

CHAPTER 3

KOM EL-NANA: THE CENTRAL PLATFORM

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3.1 Introduction

Much of the southern enclosure of Kom el-Nana seems to have been open space, either (in the eastern part) planted with trees or (in the western part) just floored with mud. Buildings were confined to a line running north-south situated a little to the east of the central line of the enclosure, and to a group in the south-east corner. The central platform appears to have been the focal point of the whole group, lying on the central east-west axis and thus the natural focus of attention to anyone standing towards the front of the southern enclosure. By contrast the South Shrine, although more grandly constructed, must have stood close to the east-west dividing wall and have attracted less immediate attention in consequence.

Before excavation the site of the platform appeared as an oval-shaped mound, about 1.5 m high, 30 m from east to west and 20 m from north to south (Figure 3.1). The top of the mound was relatively flat, though higher in the east than the west, with some signs of robber pits on the surface in the form of shallow sand-filled hollows. The sides of the mound were concave, the steepest gradient being about 2 in 5 but varying around the mound. The southern slope was the shallowest and the northern and eastern slopes the steepest. A prominent spur projected southwards from a point somewhat to the west of centre on the south side, another smaller spur projected eastwards from the east corner, and a slight swelling was visible running down the north slope. The mound had a covering of light brown sand with a thin surface scatter of pieces of mud brick and limestone. The surface had a fairly smooth appearance, especially when compared to another smaller mound to the south-east (and lying astride the enclosure wall) which is covered with rough grey mud brick fragments.

The mound is a prominent landmark within the southern and relatively open area of Kom el-Nana and, in lying some way from the mounds of the late Roman settlement and showing no signs on or around it of late Roman pottery, seemed more likely to belong to the Amarna Period enclosure. Added interest had also been given from exceptionally high resistivity readings taken in a survey done by Ian Mathieson in 1988 which pointed to the presence of very hard features beneath the surface of the southern and northern slopes.

3.2 Progress of the excavation and summary of results

As a preliminary to excavation a base line was set up along the east-west line 19 of the Kom el-Nana grid and a block of nine 5 x 5 m squares was laid out on the south side of the mound, the most south-westerly square being Z18 (Figure 3.2). Subsequently two further 5 x 5 m squares (AC19 to the east and AB21 to the north) were opened to give a total of eleven squares. The first aim was to strip the topsoil from all of the initial block of nine squares in order to expose a large area of harder underlying surface (Figure 3.3). On top of the mound the topsoil was relatively shallow, being about only 5 cm in places. It was deepest where the slope breaks with the bottom where it reached around 50 or 60 cm in thickness. The most southerly three squares (Z18, AA18, and AB18) are at the base of the mound and supported about 20 cm of topsoil. Here the ground was extremely hard from the presence of an old track which runs across the site of Kom el-Nana in an east-west direction. The reason for the variation in topsoil thickness is to be found in the action of the wind which blows from the north or north-west for a longer period than the southerly winds and would have picked up material from the top of the mound and deposited it down the south (lee) slope, something which may also explain why the north slope is so much steeper than the south slope.

By the end of the season we had uncovered part of a square or rectangular platform, standing about 1.5 m high. It is lined by a massive outer wall of mud brick, 1.82 m wide, of which we uncovered a 20-m length of the southern side which included, by the very end of the season, the

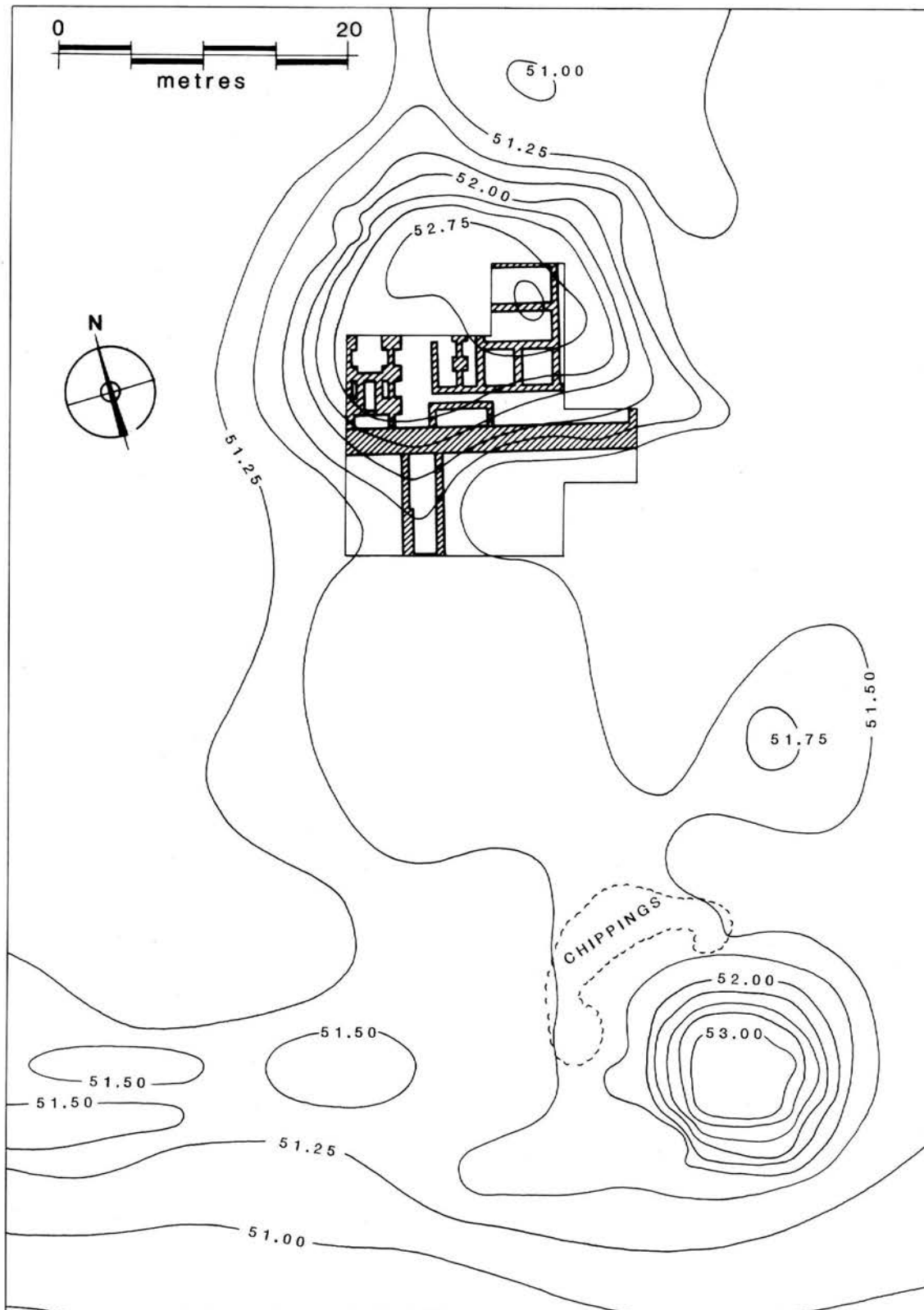


Figure 3.1. Contour plan of the central mound and adjacent ground, with outlines of the walls excavated in 1989.



Figure 3.3. View to the east of the southern slope of the mound after the first removal of surface sand.

inside of the south-east corner. Inside the enclosure formed by the outer wall are mud brick foundations and a red gravel fill which had originally risen almost to the present top surface of the mound. Preservation of surface features on top of the platform is not generally good. It is best at the eastern end, in squares AB20 and AB21, which originally constituted the highest part of the mound and had much mud brick debris on the surface. An area of mud brick paving [5786] about 2 x 1.5 m and a wall [5784] appeared in AB20 shortly after removal of the topsoil. Subsequent removal of a layer of mud brick collapse [5442] revealed a series of interlocking walls, a sequence of events repeated in squares AA20 and AB21. These walls belong to rooms which are neither symmetrical nor of the same size. At the western end of the platform the very rough outline of about five or six laid bricks was encountered just below the surface in the south-east corner of square Z20. They were only about 2 mm thick but may be all that is left of a floor in a square where there are no other surface features at all, only foundations.

The loss of brickwork on top of the mound is not the result only of erosion. Over much of the surface the initial removal of topsoil revealed little in the way of brickwork at all, only areas of dark earthy soil which prompted the reflection that the mound had originally had a rounded profile covered with a thick coating of mud. It thereafter gradually became clear that serious robbery of the brickwork had taken place, probably quite long ago, and that this had sometimes been pursued for several courses of bricks below the original floor level, leaving trenches which gradually filled up with sand and dust and were eventually lost to sight (Figure 3.4). The most determined robbery was of the brickwork of the outer wall which was, of course, more easily accessible. The circumstances surrounding this event have left an archaeological record that will require careful consideration in the latter part of this chapter.

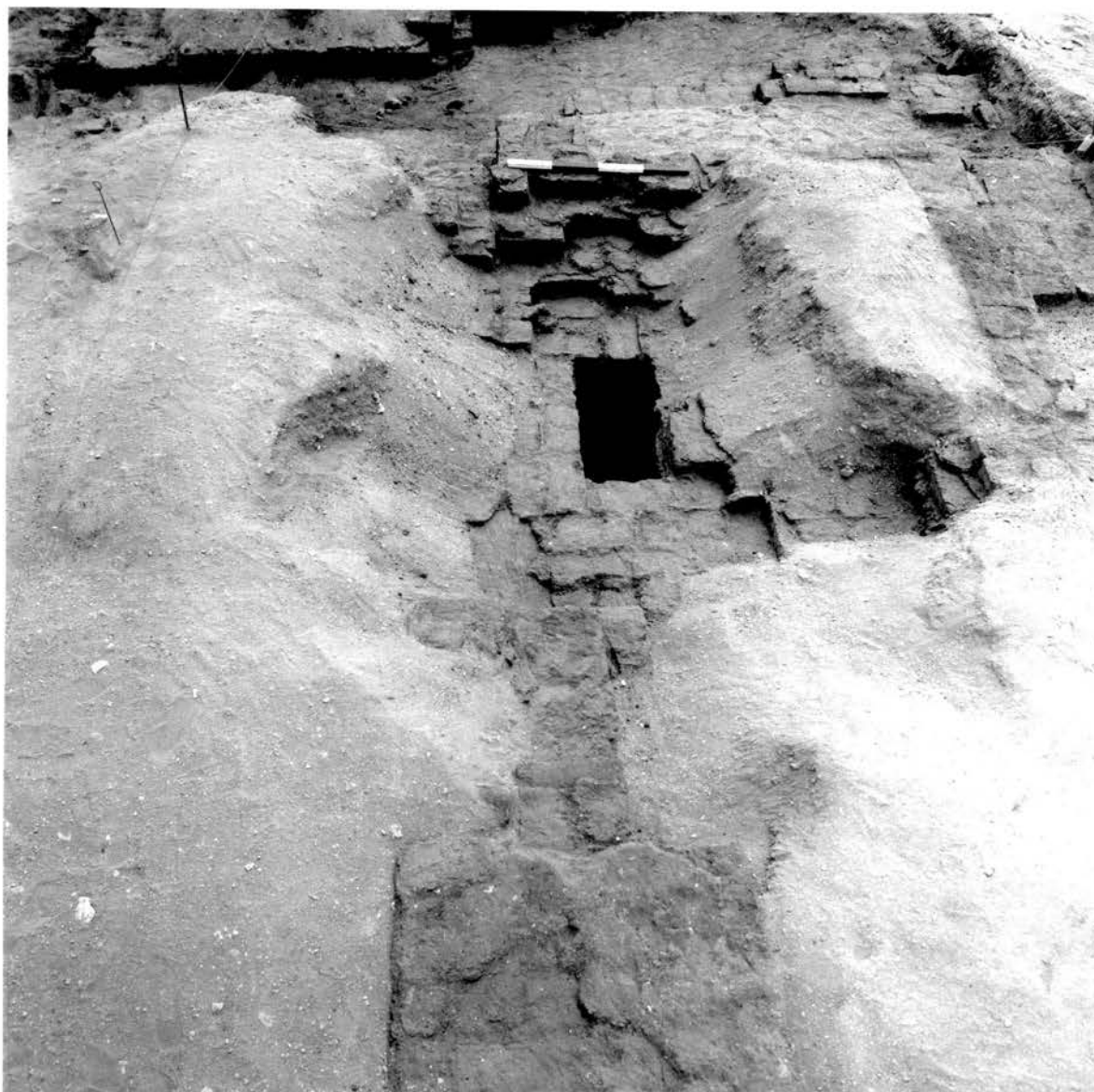


Figure 3.4. Square Z20, on top of the mound, viewed to the south. Loose deposits have been removed, exposing robber trenches along the lines of brick walls separated by raised areas of gravel fill. At least three courses of bricks below the original floor level have been removed.

The ground at the base of the platform as exposed on the south side is a flat surface composed of a series of three mud floors, one below the other (Figures 3.17, 3.18). Access from these to the top of the mound was via a ramp which lies just west of centre on the southern side (Figure 3.5). It is possible that further ramps will be uncovered in future seasons, the most likely site being on the north where a slight ridge could well mark the presence of a counterpart to the southern ramp. Sufficient has been found so far to show that the building on the top had colonnades in addition to brick-paved rooms and had been constructed throughout to a very high standard, comparable to other major royal buildings. Thus the bricks used are of exceptional quality: they are larger than usual and contained much organic material to increase their strength. The mortar, which was applied liberally and in layers rather than in pats, also included much organic material. Sometimes sheets of grass or reed were placed on the mortar, between layers of bricks, to increase the strength and stability of the brickwork. Examples of this can be seen in square Z20. A further sign of the high quality of construction is that the best preserved wall ([5615] in square AB21) possessed a strapping of constructional timbers of the kind found in royal buildings. The fill of the platform was primarily of a red gravel, pure and clean and probably brought in from the hills without having been used anywhere else first. It was placed underneath, around, inside, and occasionally on top of structures. On the south side, however, stone chippings were also used for fill in the later stages of construction.

