

**The Brooklyn Museum's 2007 Season of Fieldwork
at the Precinct of Mut, South Karnak**
by Richard Fazzini

Abstract

Excavations in the Forecourt of Temple A in the northeast corner of the precinct uncovered the Dynasty XXX – Roman precinct enclosure wall, the Forecourt's northern sandstone sidewall and foundations of a sandstone colonnade. Remains of an earlier limestone wall were also found. On the south side, the team exposed a limestone paving, the Forecourt's south wall (mud brick with later baked brick repairs) and a wall running east from the Mut Temple past Temple A's 2nd Pylon. Work continued on the Roman Period structures built against the north face of east wing of the Mut Temple's 1st Pylon. Excavations in the area of the Ptolemaic Period Chapel D exposed the chapel's rear wall, built mainly of re-used limestone blocks, one decorated with an 18th Dynasty offering scene.

As part of its program of conservation and restoration, Brooklyn rebuilt the east wall of the Mut Temple's East Porch; conserved the remains of a small chapel inside the precinct just east of the entrance and the granite ram next to it; and continued work in Chapel D. At the request of the SCA, the expedition also built additional platforms (*mastabas*) as outdoor storage for unregistered blocks of temple decoration formerly stored in the on-site SCA magazines.

.....

This report is respectfully dedicated to the memory of Dr. Mohammed el-Saghir, former Director General of Antiquities for Upper Egypt. Dr. Saghir was a fine human being and a great scholar who cared passionately for the history and monuments of pharaonic Egypt. It was a privilege to have been able to work with him through the years.

The Brooklyn Museum's archaeological expedition to the Precinct of Mut at South Karnak is conducted under the auspices of the American Research Center in Egypt and with the permission of the Supreme Council of Antiquities¹. The 2007 season began in mid-December 2006 and ended in mid-March 2007.

In 2007 the expedition continued its program to explore the front area of the Mut Precinct. The goal of the work is to develop a clear understanding of the history of this area and its monuments so that appropriate restoration can be planned and carried out, making the site more accessible to scholars and visitors.

¹ The Expedition acknowledges with gratitude the cooperation and assistance of officials of the Supreme Council of Antiquities, in particular Dr. Zahi Hawass, Secretary General of the SCA; Dr. Magdy El-Ghandour, General Director for Foreign and Egyptian Missions; Dr. Mansour Boreik, General Director for Luxor; Dr. Ibrahim Suleiman, Director for Karnak. The SCA inspectors for this season were Mona Fathy Sayed and, following her two months in the position, Abdeen Ahmed Mahfouz. The SCA conservator working with us was Khaled Mohammed Wassel. Inspector Ahmed Araby Yunes oversaw the transfer of registered objects from the on-site SCA magazine to the new facility at Abu el-Gud. We thank them all for all their help with the season's work.

The staff for this season were Richard A. Fazzini, Egyptologist, Director and Co-Field Director; William H. Peck, Co-Field Director and Architect; Mary E. McKercher, Assistant Director, archaeologist, and photographer; Elsie H. Peck, archaeologist and artist; Jacobus van Dijk, Egyptologist and epigrapher; Herman te Velde, epigrapher and consultant on ancient Egyptian religion; and Lisa Bruno, conservator. Funding for the 2006 season was provided by the Brooklyn Museum's Charles Edwin Wilbour Fund and by William and Elsie Peck.

The Forecourt of Temple A

The north side of the Forecourt had never been completely excavated and was buried in brick debris from the northern enclosure wall.² Fig. 1a shows this side of the forecourt at the beginning of the 2007 season. Fig. 1b shows the entire Forecourt at the end of the season, and fig. 1c is a plan of the whole Forecourt. In his 1924-25 season of work at the precinct, Maurice Pillet had uncovered the two limestone Osiride statues visible in fig. 1a, lying in the forecourt. Both are of Tuthmosis IV, usurped by Ramesses II³. It was presumably Pillet who stood the larger against Temple A's 2nd pylon, and the smaller against the unexcavated debris on the north side of the court. The Mut Expedition this year moved this statue to a new position against the 2nd pylon, just to the north of the more complete statue.

In our excavations in the North side of the Forecourt, we discovered the remains of the limestone outer wall and inner colonnade that are associated with the limestone-faced pylon built (or restored/enlarged) by Ramesses II. These were framed on the south by a sandstone colonnade and on the north by a sandstone outer wall (fig. 2) that appear to belong with the Dynasty XXV rebuilding of the temple that included the present Second Pylon forming the east side of the Forecourt and most of the temple behind the Second Pylon. We also cleared the mud brick Precinct enclosure wall where it runs along the north side of the Forecourt. This wall shows two phases of construction: the wall itself, built of large, dark grey mud bricks; and a facing of mud brick added to the south face of the wall in the Ptolemaic or Roman Periods. It was coated with a layer of plaster, traces of which remain. Resting against the wall toward its west end was a thin slab of sandstone that proved, when turned over, to be a partially gilded raised relief lintel probably late Ptolemaic or early Roman Period in date⁴. (fig. 3). It cannot be dated more accurately as it bears no royal name. The SCA decided to transfer the lintel to the Luxor Museum of Art where it will go on display after conservation is complete.

