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## CONTENTS

EDITORIAL FOREWORD . . . . .	vii
FIELDWORK, 2002–03: DELTA SURVEY, MEMPHIS, TELL EL-AMARNA, QASR IBRIM . . . . .	Penelope Wilson, David Jeffreys, Barry Kemp and Pamela Rose 1
<i>hftj ntr</i> AS EUPHEMISM—THE CASE OF THE ANTEF DECREE . . . . .	Katja Goebis . . . . . 27
THE MIDDLE KINGDOM OFFERING FORMULAS— A CHALLENGE . . . . .	Detlef Franke . . . . . 39
RITUAL FUNCTION AND PRIESTLY NARRATIVE: THE STELAE OF THE HIGH PRIEST OF OSIRIS, NEBWAWY . . . . .	Elizabeth Frood . . . . . 59
PHARAONIC VENTURES INTO SOUTH SINAI: EL-MARKHA PLAIN SITE 346 . . . . .	Gregory D. Mumford and Sarah Parcak . . . . . 83
THE ICONOGRAPHY OF THE BLUE CROWN IN THE NEW KINGDOM . . . . .	Tom Hardwick . . . . . 117
THE MATERIAL EVIDENCE FOR DOMESTIC RELIGION AT AMARNA AND PRELIMINARY REMARKS ON ITS INTERPRETATION . . . . .	Anna Stevens . . . . . 143
A NEW MILITARY SITE ON ‘THE WAYS OF HORUS’—TELL EL-BORG 1999–2001: A PRELIMINARY REPORT . . . . .	James K. Hoffmeier and Mohamed Abd el-Maksoud . 169
HARSIÉSIS, UN VIZIR OUBLIÉ DE L’ÉPOQUE LIBYENNE? . . . . .	Frédéric Payraudeau . . . . . 199
THE GEOLOGY OF THE ROSETTA STONE	Andrew Middleton and Dietrich Klemm . . . . . 207

A ROMAN PERIOD DEMOTIC MANUAL OF HYMNS TO RATTAWY AND OTHER DEITIES (P. ASHM. 1984.76) . . . . .	Holger Kockelmann . . . . .	217
‘...AS SAFE AS IN THE BRITISH MUSEUM’: PAUL DE LAGARDE AND HIS BORROWING OF MANUSCRIPTS FROM THE COLLECTION OF ROBERT CURZON . . . . .	Heike Behlmer . . . . .	231
BRIEF COMMUNICATIONS		
FALLEN HEROES?—WINLOCK’S ‘SLAIN SOLDIERS’ RECONSIDERED . . . . .	Carola Vogel . . . . .	239
NOCHMALS ZUM GEBRAUCH DES TITELS <i>dw3t-ntr</i> IN DER SPÄTZEIT . . . . .	Erhart Graefe . . . . .	246
BARBERING THE BEARDLESS: A POSSIBLE EXPLANA- TION FOR THE TUFTED HAIRSTYLE DEPICTED IN THE ‘FAYUM’ PORTRAIT OF A YOUNG BOY (J. P. GETTY 78.AP.262) . . . . .	Salima Ikram . . . . .	247
YESBOKHEAMANI—DER LÖWE VON QASR IBRIM . . . . .	Jochen Hallof . . . . .	251
A BARBARIAN FOUND . . . . .	Donald Bailey . . . . .	254
REVIEWS		
GÜNTHER LAPP, <i>The Papyrus of Nu</i> . . . . .	Reviewed by Irmtraut Munro . . . . .	263
J. D. BOURRIAU ET AL., <i>New Kingdom Pottery Fabrics</i> . . . . .	D. A. Aston . . . . .	264
HANS DIEDERIK SCHNEIDER, <i>The Memphite Tomb of Horemheb</i> . . . . .	Aidan Dodson . . . . .	268
J. STURM (TRANS. CLAUDE VANDERSLEYEN), <i>La guerre de Ramsès II contre les Hittites</i> . . . . .	A. J. Peden . . . . .	270
WOLFGANG HELCK (†), <i>Die datierten und datier- baren Ostraka, Papyri und Graffiti von Deir el-Medineh</i> . . . . .	M. L. Bierbrier . . . . .	271

WALTER NEIDERBERGER, <i>Elephantine, XX. Der Chnumtempel Nektanebos' II.: Architektur und baugeschichtliche Einordnung</i> . . . . .	Neal Spencer . . . . .	273
WILLIAM D. E. COULSON, <i>Ancient Naukratis, II. The Survey of Naukratis and Environs</i> . . . . .	David W. J. Gill . . . . .	278
VALERIE A. MAXFIELD AND DAVID P. S. PEACOCK, <i>The Roman Imperial Quarries Survey and Excavations at Mon Porphyrites, 1994–1998, I.</i> . . . . .	James A. Harrell . . . . .	280
JÜRGEN OSING, <i>Hieratische Papyri aus Tebtunis, I.</i> and JÜRGEN OSING AND GLORIA ROSATI, <i>Papiri Geroglifici e Ieratici da Tebtunis</i> . . . . .	Stephen Quirke . . . . .	283
JENNIFER A. SHERIDAN, <i>Columbia Papyri IX: The Vestis Militaris Codex</i> and PAUL SCHUBERT, <i>A Yale Papyrus (P. Yale III 137)</i> . . . . .	J. David Thomas . . . . .	288
PHILIPPE DERCHAIN, <i>Les impondérables de l'hellénisation. Littérature d'hiérogammates</i> . . . . .	Willy Clarysse . . . . .	290
JANE ROWLANDSON (ED.), <i>Women and Society in Greek and Roman Egypt: A Sourcebook</i> . . . . .	Christina Riggs . . . . .	292
J.-Y. EMPEREUR AND M.-D. NENNA (EDS), <i>Nécropolis, 1.</i> . . . . .	Donald Bailey . . . . .	293
CHRISTOPHER HAAS, <i>Alexandria in Late Antiquity: Topography and Social Conflict</i> . . . . .	Arietta Papaconstantinou . . . . .	295
RICHARD ALSTON, <i>The City in Roman and Byzantine Egypt</i> . . . . .	Roger S. Bagnall . . . . .	297
PAMELA ROSE, <i>Qasr Ibrim. The Hinterland Survey</i> . . . . .	Michael H. Zach . . . . .	301

## EDITORIAL FOREWORD

THE Society continued its extensive programme of excavation and research in Egypt during 2003, with work in the Delta and at Memphis, Tell el-Amarna and Qasr Ibrim, all of which is briefly reported in the Fieldwork section of this volume. Findings of the joint EES–University of Durham expedition to Sais in the spring of 2003 will be published in next year's *JEA*. Studies on site have borne fruit in the form of the publication of Wendy Smith's *Archaeobotanical Investigations of Agriculture at Late Antique Kom el-Nana (Tell el-Amarna)* which was published in the course of 2003.

The new responsibilities of Patricia Spencer's role as Secretary General of the Society have led to some changes in work practices in the London office. Although she still produces *Egyptian Archaeology* on site, the time-consuming task of setting the *JEA* has passed into the hands of the recently-appointed Production Editors, leaving Dr Spencer more time for the daily jobs associated with a flourishing modern academic-based organisation. Work on the computerisation of the library holdings has continued throughout the year, and it is hoped to have the catalogue available on the Society's website by summer of 2004. On 21 June 2003 the EES held a well-attended Study Day in London entitled 'Lord of the Two Lands: Aspects of Egyptian Kingship', and it is hoped that its success will lead to further such sessions.

On the major Egyptological gathering held annually in The British Museum Dr Neal Spencer provides the following information:

This year's Raymond and Beverly Sackler Distinguished Lecture in Egyptology was given by Zahi Hawass, Secretary-General of the Supreme Council for Antiquities, on 14 July. The unprecedented demand for tickets ensured a capacity audience heard Dr Hawass outline recent discoveries made at Giza. The efforts of the SCA in improving site management were also highlighted, particularly around the unfinished obelisk at Aswan.

A two-day colloquium accompanied the Sackler Lecture, highlighting Egyptological research and fieldwork undertaken by The British Museum, which celebrated its 250th anniversary this year. The first day focused on research into the collections, particularly the ongoing conservation of the wall-paintings from the tomb chapel of Nebamun, which has yielded important information on painting techniques, the paintings' display history and even new joins among the fragments. These paintings will be the focal point of a new permanent gallery, currently being planned. The Museum's extensive fieldwork programme in Egypt was the subject of the second day, with presentations on the work at Tell Belim, Tell el-Balamun, Kom Firin, Hierakonpolis, Elkab and Luxor. A fascinating video was shown of the conservation and removal, by an EES expedition, of the Taharqa wall-painting from Qasr Ibrim. The painting is now in the Nubia Museum in Aswan awaiting further conservation by specialists from The British Museum and Bristol.

On 18 September the Ashmolean Museum in Oxford hosted a well-attended reception to celebrate the opening of the newly refurbished Sackler Gallery of Egyptian antiquities, the culmination of long labour by Dr Helen Whitehouse and her assistants to make the collection more widely accessible to the public and to scholars.



2003 has seen yet more sad losses among female British Egyptologists. Helen Murray, an ever gracious presence in Oxford for many years, died at the age of 87. Her former colleague and friend Dr Jaromir Malek writes of her:

Helen Murray died in Oxford on 20 March 2003. She began work as one of Dr Moss's assistants in the Griffith Institute during the preparation of the second edition of Part 1 of Volume I (Theban tombs) of the *Topographical Bibliography* in 1952. She was involved in this project for thirty years, until 1982, and kept her interest in the Institute even after her retirement. She was the Griffith Institute's first Archivist, and transformed the collection of various manuscripts held in the Griffith Institute into a proper Egyptological archive. She catalogued some of the most important groups of manuscript material, such as the papers of Sir Alan Gardiner, B. G. Gunn, Jaroslav Černý and Norman and Nina de Garis Davies. In 1963 she published, together with M. Nuttall, *A Handlist of Howard Carter's Catalogue of Objects in Tutankhamun's Tomb*. Helen did not suffer fools gladly but had friends among Egyptologists all over the world. Many recall with gratitude her kindness and willingness to go to extraordinary lengths in order to help them with Topographical Bibliography or Archive questions.

Sarah Clackson, Lady Wallace Budge Fellow in Christ's College, Cambridge, also died after long illness. Dr Dorothy Thompson writes:

Sarah J. Clackson, who died on 10 August 2003 at the age of 37, served more than once on the EES Committee and recently worked on Coptic material at Amarna. Graduating from Cambridge (1989) and gaining her PhD (1996) at University College, London, she had already acquired an international reputation in the field of Coptic studies. Sarah Clackson was responsible for the incorporation of Coptic papyri into the standard *Checklist of Editions* (2001) and the most important of her recent books, *Coptic and Greek Texts Relating to the Hermopolite Monastery of Apa Apollo* (Oxford, 2000), showed her to be a first-rate papyrologist with an interest in history. A member of the Board of the International Association for Coptic Studies and the Editorial Board of the *Bulletin of the American Society of Papyrologists*, she had much work in hand with many future plans. Her files will be available in the Archive of the Griffith Institute in Oxford and her husband, James Clackson, has established a fund to assist scholars coming to work on these. We mourn her death and celebrate her life. [A longer obituary was published in *The Independent* 18 August 2003.]

Another contributor to Egyptology in Britain, Alec Dakin, also died this year. Of him Dr Jaromir Malek wrote:

Alec N. Dakin who died on June 14, 2003 had a remarkable career. Born in 1912, he read Egyptology at Oxford and became a Fellow of University College in 1936. During this time he published several articles in *JEA*, including one, still valid, on Middle Kingdom stelae in the collection of the Queen's College (now on loan to the Ashmolean). Following the outbreak of the Second World War, he entered the Foreign Office and worked as a cryptographer at Bletchley Park. There he processed German naval signals, among them those sent by the Enigma machines. After the war he left Egyptology in order to become a schoolmaster, but returned to the subject after his retirement in the 1970s.

He was a charming man and will be greatly missed by those of us who knew him. An obituary appeared in *The Times* on July 10. A small group of Dakin's papers is kept in the archive of the Griffith Institute in Oxford (acquired from the bequest of Sir Alan Gardiner); see <http://www.ashmol.ox.ac.uk/gri/4dakin.html>. [ANENews July 2003]

Losses have also occurred in the wider, international Egyptology world. In January 2003 Emeritus Professor C. D. G. Müller, a wide-ranging oriental linguist and a specialist in Coptic and the Coptic church who spent much of his academic career in Heidelberg and Bonn, died at the age of 76 [ANENews February 2003]. In August Dr James Romano, curator at the Brooklyn Museum of Art, who published widely on Egyptian art, especially that of the Old Kingdom and the Eighteenth Dynasty, and who did so much to make objects in museum collections better known, died at 56 in a car crash [ANENews August 2003].

On a happier note, there has been continued expansion of Egyptological posts in United Kingdom universities. The School of Archaeology, Classics and Egyptology at the University of Liverpool has appointed Elizabeth Frood, finishing her doctorate at Oxford, as its new Lecturer in Egyptology. The School of Classics and Ancient History at the University of Wales Swansea also has another Lecturer in Egyptology, Dr Ellen Morris, who has previously taught at the University of Michigan and the University of Chicago. With the increasing numbers of Egyptology students on academic courses, their contributions will be most appreciated and we wish them well.

A different form of appreciation has come to Dr Rosalie David, now Professor of Biomedical Egyptology at the University of Manchester. She was awarded an OBE 'for services to Egyptology' in the New Year's Honours list, further enhancing the public profile of the subject.

Although not so far honoured by such public recognition, there nonetheless remain those who deserve the Society's recognition and gratitude for services rendered to the *JEA*. Foremost of these are Hilary Meeks and Caroline Middleton, our new and sometimes hard-pressed Production Editors and typesetters, who, despite the unforeseen magnitude of the job, have always remained cheerful and helpful. Dr Patricia Spencer has contributed greatly behind the scenes to the co-ordination of the production, and the unwearied Dan Lines has once again checked the proofs, both valuable services without which this volume would not be what it is. Dr Margaret Serpico deserves thanks for having done considerable editing work on several of the articles. Finally, we must thank Commercial Colour Press for printing the volume.

Dr Lisa Montagno Leahy (Editor-in-Chief)  
Dr Katja Goebis  
Mr Christopher Naunton  
Dr Neal Spencer  
Professor John Tait  
Dr John Taylor

## FIELDWORK, 2002–03

DURING the 2002–03 field season the Society carried out an extensive programme of work in the four main geographical areas where its recent research has been focused. Penelope Wilson undertook work at Sais (a report to be published next year) and on behalf of the ongoing Delta Survey, and fieldwork, including numerous smaller projects, continued at Memphis and Amarna. The Qasr Ibrim work comprised a study season based in Shellal and a short period on site, when the wall-painting from the temple of Taharqa was conserved and removed. Reports on these works follow. Such projects would be impossible without the ongoing help and co-operation of the officials of the Supreme Council for Antiquities in Egypt, particularly its Secretary General Zahi Hawass, and the Society and all its field workers would like to extend warmest thanks to them. Thanks must also be expressed to the Director General of Foreign and Egyptian Missions Magdi el-Ghandour, to the staff of the security office in Abbassiya and to the regional inspectorates, all of whom have provided generous assistance. The Society is also grateful for the constant facilitating efforts of Rawya Ismail in the Cairo office of the EES.

### **The Delta Survey, 2002**

WORK continued on collecting information about and surveying sites in the western and central areas of the Delta (fig. 1). The team of Penelope Wilson (field director), Richard Morley (surveyor), Elizabeth Cook and Derek Pretious (surveying assistants) and Mohammed Abdul Rahman Hamed (SCA representative) worked from 6 to 25 September 2002.<sup>1</sup>

#### *Topographical Surveys*

*Tell Qabrit* (Lat. 31°13'30"N, Long. 30°35'50"E)

Preliminary notes by A. J. Spencer, 'Roman Sites in the Northwest Delta', in U. Luft (ed.), *The Intellectual Heritage of Egypt* (Studia Aegyptiaca 14; Budapest, 1992), 536.

This small, red-coloured *tell* (fig. 2) is situated in Kafr el-Sheikh province, north-west of Tell Farain and to the east of the small village of Qabrit. There is no concentrated modern settlement around the site, but it is bordered on the south by the road and on the other sides by fields. Some of the border areas are used as crop drying or temporary storage areas by farmers. The *tell* has no cover except for small patches of brush, and the soil is either red in hue or, in places, grey. There is a reasonable amount of degraded

<sup>1</sup> The work was greatly facilitated by the police and guards at Sa el-Hagar and all the sites, by Senne el-Bish and by Rawya Ismail in Cairo. Thanks are due to Roger Dickinson for help with the mapping.

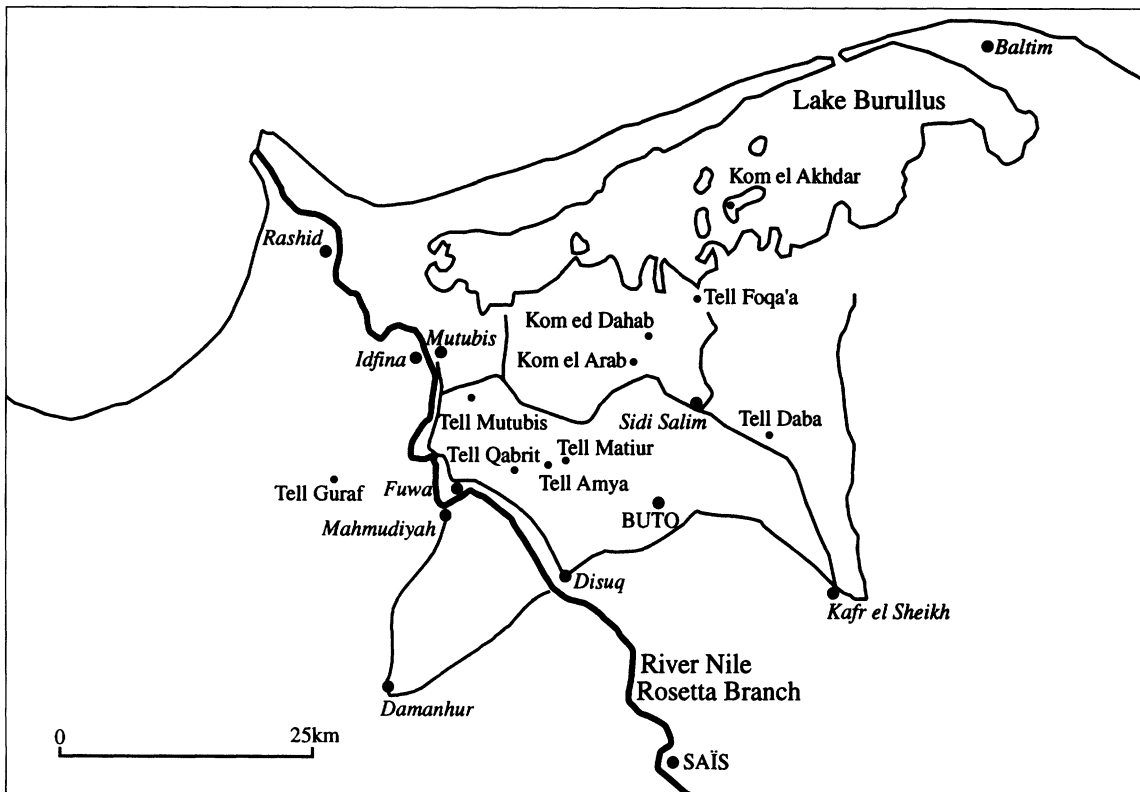


FIG. 1. Area of the Delta Survey, 2002.

pottery, glass and red-brick on the surface, but the *tell* is not densely covered. The dry surface dust is about 20 cm deep and can be scraped away to the damper, more compact soil. In the early morning (and possibly after rain) building patterns can be seen on the surface, mostly occurring in the form of small square structures.

The *tell* is quite low, about 5.5 m in total from its lowest to highest point, but it stands no more than 4.1 m up from the ground level at the site. The dimensions are 875 m (east-west) by 757 m (north-south). The eastern to southern sides of the *tell* are relatively level on the top, descending to the edges in a gentle slope. There are some larger rain gullies running from the top to the edges, and a track goes through the site from east to west. The northern and western sides of Tell Qabrit are more uneven and undulate in a series of small hillocks and mounds. A few of the mounds towards the centre of the site form the highest points of the *tell* and one was used to fix the siting point for the survey ( $X=0$ ,  $Y=0$ ). This 0,0 point is now marked with a permanent iron survey marker. The shape of the *tell* may be due, in part, to wind erosion, with the wind blowing from north to south creating the smoother southern tail-back of the *tell*. It was difficult to discern any pattern to the hills, though some of the modern tracks may indicate more substantial walls beneath the surface.

Some excavations have been carried out at the site by the SCA, including exposure of a series of Late Antique buildings to the south (in 2000) and a red-brick church building in the central area (in 2001). The more pitted areas suggest that there has been some *sebakh* digging on the site and the flatter section to the north-east may be the

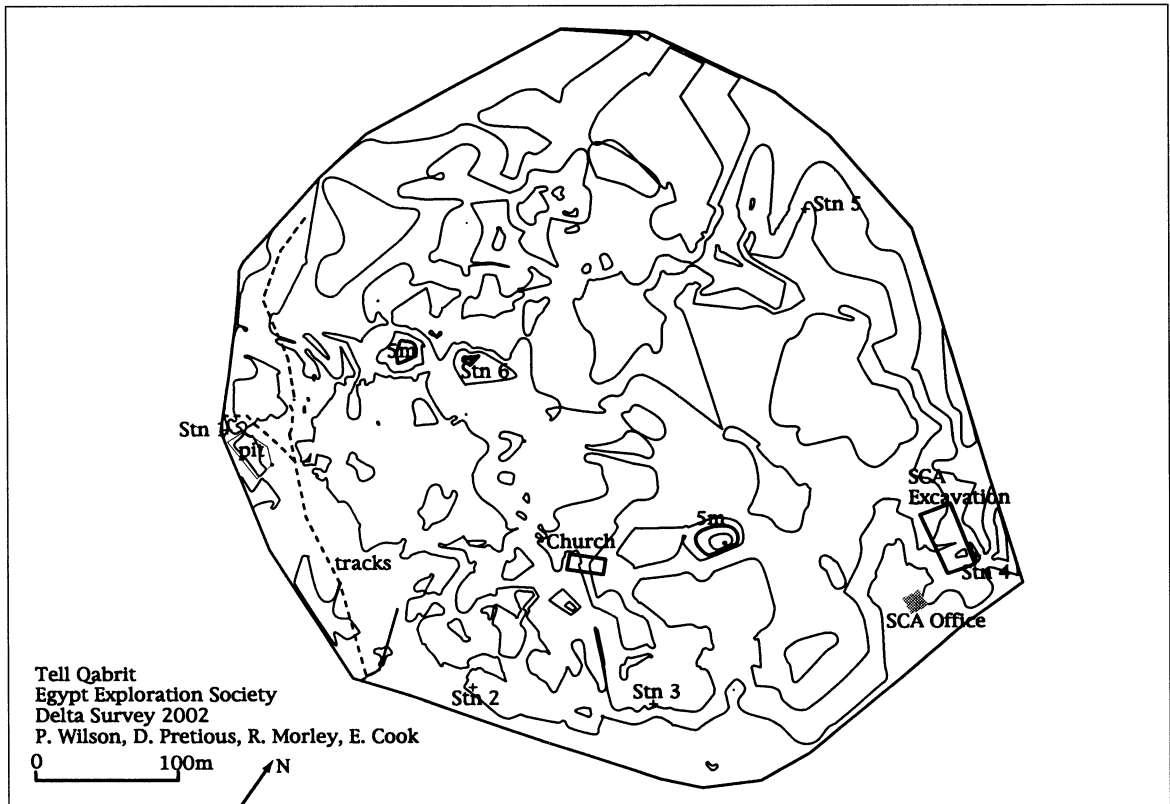


FIG. 2. Tell Qabrit.

remnants of a light railway embankment, perhaps suggesting that *sebakh* was once mined here on a larger scale.

The church building (pl. I, 1) was associated with pottery of the fourth to seventh centuries. The surviving walls measure 26.5 m from east to west and 12.1 m from north to south and were about 1.05 m thick. They are preserved to a height of 65 cm. The church is made from at least two consignments of different sized red-bricks and had a rectangular outline oriented east-west. It had a font in the centre (originally marble faced and lined), but the apse end had been completely robbed out. The building had limestone paving at the west end and possibly marble paving at the east end, though this had largely been removed. The walls of the church were originally plastered and founded upon layers of crushed limestone chips and earlier pottery. Among the debris a block with a few hieroglyphs in raised relief was found, suggesting that a pharaonic site nearby may have provided much of the stone building material, or indeed, that there was a pharaonic part to this site.<sup>2</sup>

Seven red granite grinding stones were found on the surface, probably having been uncovered during the *sebakh* digging and left there as they were too heavy to take away. One limestone block was also noted.

Recent work for a new pipeline at the eastern side of the site gave an opportunity to look at the material from the trench. Again, the pottery is consistent with the fourth to

<sup>2</sup> Other hieroglyphic blocks have been reported from here, according to A. J. Spencer (personal communication).

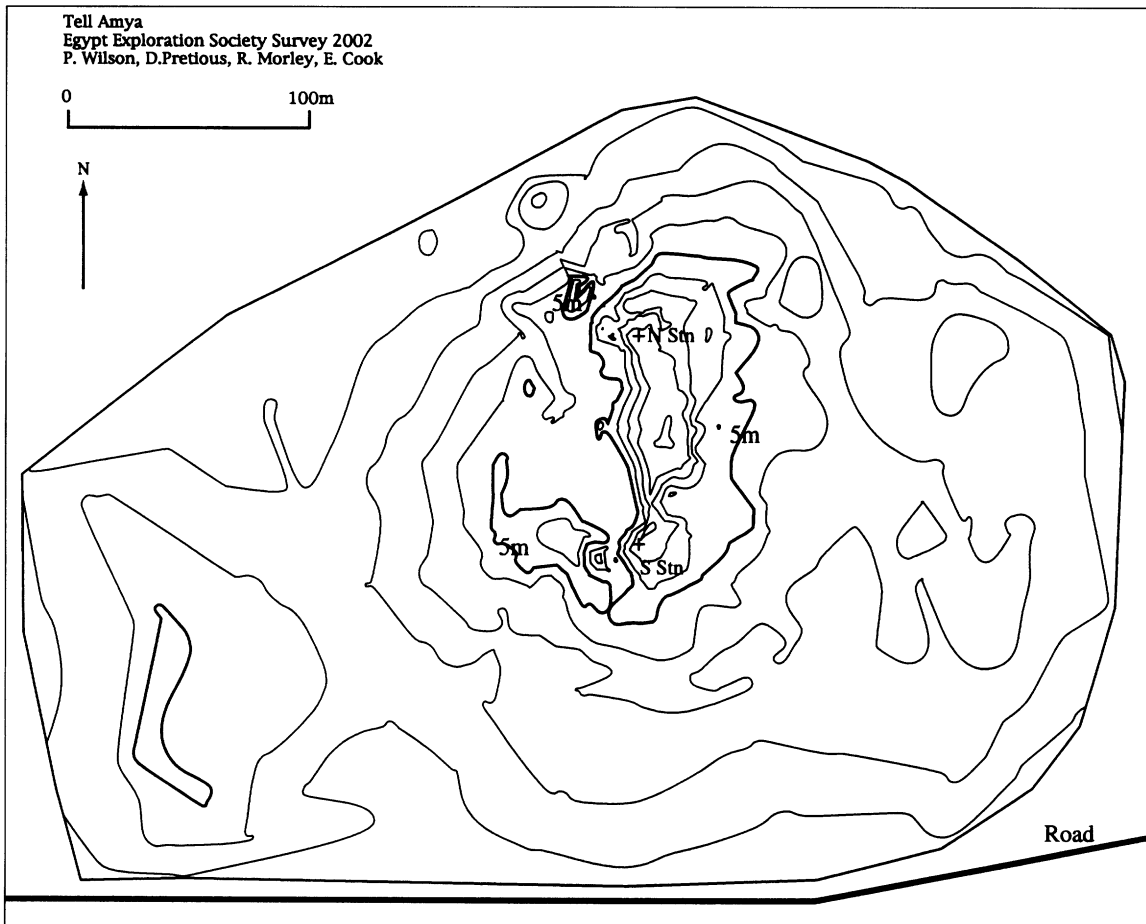


FIG. 3. Tell Amya.

seventh century date and included Palestinian bag-shaped amphora fragments, some red slip ware (thoroughly degraded) and white painted wares.

*Tell Amya* (Lat.  $31^{\circ}13'40''$ N, Long.  $30^{\circ}38'00''$ E)

Notes by Spencer, in Luft (ed.), *The Intellectual Heritage of Egypt*, 535-6.

This *tell* (fig. 3) is smaller than Tell Qabrit, being 460 m by 320 m in size and reaching a height of around 8 m to the highest point from the surrounding ground surface (pl. I, 2). There is a high central ridge running north to south across the site, apparently the remains of a former *tell* left thus by *sebakhin* diggers. The whole site has suffered the depredations of digging. It seems to have been cleared away by a workforce some time in the past, starting from the east and west and working towards the central area, where it stopped, leaving the present ridge. The sides of this ridge show that some small-scale digging is still happening here, and a number of pits of about 1.5 to 2 m in depth with sacks left at the site suggest that limited removal of *sebakh* or pottery is continuing. The holes left by the digging gave an opportunity to look at the stratigraphy of the site. There was pottery in the sections but not in dense concentrations. There did not seem to be obvious brick features and no signs of burning were noted.

The lack of structures uncovered in these diggings suggests that the archaeological strata of the site have been too extensively disturbed, at least at the present surface level, to be able to determine whether there are any building features. Experience suggests that even in the most difficult cases, the removal of rubbish at the top level, sometimes to some depth, will lead to the uncovering of some kinds of buildings or other structures. The amounts of red-brick at Tell Amya, the patches of grey mud-brick and the pottery strata suggest that structures did once stand here, but their nature cannot be determined by surface survey alone.

The pottery from the site is similar to that at Tell Qabrit, with similar ARS/Egyptian imitation wares, pottery with cream and brown paint stylised plant decoration, imported amphorae, 'carrot' amphorae, and a number of Nile silt-ware bowls or basins with either ribbing or pie crust rims. There is also a good quantity of glass at the site, but, in contrast to Qabrit, there is not the same amount of kiln or slag-like brick work (i.e. bricks which have virtually vitrified and smaller pieces of slag). A number of corroded bronze coins were found on the surface, varying in their state of preservation and ranging from about 0.5 cm in diameter to 2 cm. One large fragment of red granite had been uncovered by the *sebakh* diggers. It seems to be an unfinished grindstone, still with roughly cut surfaces.

Tell Amya has less obvious archaeological potential than Qabrit but it clearly forms one of a series of Byzantine sites in this area at which occupation may have ended around the same time. The fact that they form an east–west line, maybe aligning with sites in a north–south formation towards Lake Burullus, may indicate a road or river channel system, now lost. A further regional study may suggest reasons for the existence of the sites in the first place and then for their subsequent abandonment, destruction and demise, with people moving off into other newer towns along the Rosetta Branch of the Nile in the medieval period.

*Tell Matiur* (Lat. 31°13'50"N, Long. 30°39'05"E)

This site was visited as it formed the most westward of this small chain of sites. From the surface pottery, it dates from the Byzantine Period, during the tenth century.<sup>3</sup> The site is 432 m from south-west to north-east and around 280 m from north to south, rising to about 6–8 m above the local ground level. A number of circular brick granaries or storage chambers have been excavated here by the SCA. The site is now almost exhausted, having had very many small test sondages dug here by the SCA. It will become the municipal rubbish dump for Disuq.

*Tell Mutubis* (Lat. 31°17'13"N, Long. 30°33'33"E)

Following the mapping work undertaken in 2001 by the Delta Survey, the opportunity was taken to recheck some measurements and to carry out four drill augurs at the site.<sup>4</sup> The results of the drill cores suggest that the present *tell* demonstrates the continuous occupation of this site from perhaps the late Ptolemaic Period to Byzantine times, maybe

<sup>3</sup> P. Ballet and T. Von der Way, 'Exploration archéologique de Bouto et de sa région (époques romaine et byzantine)', *MDAIK* 49 (1993), 9–12.

<sup>4</sup> P. Wilson, 'Tell Mutubis, 2001', *JEA* 87 (2001), 7–8; see also photographs and notes by A. J. and P. Spencer, 'The EES Delta Survey', *Egyptian Archaeology* 16 (Spring 2000), 25–7.

from the first century BC to around the ninth century AD. Much of this city was founded on clean alluvium (flood deposited sediment) and also, perhaps, on drained marsh areas. On the eastern side of the *tell*, the existence of cultural material such as pottery to a depth of nearly 4 m suggested that there had been an older settlement at this side of the current *tell* and that the Roman town had grown from it. Clearly further work would be needed to determine the extent of this area and its date in relation to the rest of the *tell*. Tell Mutubis, then, may have an older history than is at first apparent.

### *Tells Visited*

Visits were paid to a small number of other sites and information collected about others. As can be seen below, the modern Survey of Egypt maps prove to have incorrect names for the sites or none at all, and many sites have been lost since the earlier Survey of Egypt maps.

*Kom el-Akhdar* (Lat. 31°26'55"N, Long. 30°49'47"E)

This is a large *tell* inside Lake Burullus, marked on the Survey of Egypt maps as Gezira Kom el-Akhdar. The *tell* has a narrow rectangular shape and a number of small inlets and harbours which allow boats to pass through the reeds and moor. Our mooring point was formed by a number of large limestone blocks, possibly constituting a low wall. The surface of the *tell* is sandy and in places is covered with low-growing shrubs, but it rises to a series of connected low mounds in the centre. There seem to be sandy mud-brick walls from buildings at the tops of these mounds. There is degraded pottery lying on the surface, buried in the sand and in the mud-brick areas. Among the pot sherds were amphora body sherds, including imported orange wares with cream/olive slip and a few red slipped and polished finer wares. There were also glass fragments and some fragments of burnt brick. Although the *tell* is an island, it is used to pasture cattle, and a small onion-like plant is also grown here and collected for medicinal purposes. Some small-scale digging has taken place and a large circular storage bin of pottery had been uncovered. The surface material is not dense and the meagre remains extend mainly over the high parts of the island, as far as could be judged.

*Tell Foqaa* (Lat. 31°22'7"N, Long. 30°46'59"E)

The site is marked on the modern Survey of Egypt map, but not named. The *tell* is inaccessible by road as it is surrounded by fish farms with banks built up into dykes along which the footpaths run. The *tell* is large in size, rising smoothly to a central high point containing an iron survey marker (a second marker is on the eastern side). To the north-east, there is a more hilly area on the sides of which some house plans are visible. The surface has no plant cover, but instead, the soil is coloured red by the degraded pottery and red-brick at the site. As the area is not often visited, the differences in soil texture can be seen by simply walking across the *tell*. In some places it is very soft and in other much firmer, perhaps where there are underlying structures. The surface material includes pottery such as some ribbed amphorae, ARS/ERS, glass, burnt red-brick and slag, all quite eroded and degraded.



The site seemed to be Roman in date and relatively unaffected by *sebakhin* digging. It could be threatened by further exploitation of the fish farms.

*Tell Guraf (Beheira Province)* (Lat. 31°12'52"N, Long. 30°25'5"E)

The modern Survey of Egypt map labels this impressive *tell* as Tell Kafri. It rises to a series of high points of which the greatest is about 15 m above ground level. The main central mound and the smaller western mound both show building plans and, in some places, the surface has either been cleared or eroded to reveal small rectangular red-brick foundation structures. At least three of these were seen on this visit and they are assumed to be foundations because of their regular size over the different parts of the site. The *tell* is red in colour and covered in pottery, glass and brick dating to the Roman and Late Antique Periods. On the southern and northern sides are a number of gullies made by rainwater from which larger fragments of pottery could be extracted.

*Qasr Mahmudiyah (Beheira Province)*

This site was marked on the Survey of Egypt map as lying south of town of Mahmudiyah. The site of this *qasr* (fort) took some time to find because the land is now occupied by new buildings, including a school and some fields. The area had been flattened and there was no sign of a *tell*. Local residents confirmed that it had been an antiquities area but was no longer so.

*Tell el-Daba* (Lat. 31°15'5"N, Lat. 30°51'38"E)

The site is not marked on the current Survey of Egypt map. The *tell* had been occupied by a petroleum company rig, but this has now been removed and only the concrete bases for some of its buildings remain. The northern edge of the site was being used as a soil dump, though it was not clear if the soil there is from this *tell* or elsewhere. There was a large depression on the north-eastern side of the site which looked like an old *sebakh* excavation. Across the centre of the site was a whole series of small mounds, no more than 4 m maximum above the basic ground level. The *tell* measures approximately 400 m (east–west) by 300 m (north–south). On the south-west side there was a series of brick chambers, with arched doorways and vaulted ceilings. Otherwise there was comparatively little to see on the surface except for degraded burnt brick and pottery of Roman date.

*Kom el-Arab* (Lat. 31°18'59"N, Long. 30°43'20"E)

The Survey of Egypt map names this site incorrectly as Tell Kafri. This was a compact *tell*, rising to at least 10 m above the ground level. Its south side was smooth sloping to the summit of the mound and the north side was steeper in slope. A petroleum company had also been based at this site and left a road running north–south on the east side of the site. A football pitch now occupies the southern side of the *tell*. Three granite grinding stones were noted, along with Roman–Late Antique pottery and glass, a few corroded bronze coins and some fossil wood. It was noticed that this material was more obvious on the northern side, and some small holes had recently been dug here.

*Tell ed-Dahab* (Lat 31°20'14"N, Long. 30°44'17"E) (pl. I, 3)

This site was visited because it seems to be one in a north–south chain of sites, perhaps along the line of a silted-up river channel. In fact, there is an *ezbet* here called Ezbet Kom ed-Dahab and the houses here probably also occupy a former *kom*. The antiquities area of the *kom* is under the cemetery of the hamlet and extends for about 150 m north–south and 60 m east–west. There is little archaeological material to be seen on the surface, as the debris from the older tombs is scattered on the ground. A survey marker (iron rail) is situated to the west; this is an area which could be tested with drill cores.

Future work for the Delta Survey will concentrate on the other Roman–Late Antique *tells* in the western and central Delta.