The whole platform was constructed in the following way, without the use of foundation trenches. A deposit of red gravel was laid down on the natural ground surface and levelled. The main outer wall was built on top of this and the first floors were formed though the base of the latter was about 20 cm higher than the base of the former. It is also likely that the ramp was built at this stage since it is bonded into the outer wall, and at the north end the bottom was not found and must lie below the level of the outer wall. When these features were complete more gravel was thrown into the square enclosure and levelled. Foundations for walls and columns were then constructed on top of this, though not always at the exactly the same elevation. Three walls in square AB21 ([5615], [5617] and [5777]) were all built from a level of 51.4 m a.s.l., whereas casemate wall [5634] was built from 51.3 m a.s.l., which is, nevertheless, still very close. As the walls rose further, more gravel was added around and between them. After this floors were laid at the appropriate level and in AB21 these are almost one metre above the bases of the walls, so the walls would be very strong. The walls were built up above the surface, and subsequently further fills added when new floors were required, for example at the base of the platform, where there are probably three floors. The sequence of floors and fills at the base of the platform is similar to that found at the site in the south-east corner of Kom el-Nana and their levels are about the same. It is likely, but not yet proven, that the floors actually join up since both sites are within the same temple complex.

3.3 The South Ramp

The ramp uncovered by the excavation lies just west of centre on the southern side of the platform. Prior to excavation the only evidence for it was a spur-like projection from the mound, its surface slightly broken by an eroded brick edge. It is basically a casemate construction, i.e. a box of mud brick walls filled with gravel (Figures 3.5, 3.6). It is bonded into and is perpendicular to the outer wall of the platform and has a width of 2.95 m. Its length is 6.9 m from where it joins the mound to the *inside* of the southern wall of the ramp (note the outer southern edge is beyond the limit of excavation), so it will have had an overall length of over 7 m.

After removal of topsoil above the western side of the ramp (in squares Z18 and Z19) part of the western wall [5115] became visible. East of that was a strip of sterile yellow gravel [5355] and to the west of the wall a deposit of dense mud brick collapse [5114, 5428], up to 80 cm thick. This mud brick collapse did not continue any further north than the most northern point of wall [5115] and so definitely appears to come from that wall. When the topsoil was excavated further east in squares AA18 and AA19 a few bricks in line could be seen in AA18 separated from the western boundary of the square by 1.3 m of yellow gravel, with a little mud brick collapse to the east [5371]. These bricks represented the first signs of the eastern wall of the ramp [5356], thus providing two parallel north-south walls with pure gravel in between and mud brick collapse west of the west wall and east of the east wall. Since nothing was able to collapse into



Figure 3.5. View to the east of the ramp foundations on the south side of the platform. The “floor” exposed in the foreground is the top of unit [5619].

the middle the conclusion has to be that this structure must either be a very wide wall or a ramp and given its slope and general context a ramp is the most likely explanation. One slight puzzle is the lack of wall collapse on the east side where, in fact, (in square AA19) the gravel fill of the ramp had spilled down directly over the stump of the wall which survived at a low level. The most likely explanation is that most of the brickwork of this wall was robbed in antiquity along with brickwork from many other walls of the platform. The southern wall of the ramp [5445] and the north junction with the outer wall [5357] were only found when the gravel infill [5355] was removed for the southern three metres to a level below the bases of the walls. At this stage the fill became sandier and yellower and is probably a different deposit, one on which the walls were built.

Along the southern edge of square Z18 ran a deposit of collapsed brickwork [5427] with the outline of some bricks showing along the back. The collapse was removed, leaving the bricks

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[5429] protruding about 25 cm from the southern edge of excavation in the western 2 m of the square, and showing in the section further east. These bricks did not join up with wall [5115] (the western side of the ramp) but passed above it separated by yellow sand [5434]. The bricks also lie on edge. These two factors suggest collapse from a wall just beyond the southern limit of excavation. In this area the ground swells slightly, suggesting the presence of another, albeit very denuded, brick building.



Figure 3.6. General view to the north-east of the platform and ramp, showing the effects of brick robbery, especially along the line of the outer wall.

The ramp walls are, for most of their length, about 50 cm (one-and-a-half bricks) wide, constructed from large well-made mud bricks which have average dimensions of 34 x 16 cm, and 10.5 cm in thickness, generally laid out in a 5-course repeat pattern so that a layer with headers along the east and stretchers along the west is replaced below by stretchers along the east and headers along the west. The outside face of the west wall [5115] was originally plastered with mud, though this did not survive even for the duration of the season. The greater preserved height

of the northern stretch of this wall showed that the full thickness of one-and-a-half bricks rose only to a level 20 cm above the highest floor [5374]; above this it stepped in and was only 35 cm (or one brick) thick, creating a narrow ledge or skirting. The side of the wall here is very smooth showing that the thickening of the lower part must be deliberate, presumably to provide firmer support for the gravel infill of the ramp.

Towards the bases of the walls the pattern of bricklaying becomes irregular (visible in Figure 3.5). A line of bricks on edge runs in the third row from the bottom in both walls [5115] and [5445]. Along the south part of [5115] the wall actually widens to 70 cm with a layer of two headers on edge, placed end to end. The layer below is made up of stretchers but the two at the southern end are on edge. The bottom row is headers but these do not extend below the stretchers on edge just mentioned. Likewise [5445] has headers on edge in the third row from the bottom, stretchers below, and headers at the bottom. The reason for this irregularity in brickwork is presumably an intention to level up an uneven ground surface.

3.4 The archaeology of square AB21

Our account of the features on top of the platform begins with square AB21 (Figure 3.7) — opened late in the season — for several reasons: it provided evidence for the existence of two phases to the building of the platform, it contained the best-preserved wall, and, in the shape of a burial which postdates the main use of the site, evidence for later phases of its history.

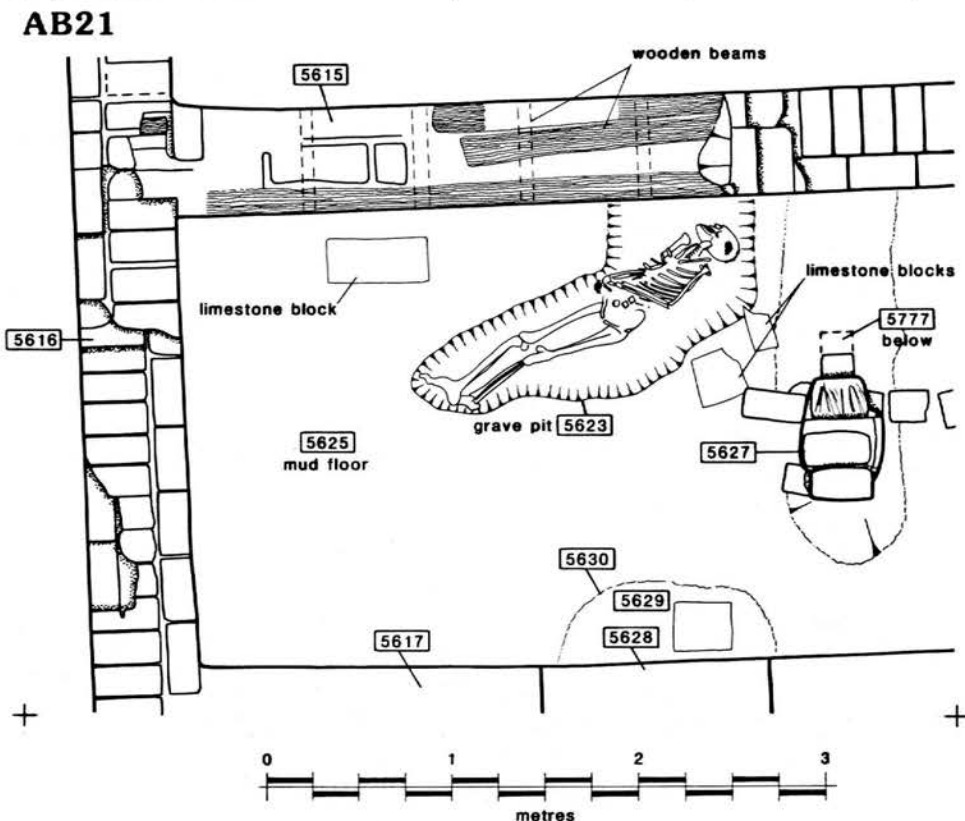


Figure 3.7. Plan of the north part of square AB21 (original by W. Horton).

The second or later phase is represented in the south half of the square by a floor: a pavement of mud bricks with a very thin layer of mud over the surface [5618] (Figure 3.8) which lay just below mud brick debris [5444]. This floor just extends into square AB20 and covers an area measuring 1.92 m from north to south, and over 4.3 m from east to west. It is surrounded by walls on the north, south, and east sides ([5615], [5784] and [5783] respectively), and the west wall was inferred to be about 40 cm beyond the west limit of the square. The thin mud covering

on the floor joins with the mud plaster on these walls (where it exists) proving that these features must belong to one and the same phase. Directly north had lain another room with similar east-west dimensions, but measuring 2.45 m from north to south. A mud brick pavement no longer exists at the same level as [5618] but its previous existence and level are preserved in replastering marks on the north and south walls [5617] and [5615] (Figures 3.8, 3.11, 3.12). There are no signs of doorways into either of these rooms at this level and we can only speculate that they lay on the western side which has not yet been cleared.

AB21

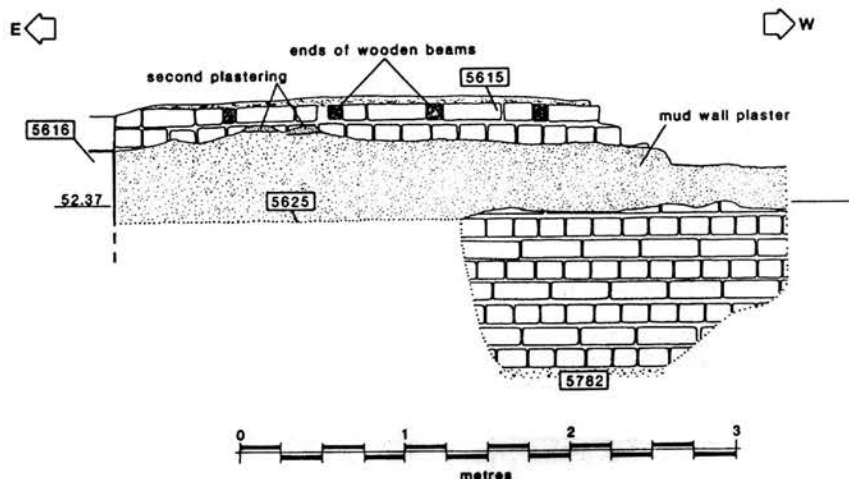


Figure 3.8. Elevation drawing of the north face of wall [5615] in square AB21 (original by W. Horton), cf. Figure 3.11.

In the northern half of AB21, below collapse and debris levels [5444] and [5611], and below the level of the replastering marks, was a layer of loose yellow sand [5613] with a very uneven top surface but an overall level similar to floor [5618] to the south. About 10 cm of this was removed on the east side before reaching compacted orange gravel [5626] which had areas of compacted mud and gypsum/limestone fragments on the surface. This could be the make-up level for the brick floor which would have been above. In the centre of the square, however, the sand filled a slight depression and was very loose. Removal of some of the sand revealed a human leg covered with skin, and at this point the unit number was changed to [5614]. A complete burial in a narrow trench grave was eventually uncovered, orientated in a north-east/south-west direction. This will be described in more detail later. The south-east edge of the burial cut [5623] was very clear and distinct, and provided a ready-made section through the undisturbed lower deposits. A clear dark grey line about 5 cm thick could be seen in the section which looked like a floor and was about 35 cm below the surface of compact gravel [5626]. Unfortunately on the north-west side the burial cut was only clear from the level of the dark grey line down. Above that the deposits were very disturbed, and the sand [5614] within the cut merged into slightly harder sand [5624] which mainly occupied the north-west quadrant of the square and also looked disturbed. This dark grey line seen in the burial-cut section is a sign of an earlier floor [5625]. Subsequently the remains of this even mud floor were uncovered over the entirety of this part of square AB21 (Figure 3.10).