The lintel's cavetto cornice has a winged disk from which hang the protective cobra goddesses of Southern and Northern Egypt. In the temple-shaped scene below are five child-deities, each squatting atop a lotus blossom rising from a strip of water, symbols of birth. Four of the deities are called "the very great first born child of Amun"; from right to left they are Khonsu, Horus, Harpre, and Somtus. The epithets of all four link them with the provision of food. The fifth deity wears the same headgear as the first and is named "Khonsu-Toth of Amenope, who gives years (i.e. a long life) to the one who is loyal to him". Facing these symbols of creation and re-creation is an altar-shaped table piled with food offerings beyond which stand two deities connected with childbirth: a Bes-like figure called Asha-ikhet ("Rich of Possessions") and a hippopotamus goddess called "She who is in heaven, who guides the gods", one of twelve hippo goddesses (representing the 12 months of the year) often shown in *mammisis*.⁵ The scene is surrounded by a painted band with an inscription in ink that is

² For the Mut Precinct's outer and ultimate enclosure walls, see J.-C. Golvin and El-Sayed Hegazy, "Essai d'explication de la forme et des caractéristiques générales des grandes enceintes de Karnak," *Cahiers de Karnak IX, 1993* (Paris, 1993), pp. 145-156; J.-C. Golvin, "Enceintes et portes monumentales des temples de Thèbes à l'époque ptolémaïque et romain," in S.P. Vleeming, *Hundred-Gated Thebes. Acts of a Colloquium on Thebes and the Theban Area in the Graeco-Roman Period (P.L. Bat. 27)*, Papyrologica Lugduno-Batava XXVII (Leiden, 1995), pp. 31-41. For its original enclosure wall, see, e.g., R. Fazzini, "Some Aspects of the Precinct of the Goddess Mut in the New Kingdom," in E. Ehrenberg (ed.), *Leaving No Stones Unturned. Essays on the Ancient Near East and Egypt in Honor of Donald P. Hansen* (Winona Lake, Indiana 2002), pp. 63-76, esp. 63-65 with Fig. 1.

³ M. Pillet, "Rapport sur les travaux de Karnak (1924-1925)", *ASAE XXV*, pp. 16-17.

⁴ Expedition number 21ME.WB8: length: 110 cm; height: 45 cm; depth: 8 cm. A brief article on this lintel by R. Fazzini and J. van Dijk will appear in *Egyptian Archaeology* no. 31 (Fall 2007).

⁵ This information on the identification of the deities represented on the lintel was provided by J. van Dijk, whom I thank for his diligent and enlightening research.

virtually illegible in normal light. We hope that infrared photography next season will reveal more of the text. From the Third Intermediate Period to Roman times Temple A functioned as a “birth house”⁶ dedicated to the cult of the repeating birth of child-gods and to the divine birth of kings, so it is not surprising to find a lintel with scenes relating to the rebirth of child-gods there.⁷

We do not know the original location of this lintel, but there are two possibilities near the lintel’s find spot: a small recess that could be a chapel set into the extreme west end of the Forecourt’s limestone side wall where it meets the limestone facing of Temple A’s first pylon (visible in fig. 1b and fig. 2); and a free-standing building in the northwest corner of the court whose baked brick and stone foundations were discovered this year (visible in fig. 1b).

In the central area of the Forecourt we completed the excavation of Ptolemaic-Roman Period drains in baked brick and terracotta and uncovered the remains of the deteriorated sandstone paving that ran from the first to the second pylon. On the north side of the court as well we uncovered a circular feature of baked brick and stone that had heavy burning in the center (see fig. 1b) whose purpose is not yet known.

We continued the work begun in 2006 of clearing the debris from the south side of the Forecourt, where there are remnants of a New Kingdom limestone side wall and colonnade as well as later additions that include a limestone floor into which were set three large pottery vessels⁸. In 2007 the plan of this area was further clarified with the discovery of the southeast corner of the mud brick south wall of the Forecourt, which turns north to meet the south face of the temple’s 2nd pylon (fig. 4a). This wall has a foundation of small limestone blocks and extensive baked brick repairs to its north face, presumably dating to the early Roman Period when other work was being carried out at the site, including before the East Tower of the Mut Temple’s First Pylon.⁹

To the south of this narrow wall we were able to define more clearly the wider mud brick wall (fig. 4b) running east from the unscrubbed stone gateway discovered in 1978 that we call the “Lepsius Gate” because it was visible on Lepsius’ plan of the site. Although this wall is solid brick, on its south side it appears to be overlaid by the casements of the platform on which the High Place, Chapel B stands.¹⁰ A series of three narrow mud brick walls

⁶ For Temple A as a mammisi, see H. De Meulenaere, “Isis et Mout du mammisi,” *OLA* 13 (1982), pp. 15-29, and the references in R. Fazzini, “Two Semi-Erased Kushite Cartouches in the Precinct of Mut at South Karnak,” in *Causing His Name to Live: Studies in Egyptian Epigraphy and History in Memory of William J. Murnane* (2007), at present an on-line publication at <http://history.memphis.edu/murnane/Fazzini.pdf>, p. 5, n. 24.

⁷ In Fazzini, *loc. cit.*, I have argued that Temple A shows two phases of rebuilding in Dynasty XXV, one in the reign of Shabaqo and the other in the reign of Taharqa. I also noted (pp. 5-6), with reference to K. Cooney, “The Edifice of Taharka: Ritual Function and the Role of the King,” in *JARCE XXXVII*, 2000, pp. 15-47 that one could consider the Lake Edifice, possibly built by Shabaqo and rebuilt by Taharqa, a site for solar-Osirian royal justification and Temple A as the Dynasty’s counterpoint focus for mammisiac royal justification.