PENELOPE WILSON

## Memphis, 2002

### *Escarpment survey*

THE work of the escarpment survey began on 12 September 2002, the objectives being to continue and extend last year's work on the survey of the north Saqqara plateau and escarpment, and to open a limited area excavation at the foot of the escarpment to test the results of sediment cores taken and recorded in this area over the past ten years. The team was David Jeffreys (field director), Wendy Monkhouse (archaeologist), Mary Anne Murray (archaeobotanist) and Freya Sadarangani (archaeologist). The SCA was represented by Muhammad Ahmad Hassan Yusuf and we are very grateful for his able assistance and active interest.

The surveying programme for the season was completed, with one-kilometre ground markers inserted across the Sacred Animal Necropolis (SAN), the Early Dynastic cemetery, the north side of the Teti Pyramid and down the escarpment to this year's excavation site (described below). These ground markers correspond to the 1978 Ministry of Housing maps in use by most colleagues working at Saqqara. Each marker is accompanied by a distinctive ranging pole bearing the coordinates.

The purpose of this year's exposure was to test our past sediment-core data by examining the natural and man-made deposits under and around the north enclosure wall of the Hellenistic Anoubieion, which lies partly beneath the SCA Saqqara Inspectorate and descends the escarpment immediately to the east. A north–south trench was opened across the anticipated line of the wall, and the uppermost deposits (all modern) were removed. From the cadastral (land ownership) designations for the neighbouring area, Hod Hafiz (no. 27), we have given the excavation the site code HFZ02. The site in general lies just to the west of the boundary line between Hod Hafiz and Hod Faris (no. 22) to the north.

Although the Anoubieion wall was well preserved in this area when last seen by us during the EES Temple Town Survey in 1976, the ground form has since been altered by some twenty exploratory pits dug by the SCA in the 1990s to assess the area's archaeological potential in advance of substantial building (a police station for the

Saqqara Monuments Area Tourist Police and 'Camel Corps'). The more southerly of these pits, towards the present emplacement of the Sign Yusuf ('Joseph's Prison', a local shrine and an important place of pilgrimage in medieval times), are reported to have yielded limestone blocks, traces of mudbrick structures and other finds, but the more northerly were apparently empty of archaeological remains, probably because the two areas were respectively inside and outside the temple precinct. The result of this exploratory testing by the SCA has been a series of medium to large (10 × 10 m or larger) depressions, now filled with driftsand, with discard heaps on all sides. One of these pits is located directly over the line of the enclosure wall where last seen in 1976, and concentrated mudbrick debris can be seen on the spoil dumps on either side. Spoil from this pit, and others nearby, has also raised the ground level by about a metre at the point where we first proposed to excavate. Trench edges had to be reinforced with sandbags on three sides to allow excavation to continue.

In the confined area of this year's exposure, traces of detached Hellenistic brickwork were found at a depth of 3-4 m, along with moderate quantities of contemporary and later (early Islamic) ceramics including some diagnostic sherds, mostly rims, walls and handles. Although these finds occur within the familiar, yellow, coarse aeolian sands, they are found at remarkably consistent levels, and the earliest of them may well represent the ancient ground surface at the time of or shortly after the temple's abandonment in the first or second century AD. The wall clearly continued to collapse and erode into Islamic times; the Islamic sherds may further reflect the importance of the Sign Yusuf, only 200 m to the south, as a centre of pilgrimage.

These layers form tip lines down to the north from the standing brick wall, and become notably denser and steeper at the lower levels. The lowest such layer reached dipped to over 5 m below ground level; at this point, following strong overnight winds, the trench edges began to collapse and excavation was abandoned for this season for health and safety reasons on 2 October.

We feel that a positive start has been made to this phase of the survey, and that we now have a clear idea of the stratigraphic complexity and the scale of the logistical problems. In particular, we need to verify the observation of nearby sediment cores which suggest strongly that alluvial deposits formed very close to the escarpment before the first aeolian sand accumulations began, making the cliff face virtually sheer and especially dramatic. We have even suggested that the early designation 'White Wall(s)' for the town might be in reference not so much to an architectural feature as to the natural phenomenon of the light-coloured limestone cliffs which dominate both sides of the valley at this point. The intention is to continue and extend this exposure, using earth-moving equipment (with the permission of the Supreme Council for Antiquities) during 2003.

#### *Post-excavation analysis*

As well as being on hand to deal with plant remains from this year's excavation, Murray also continued to process archaeobotanical samples from the 1984-90 excavations at Kom Rabi'a (site code RAT). All thirty samples analysed this season date to the Middle Kingdom phase of the site, and will be published in the near future.

**Tell el-Amarna, 2003**

THE season ran between 27 February and 15 April 2003. The staff comprised Barry Kemp (field director), Paul Buckland, Alan Clapham, Ann Cornwell, Surésh Dhargalkar, Jane Faiers, Helen Fenwick, Rainer Gerisch, Pamela Haywood, Dimitri Labouri, John MacGinnis, Gwilym Owen, Gillian Pyke, Pamela Rose, Corinna Rossi, Christopher Stevens and Kristin Thompson. The SCA inspector was Khallaf Fathi Nagib. A number of separate projects were pursued, some involving survey or excavation on the site itself, others based on material in store at the expedition house. It is again a pleasure to report a substantial donation from the Amarna Research Foundation.

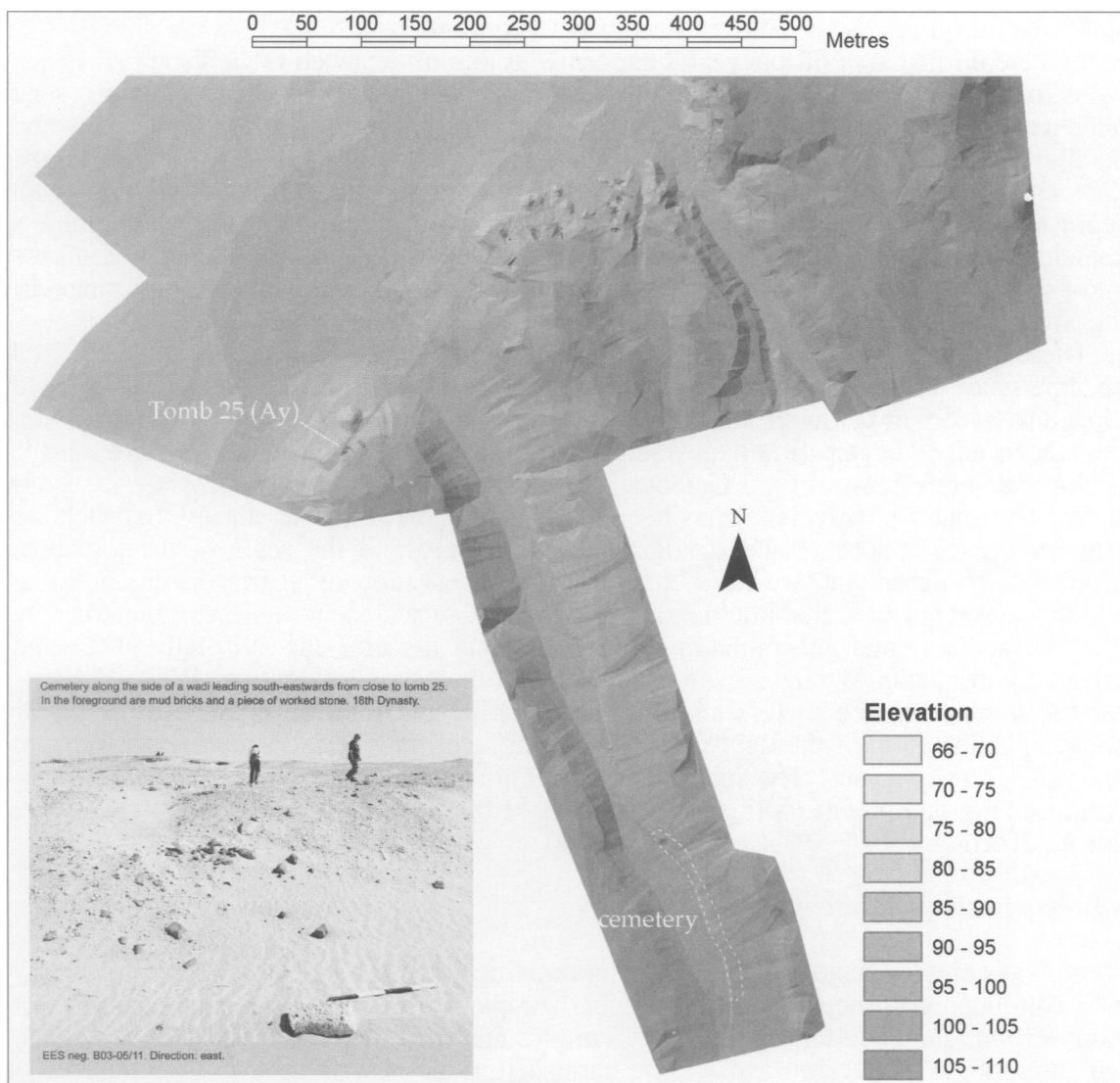


FIG. 1. Digital terrain model of the area behind rock tomb 25 of the South Tombs at Amarna, showing the location of the cemetery (created by H. Fenwick). The inset photograph is a view of the wadi side which has cut through the cemetery.

*Desert survey*

The GPS-based desert survey continued southwards from the Workmen's Village, concentrating on the area around the South Tombs. The position of each of the rock tombs was fixed within a contour map of the hills in which they are situated. The network of ancient roads which criss-cross the desert plain has, in this area, grown very faint as a result of weathering and much recent vehicle use. Nevertheless traces of both systems of roads—those from the city to the tombs and those running north–south—were noted and included in the maps. The close attention paid to the desert surface in front of the tombs revealed scatters of human bones. They mainly lie to the north of the modern road leading to tomb 25, but also occur for a short distance to the south. Amongst the bone fragments are a few weathered sherds. To the north of the road these are primarily of the New Kingdom; to the south they seem mostly to be much later and might have been washed down from the Late Period sherd dumps outside tomb 25.

At least part of the northern scatter of bones and sherds has been washed across the plain from a narrow wadi which runs between tombs 24 and 25. The scatter continues up the floor of the wadi for a distance of around half a kilometre until the location of the original cemetery is reached (fig. 1). It lies on a low desert terrace above the wadi. Over the years it has been gradually washed away as the wadi has flooded. A strip of the cemetery nonetheless still survives and is marked by pits where robbers have been at work. At one point some loose mud-bricks were noted, as well as a piece of wooden plank and at least one worked stone block. Many eroded sherds lie on the surface, and on a brief visit two of the pottery experts (Pamela Rose and Gillian Pyke) dated them to the Eighteenth Dynasty (probably the Amarna Period). They commented that there is a wider variety of vessels present than is the case with the northern cemeteries discovered in 2001, and that the collection as a whole perhaps points to burials of somewhat higher status. Sherds from amphorae occur, for example, which were not noted at the northern cemeteries. The position of the cemetery was added to the GPS survey and aerial photographs were taken with the aid of the expedition's small helium balloon.

*Old excavation dump beside the southern expedition house (South House Dump)*

The southern expedition house dates back to the early twentieth century and was used by the German expedition directed by Ludwig Borchardt and subsequently by the early seasons of the Egypt Exploration Society (those between 1921 and 1924). A small magazine for antiquities lay separately behind the house, of which only a small part of the southern end now remains standing. In 1992 it was discovered that when the EES ceased to use the house regularly in 1924, some of the contents of the magazine were buried in ground lying to the north. Further material was discovered in 2002. This year a larger surrounding area was examined to see if more remained.

The ground where most of the previous finds had been discovered lay within a walled courtyard which had contained circular granaries with sunken floors. This year the full extent of the courtyard wall was uncovered. It enclosed a space measuring 16.5 × 14.5 m. On the east side lay 3 circular granaries with an average diameter of 3.4 m; on the west lay 4 similar but slightly smaller granaries. All of them had been built with their brick floors sunk into the desert by about 50 cm. Many of the earlier

finds had been within the two northernmost of the granaries on the east side. This year a strip 6 m wide was cleared on the west side of the courtyard. This brought to light a large quantity of Eighteenth Dynasty sherds lying within the sand over the southernmost of the four western granaries, together with a small collection of human bones. None of the sherds, however, carried labels from the 1920s excavation and their value is therefore less than the pottery discovered last year, which formed part of the original 1920s type-series of vessels. Closer to the site of the old magazine a group of seven stamped jar sealings was found in a rubble layer close to the present surface of the ground. A few fragments without worked surfaces which belong to the broken black granodiorite statue of Akhenaten and Nefertiti which is being reassembled in the expedition house (see below) were also found in the vicinity. A few more were collected on ground to the east, behind where the magazine had stood. A strip of ground was also cleaned here but produced no further material.

### *House of Ranefer*

The investigation of Ranefer's house continued (supervised by John MacGinnis and Paul Buckland), uncovering more of the underlying house and also extending the excavation into the adjacent grounds on the north side (fig. 2). The deposits in several of the rooms of the upper house were removed to reveal the floors and walls of the lower house. Beneath the floor of Ranefer's outer hall (room 1) part of the northern external wall of the earlier house was located. In rooms 3 and 4/7 the outside eastern wall of the lower house was exposed, and a small area of well preserved mud-plastered ground from the outside courtyard. In room 5 the western outside wall of the lower house was exposed, and a larger area of the mud-plastered ground. This was interrupted by the sides of two circular granaries with slightly sunk floors which had been cut in two by Ranefer's later house wall. Also in room 5 the remains of the earlier house included an internal area of solid brickwork built against the outside wall. From its position it is likely that it is the foundations for a staircase to an upper floor. From what has now been recovered of the earlier house it looks as if it followed the plan of a smaller version of Ranefer's later house. This conclusion helps to explain groupings of bricks and marks on the mud-plaster also found beneath Ranefer's outer hall: they must belong to the outer end of an entrance staircase to the house, similar to the one later built by Ranefer further to the north.

The northern part of the earlier house itself lay over more deeply buried deposits which must fill a large hole dug into the desert when the site first came to be occupied. This hole extends for an unknown distance to the north, beyond the limit of the later house. As a first step in exploring this aspect, an area of courtyard on the north was cleaned of its covering of sand. This revealed that the courtyard had been paved with mud-bricks in its later phase. However, where a hole had later been dug a thick wall of an earlier period is exposed, running east-west. This could be the remains of the courtyard enclosure wall of the earlier house. If so, this might imply that the northern part of Ranefer's later courtyard was also built over ground belonging to another older house.

The earthy layers separating the two periods of building were sieved for the recovery of organic material as well as for small artefacts. The latter included another natural pebble bearing a short hieratic text, several small fragments of polished gypsum plaster

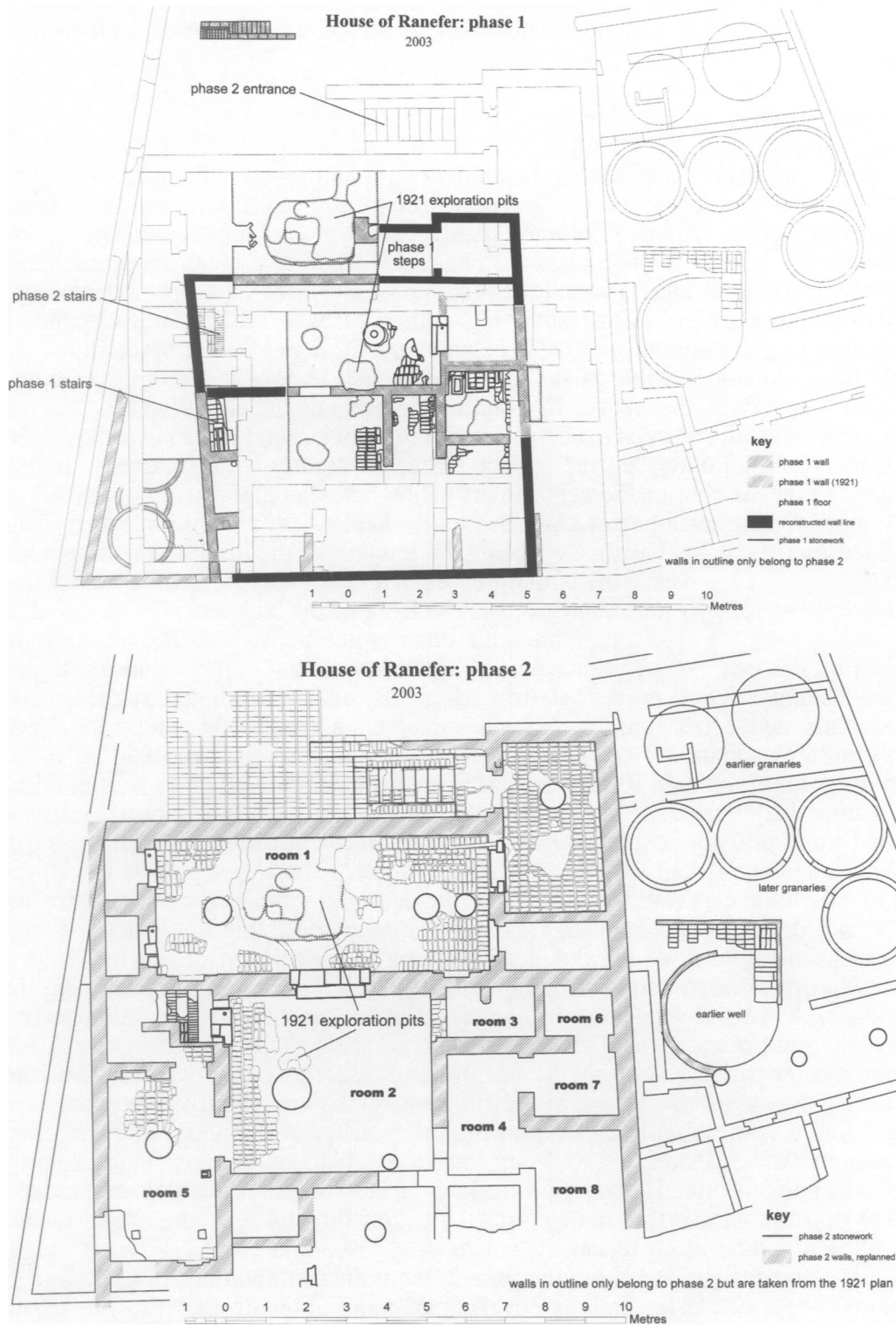


FIG. 2. Plans of the earlier and later phases of Ranefer's house.

also bearing hieratic, perhaps derived from the surface of a writing-board, and small pieces of vitrified clay which contain particles which seem to be derived from copper working.

### *The North Palace*

This year's work concentrated on the main central hall towards the back of the building which faced onto a large courtyard. The hall had been paved with mud-bricks and had been furnished with rows of columns standing on stone column bases. Only two of the bases survive, both in the north-east corner. They are of slightly different diameters and materials (limestone and sandstone) even though they are adjacent and belong to the same row. The positions of the remaining column bases were ascertained by the original excavators in the 1920s on the basis of patches of damage to the brick floor, some of which have remained visible as shallow rounded depressions in the cover of dust which has developed over the years. In contrast to normal ancient Egyptian practice, the column bases seem not to have been arranged in even parallel rows but to have consisted of an inner and an outer set, the former placed at slightly wider intervals, presumably indicating that the roof of the central part of the hall was higher.

As part of the development plan the central hall was completely cleaned during the 2003 season (pl. II, 1). The dust covering the remains of the brick floor was swept away to expose the places where the column bases had been, and the layer of earth covering a large expanse of gypsum foundations at the front of the hall was also removed and the gypsum swept clean. In common with other stone-built elements at Amarna, this foundation still bears many impressions of the lowest course of stone blocks, the original blocks having been removed shortly after the end of the Amarna Period. Such foundations and block impressions are precious evidence for the design of stone architecture at Amarna. Here at the North Palace a stone platform had been built out from the front of the hall. Ramps or staircases had evidently led up to it from both sides, and a third had started its ascent actually within the hall itself. The presence of this internal ramp probably explains the unusual arrangement of the columns.

When the central hall was first excavated in 1923 the lower part of a wall-painting was found on the east wall to the north of the central doorway. It preserved the feet and legs of a procession of human figures above a dado consisting of vertical painted lines and formal plant designs. All that survives now are small portions of the dado, which have been protected by sand banked against them. In order to photograph them the sand was removed. This revealed also patches of paint on a narrow strip of mud plaster which covers the mud-brick floor. This seems to be an accidentally preserved area of a layer of mud plaster which had originally been spread over the entire floor but has otherwise been eroded away. The surface of the flooring bricks was slightly irregular. They had been covered with a thin layer of mud plaster enriched with chopped straw, often only 2 mm in thickness, increasing to 4 mm, but in one place thinning to nothing so that the paint was applied directly to the protruding surface of small pebbles embedded in the bricks. In a few places this floor-plaster still joins directly with the much thicker mud wall-plaster, which often reaches 2 cm in thickness. Traces of yellow and blue paint from the floor design run across the join at one point. At another point the wall-plaster overlaps the floor-plaster and its covering of paint showing that the floor had been painted before the wall was plastered. The wall-plaster itself had been spread not



directly over the bricks of the wall but over a thin layer of gypsum plaster. One place was preserved where it can be seen that this white underlay had also been applied over a small area where the coloured floor paint had risen for a few millimetres up the wall.

The floor paint was in a poor powdery condition and rarely present in more than small spots. It nevertheless survives in this condition over a length of 5.50 m, representing the greater part of the distance between the north-east corner of the hall and the edge of the large central doorway. A few spots (yellow and red) are preserved at between 12.85 and 13.30 m from the north-east corner, along the edge of the wall to the south of the central doorway, where erosion has been more severe. It is thus reasonable to conclude that the floor-painting was continuous along the whole east side of the hall. The colours used were yellow, red, orange, blue, turquoise, black and a dark green. Yellow was the colour most frequently present, probably because it was used as a base colour over which other colours were painted. This was visibly the case wherever red was used, probably the second most common colour. The best preserved part was a patch of dark green measuring about 10 × 3 cm on which small red spots had been painted. Otherwise no individual design could be made out, and in particular, no trace was visible of black outlining to design elements.

This narrow strip of largely eroded floor-painting is a significant addition to our knowledge of the finished appearance of Amarna palaces. Hitherto the principal evidence for floor decoration has been the rare cases of painted gypsum surfaces. With these the painted designs were added to a thick layer of gypsum plaster which is more resistant to decay and destruction and therefore leaves more positive traces in the archaeological record. Previous excavators reported finding only three groups in position. Two were in the eastern wing of the Great Palace: the throne-room complex of the 'North Harim' (the fragments of which form an exhibit in the Egyptian Museum, Cairo), and rooms to the south of it and in the 'South Harim'; the third was in one of the buildings in the Maru-Aten enclosure. In recent years three further instances have come to light in other buildings, but all reduced to small loose fragments. These are: (a) the King's House: fragments picked from Pendlebury's spoil-heap adjacent to the central columned hall.<sup>1</sup> The most likely source is one or more of the halls themselves, but the interior of this building has not been re-examined by us; (b) the Great Palace, the southern building O42.2: a small number of fragments were discovered in 1996 associated with an early phase of the palace which was destroyed to its foundations to make way for the Smenkhkara Hall; (c) the South Pavilion at Kom el-Nana: a quantity of fragments was found along with a deposit of rubbish (mostly pottery) which had been used as filling-material for a sunken garden. It is still not clear whether this debris was thrown in during or after the Amarna Period. It is noteworthy that no trace of a painted gypsum floor has been found at the North Palace.

It is unlikely that in palaces and the houses of the elite the mud-brick floors of the interior rooms were left unpainted. In the absence of evidence to the contrary, plain white is the safest suggestion. Occasionally some of the whitewash has remained, as in the case of the building MIV at Maru-Aten where in at least one room (the bedroom), so we are told by the excavators, the floor had been simply whitewashed.<sup>2</sup> In one of the better preserved of the large Amarna private houses, that belonging to the vizier Nakht,

<sup>1</sup> F. Weatherhead, 'Wall-Paintings from the King's House at Amarna', *JEA* 81 (1995), 104-6.

<sup>2</sup> T. E. Peet and C. L. Woolley, *The City of Akhenaten*, I (MEES 38; London, 1923), 116 (hereafter *COA I*).

the excavators reported that the floors had been whitewashed, but the intriguing observation was also made that one of the floors (they do not say which one) had subsequently been replastered with mud and ‘had been painted in bright colours, of which only traces of red and yellow remained’.<sup>3</sup> In another house, R44.1, there was evidence of several layers of paint on the floor, at least one of which was blue.<sup>4</sup> The new evidence from the North Palace opens up the likelihood that decorative painting on a suitably prepared mud surface over a mud-brick floor was an option that could be taken up in palaces, as well as in the houses of the elite. This helps to fill an otherwise awkward gap in our knowledge of decorative schemes, especially at the North Palace where so far it has seemed that, in contrast to the richness of the wall paintings, no decoration was applied to floors.

What those decorative schemes might have been remains, however, quite uncertain. Apart from the comments quoted in the last paragraph, our only knowledge of floor painting comes from the well known gypsum palace floors. Both those from the Great Palace and those from Maru-Aten were surrounded by a narrow band of plain yellow paint.<sup>5</sup> The newly discovered traces at the North Palace seem to represent an initial covering of yellow paint with other colours painted over it. One possibility is that the other colours do not belong to the original scheme but signal a later repainting. In this case the yellow could represent the same plain edge band to areas of design that lay further out into the floor and are now wholly lost. The best guess is that the latter resembled the plant, animal and pond life of the gypsum floors. That would still leave the multi-coloured repainting as something quite different, though the quotation in the last paragraph concerning the house of the vizier Nakht suggests that this example was not unique. The best preserved area at the North Palace, as already noted, consisted of irregular red spots on a dark green background but not far away were larger continuous patches of both black and red. So narrow is the strip that has survived, however, that these could also have belonged only to an edging to the main designs, now lost, rather than have been representative of a more abstract kind of design which covered the whole floor.

The main aim of the 2003 season was to carry out limited restoration of the central hall. Once the floor had been cleaned and photographed from the air (using a low-level helium-filled balloon) the work began of marking the positions of the missing column bases with circular pads of white cement cast from an iron mould. In total thirteen were completed, leaving seven to be done next year. On each of these pads a column base of the correct ancient dimensions will be cast next year from a newly made mould. Over the site of the gypsum foundation layer a thick bed of sand was laid down. This will provide the necessary foundation for the laying of a single course of limestone blocks next season, to the exact shape of the ancient masonry. The southern and eastern walls of the central hall have largely been eroded away. To help define the hall better they have been built up again for a few courses in new bricks made to the ancient size.

<sup>3</sup> COA I, 6.

<sup>4</sup> H. Frankfort (ed.), *The Mural Painting of el-Amarnah* (London, 1929), 56.

<sup>5</sup> W. M. F. Petrie, *Tell el Amarna* (London, 1894), 14, pl. ii; F. Weatherhead, ‘Painted Pavements in the Great Palace at Amarna’, *JEA* 78 (1992), 186, fig. 2; COA I, pls. xxxviii, xxxix.

### *Small Aten Temple*

The work of the season was a direct continuation of last year's, using one team of bricklayers and one team of stonemasons. On the south side of the first court a long section of the brick enclosure wall has seemed to be missing and has been used as a means of vehicle access to the temple. The line of the wall was cleared of sand at this point and a portion of the foundations of the wall, with two of its buttresses, was found to have survived. The desert slopes down slightly to the north, and to allow for this the courses of bricks which formed the foundations had also been stepped down, and what mostly survived was this lower step which is much narrower than the original full width of the wall. Once these remains had been planned and photographed, the line of the wall was built up for several courses in order to complete the visible sides of the enclosure and to close the gap. Further repairs were carried out to the north-west corner area of the enclosure wall.

The temple possessed three pairs of mud-brick pylons separated by unusually wide gateways. We know from our previous excavations that each of these gateways, and the pairs of small flanking gateways, were originally floored with stone on a gypsum foundation. None of the original stonework survives. In a plan to replace it with new stone blocks, as a way of defining the outlines of the temple more clearly and of marking the use of stone, the gateway between the first pair of pylons was completely floored with new limestone blocks cut to the ancient size and laid using white cement. The ancient gypsum layers showed traces of a raised central area which might have been the basis for a platform reached by ramps. The shape of the raised area was also reproduced in stone, at the level of a second course. Once this was completed a threshold of limestone blocks was also laid in the southern smaller gateway in the front wall of the temple enclosure.

### *Amarna statuary project*

The expedition has in store at Amarna a large number of fragments of statues of the Amarna Period. Most of them have been recovered from two dumps left by previous expeditions which we have for convenience labelled 'South House Dump' and 'North House Dump'. The former lies directly behind the current house used by the expedition; the latter is situated at some distance behind the ruins of the old Egypt Exploration Society house in the North City, opposite the North Riverside Palace. Considerable progress was made this year in sorting the material and finding matches within the substantial number of pieces that have emerged from both of these sources. In addition, geologist Pamela Haywood, who joined the team to study the types of stone among the querns discovered on the site, also helped to assign firm identifications to the material used in the sculpture fragments.

In the case of the South House Dump, during 2000 Kristin Thompson had found that 188 pieces of shattered dark-grey granodiorite all came from an unfinished, two-thirds life-size statue of Akhenaten and Nefertiti seated side by side. During that season she made over sixty joins, initiating a reconstruction of the statue that has continued over the subsequent two seasons, with a total of close to a hundred matches made so far. Although perhaps half of the statue's material is missing, the several large sections that have resulted from the reconstruction constitute the most extensively preserved statue with a firm provenance at Amarna.

In July 2002 Thompson visited the Ägyptisches Museum in Berlin in order to study the extensive collection of pieces excavated by Borchardt at Amarna and with the hope of finding evidence of the provenance of the South House Dump material in Borchardt's excavation diary. An entry in his diary for 13 December 1912 makes reference to 'black granite pieces' of an unfinished, two-thirds life-size, seated pair statue of the royal couple, found shattered into many pieces and lying in rooms 6, 10 and 12 of house P47.3, a small building at the rear of the sculptor Thutmose's workshop complex. Near the pieces Borchardt's team found a head of Nefertiti of the same material, also in an unfinished state. This well-known head was taken to Berlin in 1913 and is now exhibited under the inventory number 21358. Subsequently Dietrich Wildung, director of the Berlin Museum, kindly provided a cast of 21358 which could be taken to Amarna. Early in the 2003 season the cast of the head was compared with the original pieces. The break at the lower back of this head proved a perfect match for the break on the top piece of Nefertiti's back pillar. This proved that the granodiorite statue was indeed found by Borchardt's team and was a product of the Thutmose workshop. Further evidence turned up in the form of a large piece with a flat surface that had been picked up during a study of stone querns made in 1992 and kept in store among the querns at the site magazine. A small piece from the South House Dump fits it, and Delwen Samuel, who had conducted the quern survey, provided information that this piece had been picked up in the Thutmose complex. A brief investigation of the surface in that complex turned up an even larger piece of the base, as well as several unworked pieces of matrix and a small worked fragment which proved to be Akhenaten's right ankle and fits onto a substantial portion of the pair statue.

The South House Dump had also contained hundreds of fragments of variously coloured quartzite, travertine (alabaster) and other stones. Dimitri Laboury, of the Université de Liège, joined the expedition this season to study the statuary fragments. He added to information gathered by Thompson in Berlin, demonstrating that several other pieces from the dump relate to those in the Ägyptisches Museum. Thus the statuary material from this dump appears to consist in part or in whole of pieces from the Thutmose complex left behind by Borchardt as not of museum quality. Laboury and team member Corinna Rossi collaborated in creating a digital image of the statue's various sections joined and arranged to give a good sense of the two figures' original appearance (pl. II, 2). This image will also be of use in future work. The physical reconstruction of the statue will continue next season, along with an investigation of how the various large portions might be mounted for display.

The statuary fragments from the North House Dump near the north expedition house, used by the Egypt Exploration Society in the 1930s, have been recovered in stages. In 1981, after it was noticed that pieces were coming to the surface as a result of wind and rain erosion, a preliminary clearance was made of the visible pieces. All of these 210 statuary fragments, mostly in pink granite and quartzite, were sent in crates to the Egyptian Museum, where they remained in storage. Erosion then brought more pieces to the surface, and in 1992 these were retrieved and stored in the site magazine at Amarna. In 2001, when Thompson began the reconstruction of the granodiorite dyad, a request was made to the SCA and the Museum for the return of the original group of fragments, with a view toward possible matching within that material as well. Permission was granted, and two crates arrived at Amarna at the end of the 2002 season.

At the same time Thompson supervised a further one-day clearance of the North House Dump, resulting in the recovery of hundreds of additional pieces.

During the 2003 season the two crates of material from the Museum were unpacked, sorted and put into numbered trays for later registration. Almost immediately matches among pieces from the Egyptian Museum became apparent: between two pieces of quartzite representing what appears to be a Hathoric feather from the crown of a large-scale statue, and between two pieces of quartzite from a stretch of pleat-covered body surface. Further matches will undoubtedly occur in future seasons, when this material from the Museum can be compared with the many other pieces removed from the North House Dump. Near the end of this season, Thompson supervised a fourth clearance of the Dump, again resulting in hundreds of pink granite, quartzite, limestone and travertine pieces being added to those already in the magazine. Future seasons will be devoted to bringing the registration of these many recovered pieces—perhaps in the neighborhood of a thousand—to a conclusion and to looking for joins among them.

In general, the many statuary fragments from the two dumps, along with a much smaller number of pieces found during excavations in the Kom el-Nana enclosure, the Small Aten Temple and elsewhere, enormously expand the information on the statuary programme in the ancient city. The original provenance of these pieces is now remarkably well understood, given that they came from dumps. The South House Dump primarily represents unfinished pieces from the Thutmose workshop. The North House Dump apparently consisted in large part or in whole of pieces excavated by John Pendlebury's expedition during the 1934–5 and 1935–6 seasons. Numerous labelled ostraca buried along with the statuary all indicate a provenance in the Palace, and several of the stone pieces are marked 'PAL' in ink, an abbreviation for the Great Palace. (The quartzite, travertine and granite pieces have no labels of any kind.) In conjunction with this work, Thompson is also studying statuary fragments from Amarna held in museums throughout the world. The end result should be a much clearer picture of what types of statues were created and displayed in the buildings of the ancient city.

### *Pottery study*

The main direction of this season's Eighteenth Dynasty pottery study was the completion of the Amarna pottery corpus, by taking in the many vessels from the 1920s excavations which were found last year buried beside the expedition house. They had been broken, necessitating much work of restoration (Ann Cornwell), and have required photography (G. Owen) and new drawings (Pamela Rose and Gillian Eastwood). The total of vessels so added amounts to about two hundred. Additional recording of the Late Roman pottery from Kom el-Nana was completed, ready for the second volume of the Late Roman pottery corpus (the first volume is in press).

### *Coptic wall plaster*

This season saw the completion of the analysis by Gillian Pyke of the many fragments of painted wall-plaster recovered during the excavation in 2000 of the eastern end of the church at the monastic site at Kom el-Nana. More joins were made to the groups created during study in the 2002 season, including matching a head to an upper body, and adding a third figure to the largest group. This section of plaster is now around 1.3 m

long, and consists of three male figures, from left to right wearing green, pink and gold cloaks. The last of these figures has two scratched graffiti on his cloak and tunic. Further inscribed fragments were added to a second gold-cloaked figure, while more green cloak was added to a poorly represented figure standing next to another gold-cloaked figure holding a key. In Coptic iconography, the key is associated with St Peter. More joins were made to the very fragmentary white-cloaked figure (perhaps of Christ) associated with a green wheel that possibly belongs to a chariot.

Characteristics of the painting style and colours on each figure were used to suggest relationships between groups where no further joins were possible. The gold-cloaked figure with the graffiti, of which the lower cloak and tunic above the hem are preserved, was matched to a right arm raised in benediction on the basis of the use of red as well as black on the cuff of the sleeve and the tunic. Additional fragments attributed to this figure included a left shoulder and parts of the lower left side of the cloak, including an additional graffiti, and a scroll. The head and upper body of a green-cloaked figure and upraised arm of a pink-cloaked figure probably belong with the left and central figures of the large group on the basis of painting techniques and colours.

Fragments of inscribed labels positioned between the feet of the figures have been identified. One of these, associated with a gold-cloaked figure, reads 'Andreas' (St Andrew). Another inscription, located between the feet of the green-cloaked figure in the group of three, has been tentatively read as 'Joanis' (St John) and the fragmentary inscription between the feet of the pink-cloaked figure next to him might be read 'Jakobos' (St James). Another inscription, similarly placed, ends '...eos' (St Bartholemew, St Matthew or St Thaddaeus?). These inscriptions and the presence of a key suggesting that St Peter is also represented all suggest that these figures are the twelve Apostles, who are often shown flanking the Virgin Mary. Although no clear indications of the presence of this figure have been found, fragments of what might be a dark red cloak, usually worn by the Virgin Mary in Coptic art, are present, though no joins have been made between them. On the basis of these new pieces of evidence, it can be suggested that the scenes in the apse of the church consist of the twelve Apostles, perhaps flanking the Virgin Mary, with the figure of Christ in a chariot above.

The large groups of fragments were cleaned with distilled water, consolidated using Paraloid B72 and glued together in sections with Primal (Rhopolex) SY27C (B60A). The colours used in each group were recorded using a Pantone colour chart, giving a colour palette for this area of the church. Each group was then recorded epigraphically using clear acetate, and photographed. Smaller identifiable fragments were also recorded in the same way. New trays were purchased for the permanent storage of the plaster, the larger fragments of which were bedded on clean sand to support the fragile pieces. The small fragments were also stored in trays, bedded in plastosote-foam cut to fit each group.

Two large boxes of wall plaster collected during the 1994 excavation season were also examined and an inventory made of the contents. These are from areas outside the church, chiefly the adjacent courtyard. Though the colours used are similar, there is little evidence that there are any figures represented. Several fragments appear to be decorated with floral motifs and there are pieces of two red inscriptions. These latter fragments were cleaned, consolidated and photographed. A full analysis of this plaster will be the subject of a future study season.

*Environmental material*

Further progress was made in the identification of specimens of plant material (C. Stevens and A. Clapham), of wood and shrub species from charcoal (R. Gerisch) and of insects (P. Buckland). The sieving of all deposits from Ranefer's house has added much material.