Further evidence for an earlier phase came from a blocked doorway [5628] in the north wall [5617] of the square (Figures 3.10, 3.12). The doorway is about 120 cm wide, the western edge being 1 m from the north-west corner of the square. Wall [5617] is well plastered, both on the inside face and around the sides of the doorway itself. The doorway had been blocked with bricks [5628], laid in mortar but not plastered so that the courses of brickwork stand out clearly. It continued beneath the level of the mud floor [5625] and in front there was a small cut [5630]

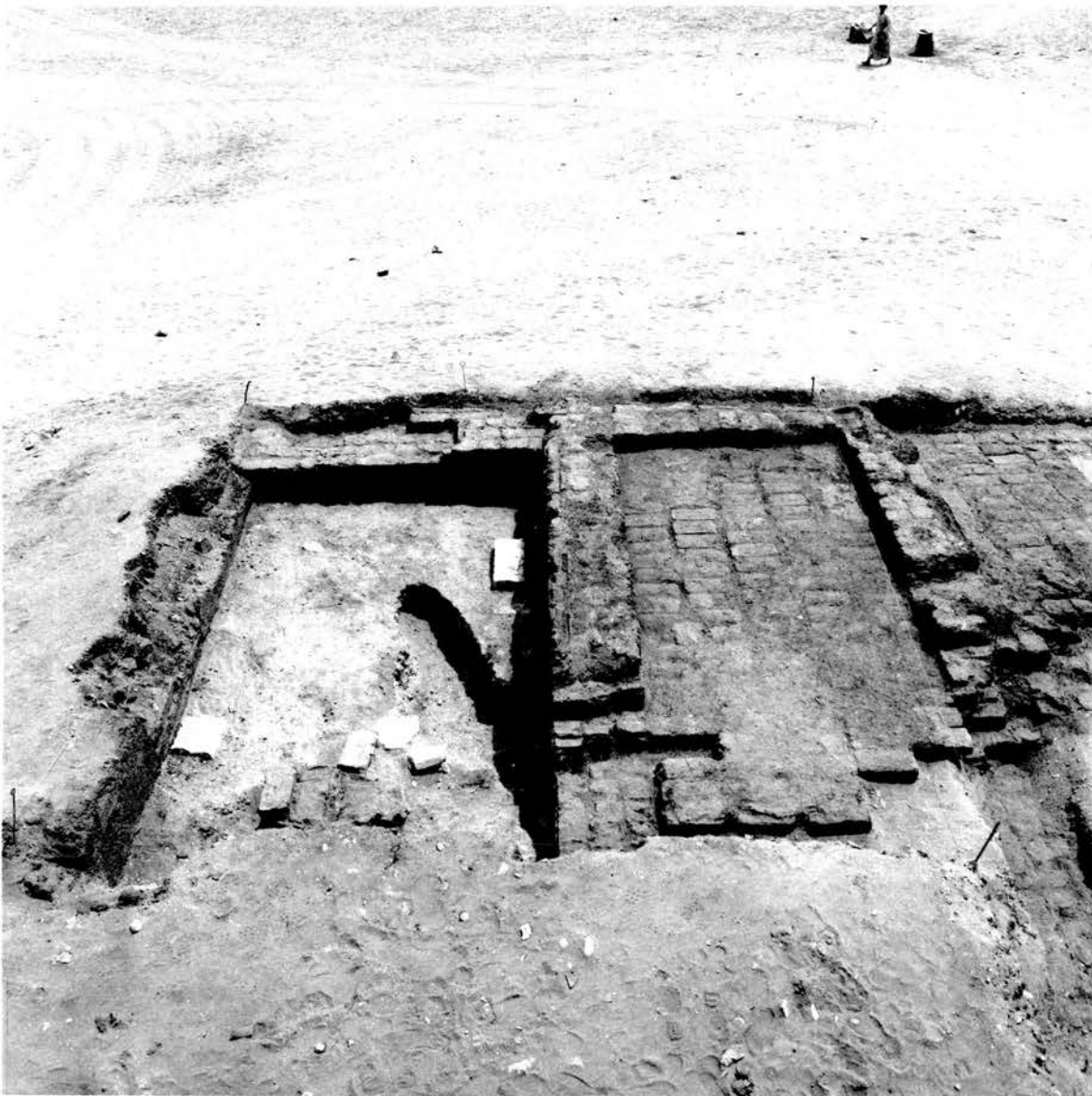


Figure 3.9. Square AB21 viewed to the east after removal of loose soil and rubble, and removal of the burial.

filled with yellow gravel [5629]. In addition to the two cuts for the burial [5623] and in front of the door-blocking [5630] the floor is cut by a third feature [5627] towards the west of the square and around which the floor is more broken. As seen at this level it comprised four bricks (or brick impressions in thick mortar) stepping down from north to south in an irregular fashion. One whole brick lay to the east of it in an east-west direction and another lay to the west, with a further one beyond that passing into the west section. These side bricks lay loosely on the floor and were not really part of the structure. The purpose of this feature became a little clearer after a further stage of excavation which will be described shortly. Three limestone blocks also lay on floor [5625], one parallel to the edge of wall [5618]. Another was found on top of fill [5629] at the same level. They could have formed part of the fill between the two floors.

Thus square AB21 reveals two stages of use. Floor [5625] in the northern half of the square represents the earlier, with access to the room at this level from the north through the doorway in

AB21

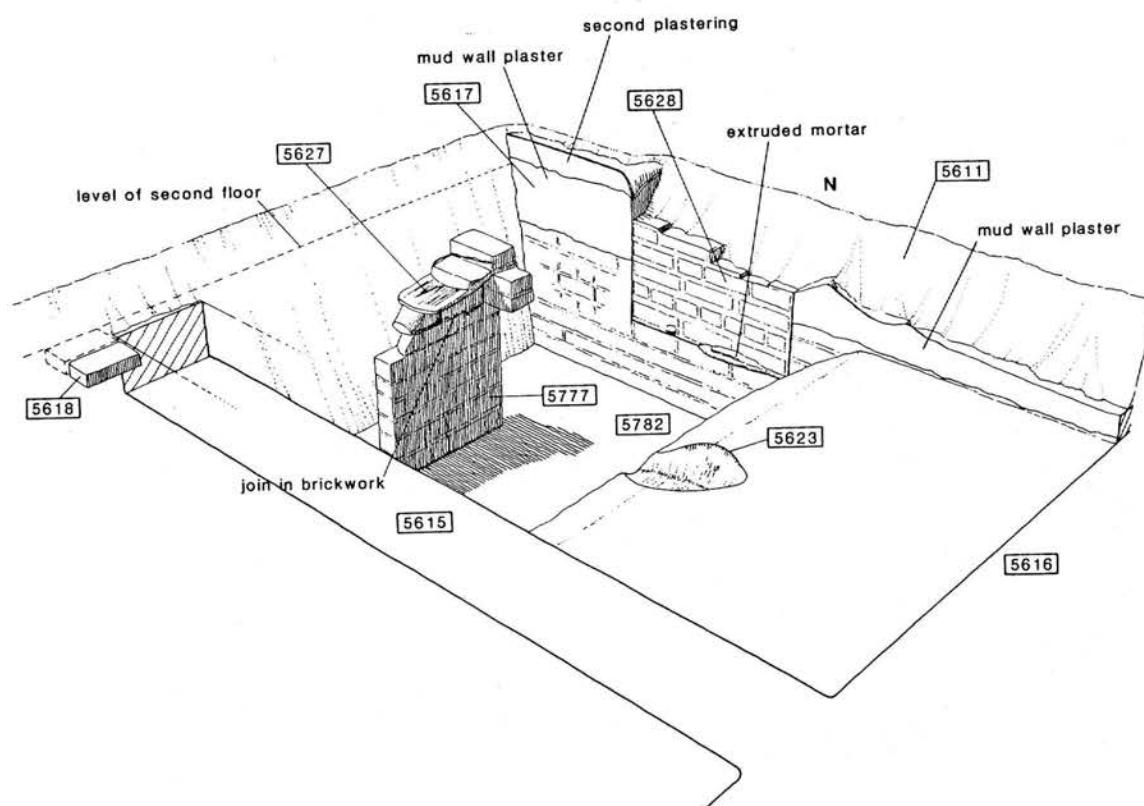
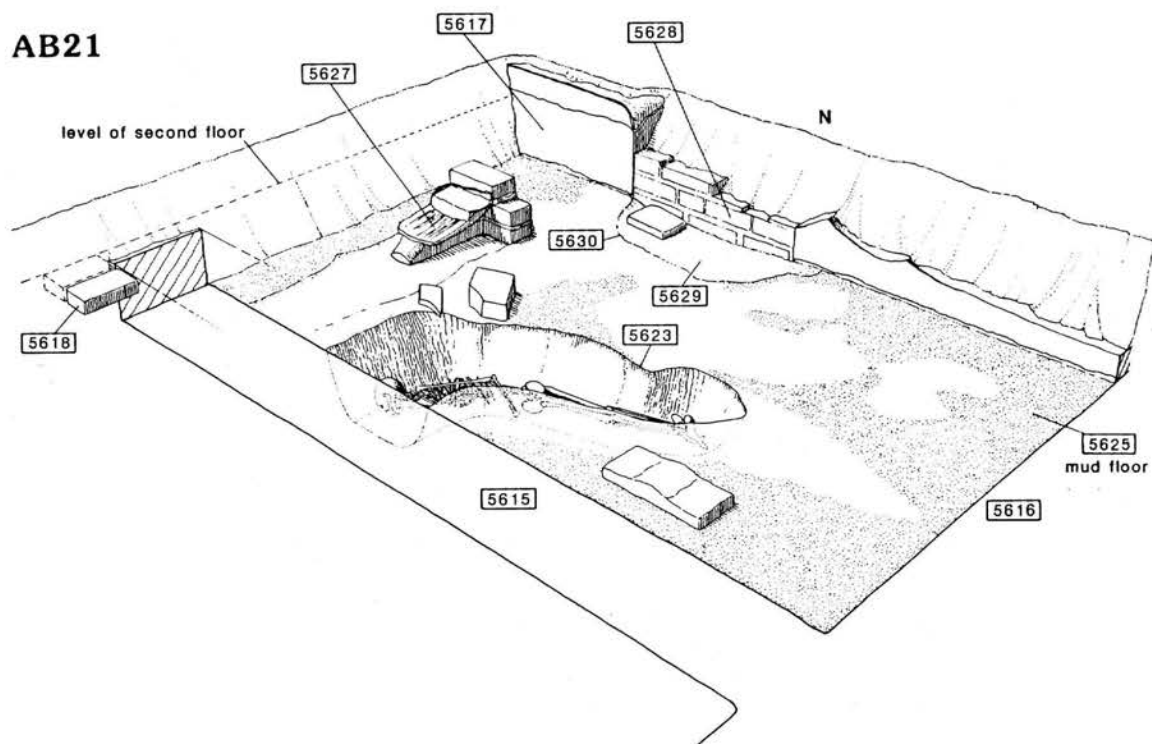


Figure 3.10. Perspective drawings of the northern half of square AB21 showing two stages of excavation. In the second stage half of the deeper fill of the northern half has been removed.



Figure 3.11. Square AB21 viewed to the south. The human burial is still in place in the narrow pit. For an elevation of wall [5615] behind see Figure 3.8.

wall [5617] (later blocked), although there may also be another door to the west in unexcavated square AA21. The space for the doorway was left in the wall during the building of the foundations well before the intended floor level was reached. When the floor was laid it may have run directly through the doorway without a threshold being laid, for a threshold would presumably have required the brick foundation to have risen higher so that it would have had a solid base. Alternatively the doorway could have contained steps down to a lower level represented by a part of the platform not yet excavated. The second stage is manifested by mud brick paved floor [5618] in the southern half of the square which is 44 cm above the earlier floor to the north. It would be interesting to remove this to see if the first phase floor exists beneath. The second phase in the northern room is inferred from the blocked doorway, the replastering on the walls and the compact nature of [5626] which is likely to be a make-up level for a floor. In both these second-phase rooms access must have been from the west as there are no doorways



Figure 3.12. Detail of the north-west corner of square AB21, showing wall [5617] with its coating of mud plaster above the floor level, the doorway with brick blocking [5628], and, in the left foreground, wall [5777] with brick capping [5627].

anywhere else. Because of the way in which the door space was left by the builders beginning from a level below that of the first-stage floor, when the time came to block it a narrow trench [5630] had to be dug down across the doorway until it reached the brickwork which then provided a firm foundation for the blocking.

Once the upper levels had been recorded and the burial removed it was decided to dig below the level of floor [5625] in order to investigate the foundations, to find the bottom of the blocked doorway, and to see if we could shed any more light on feature [5627]. For lack of time this was carried out only in the western 2 m. The yellow gravel fill [5629] of trench [5630] was first removed from in front of the blocked doorway, followed by the fill deposit [5633] into which the trench had been cut, composed of very hard, yellow, sterile material which contained large lumps of what looked like soft rock. This lay, in turn, above loose red gravel [5635], just underneath which was the bottom of the doorway blocking. Wall [5617], however, continued downwards. The doorway base was thus revealed to be 40 cm below floor [5625] (Figure 3.12). It may be

that the next room northwards is at a lower level than the one we are discussing (the surface of the mound slopes down very quickly at this point), in which case there might have been steps down from the doorway. Otherwise nearly 40 cm of fill would have been laid through the doorway with the floor on top, as was suggested above.

The very hard yellow deposit [5633] is directly beneath the floor and varies very much in depth between about 20 and 65 cm. It lies upon red gravel [5635] which was in general shallow where [5633] was deep (for example, in the north-west corner) and vice versa. Deposits [5633] and [5635] have a combined depth of 80 cm. Their removal revealed that feature [5627] continued downwards, but in a somewhat different form. The top part, as already noted, is a wedge-shaped block of brickwork (up to three courses) which step down from north to south. This could now be seen to perch on top of a regularly built wall to which a different unit number [5777] has been given (Figures 3.10, 3.12). It is one brick width in thickness (c. 16 cm), two-and-a-half stretchers in length (87 cm), and is aligned with the room walls. The two ends are in fact both 78 cm from the adjacent north and south walls of the room. It is carefully built, very firm but unplastered although the mortar in the joints has been smoothed, and the bricks themselves have a rough pitted appearance, unlike those of feature [5627] above, which are smooth. The wall was clearly an integral part of the room at its first stage, intended to act as a foundation for a wall which would have risen above the first-stage floor [5625], perhaps serving as a screen wall, and thus like feature [5791] in one of the rooms to the south (see below). The irregular nature of the brickwork [5627] makes it unlikely that it is the remains of an actual screen wall. What could have happened is that when the floor level was raised the screen wall was temporarily removed above floor level. Brickwork [5627] would then be the foundations for its replacement, the visible part of which rose above the second-stage brick floor long since lost through brick robbery and general destruction. If this is a correct interpretation it stresses the continuity of design between the first and second stages: from the beginning a "screen wall" was planned to be here and the foundations built accordingly. The second-stage room retained this feature exactly.

The red gravel [5635] covered a very flat deposit of hard, yellow, *gebel* material [5782] upon which all the observable walls were built ([5615], [5617] and [5777]). It stands at a height of 51.4 m a.s.l., compared to about 50.75 m of the outside ground surface into which the foundations of the surrounding wall were cut, and so was presumably imported into the area (it is unlikely that this is part of a natural mound). The sequence of construction is thus fairly clear. It began with the surrounding wall rising from the general Kom el-Nana ground level in this part of the site. When it had reached a height of 65 cm it was filled with hard, compacted *gebel* material and levelled off. This became the level on which the internal walls were built without foundation trenches. Gravel fills were poured between the walls and the first floor [5625] laid at a height 80 cm above the base of the walls, which, being anchored by 80 cm of gravel, were very stable. Since the plaster on walls [5615] and [5617] does not continue below the level of floor [5625] it would have been applied only at this stage, in the same operation as that of laying the floor.