⁸ The work was described in more detail in the report on the 2006 season submitted to the SCA for publication in the *ASAE*: R. Fazzini, “Report on the Brooklyn Museum’s 2006 Season of Fieldwork at the Precinct of the Goddess Mut at South Karnak”, *ASAE* 81 (2007), pp. 101.

⁹ See, for example, the late Ptolemaic or Roman Period stela and the Roman Period patellae found before the Mut Temple: R. Fazzini, “Some Objects Found before the First Pylon of the Mut Temple”, in Z. Hawass and J. Richards (eds.), *The Archaeology and Art of Ancient Egypt. Essays in Honor of David B. O’Connor I*, *CASAE* 36 (Cairo, 2006), pp. 277-289. References are given there to work carried out at the precinct begun by Augustus and completed by Tiberius.

¹⁰ For High Places, including that of the Mut Precinct, see C. Traunecker, “Les «temples hauts» de basse époque: un aspect du fonctionnement économique des temples,” *RdE* 38 (1987), pp. 147-162; A.J. Spencer, “The Brick Foundation of Late-Period Pterial Temples and their Mythological Origin,” in J. Ruffle, G. Gaballa, and K. Kitchen (eds.), *Orbis Aegyptiorum Speculum. Glimpses of Ancient Egypt. Studies in Honour of H.W. Fairman* (1979) pp. 132-137; A.J. Spencer, “Casement Foundations Once Again,” in J. Ruffle, G. Gaballa,

connects the gate wall and the narrower wall of the Forecourt. These cross walls seem to be integral to the gate wall but only abut the Forecourt's south wall. Although the upper courses of the wall running east from the gate are robbed out south of Temple A's 2nd Pylon, the wall continues to run east past the pylon (fig. 4a) and into the east baulk that forms the eastern limit of excavation in 2007. Also visible in fig. 4a is a small mud brick structure built against the east end of the 2nd Pylon's south face. The small amount of pottery from here seems to be late Roman and may be related to a cache of pottery, including a "fish plate"¹¹, found nearby during the 1979 season of work.

North of the East Tower of the First Pylon of the Mut Temple

In 2006 the expedition began excavation of a series of five rooms, some of them vaulted, built against the east wing of the Mut Temple's first pylon, and of the structures to their north¹². One goal of the 2007 season was to continue the excavation of the area and determine the relation between these structures, the Mut Temple's East Porch and Temple A's Porch. Fig. 5 shows the area at the end of the 2006 season, while fig. 6 is a plan showing the phases of construction as we understood them at that time. The structures were built on a layer of earth approximately 45 cm deep that accumulated or was purposely laid down east of the East Porch between the Mut Temple's First Pylon and the south side of Temple A's colonnaded porch.

In 2007 we concentrated on the structures built against the pylon (rooms 1-4), dismantling them to determine their phases more clearly. Fig. 7 is a plan of rooms 1-4 at the end of the 2007 season. We confirmed that the essential sequence of phases determined in 2006 was correct (see fig. 6): that is, that the structures at the east end of the area and the walled court to the north predate the rooms built against the pylon and that rooms 4 and 5 were built before rooms 1-3. However, we have had to revise our ideas about some of the details.

As we removed the walls north-south walls built against pylon we uncovered traces of the plaster on the pylon face, confirming that, like the west wing¹³, the east wing of the pylon was plastered rather than faced with stone.

At the lowest level of the pylon face reached this year we uncovered a projection running the length of the pylon from the east end of the pylon immediately west of the Lepsius Gate to the west wall of room 3 (see plan, fig. 7). We have yet to remove later construction from the south side of room 4 (see below) to see if the projection continues across this area as well, but we found no trace of it on the south side of room 5. In the western part of room 1 we uncovered the foundations of an earlier north-south wall that is surely part of the phase 1 construction (see plan, fig. 7) and is also built against the projection.

The doorway at the west end of room 2's north wall showed three distinct phases: a stone threshold covered by a layer of earth on which a second threshold of two blocks of stone had been laid. The doorway was later bricked up, presumably when the structure to its north was constructed. Its inner surface was blackened by the intense fire that occurred in the room¹⁴. On the east side of the room, below the burn level and defined on each side by it, lay

and K. Kitchen (eds.), *Studies on Ancient Egypt in Honour of H.S. Smith*, EES Occasional Publications 13 (1999), pp.295- 300; David Berg, "The 29th Dynasty Storehouse at Karnak," *JARCE* 24 (1987), pp. 47-52.

¹¹ For a discussion of the dating of these plates, whose inner surface is decorated with one or more stylized fish, see G. Pierrat, "Peintres potiers d'Assouan du IV^e au VI^e siècle ap. J.-C.," *La Revue du Louvre et des Musées de France*, no. 5/6 (1995), pp. 31-42.

¹² For more detail, see R. Fazzini, "The 2006 Season", *ASAE* 81 (2007), pp. 102-106.

¹³ R. Fazzini and W. Peck, "Mut Temple Expedition", *NARCE* 112 (Fall 1980), p. 42

¹⁴ R. Fazzini, "The 2006 Season", *ASAE* 81 (2007), p. 103.

a single row of mud brick parallel to the east wall. It intersected a semicircular brick feature in the northeast corner (see fig. 6) that was at first thought to be the remains of an earlier structure. It now appears that this feature is part of the earlier phase of the room, associated with the lower stone threshold.