BARRY KEMP

**Qasr Ibrim, 2003**

THE Qasr Ibrim season this year comprised two parts: a study season, based in Shellal, which took place between 27 January and 23 March, and a brief period of fieldwork at the site between 6 and 14 February. The study season team consisted of the author, Alan Clapham, Peter French, Adrian England, Gillian Pyke, Andre Veldmeijer, Bridget Leach, and Hans-Werner Fischer-Elfert. The SCA inspector for the study season was Salwa Fuad Sherif, whose cheerful and willing assistance is gratefully acknowledged, as is the help provided by the Chief Inspector of Aswan, Mohi el-Din M. Ahmed. The fieldwork team consisted of Rose, Clapham, and conservators Eric Miller and David Singleton. The SCA was represented by Osama Abdel Latif and Hassan Abdel Moneim Mohammed (SCA conservator). Their assistance in difficult conditions is gratefully acknowledged. Thanks are also due to Peter Jones and the engineers of Skanska Cementation International Ltd, based in Toshka, who provided transportation to and from the site.

*Fieldwork*

The aim of the work at Qasr Ibrim was to remove a Twenty-fifth Dynasty wall-painting threatened by water percolation resulting from the high level of Lake Nasser. It was situated in a small mud-brick temple in the southern part of the site, first excavated in the early 1970s (fig. 1).<sup>1</sup> The temple consisted of a court in which were four inscribed stone columns, behind which was a centrally-placed sanctuary, surrounded by long thin chambers on three sides. Paintings were found on the north-west and north-east sanctuary walls, and in the north-western of the surrounding chambers was found a well-preserved wooden staircase. The discovery in 1995 of a number of large stone blocks decorated with figures of Taharqa in front of various gods suggests that the temple originally extended further south-westwards than now preserved, and had a decorated gateway or kiosk in this area.

The temple building remained in use over a long period. Although it seems to have been abandoned for some time after the Twenty-fifth Dynasty, as attested by the many holes in the sanctuary walls, some of which were clearly made by rodents at a time when the chamber was filled with rubbish, it was in sufficiently good condition by the period of Meroitic occupation to be restored and incorporated into the main Meroitic temple, perhaps as a side chapel. At this time the holes in the sanctuary walls were repaired by

<sup>1</sup> J. M. Plumley and W. Y. Adams, 'Qasr Ibrim, 1972', *JEA* 60 (1974), 228–36; J. M. Plumley, 'Qasr Ibrim, 1974', *JEA* 61 (1975), 19–20.

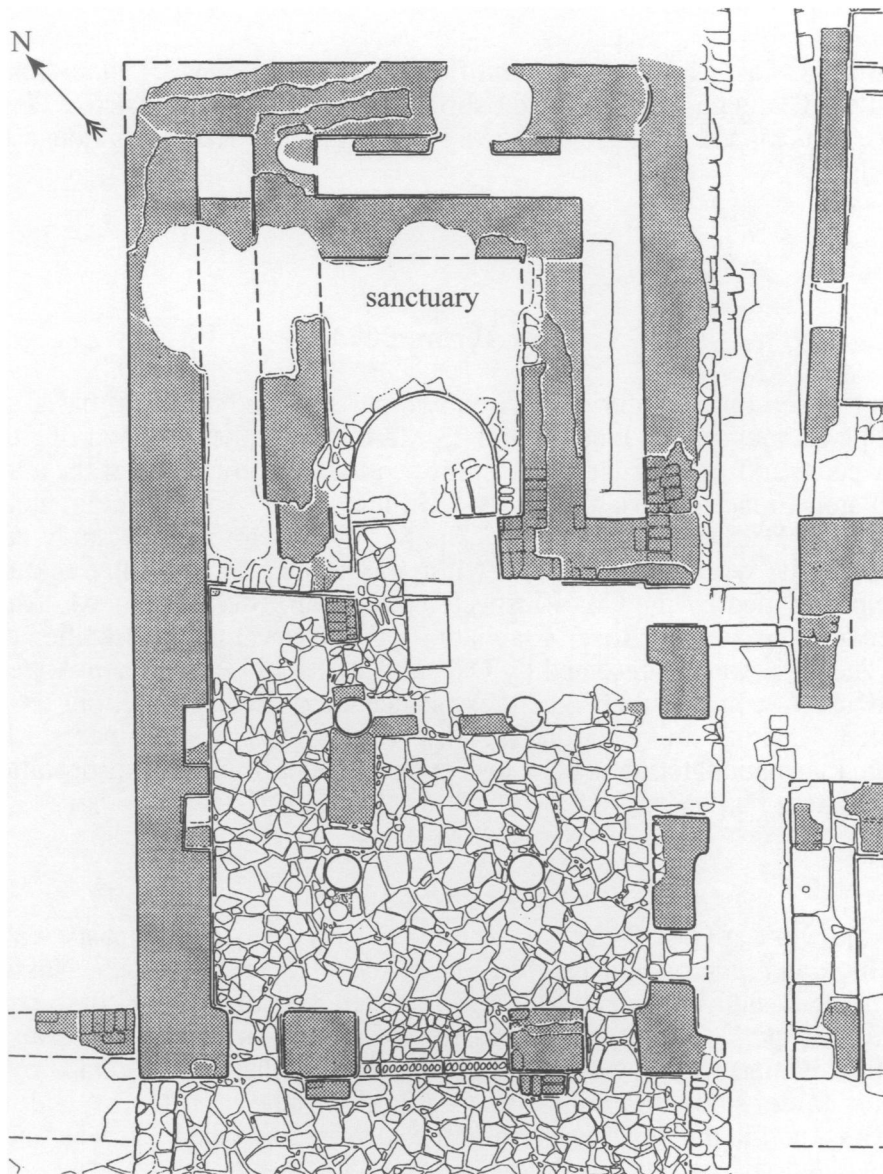


FIG. 1. Line drawing of the Taharqa temple.

filling the larger ones with stones set in straw-rich mud plaster, and the smaller ones just with plaster, and the walls were then given several coats of whitewash over time. The restoration can be dated by Meroitic graffiti scratched into the lowest coat of whitewash. At the same time, the staircase chamber behind the sanctuary went out of use, and was infilled with debris. Eventually the temple was converted into a church, and an apse was inserted into the front part of the sanctuary. The area behind it was infilled with debris, and it is to this that we owe the preservation of the chamber.

The 1972 and 1974 excavation seasons uncovered paintings on the north-east and north-west walls of the sanctuary. The south-east wall was in too poor a state for any



decoration to remain, and the putative south-east wall, with the entrance to the sanctuary, was removed when the apse was constructed. The paintings were executed on a coat of white paint over a layer of pink plaster, itself covering a layer of mud plaster coating the brickwork of the walls. The decoration, consisting on each wall of the pharaoh Taharqa, named in the inscriptions, before a god, was drafted in red, but there is no evidence for the use of a grid to lay out the design. The paint was applied directly to the surface, except on the limbs of the gods' figures. In these, the area representing the skin was slightly hollowed out and separately filled with a thicker deposit of pink plaster, on which the paint was then laid. The technique was clear from the way that the filler plaster had fallen away from some parts of the surface. It does not seem to represent a modification of the original design, and may perhaps be connected to the use of a thick, granular blue pigment for the god's skin, which from the way it has disappeared particularly from the figure on the north-east wall, does not adhere well to the surface.

The painting on the north-east wall was already much damaged when first discovered, but preserves parts of two figures, an anthropomorphic god facing right, and the king facing him (pl. III, 1). The published drawing of the painting was made before the painting was fully exposed,<sup>2</sup> but shows that behind the god (incorrectly identified in the caption as the king) were two columns of inscription and a chequered border. The full exposure of the wall, which is documented only in three colour slides, shows that the god must have had his left arm raised and extended towards the king's head. The king stands before the god, holding a baton in his left hand, and with his right arm slightly bent away from the body. Between the king and the god is an area of damage, but as it appears to include a cartouche, it is likely that there was an inscription between the figures, as on the north-west wall. Behind the king's figure there is room for another two columns of inscription and a border, but only very slight traces remain of the hieroglyphs in the first of these. Full clearance of the wall also exposed the base line on which the figures stood.

The painting on the north-west wall was better preserved, and shows Taharqa before a blue-bodied god, probably Amun (pl. III, 2).<sup>3</sup> Both figures have a single column of inscription behind them, and a chequered border defines the edge of the scene at the corner. The removal of the apse inserted into the sanctuary in the course of this year's work showed that the painting extended further to the south-west, beyond the area previously documented. The new area was particularly damaged and had been extensively repaired in the Meroitic Period, but sufficient traces are visible to make the presence of a further scene certain, although the interpretation is as yet unclear. A preliminary examination suggests that the scene included another figure with red flesh, facing the entrance to the sanctuary, and perhaps wearing a double crown.

Between the excavation seasons in 1998 and 2000, the north-east wall of the sanctuary was undermined by water action from the new high water level in Lake Nasser. It collapsed, and dissolved, along with much of the mud-brick architecture forming the rest of the temple. All that remained standing was the lower left-hand corner of the scene, preserving part of the border and the bottom of the two columns of inscription. The north-west sanctuary wall remained standing, but was clearly threatened if the water level should reach the same height again. In 2000, therefore, we

<sup>2</sup> Plumley and Adams, *JEA* 60, pl. xlix.1.

<sup>3</sup> Plumley, *JEA* 61, 20 and pl. xii.

re-cleared the surviving painting of its protective backfill, to establish its condition, and we found that the effects of water percolation were clearly visible as a darkened area extending to above the figures' knee-level. It was therefore decided to remove the painting from the site, and after some delays in obtaining the relevant permissions, the project was undertaken in February of this year. Fortunately, the painting had suffered little further damage in the meantime: the line marking the level of water percolation was a few centimetres higher, but otherwise it was intact.

Removal of the painting was a complex and uncomfortable procedure due to the conditions on site and the dangerous nature of the materials used, which necessitated wearing masks and gloves for much of the time. As a first step, the painting was given three coats of Cyclododecane wax dissolved in petroleum spirit. This consolidated the surface, penetrating a few millimetres into the backing plaster layers. Once this was done, a wooden frame the size of the painting (about two metres high by three metres wide) was fitted a short distance in front of the consolidated face. The frame was lined with alternating layers of foam strips and wooden battens, and as these were built up, polyurethane foam was cast into the gap between the battens and the face. Once set, this formed a protective layer bonding the consolidated surface to the frame.

The wall on which the painting was placed was then dismantled. This revealed some very well preserved examples of matting, made from halfa-grass culms bound together by a single row of palm-fibre string, which were laid between every fourth course of brickwork, on one of which layers was found a reed pen. Wall removal also showed that when the Meroites repaired the damage to the sanctuary, they deposited some small objects in the cavities along with the stones and mud plaster. These included gold-in-glass beads, a mould for a *wadjet*-eye amulet, and part of an iron ring shank with a stone or glass bezel, into which was carved a fine bearded head.

In the course of removing the wall, the upper part of the wooden staircase found in 1972 was re-exposed.<sup>4</sup> The stairs, 28 cm deep and 14–16 cm high, were made from mud-brick edged with reused, roughly squared, palm timbers, which made up the entire height of the riser and extended some 75 cm back into the chamber walls. Five steps were exposed in the current season's work, but the stairs certainly continue below the level reached, and when originally discovered ten steps were present. This lower area is now damp, and it is uncertain whether the steps will have survived. The walls of the stair chamber were coated with the same pink plaster as was found in the sanctuary, but were undecorated.

Once the wall was demolished, all that remained standing was a thin skin of consolidated material, consisting of the painted face and underlying plaster layers, attached to the wooden frame by the polyurethane foam. This was then laid flat, and wooden edges were added to the sides of the frame to build up a box into which further polyurethane foam could be cast to protect the back of the painting. Finally, the box was closed with a wooden lid.

The painting was removed from Qasr Ibrim to Toshka, the nearest road head, with the assistance of Skanska Cementation International Ltd., which company provided a tug boat with a built-in crane to lift the extremely heavy and unwieldy box off the island. It was taken by road back to the Nubian Museum in Aswan, and is now in store in the magazine there. Next year it is hoped that the expedition's conservators will return to the museum to begin to prepare the painting for future display.

<sup>4</sup> Plumley and Adams, *JEA* 60, 231 and pl. xlix.2.

*The study season*

The study season was based in SCA magazines in Shellal, where the expedition's finds and equipment are stored. It saw continued research on material from the 2000 excavation season, particularly pottery and archaeobotanical remains from Napatan and Meroitic levels, and further study of the cordage from the site.

A new project was the restoration and study of the Napatan papyrus fragments from Trench 23, also discovered in 2000. This project saw, firstly, the conservation and restoration of the fragments, undertaken by Bridget Leach of The British Museum. The pieces were, on the whole, in good condition, and little affected by damp, and it was possible to make a large number of joins between fragments. Leach notes that it is uncertain how many documents are preserved amongst the material. Usually, the individual sheets that join to make a papyrus roll occur approximately every 20 cm, and an overlap is visible on the surface. There are nine pieces with sheet joins visible on them amongst the Qasr Ibrim material. Three of the fragments are relatively large (15 × 15 cm, 12 × 15 cm and 12 × 10 cm), and it is likely that some of the smaller ones form part of the same joins, indicating that there are at least four separate sheets of papyrus present.

A preliminary study of the reconstructed texts was made by Hans-Werner Fischer-Elfert.<sup>5</sup> They are written in abnormal hieratic, in use from the late Twenty-fifth to the late Twenty-sixth Dynasty, and appear administrative in nature. They contain long lists of personal names with filiations back to the grandfather's generation. Many of the names are of Libyan origin, as is evidenced by the presence of such names as Masaharta and (Ankh)-Shishak amongst others. The purpose of the lists is not yet clear.

Fischer-Elfert also studied two joining pieces of text, which together make up a complete text of a magical nature.<sup>6</sup> The text is amuletic, and was composed for a woman called Naqa, born to Hatj. In it, several decans are called upon to extend their protection over the owner of the spell, and three vignettes, showing anthropomorphic figures with feline heads, two on the inside (the recto) and one on the outside (the verso), are intended to enforce the spell's efficacy. An interesting point is that the text contains some hitherto unattested phrases, which may represent local Nubian concepts.

PAMELA ROSE

<sup>5</sup> The following comments are taken from Professor Fischer-Elfert's preliminary report on the material.

<sup>6</sup> Illustrated in P. J. Rose, 'Evidence for Early Settlement at Qasr Ibrim', *EA* 17 (Autumn 2000), 4.

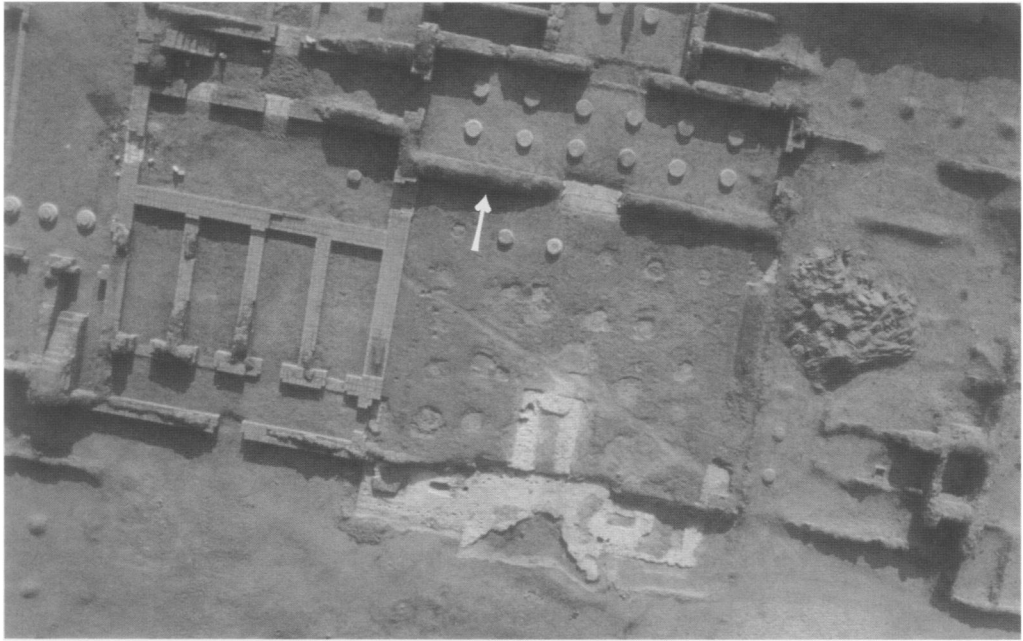


1. The church at Tell Qabrit, view from the east.

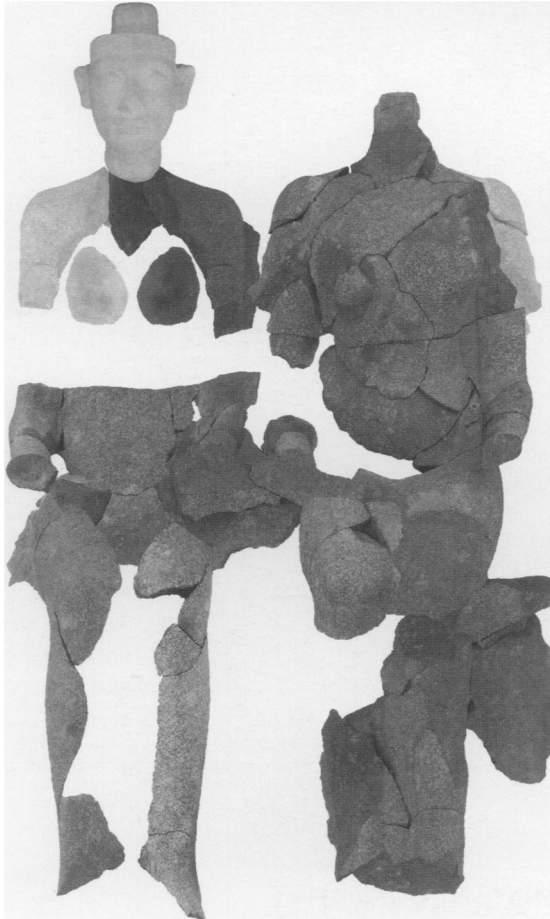
2. Tell Amya, view from the east.



3. Cemetery on top of remaining part of Tell ed-Dahab.



1. Aerial photograph of the central hall of the palace. The arrow marks the position of the strip of floor painting.



2. Digital reconstruction of the fragments of the granodiorite Akhenaten and Nefertiti pair statue (made by D. Laboury assisted by C. Rossi). The cast of the Berlin head 21358 is included.



1. The north-east wall of the sanctuary in 1974.



2. The north-west wall of the sanctuary after clearance in 2003.

# *ḥftj ntr* AS EUPHEMISM—THE CASE OF THE ANTEF DECREE

By KATJA GOEBS

The decree of Nubkheperre-Antef in the temple of Coptos is re-examined in relation to parallel texts from other periods. A new interpretation of the *ḥftj(w) ntr*, identified as a euphemism by Georges Posener, as a sacrificial animal is proposed.

IN a compelling study published in 1969, Georges Posener demonstrated convincingly that the expression *ḥftj(w) ntr* or *ḥftj(w) Rꜥw*, ‘enemy of the god’ or ‘of Re’, could be used euphemistically when referring to the god himself in a potentially harmful context, that is, when the mention of a bad act committed against the deity was to be avoided for reasons of decorum or taboo.<sup>1</sup>

One of the texts Posener cited in support of his hypothesis is the decree of the third year of the Seventeenth Dynasty king Nubkheperre-Antef,<sup>2</sup> which was set up in the

<sup>1</sup> ‘Sur l’emploi euphémique de *ḥftj(w)* “ennemi(s)”’, *ZÄS* 96 (1969), 30–5; also id., *Le papyrus Vandier* (Cairo, 1985), 42 ff with further examples, including some texts employing the term *ḥryw* as a euphemism. More examples are cited by P. Vernus, ‘Entre néo-égyptien et démotique: La langue utilisée dans la traduction du rituel de repousser l’agressif (Études sur la diglossie I)’, *RdE* 41 (1990), 204 with n. 207; see also C. Leitz, ‘Auseinandersetzungen zwischen Baba und Thoth’, in H. Behlmer (ed.), ... *Quaerentes scientiam. Festgabe für Wolfhart Westendorf zu seinem 70. Geburtstag überreicht von seinen Schülern* (Göttingen, 1994), 104, 114–16 for *ḥftyw Rꜥw* in P. Jumilhac XVI. For potential Demotic parallels for the euphemistic usage of *ḥftj* (Demotic also *šft*), see J. Quack, ‘Sur l’emploi euphémique de *ḥft* “ennemi” en démotique’, *RdE* 40 (1989), 197–8, and G. Vittmann, *Der demotische Papyrus Rylands 9* (ÄAT 38; Wiesbaden, 1998), 509–10. One of the texts identified by Vernus as containing this euphemism is the *Admonitions of Ipuwer* (e.g. 5.7; 7.1; 10.6–10); in this he is followed by J. Quack (*Studien zur Lehre für Merikare* (GOF IV/23; Wiesbaden, 1992), 87–8). The suggestion is, however, rejected by R. Enmarch (Oxford) in his forthcoming new edition of the text. I am grateful to Mr Enmarch for making the relevant pages of his work available to me.

Further, if sparse, treatment of euphemism in Egyptological literature includes A. Loprieno, ‘Sprachtabu’, *LÄ* V, 1211–14; E. Blumenthal, ‘Die “Reinheit” des Grabschänders’, in U. Verhoeven and E. Graefe (eds), *Religion und Philosophie im Alten Ägypten. Festgabe für Philippe Derchain zu seinem 65. Geburtstag am 24. Juli 1991* (OLA 39; Leuven, 1991), 47–56; J. Quack, ‘Ein altägyptisches Sprachtabu’, *LingAeg* 3 (1993), 59–79; countered by D. Franke, ‘Das Entfernen eines Sprachtabus. Nochmals zur Konstruktion *wꜥj r*’, *GM* 165 (1998), 51–6; L. Morenz, ‘*ḥtp wr*—“Grosse Opfergabe” (= Urin); Zu einem typisch sakraltextlichen Euphemismus in den Sargtexten’, *GM* 160 (1997), 63–8.

<sup>2</sup> While the exact chronology of the Seventeenth Dynasty remains elusive to this day, the most recent study of this time opts, mostly on the basis of new archaeological evidence, for a date of this king towards the end of this dynasty: D. Polz, *Der Beginn des Neuen Reiches. Zur Vorgeschichte einer Zeitenwende* (SDAIK 31; Mainz am Rhein, in preparation); also D. Polz and A. Seiler, *Die Pyramidenanlage des Königs Nub-Cheper-Re Intef in Dra’ Abu el-Naga. Ein Vorbericht* (SDAIK 24; Mainz am Rhein, 2003). I am indebted to Daniel Polz, who kindly provided me with these references and, via e-mail, discussed some of his findings with me.

temple of Min in Coptos.<sup>3</sup> The text relates a crime committed in the temple and the measures that are to be taken to punish the culprit. The crime is one of theft:

1. 5 / Sethe, *Lesestücke*, 98 l. 10


ṭṣw ḥftjw  
jn wṣ n rn=f  
Ttj s3 Mnw-ḥtp

The enemy<sup>4</sup> was stolen  
by—‘Cursed be his name’—  
Teti, son of Minhotep.

As a result of this offence and its being reported to the king by the priesthood of the temple, the Scribe of the God’s Treasure of Amun, *S3-Jmn* and the Elder of the Portal *Wsr-Jmn* were sent to Coptos to examine the case, and/or to produce an inventory of the temple’s property (*r jrt sjpty m ḥwt-nṯr Mnw*; l. 4).

The priesthood of Min is said to have implored the king to have the culprit ‘thrown to the floor in’, that is ‘excluded from’, the temple and its priesthood (*rdj ḥr t3*),<sup>5</sup> and to have him, and all future generations of his family, removed from his office in the temple (*ḥsf m j3t; pth ḥr t3*).<sup>6</sup> His endowed provisions are to be taken away (*nḥmw ḥqw=f drf wḥwt=f*), and his name is not to be remembered in the temple; indeed, all texts mentioning his name are to be removed from the temple and its administrative buildings, including all administrative documents (*dr ṣḥw=f m ḥwt-nṯr nt Mnw m pr-ḥd ḥr ṣfdw nb r-mjtt*; ll. 5–7).<sup>7</sup> This punishment is described as being in accordance with ‘what is (usually) done against one who rebels against the enemy of his God’ (*mj jrrt r mjty=f sbj ḥr ḥftjw nṯr=f*; l. 6). The decree then pronounces a threat against any king, other ruler (*ṣḥm-jrj=f*),<sup>8</sup> Commander (*ṭsw*) or Mayor (*ḥ3tj-ḥ*) who should transgress against it:

<sup>3</sup> Stela Cairo JE 30770: W. M. F. Petrie, *Koptos* (London, 1896), pl. 8; K. Sethe, *Aegyptische Lesestücke zum Gebrauch im akademischen Unterricht. Texte des Mittleren Reiches* (Leipzig, 1924), 98; W. Helck, *Historisch-biographische Texte der 2. Zwischenzeit und neue Texte der 18. Dynastie*<sup>2</sup> (Kleine Ägyptische Texte; Wiesbaden, 1983), 73–4; see also K. Sethe, *Erläuterungen zu den ägyptischen Lesestücken. Texte des Mittleren Reiches* (Darmstadt, 1976), 165–7; for a bibliography see K. Ryholt, *The Political Situation in Egypt during the Second Intermediate Period c. 1800–1550 B.C.* (Carsten Niebuhr Institute Publications 20; Copenhagen, 1997), 394. To this there may be added E. Martin-Pardey, ‘Zum Koptosdekret Antefs V.’, in B. Schmitz and A. Eggebrecht (eds), *Festschrift Jürgen von Beckerath zum 70. Geburtstag am 19. Februar 1990* (HÄB 30; Hildesheim, 1990), 185–97.

<sup>4</sup>  Posener reads *ḥftjw* as a plural here.

<sup>5</sup> *Wb.* II, 467.21 ‘vernachlässigen, nicht beachten, beseitigen’ (for *rdj r/ḥr t3*); R. Hannig, *Großes Handwörterbuch Ägyptisch-Deutsch (2800–950 v. Chr.)*, I (Kulturgeschichte der Antiken Welt 64; Mainz, 1995), 483.9b lists ‘ausschließen, vertreiben’; cf. also D. Lorton, ‘The Treatment of Criminals in Ancient Egypt through the New Kingdom’, *JESHO* 20 (1977), 20 n. 86.

<sup>6</sup> The fact that Teti’s office is taken away not only from him but also from future generations of his family has been seen as evidence for the heritability of offices in Egypt at this time and, thus, for the diminished powers of the king. See Martin-Pardey, in Schmitz and Eggebrecht (eds), *FS von Beckerath*, 186 ff for earlier literature and for arguments against this hypothesis. The author also disputes, convincingly, earlier suggestions by Helck that Teti was in fact the *ḥ3tj-ḥ* of Coptos, and that his removal from office constituted a major political manoeuvre (ibid. 190 ff; cf. W. Helck, ‘Der Aufstand des Tetian’, *SAK* 13 (1986), 127–33).

<sup>7</sup> For the practice of erasing the names of criminals in order to destroy their memory, see E. Brunner-Traut, ‘Namenstilgung’, *LÄ* IV, 340 with references.

<sup>8</sup> For the potential meaning of this term as ‘local ruler’, typical of this decentralized period, see Polz and Seiler, *Die Pyramidenanlage des Königs Nub-Cheper-Re Intef*, chapter 3.2.



they will, respectively, be unable to accede to the kingship and will forfeit their rank and all their possessions to the temple. The offices of the officials will, moreover, be transferred (*dj.tw*) to the Seal-bearer of the *bjtj*, the Overseer of the work-centre (*jmj-r3 gs-pr*) Minemhat (ll. 7–11).

According to Posener's study, the term 'enemy (of)' can be inserted in texts that aim to avoid committing to writing evil acts performed against a deity. He adduced convincing evidence from later religious texts, some of which explicitly support his hypothesis, in that one copy of a text may write *hftjw*, while another may simply state the name of the god in question. Thus, in the *Destruction of Mankind*, the copy from the tomb of Ramesses II has mankind plotting against the 'enemies of Re', while in those from the tombs of Seti I and Ramesses III the plot refers, according to Posener, simply to Re himself.<sup>9</sup> Similarly, P. Jumilhac describes the actions of Babi against Thoth (16, 11), but the *hftjw Dhwtj* is affected a few columns later (17, 3).

On this hypothesis, the *hftjw ntr=f* in the Antef Decree would describe the god himself,<sup>10</sup> or one of the sacred objects belonging to the temple—maybe a statue of the god—too sacred to be pronounced or mentioned in writing. Sethe<sup>11</sup> remarked that the *hftjw* seemed to refer to a 'Gegenstand aus dem Besitz des Gottes Min von Koptos, in Z. 15 geradezu als Venerabilie behandelt'; he is followed by Wenté, who translates as 'sacred relic'.<sup>12</sup>

While the other examples that Posener presented seem to fit seamlessly into his interpretation, some features of the Antef Decree deserve further consideration.

1) The setting of the decree, while religious, is different from that of the other, mostly mythological, texts studied by Posener. This text refers to the everyday dealings of a temple, its rituals, and economy, as evidenced by the mention both of the *pr-hd* of the

<sup>9</sup> Note that in Hornung's edition of the text these two versions are marked as destroyed at this point. However, the author refers to the fact that the lacuna in S I is too short to accommodate the full text of Ramesses II (*Der ägyptische Mythos von der Himmelskuh, Eine Ätiologie des Unvollkommenen* (OBO 46; Freiburg and Göttingen, 1982), 1 (text); 51 with n. 4 for discussion (with reference to Posener's article)).

<sup>10</sup> Authors such as K. A. Kitchen (*Alter Orient und Altes Testament. Probleme und ihre Lösungen, Aufklärung und Erläuterung* (Wuppertal, 1965), 70 with n. 413) and R. Yaron ('The Coptos Decree and 2 Sam XII 14', *Vetus Testamentum* 9 (1959), 90–1) have compared this passage to a statement in the biblical book Samuel (XII:14), where it is prophesied that the child of David and Bethsheba will die because the couple have 'outraged the enemies of Jahwe'.

<sup>11</sup> *Erläuterungen zu den ägyptischen Lesestücken*, 166.

<sup>12</sup> E. Wenté, *Letters from Ancient Egypt* (Atlanta, 1991), 25–6. An altogether different interpretation is offered by Lorton (*JESHO* 20, 18–23), who wishes to see the crime described here as one of harbouring a (Hyksos) enemy in the temple; Helck, by contrast, suspected the sheltering of rebels against Nubkheperre-Antef, who were attempting to bring the family of Senakhtenre, Seqenenre, and Kamose to the throne (*SAK* 13, 127–33). Leaving aside the chronological implications, such an interpretation is problematic, since it implies that the term *hftjw* had two separate points of reference: the (Hyksos) enemy in l. 5, but the temple official harbouring him in l. 6. Some of Helck's claims are also discussed below. Also von Beckerath wished to see Teti's crime as one of fraternizing with the king's enemies (J. v. Beckerath, *Untersuchungen zur politischen Geschichte der Zweiten Zwischenzeit* (ÄF 23; Glückstadt, 1964), 90–1). D. B. Redford translates the two passages in question as 'a hostile attitude has been adopted' and 'his sort who shows rebellion and hostility against his god' respectively ('Textual Sources for the Hyksos Period', in E. D. Oren (ed.), *The Hyksos: New Historical and Archaeological Perspectives* (University Museum Monograph 96; Philadelphia, 1997), 10 with n. 89). However, *hftj(w)* is not, to my knowledge, attested with the meaning 'hostile attitude' in any of the known sources.

temple<sup>13</sup> and of ‘all book-rolls’ from which, besides those in the temple proper, all writings of the culprit’s name are to be removed (l. 7).<sup>14</sup>

2) One may ask what would have moved a priest or temple official (as implied by the references to stripping the culprit of his office in the temple and to the *wnwt*-priesthood, who report the crime to the king) to steal a divine statue or other sacred object, since he would have known that, if he were detected, the punishment would be severe (see below for parallels) and would affect not only himself but his entire family.<sup>15</sup> It would surely have been impossible to trade such an object for others, at least in Coptos and its environs, although one may consider the possibility that the item was stripped of the precious materials covering it, and that these were melted down.<sup>16</sup>

3) One may, moreover, wonder how the issue of punishment for such a heinous crime as stealing an image or relic of the god himself could have been treated as leniently as the text seems to imply. Surely the theft of a sacred object would have been such a major offence that no recovery of social status was conceivable. Indeed, one would expect the culprit to lose his life for this crime. Other similar cases suggest that such a theft would have constituted a ‘rebellion against Maat’ in the further sense, and would thus have been punishable with burning.<sup>17</sup>

<sup>13</sup> Note that Martin-Pardey wishes to interpret this passage as a reference to the royal Treasury (in Schmitz and Eggebrecht (eds), *FS von Beckerath*, 94 n. 22).

<sup>14</sup> I would like to thank one of the referees of this paper, who points out that certain euphemistic expressions may be found in juridical documents, such as the Turin Juridical Papyrus (see, for example, P. Vernus, *Affaires et scandales sous les Ramsès. La crise des valeurs dans l’Égypte du Nouvel Empire* (Paris, 1993), esp. 153–6). What we find there, however, is mostly the posthumous, pejorative changing of the criminal’s names, or a circumlocution of their titles by means of statements such as, for example, ‘Pre has not caused him to be Chamberlain’. The name of the god does not seem to need euphemistic circumlocution.

<sup>15</sup> A. McDowell, ‘Crime and Punishment’, in D. B. Redford (ed.), *The Oxford Encyclopaedia of Ancient Egypt* (New York, 2001), I, 318 (henceforth *OEA*).

<sup>16</sup> Again, I would like to thank one of the referees for pointing out that such thefts are indeed attested in the late Twentieth Dynasty, for example, in P. Rochester (O. Goelet, Jr., ‘A New Robbery Papyrus: Rochester MAG 51.346.1’, *JEA* 82 (1996), esp. 108–12; one may also compare the evidence for increased thefts from temples in this period collected by B. J. J. Haring, *Divine Households. Administrative and Economic Aspects of the New Kingdom Royal Memorial Temples in Western Thebes* (Egyptologische Uitgaven 12; Leiden, 1997), 273–8. However, while we can assume that such thefts would have been more likely at a time when political power was not centralized, and institutions had lost their influence in important areas—in other words, during one of the so-called Intermediate Periods, to which the present decree dates—it would seem that the collapse of the central administration at the end of the Twentieth Dynasty, which ultimately led to the *whm mswt* period, was of an altogether different calibre than the political situation during the Seventeenth Dynasty as it is known to us. The evidence for restoration and other royal building activities in the Seventeenth Dynasty (e.g. Ryholt, *Political Situation*, 309), and the newly discovered funerary complex of Nubkheperre-Antef at Dra Abu el-Naga (Polz and Seiler, *Die Pyramidenanlage des Königs Nub-Cheper-Re Intef*) attest to the unchallenged, if geographically limited, authority of these rulers. It nevertheless appears possible, however, that one purpose or context of the Antef Decree was the assertion of royal authority in the Coptite nome.

<sup>17</sup> M. A. Leahy, ‘Death by Fire in Ancient Egypt’, *JESHO* 27 (1984), 200–1; H. Willems, ‘Crime, Cult and Capital Punishment’, *JEA* 76 (1990), 42–3; McDowell, *OEA* I, 317; E. D. Bedell, *Criminal Law in the Egyptian Ramesside Period* (Brandeis University PhD thesis, University Microfilms; Ann Arbor, 1973), 166–7; also W. Boochs, *Strafrechtliche Aspekte im altägyptischen Recht* (St. Augustin, 1993), 74–6 for burning as the typical punishment for sinners and divine enemies.

Since no criminal law code from the pharaonic period has survived (and may never have existed),<sup>18</sup> appropriate punishment for different types of crimes has to be inferred from similar cases attested in other texts. While employing parallels from different periods is, by definition, always problematic, it is worth pointing to the fact remarked on already by authors such as Leahy that some aspects of Egyptian law remain strikingly consistent over long periods of time.<sup>19</sup> Moreover, Ramesside judicial decisions at least seem to have been based on precedent, with the transcripts of previous trials forming the written foundation of legal practice. The practice of copying royal decrees in stone—in temples (as in the case of the Antef Decree) or in politically strategic positions—suggests that these legal documents were, in this way, ‘published’ to last, and to be accessible to all interested parties.<sup>20</sup>

With respect to the offence of interfering with the essential furnishings (or architecture) of a temple, both earlier and later examples of criminal justice point to a verdict of a severe order: death, usually by burning or impaling. The Tod inscription of Sesostri I specifies the punishment for vandalism in the local temple as burning (‘being placed on the brazier’ or ‘in the furnace’; *hryw...djw m h*; ll. 30–1),<sup>21</sup> while the ‘Ramesside Exemption Decree’ speaks of putting a thief to death by impaling ‘next to the temple from which he shall have stolen’ (*m shr=f dj. r t w r ... hr tp ht r-gs t3 hwt-ntr nty jw=f r jtt ht nb rmt nb jm=s*).<sup>22</sup> The evidence pertaining to the lawsuits against the Ramesside tomb robbers reveals the death penalty for interfering with a sacred area such as the necropolis.<sup>23</sup> Yet in the text under study, Antef warns future kings of ‘showing clemency’ toward the culprit (*njswt nb...nty r htp n=f*), and officials of

<sup>18</sup> McDowell, *OEAE* I, 316; differently Lorton, *JESHO* 20, 53 ff, who inferred the existence of law-codes on the basis of a common ‘basic pattern of the stipulations in the documents studied’. For the Late Period, we possess evidence for legal ‘handbooks’, such as P. Mattha/Codex Hermopolis (G. Mattha and G. R. Hughes, *The Demotic Legal Code of Hermopolis West* (BdE 45; Cairo, 1975); S. Grunert, *Der Kodex Hermopolis und ausgewählte private Rechtsurkunden aus dem ptolemäischen Ägypten* (Leipzig, 1982); S. Allam, ‘Traces de “codification” en Égypte ancienne (à la basse époque)’, *Revue Internationale des Droits de l’Antiquité*, Diegem 40 (1993), 11–26; K. T. Zauzich, ‘Weitere Fragmente eines juristischen Handbuchs in demotischer Schrift’, *EVO* 17 (1994), 327–32); for a Greek translation see P. W. Pestman, ‘Le manuel de droit égyptien de Hermopolis. Les passages transmis en démotique et en grec’, in P. W. Pestman (ed.), *Textes et études de papyrologie grecque, démotique et copte: P. L. Bat. 23* (Papyrologica Lugduno-Batava 23; Leiden, 1985), 116–43. None of the recorded cases preserved concern theft from a temple, but see the article by Quack cited in n. 33 below.