The survival of walls to a greater height on this part of the platform has preserved useful structural details. Wall [5615] has a standing height of 160 cm, wall [5617] stands to 148 cm.; walls [5627] and [5777] together have a height of 122 cm, and the latter by itself 88 cm. Wall [5777] has seven preserved courses, every other course being misaligned from the ones above and below by half a brick's length to create an "English bond" pattern. The brickwork in walls [5615] and [5617] is laid out in a five-course repeat pattern. The better survival of wall [5615] has preserved a particularly important element in its construction, namely the incorporation of timbers (Figures 3.7, 3.8). Despite being badly eroded the existing top surface consisted of mortar in which were set wooden slats (now termite eaten) running laterally, one along each side and probably a third in the middle. The remains suggest that each had a width of about 13 cm, and was separated from the next by a ridge of mortar (the wall itself has an overall width of about 50 cm). In addition to these, lateral beams ran through the wall, perpendicular to the wall face. These, again termite eaten, were originally curved or circular in cross-section with a diameter of 8 cm. They survive in one layer only, below the surface mortar in the uppermost course of bricks, and they number four, each 50–55 cm apart and separated by one header, one stretcher, and a little mortar. The beams go right through the wall, being observable on both the north and south sides. They are situated above the level of the upper, second-stage floor [5618] and are separated from it by one course of bricks. There could be a layer of beams between the two floors, but it is

impossible to see because on the south side excavation did not continue below the top floor and on the north side the wall face is obscured by plaster. There are, however, none below the earliest floor [5625] where the wall face on the north side is unplastered and exposed right down to the base. We seem to have preserved here the remains of the kind of timber bracing or strapping to mud brick walls known from other royal buildings at Amarna (e.g. the front of the Small Aten Temple, the Bridge, the gateway of the North Riverside Palace, and parts of the North Palace). The closest comparison is provided at the North Palace where the walls of the chambers around the garden court in the north-east corner had a similar system of timber inserts. Its appearance at Kom el-Nana is a further sign of the importance of some of its buildings.

A striking find from the topsoil [5441] in the north-east quadrant of square AB21 was a block of smooth red worked quartzite, part of a composite statue representing a stomach with a diamond-shaped navel in the middle, and having a squared peg at the bottom which could have fitted into a kilt or skirt made of different material (e.g. limestone). The dimensions point to the complete statue having been almost life-sized. The back was flattened as if the statue was not free-standing but stood against something. Since the stomach shows no signs of a covering garment it is likely to represent a male, possibly Akhenaten himself. The place where it was found is not very far from the South Shrine where the debris contains occasional fragments of quartzite statues. All the pieces so far recovered from here (and from the North Shrine), however, have been smashed into small pieces, whereas that from square AB21 had been little damaged. This difference in subsequent treatment raises the possibility that the statue originally stood within one of the rooms on the platform.

Other pieces of worked stone, all limestone, came from the topsoil in square AB21, mainly from the north-east quadrant. Many of them had gypsum plaster on the sides and finger-marks in the plaster were seen on one fragment. Four of them had a groove or channel along one face and they were all up to about 25 cm long, except for one which had a length of 40 cm. Six pieces were kept and registered, the rest were discarded.

The early stages of excavation of square AB21 led to the discovery of an intact burial (Figures 3.7, 3.10, 3.11). It came to light during the excavation of sand [5613] in a slight depression in the centre of the square. Once the identification (of a leg) had been made the unit number of the sand was changed, to [5614]. Soon the whole body was revealed lying in a cut just big enough for it [5623], in an extended position, orientated west-south-west/east-north-east, and on its right side facing roughly south. The skull was twisted round so that the face pointed slightly downwards and was also bent back showing the neck vertebrae very clearly. The right hand passed over the left hand, and the right foot over the left foot in a way that suggested that the skeleton may have slipped into a more horizontal position than the one in which it was originally placed. When discovered the top of the left femur was 12.5 cm higher than the top of the right femur and the left shoulder about 13 cm higher than the right. Areas of skin remained on the body, particularly around the legs, pelvis, and ribs. Hair was also present: that on the head is about 1 cm long, coarse, curly and black in colour with a few strands of grey; a little facial hair was found on one cheek and more was found in the pubic area. Despite this condition internal organs such as intestines and brain were not preserved. The body could be described as semi-mummified. Coarsely woven cloth (unidentified, but maybe cotton or flax) was found impressed into much of the skin, and pieces of twisted textile or string, about 4mm in diameter, were found around the chest area. It would thus appear that the body was wrapped tightly in cloth and then bound with string. The skeleton was large, about 175 cm long, and this, together with the facial hair and the shape of the cheek bones (pers. comm. Dr Rosemary Luff), implies a male. No grave goods were placed with the body and nothing was found in the surrounding fill except for a cow's metatarsal (which had been dyed a bright pink colour) which need not be of the same date as the body. The skeleton was lifted out of the trench in one piece except for the arms which were loose and were removed beforehand. The head, torso, and pelvis were still well-articulated and many of the joints were covered with skin so that the details could not be seen clearly. The skeleton was then transferred to the expedition's bone laboratory for expert examination.

Another collection of bones had been discovered earlier in the excavation of square AB21. A few were found in the topsoil [5441], although none had been visible on the ground surface, but most were in layer [5444] below, a deposit of dense mud brick collapse containing partial and whole bricks. The bones were not articulated and formed a scatter in the extreme north-west

corner of the square. Some were seen protruding from the western edge of the excavation and so a small incursion was made into the adjacent square AA21. About 40 cm into this square a north-south wall was found, presumably the western boundary of the rooms in AB21. The bones were thus in a corner, bounded by wall [5617] to the north and by the new wall in AA21 to the west, as well as by some broken bricks (part of unit [5444]) to the south. The bones, though fused, were particularly small and belonged to a very gracile adult who was probably female and possibly deformed. The skeleton was not complete; bones found include two femurs, a humerus, finger-bones, ribs, vertebrae, part of the pelvis, jaws and the sacrum, which shows signs of serious malformation (pers. comm. Dr Luff).

The lack of burial goods, or even of a coffin, leaves open the dates for these two burials. It is tempting to relate them to the nearest settlement, which is the late Roman/early Christian level at Kom el-Nana itself to which the brick platform lies adjacent. This settlement, however, presumably had a proper cemetery of its own, and as yet there is no sign that it lay in the vicinity. If it is found, as excavation continues, that these burials are unusual, implying unusual circumstances in the lives or deaths of the persons concerned, then it becomes possible for them to have originated from the villages beside the cultivation which probably have a more-or-less continuous history from antiquity to modern times.

3.5 Rooms in squares AA20 and AB20

More rooms lie further to the south on top of the platform, in squares AB20 and AA20. Square AB20 was one of the first to be excavated and produced almost immediately an area of mud brick paving [5786]. This is bound to the north by wall [5784], beyond which is the southern part of floor [5618] (mainly in square AB21) which is very similar to [5786]. Further paving was exposed on removal of mud brick debris [5442] and it was found to be the floor inside a small room, about 2.5 x 2.4 m, eroded away to the south and west and revealing a red gravel fill beneath [5787]. To the east is wall [5616] and to the south is wall [5788], which has been so badly robbed that its surface is about 40 cm below the top of the red gravel make-up [5787]. Access was through a doorway in the west wall [5785]. On the other side of the doorway is an even smaller room, measuring 2.4 x 1.65 m, which has no floor preserved at this level and extends into square AA20, where again no floors were preserved. Walls on the west, south and east sides of the square surround an area approximately 2.5 x 2.3 m, which was probably a third room.

Through the centre of this area, in a north-south direction, runs a structure in the form of an irregular wall with a square feature (probably a brick support for a column base) in the centre and part of another at the north end, passing beyond the limit of excavation (Figure 3.13). Whereas the west, south, and east walls ([5125], [5439] and [5124] respectively) are bonded into one another, this structure is not, its south end abutting wall [5439]. The possible column support at the north end [5792] measures 1.05 m from east to west and has header bricks along the east and west sides, with an area of mortar in the middle obscuring the brickwork. This is linked by a connecting wall [5119] to the central square feature [5796]. The connecting wall is 55 cm wide and has headers on the east side and stretchers on the west, with 8 cm of mortar between the two. The row of headers seems to provide a central axis to the whole structure and passes through [5796] emerging on the other side as a further connecting wall [5797], which abuts the southern wall of the room [5439]. The stretchers on the west of [5119] are well off the central line of the structure and look like an addition. The southern connecting wall, however, consists of only a row of headers, so is about 35 cm wide. The central square feature itself measures approximately 1 m east-west and 0.9 m north-south, and had the form of brickwork around the edges of a central depression, a consequence of robbery in antiquity and also of erosion as the bricks are broken and irregular except for the central axis, mentioned above, running through the middle.

Mud-brick debris [5103] covered most of square AA20 beneath the topsoil. As excavation took place wall [5124] appeared on the eastern side but the same mud brick collapse (now called [5117]) was found to fill two trenches on the southern and western sides directly above the area where walls [5439] and [5125] were later found. In the central area the debris [5103] lay directly above the square column support [5796] but elsewhere a thin layer of fine red sand [5116]

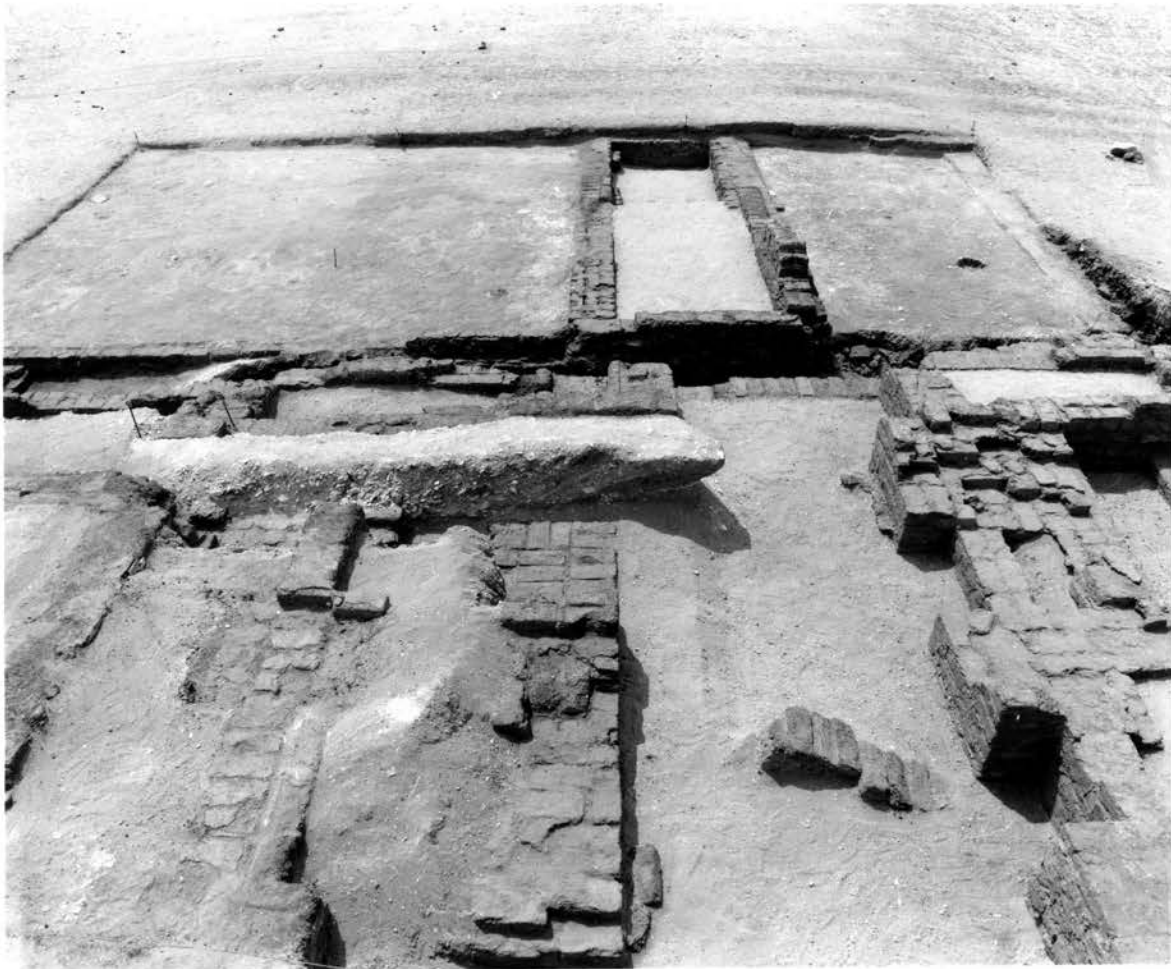


Figure 3.13. General view of the platform, towards the south. In the foreground are squares Z20 (right) and AA20 (left).

intervened, overlying connecting walls [5119] and [5797] and a deposit of compact red gravel [5122], which contained areas of small white limestone chips [5121] on parts of its surface. The latter deposit looks very much like make-up for a floor, which would have been at about the same height as the brick floors [5786] and [5618]. It is difficult to explain the fine red sand [5116]; it seemed too clean to be debris or collapse and the layer below is far more likely to be the floor make-up level. It is unlikely that the connecting walls were visible at floor level. They were either beneath the brick floor or their tops could have been incorporated into it. The former is perhaps more likely as the bricks in floor paving usually point in the same direction, and connecting wall [5119] has both headers and stretchers with a rather wide line of mortar in between. If this is so, the red sand [5116], which covers the connecting walls, may have been a thin layer directly underneath the floor with the harder make-up level [5122] and [5121] below. The mud brick debris [5117] above walls [5439] and [5125] contained much organic material — grass, reed, and termite-eaten shrub stalks about 5 cm in diameter — especially in the south-west corner where the two walls below join. This deposit was separated from the underlying walls by a layer of orange gravel [5123] about 15–20 cm deep, which also lies along the southern and western sides of the square and probably fell into the depression from there. It is different from the make-up gravel [5122] which is much redder in colour.