In 2006, it was determined that room 2's south side (the pylon face) had been reinforced by the addition of a brick wall built against the pylon (see below). In 2007, at the southwest corner of the room, below the added wall and the level of the mud-brick feature just described, we uncovered a mud brick square built against the projecting ledge of the pylon, its west side covered by the west wall of the room (see plan, fig. 7). We have yet to determine if this feature belongs with the pylon or is part of the room.

The work of the 2007 season greatly clarified the brickwork in these rooms and the sequence of construction. The north wall of room 3 was clearly built against the east wall of room 4. The uniformity of the line of the north walls of Rooms 1-3 (see plan, fig. 7) suggests that they may have been constructed as a unit. However, the existence of a lower level of mud brick along the south side of the present north walls of rooms 1-3 suggests the possibility of earlier structures here; there is no evidence of this lower brickwork in room 2.

The inner face of the west walls of all three rooms were reinforced by the addition of an extra row of bricks, separated from the original wall by a thick layer of whitish plaster or mortar, presumably to support the vaulting whose remains were uncovered in 2006. The brick addition to the south side of room 2 probably served the same purpose, although there is no evidence of similar reinforcement on the south sides of rooms 1 and 3.

In 2006 we hypothesized that room 4 had undergone three basic phases (see fig. 6): construction of the inner walls with a stone threshold (phase 2 on the plan); expansion to the north, with the addition of a second, higher threshold and an antechamber (phase 4); and finally the addition of an east-west cross-wall dividing the room into two sections (phase 6). When we began to examine the walls this season we discovered that the construction history of this room was more complex.

The east and west walls of the earliest phase (fig. 8) were built against the pylon face and constructed of large grey bricks that resemble those of the pylon itself. The east wall and the eastern part of the north wall had a facing (or at least a footing) of small sandstone blocks. This is the phase to which the lower threshold probably belonged. In the 2nd phase, the room became smaller with the addition of new brickwork on the east, west and south sides, covering the sandstone footing. In this phase the south wall was built against the pylon face but the east and west walls were cut into the pylon; the cuts are visible in fig. 8. This reinforcement of the walls might suggest either the addition of a second storey or of a vault to the room, although we found no traces of either in the ruins of the structure. The new wall was separated from the core wall by a thick layer of white plaster or mortar. Remains of this same hard plaster were found between the bricks of the south wall. The east wall of this phase was plastered, and the quantity of plaster fragments and lumps found in the area suggests the west wall was as well. Four rows of brick extending north from the south wall probably belong with this phase, along with the oval, mud brick-bordered pit discovered in the southern half of the room. The brick may be a flooring, but if so it does not extend throughout the room. The pit was filled with pottery consisting mainly of amphora fragments and bowls similar to those found in the "cistern" uncovered north of room 1 in 2006¹⁵. The brick "floor" and the rim of the pit lay several centimetres below the plaster floor of the later phase.

The north wall of room 4 was thickened and a new facing of brick was added to the outer faces of the east and north walls. It is this phase of the wall that room 3's north wall abuts. The threshold was raised, a new stone sill was laid, and the small antechamber may

¹⁵ See Fazzini, "The 2006 Season", *ASAE* 81 (2007), pp. 103-104.

have been built at this time as well. A fire within the room deposited a layer of burnt debris that covered the floor and ran up to (but not over) the south side of the later sill. This threshold, the doorjambs and the floor of the room were eventually covered with a thin layer of plaster, creating a floor that sloped down towards the pylon face. A mud brick wall was built across the middle of the room above the plaster surface. It may have divided the room or may indicate a late re-use of the room, on a smaller scale, after the collapse of the room's northern wall.

We have now recovered a significant number of coins (55 in 2006 and 18 in 2007) from various levels of rooms 1-5 and the area to their north. Of the 27 that can be identified, 2 date to the reign of Nero (54-68 AD), 1 to Domitian (81-96 AD), 4 to Trajan (98-117 AD), 6 to Hadrian (117-138 AD), and 9 to the reign of Antoninus Pius (A.D. 138-161), suggesting a primarily 1st-2nd century AD date for most of the activity in the area. Only 4 of the identifiable coins are Ptolemaic¹⁶.

The pottery in all phases of these structures seems to accord with a mainly 1st-2nd century date as well, although some sherds may be as late as the late 4th century. In 2006 we found one almost complete barbotine vessel (fig. 9) and in 2006 and 2007 have found other fragments of barbotine ware. There are many fragments and several whole examples of red-slipped bowls and plates decorated in black/purple paint with either parallel horizontal lines around the bodies of bowls or on the flat rims of plates or rather crudely drawn plant motifs stems blob-like blooms or leaves¹⁷. It has been suggested that this is a locally-made ware that had its origins in the Ptolemaic Period and continued to be popular, in the Theban area alone, into the Roman Period¹⁸. We have many examples of fine, pale beige eggshell-thin cups in Aswan clay whose upper parts are a dark brown. They resemble cups of Gempeler's types T602 and T605, both of which he dates to the 1st-4th century AD¹⁹.

