedly, it begins in the lunette of the stela where the five initial lines were engraved. This is quite rare, because this place is generally used to write the last lines when space is lacking at the end. However, this precaution was not sufficient since the scribe had to tighten the last line along the bottom edge of the stela. The signs are generally well drawn. Only some parts of the last lines are hard to read.

The deceased was probably a woman. Meroitic had no grammatical gender, so that feminine and masculine names can rarely be differentiated. In addition, the only kinship term that is found here is yetmde, which means 'related', more precisely 'niece/nephew' or 'younger cousin' in the maternal lineage and is gender neutral. There is no indication that the deceased could be the brother (wide) or the sister (kdite) or even the mother (ste) of any official. However, the long list of people with prestigious titles in yetmde-relation with the deceased, contrasting with the absence of personal titles, is generally found in women's funerary texts. It is however better to keep the two possibilities, male or female, in the translation by using s/he for 'she' or 'he'.

Among the titles given to members of his/her family, some important officials such as governor (*xrpxe*), specialised priest (*ateqi*) or royal scribe (*qorene*) are mentioned. The latter function is generally connected with the temple of Isis in Philae. Several clauses seem to mention relatives by their proper names, unless they are actually titles that are not yet attested elsewhere. This is for instance the case of the words *sxder* (l. 9-10) *or benb* (l. 10). In lines 9-10, the phrase *womthl* is certainly a contracted form (according to Griffith's law) of *womse-lh-l*. It could be a personal name *Womse* (pronounced Womashe) followed by the adjective *lh* 'big', 'elder' and the expected article *-l*. The translation would be in this case 'Womashe the elder'. Another solution that seems to me much more likely, is to suppose that the engraver omitted a syllable and wrote *womthl* instead of *womnithl*. This compound noun is a very common title reading

womnise-lh-l before application of Griffith's law and meaning 'priest of Amun in chief' (literally 'big').

One of the most interesting details of the text is the mention of *Atiye*, the Meroitic name of the city of Sedeinga, as the residency of a relative of the deceased. It shows that there were close relationships between the two Meroitic cities, Kedurma and Sedeinga.

Acknowledgments

The first author would like to express special thanks to the Michela Schiff Giorgini Foundation and the British Institute in Eastern Africa (BIEA) for their generous financial support of this project in the 2023 season. I am deeply indebted to them for this. Many thanks also to the Institute for the Study of the Ancient World (ISAW), New York University, for providing space for this research. I am very grateful for this.

References

Abdelrahman, M. 2009. 'Akad Rescue Project Season 2008', Sudan & Nubia 13, 103-106.

Bashir, M. 2019. 'Kedurma: The University of Khartoum Archaeological Project', Sudan & Nubia 23. 27-32.

Bashir, M. 2019. Interim Report for Excavation in the Meroitic Cemetery at Kedurma. Khartoum.

Binder, M., N. Spencer and M. Millet 2010. 'The New Kingdom Cemetery at Amara West', Sudan & Nubia 14, 25-44.

Blackman, A. 1937. 'Preliminary Report on the Excavations at Sesebi, Northern Province, Angelo-Egyptian Sudan, 1936-1937', *Journal of Egyptian Archaeology* XXIII, 145-151.

David, R. 2019. 'Ceramic Industries of Meroitic Sudan', in D. Raue (ed.), Handbook of Ancient Nubia, 875-895.

Edwards, D. 1995. 'A Meroitic Settlement and Cemetery at Kedurma in the Third Cataract Region, Northern Sudan', *Archaeology Du Nil Moyen* 7, 37-51.

Edwards, D. N. 1998. Gabati. A Meroitic, Post-Meroitic and Medieval Cemetery in Central Sudan. Volume 1. London.

Edwards, D. and A. Osman. 1992. Mahas Survey Reports 1. The Mahas Survey 1991, Interim Report and Site Inventory. Cambridge.

Edwards, D. and A. Osman. 2000. 'The Archaeology of Arduan Island - the Mahas Survey 2000', Sudan & Nubia 4, 58-70.