<sup>19</sup> *JESHO* 27, 199–200 with n. 12.

<sup>20</sup> Bedell, *Criminal Law*, 2, 12–16. General treatment also by D. Valbelle, ‘Les décrets égyptiens et leur affichage dans les temples’, in D. Valbelle and J. Leclant (eds), *Le décret de Memphis. Colloque de la Fondation Singer-Polignac à l’occasion de la célébration du bicentenaire de la découverte de la Pierre de Rosette* (Paris, 1999), 67–90, esp. 82.

<sup>21</sup> Full publication with earlier literature: C. Barbotin and J.-J. Clère, ‘L’inscription de Sésostris Ier à Tôd’, *BIFAO* 91 (1991), 1–33; see Willems, *JEA* 76, 41 for the reference to death by burning. The text is particularly important since it establishes that this type of penalty is indeed attested before the New Kingdom (cf. also the decree of King Neferhotep I of the Thirteenth Dynasty (Helck, *Historisch-biographische Inschriften*, 18–19; Willems, *JEA* 76, 40). See also Leahy, *JESHO* 27, 199 ff, with a collection of references to death by burning; he argues against Lorton’s suggestion that the texts in question refer to the ‘branding’ of criminals rather than the death penalty (*JESHO* 20, e.g. 15, 18); thus also Willems, *JEA* 76, 40 with n. 61.

<sup>22</sup> H. Brunner, ‘Das Fragment eines Schutzdekrets aus dem Neuen Reich’, *MDAIK* 8 (1938–39), 161–4; Lorton, *JESHO* 20, 27–8.

<sup>23</sup> T. E. Peet, *The Great Tomb-Robberies of the Twentieth Egyptian Dynasty* (Oxford, 1930), 25–7; Lorton, *JESHO* 20, 31–2; Bedell, *Criminal Law*, 145–8.

attempting to intercede with him on his behalf,<sup>24</sup> suggesting that an amnesty was at least conceivable.

In striking contrast to the texts cited so far, the Nauri Decrees of Seti I state that the theft of animals belonging to the temple estate of Osiris at Abydos is to be punished—besides with mutilation (the loss of nose and ears)—with the loss of property and status, with forced labour in the temple fields.<sup>25</sup> Since the punishment by mutilation comes into use only in the New Kingdom,<sup>26</sup> and the theft of other, less valuable items from the temple (*ht nbt n t3 hwt*) was normally punished with 100 blows together with a fine of 100 times the value of the stolen goods,<sup>27</sup> it is worth considering that the Nauri Decree parallel may give us a clue to the exact nature of Teti's crime.

Evidence from butchery rituals and from scenes in tombs and their accompanying glosses suggests that in ritual the sacrificial animal was identified with the 'enemy' of the god, in most cases Seth.<sup>28</sup> As in many societies, the animal not only provided nourishment for the gods and the priesthood but also acted as a so-called 'scapegoat'.<sup>29</sup> An explicit example can be found as early as PT 580 §§1543–50, a text frequently cited by scholars in this context. It describes the slaughter of Seth as a red bull and the distribution of his joints of meat, and it has been suggested that it was recited during the sacrificial slaughter.<sup>30</sup> In this text the bull or ox is addressed by the reciting priest, who takes the role of Horus: 'O you who smote (*hwj* and *sm3*) my father' (that is, Osiris), while the bull is subsequently said to have been 'smitten' for Osiris as an 'ox' (*jh*), 'wild bull' (*sm3*), and 'longhorn bull' (*ng3*; *Pyr.* 1544a–c). Once cut up and distributed to various gods, the spell ends with an appeal to 'eat the red ox' (*jh dšr*; *Pyr.* 1550a). Similar imagery is associated with the ritual slaughter of oryxes in later periods.<sup>31</sup>

<sup>24</sup> Also McDowell, *OEAE* I, 317 remarks that Teti was apparently not executed. Note that she reads the *hftjw* in this text as referring to the offender himself.

<sup>25</sup> Publication with photographs and drawings: F. Ll. Griffith, 'The Abydos Decree of Seti I at Nauri', *JEA* 27 (1913), 193–208; this passage: e.g. *KRI* I, 55.11–14; *KRI, Translation* I, 47 §22A–B (See also *KRI, Notes and Comments* I, 51).

...p3 nty jw=tw r gmt=f hr jt3 tp-n-j3wt nb n t3 hwt (Mn-m3<sup>c</sup>t-R<sup>c</sup>)...

jr.tw hpw r=f m sw3 fnd=f msdrwy=f

djw r jhwt m t3 hwt...hn<sup>c</sup> djt hmt=f hrdw=f r ndt jmj-r3 pr pn

'...anyone who is discovered taking away any beast belonging to the Temple of Menmaatre

..., the law shall be executed against him, by cutting off his nose and ears,

(he being reduced to) a field labourer of the temple...

and (also) reducing his wife and children to be serfs of the superintendent of this institution.'

<sup>26</sup> McDowell, *OEAE* I, 318; see also Boochs, *Strafrechtliche Aspekte*, 79–80 for evidence.

<sup>27</sup> *KRI* I, 54.7–10; *Translation*, 46 §13A–B. On the early history of corporal punishment tied to a pillar, and its significance as 'binding' (and thus containing) evil, see N. Beaux, 'Ennemis étrangers et malfaiteurs égyptiens. La signification du châtement au pilori', *BIFAO* 91 (1991), 33–53, esp. 47.

<sup>28</sup> H. Junker, 'Die Schlacht- und Brandopfer und ihre Symbolik im Tempelkult der Spätzeit', *ZÄS* 48 (1910), 69–77; H. Kees, *Bemerkungen zum Tieropfer der Ägypter und seiner Symbolik* (NAWG, phil.-hist. Kl.; Göttingen, 1942/2), 72–3, 78, 82–3; H. Te Velde, *Seth—God of Confusion* (PÅ 6; Leiden, 1967), 94–8; C. Eyre, *The Cannibal Hymn. A Cultural and Literary Study* (Liverpool, 2002), 170–1.

<sup>29</sup> Survey e.g. in W. Burkert, *Anthropologie des religiösen Opfers: die Sakralisierung der Gewalt?* (Munich, 1987), esp. 19 ff. For Egypt, see S. Ikram, *Choice Cuts: Meat Production in Ancient Egypt* (OLA 69; Leuven, 1995), 42–3.

<sup>30</sup> J. Leclant, 'La "mascarade" des boeufs gras et le triomphe de l'Égypte', *MDAIK* 14 (1956), 141–3; R. O. Faulkner, *The Ancient Egyptian Pyramid Texts* (Oxford, 1969), 234, who explicitly describes the text as 'An offering text in which the sacrificial ox represents Seth'; Eyre, *Cannibal Hymn*, 171 with n. 98.

<sup>31</sup> P. Derchain, *Le sacrifice de l'oryx* (Rites égyptiens 1; Brussels, 1962). See also J. Yoyotte, 'Héra

I suggest that in the Antef Decree, an interpretation of the stolen *hftjw ntr* as a sacrificial animal makes better sense, both in terms of identifying a motive for the theft (i.e. to provide food for, or an addition to the herd of, the culprit and his family) and in relation to the rather moderate penalty specified.<sup>32</sup> The theft of livestock from temples seems to have been a common problem, as evidenced by the prominence given to the protection of temple-owned herds and their keepers in texts such as the Nauri Decree or P. Wilbour.<sup>33</sup> The parallels in the Nauri Decree may indeed allow for a further specification of Teti's intent: while the selling of temple livestock, or offering it to other gods, would have been punishable by death,<sup>34</sup> the simple theft of an animal (most likely for the thief's own consumption) led to enslavement of the perpetrator and his family (and, at this later time, to mutilation).<sup>35</sup>

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d'Héliopolis et le sacrifice humain', *Annuaire École Pratique des Hautes Études. Ve section—sciences religieuses* 89 (1980–81), 47 ff for further ritual texts that explicitly identify the sacrificial animal as the 'enemy' of the butcher. The author also discusses a striking term found in the Ritual of Repelling the Evil One: *jhryt*, which Yoyotte wished to render '1'incarnation maudite d'un ennemi en un animal'. The term is applied to sacrificial animals and, according to Yoyotte, human victims at the time that the text under discussion was composed (ibid. 49).

<sup>32</sup> Compare also I. M. Lurje, *Studien zum altägyptischen Recht des 16. bis 10. Jahrhunderts v. u. Z.* (translated from the Russian by H. Bente and J. Raecke), (Forschungen zum römischen Recht 30; Weimar, 1971), 157–9, who draws up a hierarchy of crimes of theft from a temple or other sacred area in the New Kingdom. According to him, the stealing of a cultic object would have been punished by death, while that of temple-owned cattle constituted a crime of a slightly lesser degree, and was punished with mutilation, enslavement or exile (see also Bedell, *Criminal Law*, 173–9 for corporal punishment and mutilation for crimes against the state). McDowell too (*OEAÉ* I, 318) ascribes the crimes that incurred mutilation in the New Kingdom (including the theft of temple-owned cattle; cf. n. 25 above) to a separate category from those that were punishable by death: the former did not apparently constitute a 'rebellion' against Maat.

<sup>33</sup> Cf. *KRI, Notes and Comments* I, 51; see also Haring, *Divine Households*, 254–5 with n. 6, and 369 for the practice of loaning temple-owned cattle to workmen for use in cultivating their own fields, and for the occasional unlawful retaining of the animals in excess of the agreed loan period (it is unclear whether the workmen would have had to pay for this service); also W. Helck, *Zur Verwaltung des Mittleren und Neuen Reiches* (PÄ 3; Leiden, 1958), 173–4 with n. 4; W. Ghoneim, *Die ökonomische Bedeutung des Rindes im alten Ägypten* (Habelts Dissertationsdrucke Reihe Ägypten 3; Bonn, 1977), 247–8. The theft of livestock is also the concern of the Elephantine Decree, most likely dating to the time of Ramesses III, but the section dealing with the penalties incurred is, unfortunately, largely destroyed (see Griffith, *JEA* 27, 207 (l. 5) with the earlier literature). See also Helck, *Verwaltung*, 179 n. 1 with reference to the case in P. Boulaq 16 of a herdsman who ran off with his herd. The inverse situation, the theft of a bull from a private person by members of the temple personnel of Horus of Edfu, is attested in the Demotic P. Michigan 5323 (E. Cruz-Uribe, *Saite and Persian Demotic Cattle Documents. A Study in Legal Forms and Principles in Ancient Egypt* (American Studies in Papyrology 26; Chico, 1985), 7–8, pls. i, vi). In a papyrus dating to the Roman Period (but originally composed in Middle Egyptian) that was recently described by J. Quack, punitive measures for crimes committed in the temple compound are enumerated. Among them is a prescription for 'anyone who is caught trapping birds or catching fowl', and the penalties mentioned include the loss of office in the temple and beatings (likely at the pillar, *ht*; see J. F. Quack, 'Das Buch vom Tempel und verwandte Texte. Ein Vorbericht', *ARG* 2 (2000), 18–19). I owe this reference to one of the referees of this article.

<sup>34</sup> Namely, impaling: *KRI, Translation* I, 47, esp. §23A–C. ll. 55.14–56.3; see also Lorton, *JESHO* 20, 26 n. 122; Bedell, *Criminal Law*, 151 for the different penalties associated with these two types of alienating temple-owned cattle; *ibid.* 153–9 for the evidence for impaling.

<sup>35</sup> Cf. n. 25 above. While the theft of temple-owned livestock by priests or other members of the temple staff is not an explicit concern of the decree, it may be relevant that the punishment for a member of the temple (*rmꜥ nb n tꜥ hwt*) who steals cattle from an outsider is stated to be the wrath of the god of the temple (here Osiris). The god shall pursue the culprit and his family 'to expunge his name' (*r ssw n rn=f*), as well as to annihilate his soul

Teti's crime against the god Min of Coptos and his temple may therefore have been the theft of one or more sacrificial animals, most likely for his own use. The designation of the stolen 'enemy' of the god as a 'cult-object' in the widest sense, which was proposed by Sethe, is appropriate to cult equipment and sacrificial animals alike.

A final clue may be found in the titles, and thus functions, of the two officials sent to Coptos in order to investigate the case. Unfortunately, neither title gives us an unambiguous indication as to the kind of object that was stolen. The first, *sh ḥtmt ntr* (*n Jmn*), is commonly rendered 'Scribe of the God's Treasure (of Amun)'.<sup>36</sup> In the Thirteenth Dynasty, a *sh ḥtmt ntr* Nakhtankhy is attested, who, moreover, holds the titles *hsb prwy-ḥd nbw* and *jmj-r3 pr n pr-ḥd*, suggesting a link of this title with the Treasury.<sup>37</sup> In the New Kingdom, the *ḥtmt ntr*, an institution only attested in the titles of scribes, is explicitly linked with the administration of the *pr-ḥd*. In representations of the delivery of foreign goods in the Eighteenth Dynasty tomb of Puyemre (TT 39), for example, *shw ḥtmt ntr* are shown recording the deliveries of metal and other precious objects (*hsb jnw*), such as leopard skins and ostrich eggs, to the temple of Amun, and their tasks are said to take place in the *pr-ḥd n ḥwt-ntr n Jmn* in several instances.<sup>38</sup> Evidence from the Ramesside Period suggests a broader range of competence for the *shw ḥtmt ntr* than the bookkeeping of valuables *strictu sensu*: bearers of the title at that time feature in the context of the administration of meat(-offerings), and are specifically distinguished from the Scribes of the Divine Offerings (*shw ḥtp-ntr*), who administer other types of offerings. With reference to the high value of cattle, B. Haring has concluded that a separate administration for meat-offerings, involving scribes of the temple treasury 'is therefore not surprising'.<sup>39</sup> It is also worth noting in this context that outside of Thebes no administrators of herds of cattle belonging to the Amun temple are attested before the second half of the Eighteenth Dynasty, which seems to suggest that in earlier periods such herds were administered by officials with other sets of competences and titles.<sup>40</sup> In view of this evidence, we can conclude that the Scribe of the God's Treasure *S3-Jmn* was sent to Coptos because the theft at the local temple involved an item that lay within the responsibility of the Treasury of Amun. Both an object made of precious materials or a sacrificial animal would have qualified as such.

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and deny him a proper burial (*KRI I*, 58.1-7; *Translation*, 50 §36A-B). Compare here the removing of Teti's name from the Coptos temple and all its documents.

<sup>36</sup> See W. Ward, *Index of Egyptian Administrative and Religious Titles of the Middle Kingdom: with a Glossary of Words and Phrases Used* (Beirut, 1982), no. 1435 for the limited evidence in the Middle Kingdom.

<sup>37</sup> Stela Cairo CG 20341 from Abydos: H. Loffet, *Les scribes comptables, les mesureurs de céréales et de fruits, les métreurs-arpenteurs et les peseurs de l'Égypte ancienne (de l'époque thinite à la XXI<sup>e</sup> dynastie)* (Villeneuve d'Ascq, 2002), I, 302-3, Doc/D.P.I. 7 with literature.

<sup>38</sup> Since their responsibilities seem largely to overlap with those of the *shw pr-ḥd n Jmn*, Selke Eichler suggests that these two offices had different areas of responsibility within the *pr-ḥd*, even though their exact nature remains unclear (*Die Verwaltung des 'Houses des Amun' in der 18. Dynastie* (BSAK 7; Hamburg, 2000), 135-7, esp. 137 with n. 616). It is worth noting that in P. Rochester, *shw n pr-ḥd n pr Jmn-Rc njswt ntrw* are involved in the 'inspection' following a theft from (most likely) the Karnak temple (Goélet, *JEA* 82, 113-14). For the representations in the tomb of Puyemre, see N. de G. Davies, *The Tomb of Puyemrê at Thebes*, I (RPTMS 2; New York, 1922), pls. xxxi-xxxiv, 85 ff for commentary.

<sup>39</sup> *Divine Households*, 122-3.

<sup>40</sup> Eichler, *Verwaltung des 'Houses des Amun'*, 86-91 (with n. 397), 96.

In the Eighteenth Dynasty, we encounter the title *sh hsb jhw n Jmn*, ‘Scribe of Counting the Cattle of Amun’, in conjunction with that of *hrj smsw h3yt n Jmn*.<sup>41</sup> This leads us to the second official sent to Coptos in the case against Teti, the *smsw h3yt Wsr-Jmn*. With reference to this title, W. Helck spoke of ‘Beamte in der Vorhalle des Königspalastes’,<sup>42</sup> while S. Quirke has suggested that *smsw h3yt* was a title of rank, conveying direct contact with the royal family.<sup>43</sup> However, various texts suggest that the ‘Elder of the Portal’ was closely connected with the Vizier and his office, and his duties have been described as those of ‘agents directs du roi, ..., chargés de surveiller et valider les décisions prises par le vizier et ses bureaux (*hwt-wrt, wsht, hwt-nh*)’. This involved judicial tasks, and, as in our case, *smsww h3yt* could be sent on special missions in the provinces.<sup>44</sup> Some bearers of the title, indeed, became viziers at a later stage in their career.<sup>45</sup> Among the sparse evidence collected by Eichler for the Eighteenth Dynasty, the title appears once in conjunction with those referring to the office of the Vizier (*jmj-r3 pr n t3tj, sh n t3tj*) and the administration of grain (*sh hsb jt n Jmn/m šnwt htp-ntr n Jmn*).<sup>46</sup> In concluding, we can thus state that the two officials sent to investigate the case at Coptos were representatives of the Treasury of Amun and, potentially, of the Vizier’s office<sup>47</sup> respectively, with the second answering directly to the king. The involvement of both these officials confirms that the crime investigated lay, on the one hand, within the competence of the Treasury of Amun, and was at the same time of immediate concern to the king.

Finally, a few considerations on the supposed political repercussions of Teti’s crime, which were suggested by authors such as Helck,<sup>48</sup> are in order. I can see no convincing evidence in this text to support the claim that Teti’s removal from office had direct consequences for the administrative structure outside of the temple. The functions that he is stripped of clearly pertain to a temple office (*j3t=f nt hwt ntr*, l. 6), the inscriptions (of his name) are to be removed from the temple and its administrative buildings and

<sup>41</sup> Ibid. 92 with n. 425 (no. 597); anonymous owner of TT 147.

<sup>42</sup> *Untersuchungen zu den Beamtentiteln des ägyptischen Alten Reiches* (ÄF 18; Glückstadt, Hamburg, and New York, 1954), 83 with n. 31); in the autobiography of Rekhmire, a *smsw h3yt* appears to be ‘clearing’ (*sdsr*) the way in the outer parts of the temple. For (few) attestations in the Middle Kingdom, see Ward, *Index*, no. 1309.

<sup>43</sup> *The Administration of Egypt in the Late Middle Kingdom. The Hieratic Documents* (Malden, 1990), 87–90.

<sup>44</sup> J. C. Moreno García, *Études sur l’administration, le pouvoir et l’idéologie en Égypte, de l’Ancien au Moyen Empire* (Aegyptiaca Leodiensia 4; Liege, 1997), 117–22.

<sup>45</sup> E.g. *Jmn-m-h3t* of the Twelfth Dynasty: W. Grajetzki, *Die höchsten Beamten der ägyptischen Zentralverwaltung zur Zeit des Mittleren Reiches. Prosopographie, Titel und Titeltreihen* (Achet Schriften zur Ägyptologie A2; Berlin, 2000), 41 (I.36), also 63.

<sup>46</sup> *Verwaltung des ‘Hauses des Amun’*, 40 (*Jmn-m-h3t*, no. 042).

<sup>47</sup> Provided this office was functional at the time.

<sup>48</sup> SAK 13, 126–9. Helck suggested that the *h3tj-c Mnw-m-h3t*, who is addressed in the first lines of the text, was identical with his namesake, the *htmtj-bjtj jmj-r3 gs-pr Mnw-m-h3t*, who is later (l. 11) said to be the beneficiary of any potential transgression against this royal decree on the part of officials. He is followed by Martin-Pardey (in Schmitz and Eggebrecht (eds), *FS von Beckerath*, 190). While there is no conclusive evidence to support this claim, and one would expect that the name *Mnw-m-h3t* was reasonably common in the cultic capital of Min, even though the surviving evidence seems to indicate otherwise (cf. *ibid.* with n. 11 for literature), it is possible that the decree reveals the procedures by which Minemhat was promoted from *jmj-r3 gs-pr* (l. 11) to *h3tj-c* (ll. 1–2). Daniel Polz, who is preparing a new study on the end of the Seventeenth Dynasty (*Der Beginn des Neuen Reiches*, esp. chapter 1.3), emphasizes that Minemhat seems to have played an important role in the political landscape of the time, and that the Antef Decree is one of the documents that may have been used to cement his position.

documents, and the accusing party is the *wnwt*-priesthood of the temple of Min. The beneficiary of future officials' transgressions against the decree, Minemhat, may in fact be given not Teti's office and possessions, as Helck suggested,<sup>49</sup> but rather the offices of 'any Commander or any Mayor who shall intercede with the king on his behalf' (*tsw nb ḥ3tj-ꜥ nb nty r spr n nb=j ḥnh/wd3/snb r ḥtp n=f*; l. 9)—the text is far from clear at this point.<sup>50</sup> It is therefore not likely that Teti held the office of *ḥ3tj-ꜥ* of Coptos before Minemhat who benefited from his crime, and, consequently, while there may have been a major shift of political power in the administration of Coptos at this time, the criminal Teti was not so much one of the key players, but rather the 'pretext' that led to the shift.

The Antef Decree was, then, most likely put up in the Coptos temple for a variety of reasons. First and foremost, it may have served as a deterrent to future thieves, and potentially as a record of a precedent to be used in similar cases. As I have suggested, the theft in question may have concerned that of one or more sacrificial animals. Texts such as the Nauri Decree, which gives notable prominence to the protection of temple-owned livestock, seem to indicate that the stealing of animals from temples was a common problem—in Coptos, as well as in the rest of Egypt.<sup>51</sup> Secondly, the text represents the publication of a decree (forbidding the pardon of Teti) that allocates the property of potential transgressors against it to the holdings of the temple of Min, and their offices (and/or that of Teti) to the *ḥtmtj-bjtj jmj-r3 gs-pr* Minemhat. By putting it up in the temple, such potential offenders were informed of its content and thus warned, and both the temple's administration and Minemhat had a written legal document 'in hand' that would have backed their claims to the properties and offices in question, should need arise. Thirdly, the express purpose of the decree (ll. 3–4) is to inform the Mayor, military, and priesthood of Coptos about the arrival of two officials from the Residence in order to undertake an investigation that very likely involved the stocktaking of temple property. This is implied by the use of the term *sjpty*,<sup>52</sup> as well as by the title of at least the first-named official, *sh ḥtmt ntr n Jmn*, which points to an office in the *pr-ḥd* of the Amun temple. While we possess only limited evidence for the nature of the relationship between civil and temple administration at that time, it is not surprising that

<sup>49</sup> Maintained also by Martin-Pardey, who wishes, however, to identify the office in question as that of high priest in the temple of Min (in Schmitz and Eggebrecht (eds), *FS von Beckerath*, 194–5).

<sup>50</sup> The passage seems to parallel the one preceding it, in which the negative consequences for future kings and potentates who would consider an amnesty for Teti (*nty r ḥtp n=f*) are enumerated. In both cases the threats are fourfold: a) not receiving the White Crown, b) not wearing the Red Crown, c) not acceding to the throne of Horus, and d) not winning the approval of the Two Ladies, *versus* a') transfer of all possessions of staff, fields, and other property to the temple of Min, b') barring all members of their families, present or future, from inheriting their office, c') (instead) transfer of their offices to Minemhat, and d') transfer of the benefits (food-provisions) associated with that office to the same.

<sup>51</sup> On the significance of cattle one may also think of texts such as the stela of Ity of Imyotru of the First Intermediate Period, who places great emphasis on the fact that he managed to accumulate a variety of different herds for his nome. The numbers (two herds of cattle and ten herds of goats, plus 'all kind of small cattle') do not seem all that impressive to the modern reader but are clearly considered a major achievement by Ity, and are said to 'nourish' (*sḥnh*) his town (stela Cairo CG 20001; translation in M. Lichtheim, *Ancient Egyptian Autobiographies, Chiefly of the Middle Kingdom: a Study and an Anthology* (OBO 84; Freiburg and Göttingen, 1988), 31–2).

<sup>52</sup> Note that the term *sjp* is used in the context of an inspection of theft from a temple also in the Twentieth Dynasty Papyrus Rochester (Goelet, *JEA* 82, 113 with n. 5); *sjpt wrt* is used to describe large portions of the inventory in the Harris Papyrus (P. Grandet, *Le Papyrus Harris I (BM 9999)* (BdE 109; Cairo, 1994), I, 95–6).



both administrations would have been notified of such a visit and of the actions that were to be taken in the temple: the text lists the Mayor, the ‘Military Commander’, the ‘Stolist of Min and Scribe of the Temple’, the army of Coptos, and the *wnwt*-priesthood of the temple. What we can glean from the titles and functions of these officials is, therefore, an indication of the close relationship between civil and temple administration at the time, rather than that the accused Teti had previously been the *ḥ3tj*-<sup>c</sup> of Coptos, and that his demise led to a major shift in political power and reflected the political instability of the period. Several pointers, such as the choice of officials sent to Coptos (a temple and a civil administrator), the fact that the king is approached directly by the priesthood, as well as Antef’s repeated reference to the ‘temple of my father Min’ suggest not only that the case was of immediate concern to the king, but that the administration of royal and temple property was closely entwined in the Seventeenth Dynasty.<sup>53</sup>

<sup>53</sup> See also Martin-Pardey (in Schmitz and Eggebrecht (eds), *FS von Beckerath*, 195), who speaks of a ‘Bindung des Königtums an diesen Tempel’, which is also borne out by Nubkheperre-Antef’s extensive constructions there (see e.g. Ryholt, *Political Situation*, 309). This is not to say that the two branches overlapped entirely, as Helck suggested. For their separation in the late Middle Kingdom (e.g. on the stela Copenhagen Ny Carlsberg 1539: *j3t nb nt ḥwt-ntr* vs. *j3t nb nt pr-nswt*) see also S. Quirke, ‘The Regular Titles of the Late Middle Kingdom’, *RdE* 37 (1986), 109 with n. 20.


# THE MIDDLE KINGDOM OFFERING FORMULAS— A CHALLENGE\*

By DETLEF FRANKE

It is argued that there was no Middle Kingdom re-interpretation of the offering formula. Old and Middle Kingdom offering formulas show no basic differences in spelling, and they should be interpreted as ‘an offering which the king has given (and) Osiris has given:...’ There are no convincing examples from the Middle Kingdom to the Eighteenth Dynasty for a dative construction with *n* that would make the god(s) the recipient(s) of the offerings only. Parallel to the king, the gods are always the givers of the offerings, according to the custom of the reversion of offerings. The ‘late’ spelling of *hṯp dj nswt* is an expression of the profane scribal tradition, not predominantly in use before the Sixteenth Dynasty. The method for dating stelae developed by Bennett and refined by Satzinger can lead systematically to wrong results and should be abandoned.


THE most common type of text on Middle Kingdom stelae is a sequence of phrases called by Egyptologists the ‘offering formula’. It consists regularly of four parts, namely the *king’s formula* (*hṯp (r)dj(w) nswt*), the closely associated *god’s formula* (one or more name(s) of divine beings), the *requests* (from the Twelfth Dynasty usually introduced by *dj=f/s/sn*), and the naming of the *recipient* of the favours requested (introduced by e.g. *n k3 nj*, ‘for the spirit of’, title and name, etc.). There are several variants of spelling and phrasing occurring from its first appearance in the early Fourth Dynasty down to the latest examples from the later Roman Period. Because offering formulas are so typical and are found on countless inscribed Egyptian objects, they are generally passed over by Egyptologists rather automatically and without hesitation. On the other hand, they are a stumbling block of a certain vexing fascination for Egyptologists, and an Egyptological debate to solve the riddles of their tricky nature in the Old and Middle Kingdoms continues.

## The ‘king’s formula’ and the associated ‘god’s formula’

Stela Cairo CG 20318 from the first half of the Thirteenth Dynasty has an offering formula with *hṯp dj* repeated three times and at least four gods of Elkab, Hierakonpolis and Edfu are mentioned. At first sight, it looks strange for the period. The offering formula on the rather repellent late Twelfth Dynasty (?) stela British Museum EA 205 (*hṯp dj nswt dj wsjrj...*),<sup>1</sup> with the *dj* (  ) repeated before the god’s name, is another variant rarely found elsewhere on late Middle Kingdom stelae. It is found similarly,

\* I thank H. Satzinger and G. Lapp for very critical and helpful remarks on a draft of this article, and I am grateful to the *JEA* referees and L. Montagno Leahy for suggestions and correcting my English.

<sup>1</sup> H. R. Hall, in E. A. W. Budge (ed.), *Hieroglyphic Texts from Egyptian Stelae, &c., in the British Museum*, II (London, 1912), pl. 48; R. Parkinson, *Cracking Codes. The Rosetta Stone and Decipherment* (London, 1999), 151 (no. 65).

written with the single or double ‘forearm with hand’ (Gardiner sign list D36, 37–8) instead of the usual  for the second *dj* before the god’s name, on at least five stelae from the Sixteenth and early Seventeenth Dynasty as well.<sup>2</sup>

From the late Old Kingdom to the early Middle Kingdom, this repetition of the element(s) (*htp*) *dj* in offering formulas is a relatively common feature.<sup>3</sup> These spellings could mirror the interpretation of the common offering formula in Middle Kingdom times, which was—this is my hypothesis ventured here—virtually the same as in the Old Kingdom: ‘an offering which the king has given and which Osiris has given ...’, and not, as is usually translated in the tradition of A. H. Gardiner’s *Egyptian Grammar*<sup>3</sup>, p. 171, ‘an offering (or: boon) which the king has given (to) Osiris,...’<sup>4</sup>

In the Old and Middle Kingdoms the equipment for tombs and funeral buildings of at least the members of the elite derived (often only theoretically) from the favour of the king,<sup>5</sup> and the gods, such as Anubis, for example, were divine guarantors for a ‘good burial’. It is generally accepted that the Old Kingdom offering formulas describe both the king and the god(s) as givers of the ‘offerings’ and favours, and that the food offerings presented to the gods derive from royal estates and magazines. The phrase(s) *htp dj nswt* and (*htp dj*) god’s name (abbreviated as GN) could be understood as a formulaic description of the traditional custom of the reversion of offerings (‘Umlaufopfer’): the king offers *htp*, ‘food offerings’, to the gods, and after they have ‘satisfied’ (*htp*) themselves, the offerings are passed on from the (altars of the) gods to the offering-tables, stelae and/or statues of human beings to nourish their owners.<sup>6</sup> The formula thus describes

<sup>2</sup> BM EA 630 (time of Sekhemre-Khutowy Paentjeni), Cairo CG 20335 and Louvre E13057 (C287; reign of Rahotep; D. Franke, ‘An Important Family from Abydos of the Seventeenth Dynasty’, *JEA* 71 (1985), 175–6, pl. xix, left), T. E. Peet, *The Cemeteries of Abydos*, II (MEEF 34; London, 1914), 115 fig. 73, pl. xxiv, 2 and 4 (no. 13), and Khartoum Museum 4448 from Serra East (F. Ll. Griffith, ‘Oxford Excavations in Nubia’, *LAAA* 8 (1921), 98, pl. xxix, 1; PM VII, 128, early Seventeenth Dynasty). All have the ‘late’ type II of the king’s formula, on which see below. See W. Barta, *Aufbau und Bedeutung der altägyptischen Opferformel* (ÄgFo 24; Glückstadt, 1968), 55 n. 1, 74 n. 1 (for BM EA 205, his reading *dd* derived from a mistake in the drawing in *Hieroglyphic Texts* II, pl. 48), 82. The dynastic divisions are after K. Ryholt, *The Political Situation in Egypt during the Second Intermediate Period c. 1800–1550 B.C.* (CNI Publications 20; Copenhagen, 1997).

<sup>3</sup> G. Lapp, *Die Opferformel des Alten Reiches* (Mainz, 1986), 28–9 §46; H. O. Willems, ‘Food for the Dead’, in W. H. Van Soldt (ed.), *Pap Uit Lemen Pouten. Papers in Memoriam of Mia Pollock* (Leiden, 1991), 98–108; e.g. P. E. Newberry, *Beni Hasan*, II (ASE 2; London, 1894), pl. vii; A. M. Blackman, *The Rock Tombs of Meir*, III (ASE 24; London, 1916), pl. ix. See below on types A, B, D and E. In the late Twelfth and Thirteenth Dynasty and later, *htp dj* or *dj* are but rarely repeated; see the examples cited below as type E.

<sup>4</sup> See already N. De Garis Davies and A. H. Gardiner, *The Tomb of Amenemhêt* (Theban Tombs Series 1; London, 1915), 79–93, esp. 89, where Gardiner accepted the interpretation forwarded by G. Maspero, *Études de mythologie et d’archéologie égyptiennes*, VI (BE 28; Paris, 1912), 366–7. Barta, *Opferformel*, 267, 270, 293, translated ‘der König gibt ein Opfer (, nämlich das Opfer, das) dem Gott NN (gegeben wird)’, and maintained ‘Die Bedeutung der Ritualformel bleibt ... durch alle Zeiten hindurch unverändert bestehen: der König spendet der Gottheit ein Opfer, um von ihr rückwirkend Gnaden zu erlangen’, so that the god’s formula then would be merely an apposition of the king’s formula (see p. 265). P. Grandet and B. Mathieu, *Cours d’égyptien hiéroglyphique*, II (Paris, 1993), 104–5, explain the offering formula as consisting of three prospective forms (*dj*, *htp*, *dj=f/s/sn*), which is not very convincing.

<sup>5</sup> Lapp, *Opferformel*, 103–7, and D. Franke, *Das Heiligtum des Heqaib auf Elephantine* (SAGA 9; Heidelberg, 1994), 21. For the concept of *jmʿh*, ‘provisioning/veneration’, see K. Jansen-Winkeln, ‘Zur Bedeutung von *jmʿh*’, *BSEG* 20 (1996), 29–36. The official’s reward with provision and burial equipment is the material effect of his high repute and being in favour with his lord.

<sup>6</sup> Compare e.g. Gardiner, *Egyptian Grammar*<sup>3</sup>, 170–2; Barta, *Opferformel*, 268–9; H. Satzinger, ‘Beobachtungen zur Opferformel: Theorie und Praxis’, *LingAeg* 5 (1997), 182; H. Altenmüller, ‘Opferumlauf’, *LÄ* IV, 596–7.

the theoretical origin and sources of the food offerings presented during the performance of the offering ritual: the king and/or the gods.

*A dative construction used in the Middle Kingdom?*

G. Lapp and H. Satzinger have shown convincingly that there was no dative construction with *n* or *jn* in use in Old Kingdom times.<sup>7</sup> There is no fundamental graphic distinction, even acknowledging all the variants, to be observed in the king's formula *hṭp dj nswt* and the associated god's formula (*hṭp dj*) *wsjrj* between the Old and the Middle Kingdom versions. Therefore, the basic meaning of both parts of the formula in both periods should have been the same.<sup>8</sup>

Gardiner accepted a dative construction introducing the god's name at least for certain offering formulas of the Late and Ptolemaic Periods, and Barta, Lapp and Satzinger were convinced of its existence even in Middle Kingdom times.<sup>9</sup> In fact, the examples adduced for a dative construction *hṭp dj n* GN by Barta and Lapp derive mainly from some ornamental texts of sundry coffins from Assiut, and variant versions of these offering formulas were also used as part of the so-called star clocks at Thebes, Gebelein and Aswan.<sup>10</sup> This peculiar type of offering formula went with the model of the star clocks to Deir el-Bahari (T3C), Gebelein (G1T and G2T) and Elephantine (A1C). Willems noted<sup>11</sup> that the period of the composition of the star clock's model must have been before the reign of Nebhepetre Montuhotep, perhaps in Tenth Dynasty Herakleopolitan Lower Egypt, but the copies on coffins date from the second half of the Eleventh and the early Twelfth Dynasty.<sup>12</sup> These 'Assiut' formulas are versions only of

<sup>7</sup> Lapp, *Opferformel*, 30–8, and Satzinger, *LingAeg* 5, 180–2. Compare Gardiner, *Egyptian Grammar*<sup>3</sup>, 171, 'in the Old Kingdom the king and whatever god is named are mentioned in parallelism with one another as givers of the boon or boons rewarded', and already Gardiner, *The Tomb of Amenemhēt*, 81 §2. See also H. G. Fischer, 'Occurrences of *jn*, Agential and Dative', *GM* 107 (1989), 69–75. R. J. Leprohon's note on the evolution of the offering formula ('The Offering Formula in the First Intermediate Period', *JEA* 76 (1990), 163–4) is obsolete if there was no dative construction used in the Middle Kingdom.

<sup>8</sup> This conclusion was proposed by H. Willems in 1991 in Van Soldt (ed.), *Pap Uit Lemen Potten*, 104, and later in *The Coffin of Heqata* (OLA 70; Leuven, 1996), 44–5 n. 15, 332–4. However, he did not deal with the problem of a dative construction. See, too, the translation adopted by M. Marée, 'A Remarkable Group of Egyptian Stelae from the Second Intermediate Period', *OMRO* 73 (1993), 8.

<sup>9</sup> Gardiner, *The Tomb of Amenemhēt*, 89, and *Egyptian Grammar*<sup>3</sup>, 171: 'A series of variants shows that the divine name which follows the phrase *hṭp di nsw* was now understood as a dative, though it is only at a far later period that the preposition *n* was inserted'; Barta, *Opferformel*, 37, 224, 265; Lapp, *Opferformel*, 32–3 §50; W. Barta, 'Zur Bedeutung der Opferformel im Alten Reich', *GM* 96 (1987), 8, and '*jn* als Pleneschreibung der Präposition *n*', *GM* 103 (1988), 10–11; Satzinger, *LingAeg* 5, 184 n. 34.