Toward the end of the season we made a small sounding in the southwest corner of room 4 (see plan, fig. 7). The first phase west wall of room 4 (the east wall of room 5) continued down for about 50 cm, although it stopped about 60 cm north of pylon face. Immediately below the brick "floor" in this area was a thin layer of earth over a clump of plaster chunks mixed with a few pieces of pottery that may be debris from the building of the south wall. The plaster sat atop a solid mass of mud brick that filled the area between the pylon face and the north baulk of the sounding and extended about 140 cm east from the west wall, where it ended cleanly. When this brick was removed, a row of large bricks was revealed that appears to be the footing for the pylon. To the west (room 5) a pit cuts through the northern edge of the footing, but remains of the mud mortar between two courses of brick are evident (fig. 10).

In 2006 we discovered that the west half of room 5 had been obliterated by a large trench that followed the line of the east side of the east porch. Few architectural remains were preserved (see fig. 6). By the end of the season we had uncovered the foundations of the east

¹⁶ The expedition thanks Dr. Penelope Weadock Slough, former Associate Curator of Ancient Art at the Detroit Institute of Arts, for undertaking the task of researching the coins.

¹⁷ J. Lauffray, *La chapelle d'Achôris à Karnak: 1. Les fouilles, l'architecture, le mobilier et l'anastylose* (Editions Recherche sur les Civilisations, 1995), pp. 88-95 and figs. 42-44, whose pottery closely resembles material excavated at Mut in 2006-07. See also K. Myśliwiec, *Keramik und Kleinfunde aus der grabung im Tempel Sethos' I. in Gurna* (MDAIK 57, 1987), e.g., fig. 857-870 and p. 83. G. Pierrat, in "Evolution de la céramique de Tôd du II^e au VII^e siècle apr. J.-C.", *Cahiers de la Céramique Égyptienne* 4 (1996), p. 205, fn. 97, notes that similar pottery at Tod is known for the Ptolemaic Period alone. J. Hayes, on p. 388 of *Late Roman Pottery* (London, 1972) comments that some forms of Egyptian Red Slip Ware "A", copying African Red Slip Ware, only appeared in Thebes in the late 4th century, and until then "painted wares in the local tradition appear to have dominated the market".

¹⁸ G. Pierrat, "Peintres potiers d'Assouan", p. 37.

¹⁹ Gempeler, *Elephantine X*, T602: p. 122 and Abb. 70, 8-10; T605b: p. 124 and Abb. 70, 17-18.

Porch's east wall and traces of the mud brick foundation revetment at its south end (fig. 10). At the north end of the area was a shallow layer of stone chips, but no traces of paving. In the earth fill at the deepest level we reached this season we made a surprising find: a somewhat crudely-carved serpentine cylinder seal (fig. 11)²⁰.

In 2006 we discovered a small complex of mud brick walls and bins built against the north walls of rooms 2 and 3 and blocking entry to those rooms (see plan fig. 6), the doorway of room 2 having actually been bricked up (we have not found any threshold for room 3). We theorized that this might be the remains of a stairway rising from the east and giving access to the vaulted rooms from above, the bins being built conveniently under the stairway.

Excavation of this feature in 2007 did not support the theory. The part of the feature north of room 2 consists of an east-west wall subdivided into 3 sections by small cross walls. It appears more likely now that this feature and the two bins to the west were part of a food preparation or storage area. This idea is supported by the quantity of cooking pots and amphorae found in the area and the presence of some animal bones. The feature still appears to be a part of phase 4 of construction as described in the article submitted to the *ASAE* in 2006.

East Porch

The principal work in the Mut Temple's East Porch this year was the consolidation of the deteriorated walls of the southern part of the colonnade as described below. After that work was completed this year, the expedition decided to move the drums of the fallen fourth column of the east row that spanned the porch. The paving of the northern part of the porch ran up to the fallen column. Work at the south end of the porch in earlier seasons had revealed the foundations of the southern part of the Porch, made up of large sandstone blocks and re-used limestone blocks bearing the cartouche of Ramesses II. The area between these foundations and the column had been robbed out and was filled with ashy earth and debris that included many fragments of a purple quartzite statue of Montuemhat and a monumental unfinished yellow quartzite head of Amunhotep III, (Fig. 12) tossed into the void²¹. As the colossal head lay partially under the column, it seems clear that the robbing out took place before the column collapsed.

Once the column was moved, it became evident that the paving of the northern portion of the porch continued to the middle of the 4th column from the north. To the south the paving under the fallen column had been mostly robbed out, as was true further south. The newly visible area also consisted of earth, ashy in places, with fragments of broken sandstone, including parts of a cavetto cornice. Only one block of possible paving seemed to be in place in this area. When we dug deeper we discovered the sand foundation trench of the 4th column of the west row and a semi-circular patch of lighter soil in the center of the area about 50 cm below the paving in the center (fig. 13). This semicircle is approximately the

²⁰ Expedition no. 21ME.39 h: 2.2 cm; diam: 1.8 cm William Peck suggests it may be early Dynasty I or II (perhaps I) and provided the following references. For comparisons to the design on this seal, see P.E. Newberry, *Ancient Egyptian Scarabs* (London, 1905), Pl. III, particularly no. 11. For related Early Dynastic seals in the Petrie Museum, University College, London, see their online catalogue: <http://www.petrie.ucl.ac.uk/index2.html>. For a discussion of the early use of cylinder seals in Egypt during the Archaic Period, see W.C. Hayes, *The Scepter of Egypt* Part 1 (Cambridge, Massachusetts, 1953), pp. 38- 39 with fig. 28. According to A.C. Mace in *The Murch Collection of Egyptian Antiquities* (New York, 1916), p. 6, "seventeen of our examples belong to an interesting type which dates back to the very beginning of the dynastic period." Murch's collection, now in the Metropolitan Museum of Art, was principally acquired while in Luxor, suggesting that early cylinder seals, while rare, were well-attested in the area.