El Tayeb, M. and B. Kołosowska. 2005. 'Burial Tradition on the Right Bank of the Nile in the Fourth Cataract Region', *African Reports* 4, 51–74.

Emery, W. B. and L. Kirwan. 1935. The Excavations and Survey between Wadi es-Sebua and Adindan, 1929–1931. Cairo.

Fernandez V. 1980. 'Excavations at the Meroitic cemetery of Emir Abdallah', Meroitic Newsletter 20, 13-28.

Francigny, V. 2020. 'Death and burial in the kingdom of Meroe', in G. Emberling and B. B. Williams (eds), *The Oxford handbook of ancient Nubia*. Oxford, 589-603 [DOI: 10.1093/oxfordhb/9780190496272.013.29].

Francigny, V. 2009. 'The Meroitic Necropolises of Sai Island. First Season at the Meroitic Cemetery 8-B-5.A', *Sudan & Nubia* 13, 92-99.

Francigny, V. 2010. 'The Meroitic Necropolises of Sai Island. Second Season at the Meroitic Cemetery 8-B-5.A', *Sudan & Nubia* 14, 56-61.

Ginns, A. 2007. 'Preliminary Report on the Second Season of Excavations conducted on Mis Island (AKSC)', Sudan & Nubia 11, 20-25.

Griffith, F. L. 1925. 'Oxford Excavations in Nubia', University of Liverpool Annals of Archaeology and Anthropology 12, 57-172.

Huber, R. and D. Edwards. 2012. 'Gebel Adda Cemeteries 3 and 4 (1963-1964)', Sudan & Nubia 16, 80-87.

Obłuski, A. 2008 'Building tradition in Lower Nubia from the Meroitic age to after Christianization', *Polish Archaeology* in the Mediterranean 20, 525-540.

Rilly, C. and V. Francigny. 2013. 'Sedeinga 2012: A Season of Unexpected Discoveries', Sudan & Nubia 17, 61-65.

Rilly, C. and V. Francigny. 2012. 'Excavations of the French Archaeological Mission 60 in Sedeinga, 2011 season', Sudan & Nubia 16, 60-71.

- Rilly, C. and Francigny, V. 2018. 'Closer to the Ancestors. Excavations of the French Mission in Sedeinga 2013-2017' Sudan & Nubia 22, 65-74.
- Smith, S. T. 2003. Wretched Kush: Ethnic Identity in Egypt's Nubian Empire. London.
- Vila, A. 1976. La prospection archéologique de la vallée du Nil, au sud de laca- taracte de Dal (Nubia Soudanaise), Volume 4. District de Mograkka (est et ouest). District de Kosha (est et ouest). Paris.
- Vila, A. 1978. La prospection archéologique de la vallée du Nil, au sud de laca- taracte de Dal (Nubia Soudanaise), Volume 10. Le District de Koyekka (rive droite). Les Districts de Morka et de Hamid (rive gauche). L'île de Nilwatti. Paris.
- Vila, A. 1980. La prospection archéologique de la vallée du Nil, au sud de laca-taracte de Dal (Nubia Soudanaise), Volume 12: La nécropole de Missiminia, I. Les sépultures napatéenes. Paris.
- Welsby, D. A. 2001. 'Excavations within the Pharaonic and Kushite Site at Kawa and in its Hinterland, 2000-2001', Sudan & Nubia 5, 64-70.
- Williams, B. 1991. Meroitic Remains from Qustul. The University of Chicago Oriental Institute Nubian Expedetion 8. Chicago.
- Williams, B. 1993. Excavations at Serra East, Part 1-5: A-Group, C-Group, Pan Grave, New Kingdom, & X-Group Remains from Cemeteries A-G & Rock Shelters. Oriental Institute Nubian Expedition Volume X.
- Wolf, P. and U. Nowotnick. 2006. 'The Third Season of the SARS Anglo-German Expedition to the Fourth Cataract of the Nile', *Sudan & Nubia* 10, 20-31.
- Żurawski, B. 1987. 'Test Excavation at El-Ghaddar', in K. Grzymski (ed.), *Archaeological Reconnaissance in Upper Nubia*. Society for the Study of Egyptian Antiquities 14, 41-46.