Wall [5439] (which becomes unit number [5788] in square AB20) is a fairly standard wall for this site, being one-and-a-half bricks (50 cm) in thickness. The west wall [5125], however, is two bricks (72 cm) in thickness and is laid out in a five-course repeat pattern, with heavy mortar 4 or 5 cm thick both within and between the layers. The top surface was found to be very uneven from robbery. The wall does not actually reach the northern edge of the excavation but stops about 35 cm south of it, with a smooth north face which suggests that it was meant to finish and is not just broken or robbed. One can guess that there is an entrance here although different to the doorways in walls [5785] and [5124] which exist at a higher level and are in phase with the later floors, such as [5618] and [5786]. It could, however, be similar to the doorway in wall [5617] in square AB21 before it was blocked by bricks [5628], and if so would be part of the earlier (as well perhaps of the later) phase. In the space between the end of the wall and the northern limit of excavation the orange gravel of [5123] and the red gravel of [5122] merge. Until square AA21 is excavated the picture of this part of the platform will remain incomplete. Thus wall [5124] appears to continue through it, and a probable northern part of it was found when the scatter of human bones mentioned above (unit [5444]) which extended into the north-east corner of the square from AB21 was recovered. This wall in square AA21 should contain doorways into both the rooms in square AB21. As well as this, the main "room" in AA20 looks, from the point of view of symmetry of layout, as though its other half should lie in the more northerly square. It would also be interesting to see if there is any floor preserved, to obtain a link between the floor and the square features and connecting walls.

As already noted, walls [5124] in AA20 and [5785] in AB20 were pierced by doorways, given numbers [5798] and [5790] respectively. They consist of large flat areas of mortar lying directly on the surviving tops of the foundation walls and bear impressions of chisel marks on limestone and faint traces of white dust, signs that a worked limestone block lay across each one, presumably in each case a threshold stone. Gypsum had been packed around the edges of the join between stone and brick, a short length surviving along the west edge of wall [5124] just below the doorway. The interpretation that these marks derive from doorways is not wholly certain but they are the only likely doorways into these rooms and they are at about the right level. Inside the small room between these two doorways are three bricks in a line [5791], end-to-end and parallel to the rest of the brickwork. They need further investigation, but are most likely from a small screen wall similar perhaps to [5777] in square AB21. Although the bricks are centrally placed within the room between the two doorways they are not aligned with [5777] in AB21. Such a screen wall would have subdivided the room, creating a small ante-chamber or foyer on the west.

A general picture of these rooms is thus as follows: doorways [5798] and [5790] suggest that access was from the west, and we can hypothesize that the rooms in AB21 must also have had doorways on the western side since there are none elsewhere, at least for the later phase. Thus the so-called room in AA20 with the probable column bases could be a pillared hall with a large entrance on the western side, now in the north part of AA20 and south part of AA21, leading from a corridor facing the ramp. From this pillared hall one could enter the small ante-room through doorway [5798] and then on to the next room through doorway [5790], or one could go further north into one of the two rooms in AB21. It is even possible that there is a room further to the north still, in square AB22, as the earlier phase doorway in wall [5617] must have led somewhere. It is also important to mention that there is more mud brick paving along the extreme east edge of square AB21 [5783] and this suggests a further eastern room, though no doorway is known so far. From looking at the overall plan of the site, and particularly the south-east corner of the outer wall [5779], one can see that there is just enough space on the eastern side for another room.

3.6 Foundations on the west side of the platform

It has already been mentioned that the ramp which leads on to the top of the platform is not located in the middle of the south side but slightly to the west. On the line of the ramp the foundations on top of the platform look as though a corridor had been present, although there is nothing left on the surface. The areas to the east and west of this line are not symmetrical in either size or nature, the west side being narrower, and, unfortunately, lacking in floor surfaces



Figure 3.14. General view of the west side of the platform, towards the south-west. In the foreground is square Z20.

except for a few badly preserved but aligned bricks found in the south-east corner of Z20, amongst mud brick collapse [5351] and just beneath the topsoil. These could have fallen like this, but could be the only remains of what was a floor. The dense mud brick collapse [5351], which contained much organic material, covered almost the whole square except for red gravel [5365] in the north-east corner, and to the west an area of looser sand [5108] in a slight depression that seemed different to the topsoil [5106] but in retrospect was probably the same material, the fact that it was loose and filling a depression reflecting what lay underneath, i.e. a void [5450].

The mud brick collapse [5351] finished sharply, with red gravel and laid mud bricks beneath. It was difficult at first to know what these bricks represented as many of the edges were obscured by the gravel, and, to make matters worse, substantial robbing meant that the surviving bricks lay at widely different levels, though mainly below the height of the red gravel (Figure 3.4). A few features could be distinguished: a square column support [5903] measuring about 1.05 m

east-west lay along the northern edge and looked distinctly like those in square AA20, with another possible one to the south of it [5905]. Just to the south-east a hole seemed to have been left in the brickwork [5902], measuring about 85 x 40 cm. Its sides were sufficiently smooth to exclude the explanation that it was an accidental result of brick robbery. In the south-west corner of Z20 lay a flattish, square-shaped mass of brickwork, 1.1 x 0.9 m in size, preserving exceptionally good grass or reed impressions on the exposed mortar surface which effectively disguised the brick pattern beneath. Finally to the east and abutting it was a further wall [5910], one brick or 35 cm wide, standing higher than the rest of the brickwork in the square. In order to expose these features completely some of the red gravel fill had to be removed. That in the corridor was given a new number [5443], and the rest remained as [5365]. As a result all of the edges of the brickwork were outlined revealing a pattern of brick structures often bonded into one another and with an evident degree of symmetry (Figure 3.14).

A line of three square features, probably column supports, lay along the western side of the trench, each one separated by a connecting wall and all bonded into each other. They have the following numbers from north to south: [5916], [5915], [5914], [5913] and [5912]. The southern two abut the long wall [5910] to the east, leaving a rectangular void [5450], 85 x 40 cm, between the long wall and the connecting wall [5913], which is very similar to the hole in the brickwork mentioned above [5902]. Both of these voids are parallel to one another and are on the same alignment. As mentioned above, another probable column support had been found along the north side of the trench and this turned out to be the northernmost in another line of three, each connected by a wall and incidentally symmetrical with the series running along the western edge. They have the following numbers from north to south: [5903], [5904], [5905], [5906] and [5907]. A further wall [5908] runs up against one side of the southern two column supports, as happens on the western side, but in this case is bonded into them. Thus void [5902] is also the gap between a connecting wall [5906] and a long wall [5908].

Thus far we have two parallel lines of column supports with long walls [5908, 5910] running along their inside edges in the southern half of the square. Between them lies a larger rectangular void [5800], 1.82 m north-south x 0.62 m east-west, surrounded on each side by a line of bricks [5911] laid end to end with a thick layer of mortar both on top and also between the bricks and the surrounding walls ([5908] to the east, [5909] to the north, [5910] to the west, and [5370] to the south). We can judge that the line of bricks had only ever been of one course on account of the smooth mortar above and because the inside faces of the surrounding walls are smooth and could not have had further brickwork bonded into them at a higher level. It was presumably a further strengthening of the foundations. This feature, along with the two voids on either side of it [5902] and [5450], had been filled with red gravel, and where it was possible in the excavation to reach the bases of the walls the same red gravel was found to pass beneath. These features were always below ground level, as is shown by the fact that their faces are unplastered yet well preserved. The bricks are again of exceptional quality which doubtless encouraged the extensive brick robbery. All features are bonded into each other, except for the series of column supports and connecting walls along the western side of the square. However, since everything is bonded into the east-west wall [5370] which straddles squares Z19 and Z20 and is the back of a probable casemate block, it is very unlikely that the column supports along the western side were built at a different time.

Above the original floor level of the platform one can imagine in square Z20 six (wooden ?) columns (two rows of three) standing on stone column bases which were, in turn, supported beneath the ground by the square brick column supports, presumably with a brick floor around them. Although the rectangular pit [5800] looks like a basin it has no proper base to it nor did its contents suggest that it had been left open, for example, for water. It is more likely that the surrounding walls [5908], [5909] and [5910] are the foundations for a small rectangular chamber, or, better still, for a rectangular podium, presumably facing north, which stood beneath the canopy supported on the columns. The column supports in square Z20 are not aligned with those which run north-south through square AA20, which points further to a lack of symmetry between the two halves of the platform. Those in AA20 may not have even been visible from those in Z20, if the former were inside a room.

3.7 The casemates

The corridor appears to have run right up to the main outer wall on the south, but on either side, just behind the outer wall in squares Z19 and AA19, are two casemates. Each consists of a box formed by mud brick walls with a gravel infill which would have acted as a buffer between the outer wall and the inside structures, greatly increasing the stability of the whole platform. They were purely structural and would not have been visible on the surface of the platform. The two are not the same size; the one on the west is shorter but wider than the one on the east, perhaps reflecting the asymmetrical nature of the top of the platform. Both consist of a back east-west wall bonded at each end into two short perpendicular north-south walls. To the south these abut the main outer wall [5360] and it should be noted that they are not bonded in. The back wall [5370] of the western block is bonded into the foundations of square Z20 ([5911], [5910], [5912], [5908] and [5907]) and so it is difficult to determine its limits, although it has an overall length of 3.35 m. The eastern wall of this block [5362] is a standard one-and-a-half bricks (or 52 cm) wide. The one on the west, however, is unusual in that it is mainly made up of bricks on edge (surviving to different levels) with headers on the east and two parallel rows of stretchers on the west and, as a result, is a few cm wider than the norm. The reason for this is uncertain, as the layers showing on the surface are nowhere near the likely base of the wall and so these bricks are unlikely to have been for levelling up. The fill of the block is pure red gravel [5795], which was truncated down to the level of the lowest wall, in this case [5360]. The gravel had originally stood a lot higher, implying that the walls did as well, for it was found during the excavation of square Z19 that much gravel had spilled over the top of the main wall [5360]. The gravel fills an area 2.15 m east-west by 1.12 m north-south.

The back wall [5359] of the eastern block, which straddles squares AA19 and AA20, is free-standing and separated from the southern wall [5439] of the rooms in square AA20 by a deposit of white limestone or gypsum chips in mud brick dust, the total width being about 80 cm [5438]. This back wall is a standard one-and-a-half bricks wide, with a length of 4.45 m. The two walls which join it perpendicularly ([5363] and [5364]) are again of standard one-and-a-half bricks in width. Section [5364] has evidence for burning on the surface which could be the result of a fire or picnic at any time since the disuse of the platform. The area inside the block is 3.33 m east-west x 0.9 m north-south and it contained red gravel [5353] except at the western end, where there was a deposit containing white limestone or gypsum fragments [5352] similar to [5438]. Since [5352] and [5438] are only separated by a wall they were probably deposited at the same time. A depth of at least 40 cms of [5352] was removed by excavation but it was found still to continue downwards, so it is not likely to have collapsed southwards from [5438]. Sufficient of the red gravel [5426] was excavated east of the north-south wall [5364] to expose the bottom of the wall at a comparatively high level, 51.3 m a.s.l., with a surviving height of about 50 cm. It is likely that the other three north-south walls of the casemate blocks also begin at this level, in contrast to the main outer wall which was built on the original desert surface. The main outer wall is a massive, heavy structure liable to subsidence from its own weight. The four north-south walls of the casemate blocks were probably not bonded into the outer wall in order to prevent their southern ends being dragged downwards in the event of subsidence (pers. comm. Richard Hughes). Cracks can actually be seen on the faces of the walls, pointing downwards and southwards, showing subsidence has occurred despite the absence of bonding.

No casemate block has been found further east in squares AB19 and AB20; only a large expanse of red gravel [5426, 5789] measuring 2.25 m from north to south. This continues eastwards (from excavation of square AC19) and is probably just as deep.

3.8 The corridor opposite the ramp

The two casemate blocks are not aligned with the features lining the corridor, especially on the east where the north-south casemate block wall [5363] bears no relation to wall [5125] on top of the platform. This is presumably because the casemates would have been below the surface and so symmetry did not matter. However, while the western edge of the ramp, a surface feature, is more or less aligned with the column supports along the west side of the corridor, the ramp's eastern edge lines up with the eastern, non-corridor side of wall [5125]. The visible features of the platform evidently did not follow a simple set of alignments.

Something can be seen of the way the platform was constructed by looking at details recorded during the excavation. The process of filling the platform is particularly well seen in the limestone/gypsum chip fill [5438] (in square AA20) which lies between walls [5439] and [5359] and joins with the red gravel [5123] in the corridor to the west (clearly portrayed in Figure 3.13). Since wall [5439] had been badly robbed and survived only to a low level a ready-made section along the north side of the deposit had been left, revealing slip or slump lines sweeping downwards from west to east with alternating lenses of white chippings and red gravel. The former becomes more dense as one moves eastwards and gradually fades out to the west as the corridor is reached. The limestone chips do, in fact, extend just beyond the western limit of wall [5359]. This would imply that the chippings were poured into the space between the two walls at intervals, perhaps each time another load of red gravel was deposited in the corridor.

Artefacts were found throughout the red gravel fill of the corridor ([5123], [5443] and [5449]) and included pottery, wood, and fragments of plaited or knotted plant matter. Many of the items were presumably discarded or dropped by workmen during building, as might also have been two loose bricks found along the west (corridor) edge of wall [5125] in square AA20 within gravel [5123].

During the removal of red gravel [5443] in square Z20 an area of compact mud flooring [5446] was found in the northern part, about 25 cm below the top of [5443]. It existed only in patches and was fragile, but may initially have been a reasonable surface. It was not found further south but could have been removed by accident during the excavation. Two pieces of stone were found, one just on top of the floor and the other to the west where the floor no longer existed. The workmen commented that this type of small, rough stone was used for sharpening knives. In the north-west corner, on top of this flooring and next to column support [5903], was a large limestone block, approximately 75 cm x 45 cm, which looked carefully laid rather than fallen. A couple of pottery sherds were also found. This surface can be explained as a workmen's floor. The filling of the platform with red gravel would have proceeded in stages as the builders laid courses of bricks for the foundation walls inside the platform. This temporary floor [5446] perhaps represents one such working stage. The situation is not, however, really comparable to that of the first stage in square AB21 (see section 3.4 above) because no rendering was applied to the adjacent walls to suggest that they were to remain visible for any length of time.