²¹ Expedition no. 16M.12; h: 1.28 m, w: 67 cm, d. 1.04 m. See R. Fazzini, "The Precinct of the Goddess Mut at South Karnak 1996-2001", *ASAE* 79 (2005), pp. 85-86.

same diameter as a column base re-used in the foundations of the existing East Porch. Is it possible that the approach to the Mut Temple was once flanked by a single row of columns, replaced in Dynasty XXV by the double colonnades of the East and West Porches?

The Area of Chapel D and the Taharqa Gate

Another goal of the 2007 season was to make progress in the excavation and preservation of the Ptolemaic Chapel D and the Gateway of King Taharqa, in the western part of the front area of the precinct. With the assistance of the CFETK's large crane, we were able to move several large ceiling blocks from the mound of debris west of the chapel and place them on bricks near the new mastabas. We also removed two large pieces of an elaborate lintel from the same area. Jacobus van Dijk, who is studying the chapel's decoration, was able to fit them back together on one of the new mastabas. Unfortunately, however, only part of the lintel is preserved and there is not enough left of the doorway it once adorned to put it back in position.

A small excavation was carried out to the west of Chapel D to find the remains of the wall that once ran north from the Taharqa Gate, against which the chapel was built. In the area excavated, the wall appears to have been completely robbed out; no traces of mud brick and very little pottery were found.

We also conducted work along the rear, east and west walls of the chapel, confirming that it had been built into the face of the precinct enclosure wall. It had long been known that Chapel D was built partially of limestone. Our work this year determined that the rear wall of the chapel was built of large re-used limestone blocks 90-117 cm in depth, including two that were carved to have a torus moulding at the chapel's northwest corner. The outer face of the block (the exterior of the rear wall of the chapel) proved to be a New Kingdom low raised relief of offerings whose western end was destroyed when the torus moulding was carved (fig. 14a-b).

In addition, we cleared the earth that had accumulated along the south face of the enclosure wall from Chapel D to the precinct entrance. In the process we revealed the Roman Period baked brick repairs to the lowest courses of the entire wall in this area. Behind one of the sphinxes we found a small cluster of what appears to be late Roman pottery.

At the very end of the season we were able to begin excavation of the debris blocking the Taharqa Gateway. This was in preparation for the next season of work when we hope to complete excavating the gate and begin restoration work on the structure, including the repositioning of a number of decorated blocks from the gate that have been found in past seasons.

Conservation and Restoration

Reconstruction work was carried out on the walls of East Porch, the 2nd Pylon of Temple A and Chapel D as described below²². The general procedure for all reconstructive work was as follows:

Stone surfaces were consolidated with a dilute mixture (2.5-5%) of Paraloid B72 (a copolymer of ethylmethacrylate and methylacrylate) in acetone and ethanol of various proportions depending on the availability of the solvents. The adhesive mixture was either injected into cracked areas or brushed on as needed.

When the stone pieces were separated, they were re-adhered using a thick epoxy resin

²² All restoration was carried out under the able supervision of Khaled Mohammed Wassel, SCA Conservator, and Lisa Bruno, Brooklyn Museum conservator. We also acknowledge with great thanks the skill and expertise of Mohammed Gharib and Sayed Mohammed, the two stone masons who worked on all these projects. Their technical skill and their dedication to the preservation of Egypt's monuments impressed all who worked with them.

(Sika 31) in a ratio of 2 parts resin to 1 part hardener. If necessary, steel pins were added to strengthen joints. If the stone was not in separate pieces, a thinner epoxy resin (Sika 52) was injected into cracks to provide strength in a ratio of 2 parts resin and 1 part hardener.

Mortar was used as needed to seal joints and fill gaps. The general mortar mixture consisted of sand (9 parts), white cement (1.5 parts), and lime (1.5 parts) or a 3:1 sand to cement/lime mixture.

Where the original sandstone had decayed beyond saving they were replaced with new sandstone blocks cut to size.

East Porch, Mut Temple

At the southern end of this structure, the east wall and columns were in poor condition. In addition, the sandstone block of the only remaining intercolumnar wall had split vertically and slipped. Our first major conservation project this year was to conserve and restore this structure. After the foundations and lower courses of the south end of the Porch were consolidated and repaired, the intercolumnar wall was dismantled, its stone consolidated, and the two pieces rejoined. The foundations of this wall were also treated and rebuilt before the conserved intercolumnar slab was put back in position.

Chapel and Sphinx east of the Precinct Entrance

Immediately west of the sandstone ram sculpture re-erected during the 2006 season²³ are the remains of a small sandstone chapel of Dynasty XXV or XXVI of whose walls only the lowest course remains. A small New Kingdom granite statue of a king before a recumbent ram of Amun has stood west of this chapel since at least the 1920s²⁴; its original location is unknown. In 2007 the expedition treated and restored both monuments. Where the chapel's foundations had completely eroded a new foundation was constructed, isolated from ground water. The blocks of the walls were consolidated and re-erected on the foundation. The sphinx was placed on a new sandstone base. Its left foreleg was re-attached and the surface consolidated as needed. Fig. 15 shows the area at the start of the season and after completion of the restoration.