<sup>10</sup> Barta, *Opferformel*, 37, cited for *hṭp dj n* GN the coffins of Mezehti, Cairo CG 28118 (star clock horizontal strip text; S1C) and CG 28119 (ornamental text; S2C) in P. Lacau, *Sarcophages antérieurs au Nouvel Empire*, II (CG; Cairo, 1906), 110, 131, and the coffin of Khui (Cairo JE 36445; S4C), published by É. Chassinat and Ch. Palanque, *Une campagne des fouilles dans la nécropole d'Assiout* (MIFAO 24; Cairo, 1911), 157, adding (p. 45 n. 1) the star clock horizontal strip text on the coffin of Aashyt from Deir el-Bahari (C. Fiévez, 'Les trois calendries inédits d'Assiout d'après un article récent d'Alexandre Pogo', *CdE* 11 (1936), 358–9 (T3C)). See Lapp, *Opferformel*, 32–3 §50; G. Lapp, *Typologie der Särge und Sargkammern von der 6. bis 13. Dynastie* (SAGA 7; Heidelberg, 1993), 126–9 §289; Willems, *Coffin of Heqata*, 328–34.

<sup>11</sup> *Coffin of Heqata*, 331–2.

<sup>12</sup> Seventeen examples of star clocks on coffins are known (K. Locher, 'Middle Kingdom Astronomical Coffin Lids', in C. J. Eyre (ed.), *Proceedings of the Seventh International Congress of Egyptologists, Cambridge, 3–9 September 1995* (OLA 82; Leuven, 1998), 697ff.; C. Leitz, *Altägyptische Sternuhren* (OLA 62; Leuven, 1995),

god's formulas alone, used without the normal prefix *nswt*, i.e. without the king's formula, and sometimes no further offerings or requests and no recipient were mentioned.

Contrary to Lapp's opinion, and the statement of Barta,<sup>13</sup> I see no reason why these examples, which are graphically equal to the Old Kingdom versions of Lapp's *Opferformel*, §48, should not be analysed and translated as perfective *sdm.n=f* relative forms: 'an offering which (the god) Re has given...' (*htp (r)dj.n-r<sup>c</sup>w...*). This was also the conclusion suggested by Harco Willems in his study of the star clock and its horizontal offering formulas on the coffin of Heqata from the Qubbet el-Hawa (A1C), though he rightly remarked that the reading as a relative form is impossible to prove.

Nevertheless, these 'Assiut' examples and some others have led to an argument with far-reaching consequences, and they were used by Barta and Lapp to postulate a Middle Kingdom re-interpretation of the offering formula. Barta, to sustain his statements (pp. 224, 265), offered some alleged examples of the construction *n GN* for the Middle and New Kingdoms. However, if one checks his examples scrupulously, there is not much left, except for two unique spellings on a late Twelfth<sup>14</sup> and an early Thirteenth Dynasty offering-table<sup>15</sup> from Abydos, which look suspicious and faulty.

Barta further cited P. Ramesseum E, ll. 57–8: 'an offering which the king has given to/for (*n*) the many western gods'.<sup>16</sup> What precedes is lost and no other recipient is mentioned, but this might be an example of the use of *htp dj nswt* as a label for the ritual performed by a priest on behalf of gods; compare the label 'making *htp dj nswt* for (the gods of) the Northern chapels'.<sup>17</sup> This is all the evidence Barta offered for the Middle Kingdom, and I know of no other. Let us further consider his three examples for the Seventeenth and Eighteenth Dynasties.

The *rishi*-coffin of King Seqenenre Tao, Cairo CG 61001, was found in TT 320, the cachette of Deir el-Bahari.<sup>18</sup> The coffin was deprived of its gold inlays and the

58ff.; J. Kahl, 'Textkritische Bemerkungen zu den Diagonalsternuhren des Mittleren Reiches', *SAK* 20 (1993), 95–107; J. Kahl, *Siut—Theben* (Probleme der Ägyptologie 13; Leiden, 1999), 197–201). Note that the spelling on the coffin of Khui (S4C) is clearly a mistake or an intrusion from the 'star clock formulas' common at Assiut: after Lapp, *Typologie*, Blatt 19–23, it is the only example with an *n* before Osiris among all east side/front offering formulas on coffins from Assiut. The offering formula on the opposite west side/back of S4C is spelled quite regularly.

<sup>13</sup> Lapp, *Opferformel*, 33 §50; Barta, *GM* 96, 8; also J. A. Wilson, 'A Group of Sixth Dynasty Inscriptions', *JNES* 13 (1954), 261–2; O. Neugebauer and R. Parker, *Egyptian Astronomical Texts*, I (London, 1960), 27 ('A boon which is given to Re...').

<sup>14</sup> Barta, *Opferformel*, 55, cited Cairo CG 23065: the offering formula with Geb has, contrary to the other formula with Anubis, *n (htp dj nswt n gb(b) jmj-r3 t3 mhw...*), but the *n k3 nj* phrase is missing. See also D. Franke, *Personendaten aus dem Mittleren Reich* (ÄA 41; Wiesbaden, 1984), Dossier nos. 159, 710.

<sup>15</sup> The offering-table Cairo CG 23210 was erroneously cited by Barta, *Opferformel*, 140 n. 4 as from the Nineteenth Dynasty. The photograph in W. K. Simpson, *The Terrace of the Great God at Abydos: The Offering Chapels of Dynasties 12 and 13* (PPYEE 5; New Haven and Philadelphia, 1974), pl. 16 shows that the inscription is damaged in the area where A. Kamal, *Tables d'offrandes*, I (CG; Cairo, 1909), 146, gave an *n*, and the reconstruction is highly doubtful: note the spelling of Osiris, and the space between *dj* and the god's name. All other offering formulas on the monuments of ANOC group 7 (adding the 'truncated obelisk' BM EA 177) show the regular spelling.

<sup>16</sup> *Opferformel*, 74 n. 3; A. H. Gardiner, 'A Unique Funerary Liturgy', *JEA* 41 (1955), 13, pl. iv.

<sup>17</sup> L. Borchardt, *Das Grabdenkmal des Königs S<sup>c</sup>a3hu-Re<sup>c</sup>*, II (WVDOG 26; Berlin, 1913), pl. 19, cited by Gardiner, *The Tomb of Amenemhät*, 88.

<sup>18</sup> Cited by Barta, *Opferformel*, 82; G. Daressy, *Cercueils des cachettes royales* (CG; Cairo, 1909), 2, pl. i; PM I<sup>2</sup>, 658.

inscription was later restored, perhaps in the course of its deposition in the cachette during the Twenty-first Dynasty. The gods' names had remained from the original inscription, but before them *hṭp dj nswt* was restored, the *hṭp*-sign underlined by a horizontal stroke that looks different from the other *n*. Perhaps it is a mere space-filler or an example for the Late Period spelling of the offering formula with an *n*. The coffin Cairo CG 61005, reused for the mummy of King Amenophis I, comes from the same cachette.<sup>19</sup> It is a product of the Nineteenth Dynasty and was inscribed on behalf of Amenophis I only in the late Twenty-first Dynasty, with an offering formula with *n* as a horizontal stroke before the god's name, as was *en vogue* at that period. A third example for *n* GN cited by Barta as being from the Eighteenth Dynasty is, in fact, the inscription on the base of the colossal statue of Amenhotep, son of Hapu, from Karnak, which clearly is not contemporary but dates to the Twenty-first Dynasty.<sup>20</sup>

To sum up: there is not a single clear example for a dative *n* before a god's name for the whole period from the late Eleventh to the end of the Eighteenth Dynasty. Only beginning with the Nineteenth Dynasty is there undeniable and growing evidence for offering formulas spelled with an *n* before the god's name.<sup>21</sup> However, they are found contemporarily with 'regularly' spelled offering formulas without an *n*. The late New Kingdom and later spellings with *hṭp dj nswt n* GN could be interpreted as an evidence for a dative construction and a late re-interpretation of the offering formulas along the principle *do ut des*. They can also be explained as archaizing spellings, imitating and reviving Old Kingdom writings with an agential *n* or *<j>n*, 'by', to introduce the subject after a participle, that belongs to the king's formula, not to the god's formula: *hṭp (r)djj (j)n nswt* GN..., 'an offering which was given by the king (and) GN...' <sup>22</sup> K. Jansen-Winkel explains the *n* simply as the genitival adjective *n(j)*: 'ein Königsopfer des Gottes NN (für den NN)'.<sup>23</sup> A special case study would be needed to decide this question.

It is puzzling that different versions, with or without *n*, are displayed on contemporary monuments, in roughly equal distribution according to Barta, but in the Old Kingdom even more different versions co-existed at the same time. The question is why

<sup>19</sup> *Opferformel*, 86 n. 2; Daressy, *Cercueils*, 7, pl. vi; PM I<sup>2</sup>, 659. See F.-J. Schmitz, *Amenophis I.* (HÄB 6; Hildesheim, 1978), 14.

<sup>20</sup> *Opferformel*, 108 n. 3. Cairo CG 1199: G. Maspero, *Le Musée égyptien*, II (Cairo, 1907), 35, pl. xiii; PM II<sup>2</sup>, 22 (6). All contemporary Eighteenth Dynasty inscriptions of Amenhotep, son of Hapu, display the regular spelling of the offering formula.

<sup>21</sup> Barta, *Opferformel*, 140 n. 4, cited W. C. Hayes, *The Scepter of Egypt*, II (New York, 1959, reprint 1990), 351 fig. 219 (New York MMA 33.2.1), left vertical naos inscription, which could easily be translated as 'An-offering-which-the-king-has-given to/for (*n*) Osiris Khentamenti (made) by (*jn*) the royal scribe...Yuny', making the god beneficiary of the offering ritual performed by Yuny. Two similar texts, with and without dative *n* to introduce the god, are found on the right side of the roughly contemporary naos BM EA 1135 (*Hieroglyphic Texts* XII, pls. 88–9). Barta's second example is W. M. F. Petrie, *Ehnasya 1904* (London, 1905), pl. xxvii, 1: two times *hṭp dj nswt n pth*...

<sup>22</sup> See Lapp, *Opferformel*, 30–2 §§47–8; Satzinger, *LingAeg* 5, 180–2. Several examples are in K. Jansen-Winkel, *Ägyptische Biographien der 22. und 23. Dynastie* (ÄUAT 8; Wiesbaden, 1985), and see M. Abdelraheim, 'Ein Spätzeitwürfelhocker aus dem Ägyptischen Museum in Kairo (JE 38011)', *GM* 192 (2003), 15–18, also Barta, *Opferformel*, 163, 173, 186, 195, 204, 211.

<sup>23</sup> K. Jansen-Winkel, 'Vermerke: Zum Verständnis kurzer und formelhafter Inschriften auf ägyptischen Denkmälern', *MDAIK* 46 (1990), 143–6, and id., *Text und Sprache in der 3. Zwischenzeit* (ÄUAT 26; Wiesbaden, 1994), 104ff., as was proposed earlier by G. Farina (see Barta, *Opferformel*, 258–9). According to his interpretation, the gods are also those who give the offerings.

the Egyptians did not write the dative *n* throughout, as they do usually for the human beneficiary of the formulas, if they really had thought of such a construction. The rarity of examples shows, to my mind, that the introduction of the god's name with *n* could not have been the rule or the norm. The alleged Middle Kingdom examples adduced for a dative *n* can be explained as slips of the chisel or mistakes or otherwise.

Following Barta, Satzinger stated that writings of the offering formula with an *n* are 'zu allen Zeiten belegbar', but he admits 'wenngleich sie [the *n*] normalerweise ausgelassen wird'.<sup>24</sup> All the advocates for a dative construction have to admit that it was in use 'albeit without writing the preposition'.<sup>25</sup> Because there are no clear examples of offering formulas introducing the god's name with a dative *n* in the Middle Kingdom, Egyptologists should not insert it artificially.<sup>26</sup> Gardiner, in his early study in *The Tomb of Amenemhēt* from 1915, had found no Middle Kingdom evidence for a dative construction, and he had to admit (p. 89): 'The strongest argument that can be quoted against the above interpretation is the almost invariable omission of a preposition before the divine name throughout the Middle and New Kingdoms'.

There are no convincing arguments so far for a translation of the Middle Kingdom versions of the offering formula as 'an offering which the king has given (to) Osiris...' This translation cannot have been induced by an alleged existence of a dative construction for which there is no evidence at all, but more probably by an (Egyptological) interpretation along the principle *do ut des* of the frequent Middle Kingdom introduction of the requests by *dj=f/s/sn*, 'that he/she/they may give' (on which see below).<sup>27</sup>

A few formulas of the early Twelfth Dynasty, using the preposition *hr* before the god's name, should be translated simply as if consisting of the usual two parts: 'an offering which the king has given and (which was given) from nearby Osiris...' (*htp-dj-nswt hr-wsjrj...*).<sup>28</sup> The preposition *hr* is not equivalent to a dative 'to', and it does not connect the king's formula with the god's name, but belongs to the god's formula (\**htp dj hr GN*).

<sup>24</sup> *LingAeg* 5, 184 n. 34.

<sup>25</sup> R. Leprohon, *JEA* 76, 164.

<sup>26</sup> The statement of Barta, *GM* 96, 9, that 'die Präposition *n* vor einem Götternamen den Dativ angibt, vor *nswt* dagegen das Agens einführt' does not sound very logical. See the reply of Fischer, *GM* 107, 70.

<sup>27</sup> This is quite clear from Gardiner, *The Tomb of Amenemhēt*, 88–90, 93 (following a suggestion by Maspero), where his basic argument, beside the introduction of *dj=f/sn*, for a Middle Kingdom re-interpretation is the supposed mercenary mentality of the Egyptians, deduced from *Pyr.*, §§1649–51 [599]. The pyramid spell is a kind of decree released by Atum (note the *sdm.tj.fj*-forms), and the underlying idea is not that of a bargain struck between the king and gods, but that of formulas of promise and implicit threat, of *do ut des*.

<sup>28</sup> For example, BM EA 162 (ANOC 2: Simpson, *Terrace of the Great God*, pl. 6); L. Habachi, *Elephantine*, IV. *The Sanctuary of Heqaib* (AV 33; Mainz, 1985), nos. 4, 5, 19; Lapp, *Opferformel*, 33 §51. It should be stressed that the offering formulas using *hr* are in no way comparable to the above-mentioned formulas at Assiut (contra Barta, *GM* 96, 8), simply because these Assiut formulas have no *nswt*-element, while the *hr*-formulas begin with *nswt*. Accordingly, they are 'complete' versions with the king's and the god's formula. For the meaning of *hr*, see Franke, *Heqaib*, 37; it does not denote 'to' (which is but a connotation) or 'räumlich: vor', but 'in the sphere, or aura, of'. Compare the formulas *jm3hj hr*, 'venerated nearby' a god, *pri-hrw hr*, 'an invocation-offering (from) nearby' a god (Lapp, *Opferformel*, 95 §164), *zbi hr k3*, 'to go to nearby one's spirit' (H. Roeder, 'Themen und Motive in den Pyramidentexten', *LingAeg* 3 (1993), 88–9), and *hswt njt-hr-nswt*, 'a favour from-nearby-the-king'. To translate these offering formulas as 'an offering which the king has given to Osiris...' is accordingly not adequate.

Dative constructions are employed only when *ḥtp dj nswt* alone is used like a noun, as the title or *incipit* of the offering ritual, to introduce the addressee and beneficiary: ‘an-offering-which-the-king-has-given (performed) to/for (the spirit of)...’ NN, or ‘reciting (the ritual of) An-offering-which-the-king-has-given to/for...’ NN (*jrt ḥtp-dj-nswt n...NN*).<sup>29</sup> In these cases, the Egyptians obviously did not hesitate to write the dative *n*.

There are several examples on Thirteenth Dynasty stelae of an abridged version of the ‘basic’ king’s and god’s formula without mentioning requests, where it is used because of lack of space instead of the more complete versions with additional requests: *ḥtp dj nswt wsjrj n k3 nj...*, ‘an offering which the king has given and Osiris to/for the spirit of...’ NN (BM EA 204, l. 7),<sup>30</sup> or *ḥtp dj nswt wsjrj...ḥtp dj wpjw3wt...n k3 nj*, ‘an offering which the king has given and Osiris...and an offering which Wepwawet...has given for the spirit of’ NN.<sup>31</sup> An even shorter version is *ḥtp dj nswt n k3 nj*, ‘an offering which the king has given for the spirit of’ NN.<sup>32</sup> Like the Old Kingdom version, the king and the god(s) are expected to give their favours to the stela’s owner.<sup>33</sup> An additional *dj=f/sn* with requests added should not change the meaning, then, but would explain the expected gifts and favours. These examples simply state that the monument’s owner was the recipient of the offerings.

The offering formulas of the Middle Kingdom did not use a dative construction to transform the role of the god(s) into that of recipient(s) of the offerings.<sup>34</sup> Accordingly, the principle *do ut des* was not the basic principle expressed in the offering formulas of the Old and Middle Kingdom.<sup>35</sup> Nevertheless, the principle *do ut des* was well at work in Old Kingdom times, as is testified by Spell 599 of the pyramid texts (*Pyr.*, §§1649–51): the king and Geb give offerings to other gods, who in turn are expected to do something in favour of the king. But this kind of ‘extortion’ is not the concern of the Old and Middle Kingdom offering formulas. They are statements about the origin of the offerings and the favours desired.

<sup>29</sup> Already Borchardt, *Š’a3ḥu-Re<sup>c</sup>* II, pl. 19, cited by Gardiner, *The Tomb of Amenemhēt*, 88, and Lapp, *Opferformel*, 33 §52, 153–4 §§262–3; e.g. stela Leiden 36 and Berlin 1191 (ANOC 40, pl. 58); Cairo CG 20043 in the ‘appeal’; Cairo JE 51979 (G. Jequier, *Le Mastabat Faraoun* (Cairo, 1928), pl. xii). See below on type D. An early variant is *Pyr.*, §583 [357]: ‘an offering which Geb has given to Osiris king NN...’ A unique variant was cited by Gardiner, *The Tomb of Amenemhēt*, 91: Cairo CG 20725 (ANOC 48, pl. 66) has *jrt ḥtp dj nswt pth-zkr n k3 nj...*, ‘Making An-offering-which-the-king-has-given and Ptah-Sokar for the spirit of...’ as a label to the lector-priest’s action (first half of the Thirteenth Dynasty).

<sup>30</sup> *Hieroglyphic Texts* III, pl. 16, and e.g. BM EA 215, EA 238, EA 240, EA 252; Cairo CG 20089. It is very unlikely that the god here is recipient of the offerings or part of a (not mentioned) request, as interpreted by G. Lapp, ‘Eine spezielle Opferformel des Mittleren Reiches’, *SAK* 14 (1987), 182.

<sup>31</sup> BM EA 471: *Hieroglyphic Texts* V, pl. 6.

<sup>32</sup> BM EA 209: *Hieroglyphic Texts* III, pl. 45.

<sup>33</sup> A fine Old Kingdom example is offered by Lapp, *Opferformel*, 34 fig. 8, which reads: ‘an offering which the king has given and an offering which Anubis has given for/to them (the seated couples depicted) daily’.

<sup>34</sup> However, nobody doubts that the gods were the recipients of the king’s offerings. This is clearly shown by some of the examples adduced by Gardiner, *The Tomb of Amenemhēt*, 89, and Barta, *Opferformel*, 268–9.

<sup>35</sup> Contrary to Satzinger, *LingAeg* 5, 184, for whom the Middle Kingdom offering formula is a ‘Manifestation des Prinzipes *do ut des*: Der (Nekropolen-, Tempel)gott wird durch das staatliche Opfer darauf programmiert, die Gnadenswünsche des Einzelnen zu erfüllen’.



*A Middle Kingdom re-interpretation? The introduction of the requests*

There is no need to assume a ‘re-interpretation’<sup>36</sup> and a change of meaning between Old Kingdom and Middle Kingdom offering formulas. In both periods the king’s formula and the god’s formula mention in parallelism the givers of the offerings.<sup>37</sup> (*r*)*dj(w)* is a perfective relative form with a double subject: the king and the god(s). The graphic repetition of the element (*r*)*dj(w)*, ‘which has given’, before (or, in the Old Kingdom, after) the god’s name is only an optional device.<sup>38</sup>

There is a new element to be observed in the offering formulas of the early Middle Kingdom with the introduction of *dj=f/sn*. The only structural difference between Old Kingdom and Middle Kingdom formulas is the additional insertion of a prospective *dj=f/s/sn*, ‘may he/she/they give’, introducing the following request for an invocation-offering etc., which refers back to the god or gods previously mentioned. In Old Kingdom offering formulas, requests were sometimes introduced by a verbal form too, but then the suffix pronoun always refers ‘forward’ to the recipient of the favours, and not back to the god(s): ‘may be given to him [the dead tomb owner] an invocation-offering’ (*dj.w n=f prt-hrw*), ‘may he be buried’ (*qrs.tj=f*), ‘may he travel on the good ways...’ (*hpr=f hr w3wt nfrwt...*), etc. This is obviously a change of structure and reference.

The earliest example for *dj=sn* dates to the Sixth Dynasty, and is found on the false-door of Neferseshemre, lower, horizontal l. 2: ‘an offering which all the gods of the West have given: may they give you a <very?> good old age...’ (*hpr dj ntr.w nb.w jmntt dj=sn n=k j3w nfr <wr?>t...*).<sup>39</sup> This means that the Middle Kingdom usage of *dj=f/sn* was already conceivable in the Old Kingdom when, according also to Lapp and Satzinger, the gods never were recipients of the offerings, and obviously without any connection to a supposed dative construction. If there was no dative construction to introduce the god(s) as recipient(s) of the offerings, there is also no need for a ‘that-form’ to introduce the requests.<sup>40</sup> *dj=f/sn*, then, is no syntactic dependent ‘clause of purpose’<sup>41</sup> but a ‘self sufficient statement’.<sup>42</sup>

<sup>36</sup> Gardiner, *Egyptian Grammar*<sup>3</sup>, 171, and compare the similar statements of Lapp, *SAK* 14, 182: ‘grundsätzlicher Bedeutungswandel’, Lapp, *Typologie*, 212–13 §494: ‘einschneidende Bedeutungsänderung’, and Satzinger, *LingAeg* 5, 184: ‘völlig neu strukturiert’.

<sup>37</sup> That there was no Middle Kingdom re-interpretation was the opinion of Barta, *Opferformel*, 265, 267–70, 293, too. While Lapp’s analysis of the offering formula in the Old Kingdom is certainly superior to Barta’s interpretation, he argues for a Middle Kingdom re-interpretation (e.g. *Opferformel*, §46 n. 3, p. 241). The weakness of some of his arguments is demonstrated by Willems, in Van Soldt (ed.), *Pap Uit Lemen Potten*, 98–108; see, too, Willems, *Coffin of Heqata*, 333.

<sup>38</sup> Willems, in Van Soldt (ed.), *Pap Uit Lemen Potten*, 104.

<sup>39</sup> J. Capart, *Une rue de tombeaux à Saqqarah* (Brussels, 1907), pl. 11; Gardiner, *The Tomb of Amenemhät*, 83; Barta, *Opferformel*, 27 on Bitte 5c, 233, 267; Lapp, *Opferformel*, 204 §345(3).

<sup>40</sup> See P. Vernus, *Future at Issue* (YES 4; New Haven, 1990), 18–19, n. 77. That *dj=f prt-hrw...* was considered as a rather separate (optional) formulaic element might explain its application following a god’s name on an early Twelfth Dynasty double offering-table from Saqqara: *hpr dj nswt jnpw h3 t...* (var.: *dj=f h3 t...*) *n k3 nj jm3hw hr wsjrj hntj r3-st3w* (var.: *ddw dj=f prt-hrw nfr r'w nb...*, ‘an offering which the king has given and Anubis... : (var.: may he give) thousand of bread...for the spirit of the venerated nearby Osiris, foremost of Rosetau (var.: Busiris): may he give a good invocation-offering every day...’ (A. Abdalla, ‘The Cenotaph of the Sekwaskhet Family from Saqqara’, *JEA* 78 (1992), 98 (niche no. 2), fig. 3d (lines A–B and B–C), pl. xx, 4).

<sup>41</sup> Gardiner, *Egyptian Grammar*<sup>3</sup>, 171. See also D. B. Spänel, ‘Palaeographic and Epigraphic Distinctions between Texts of the so-called First Intermediate Period and the Early Twelfth Dynasty’, in P. Der Manuelian (ed.), *Studies in Honor of William Kelly Simpson* (Boston, 1996), II, 769 n. 13.

<sup>42</sup> Vernus, *Future at Issue*, 19 n. 77. Jansen-Winkel, *MDAIK* 46, 144, and id., *Text und Sprache in der 3.*

If one concedes that there is no graphical distinction between the Old Kingdom and Middle Kingdom writings of the offering formula, except for the element *dj=f/sn*, why should there be a fundamental change of meaning? In the Middle Kingdom, too, the food-offerings are thought of as being presented by the king to the gods and to his subjects. The gods were supposed to be the givers of the invocation-offerings (from the reversion of offerings) and immaterial favours. It should be kept in mind that the most common kind of favour requested after the king's and the god's formula in the Old and Middle Kingdom was the same—the *pr(j)t-hrw*, 'invocation-offering'<sup>43</sup>—and that there was no change in the (archaic) offering ritual performed, the formulas recited and the priestly actions. In practice, these material offerings requested regularly came from the offering altars of the gods in the temples.

The Old Kingdom formulas unite fundamental elements of the offering ritual (the king's formula, the god's formula and often a simple enumeration of the requests transferred from the offering-list of the 'chess-board' type), giving the key-words for a 'performative' recitation and action by the priest. There is no continuous train of thought between the king's and the co-ordinated god's formula and the requests, but rather, a gap.

The Middle Kingdom version of the offering formula, on the other hand, is 'smoothed'. After the archaic formulaic and fixed introduction of the king and the gods as those who give the offerings there follows a virtual sentence for recital, referring back as well as forward: 'May he/she/they [the aforementioned gods] give...for...' NN. The insertion of *dj=f/s/sn* is merely an explanatory re-formulation or precision and not a Middle Kingdom re-interpretation,<sup>44</sup> and it did not affect the meaning of the king's formula and the god's formula and their co-ordination.

### *Some examples*

A translation of the offering formulas rejecting a Middle Kingdom re-interpretation gives a satisfying and logical sense to the various examples, which is often superior to the traditional translations and does not require emendations. In the example formulas discussed below, *hṭp dj(w) nswt* plus (bare) god's name is abbreviated as *hḏn* + GN. Let us consider first some examples with only one god mentioned.

*hṭp dj nswt wsjrj...pr.t(w)-hrw n=f m ṭnj 3bdw...* (stela Turin cat. no. 1447)<sup>45</sup>

*Zwischenzeit*, 104ff., interprets *dj=f/sn* as introducing no request but a circumstantial clause: 'Ein Königsopfer des GN..., indem er gibt...', 'An offering-which-the-king-has-given of GN, in that he gives/giving...'

<sup>43</sup> Two Thirteenth Dynasty graffiti near the Nubian fortress at Kumma have a variant formula which never appeared on stelae: *hṭp dj nswt wnm t ḥnqt jḥw 3pdw n k3 nj...*, 'an offering which the king has given: to consume bread and beer, meat and fowl for the spirit of...' (F. Hintze and W. F. Reineke, *Felsinschriften aus dem sudanesischen Nubien* (Berlin, 1989), no. 486), and *...dj=sn wnm t ḥnqt...n k3 nj...*, '...may they [the aforementioned gods] give to consume bread and beer...for the spirit of...' (no. 400).

<sup>44</sup> It could be a formal assimilation of the specification of the material offerings to the common 'immaterial' requests using prospective forms, like *ḥpj=f m hṭp* or *d3j=f pt/bj3*, in use since the Fourth Dynasty. My explanation was anticipated already by F. Ll. Griffith, as summarized by Barta, *Opferformel*, 256.

<sup>45</sup> Reign of Nebhepetre Montuhotep, year 46, translated by M. Lichtheim, *Ancient Egyptian Autobiographies Chiefly of the Middle Kingdom* (OBO 84; Freiburg and Göttingen, 1988), 63–4 no. 25. The origin from Theban tomb 240 (PM I<sup>2</sup>, 331) is questionable; see H. G. Fischer, 'An Eleventh Dynasty Couple Holding the Sign of Life', *ZÄS* 100 (1973), 20 n. 8. Compare stela Leiden 7 (inv. no. AP.67; C. Obsomer, *Sésostris Ier* (Brussels, 1995), 534 (doc. 30); Senwosret I, year 9).

My translation is: ‘an offering which the king has given and Osiris...: may be brought forth the voice(-offering)...for him in Abydos in the Thinite nome...’ *prt(w) ḥrw* is verbal *tw*-passive<sup>46</sup> and merely specifying the aforementioned *ḥtp*-offerings. This formula is clearly in the Old Kingdom tradition, but comparable short versions with one (or two) god(s) and ‘bare’ *prt-ḥrw* are rather frequent in the late Eleventh and early Twelfth Dynasty.<sup>47</sup>

This example could be easily transformed into a version using an additional *dj=f* with *prt-ḥrw* as a noun, and indeed, these abridged versions with only one god mentioned are very common during the Middle Kingdom: *ḥtp dj nswt wsjrj...dj=f prt-ḥrw...*, ‘an offering which the king has given and Osiris...: may he (Osiris) give an invocation-offering...’ (e.g. on BM EA 204). Lapp had translated examples like this one: ‘Ein Opfer, das der König gibt: Osiris, er möge ein Totenopfer geben...’<sup>48</sup> The god’s name thus became the subject of the request in anticipatory emphasis. To introduce a ‘cleft’ between the king’s formula and the god’s name does not seem very logical in view of the Old Kingdom and later examples just cited, which are structured virtually in the same manner but without *dj=f/sn*.<sup>49</sup>

Things get more complicated when more gods are involved. There are five other basic types of these offering formulas which occur in the Middle Kingdom.

• *Type A*: *ḥdn* + GN *dj* + GN and ‘bare’ *prt-ḥrw*



*ḥtp dj nswt wsjrj...dj jnpw...prt-ḥrw n jmʒḥj NN...* (Turin cat. no. 1534)<sup>50</sup>

‘An offering which the king has given and Osiris... (and) which Anubis... has given: an invocation-offering for the venerated’ NN...

For the *dj*-sign between the king’s formula and the first mentioned god, Osiris, we can assume a case of haplography, but it is repeated before the second god’s name, Anubis. It should be stressed that *dj* (if written) has to be read before the god’s name, referring back to the *ḥtp*-offering. *ḥtp* is frequently not repeated,<sup>51</sup> but see below on type

<sup>46</sup> J. J. Clère, ‘Le fonctionnement grammatical de l’expression *prj ḥrw* en ancien égyptien’, *Mélanges Maspero*, I/4 (MIFAO 67; Cairo, 1961), 778ff.; Barta, *Opferformel*, 298–300 on Bitte 2; Lapp, *Opferformel*, 97–102 §§168–79; Willems, *Coffin of Heqata*, 46.

<sup>47</sup> E.g. BM EA 152 (*Hieroglyphic Texts* II, pl. 34; late Eleventh Dynasty?); Cairo CG 20263 and 20751 (ANOC 30; Senwosret I, year 10); BM EA 572 (Lichtheim, *Autobiographies*, 106 no. 45; ANOC 5; Senwosret I, year 39). The first two examples with two gods’ names can be subsumed under a type *ḥdn* + GN GN(s) and ‘bare’ *prt-ḥrw*, which is not specially quoted below.

<sup>48</sup> SAK 14, 182. A similar translation was put forward already by A. Erman, *Die Hieroglyphen* (Berlin and Leipzig, 1912), 69 (see Barta, *Opferformel*, 258), and rejected by Gardiner, *The Tomb of Amenemhêt*, 88–9.

<sup>49</sup> See Willems, in Van Soldt (ed.), *Pap Uit Lemen Potten*, 100–5. Lichtheim, *Autobiographies*, 122 no. 55, translated the example on BM EA 559 in the ‘traditional’ way after Gardiner: ‘an offering-that-the-king-gives (to) Osiris..., that he may give a voice-offering...’ (ANOC 43, pl. 62; Senwosret III, year 7), and Satzinger, *LingAeg* 5, 184, translated examples like these: ‘Das Opfer, das der König Osiris gegeben hat, (dies)er möge veranlassen...’. See below on type C.

<sup>50</sup> G. Maspero, ‘Rapport sur une mission en Italie’, *RecTrav* 3 (1882), 115–16 (IV); the stela dates to the early Twelfth Dynasty. Compare Newberry, *Beni Hasan* II, pl. vii; Cairo CG 20518, 20756; the stela of Renu at Chatsworth (ex Salt Collection sales catalogue no. 576; G. B. Deakin, ‘Two Egyptian Stelae in the Devonshire Collection’, *The Transactions of the Hunter Archaeological Society Sheffield* 10 (1971), 65–6; C. Eder, in D. Boschung et al. (eds), *Die antiken Skulpturen in Chatsworth sowie in Dunham Massey und Withington Hall* (Monumenta Artis Romanae 26; Mainz, 1997), 131 no. 167, pl. 115, 3).

<sup>51</sup> Satzinger, *LingAeg* 5, 182: ‘gapping’.



Contrary to the previous example, a *hṯp* before the summary of gods and the key word *pṯt-hrw* are missing. Of course, it is grammatically possible to translate here: ‘an offering which the king has given and Anubis..., an offering which Osiris...has given and an offering which Wepwawet...has given: may the gods of Abydos give a thousand of bread and beer...for...’ NN. But the sense intended is the same as in the formulas of type A, without the *hṯp* repeated (stelae Turin cat. nos. 1534, 1513; Pittsburgh Z9-497; or with the *dj* omitted, as on Louvre C3), or on BM EA 573, where *hṯp dj* is repeated before the summary of gods. For BM EA 573 as well as Louvre C166, *hṯp dj* could not have been inserted after the god’s name, but it is written *before* it.

Let us now consider the variants with *dj=sn* inserted.

- *Type C: hḏn + GN GN(s) and dj=f/sn pṯt-hrw*



*hṯp dj nswt wpjw3wt nṯr.w nb.w t3-dsr dj=sn pṯt-hrw...n...NN* (stela 720/12 at Chatsworth)<sup>58</sup>

‘An offering which the king has given and Wepwawet and all the gods of the sacred land: may they give an invocation-offering...for...’ NN.

The prospective *dj=sn* refers back to the previously mentioned gods. If the gods are not recipients of the offerings, but those who give the offerings, there is no need for a causal ‘that-form’.

- *Type D: hḏn + GN dj + GN and dj=f/sn pṯt-hrw*



*hṯp dj nswt wsjrj...dj jnpw...dj=sn pṯt-hrw...n...NN* (Vienna ÄS 90)<sup>59</sup>

*hṯp dj nswt wsjrj...dj wpjw3wt...dj jnpw...dj hṯt hnḥ hnmw dj=f mw hnqt pṯt-hrw...n...NN* (Cairo CG 20542: ANOC 4, pl. 11; Senwosret I, year 24)

If one interprets *dj jnpw* in the first example as an equivalent of the common *dj=f/sn*, its very addition after the god’s name Anubis seems superfluous. It makes no sense to make the god part of the request.<sup>60</sup> It should be translated just like the formulas of type A without *dj=f/sn*: ‘an offering which the king has given and Osiris..., which Anubis...has given: may they give an invocation-offering...for...’ NN.

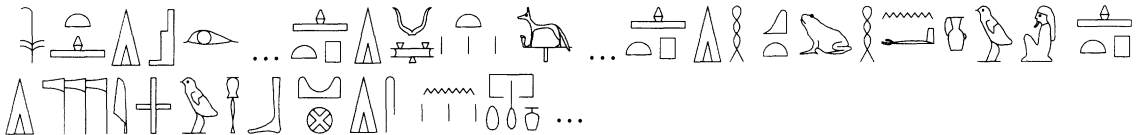
<sup>58</sup> After a first example for *dj=sn* from the Sixth Dynasty on the false-door of Neferseshemre (Capart, *Rue de tombeaux*, pl. 11), this is the second example, on the stela of Nekhty (H. W. Müller, ‘Die Totendenksteine des Mittleren Reiches’, *MDAIK* 4 (1933), 187 fig. 11; Deakin, *The Transactions of the Hunter Archaeological Society Sheffield* 10, 63–5; Eder, in Boschung et al. (eds), *Die antiken Skulpturen in Chatsworth*, 128–30 no. 166, pl. 115, 1; Lichtheim, *Autobiographies*, 67–8 no. 26). Nekhty’s stela, Turin cat. no. 1513, Pittsburgh Z9-497, Louvre C15 and Berlin 1197 are probably all from the first half of the reign of Nebhepetre Montuhotep (E. Brovarski, *The Inscribed Material of the First Intermediate Period from Naga-ed-Dêr* (Ann Arbor, 2001), 1043ff.; C. Obsomer, ‘*dj.f pṯt-hrw* et la filiation *ms(t).n/jr(t).n* comme critères de datation dans les textes du Moyen Empire’, in C. Cannuyer and J.-M. Kruchten (eds), *Individu, société et spiritualité dans l’Égypte pharaonique et copte. Mélanges égyptologiques offerts au A. Théodorides* (Brussels, 1993), 178–9, 197–8). *dj=f/sn* appears more frequently on stelae only after the end of the first decade of the reign of Senwosret I; see Cairo CG 20515 (ANOC 30, pl. 46) and 20516 (Obsomer, *Sésostris Ier*, 514 (doc. 24), 516 (doc. 25); Senwosret I, year 10).

<sup>59</sup> Simpson, *Papyrus Reisner IV*, pl. 30; Franke, *Personendaten*, Dossier no. 152 (last decades of Senwosret I).

<sup>60</sup> This example is of the same type as the offering formulas on BM EA 205; Blackman, *The Rock Tombs of Meir III*, pl. ix, or on coffin M1C (Cairo JE 42949), discussed by Lapp, *Opferformel*, 28 §46; id., *SAK* 14, 181; Willems, in Van Soldt (ed.), *Pap Uit Lemen Potten*, 101, 105.