After flooring [5446] was excavated, two mud bricks appeared almost immediately underneath it. On removing further red gravel [5449] a total of eight bricks was found, laid edge to edge, forming a sort of ramp or staircase [5622] sloping down from east to west (in the foreground in Figures 3.13 and 3.14). This is also likely to have been used by the workmen during construction of the platform. At the end of the excavation a small test pit was dug into the gravel beneath the niche between the two column supports [5903] and [5905], opposite the bottom of the makeshift steps [5622]. About 15 cm below lay another small area of compacted mud which could be another workmen's floor, or otherwise mortar left over from brick laying for the column supports and connecting wall [5904].

3.9 The outer wall

A 20 m length of the southern side of the massive outer wall, which had a thickness of 1.82 m, has been cleared, and the inside of the south-east corner exposed. Much of the interior brickwork of the wall has been extensively robbed, something which led to some confusion during the course of the excavation as to what the whole structure actually was. One result is that parts of the wall have been given different unit numbers, perhaps the most prominent being [5360], which is the north or back of the wall. This portion runs continuously for 20 m from square Z19 to AC19 at a fairly uniform level and, being the best preserved portion, stands at least 60 cm above any other part of the wall. When first found it looked as if it was a wall in its own right, one or one-and-a-half bricks (35–50 cm) thick, although the south face was rather rough and jagged. It forms the southern boundary to the two casemate blocks, and is abutted by their north-south walls ([5361], [5362], [5363] and [5364]). South of [5360] the bricks had been largely robbed out in a very even and methodical way to be replaced by considerable deposits of red gravel and mud brick debris (for example, [5118] and [5353] in square AA19, and [5373] in square Z19). During the removal of the southern part of [5118] in square AA19 a small east-west



Figure 3.15. View to the west along the line of the southern outer wall, before the excavation of square AC19. Note the mud pavement [5436] laid over the foundations of the greater part of the wall's width, and the later robber trench beyond.

wall, only one brick (or 17 cm) wide, was found, bonded into the ramp. This continued eastwards across the square but faded out about 1 m before the eastern edge. To its south is a compact mud floor [5358] (see below) which appears to slope up and partly over the south side of the new small wall at an angle of about 45 degrees. In the extreme east the floor continues to just to the north of where wall [5367] would have been. A picture was accordingly formed in AA19 of two parallel walls [5360, 5637] with an intervening gap of about 1.3 m filled with gravel and mud brick debris. This fill continued westwards between the north wall of the ramp [5357] and wall [5360] and into square Z19. Here, however, no wall equivalent to [5367] was found.

In square AA19, beneath fills [5353] and [5118] and between the two parallel walls, was a purer red sand fill [5368] which had a depth of about 25 cm. When this was partially cleared from the south side a few bricks began to appear. Further brushing uncovered a collapsed wall

[5369] consisting of alternating layers of bricks on their sides and mortar, representing about seven courses (Figure 3.17). A tiny piece of white plaster was found on the up-facing side of one of the bricks, and the fallen wall came to an end where wall [5367] joins the ramp. These two points suggest that it had fallen northwards into the robbed-out trench and was originally part of wall [5367]. In fact, on excavation, this collapsed wall was found to be only one layer deep just like [5367]. Thus the massive outer wall was robbed out leaving a shell only about 17 cm thick on the south side, which was very unstable and collapsed. Beneath the collapsed wall [5369] was more mud brick debris and sand [5375]. During the excavation of this wall [5367] was seen to continue northwards by a further two half-bricks, each stepped down from the one to the south, leading to a series of three steps altogether. After the complete removal of fill [5375] a whole layer of mud bricks in situ [5431] was seen stretching across the bottom, incorporated into wall [5360] to the north and [5367] to the south. This demonstrated that a complete, huge wall was represented stretching from the north side of [5360] to the south side of [5367]. In the western half of square AA19, however, even this central area of mud brick [5431] had been completely robbed out leaving nothing but the red gravel [5776] on which, presumably, the whole wall was built. To the east only a single layer of bricks remains, although on the upper surface is a layer of mortar with impressions of where the bricks of the course above would have been. Running crossways through the centre of many of the brick impressions is a fine, curving line with a hole at the junction of two bricks. Richard Hughes (pers. comm.) has suggested that this is where the bricks above were prised out with a sharp tool.

The bricks of the central part of the wall [5431] are laid out as in a pavement, all header bricks in parallel lines. In fact the whole of the bottom course of the wall consists of five rows of header bricks, all end to end (Figure 3.2). The course above (shown by impressions in mortar) has four rows of header bricks, lined on each side by stretchers. The layer above that would have been five rows of header bricks again, and on top four rows of headers with stretchers on each side, but displaced from the stretchers two layers below by half a brick. The pattern in square Z19 is similar. In the centre of the wall is a flat layer of bricks which looks like a pavement [5432], and this continues to the south edge of the wall since there is no raised south side as in square AA19. The bottom course is again made up of five rows of headers laid end-to-end, but it only exists in the western 2 m of the square. To the east the central and south sections of the wall are missing, leaving only the north part [5360] and red gravel [5776] on which the outer wall was built, except for the so-called north wall of the ramp [5357] (35 cm wide), which is actually a southern part of the outer wall. Before the central sections of the wall [5431] and [5432] were found the neat removal of the core of the wall (where it passed in front of the ramp) gave the impression that the ramp had ended in front of a ditch or moat running between the wall edges [5360] and [5367] (Figure 3.15) with a wooden or wicker bridge linking the ramp to the top of the platform, an arrangement reminiscent of the envisaged approach to the island shrine at Maru-Aten. As more of the wall foundations were exposed, however, it was seen that this could not have been so: the apparent ditch was the ghost of the robbed-out surrounding wall.

The outer wall continues eastwards into square AB19 and its northern face [5360] was exposed while excavating a deposit of red sand [5426], which sloped southwards down the square beneath the topsoil and must represent part of the fill of the mound which had slumped outwards following the loss of the top of the platform. On removing this fill from just south of [5360], instead of an expected deposit of collapsed brickwork lying below, filling a robber trench as in squares Z19 and AA19, a mud floor was found running right up to the surviving wall face [5360]. This has been given unit number [5436] and appears as an extension of floor [5358] which occurs over the southern 2 m of the square and is, in fact, the overall ancient surface belonging to the time when Kom el-Nana was last in use during the Amarna Period (Figure 3.15). However, although the two floors are at same level, the junction between them, which continues the line of the southern face of the surrounding wall [5367] in square AA19, is distinct. On cleaning the area further there emerged along the western side the outline of a few bricks which look like an extension of [5367]. It has already been observed that wall [5367] does not continue up to the east side of square AA19 but stops short by about one metre, the floor extending just to the north of where it would have been. Thus this secondary floor [5436] was laid over the robbed outer wall, including the foundation bricks [5367], leaving only the northern part [5360] uncovered. The new floor had been made to seem like an extension of [5358], although it differs

in that it is much thicker (up to 10 cm as opposed to a few mm), with many cracks on the surface and slight depressions which look like the result of excessive wetting. The compacted mud, which is not very hard, contained much grass-like plant material, and a piece of string (twisted fibres) lay pressed into the surface.

The sequence of events along the southern side of the platform was evidently not a simple one. Although removal of brickwork has, in past times, taken place all along the thick outer wall in the area exposed by excavation, the archaeological relationships differ markedly between the western and eastern portions. This is brought out clearly by comparing the western and eastern sections (Figure 3.16), and the stratigraphic sequences over the two halves of the excavation which they represent. In the western half (including the junction with the ramp) the brickwork of the outer wall has been removed in some places down to the underlying desert, but the resulting space was filled with rubble which rose with little internal differentiation to close to the modern surface. The western section (of square Z19), when examined closely, did, however, suggest the existence of a trench within the rubble spread. This would imply that the spill of rubble comes from the crumbling of the outer wall, and perhaps also from the collapse of buildings on top of the platform, and that the removal of brickwork from the outer wall was an act of robbery achieved by digging down into the slope of the mound long after it had been abandoned. In the eastern half, however, the rubble fades away, and, as the section shows, what little was left of the outer wall was covered by gravelly orange sand derived from the fill of the platform, and a surface cover of drift sand. This, and the mud floor [5436] which covers the place of the missing brickwork of the outer wall, shows that the removal of the brickwork was part of a modification of the outer wall during the lifetime of the building. The idea that the present appearance of the outer wall is the result of two unconnected acts of brick removal receives support from the condition of the exposed face of the remaining brickwork [5360]. Along the western half the brickwork does not have a single face but an irregular surface where bricks have been hacked out leaving scars which remained largely unweathered presumably because immediately afterwards the robber trench collapsed. Along the eastern half, by contrast, the surviving face follows a single plane surface. It is now somewhat irregular, for in order to create it every second course of bricks had to be cut in half; it is also more weathered, presumably because it stood exposed for some time, until buried by the decay of the upper part of the platform. One question which has been asked of this brickwork is whether it was ever plastered. The ground in front of it was thickly coated with mud [5436], and it would have looked strange if this floor ended in recently cut raw brickwork. We must therefore consider the possibility that the face of brickwork [5360] was given a coating of mud plaster which peeled off and disintegrated after the site was abandoned. The floor rises slightly as it lips up against wall [5360] and along this line in square AC19 some patches of mud could actually be interpreted as the remains of plaster.

If, as seems likely, the eastern half contains evidence of a modification to the appearance of the platform during the time of its use, it is essential to be able to trace this modification westwards and to distinguish it from the later robbery of brickwork. The secondary floor [5436] ends abruptly in square AB19 about 70 cm short of the western edge, except to the south where it just extends into square AA19. However, a little further west still a faint and ragged line of compact mud [5437] can be seen on the face of wall [5360] rising sharply at an angle of nearly 45 degrees and extending for about 40 cm (Figure 3.16). It is evidently an extension of floor [5436], showing that the flooring rose up sharply to the west. This matches a patch of flooring which slopes up over wall [5367] also at an angle of 45 degrees in square AA19. At this point wall [5367] stands one course above floor [5358]. Thus before the much later robbery of brickwork, and during the lifetime of the building, the surrounding wall to the east of the ramp was cut back for most of its width, the line of the cut (which in the western stretch went below the level of the surrounding ground, so that a thin fill of dust and sand [5632] and, at the west end, yellow gravel [5435] had to be inserted) was floored over, and a mud-plastered slope created close to the junction of the ramp and the wall, so providing a secondary means of access to the platform independent of the ramp. In the condition in which it was found this means of access looks as though it was a makeshift ramp. It is likely, however, that when it was made the brickwork of the outer wall as it continued to the west was still in place, so that this secondary access would have risen up a mass of newly truncated brickwork. It may, therefore, have been more a staircase (perhaps set at a slight angle to the wall face) than a ramp, and have looked

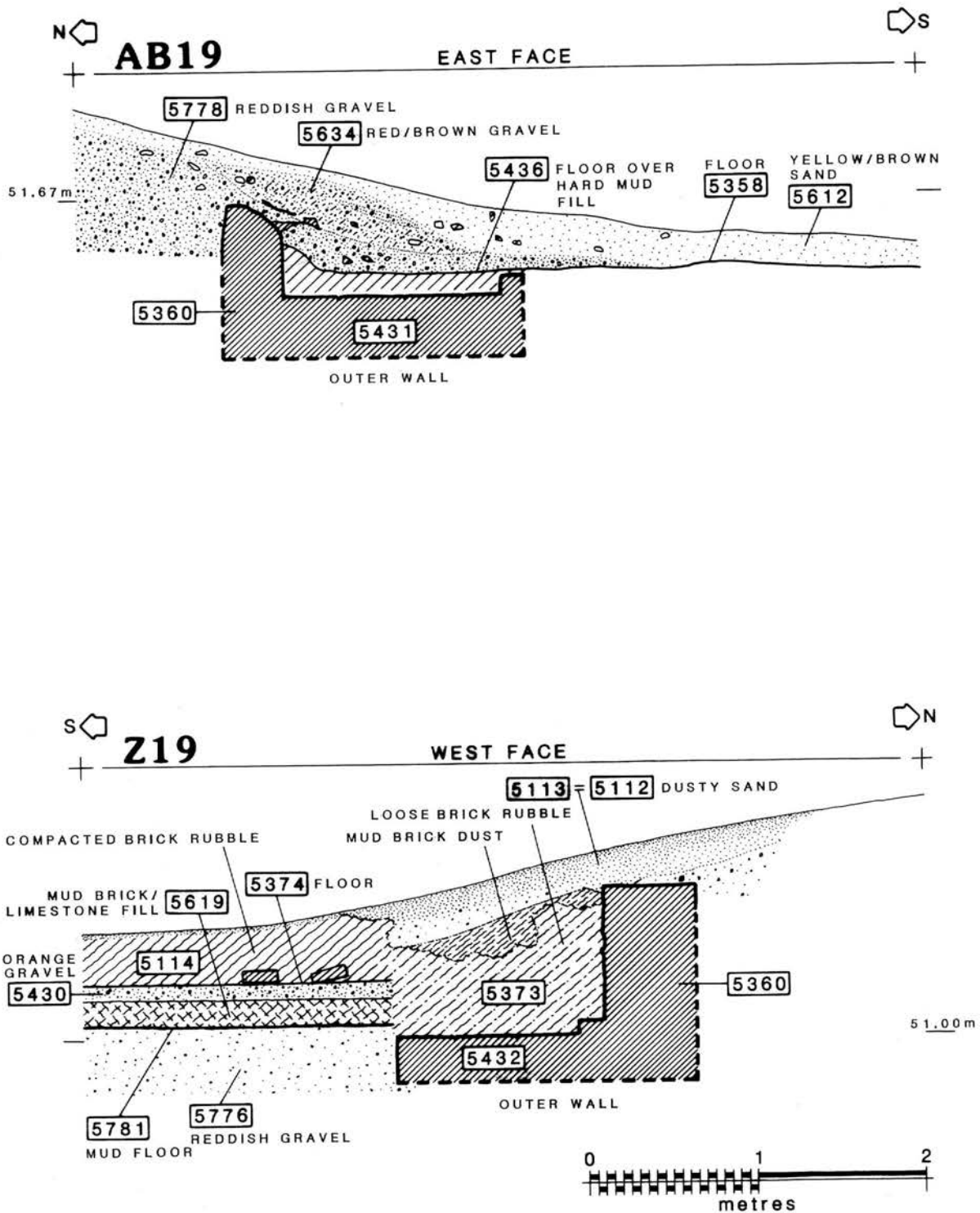


Figure 3.16. Sections across the south outer wall showing the contrasting nature of the fill over the removed brickwork to east and west.