In digging the foundation for the ram's new base, a fragment of a Sakhmet statue was uncovered, consisting of the feet and the left leg and throne, with the epithet preserved. The fragment was moved to the *mastaba* in front of the north wing of Temple A's 2nd pylon.

Temple A, 2nd Pylon

One of the monuments selected by the SCA for the Museum of Civilization and removed from the precinct this season was the large limestone statue of Tuthmosis IV mentioned above. When the statue was moved, we found that the lowest courses of the pylon's stone face had completely decayed, leaving a hole almost 2 meters long and a meter deep. While this allowed us to see that the this wing of the pylon was built of mud brick with only a facing of stone, restoration of this part of the monument became an urgent matter to prevent its collapse. Fig. 16 shows the hole in the pylon and its restored state.

Area of Chapel D and the Taharqa Gate

In addition to excavation, the work in Chapel D included the permanent restoration of one of its columns and the temporary support of its east and west walls until they can be rebuilt in the coming season of work.

²³ R. Fazzini, "The 2006 Season", *ASAE* 81 (2007), p. 107.

²⁴ M. Pillet mentions finding this ram standing just south of the east wing of the Propylon: "Rapport sur les travaux de Karnak (1922-1923)", *ASAE* XXIII, 2^{ème} fascicule (1924), p. 136.

Mastabas

During the 2007 season the SCA's storage magazines at the site were emptied of their registered objects and of unregistered decorated blocks from several structures at the site, most notably Chapel D and the Mut Temple's Contra-Temple. A few of the officially registered objects in these magazines were selected by the SCA for the new Museum of Civilization at Fustat and removed from the site, but the majority were transferred to the SCA Museum/Magazine at Abu el-Gud.

In order to provide safe outdoor storage for unregistered blocks, at the request of the SCA the existing mastabas in the front east area were re-arranged and additional mastabas were built. One group, along the west side of the Mut Temple's West Porch now holds blocks from the Hwt-Ka ("soul chapel") of Nesptah that was built within this porch. Following further study, we hope to eventually rebuild what is preserved of this chapel of a son of the famous 4th Prophet of Amun, Montuemhat²⁵. The main group of new mastabas was built east of Chapel D in the area excavated by the SCA several years ago to hold the bulk of the unregistered blocks removed from the on-site SCA magazines. And finally, a low mastaba was built along the south side of the existing mastaba to hold fragmentary Sakhmet statues.

²⁵ For a brief report on the excavation of the West Porch, see Fazzini, *ASAE* 79, p. 86. In a recent SCA Luxor Lecture, Farouk Gomaa reported the discovery that Montuemhat had two sons named Nesptah, each by a different wife. The Mut Precinct Hwt-Ka was built for the first son named Nesptah who also had a burial chamber in Montuemhat's tomb.



Fig. 1a The north side of the Temple A Forecourt at the beginning of the 2007 season, with the two limestone statues of Tuthmosis IV (recarved for Ramesses II) on the right.



Fig. 1b Temple A's Forecourt at the end of the season, looking southeast.

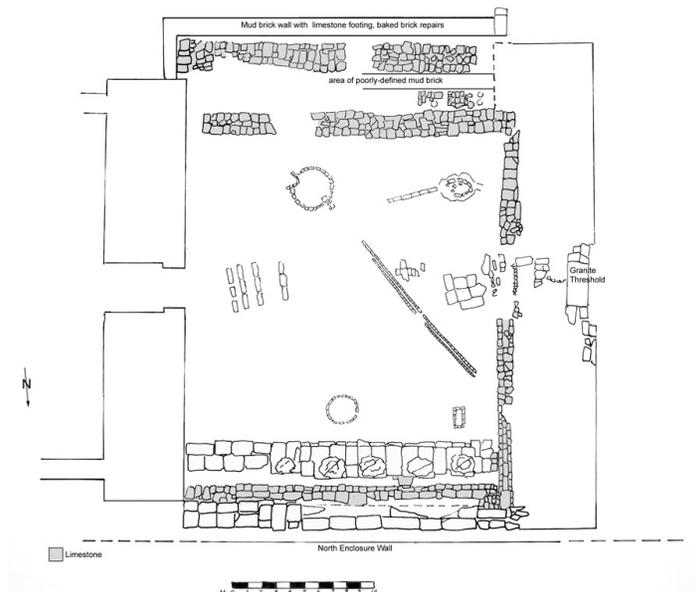


Fig. 1c Plan of the Forecourt at the end of the season.



Fig. 2 North wall of the Forecourt, looking east showing the enclosure wall, the sandstone north wall of the Forecourt with blocks slipped out of position, remains of the limestone colonnade, and the foundations of the sandstone colonnade. An arrow indicates the small chapel(?) at the west end of the wall.



Fig. 3 The gilded sandstone lintel (21ME.8).



Fig. 4a View to the northwest of the Forecourt showing the mud brick south wall of the court where it turns to meet the temple's 2nd pylon. In the foreground is the wall that runs from the Lepsius Gate past the 2nd pylon. The late brick structure at the 2nd Pylon's east end is also visible.



Fig. 4b The Lepsius Gate (foreground) and the wall running east from it (center), with the cross walls that abut the Forecourt's south wall. The New Kingdom limestone wall and colonnade foundations are on the left.