In the second example, ‘(an offering) which Heqet and Khnum have given’ is continued by the request ‘may he (*sic!*) give water and beer,...’ This is an example that weakens the argument of Gardiner in favour of a dative construction: ‘The best proof of this re-interpretation is the fact that, if one god is named after the phrase *ḥtp di nsw*, the following clause of purpose has...*di·f* “that he may give”... with a singular suffix-pronoun, whereas if several gods are named we find...*di·sn* “that they may give”; had the king and the god (or gods) been still regarded as collateral givers of the funerary benefits, the verb *di·sn* with plural suffix would have been found in all cases’.<sup>61</sup> Now, this statement acknowledges a high degree of logic and consequence on the part of the ancient Egyptian scribes and sculptors. The rather frequent phrase *dj=f mw...*, ‘may he give water...’ (on which see the section below) is clearly used on Cairo CG 20542 with reference to a single male god (often Anubis, here Khnum?), although five gods are mentioned in the offering formula(s). There are too many examples for this incongruity to be explained as merely simple mistakes made by individual scribes/sculptors.<sup>62</sup> *dj=f/sn* always refers back to the aforementioned god or gods only, but the king is never included: there are no examples of \**ḥtp dj nswt dj=f prt-ḥrw*, \*‘an offering which the king has given (that) he may give an invocation-offering...’, known to me.<sup>63</sup> The gods alone are thought of as being able to fulfil the material and immaterial requests and afterlife wishes, precluding formulas like \**ḥdn* + GN and *dj=sn...*<sup>64</sup>

• Type E: *ḥdn* + GN *ḥtp dj* + GN and *dj=f/sn prt ḥrw*



*ḥtp dj nswt wsjrj...ḥtp dj wpjw<sup>3</sup>wt...ḥtp dj ḥqt ḥn<sup>c</sup> ḥnmw ḥtp dj ntr.w jmj.w 3bdw dj=sn prt-ḥrw...n...NN* (Durham N. 1932; Senwosret I, year 13)

*ḥtp dj nswt wsjrj...ḥtp dj jnpw...dj=f prt-ḥrw...n...NN* (Berlin 1192; Senwosret I, year 14)<sup>65</sup>

The two formulas are identically structured (except for the variation in number with *dj=f/sn*) and resemble closely the variants without *dj=f/sn* (type B). It makes no sense to me to interpret the last-mentioned gods as parts of the request, written in anticipatory emphasis, or to assume that *ḥtp dj* was placed after the god’s name. Only reading *ḥtp*

<sup>61</sup> *Egyptian Grammar*<sup>3</sup>, 171; compare Barta, *Opferformel*, 268.

<sup>62</sup> See the following example of stela Berlin 1192 and below after type E in the conclusion. Barta, *Opferformel*, 268, thought of exceptions and mistakes on the part of the scribes/sculptors.

<sup>63</sup> Of course, there are short, abridged formulas like *ḥtp dj nswt n NN*, ‘an offering which the king has given for’ NN, as on Louvre C7 from the reign of Amenemhet IV, or R. Engelbach and B. Gunn, *Harageh* (BSAE 28; London, 1923), pl. lxxiv, 2.

<sup>64</sup> Barta, *Opferformel*, 267 n. 1 (‘Lange-Schäfer, *Denksteine* I, p. 301’), adduced an early Thirteenth Dynasty example for a plural suffix-pronoun relating to a single god: Cairo CG 20286. The stela is very crudely made, but belongs to the output of a workshop where correct writings were used on its other stelae (see Cairo CG 20069, 20117, 20716; Franke, *Personendaten*, Dossier no. 735). The formula *ḥtp dj nswt wsjrj...dj=sn...* on Cairo CG 20286 is clearly a mistake. A second example is on stela Louvre C111 from Elephantine (unpublished).

<sup>65</sup> For both stelae see ANOC 31 (Simpson, *Terrace of the Great God*, pls. 48–9); Simpson, *Papyrus Reisner IV*, pls. 32–3; Obsomer, *Sesostris Ier*, 505, 533 (docs. 18, 29). The same type of formula occurs on stelae Leiden 3 (AP.7; Senwosret I, year 33), Cairo CG 20025 (Amenemhet II, year 20) and Glasgow Hunterian Museum D1922.13, ll. 5–6 (W. M. F. Petrie, *Tombs of the Courtiers and Oxyrhynchos* (BSAE 37; London, 1925), pl. xxiv) from the early Twelfth Dynasty.

*dj* before the god's name, as it was written by the Egyptians of the Middle Kingdom (i.e. without honorific transposition of the god's name), does justice to the examples: 'an offering which the king has given and Osiris..., an offering which Wepwawet...has given, an offering which Heqet and Khnum have given, and an offering which the gods of Abydos have given: may they give an invocation-offering...for...' NN. The translation is virtually the same as that given above for the version on BM EA 573 with a 'bare' *pri-hrw* (type B). Type E is attested also in the Thirteenth Dynasty, for example, on stela Louvre E20002 (ex Musée Guimet C12; ANOC 55), dating to the reigns of Neferhotep I and Sobekhotep IV, and on Cairo CG 20318 from Elkab/Hierakonpolis.<sup>66</sup>

Unfortunately, Barta, *Opferformel*, offers neither completeness and full references nor reliable dates for many of the Middle Kingdom monuments he uses. No diachronic study of the palaeography and phraseology of the offering formulas and the requests, chronologically restricted to one of the main periods of Egyptian history, exists except for Lapp's *Opferformel*. A case in point for such a more close-meshed study is the formula 'may he give water' (*dj=f mw...* is always singular). It had its heyday early in the Twelfth Dynasty<sup>67</sup> and experienced a revival in the late Twelfth Dynasty, around the reign of Amenemhet III.<sup>68</sup> The request for liquids is attested several times on offering-tables, where it seems very appropriate.<sup>69</sup>

<sup>66</sup> See, too, Engelbach and Gunn, *Harageh*, 29, pl. lxxiv, 3; Chicago OIM 8308 (W. M. F. Petrie and F. Ll. Griffith, *Abydos*, II (EEF 24; London, 1903), pl. xxix, upper right); Cairo CG 20544 from the second half of the Twelfth Dynasty; Turin cat. no. 1526 (Maspero, *RecTrav* 3, 119 [VII]), Vienna AS 91, and *htp dj nswt* (type II!) *pth-zkr wsrj htp dj r'w m sht-htp dj=sn t hnt n k3 nj* NN on a late Thirteenth or Sixteenth/Seventeenth Dynasty stela now at Trento, Museo Storico (W. v. Bissing, 'Eine Stele des Mittleren Reichs mit religiösem Text', *ZAS* 40 (1902-3), 118). An example for *htp dj* repeated without any request is on the early Thirteenth Dynasty naos BM EA 471 (*Hieroglyphic Texts* V, pl. 6), cited above.

<sup>67</sup> See Barta, *Opferformel*, on Bitte 25; Lapp, *Opferformel*, 95-6 §166; Lapp, *Typologie*, 216 §503; stelae BM EA 1660, EA 241; Cairo CG 20295, 20456, 20542, 20548, 20756, Leiden 6 (AP.64; Amenemhet II); Munich AS 33; Louvre C2, C19; stela Petrie, *Tombs of the Courtiers*, pl. xxvi, left; Zagreb 2 (ANOC 71, pl. 40); statue of Tetiemzaf (Cairo JE 40032: J. E. Quibell, *Excavations at Saqqara 1907-08* (Cairo, 1909), 113, pl. lviii, left side, l. 2 [Senwosret I]); statue of Wadjet at Khelua (E. Bresciani, 'L'attività archeologica dell'Università di Pisa in Egitto (1981): Fayum, Gurna, Saqqara', *EVO* 4 (1981), 8 fig. 4).

<sup>68</sup> On stelae Cairo CG 1481 (J. De Morgan, *Fouilles à Dahchour [I] Mars-Juin 1894* (Vienna, 1895), 39 fig. 80), 20346; San Bernardino, Harer Collection no. 43 (G. D. Scott III, *Temple, Tomb, and Dwelling: Egyptian Antiquities from the Harer Family Trust Collection* (R. V. Fullerton Museum of Art, California State University; San Bernardino, 1992), 87-8; Sotheby's New York, *Antiquities* (May 29th 1987), lot no. 29; c. Amenemhet III); BM EA 200; Berkeley Bt10 (H. F. Lutz, *Egyptian Tomb Steles and Offering Stones of the Museum of Anthropology and Ethnology of the University of California* (Leipzig, 1927), no. 77); Leicester 4 (K. Kitchen, 'Four Stelae in Leicester City Museum', *Or* 29 (1960), 92, pl. xxii); Leiden 41 (AP.69), 48 (AP.36); on statue Cairo CG 456 (c. Senwosret III/Amenemhet III). Also on late Twelfth Dynasty coffins, where it belongs to the request for a good burial on the back (west side), e.g. Cairo CG 28033 (G3: Lacau, *Sarcophages* I, 87), Cairo CG 28114 (G4) from Gebelein, Berlin 9 and 10 (T1Be and T2Be) from Thebes; see Lapp, *Typologie*, 190 §434, 192 §440, 170 §394, some more examples on 216 §503.

<sup>69</sup> Offering-tables from the early Twelfth Dynasty: Abdalla, *JEA* 78, 100 fig. 4, pl. xxi, and 104, fig. 6, pl. xxiii from Saqqara; Cairo CG 23056 and 23064 (Lisht; Senwosret I); offering-table of Snofru (A. Fakhry, *The Monuments of Sneferu at Dahshur*, II. *The Valley Temple*, Part II: *The Finds* (Cairo, 1961), 91 no. 17, fig. 427); Cairo CG 23006, 23019 (ANOC 13, pl. 23; Amenemhet II); Cairo JE 91220 (W. K. Simpson, *Inscribed Material from the Pennsylvania-Yale Excavations at Abydos* (PPYEE 6; New Haven and Philadelphia, 1995), 43-4 no. C15, fig. 72; also owner of stela Louvre C169); Peet, *The Cemeteries of Abydos* II, 121 no. 26, pl. xxiv, 1; Leiden

### Conclusion

The gods' names never became part of the king's formula because there is no convincing evidence for a dative construction at work that would make the god(s) the recipient(s) of the king's offerings. The gods' names are also never part of the request—already in 1991 that was the conclusion of Harco Willems in his study 'Food for the Dead', in Van Soldt (ed.), *Pap Uit Lemen Potten*. Accordingly, there was no change of meaning of the offering formula between the Old and Middle Kingdom, with or without the (*htp*) *dj* repeated, with or without the insertion of *dj=f/s/sn*. But there is a difference in spelling: the honorific transposition of the god's name (written before *htp dj*) is abandoned. The introduction of *dj=f/s/sn* that initiates the requests is certainly more than a variant. It is an innovation, a variation becoming a norm, but not necessarily the result of, and combined with, a new interpretation of the formula.

Even the number of the *dj*-form is no proof for a re-interpretation, as argued above. Quite often, a singular suffix-pronoun (*dj=f*) was used, when there was more than one god mentioned earlier in the god's formulas.<sup>70</sup> An example is from the ensemble called ANOC 7: on offering-table Cairo CG 23210, 'Ptah-Sokar-Osiris, may *he* give...' was invoked, but on stela Leiden 50 (L.XI.2) 'Ptah Sokar Osiris, may *they* give...'<sup>71</sup> On stela BM EA 197, *pth-zkr wsjrj nb ḥnh t3wj* is followed by *dj=sn*, 'may they give', and we are dealing with two gods, not the synthetic trinity Ptah-Sokar-Osiris. The same gods and the same epithet appear on stela Cairo CG 20434, but with *dj=f*, 'may he give', in this case as if a single god is meant.<sup>72</sup> The Egyptians were rather indecisive on this particular question.

In the middle register of stela BM EA 101 from the reign of Amenemhet III, above the offerings and the offering-table, are two significant short labels addressing explicitly Osiris as giver of the offerings. The first says 'Osiris, Wepwawet and the gods of Abydos: may he (*sic!*) give every good thing to/for the spirit of...Nebipu', and the one

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inv. no. AP.82 (ANOC 9; Franke, *Personendaten*, Dossier no. 535). Offering-tables from the late Twelfth Dynasty, c. reign of Amenemhet III: Cairo CG 23035 (ANOC 3, pl. 9); Hannover 1926.191 (M. Cramer, 'Ägyptische Denkmäler im Kestner-Museum zu Hannover', *ZÄS* 72 (1936), 89, pl. v, 2; New York MMA 22.1.107A + B (R. Hözl, *Ägyptische Opfertafeln und Kultbecken* (HÄB 45; Hildesheim, 2002), pl. 9, from Lisht); Moscow 33 (I.1.a.5339); W. M. F. Petrie, *Antaeopolis, The Tombs of Qau* (BSAE 51; London, 1930), pls. v, 4, xvii upper right (Qaw el-Kebir).

<sup>70</sup> See the examples in Willems, in Van Soldt (ed.), *Pap Uit Lemen Potten*, 105–7; coffin M1C; Cairo CG 20157, 20242, 20273, 20454, 20460, 20516, 20545, 20604, 20638, 20655, 20717, 20758; Los Angeles County Museum of Art 50.33.31 (R. O. Faulkner, 'The Stela of the Master-Sculptor Shen', *JEA* 38 (1952), 3–5, pl. i); miniature stela of Dedu (Simpson, *Inscribed Material*, 42–3 no. C13, fig. 70; Senwosret I); stela Glasgow D1922.13, ll. 5–6 (Petrie, *Tombs of the Courtiers*, pl. xxiv) from the early Twelfth Dynasty; offering-table Philadelphia UM E15413 (W. M. F. Petrie, G. Brunton and M. A. Murray, *Lahun, II. The Pyramid* (BSAE 33; London, 1920), pl. xxxvi, from tomb 906); stela Rio de Janeiro 2 (645 [2435]; Amenemhet IV); Louvre E20002 (ex Musée Guimet C12); Leiden F1939/2.48, Cairo CG 20642, and Florence 61 (see Marée, *OMRO* 73, 18–21). M. Marée, *OMRO* 73, 9 n. (e) and n. 15, thought of simple mistakes by careless sculptors, because otherwise the mention of more than one god would be senseless. I think the 'mistake' is systematic, and the favours requested are expected in these cases specifically from the last-mentioned (male) god, the last in the row of the gods who took part in the reversion of offerings.

<sup>71</sup> Simpson, *Terrace of the Great God*, pl. 16.

<sup>72</sup> See further on BM EA 903, or BM EA 242; J. Spiegel, *Die Götter von Abydos* (GOF IV/1; Wiesbaden, 1973), 20, 60; G. Lapp, 'Die Stelenkapelle des *Kmz* aus der 13. Dynastie', *MDAIK* 50 (1994), 235; Franke, *Heqaib*, 129 n. 386, and the contrary opinion of Barta, *Opferformel*, 267–8.









to its left: ‘An invocation-offering of Osiris’ giving (*pṛt-ḥrw m dd wsjrj*) for the spirit of the venerated one, Nebipusenwosret’.<sup>73</sup>

### The introduction of the recipient of the favours

The typical Old Kingdom offering formula introduces the recipient of the wishes requested by a simple preposition *n* or *n jm3ḥj*, ‘for the venerated, or blessed one’ (by the king/a god) NN. From the Sixth Dynasty, the phrase *n k3*, ‘for the *ka*-spirit’, was used in tomb relief, accompanying the presentation of offerings to the tomb’s owner as a kind of label.<sup>74</sup> ‘For your spirit’ (*n k3=k* or *n k3 nj jm3ḥj*) is found frequently on stelae of the Eleventh Dynasty as a kind of abbreviated recital of the giver of the offering in comparable offering scenes, while in the ‘standard’ offering formulas used in the main inscription, the recipient is still introduced by *n jm3ḥj* only.<sup>75</sup> These two different contexts should not be confused.

The phrase ‘for the spirit of’ (*n k3 nj*) NN to introduce the recipient of the invocation-offering and the pious requests did not find its place in the milieu of the offering formula of the main text on stelae before the late first decade of the reign of Senwosret I. Only about 37% of the stelae with offering formulas from Senwosret’s reign show the introduction of the recipient of the favours by ‘for the spirit of the venerated’ NN (e.g. Cairo CG 20024, 20518, 20516; Louvre C1, C3), and only one single stela (Louvre C2; i.e. 4%) has the bare ‘for the spirit of’ (*n k3 nj*) NN.<sup>76</sup>

### ‘Old and Middle Kingdom’ writing and ‘New Kingdom’ writing of *ḥtp dj nswt*

The graphic sequence of the hieroglyphic signs of the king’s formula in horizontal inscriptions changed gradually from the late Twelfth Dynasty to the early Seventeenth Dynasty. While most commonly written in a sequence *nswt* + *ḥtp* + *dj* (    ) (type I) from Old Kingdom times until the end of the Thirteenth Dynasty, the majority of the offering formulas in the New Kingdom show a sequence *nswt* + *dj* + *ḥtp* (    ) (type II). Pascal Vernus<sup>77</sup> has shown that this was not the result of a

<sup>73</sup> A. M. Blackman, ‘The Stela of Nebipusenwosret: British Museum No. 101’, *JEA* 21 (1935), 3, pl. i; R. Parkinson, *Voices from Ancient Egypt* (London, 1991), 140–1, e and f (no. 54).

<sup>74</sup> Tombs of Ankhmahor and Neferseshemtah at Saqqara (Capart, *Rue de tombeaux*, pls. 61, 98, 101; H. G. Fischer, *Dendera in the Third Millennium B.C.* (Locust Valley, 1968), 193), more examples: Lapp, *Opferformel*, 208 §355. See, too, in the Tenth Dynasty tombs at Assiut (*Siu* III, l. 59 and *Siu* IV, ll. 68, 83), and on the roughly contemporary coffins from Assiut (Lapp, *Typologie*, 215 §500).

<sup>75</sup> E.g. stelae Moscow 25 (I.1.a.1137), 26 (I.1.a.5603); Cairo CG 20543; Cairo T. 27.4.22.5; BM EA 614, EA 152; Turin cat. no. 1447. The presence of *n k3 nj* in these ‘labels’ should not be confused with its presence in the regular offering formula, as H. Selim, ‘An Eleventh Dynasty Stela in the Cairo Museum (Cairo Temp. 27.4.22.5)’, *MDAIK* 57 (2001), 265 n. (o), obviously did. *Contra* Selim, there is no room for his restoration \**n k3 nj jm3ḥw...* on Cairo T. 27.4.22.5, l. 7, but only for *n jm3ḥw...*

<sup>76</sup> A referee pointed out to me a further example, probably from the same reign: Cairo CG 20339. On stela Cairo CG 20026, *n k3 nj* is used in a formula to be recited by the priests who give offerings (Senwosret I, year 10).

<sup>77</sup> ‘Sur les graphies de la formule “L’offrande que donne le roi” au Moyen Empire et à la Deuxième Période Intermédiaire’, in S. Quirke (ed.), *Middle Kingdom Studies* (New Malden, 1991), 141–52. See, too, Barta, *Opferformel*, 261–2; Lapp, *Typologie*, 194 §444.

change in meaning of the offering formula. Two traditions of scribal custom co-existed in Egypt, one for the hieroglyphic monuments (on stone), and one for daily affairs and administration (in the hieratic script, predominantly on papyrus). There were constant interferences from one sphere into the other, but predominantly from the more living profane into the rather stagnant, more repetitive sacral tradition. Slowly, some features of the profane tradition, regularly suppressed by the decorum of court culture, influenced the standards of the sacral hieroglyphic script, at first only in rock inscriptions, then on non-royal monuments like stelae. Sometimes types I and II are even found side by side on one stela (e.g. Cairo CG 20043, 20160 and 20313).<sup>78</sup>

A special predilection of scribes, or a result of their inadvertence, became a fashion of growing popularity in the late Thirteenth or Sixteenth Dynasty, while other standards of court style in art and calligraphy were loosened as well, and a new standard eventually gained dominance. Obviously, it was only a variation, not a new interpretation of the formula, a shift of preference between the ‘early’ and the ‘later’ variants of writing the archaic formula.

This is a conclusion of some historical relevance. The change between type I and type II in horizontal inscriptions was completed, if ever, sometime (perhaps two generations) after the reign of King Khaneferre Sobekhotep IV (c. 1730 BC), and probably shortly after the reign of Merkawre Sobekhotep VII (c. 1665 BC). This date roughly coincides with the conquest of Northern Egypt by the Hyksos Fifteenth Dynasty and the beginning of Kim Ryholt’s Sixteenth or First Theban Dynasty (c. 1650–1570 BC), and it would fit well for monuments of this dynasty, which had lost access to the centres of cultural and artistic production in the Memphite region.<sup>79</sup>

Of course, it would be dangerous to date all monuments with an offering formula of type II simply and straightforwardly to the Sixteenth or Seventeenth Dynasty or to date all examples of type I before them, without considering other and additional features. There are clear examples from the late Thirteenth Dynasty, where both types co-existed side by side or on roughly contemporary stelae.<sup>80</sup> Generally speaking, palaeographic changes must not necessarily coincide with dynastic change. This means that most, but, of course, not necessarily all, of the stelae with the ‘late’ offering formula of type II should date to the final years of the Thirteenth and/or to the Sixteenth Dynasty or later.

### **Cultural change, dating criteria and the ‘method of Bennett–Satzinger’**

Finally, a general note on cultural change and dating stelae seems to be appropriate. Even scribal traditions and formulaic patterns are subject to development and change in a living culture, and were used by human beings with individual predilections, tastes and

<sup>78</sup> The ‘late’ spelling is clearly graphically more attractive when written vertically, and merely graphical reasons might have further encouraged a change of spelling.

<sup>79</sup> After Ryholt, *The Political Situation*, 159–60, 302–9. It is apparent that I try to avoid the label ‘Second Intermediate Period’ because of its relative vagueness. It does not coincide with Upper Egyptian dynastic divisions and is certainly not apt for most of the Thirteenth Dynasty; see the remarks of Vernus, in Quirke (ed.), *Middle Kingdom Studies*, 151–2.

<sup>80</sup> See Vernus, in Quirke (ed.), *Middle Kingdom Studies*, 145–8, e.g. on BM EA 220 and EA 226, but cancel EA 248 from Vernus’ examples. This means that a rigid ‘Smither’s rule’ (P. C. Smither, ‘The Writing of *hṫp-di-nsw* in the Middle and New Kingdoms’, *JEA* 25 (1939), 34–7) does not exist, but *grosso modo* a trend which is now chronologically newly defined.

abilities, capable of variation and innovation. Accordingly, it seems only natural that several trends and different degrees of changing features in different spheres of culture and for different classes of objects are to be observed. For example, tomb decoration seemed to have been a rather progressive, more inventive field for innovations in the early Middle Kingdom than coffin or stela decoration as far as certain formulas, like *n k3 nj*, or types of garment, like the male double kilt, are concerned. Several formulaic expressions and pictorial motifs, like the scene of the *sem*-priest acting or of individuals holding a flywhisk, are met in tomb decoration long before they appear on stela. These features found their way from the decoration programme of elite tombs into stela production. Only when the long tradition of decorated elite tombs began to cease in the late Twelfth Dynasty were artistic efforts concentrated on stela, and several new motifs were introduced by the artists to decorate their products. Certain features and formulas were rather resistant to changes due to the requirements of ritual, such as the basic elements of the offering formula. Others may have changed more easily, influenced, for example, by the practice of business scribes who wrote the hieratic script of the daily affairs, with different consequence and speed, and sometimes regionally differentiated, for different types of objects and texts, destined for above-ground or subterranean disposition, like tombs, coffins, canopic boxes, offering-tables, stela, statues, mirrors, furniture, *shabtis*, sealings, etc.<sup>81</sup> Features having long since become the norm on a class of objects might gradually, from exception and variant, become the norm on another class of objects. It is important for any diachronic study of typology, style or palaeography and phraseology to be aware of the fact that things could have evolved differently on different types of objects in different regions of Egypt. Everything is subject to change, but there is no automatism.

H. G. Fischer once wrote: 'Since a so-called first occurrence is, in any case, only the first we know of, and may be considerably later than the point at which it was actually introduced, the relative incidence of the criterion is of some importance'.<sup>82</sup> A good example might be the appearance of the two *wedjat*-eyes in the lunette of round-topped stela. The earliest more exactly datable examples are from the reign of Senwosret III.<sup>83</sup> However, stela Cairo CG 20606 is certainly even earlier, probably from about the reign of Amenemhet II. Thus, a pretended secure criterion for dating stela to the late Twelfth Dynasty is weakened. We have to reckon with the possibility that seemingly 'late' features existed earlier than their first dated occurrence, and that 'early' types existed also later as survivals, as an archaism or revival, but for dating purposes, the occurrence of a late feature should normally outweigh the earlier ones.<sup>84</sup>

This is meant as a warning. One-dimensional, one-sided criteria are dangerous for dating purposes. The seemingly objective, because statistical, system or method for

<sup>81</sup> See also on the topic of a different speed of change for graphic patterns between stela and sealings: W. Grajetzki, 'Der Schatzmeister Amenhotep und eine weitere Datierungshilfe für Denkmäler des Mittleren Reiches', *BSEG* 19 (1995), 10–11, and for the regional differences in contemporary coffin production the study of Lapp, *Typologie*.

<sup>82</sup> In R. Caminos and H. G. Fischer, *Ancient Egyptian Epigraphy and Palaeography* (New York, 1976), 47.

<sup>83</sup> Louvre E20350 (ex Musée Guimet C6, dated by Durham N. 1936) and Cairo CG 20296 (dated by Rio de Janeiro 1 (627 [2419])). The two eyes appear also in the upper part of stela Cairo CG 20686 of the naos-front type, dated to the reign of Senwosret III, year 15.

<sup>84</sup> Compare Fischer, in Caminos and Fischer, *Ancient Egyptian Epigraphy*, 39; id., 'Some Early Monuments from Busiris in the Egyptian Delta', in *Ancient Egypt in the Metropolitan Museum Journal, Volumes 1–11 [1968–1976]* (New York, 1977), 161 (reprint from *MMJ* 11 (1976), 5–24).

dating Middle Kingdom stelae developed by John Bennett<sup>85</sup> and refined later by Helmut Satzinger<sup>86</sup> clearly suffers from this drawback. It works only with variables of a single though nearly ubiquitous element, the offering formula, of a whole set of variable elements which constitute a stela, and its reliability and results are extremely dependent on the database at hand. Bennett's database was a conglomerate of dated stelae, several tombs, rock inscriptions, a few coffins and a single offering-table, but contained no statues and none of the many other objects inscribed with the offering formula. For dating stelae, only stelae should be assembled in the database. But even a 'cleared', improved and more up-to-date, enhanced database would not eliminate the disadvantages of the system.<sup>87</sup> These are three, in the main. (1) The division into three periods (Eleventh–early Twelfth–later Twelfth Dynasty) is rather wide-meshed and neglects possible regional differences. (2) Only the Eleventh and Twelfth Dynasties are covered, so any application of the method to the hundreds of stelae which were produced after the Twelfth Dynasty would lead to no or wrong results. (3) Wrong results, i.e. false dates, could also be due to other circumstances, such as imitation or copy, archaism or simple mistakes (such as a determinative forgotten) on the scribe/sculptor's part. Such systematic errors can only be detected by correlation with other criteria, features and motifs at hand. The ostensible objectivity of the method leads to objectively wrong results because the subjective element, the conscious and deliberately acting human being, was left out of consideration. There is no deliverance for the statistical method. Satzinger rightly has labelled it as a (rather inconvenient) 'crib',<sup>88</sup> and it should not be applied with confidence any longer by anyone studying Middle Kingdom stelae.

Formulas and phrases do not necessarily mirror changes in other spheres of society, not to speak of history or sociology. Only from the viewpoint of culture and its artefacts as complex entities may changes be observed and interpreted adequately by us at all.

<sup>85</sup> 'Growth of the *htp-di-nsw* Formula in the Middle Kingdom', *JEA* 27 (1941), 77–82; id., 'Motifs and Phrases on Funerary Stelae of the Later Middle Kingdom', *JEA* 44 (1958), 120–1.

<sup>86</sup> See Satzinger, *LingAeg* 5, 184–8.

<sup>87</sup> I have tried to work along the method of Bennett and Satzinger with new percentages from a database consisting exclusively of stelae, about 155 from the Twelfth Dynasty alone, 104 of them with offering formulas. Bennett's database were 121 offering formulas: 14 from the Eleventh, 102 from the Twelfth and only 5 from the Thirteenth Dynasty.

<sup>88</sup> *LingAeg* 5, 187, and he adduces stela Vienna ÄS 164 as an example for a wrong dating that resulted from the application of the method. Bennett's criteria are certainly indicative of formulaic and graphical changes of the offering formula. However, it is no exact method for dating but 'might help to date' stelae, as put forward by Bennett (*JEA* 27, 77). See also the statement by Spänel, in Der Manuelian (ed.), *Studies in Honor of W. K. Simpson* II, 767 n. 9.

# RITUAL FUNCTION AND PRIESTLY NARRATIVE: THE STELAE OF THE HIGH PRIEST OF OSIRIS, NEBWAYY\*

By ELIZABETH FROOD

Edition of British Museum stela EA 1199, which preserves a biography of Nebwawy, High Priest of Osiris in the reign of Thutmose III, with a new facsimile, translation, commentary, and discussion. Translations and commentaries are also provided for two other stelae attributed to Nebwawy now held in the Cairo Museum, one of which also bears a biographical text (CG 34018). The discussion centres on the treatment of time-frames and assesses the function of these in relation to priestly function and career in this life, as well as provision for the next world. EA 1199 provides perhaps the only narration of a role in the Osiris mysteries known from the Eighteenth Dynasty.

BRITISH Museum stela EA 1199 (fig. 1, pl. IV), belonging to the High Priest of Osiris, Nebwawy, of the reign of Thutmose III, is of unknown provenance, although internal evidence strongly suggests Abydos. The stela was first published by Wilhelm Spiegelberg, who saw it in a dealer's shop in Luxor.<sup>1</sup> Spiegelberg's hasty copy text formed the basis for Kurt Sethe's text in *Urkunden IV* and for his own translation and discussion of the text published in 1898.<sup>2</sup> The stela was registered in the British Museum in August 1897, having been purchased through the well-known dealer Mohammed Mohassib.<sup>3</sup> In 1906 Jean Capart published some corrections to Sethe's transcription as well as possible restorations of missing lines, as a result of his viewing of the stela in the Museum.<sup>4</sup> In 1922 a new drawing by H. R. Hall was included in *Hieroglyphic Texts from Egyptian Stelae, &c., in the British Museum VI*, improving considerably on the publications of Sethe and Spiegelberg.<sup>5</sup>

\* For permission to publish EA 1199, I am most grateful to Vivian Davies, Keeper of the Department of Ancient Egypt and Sudan, the British Museum. I would like to offer my thanks to Adel Mahmoud for his generous assistance while I was checking CG 34018 in the Egyptian Museum, Cairo. My particular thanks go to Richard Parkinson for his general and specific advice at every stage of the drawing, and for commenting on drafts of this text. John Baines discussed innumerable aspects of these texts with me. Dilwyn Jones checked the occurrence of the titles held by Nebwawy in his forthcoming index of New Kingdom titles and epithets, and offered input and advice. My sincere thanks to Jenny Cashman, Marcel Marée, Angela McDonald, and Neal Spencer for discussion. I should also like to thank the *JEA* referees for their comments.

<sup>1</sup> 'Varia', *RecTrav* 19 (1897), 97–100. Spiegelberg stated that he saw the stela 'im letzten Winter', probably the winter of 1896, one year prior to acquisition by the British Museum.

<sup>2</sup> 'Altes und Neues zur Geschichte der Thronstreitigkeiten unter der Nachfolgern Thutmosis I', *ZÄS* 36 (1898), 70–3; *Urk.* IV, 208–9.

<sup>3</sup> Richard Parkinson very kindly undertook research on the acquisition history of EA 1199. As he observes, a great number of objects passed through the hands of Mohassib, many of which came from outside the Theban area. The appearance of the stela in the shop of a Luxor dealer does not, therefore, point to any particular provenance.

<sup>4</sup> 'Stèle de Nebuau', *ZÄS* 43 (1906), 162.

<sup>5</sup> Pl. xlvi. Henceforth *HT VI*.

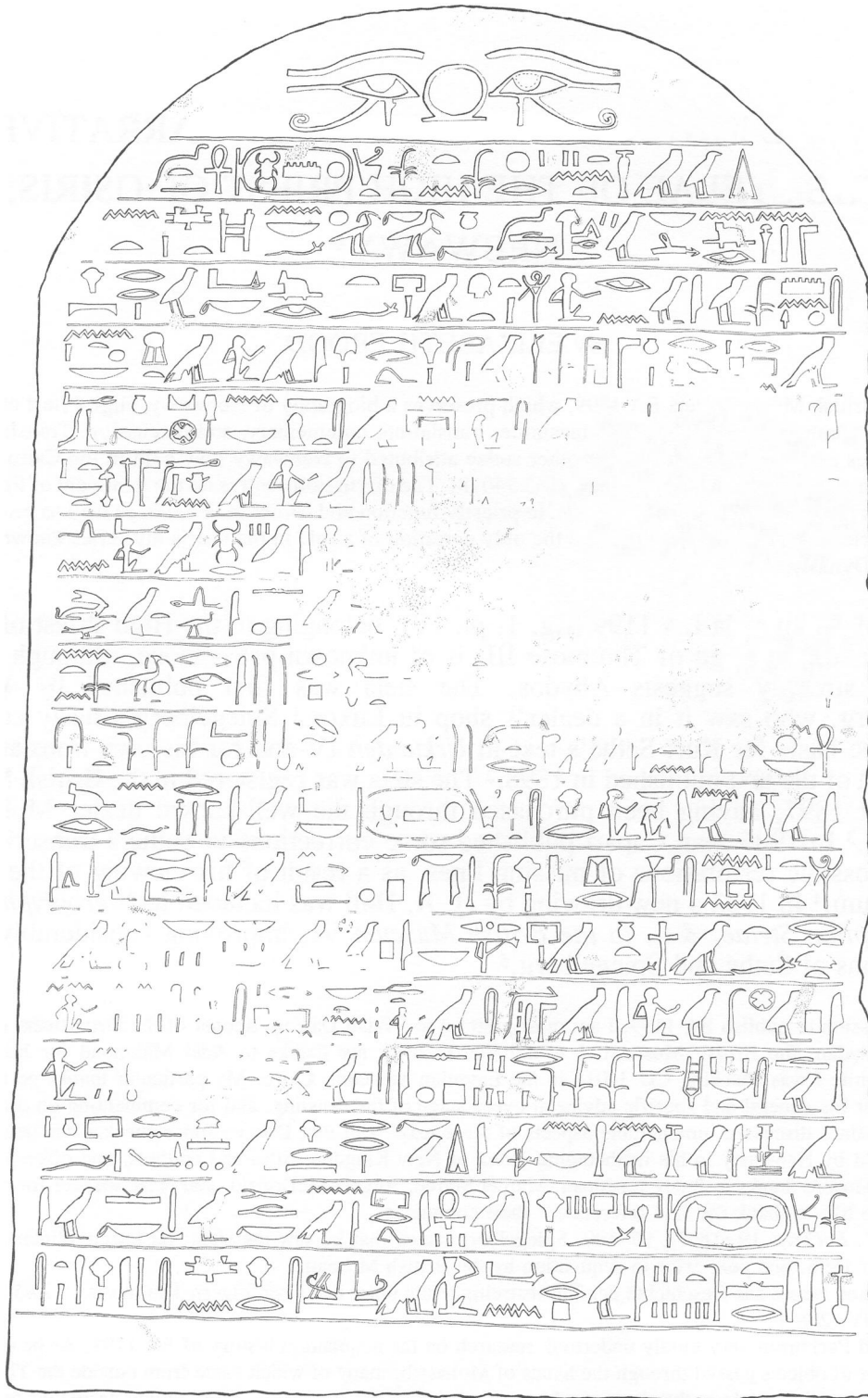


FIG. 1. British Museum EA 1199. Stela of the High Priest of Osiris, Nebwawy.

In his brief discussion, Spiegelberg noted that the stela was connected with another biographical stela of a High Priest of Osiris, Nebwawy (CG 34018; pl. V), that had been discovered at Abydos during the excavations of Auguste Mariette. Mariette recorded in his *Catalogue général des monuments d'Abydos* that that stela had been found, along with a second one belonging to the same individual (CG 34017; pl. VI, 1), in a chamber in the northern enclosure of Kom es-Sultan.<sup>6</sup> These two stelae are now held in the Cairo Museum. Prior to the appearance of Mariette's *Catalogue*, Samuel Birch published the text of CG 34018 with very brief notes and discussion, as did Eugène Revillout.<sup>7</sup> Translations of both CG 34018 and EA 1199 were published by James Henry Breasted, who assumed that the two belonged to the same individual.<sup>8</sup> Sethe, however, concluded that CG 34018 must belong to a descendant of the owner of EA 1199.<sup>9</sup> His argument for different ownership rested largely on the interpretation of the time designations in EA 1199. He believed that the time-frames between the two were too great for the lifetime of one person. In this article I offer an understanding of the year counts in EA 1199 that resolves this perceived discrepancy.

Subtle differences in design and orthography could also be used to argue against single ownership. Visually, the two biographical stelae are very similar, although the smaller size of the Cairo stela and the use of an inscribed border give it a slightly different appearance. There are also differences in the formation of some signs, for example, the seated man (Gardiner Sign List A1), which has a distinctly rounded 'rear' arm in CG 34018, in contrast to the angular arms on the British Museum stela. The orthography of the first person singular suffix pronoun also shifts in EA 1199 from the seated man to the reed leaf, while in CG 34018 it is written consistently with the seated man. The textual content of CG 34018 is more conventional and its production may have been easier to plan, while the reed leaf may have been used in EA 1199 as the designer became aware of space problems, which are also visible in the composition of other sign groups in the latter half of the text.<sup>10</sup> Such differences are not great and may relate to different dates of production or designers. I conclude that CG 34018 belonged to the same high priest who commissioned EA 1199. It is possible that EA 1199 also came from the same chamber at Abydos, which may have formed the surface part of Nebwawy's tomb.

The necropolis site designated Kom es-Sultan by Mariette is situated to the north-east of the Osiris temple enclosure.<sup>11</sup> Kom es-Sultan is generally associated with high status

<sup>6</sup> *Catalogue général des monuments d'Abydos découverts pendant les fouilles de cette ville* (Paris, 1880), 377, 381–2, with A. Mariette, *Abydos, description des fouilles exécutées sur l'emplacement de cette ville* (Paris, 1869), II, pl. 33; *Urk.* IV, 1494, 4–1495, 18.

<sup>7</sup> S. Birch, 'Tablet of the Reign of Thothmes III', *ZÄS* 14 (1876), 4–7; E. Revillout, 'Les réformes et les rêves d'un roi philanthrope', *Revue Egyptologique* 8 (1898), 132–3.