Figure 3.17. Detail of the face of wall [5360], part of the southern outer wall, viewed looking north close to the junction of squares AA19 and AB19. It shows the line of the broken secondary floor [5436] rising up the wall at an angle.

neater. A long time after the the site was abandoned people looking for bricks to re-use dug a trench from west to east along the line of the southern outer wall which had been largely obscured behind a slope of rubble (Figure 3.18). They dug past the junction of the ramp, leaving it standing on its own, and then through the secondary mud slope created late in the building's history. By now, however, the supply of old bricks was diminishing rapidly on account of the ancient cutting back of the outer wall, and after cutting through part of the secondary floor [5436] they abandoned their labours. Since, by the end, they were digging down through a slope of sand rather than through more stable rubble, they protected their trench by leaving an outer skin of brickwork standing on the south side. It subsequently collapsed neatly into the trench where it was found as unit [5369] during the excavation, leaving its base as unit [5367].

Late in the season the excavation was extended eastwards into square AC19 with the hope of finding the south-east corner of the outer wall. Beneath the topsoil floor [5358] was again found in the south, terminating in the faintly visible junction with secondary floor [5436], which lapped up against the brickwork of the much reduced outer wall [5360], here denuded to the bottom two courses. Floor [5436] was not removed in this square. At the eastern edge of the square the south-east inner corner of the outer wall was found, together with a 40 cm width of the eastern wall [5779], the rest being beyond the limit of excavation. That this is the corner and not another internal casemate wall is established by the fact that its base is at least as low as the ancient ground level whereas the casemate walls were constructed on top of a layer of gravel fill. It also appears to be bonded into the southern wall, although this is not altogether clear with so little of it exposed. The red gravel fill behind wall [5360] was removed in order to expose the corner

The Central Platform

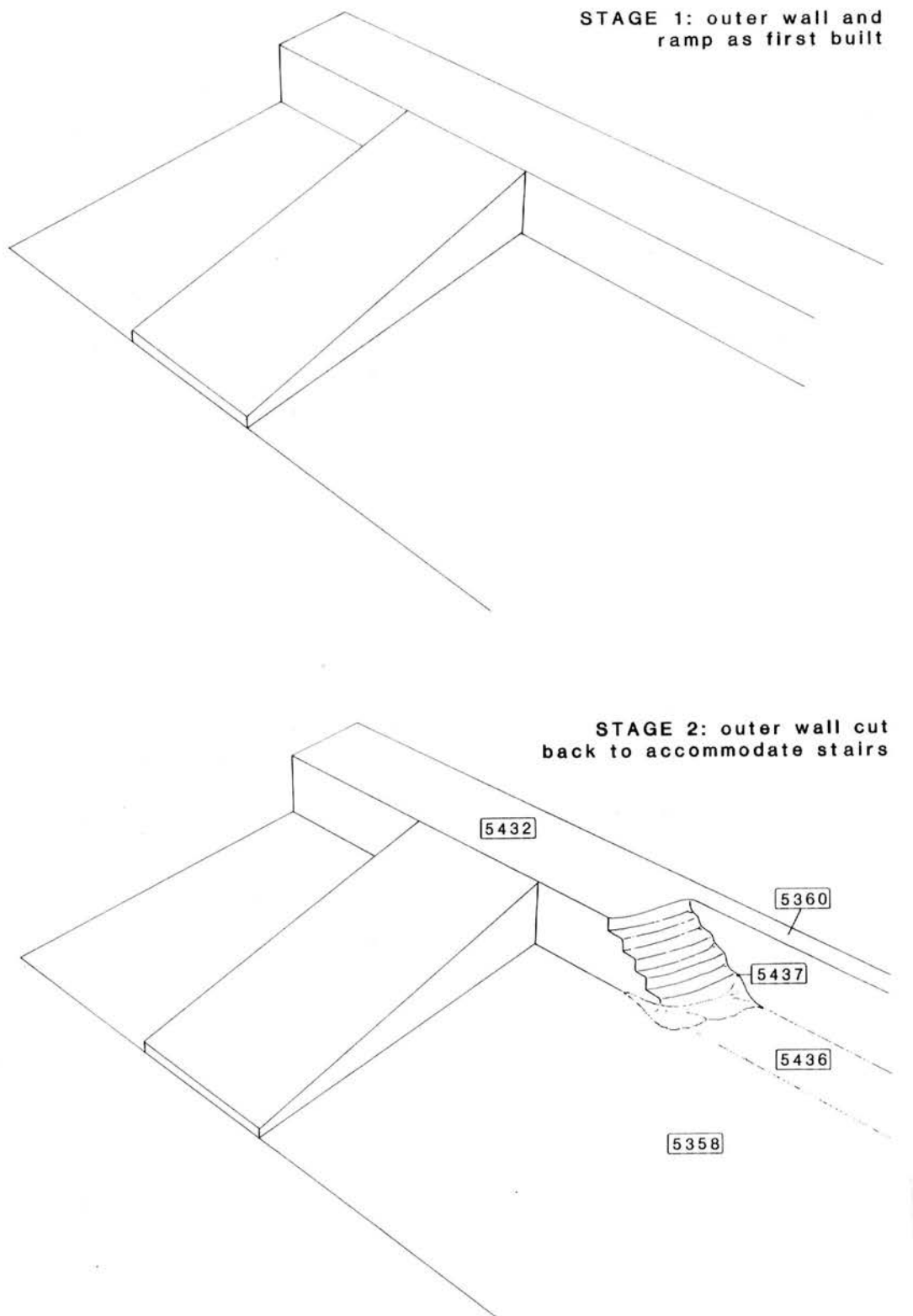
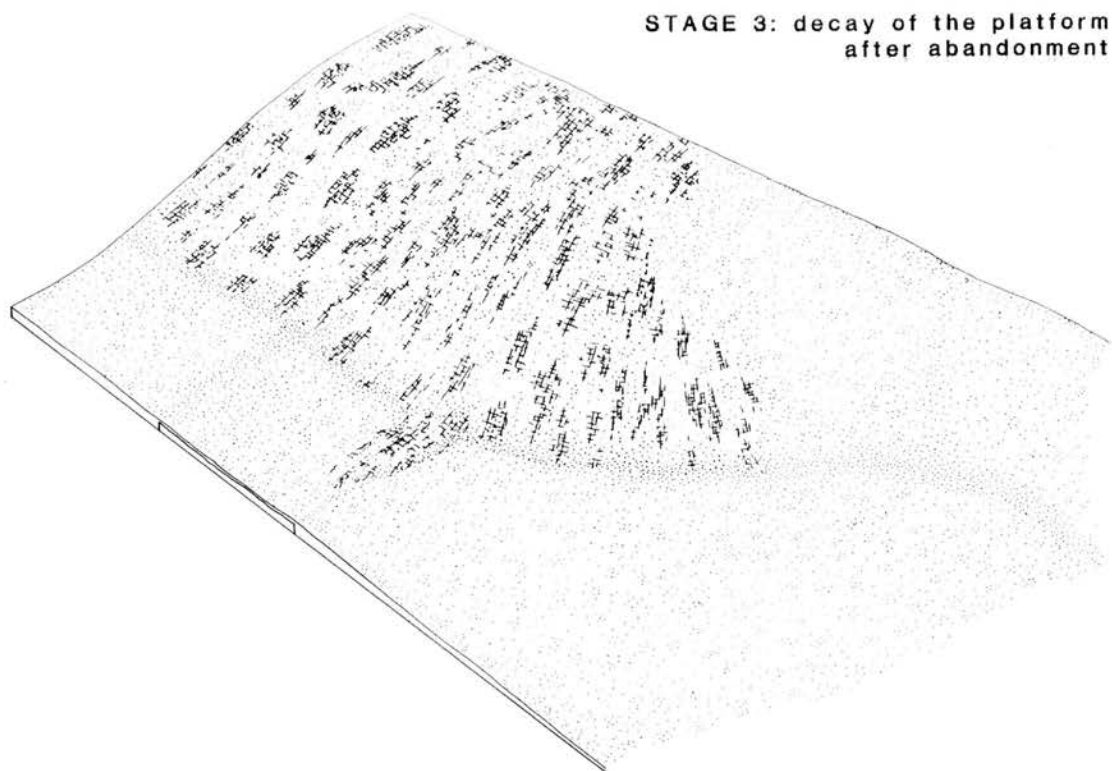
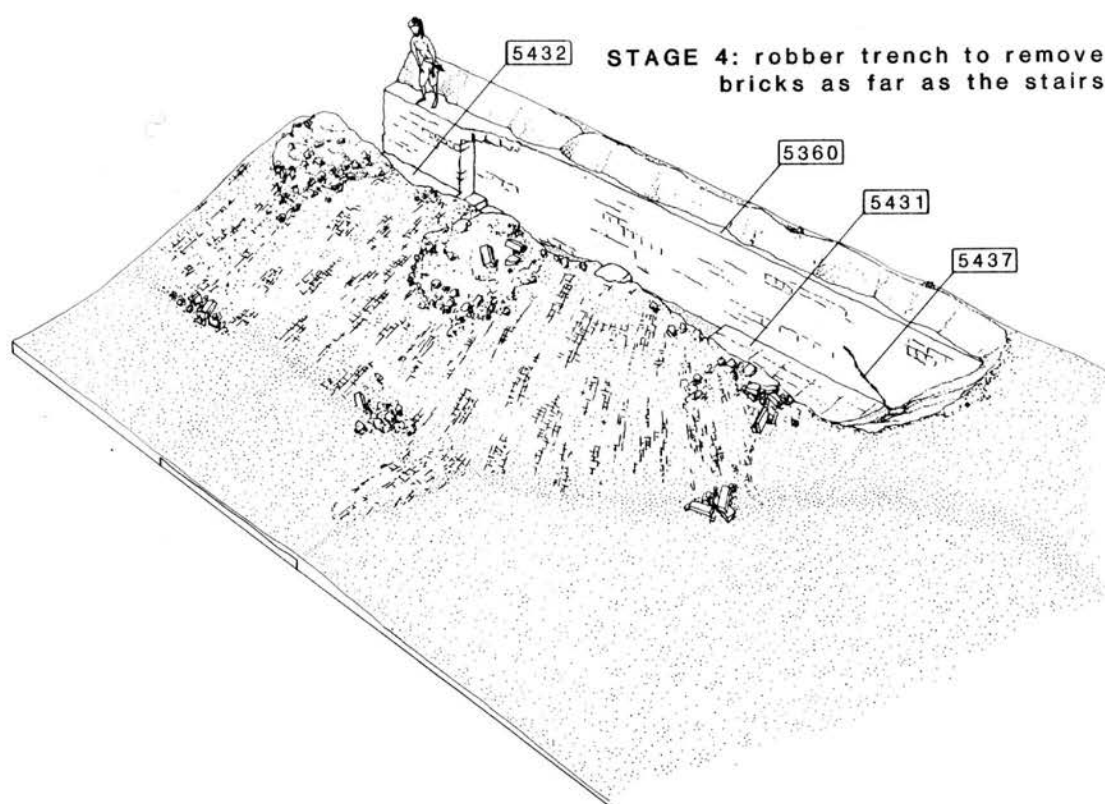


Figure 3.18. Diagram sequence showing the likely history of the southern outer wall.



**STAGE 3: decay of the platform
after abandonment**



**STAGE 4: robber trench to remove
bricks as far as the stairs**

more adequately, and this revealed a rough but thick mud surface [5780] which does not look like a standard floor and is more likely to be a surface from which bricklaying was done, as in square Z20.

3.10 Floors at the base of the platform



Figure 3.19. Area to the west of the ramp and the south of the outer wall (squares Z18, Z19) at the end of the excavation, viewed to the north. In the background is the outer wall, partly removed by brick robbery; in the foreground the various layers making up the surrounding “floor” are individually exposed, see Figure 3.20 for details.