Fig. 5 The area north of the east wing of the Mut Temple's First Pylon at the end of the 2006 season, showing the structures built against the pylon and the remains of the colonned porch of Temple A (center).

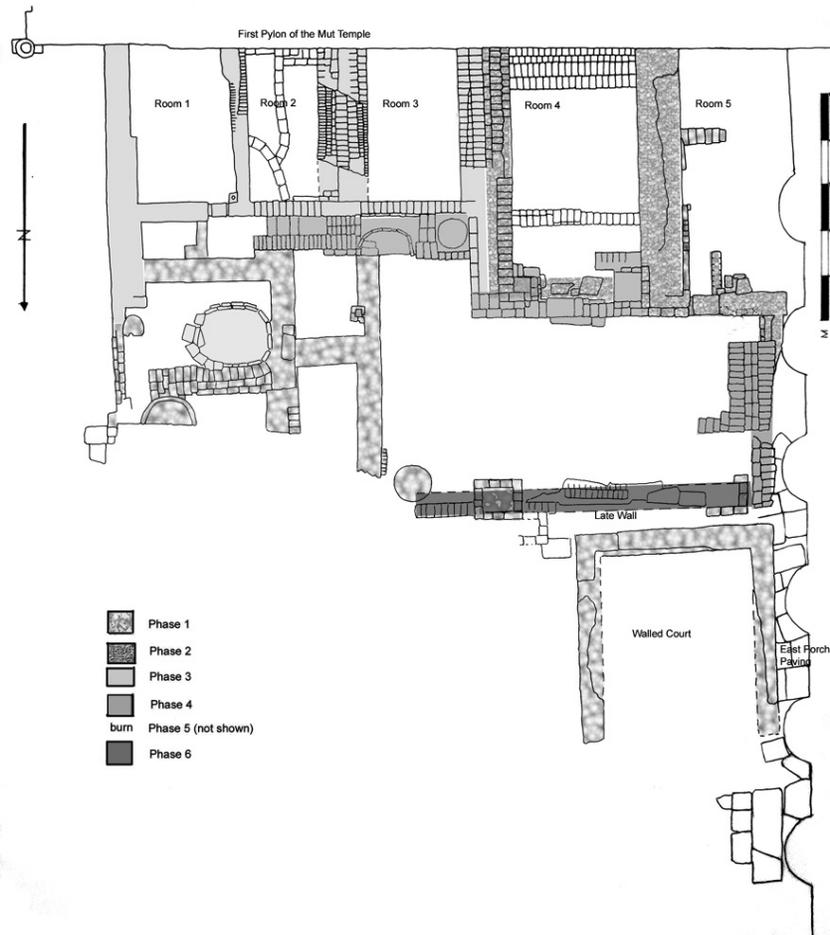


Fig. 6 Plan of the area north of the Mut Temple's First Pylon, with the phases of construction as understood at the end of the 2006 season.

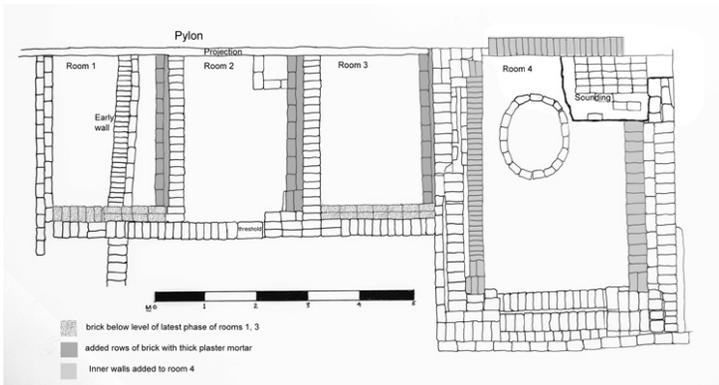


Fig. 7 Plan of rooms 1-4 showing the phases of mud brick construction and the sounding in the southwest corner of room 4. Note that the stone thresholds of room 4 have been removed.



Fig. 8 A view to the south of room 4 in its earliest phase, showing the stone footing of the east wall and the east end of the north wall.



Fig. 9 A selection of pottery from the 2006 and 2007 excavations of the area north of the pylon. In the upper left is the barbotine vessel found in a bin associated with phase 1; in the lower right is a juglet found in the northeast corner of room 4 on the level of the stone footing.



Fig. 10 Looking southwest at the face of the Mut Temple's 1st Pylon and the wall of the East Porch, showing the mud brick footing of the pylon (robbed out in the center of the photo) and the mud brick revetment of the south end of the Porch's foundations.



Fig. 11 The cylinder seal (21ME.39) found in the fill of room 5 and its impression.



Fig. 12 The colossal unfinished quartzite head of Amunhotep III (16M.12) found in the ruins of the East Porch.



Fig. 13 The area of the East Porch under the fallen column showing the sand foundations of the 4th column on the west (left) and the semicircular feature in the center that may be the foundation of an earlier column.



Fig. 14 The west wall of Chapel D whose north corner is composed of large, re-used limestone blocks (left). On the right, a detail of the 18th Dynasty offering scene on the north face of the largest block.



Fig. 15 The granite sphinx (behind the Sakhmet statue in the photo on the left) and small chapel just inside the Precinct entrance at the beginning and end of the 2007 season.



Fig. 16 The hole in the west wing of Temple A's 2nd Pylon, revealed when the statue of Tuthmosis IV was removed (left) and the same area at the end of the season.