<sup>8</sup> *Ancient Records of Egypt: Historical Documents from the Earliest Times to the Persian Conquest* (Chicago, 1906), II, 72–5 (henceforth BAR II). Breasted erroneously referred to the British Museum stela as a statue.

<sup>9</sup> *Urk.* IV, 210, 1–10. See also PM V, 51, n.1.

<sup>10</sup> See EA 1199, commentary notes (m) and (o). The use of the reed leaf in EA 1199 may also relate to textual content. It appears first in line 8, in a negative declaration. However, it could have occurred earlier in a destroyed area, so this point is hypothetical. Although CG 34018 may have been easier to plan, it appears as crowded in its lower half as EA 1199.

<sup>11</sup> Mariette, *Abydos* II, 30–2; B. J. Kemp and R. S. Merrilees, *Minoan Pottery in Second Millenium Egypt* (Mainz, 1980), fig. 36, 287–9. See also W. K. Simpson, *The Terrace of the Great God at Abydos: the Offering Chapels of Dynasties 12 and 13* (Publications of the Pennsylvania–Yale Expedition to Egypt 5; New Haven, 1974), 6–10, on Mariette's work in the area.

burials of the Early Dynastic period and the Old Kingdom.<sup>12</sup> Its status in the New Kingdom is unknown; Mariette, however, found only one other Eighteenth Dynasty stela there.<sup>13</sup> If this was the site of the High Priest's tomb, its presence may not only signal Nebwawy's status and intimacy with the god through location within the temple enclosure, but also his connection with ancient Abydene traditions, a connection that is also mobilized in his texts. Disturbance to the area noted by Mariette suggests that EA 1199 had been moved from the tomb chamber at some point prior to his discovery and may have lain exposed for a long time.

Both CG 34018 and EA 1199 are round-topped limestone stelae. CG 34018 is slightly smaller.<sup>14</sup> The lunette of each contains a pair of *wedjat*-eyes on either side of a *shen*-ring, an iconographic motif familiar from Middle Kingdom Abydos stelae.<sup>15</sup> The body of each stela is filled with horizontal lines of text and there are no further iconographic elements. EA 1199 has eighteen lines of deeply carved inscription with lighter register lines; the Cairo stela has twenty lines.

The photograph published by Lacau (reproduced here, pl. V), shows that CG 34018 was found in excellent condition; my own examination of the object in the Egyptian Museum, Cairo confirms that the entire text is clearly visible with only minimal, superficial damage to the surface. This can be contrasted with the poor condition of EA 1199 which has suffered significant wear on the upper right and lower left surface. These areas are smoothly worn down and, as indicated on the photograph and line drawing, nothing remains of the inscription in some places. Spiegelberg's copy shows that this damage had occurred before the stela arrived in the dealer's shop. The worn areas have a high surface polish, as does the whole stela, indicating sustained surface wear that may be consistent with use as a step or seat. The limestone is marked by a number of inclusions and veins, one of the latter running diagonally across the surface of the stela and resembling a crack. There are no visible remains of paint, although some signs contain traces of dirt and a white substance resembling gypsum.

The third object generally attributed to Nebwawy is CG 34017 (pl. VI, 1), a rectangular limestone stela half the size of the two biographical stelae.<sup>16</sup> CG 34017 belongs iconographically to a distinctive group of New Kingdom objects.<sup>17</sup> The central

<sup>12</sup> B. J. Kemp, 'Abydos', *LÄ* I, 34–5. It was interpreted as a high status cemetery by Mariette on the basis of the owners of the objects found there: *Abydos* II, 31. For the summary of objects, see PM V, 50–2.

<sup>13</sup> *Catalogue général*, 375, no. 1047. The most recent mention of archaeological re-investigation of Kom es-Sultan known to me is D. O'Connor, 'Abydos and the University Museum: 1898–1969', *Expedition* 12/1 (1969), 39.

<sup>14</sup> EA 1199 is 85.5 cm high and 54 cm wide. Mariette stated that CG 34018 is 84 cm by 49 cm in his *Catalogue général*, 381, but P. Lacau, *Stèles du Nouvel Empire, Nos 34001–34064* (CG; Cairo, 1909), I, 37, gave measurements of 80 cm by 47 cm, closer to the measurements given by Mariette in his earlier publication, *Abydos* II, pl. 33. I was unable to measure CG 34018 myself.

<sup>15</sup> Simpson, *Terrace*, e.g. pl. 19 ANOC 10.3; pl. 25, ANOC 16.2; pl. 27, ANOC 17.2; pl. 28, ANOC 18.1. The motif was also incorporated into stelae in Eighteenth Dynasty Theban tombs, occasionally alone and often as a component of other scenes: A. Hermann, *Die Stelen der thebanischen Felsgräber der 18. Dynastie* (ÄF 11; Glückstadt, 1940), 41–2; M. Muhammed, *The Development of the Funerary Beliefs and Practices Displayed in the Private Tombs of the New Kingdom at Thebes* (Cairo, 1966), 43.

<sup>16</sup> Lacau, *Stèles* I, 36; *Urk.* IV, 1496, 1–8. Lacau's measurements of 43 cm by 26 cm are consistent with Mariette's in *Abydos* II, pl. 33 and *Catalogue général*, 377. I was not able to check this stela in Cairo.

<sup>17</sup> D. Wildung, 'Zwei Stelen aus Hatschepsuts Frühzeit', *Festschrift zum 150jährigen Bestehen des Berliner Ägyptischen Museums* (Mitteilungen aus der Ägyptischen Sammlung 8; Berlin, 1974), 255–68. The pillar motif is also known in later royal contexts, for example, Mariette, *Abydos* I, pl. 16.







scene is framed by a winged disc, with bands of text on the sides and at the base. The scene depicts a column topped with a Hathor head wearing the goddess's characteristic wig and a complex *atef*-crown that incorporates two uraei with sun-discs on the upper level, and uraei with white crowns on the lower level. At the base of the column stand two figures of a striding king, with a cartouche reading *mn-hpr-r*<sup>c</sup> above the head of each. Both figures wear a red crown, collar, short kilt, and tail, and reach out to embrace the column with the visible outer arm. The unusual Hathoric iconography and its connection with the textual references to Heqet deserve a detailed treatment that would break the bounds of this article.<sup>18</sup>

Although I include CG 34017 in the corpus of objects associated with the High Priest and provide a translation of its texts, it is possible that the stela was not dedicated for the Nebwawy of EA 1199 and CG 34018. The Nebwawy of CG 34017 does not bear the title of High Priest. Moreover, Lacau noted in his later publication of the two Cairo stelae that CG 34017 was found in April of 1858 and CG 34018 in September of 1859.<sup>19</sup> If this is correct, it is possible that the two stelae were not found in the same chamber and perhaps did not belong to the same individual. If they did come from the same chamber, CG 34017 may belong to an associate or relative of the High Priest.<sup>20</sup> Despite these considerations, I think it likely that CG 34017 belonged to the same Nebwawy who owned the two stelae that are my principal focus.

My discussion centres on the biographical texts inscribed on CG 34018 and EA 1199. Stela EA 1199 is important for its unusual narrative structures and motifs, and for the details it gives of priestly responsibilities at Abydos. Its narrative can be read as continuing onto CG 34018. Neither object has been fully edited, while use of the texts in discussions of the chronology of the early Eighteenth Dynasty has not always been well informed.<sup>21</sup> The facsimile drawing of EA 1199 in figure 1 presents improved readings of parts of the more damaged areas of the stela; epigraphic notes are given below. The photograph in plate IV is from the British Museum's archival negative. I have collated the texts of CG 34017 against the photograph of Lacau, which is reproduced in plate VI, 1, while Helck's text of CG 34018 was checked against the original on display in the Egyptian Museum, Cairo. A rendering of the texts in metrical transcription, translation, and commentary precedes the discussions.

#### *EA 1199: Notes to the facsimile*

line 1. A nodule in the stone required the artist to move the third plural stroke of *hst* further to the right. Traces of the first attempt at carving are still visible.



line 4. Following Hall, I read *jdnw* instead of Capart's queried . The traces beneath the ear and pot sign are uncertain and it is possible to read either  or . Neither sign would alter the reading, although  would be preferable.

<sup>18</sup> For imagery connecting Hathor *sistra* and frog groups, see G. Pinch, *Votive Offerings to Hathor* (Oxford, 1993), 193–5, and F. Daumas, *Les mammisis de Dendera* (Cairo, 1959), pl. lxi.

<sup>19</sup> Lacau, *Stèles I*, 36–8, pl. xi.



<sup>20</sup> The horizontal line at the base of the stela reads: 'Made by the dyer of *jns*-linen for Osiris, the scribe Menkheper', indicating that the stela was dedicated to this Nebwawy by another individual.






<sup>21</sup> For example, D. B. Redford, 'On the Chronology of the Egyptian Eighteenth Dynasty', *JNES* 25 (1966), 118–19. See my discussion below.






line 5. I can confirm Hall's reading of  at the start of the line. Traces of the back of a bird's head and horizontal lines can also be seen at points along the line that correspond to the spacing required for Sethe's and Capart's restoration of *jr.n.j s3-mr.f*. The sign above the seated god is very narrow and I see no trace of the legs that Hall recorded. It is possible to confirm , which is appropriate to the reading as *sšm*. See commentary note (e).

line 6. The trace visible at the beginning of the line is consistent with the form of an arm. This would confirm Sethe's and Capart's restoration. Traces of a seated man before *w<sup>c</sup>b* are clear, possibly corresponding to Capart's restoration of *sm*.

line 8. My reading of this line confirms Hall's:  . Nothing is certain prior to this.

line 9. Traces of the base of a reed leaf begin this line. Nothing more is certain before *h3t*, except a clearly carved .  is certain in *h3tj*.

line 10. My reading of this line is largely consistent with Hall's. *nh* and *nb* are certain; the seated figure following *nb* is probably , although the upper part of the body is no longer visible. Following the reed leaf, I confirm Hall's *dd*, although only the head of , is visible. Beneath *dd*,  is certain although missed by Hall. The reed leaf is followed by a bird sign whose body is consistent with this text's form of *m*. The figure of Maat is certain; her feather is clearly visible. Despite damage, the  of *mtr* is certain, as is the seated figure which follows. Although the position of the hands is no longer visible,  would be expected (*Wb*. II, 172–3). The shape of the head of the bird that follows indicates an *m*. The next group is clearly *wnn*; the double *n* is certain, although missed by Hall.

line 15. Little can be recovered from the worn section of this line. Capart read  , but although this would also be appropriate to the context, Hall's reading of  seems certain. The  is also certain and traces indicate the tail and beak of the  that was visible to Hall. A restoration of *jrt* seems most appropriate to the context and may be supported by the trace of a line. The reading of the agent of the passive, *jn*, is supported by the traces of *n* above *mjty*.

## Texts

### *EA 1199 translation*

<sup>1</sup>*djw m-hswt nt-hr-nswt  
nswt-bjty (mn-hpr-r<sup>c</sup>)*

Given as a favour by the king;  
the Dual King, Menkheperre,

<sup>ε</sup>nh dt

<sup>2</sup>n-<sup>h</sup>m-ntr-tpy n-wsjr  
nb-w<sup>ε</sup>-wy m<sup>3</sup><sup>ε</sup>-<sup>h</sup>rw

may he live forever,<sup>a</sup>  
for the High Priest of Osiris,  
Nebwawy, true of voice.

<sup>dd</sup>.f-jnk-b<sup>3</sup>k <sup>3</sup>h n-nb.f  
<sup>mdd</sup>-w<sup>3</sup>t nt-<sup>3</sup>smnh-sw  
jw-jr.n.j-j<sup>3</sup>wt-tp<sup>t</sup> m-pr-jt.f-wsjr

He says: I am a servant, one effective for his lord,  
who cleaves to the way of the one who advanced him.<sup>b</sup>  
I performed (my) first office in the domain of his  
father, Osiris,  
being appointed to (the position of) Chief speaker  
of this temple,  
to Deputy of the temple.<sup>c</sup>

<sup>dj</sup>.kw r-r-<sup>h</sup>ry <sup>4</sup>m-r-pr-pn

r-jdnw nw-<sup>h</sup>wt-ntr

A royal commission came before me  
in the course of every day;  
[I acted as His Beloved Son]<sup>d</sup> in the ritual of the  
mansion of gold,<sup>e</sup>  
in the mysteries of the lord of Abydos.

<sup>w</sup>d-nswt <sup>h</sup>r-spr tp-jm.j  
m-<sup>h</sup>rt-hrw nt-r<sup>ε</sup>-nb  
<sup>5</sup>jw-[jr.n.j-s<sup>3</sup>-mr.f] m-s<sup>š</sup>m n-<sup>h</sup>wt-nbw

I am one who presents<sup>f</sup> [hands in adorning the  
god,  
a *sem*-priest] pure of fingers.

m-s<sup>š</sup>t<sup>3</sup> n-nb-<sup>3</sup>bdw  
jnk-<sup>ε</sup>b<sup>3</sup>-<sup>6</sup>[<sup>ε</sup>wy m-<sup>sh</sup>kr-ntr

sm] w<sup>ε</sup>b-d<sup>b</sup><sup>ε</sup>w

I was a confidant of the perfect god,  
every craft [... ..] my [...],  
it occurred because of me,<sup>g</sup>  
without [... ..]  
no misdeed of mine emerged, no fault of mine  
was found.<sup>h</sup>

<sup>9</sup>[c. 7 groups lost]-<sup>h</sup>3tj  
<sup>h</sup>rp-d<sup>b</sup><sup>ε</sup>w.j r-jrt-<sup>3</sup>ht n-nswt

[... ..] the heart,  
which guides my fingers to do what is beneficial  
for the king,

<sup>10</sup><sup>ε</sup>nh-nb.j <sup>dd</sup>.n.j m-m<sup>3</sup><sup>ε</sup>t

As my lord lives (for me) I have spoken  
truthfully,

mtr m-wnn-nfr  
<sup>ε</sup>h<sup>ε</sup>w-nn r-rnpt-11

(as) one who bears witness for Wenennefer;  
the span of these (events) was 11 years.

<sup>11</sup>jw-<sup>h</sup>s.n-wj nb.j-<sup>h</sup>r.s  
nswt-bjty (mn-<sup>h</sup>pr-r<sup>ε</sup>)  
rdj.kw r-<sup>h</sup>m-ntr-tpy  
n-jt.f wsjr  
<sup>12</sup>j<sup>3</sup>t-nbt nt-pr-pn  
<sup>sw</sup>d <sup>h</sup>r-st-<sup>h</sup>r-<sup>h</sup>m-nswt

My lord favoured me on account of it,  
the Dual King Menkheperre.  
I was appointed to (the position of) High Priest  
of his father Osiris,  
every office of this domain  
being entrusted under the authority of the royal  
servant.<sup>i</sup>

ky-sp n-rdjt m-<sup>h</sup>r.j  
r-rdjt-wd<sup>3</sup>.j <sup>13</sup>r-<sup>h</sup>t-jt.f <sup>h</sup>r-nd-jt.f

I was instructed a further time  
to cause that I go out, in order to make his father,  
Harendotes, appear,

*m-pr-mnw nb-jpw*  
*m-hbw.f-nbw hpr m-<sup>14</sup>jpw*  
*tj-wj-jm jmy-r-hmw-ntr smdt-nbt-*  
*r-pr-pn*  
*smj.sn-n.j <sup>15</sup>mdw.s(n)-nbt*

in the domain of Min, lord of Akhmim,  
 in all his festivals occurring in Akhmim,<sup>j</sup>  
 while I was there (as) Overseer of all the  
 priests and service staff of this chapel;<sup>k</sup>  
 they reported all their matters to me.

*h<sup>c</sup>w-nn r-rnpt-6*  
*sp-js-pw n-p<sup>3</sup>.tw [jrt]*  
*[j]n-mjty.j <sup>16</sup>m-t<sup>3</sup>-wr*

The span of these (events) was 6 years.  
 This is a deed that was never [achieved]<sup>l</sup>  
 by my equal in the Thinite nome.

*jw-hs.n-w(j) hm n-nb.j*  
*dj.kw r-r-hry m-h<sup>c</sup>-mnw*

The Person of my lord favoured me.  
 I was appointed<sup>m</sup> to (the position of) Chief  
 speaker of *h<sup>c</sup>-mnw<sup>n</sup>*

*r-sdsr-pr n-jt.f*  
<sup>17</sup>*nswt-bjty(nb-ph(ty)-r<sup>c</sup>)*  
*prw-hd.f hr-db<sup>c</sup>wt.j pr.n.j-jm*

in order to sanctify<sup>o</sup> the domain of his father,  
 the Dual King, Nebpehtyre;  
 his treasures were under my seal and I came out  
 from there,

*d.kw wd<sup>3</sup>.kw <sup>18</sup>nfryt-r-rnpt-9*

prosperous and flourishing,<sup>p</sup> for up to 9 years.<sup>q</sup>

*jw-hrp.n(.j)-k<sup>3</sup>t m-nšmt*  
*shr.n(.j)-sbj hr-hmt.s*

(I) directed the work on the *neshmet*-barque,<sup>r</sup>  
 and repulsed the one who rebelled against its  
 Person.<sup>s</sup>

### EA 1199 notes to translation

(a) This dedicatory formula is a variation of one common on Eighteenth Dynasty non-royal temple statues: *Wb.* III, 158, 7; H. Guksch, *Königsdienst: zur Selbstdarstellung der Beamten in der 18. Dynastie* (SAGA 11; Heidelberg, 1994), 169, (057) 01. The closest parallel for use on a stela is the Seventeenth Dynasty judicial stela from Karnak: W. Helck, *Historisch-biographische Texte der 2. Zwischenzeit und neue Texte der 18. Dynastie* (Wiesbaden, 1975), 65, 1.

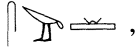
(b) Guksch, *Königsdienst*, 205–6, (087) 01–5, cites only six Eighteenth Dynasty examples of this common Middle Kingdom epithet: J. M. A. Janssen, *De traditioneele egyptische autobiografie vóór het Nieuwe Rijk* (Leiden, 1946), I, 70–1, Bc 1–31. These concentrate among texts of Thutmose III's inner elite, suggesting that it was part of a loyalistic, and archaizing, vocabulary centred on that king.


(c) My reading is based on a parallel use of *j<sup>3</sup>wt tpt* in the tomb biography of Sennefer, Overseer of the gold lands under Thutmose III: *Urk.* IV, 530, 1. Here it marks Sennefer's first official appointment. *j<sup>3</sup>wt 2-nw* and *j<sup>3</sup>wt 3-nw* occur at later points in the narrative, indicating that the phrase refers to the first of a series of promotions.


The rare title *r-hry* seems to refer to general responsibility rather than a specific office or function. In Nebwawy's text *r-hry* shifts from being linked with his role as Deputy in the temple in this verse to his area of responsibility as High Priest (l. 16). P. Dorman, *The Monuments of Senenmut: Problems in Historical Methodology* (London, 1988), 116–18, compares this flexibility of use in Nebwawy's text with the occurrence of the title in texts of Senenmut, concluding that it indicates a general supervisory role rather than being an office with specific functions. In texts of the Nineteenth Dynasty High Priests of Amun, the title is linked with their appointment to that office: 'You are the High Priest of Amun; his treasures and granaries are under your seal. You are the Chief of his temple (*r-hry n r-pr*); all his foundations are under your authority': Nebwenenef (temp. Ramesses II), *KRI* III, 283, 5; compare Roma-Roy, *KRI* IV, 209, 9; *r-hry wr*, *KRI* IV, 130, 3. There too the title may indicate general authority complementary to the specific office and function of High Priest.

I know of no parallel for the title Deputy of the temple (*jdnw nw hwt-ntr*). It is perhaps equivalent to the title *hm-ntr 2-nw* in the hierarchy of the Amun priesthood: *KRI* III, 295, 13; 298, 5; IV, 130, 7; 131, 1; 209, 8.

(d) Sethe's and Capart's proposed restoration of lines 5 and 6 (see also notes to the facsimile) was based on epithets concerning function in the Osiris mysteries known from the Middle Kingdom stelae of Mentuhotep (CG 20539: H. O. Lange and H. Schäfer, *Grab- und Denksteine des Mittleren Reiches* (CG; Berlin, 1908), II, 155, 7–10) and Sehetepibre (CG 20538: *ibid.* II, 148, 3–7). So far as I know, Nebwawy's biography is the only Eighteenth Dynasty non-royal use of the narrative motif of the Osiris mysteries; compare the ritualized secrecy of the king's actions in provisioning the Abydos temple in the stela of Thutmose I: *Urk.* IV, 94–103 (see discussion below).

(e) I am reading against the determinative of *sšm* here. In the parallel phrase in the stela of Sehetepibre *sšm* is written , which H. Schäfer rendered as 'bei der Leitung des "Goldhauses"' (*Die Mysterien des Osiris in Abydos unter König Sesostris III nach dem Denkstein des Oberschatzmeisters I-Cher-Nofret im Berliner Museum*, (UGAA 4/2: Leipzig, 1904), 59). *sšm* can alternatively be translated as 'procedure' (*Wb.* IV, 285–7). The rendering as 'ritual' seems appropriate to the context, the *hwt-nbw* being a place of transformation of the cult image or emblem of Osiris as part of the ritual of the Osiris mysteries; see the Thirteenth Dynasty inscription of Neferhotep I (Helck, *Historisch-biographische Texte*, 25, 1. 19, and see the discussion by R. Anthes, 'Die Berichte des Ichernofret und des Neferhotep über das Osirisfest in Abydos', *Festschrift zum 150jährigen Bestehen des Berliner Ägyptischen Museums*, 33–5). An alternative understanding as 'statue, cult image' is suggested by the determinative (*Wb.* IV, 291) but is not easily supported by

the prepositions. *sšm*, , is first attested as a term for 'cult image' in the early New Kingdom, particularly in the underworld books: E. Hornung, 'Der Mensch als "Bild Gottes" in Ägypten', in O. Loretz (ed.), *Die Gottebenbildlichkeit des Menschen* (Munich, 1967), 139–41.

(f) These lines have been restored in my transliteration and translation. If Nebwawy's text continues here to draw on the phraseology known from the stelae of Mentuhotep (Lange and Schäfer, *Grab- und Denksteine* II, 155, 10) and Sehetepibre (*ibid.* II, 148, 7), this word should read *ḥb*, 'to present (the hands)' (*Wb.* I, 177, 2–3). The determinative  could be influenced by *ḥb*, 'to praise, boast' (*Wb.* I, 177, 16–22). Such a word does not, however, seem to fit the context. The epithet 'pure of fingers' in line 6 is also consistent with the sequencing of the phraseology in the Middle Kingdom stelae.

(g) The negative morpheme that follows seems to begin a series of negative declarations. For the increasing play between positive statements of right action and negative declarations in Eighteenth Dynasty biographical texts, see M. Lichtheim, *Maat in Egyptian Autobiographies and Related Studies* (OBO 120; Freiburg etc., 1992), 114–33.

(h) There are parallels for the pairing of these negative declarations in the contemporaneous Theban tomb inscriptions of Nebamun (*Urk.* IV, 151, 2–3) and Benya (H. Guksch, *Das Grab des Benya, gen. Paheqamen. Theben Nr. 343* (AVDAIK 7; Mainz, 1978), 22, fig. 9a, 10–11; *Urk.* IV, 1470, 11–13).

(i) *Wb.* III, 87, 18, records *hm nsw* in this text as a replacement for 'me/my (authority)', comparable to *b3k jm*. This strategy of referring to one's self in the third person by title has a parallel in the biography of the military officer, Amenemhab, whose narrative concludes, after recording the speech of Amenhotep II in which he was made Deputy of the army: 'Then the Deputy Mahu acted according to all that he said' (*Urk.* IV, 897, 17).

(j) Nebwawy's role here is as processional leader, bringing the image of the god out (*pr*) from the temple. The identification of Min with Harendotes is known from a number of sources, including Chapter 17 of the Book of the Dead: E. Naville, *Das ägyptische Todtenbuch der XVIII. bis XX.*

*Dynastie* (Berlin, 1886), I, pl. 23, l. 15; H. Kees, *Der Götterglaube im alten Ägypten* (MVÄG 45; Leipzig, 1956 (1941)), 199–200; J. Spiegel, *Die Götter von Abydos: Studien zum ägyptischen Synkretismus* (GOF 1; Wiesbaden, 1973), 66–77. Min of Akhmim was particularly associated with this victorious aspect of Horus; see P. Vernus, ‘Deux statues du Moyen Empire’, *BIFAO* 74 (1974), 153–5. The procession of Min is included among a list of processions and ritual ceremonies, some of which are components of the Osiris mysteries, in the Munich stela of the Chief *wab*-priest, Wepwawetaa (temp. Senwosret I–Amenemhat II): Sethe, *Les.* 73, 19; M. Lichtheim, *Ancient Egyptian Autobiographies Chiefly of the Middle Kingdom: a Study and an Anthology* (OBO 84; Freiburg etc., 1988), 77–80.

For archaeological evidence for the Eighteenth Dynasty pre-Amarna presence at Akhmim, see K. P. Kuhlmann, *Materialien zur Archäologie und Geschichte des Raumes von Achmim* (SDAIK 11; Mainz, 1983), 22–3.

(k) Care for service staff is also a motif of the biographical texts of the Nineteenth Dynasty High Priests of Amun: *KRI* III 296, 6–7; 298, 7.

(l) *sp* looks back to and frames the action of this stanza which was introduced in line 12.

(m) The orthography of the stative here may be a space-saving or compositional device; compare lines 3 and 11.

(n) As noted by S. Harvey, *The Cults of King Ahmose at Abydos* (PhD dissertation, University of Pennsylvania, 1998), 124–5, this occurrence of *ḥ<sup>c</sup>-mnw* in this text is the only known use of a geographical term in connection with the mortuary complex of Ahmose at Abydos. Harvey considers that the name may refer to the pyramid complex of that king, through parallel use of *ḥ<sup>c</sup>-compounds* in the names of Old and Middle Kingdom pyramid complexes. The name may alternatively refer to the whole cluster of his monuments in South Abydos.

(o) The unusual arrangement of the signs here may be a space-saving device. The stroke goes with the house sign. *sdsr* is often written without a determinative (*Wb.* III, 194).

The sanctification or consecration (*sdsr*) of newly built or restored temples is frequently mentioned as performed by kings, particularly for temples that had fallen into ruin: *Urk.* IV, 101, 17–102, 3 (Thutmose I); 386, 10–11 (Hatshepsut); and see also J. K. Hoffmeier, *Sacred in the Vocabulary of Ancient Egypt: the Term DSR, with Special Reference to Dynasties I–XX* (OBO 59; Göttingen, 1985), 150–5, 158 (this text). In his similar use of *sdsr*, Nebwawy claims a central role in restoring the mortuary cult of Ahmose. Thutmose III’s Abydos stela shows that this was part of an overall programme to reorganise and regulate cults at Abydos (*Urk.* IV, 203–7): compare with the Abydos stela of Thutmose I, *Urk.* IV, 94–103. Nebwawy’s use of *sdsr* seems almost to adopt a royal prerogative, emphasizing that he is acting as a representative of the king, as with his role in the Osiris mysteries (see discussion below). The only comparable Eighteenth Dynasty non-royal attestation of this verb is in the biography of Nebwawy’s contemporary, the Royal Herald Intef, who records in his tomb that he cleansed (*sw<sup>c</sup>b*, *twr*) and sanctified (*sdsr*) the royal camp during the king’s foreign campaigns (*Urk.* IV, 975, 8). The liminal zones of foreign lands are, however, different from a state temple complex.

(p) The suffix of *pr.n.j* is conflated with the writing of *jm*, as Sethe first proposed (*ZÄS* 36, 71, n. 1). The phrase *‘d.kw wd3.kw* is known from Middle Kingdom reports, where it confirms the good conditions of the addressee’s possessions, for example, P. C. Smither, ‘The Semnah Despatches’, *JEA* 31 (1945), 1–10. It occurs in a related sense in the ‘Duties of the Vizier’: G. P. F. Van den Boorn, *The Duties of the Vizier: Civil Administration in the Early New Kingdom* (London, 1988), 68, n. 69. Van den Boorn also compares the occurrence in this text with its ‘archaizing’ use in a text in praise of a High Priest under Hatshepsut: ‘they favour you, they love you, for your affairs are sound and prosperous in the temple’ (*ibid.* 68 n. 70; *Wb.* II, 478, 16). Nebwawy’s closely similar usage evokes an epistolary report, in keeping with phraseology of a royal decree mobilized in its earlier lines; a further contemporaneous example is *Urk.* IV, 56, 16.

(q) Here perhaps we can understand that Nebwawy left this office after nine years. For *ḥ<sup>c</sup>w nn r nprt X* and *nfryt-r*, see discussion below.

(r) There are parallels for this line in the Twelfth Dynasty stelae of Mentuhotep (Lange and Schäfer, *Grab- und Denksteine* II, 155), Ikhnofret (Schäfer, *Mysterien*, 61–2), and Sehetepibre (Lange and Schäfer, *Grab- und Denksteine* II, 148). Ikhnofret's statement appears in the context of restoration work on the barque and other ritual objects, including the cult image of the god. In the texts of Sehetepibre and Mentuhotep it is more closely aligned with ritual action: 'I directed work on the *neshmet*-barque, I bore its cordage, I performed in the *h3kr*-festival for its lord'. Nebwawy's juxtaposition of the formulation with ritual defence is not otherwise attested.

In the Middle Kingdom parallels *nšmt* is written phonetically. Nebwawy's text uses only the logogram, but the parallels and the feminine gender confirm the reading; see the next note. The lack of phonetic complements may operate on two levels, also evoking the defence of divine barques as an afterlife wish (see discussion).

(s) The *.s* that ends the narrative was earlier interpreted as referring to Hatshepsut: Spiegelberg, *RecTrav* 19, 99–100; Sethe, *ZÄS* 36, 71–3; *BAR* II, 73–4, n. d; *HT* VI, 11. This reading entailed assigning to Nebwawy a military or expeditionary role in which he overthrew the queen's enemies. For this to be the only reference to Hatshepsut in a text that bears no trace of recarving and no mention of her name would be exceptional. Instead, I read the pronoun as referring to the feminine noun *nšmt*, following Schäfer, *Mysterien*, 62, n. 1; 67. As noted by Anthes, in *Festschrift zum 150jährigen Bestehen des Berliner Ägyptischen Museums*, 22, parallels for this phraseology can be found in the Abydos stela of Neferhotep I and in the text of Wenennefer, High Priest of Osiris under Ramesses II (*KRI* III, 452, 12). M. -C. Lavier discusses the worship of the *neshmet*-barque as a divine entity in the Eighteenth Dynasty, in 'Les mystères d'Osiris à Abydos d'après les steles du Moyen Empire et du Nouvel Empire', in S. Schoske (ed.), *Akten des vierten internationalen Ägyptologen Kongresses, München, 1985* (Hamburg, 1989), III, 292 and references.

### CG 34018 translation

<sup>1</sup>*djw m-ḥswt nt-ḥr-nswt*  
*nswt-bjtj (mn-ḥpr-r<sup>c</sup>)*  
<sup>c</sup>*nḥ dt*  
<sup>2</sup>*n-ḥm-ntr-tpy n-wsjr*  
*nb-w<sup>c</sup>-wy m<sup>3</sup><sup>c</sup>-ḥrw*

Given as a favour by the king;  
the Dual King, Menkheperre,  
may he live forever,  
for the High Priest of Osiris,  
Nebwawy, true of voice.

*dd.f-jw-ḥrp.n.j-k3t-<sup>c</sup>š3t m-<sup>3</sup>pr-jt.f wsjr*

He says: I directed numerous works in the  
domain of his father Osiris,  
in silver, gold, lapis lazuli, turquoise,  
and every fine stone;  
the entirety of this was under my seal,  
for he knew my excellence in his heart.<sup>a</sup>

*m-ḥd-nbw ḥsbq-mfk3t*  
<sup>c</sup>*3t-nbt špst*  
<sup>4</sup>*jw-nn r-3w hr-db<sup>c</sup>wt.j*  
*rh.n.f-mnh.j<sup>5</sup>n-jb.f*

I made stonework for my lord  
as protection for the domain of his father.<sup>b</sup>  
I attained veneration, being in the favour of the  
king.<sup>c</sup>  
I was summoned to his house of gold  
and my place among his nobles was prepared;

*jw-jr.n.j-št n-nb.j*  
*m-s3wy-pr nw-jt.f*  
<sup>6</sup>*jw-ph.n.j-jm3hy jw.j-ḥr-ḥswt nt-*  
*ḥr-nswt*  
*njs.<sup>7</sup>kw r-pr.f n-nbw*  
*jr.tw-st.j mm-srw.f*

my feet strode in the holy place,  
being anointed with fine oil,

<sup>8</sup>*wstn.n-rdwy.j m-st-dsrt*  
*gs.kw m-tpt*

<sup>9</sup>w<sup>3</sup>h r-h<sub>h</sub>.j  
mj-jr-nswt n-hs.n.f

garlands at my throat,  
as the king does for one whom he has favoured.

w<sub>h</sub>m.n-n.j <sup>10</sup>s<sub>3</sub>.f hswt  
nswt-bjty (°3-hprw-r°) °nh-dt  
rdj.n.f-n.j twt n-jt.f  
nswt-bjty <sup>11</sup>(mn-hpr-r°) dj-°nh  
hntj.f n-hh m-rnpwt  
m-pr-jt.f wsjr

His son repeated favours for me,  
the Dual King, Aakheperure, living forever.  
He gave to me an image of his father,  
the Dual King, Menkheperre, given life,  
his image of millions of years  
in the domain of his father Osiris,<sup>d</sup>

htpw-ntr <sup>12</sup>ht hntš

(as well as) divine offerings, fields, tenanted  
land;

drf-nb mn r-st.f  
hr-tp-°nh-wd<sub>3</sub>-snb-s<sub>3</sub>-r° mr.f <sup>13</sup>  
(jmn-htp)  
mry-wsjr hnt-jmntyw nb-<sub>3</sub>bdw

every endowment established correctly,<sup>e</sup>  
on behalf of the life, prosperity and health of  
the son of Re, his beloved, Amenhotep,  
beloved of Osiris, foremost of the westerners,  
lord of Abydos,  
given life like Re forever.

dj-°nh mj-r° dt

An offering which the king gives to Osiris, ruler  
of eternity,  
Anubis upon his mountain,  
Wepwawet, lord of the sacred land,  
that they may give a voice offering of bread and  
beer,  
cattle, fowl, clothing and stone vessels, incense  
and oil,

<sup>14</sup>htp-dj-nswt (n-)wsjr hq<sub>3</sub>-dt

jnpw tp-dw.f  
wp-w<sub>3</sub>-wt nb-t<sub>3</sub>-dsr  
<sup>15</sup>dj.sn-prt-hrw t-hnqt

a thousand of everything good and pure,  
a thousand of everything pleasant and sweet,  
which the sky gives, which the earth creates,  
and which Hapy brings forth from his cavern,  
for the ka of the High Priest of Osiris,  
Nebwawy, true of voice.<sup>f</sup>

h<sub>3</sub>-ht-nbt-nfrt w°bt  
<sup>16</sup>h<sub>3</sub> m-ht-nbt-ndmt bnr(t)  
ddt-pt qm<sub>3</sub>t-t<sub>3</sub>  
jntt-h°py m-<sup>17</sup>tpht.f  
n-k<sub>3</sub>-n-hm-ntr-tpy n-wsjr  
nb-w°-wy m<sub>3</sub>°-hrw

dd.f-j-°nhw <sup>18</sup>tpw-t<sub>3</sub>  
w°bw hryw-hbt jmyw-st-°  
jtjw-ntr nw-r-pr-pn  
wnwt-hwt-ntr mj-qd.s  
<sup>19</sup>sw<sub>3</sub>.ty.fy-nb hr-wd-pn šd.ty.sn-jm.f


He says: O living ones who are upon earth,  
wab-priests, lector priests, assistants,  
God's fathers of this temple,  
and the entire priesthood of the temple,  
everyone who will pass by this stela and those  
who will recite what is on it.

hs-tn mr-t(n) wsjr-hq<sub>3</sub>-dt  
<sup>20</sup>mj-dd.tn-t<sub>3</sub>w-ndm n-mht  
r-fnd hm-ntr-tpy n-wsjr  
nb-w°-wy m<sub>3</sub>°-hrw hr-wsjr

Osiris, lord of eternity, will favour and love you,  
inasmuch as you say: 'Sweet north wind  
to the nostrils of the High Priest of Osiris,  
Nebwawy, true of voice before Osiris'.<sup>g</sup>



## CG 34018 notes to translation

(a) Reading *n* for *m*, ‘in his heart’. I follow Helck’s reading of this passage (*Urk.* IV 1494, 12). The signs are arranged , perhaps for aesthetic reasons.

(b) I know of no parallel for these verses and the phraseology appears to be quite distinctive. *Wb.* IV, 550, 12–13 gives a writing of *št* in the titles of officials involved in the transportation of stone. A connection of the word with the later term for tax assessment does not seem suitable in the context of temple building works: A. H. Gardiner, *The Wilbour Papyrus* (London, 1941–52), II, 10. *s3wy* could be ‘protection’, referring to the stone-work, or ‘protector’, in reference to Nebwawy himself. The direct genitive *s3wy-pr* looks like a set phrase.

An evocative image, not acknowledged in Helck’s text, is created in the writing of *nb.j* that precedes the statement of protection (fig. 2). The upraised arm of the first person pronoun ends with a cupped hand that reaches out to the head of the falcon determinative of *nb*. This is different from the blunt end of the arm in writings of the seated man in the rest of the text and mobilizes visually the concept of protection stated verbally in the verse. For comparable sign play in an Abydene stela, see J. Yoyotte, ‘Une stèle populaire de la XVIIIe dynastie (Ermouthis de la butte-du-souvenir)’, in *Mélanges Mariette* (BdE 32; Cairo, 1961), 202, pl. i.

(c) This phrase also occurs in a biographical context in the tomb stela of Nebamun, Steward of the royal wife under Thutmose III (*Urk.* IV, 151, 56). There the verses come at the end of the biographical section, perhaps moving the owner into the next world (see discussion).