Two principal areas of flooring were found at the base of the platform: [5358], which is located east of the ramp in squares AA19, AA18, AB19, AB18, and AC19 and which joins with secondary floor [5436] to the north; and [5374], which is found to the west of the ramp. Both consist of a thin covering of mud a few mm thick, partially eroded away and showing beneath a

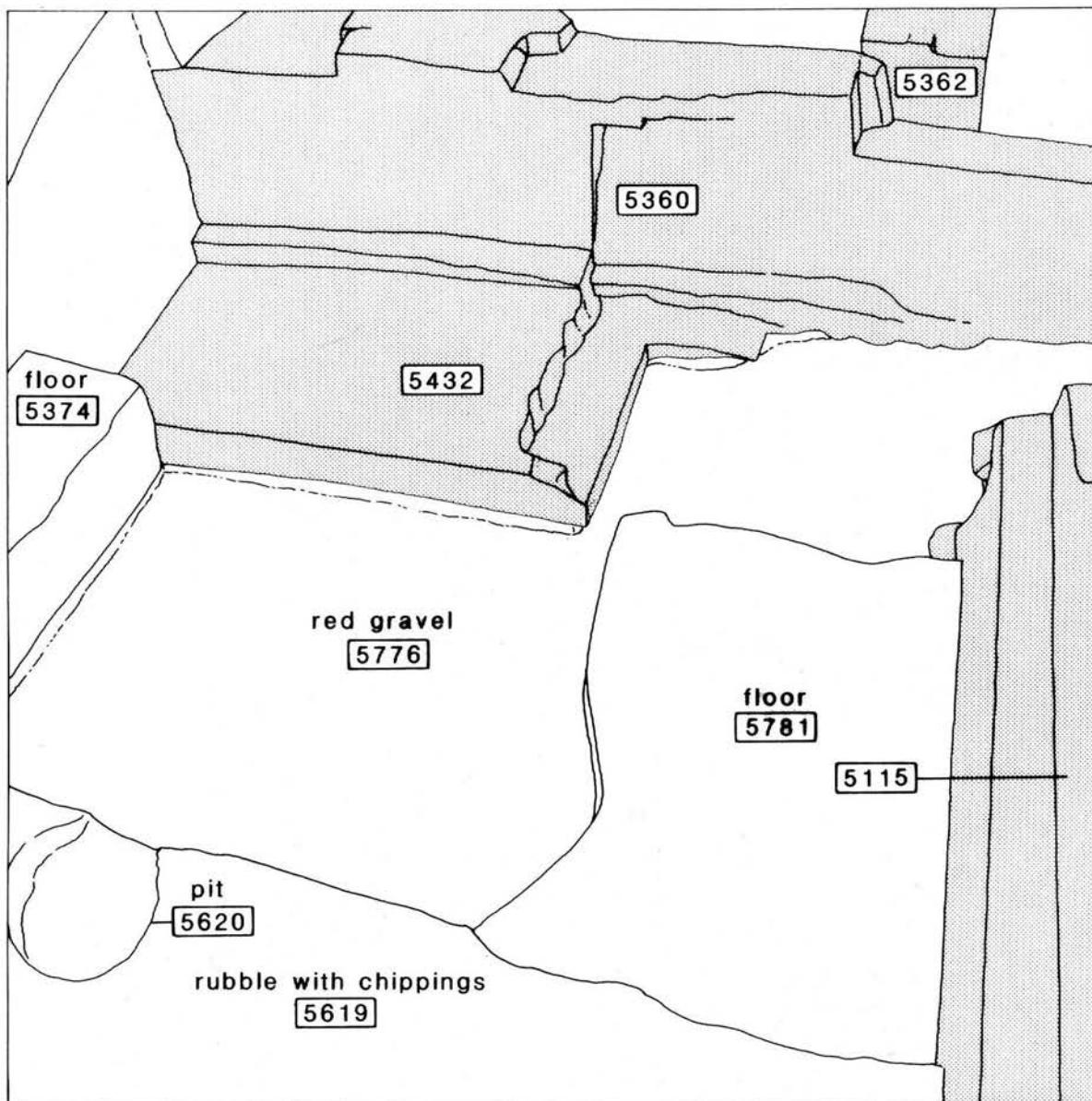


Figure 3.20. The same view as Figure 3.19, with labelled units.

red gravel fill with pebbles. As part of the investigation of the foundations of the platform, and with prior knowledge of the discovery of more than one floor associated with the buildings in the south-east corner of the Kom el-Nana enclosure, a small excavation was made beneath the mud floor to the west of the ramp in squares Z18 and Z19 (Figures 3.19, 3.20). Already, in the sides of the robber trench along the line of the outer wall, a mud brick/limestone fill could be seen between the level of mud floor [5374] and the surviving bricks at the bottom of the robber trench 30 cm below.

The orange gravel fill [5430] encountered directly below the floor was surprisingly hard and contained some pebbles and limestone/gypsum chips. It proved to be only about 8 cm deep and lay above another probable floor which was basically the top surface of the mud brick/limestone fill mentioned above. This unit [5619] consisted of a mixture of mud brick fragments, pieces of limestone or gypsum up to 10 cm across, small pieces of sandstone, and a quantity of pottery, including blue-painted sherds. It looked distinctly like building rubble. One cannot be absolutely

sure that there was a floor on the upper surface, for there is little in the way of a mud covering and the limestone fragments protrude sharply from below. However, a small circular pit [5620], not visible from above, had been cut into this unit. It had a diameter of 40 cm and a depth of 10 cm, the sides were concave and almost vertical at the top but approaching a point at the bottom which is not quite central. It was lined with compacted mud, which implies that the surrounding deposit [5619] may also have had a thin mud surface, now eroded away, and contained a fill [5621] of loose brown sand with few inclusions. It is likely that the pit was used as a support for a pottery vessel, implying that, for a time, the top of deposit [5619] was a used surface.

The deposit [5619] itself lips up to the west wall of the ramp [5115] and is therefore subsequent to it. A small test area was dug away and the deposit was found to be 15-20 cm deep, with below it another floor of compacted mud [5781] rather similar to the uppermost floor [5374]. On the west side of the test pit it was dug through into the layer below and the section showed it to be a band of red/brown soil with a depth of 5 cm. On the eastern side, where it existed in patches, it, too, lipped up to [5115], the western side of the ramp. The layer beneath was the ubiquitous red gravel [5776] which joins with and is the same as that which passes below the main outer wall. It was dug to a level about 20 cm below the outer wall [5432] and 40 cm below the bottom floor [5781] and was found to be homogeneous. Thus it would seem that once the platform had been built on the red gravel, the lowest "floor" being presumably the builders' working surface, the surrounding ground level was raised by means of a layer of rubble over which one or perhaps two mud floors formed. How this made-up ground relates to other similar deposits in the east and south-east of Kom el-Nana remains to be established.

3.11 The old trackway

Mention should be made of an old trackway that passes east-west through the southern part of squares Z18, AA18, and AB18 at the base of the platform (cf. Figure 3.13). It is up to 2 m wide and has damaged and compacted the material in its path. The walls of the ramp ([5115] and [5356]) have both been cut by it, and to the east and west of the ramp the ground was extremely hard and had to be dug out with an iron spike. It was difficult to differentiate between the material of the trackway and whatever lay below, a situation which extended downwards in square Z18 as far as the top of floor [5619]. On the west side of this square, just below the compacted topsoil, a rut with tyre impressions made by a tractor wheel was encountered, showing that, at least in part, the trackway is modern and presumably a product of agricultural traffic going to and from the irrigation project adjacent to Kom el-Nana. However, sherds of Roman pottery and fragments of probable Roman red brick lay on its course, especially east of the ramp, and so raise the possibility that the track may date back to Roman times.

3.12 Small finds

Small finds were not plentiful. The principal one is the quartzite statue fragment (stomach and navel) probably of Akhenaten described above. Two pieces of painted plaster found in square Z19, in the debris below the topsoil, imply that the rooms on the platform had possessed painted walls. A number of pottery sherds with a white gypsum slip were found over the site and these are generally associated with religious activity (pers. comm. Pamela Rose; cf. *AR I*: Chapter 12). A few small pieces of faience, mainly jewellery fragments, were also found but none of these was unusual in any way. The little pottery that was found was typical of the Amarna Period, though a few Roman sherds were present, especially to the south on and around the trackway.

3.12 Discussion

From the evidence available so far the platform was a focal building at Kom el-Nana. The great enclosure was subdivided along an east-west line, and the platform stood somewhat to the back on the centre line of the southern part which seems to have been left largely as open space. At its particular latitude, however, other buildings were arranged both to north and south (the former a stone shrine) so that it must also have appeared as the central feature of a group of buildings. As so far exposed the platform was almost wholly covered by a brick building which

faced west. To the rear (east) it consisted of rooms with columned antechambers, whilst the front part seems to have been an open-sided canopy supported on columns, the latter probably of wood. Two fragments of painted plaster hint that the interiors of the building were painted, whilst one of the rooms may have contained a composite royal statue, probably of Akhenaten himself.

Platforms of brick or stone are known from a number of New Kingdom sites, sufficient to suggest that they were a not uncommon element of religious and ceremonial architecture. Their design and context vary somewhat, however, and since within the variation may lie differences of function it is important not to treat them as a unity. The best-known class is that of the open-topped platform with usually single ramp or staircase which served as a solar "altar". The Kom el-Nana central platform is clearly not one of these, nor does it resemble the brick platforms at Kom el-'Abd and Kom es-Samak of the time of Amenophis III.

The site at Amarna which offers the closest, and, indeed, only real parallel to the platform is that called the "Desert Altars" which lies to the east of the North Suburb and which was summarily excavated and published by Pendlebury (*COA* II: Chapter V, Pls. XXVI, XXVII; for the altars in their general context see Figure 3.21). Here lay three platforms on a single axis reached by ramps, but each of a very different design. The southernmost, no. III, is the one which bears comparison with the central platform at Kom el-Nana. It measured 35 x 30 m, and was reached by a ramp centrally placed on each of its four sides. The space within the thick outer wall (which had about the same thickness as the equivalent at Kom el-Nana, 1.82 m) was filled with foundation walls and supports for columns, all of which (unlike their equivalents at Kom el-Nana) were built on the desert surface rather than on a layer of the platform fill. The structure had fared worse than the Kom el-Nana platform, in that all of the brickwork seems to have been destroyed to well below the original floor level. In detail the design, which could have included a central area raised above the level of the platform edge, differs significantly from that at Kom el-Nana. Much more space was given over to column supports, which ran two-deep around the four sides and occupied much of the central area as well.

The role of such a platform is illustrated in the well-known scenes of the reception of foreign tribute in the tombs of Meryre II and Huya (*RT* II: 38-39, Pl. XXXVII; *RT* III: 11-12, Pl. XIV; reproduced here as Figure 2.8). Here a canopied platform serves as a grand version of the raised dais on which, in ancient Egypt, high officials presided over acts of administration, with, in this case, the royal family presiding over a great gathering of representatives of foreign lands who present their tribute. It is thus an essentially ceremonial edifice, and one requiring a large open space around it although adjacent to the portrayal in the tomb of Huya, as at the Desert Altars, is another platform which is really a solar altar. In these aspects, too, the Kom el-Nana platform is similar. Indeed, because of the high wall around the huge enclosure in which it stands the degree of definition and formality of the surrounding space is much greater than that at the Desert Altars, and participants had available to them a range of buildings (still only partially excavated) in the south-east corner of the enclosure, something else not provided at the Desert Altars. Further excavation should define the character of the buildings on the north-south axis adjacent to the central platform, but unless the picture in the tomb of Huya is schematic in the extreme, the Desert Altars are still the more likely site of the "reception" scenes than Kom el-Nana itself, particularly in view of the presence of a substantial stone temple a little to the north of the central platform, which is not represented in the Huya scene although it seems to belong to the early years of Akhenaten.

The provisional interpretation for the southern enclosure at Kom el-Nana is, then, that it is primarily a ceremonial court used for royal engagements when large crowds were gathered, on occasions of the kind represented by the reception of foreign tribute scenes. The Desert Altars site is a makeshift version, or one which failed to become the centre of a more ambitious development.

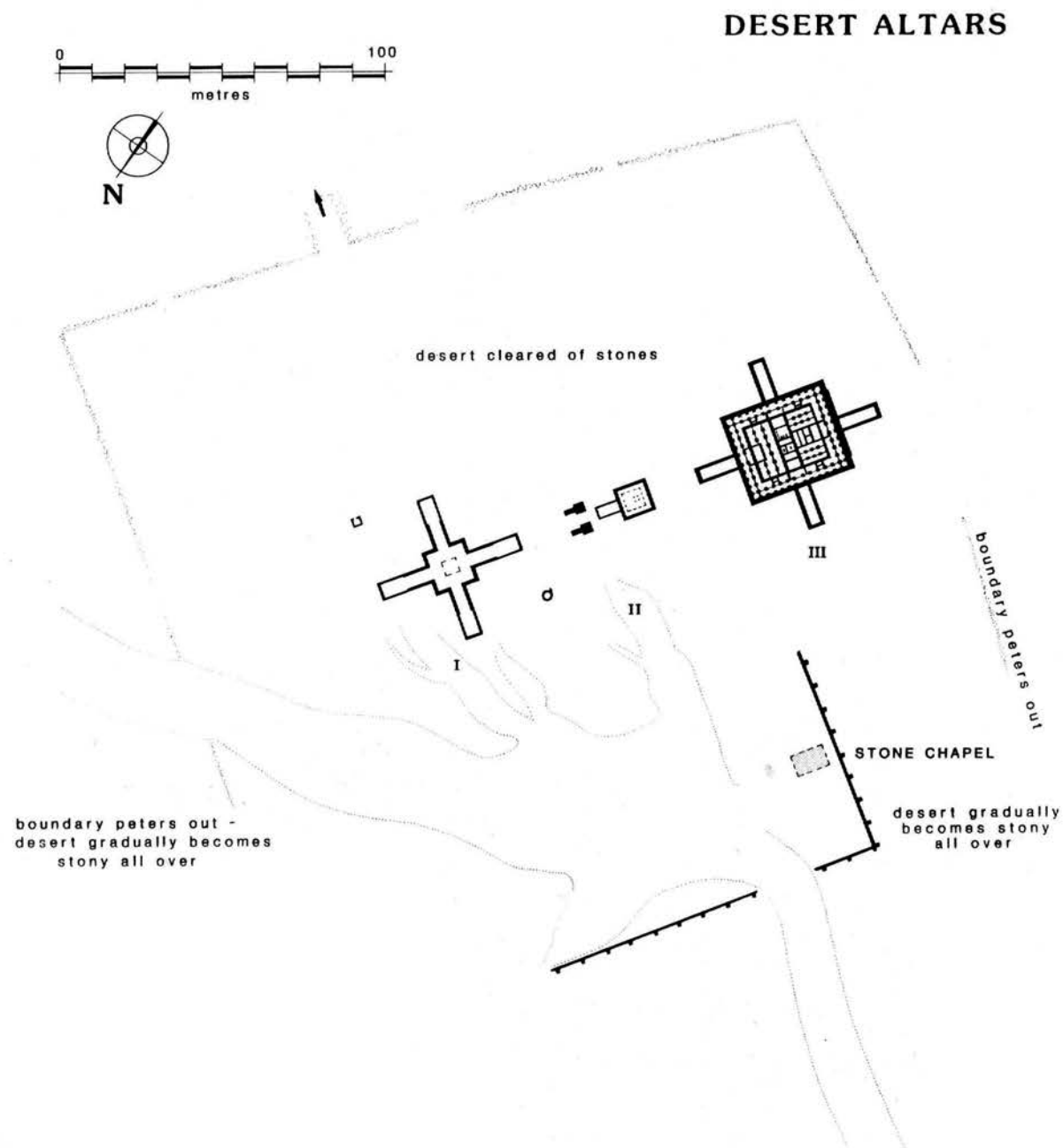


Figure 3.21. Outline plan of the Desert Altars site, after COA II: Pl. XXVII, with additions from the 1978 Amarna Survey.