(d) I know one other possible example of this category of statue. A dedication formula on the base of a standard-bearing statue of Ramesses II’s son Khaemwaset from Abydos refers to the statue as ‘his *hnty*-statue of millions (of years)’. The text then continues with a statement of its function: ‘to exist in the Thinite nome forever...that it may open its way for the effective spirit, even as its place bears the *hnty*-statue of the king’s elder son, his beloved, the *sem*-priest, Khaemwaset’ (*KRI* II, 889, 11–13; *HT* X, 18, pl. 33). I am very grateful to Angela McDonald for this reference. The designation *hnty* may indicate a processional function and the form of Khaemwaset’s statue seems to reflect this association: Hornung, in Loretz (ed.), *Die Gottebenbildlichkeit des Menschen*, 134–5.

I interpret the statue terminology in this passage as synonymous: *twt* may refer generally to a royal statue while *hnty* is a more precise designation of its form as a divine manifestation of the king and processional, cultic image, contra R. Morkot, “*Nb-M3t-Rc*- United-with-Ptah”, *JNES* 49 (1990), 331–3, in his reading of *twt* and *hnty* as two different statues in the endowment text on the statue of the Memphite Steward Amenhotep from the reign of Amenhotep III.

W. J. Murnane presented the stela of Nebwawy in connection with the probable coregency of Thutmose III and Amenhotep II. He believed that the epithet ‘given life’ does not determine whether Thutmose III was alive or dead when the statue was dedicated (*Ancient Egyptian Coregencies*, (SAOC 40; Chicago, 1977), 51 with n. 84).

(e) A close parallel for the statue gift plus endowment is the stela of the priest Yuf, who administered the property of Ahmose’s mother in Edfu: ‘She endowed me with the statue of Her Person (*mnj.n.s m rpyt nt hmt.s*). She gave me bread, 100 *bit*-loaves, 100 *pesen*-loaves, 2 jars of beer, and a joint from every ox, being rewarded with upland and lowland (?)’ (*Urk.* IV, 30, 15–31, 4). It seems likely that the fields and offerings in Nebwawy’s text formed the endowment for the king’s statue, from which the priest would benefit. It is also possible that statue and provisions were separate gifts.



FIG. 2. Cairo CG 34018. Stela of the High Priest of Osiris, Nebwawy; detail of line 5.

(f) For this offering formula, see W. Barta, *Aufbau und Bedeutung der altägyptischen Opferformel* (ÄF 24; Glückstadt, 1968), 88, form 2.

(g) For this common Eighteenth Dynasty structure for an appeal to the living, see Lichtheim, *Maat*, 173. The shift from a singular to plural suffix in the *sdm.ty.fy* forms is unusual but does not alter the meaning.

### CG 34017 translation

Right column:

<i>ḥtp-dj-nswt (n)-wsjr nb-t3-dsr</i>	An offering which the king gives (to) Osiris, lord of the sacred land,
<i>dj.f-prt-ḥrw t-ḥnqt</i>	that he may give a voice offering of bread and beer,
<i>jḥw-3pdw ḥt-nfrt wꜣbt</i>	cattle and fowl, and everything good and pure,
<i>n-k3-n ḥm-ntr-ḥqt</i>	for the <i>ka</i> of the Priest of Heqet, <sup>a</sup>
<i>nb-wꜣ-wy m3ꜣ-ḥrw</i>	Nebwawy, true of voice.

Left column:

<i>ḥtp-dj-[nswt] (n)-ḥqt ḥrjt-jb-3bdw</i>	An offering which the king gives to Heqet, who resides in Abydos,
<i>dj.s-prrt-nbt ḥr-wdḥw.s rꜣ-nb</i>	that she may give all that goes forth from her offering tables perpetually,
<i>n-k3-n jmy-r-pr n-wsjr</i>	for the <i>ka</i> of the Overseer of the domain of Osiris,
<i>nb-wꜣ-wy m3ꜣ-ḥrw</i>	Nebwawy, true of voice.

Base:

<i>jr[.n] ps-jns n-wsjr</i>	Made by the Dyer of <i>jns</i> -linen for Osiris, <sup>b</sup>
<i>sh mn-ḥpr</i>	the scribe, Menkheper.

### CG 34017 notes to translation

(a) Neither of the titles given to Nebwawy here occurs on the other two stelae. *ḥm-ntr ḥqt* is known from Old Kingdom texts, where it seems to have had an honorific function that was bestowed on members of the inner elite; see N. Strudwick, *The Administration of Egypt in the Old Kingdom: the Highest Titles and their Holders* (London, 1985), 185. The title does not occur in the published indexes of Middle Kingdom titles: W. A. Ward, *Index of Egyptian Administrative and Religious Titles of the Middle Kingdom (Cited by Entry Number)* (Beirut, 1982); H. G. Fischer and W. A. Ward, *Egyptian Titles of the Middle Kingdom: A Supplement to Wm. Ward's Index*, (New York, 1997). I do not know of any other New Kingdom occurrence.

The goddess Heqet was anciently associated with Abydos; in the Leiden stela of Wepwawetaa she is invoked as one of the primeval deities linked with Geb (Sethe, *Les. 72*, 10–11). For discussion of her role there, see Spiegel, *Die Götter von Abydos*, 82–8.

(b) The title of 'linen dyer' or 'boiler' within a temple domain is also attested in a late Nineteenth Dynasty graffito in the entrance to the staircase in the eighth pylon at Karnak: 'Linen-boiler of the temple of Amun (*p(s)y jns n pr-jmn*), guardian of the chamber of the High Priest of Amun, Roy, true of voice, Smentawy, true of voice' (G. Lefebvre, *Inscriptions concernant les grands prêtres*

*d'Amon, Romê-Roy et Amenhotep* (Paris, 1929), 40–1). I interpret this line as a dedication formula; see discussion below.

### Nebwawy's role in the Osiris mysteries

The Osiris mysteries, in which the transfigurations of the god—and by analogy that of every deceased person—were enacted, have been seen as the central ritual cycle associated with the temple complex of Abydos.<sup>22</sup> The sources for reconstructing them are the few surviving royal and non-royal narratives of ritual performance in the ceremonies.<sup>23</sup> The most detailed and most studied of these is the stela of the Overseer of sealbearers, Ikhnofret, from the reign of Senwosret III.<sup>24</sup>

Among Eighteenth Dynasty non-royal texts, Nebwawy's stela EA 1199 is the only presentation of a role in the Osiris mysteries known to me. The Abydos stela of Thutmose I includes some oblique references to ritual action in the context of the renewal of the temple and its cult practice.<sup>25</sup> The phrasing of Nebwawy's text can be largely restored from parallels with the phraseology in the Twelfth Dynasty stelae of Mentuhotep and Sehetepibre (see EA 1199 commentary note (d)), which were found by Mariette near where he discovered Nebwawy's stelae now in Cairo.<sup>26</sup> Ancient and modern destruction and remodelling of the Osiris temple zone make it impossible to reconstruct their ancient setting or to say whether the earlier stelae could have served as models. The epithets may have been transmitted more generally in the vocabulary associated with the ritual and with inscriptions commemorating it.

Nebwawy's text presents his role within the context of royal commissions, in a manner comparable with the Middle Kingdom mobilization of the motif. The stela of Mentuhotep, from the reign of Senwosret I, incorporates the epithets concerning his role in the Osiris mysteries into a wider statement of royal action in the form of a *wꜥ-nswt* granting him permission to build his memorial chapel at Abydos. Mentuhotep's role in the ceremony, which is described after the report, may constitute his reciprocation for the king's commission. A comparable frame is present in the late Twelfth Dynasty stela of Sehetepibre, often presumed to be modelled on that of Mentuhotep,<sup>27</sup> and follows the allusions to the Osiris mysteries with the first part of the *Loyalist Instruction*, which focuses on the individual's relationship with the royal sphere and the presentation of the king as divine.<sup>28</sup> The stela of Ikhnofret most clearly interlocks royal and priestly roles. The upper half of his stela is distinctly royal in presentation, using the narrative frame

<sup>22</sup> E.g. J. G. Griffiths, 'Hakerfest', *LÄ* II, 929–31; id., 'Mysterien', *LÄ* IV, 276–7; M.-C., Lavier, 'Les fêtes d'Osiris à Abydos au Moyen Empire et au Nouvel Empire', *Egypte Afrique et Orient* 10 (1998), 27–33.

<sup>23</sup> See the summary of texts presented by Lavier, in Schoske (ed.), *Akten des vierten internationalen Ägyptologen Kongresses, München, 1985* III, 289–95, and those included in the appendix to Anthes' article on the stela of Neferhotep I in *Festschrift zum 150jährigen Bestehen des Berliner Ägyptischen Museums*, 41–8.

<sup>24</sup> Schäfer, *Mysterien*; Anthes, in *Festschrift zum 150jährigen Bestehen des Berliner Ägyptischen Museums*; Lichtheim, *Ancient Egyptian Autobiographies*, 98–100.

<sup>25</sup> *Urk.* IV, 94–103.

<sup>26</sup> Mariette, *Abydos* II, 30–2.

<sup>27</sup> But see now W. K. Simpson, 'Studies in the Twelfth Egyptian Dynasty IV; the Early Twelfth Dynasty False-door/Stela of Khety-anekh/Heni from Matariya/Ain Shams (Heliopolis)', *JARCE* 38 (2001), 17.

<sup>28</sup> See A. Loprieno, 'Loyalistic Instructions', in A. Loprieno (ed.), *Ancient Egyptian Literature: History and Forms* (PÅ 10; Leiden, 1996), 403–14, with references to earlier discussions.

of a commission from Senwosret III. Tom Hare<sup>29</sup> discusses the ‘chain of substitutions’ that takes place within this text: ‘-His-Beloved-Son = Horus = Pharaoh = Ikhernofret’. Through his action in the ritual and in restoration and building, Ikhernofret entered the space of the ‘royal subject’. This transformation is also realized by the entire visual composition of the stela.

These Middle Kingdom texts narrate action in the Osiris mysteries as an exceptional privilege for non-royal protagonists who entered and functioned within a royal and divine space. This representative role is also mobilized in Nebwawy’s text, although his stela bears none of the royal iconographic motifs of the earlier monuments.<sup>30</sup> The introduction to Nebwawy’s function in the performance of the Min procession (*ky-sp n-rdjt m-hr.j*, l. 12) mirrors the phraseology used to introduce the Osiris mysteries (*wd-nswt hr-spr tp-jm.j*, l. 4), indicating action on behalf of Thutmose III, and his statement concerning the purification of the mortuary temple of Ahmose also seems to place him in the role of royal representative (see commentary note (o)). The king is the central point of reference and mediates Nebwawy’s every role and function.

In contrast with the position of royal and non-royal subject in relation to the god set out in the Middle Kingdom stelae and in Nebwawy’s texts, the intermediary presence of the king is no longer evoked in Ramessid self-presentation. A text of the High Priest of Osiris, Wenennefer, of the reign of Ramesses II, does not mention ‘acting as His Beloved Son (*s3-n-mr.f*)’ and the interaction between god and priest is direct and immediate: ‘I brought the wreath of justification and transformed the god with it...(I am) one who adorns the god, who ferries the god to the entrance of Poqer...I ascended to Ro-setjau, I was rewarded and bound in red linen’.<sup>31</sup> In this text the performed transfiguration of the god becomes that of the priest himself.

The treatment of the mysteries motif in Nebwawy’s text is transformed from that of the Middle Kingdom stelae, through being incorporated into the presentation of a powerfully individualized priestly life and included among other statements of comparable ritual performance, a little more like the Ramessid text. Most Middle Kingdom biographies are not concerned with the presentation or exploration of an individual’s religious life and activity.<sup>32</sup> The three Middle Kingdom stelae discussed here are exceptional and their employment of the motif of the Osiris mysteries may be connected to status, with the ritual acts being mobilized within wider statements of service to king as part of a secular office and as a means to express an intimate, representative relationship with the royal sphere. In the biographical texts of the pre-Amarna Eighteenth Dynasty, narrative motifs of the priestly life and religious function become more frequent and acquire a more personal and subjective quality, although Ramessid and Third Intermediate Period texts exhibit these features most strongly.<sup>33</sup>

<sup>29</sup> *ReMembering Osiris: Number, Gender, and the Word in Ancient Egyptian Representational Systems* (Stanford, 1999), 39–40.

<sup>30</sup> The difference in visual presentation may be related to status. Mentuhotep and Ikhernofret were members of the inner elite as indicated by the extensive ranking titles in their title strings. In contrast, Nebwawy employs only functional priestly titles. Although he held the highest office in the priesthood of Abydos, he was not part of the inner elite centred on the royal court. However, the gift formula of the opening line prioritizes the royal presence and the expression of personal dependance on the king.

<sup>31</sup> *KRI III*, 452–3; Anthes, in *Festschrift zum 150jährigen Bestehen des Berliner Ägyptischen Museums*, 41–3.

<sup>32</sup> J. Baines, ‘Society, Morality, and Religious Practice’, in B. E. Shafer (ed.), *Religion in Ancient Egypt: Gods, Myth, and Personal Practice* (Ithaca NY, 1991), 158.

<sup>33</sup> For example, A. Gnirs, ‘Die ägyptische Autobiographie’, in Loprieno (ed.), *Ancient Egyptian Literature*, 234.

As noted by John Baines, a number of Eighteenth Dynasty biographies are entirely religious in concern, such as the negative confession of Baki which has intrigued scholars through its parallels to Spell 125 of the Book of the Dead.<sup>34</sup> This religious phraseology is transformed through presentation in the personal, individual medium of a votive stela. The concern to incorporate aspects of an individual life within this religious context is also evident in texts that centre on priestly activity. The motif of priestly initiation and experience of god through access to restricted knowledge also develops in this period, as seen notably in the texts of Weser, Vizier under Thutmose III (*Urk.* IV, 1031, 2–16), Amenemhat, High Priest of Amun under Amenhotep II (*Urk.* IV, 1409, 3–1410, 6), and the Second Priest of Amun of the reign of Thutmose IV, Amenhotep (*Urk.* IV, 1208, 8–1209, 10).<sup>35</sup> Later biographies came to be integrated with the visual presentation or textual narration of judgement,<sup>36</sup> or more fully incorporated into hymns and prayers, transforming both the biography and the religious texts.<sup>37</sup>

The detailed presentation of Nebwawy's ritual performances and functions mark his texts as precursors of such Ramessid texts as that of Wenennefer. Although his roles are mediated by and centred on the king, his function in the defence of the barque in the final line of EA 1199, alongside the transition to the next world narrated on CG 34018, set his own transfigurations in parallel with the transformations he performed on behalf of king and god. EA 1199 thus stands between the Middle Kingdom use of religious motifs to enact a royal role and Ramessid 'religious biographies' that explore an individual's relationship to the divine.

### Time and priestly activity

The most personal and subjectivizing qualities of Nebwawy's narrative in EA 1199 are generated by the presentation of his own years of life which frame his statements of service within the temple sphere. Here, the text mobilizes a complex vocabulary relating to time and time-telling. The evocation of continuous, durative time through presentation of spans of years (*ḥꜣw*) and ongoing royal commissions can be contrasted with the narration of more singular moments (*sp*) of command and reward.

The measuring of time in the text in particular has provoked a range of interpretations. The feminine pronoun in the final line led early scholars to read year 9 as the regnal year of Hatshepsut (see commentary note (s)). More recently all the year counts in the stela have been read as referring to regnal rather than civil years and as providing evidence for length of the reign of Thutmose II.<sup>38</sup> My interpretation corresponds with

<sup>34</sup> 'Classicism and Modernism in the Literature of the New Kingdom', in Loprieno (ed.), *Ancient Egyptian Literature*, 163. See Lichtheim, *Maat*, 103–44, for a discussion of the literature on this text.

<sup>35</sup> For the motif of initiation (*bs*) in these texts, see J.-M. Kruchten, *Les annales des prêtres de Karnak (XXI–XXIII<sup>es</sup> dynasties) et autres textes contemporains relatifs à l'initiation des prêtres d'Amon* (OLA 32; Louvain, 1989), 175–92.

<sup>36</sup> For the weighing of biographical statements as part of a judgement scene in the tomb of Horemheb (temp. Amenhotep III), see A. Brack and A. Brack, *Das Grab des Horemheb, Theben Nr. 78* (AVDAIK 35; Mainz, 1980), 51–3, pls. 65, 90. The narration of judgement is included in biographical narration in the contemporaneous tomb of Khaemhat (*Urk.* IV, 1846, 17–1847, 5). For general discussion, see Lichtheim, *Maat*, 119–26.

<sup>37</sup> See the text of Suti and Hori: *Urk.* IV, 1943, 12–1947, 15. See Gnirs, in Loprieno (ed.), *Ancient Egyptian Literature*, 215–17 with references, for the development of this strategy in the Eighteenth Dynasty.

<sup>38</sup> Redford, *JNES* 25, 116–17, concluded that *rnpt* 11 referred to the year of appointment under Thutmose II, and that years 6 and 9 were those of Thutmose III.

that of Luc Gabolde, who understands the stela's year-counts as referring to durations of time, a reading supported by the writing of *rnpt* as  $\left\{ \begin{array}{l} \text{𓄿} \\ \text{𓄿} \end{array} \right.$ .<sup>39</sup> The use of spans of regnal years and the linking of life-events to different kings is a familiar narrative strategy in early Eighteenth Dynasty biographical texts.<sup>40</sup> The explicit marking of the passage of time in these texts may reflect a comparable interest in the royal monumental sphere, the high point of which is the *Annals of Thutmose III* carved on the walls of Karnak. In contrast with these styles of time marking, the expressions of time in EA 1199 are internally nuanced, integrative, and individual, not tied to external royal chronologies.

Stephan Seidlmayer has compiled a list of occurrences of the infrequent enumerated lifetimes from the Old to the New Kingdom.<sup>41</sup> He categorizes the texts into those which relate to an individual's age or ideal age and those which record the duration of a life or events within a life. These measurements are often connected to the protagonist's assertion of a life of service and, in the case of ideal age, year counts can be a reward for such service and right action: 'I have reached 80 years, my favour with the king being great, and I will complete 110 years'.<sup>42</sup>

The recording of age or spans of time may also shift the narrative tone to one that is more intimate. This strategy can be seen in the late Twelfth Dynasty stela of Khusobek, where the protagonist gives his year of birth, in a composition whose layout and narrative structures are a complex hybrid of royal and non-royal presentation.<sup>43</sup> In this play with genre, the record of birth-year marks a shift to a personal level of narrative; the date is in a part of the stela signalled as non-royal through its arrangement in vertical columns, and in a section of the narrative that is otherwise entirely conventional in its formulae. A similar strategy can be seen in the stela of Ikhnofret—which also makes play with royal and non-royal registers of language and iconography—where the king refers in the royal letter included on the stela to the protagonist as having been a 'youth of 26 years' when he was promoted to the position of 'companion' (*smr*).<sup>44</sup> Whether this was his 'real' biological age cannot be known. The presence of this statement in the king's letter shifts the text from the formality of a royal decree to a more subjective level and may function as a rhetorical device, with its conversational, almost teasing, tone signalling an intimate relationship between king and official. Nebwawy's use of time-

<sup>39</sup> 'La chronologie du règne de Thoutmosis II, ses conséquences sur la datation des momies royales et leurs répercussions sur l'histoire du développement de la Vallée des Rois', *SAK* 14 (1987), 64–5.

<sup>40</sup> For example, the tomb stela of the royal herald, Yamunedjeh, marks the duration of his function as Controller of works through a measured number, in this case, of regnal years: 'First occasion of commanding me to act as Controller for the lord of the two lands, from year 15 to year [...] (*šꜣꜣ m rnpt-sp 15 nfryt-r rnpt ...*)' (*Urk.* IV, 940, 4–5). See also military narratives where service under a series of kings is quantified through the enumeration of captives, hands, and rewards, for example Ahmose son of Ebana (*Urk.* IV, 1–11), Ahmose Pennekhet (*Urk.* IV, 34–5), Ineni (*Urk.* IV, 53–61), and Amenemheb, (*Urk.* IV, 889–97).

<sup>41</sup> "Dreißig Jahre ließ ich gehen..." Ergänzungen zu zwei Jubiläumsinschriften im Gebiet von Aswân', *MDAIK* 57 (2001), 252–5.

<sup>42</sup> *Urk.* IV, 1828, 7–8; Seidlmayer, *MDAIK* 57, 253.

<sup>43</sup> J. Baines, 'The Stela of Khusobek: Private and Royal Military Narrative and Values', in J. Osing and G. Dreyer (eds), *Form und Mass: Beiträge zur Literatur, Sprache und Kunst des alten Ägypten: Festschrift für Gerhard Fecht* (ÄAT 12; Wiesbaden, 1987), 54–61.

<sup>44</sup> Sethe, *Les.* 70, 22.

spans renders his narrative on a more personal and subjective level, even without a similar royal point of reference.<sup>45</sup>

Seidlmayer cites Nebwawy's text as recording the duration of completed phases in his life. He places this text alongside the Sixth Dynasty biography of Nekhebu and the statue of the High Priest of Amun, Bakenkhons, from the reign of Ramesses II, now in Munich. The parallel with Bakenkhons' text is particularly revealing. On the back pillar of the block statue, a list-like presentation of stages of life is quantified in durations of time: 'I spent four years as an excellent youngster. I spent eleven years as a youth as a trainee stable-master for King Men[maat]re. I was a *wab*-priest of Amun for four years ...' The narrative culminates with his appointment to the position of High Priest, which he is said to have held for 27 years.<sup>46</sup> This presentation quantifies Bakenkhons' service to his god and king, and his own personal history, in a linear fashion. In comparison, the narrative in EA 1199 integrates year counts more fully into its structure through phraseology that presents qualitatively different aspects of time. Nebwawy's life is divided into phases of service that emphasize the passing of personal time and the breadth of his responsibilities beyond the domain of Osiris.

Nebwawy's first appointment to the position of 'Chief speaker' and 'Deputy' in the domain of Osiris is signalled as such by the phrase *j3wt tpt* (ll. 3–4), creating an expectation of further appointments. The regular passage of time is then evoked through the royal commission which 'comes before me in the course of every day' (l. 4) to introduce Nebwawy's role in the Osiris mysteries. The development of his moral character in this presentation may be linked to the requirements of ritual purity and worthiness.<sup>47</sup> This first career phase is summarized by the phrase: 'the span of these (events) was eleven years' (l. 10). The use of *ḥꜣw* may also evoke its alternative meaning of 'life-span',<sup>48</sup> emphasizing the personal nature of the two life phases that are framed by it. The appointment to the position of High Priest that follows forms the high point of Nebwawy's career and is reinforced visually and with phraseology by its association with the cartouche of the king that is placed towards the centre of the stela, and by parallels with the first line which also contains a cartouche. This office governs the actions presented in the rest of the text. Nebwawy describes his priestly function in two temples that were ritually and, in the case of that of Ahmose, spatially connected with the Osirian domain.

The first role is as festival leader and 'Overseer of priests and service staff' in the temple of Akhmim (ll. 12–14). The nominal phrase *ky sp n rdjt m-ḥr.j* (l. 12) marks a major division in the text and presents the royal commission as a significant extension of Nebwawy's priestly responsibility. This role in the organization and perhaps

<sup>45</sup> In a stela dated to the third or fourth century BC, also from Abydos, measuring of life and office is intimately connected with the duration of mortuary preparation. In a speech addressed to his father's colleagues and children above an image of the funerary procession, the eldest son enumerates the span of his father's life: 'He performed his (priestly) service in Thinis and *bḥdt* from 16 years until (*mry(t)-r*) 76 years, his body remaining youthful, his eyes [able to see], his [ears] to hear. The process of his burial lasted four days'; see K. Jansen-Winkel, 'Eine Familie im Totenkult', *ZÄS* 128 (2001), 134, fig.1, with 138, n. 17.

<sup>46</sup> *KRI* III, 298, 3–7.

<sup>47</sup> For the connection between negative declarations and ritual purity, see J. L. Gee, *The Requirements of Ritual Purity in Ancient Egypt* (PhD dissertation, Yale University, 1998).

<sup>48</sup> *Wb.* I, 222, 18–19, 223, 1–4; J. Assmann, *Zeit und Ewigkeit im alten Ägypten* (AHAW phil.-hist. Klasse 1975, 1; Heidelberg, 1975), 18–19; E. Hornung, *Idea into Image: Essays on Ancient Egyptian Thought* (New York, 1992), 58–64.

refurbishment of the cult of Min and its position in the Osiris mysteries is said to span a further six years. Although ‘High Priest of Osiris’ is Nebwawy’s primary title, his role in revivifying the mortuary complex of Ahmose may have had a particular prestige, perhaps through association with the renewal of cultic activity at Abydos probably initiated in his reign.<sup>49</sup> This topic is placed at a culminating point of the narrative and is introduced by the phraseology of royal favour, aligning it with lines 1 and 11. This final section uses a different vocabulary of time. In royal and non-royal narratives, the preposition *nfryt-r* (l. 18) indicates a completed action or the final stage in a series of events.<sup>50</sup> The epistolary formula, *ʿd.kw wdʒ.kw*, that introduces the prepositional phrase strengthens this sense of completion.

The final couplet of the stela may appear to end the text rather abruptly, but it also returns Nebwawy to his primary priestly role within the Osirian domain: ‘(I) directed the work on the *neshmet*-barque, and repulsed the one who rebelled against its Person’. Two central aspects to the narration of priestly activity in Abydos, construction works and ritual function, are compressed into this statement. Although EA 1199 can be understood as a self-sufficient monument, seemingly abrupt endings being a known narrative strategy in biography,<sup>51</sup> its presentation of his achievements within the temple of Osiris can also be read as continuing on the Cairo stela. A role in the defence of divine barques is common in afterlife wishes and may evoke Nebwawy’s passage to the next world, a transformation that is again narrated in CG 34018.

Nebwawy’s narrative on EA 1199 employs distinctive, durative time markers to present the development and extent of his priestly career. His role in ritual action and in the reorganization of cult is marked as distinctly personal and subjective by the framing of the actions with his own personal chronology. This pattern can be contrasted with the theme of royal favour and mediation, which marks stages of his life. Thus, the passing of his own ‘world-time’ (*ʿhʿw*)<sup>52</sup> is evoked against the divine and royal time of the after-life, which is mobilized obliquely through the continuation of his narrative on the Cairo stela.

### Transition to the next world

Nebwawy’s corpus can be compared with the cenotaph groups familiar from Middle Kingdom Abydos.<sup>53</sup> If CG 34017, with its representation of the king with cult object performing the cult, can be included in this corpus, then its dedication by a member of the local temple personnel has parallels in the dedication of stelae in the cenotaph groups by associates, colleagues, and family members.<sup>54</sup> The narrative of EA 1199 is brought to a conclusion in CG 34018, in a shift of focus towards Nebwawy’s transfiguration in the next world. The return to action within the temple of Osiris, referred to in the final

<sup>49</sup> Harvey, *The Cults of Ahmose at Abydos*, 438–9.

<sup>50</sup> For example; Hatshepsut’s obelisk inscriptions (*Urk.* IV, 367, 4), her Speos Artemidos inscription (*Urk.* IV, 390, 11), the biography of Ahmose-Pennekhet (*Urk.* IV, 34, 10), and the biography of Yamunedjeh (*Urk.* IV, 940, 4–5).

<sup>51</sup> J. Baines, ‘The Stela of Emhab: Innovation, Tradition, and Hierarchy’, *JEA* 72 (1986), 49–50.

<sup>52</sup> Assmann, *Zeit und Ewigkeit*, 18–19.

<sup>53</sup> See Simpson, *Terrace*.

<sup>54</sup> For an example of a dedicated stela with an artist’s signature, see Simpson, *Terrace*, pl. 56, ANOC 38; W. A. Ward, ‘Neferhotep and his Friends: a Glimpse at the Lives of Ordinary Men’, *JEA* 63 (1977), 63–6.



lines of the British Museum stela, continues in CG 34018, which begins by presenting Nebwawy's role in building works, in contrast with his role in ritual and administration on EA 1199. The clause 'I directed works (*hrp.n.j k3t*)', which begins the renewed narrative, parallels the final line of the British Museum stela but lacks the ritual associations which are mobilized in that text, shifting the focus to works for the protection of the god.

Although the next stanza draws on phraseology associated with the receipt of rewards in the mortal sphere, transformation and reward in the next world are perhaps more strongly evoked. The opening line, which presents Nebwawy as having attained veneration (*jm3hy*), looks forward to the afterlife.<sup>55</sup> The locations for this transformation are connected with the next world. Guksch interprets 'his house of gold' (*pr.f n nbw*, l. 7), to which Nebwawy is summoned, as the royal palace, following Erika Schott.<sup>56</sup> While the possessive suffix pronoun marks this area as royal, 'his house of gold' also echoes the 'mansion of gold' (*hwt-nbw*) in EA 1199, in which Nebwawy effects the transfiguration of the god during the performance of the Osiris mysteries. Thus Nebwawy's transformation in the royal space of *pr.f n nbw* is connected with the transfiguration of Osiris that effects the god's symbolic rebirth in the temple.<sup>57</sup> In the Ramessid Period, *pr-nbw* also designated the burial chamber;<sup>58</sup> this meaning may already be evoked in Nebwawy's text.

The description of this location continues with the preparation of Nebwawy's place among the nobles (*jr.tw st.j mm srw.f*, l. 7), perhaps referring to the necropolis where Nebwawy is to be buried alongside his peers. The Middle Kingdom Abydos stela of Wepwawetaa may offer a parallel for this motif: 'As for this tomb which I made in the desert of the sacred land, among the fathers who created my flesh, nobles of the first time...I made it in order to establish (my) place among (them) (*jr.n(.j) st r smn st(.j) m-hry-jb.s(n)*)'.<sup>59</sup> The phrase referring to the 'holy place' (*st dsrt*) in the Cairo stela evokes *3 dsr*, 'necropolis'.<sup>60</sup>

As Guksch notes, the verses referring to the presentation of garlands and oil have parallels in biographies narrating reward in the mortal sphere. She reads the 'garlands'

<sup>55</sup> *Wb.* I, 82, 1–12.

<sup>56</sup> *Königsdienst*, 165, n. 286; Schott, 'Goldhaus', *LÄ* II, 739, n. 5.

<sup>57</sup> Contra Schott's entry 'Goldhaus', *LÄ* II, 739, where she states that the texts referring to the 'gold-house' in the Osiris mysteries actually refer to events in the palace. Schott also considers *hwt-nbw* and *pr-nbw* to be largely interchangeable, an assumption that requires further investigation. The 'mansion of gold' is also evoked as a place of divine or royal transformation in the Middle Kingdom stela of Senti the younger, who bears the title 'Senior companion of the mansion of gold (*hwt-nbw*) where the god is born in the morning' (Sethe, *Les.* 75, 12–13). Here, 'the god' could be the king or a deity. See also commentary note (e) to EA 1199, and references.

<sup>58</sup> *Wb.* I, 517, 8; H. Carter and A. H. Gardiner, 'The Tomb of Ramesses IV and the Turin Plan of a Royal Tomb', *JEA* 4 (1917), 139. Anthes, in *Festschrift zum 150jährigen Bestehen des Berliner Ägyptischen Museums*, 35, also concluded that the *hwt-nbw* in the stelae of Neferhotep I and Ikhnofret referred to the burial place of Osiris. A 'gold house (*pr n nbw*) of Amun-re, king of the gods' occurs in the late Ramessid biography of the High Priest of Amun, Amunhotep, on the rear exterior wall of the Thutmosid shrine on the southern approach to the temple of Amun in Karnak (*KRI* VI, 537, 12). Although this *pr n nbw* seems to be associated with temple space, the text is fragmentary and its status is difficult to interpret; see E. F. Wente, 'The Suppression of the High Priest Amenhotep', *JNES* 25 (1966), 80, n. 14b.

<sup>59</sup> Sethe, *Les.* 72, 8–11.

<sup>60</sup> For *3 dsr*, see A. Leahy, 'A Protective Measure at Abydos in the Thirteenth Dynasty', *JEA* 75 (1989), 49–54. See Hoffmeier, *Sacred*, 176–7, for an interpretation of *st dsrt* in this text as referring to temple space. Both levels of meaning could be mobilized in Nebwawy's text.

(*wšh*) placed on the priest's throat as referring to the gold collars that are so often presented in scenes and narratives of royal reward, citing a parallel text from the late Eighteenth Dynasty tomb of Huy, where he is said to have 'gold at his throat and upon his arms'.<sup>61</sup> Jürgen Osing parallels these verses in Nebwawy's text with the description of royal reward in the early Nineteenth Dynasty biography of the Royal Scribe Nefersekheru: 'I am greatly rewarded with every valuable thing, the gold which is at my throat, the myrrh which is upon my head, real ladanum from the beginning of the [land] anointing my limbs'.<sup>62</sup> However, presenting garlands and anointing with oils are also associated with mortuary preparations.<sup>63</sup> In a Nineteenth Dynasty tomb relief, the song of the mourning women asks 'all people' to have 'garlands and *sgnn*-oil upon your brows' (*mhy sgnn hr wšt.tn*), connecting these items with mortuary ritual.<sup>64</sup>

The mobilization of dual levels of reward in this life and the next can also be seen in a biographical text of Sarenput I from the Heqaib sanctuary at Elephantine in which the images of wrappings and gold collars are explicitly presented as components of funerary preparations provided by Senwosret I: 'His Person gave me a coffin in pine from Lebanon, as well as mummy-bindings, a collar of gold (*wšh m nbw*), clothing, and ointment'.<sup>65</sup> This motif is transformed within literary texts such as the *Tale of Sinuhe*. On his return to Egypt, a journey which in itself moves the protagonist towards death and the next world, Sinuhe states: 'I was clad in fine linen, I was anointed with fine oil, I slept in a bed',<sup>66</sup> all images that evoke in part both the mortuary preparations promised to him by Senwosret I and the eternal sleep of death, in addition to a luxurious existence in this world. A further parallel is perhaps one of the harpist's songs in the late Eighteenth Dynasty tomb of the God's Father, Neferhotep: 'Make a holiday, O God's Father! Put incense and fine oil together to your nostrils, and garlands of lotus and *rrmt*-flowers upon your breast, while your sister whom you love sits beside you'.<sup>67</sup> Although this passage refers to actions in the mortal sphere, the song is displayed in a mortuary context and the imagery may operate on both levels. The text is placed by a scene that shows Neferhotep and his wife as deceased, the caption to the image referring to the priest as an Osiris.

The passage in CG 34018 is framed by statements of royal favour, paralleling the gift formula of line 1 and the crucial statements of royal favour in EA 1199. The king not only mediates the actions of Nebwawy in the mortal sphere in EA 1199, but also

<sup>61</sup> *Königsdienst*, 165, n. 287; *Urk.* IV, 2072, 3–5.

<sup>62</sup> *Das Grab des Nefersecheru in Zawyet Sultan* (AVDAIK 88; Mainz, 1992), 50, n. y. One of the *Miscellany* texts, a model letter in praise of Memphis, also refers to the 'ointment, *bšq*-oil, and sweet lotus buds at his throat' within a general festival context (P. Sallier IV vso, 2–8; *LEM*, 90, 12).

<sup>63</sup> For example, the wreath of justification (*mšh n mšc-hrw*) which is part of the ritual transfiguration of Osiris and the dead (*Wb.* II, 31, 5) and see the text of the Ramessid High Priest of Osiris, Wenennefer, given in the discussion of Nebwawy's role in the Osiris mysteries on p. 69 here.

<sup>64</sup> Leiden K 15: P. A. A. Boeser, *Beschreibung der Aegyptischen Sammlung des Niederländischen Reichsmuseums der Altertümer in Leiden*, IV: *Die Denkmäler des neuen Reiches*, I: *Gräber* (The Hague, 1911), pl. xv; E. Lüddeckens, 'Untersuchungen über religiösen Gehalt, Sprache und Form der ägyptischen Totenklagen', *MDAIK* 11 (1943), 149–50.

<sup>65</sup> D. Franke, *Das Heiligtum des Heqaib auf Elephantine: Geschichte eines Provinzheiligtums im Mittleren Reich* (SAGA 9; Heidelberg, 1994), 178.

<sup>66</sup> B 290; R. B. Parkinson, *The Tale of Sinuhe and Other Ancient Egyptian Poems, 1940–1640 BC* (Oxford, 1998), 42.

<sup>67</sup> R. Hari, *La tombe thébaine du père divin Neferhotep (TT50)* (Geneva, 1985), pl. xxvi, cols. 6–8.

governs the transition to the next world, in a role similar to that of Senwosret I in the *Tale of Sinuhe* and in the biography of Sarenput I. Within this context, the presentation of a statue and its endowments can perhaps be read as a posthumous gift, or one that benefits Nebwawy's mortuary cult. The king, now Amenhotep II, continues the reciprocal relationship with the priest. The emphasis on royal gift-giving with both stelae and with the cult statue signal royal generosity towards a devoted servant. The extended epithets of the reigning king may lend this endowment passage the character of a royal decree.

The offering formula and the appeal to the living at the end are specifically oriented to the next world and the perpetuation of Nebwawy's cult and memory through the spoken word. These passages complete the transition and transfiguration narrated across both stelae, moving Nebwawy from the royal presence into that of his god, where he is 'true of voice before Osiris'.

The narratives that are presented on Nebwawy's two stelae model the progression and development of a whole life, beginning with the first appointment and ending with death and transfiguration before Osiris. Through the innovative narrative strategy of time-telling, the priestly life, and its passing, is presented as exclusively personal and individual.



British Museum EA 1199. Stela of the High Priest of Osiris, Nebwawy  
(courtesy of the British Museum).

RITUAL FUNCTION AND PRIESTLY NARRATIVE: THE STELAE OF THE  
HIGH PRIEST OF OSIRIS, NEBWAWY (pp. 59–81)



Cairo CG 34018. Stela of the High Priest of Osiris, Nebwawy  
 (from Lacau, *Stèles du Nouvel Empire I*, pl. xi).

**RITUAL FUNCTION AND PRIESTLY NARRATIVE: THE STELAE OF THE  
 HIGH PRIEST OF OSIRIS, NEBWAWY (pp. 59-81)**



1. Cairo CG 34017. Stela of the Priest of Heqet and Overseer of the domain of Osiris, Nebwawy (from Lacau, *Stèles du Nouvel Empire I*, pl. xi).

**RITUAL FUNCTION AND PRIESTLY NARRATIVE: THE STELAE OF THE HIGH PRIEST OF OSIRIS, NEBWAWY (pp. 59–81)**

2. Southwest view of el-Markha Plain: Site 346 in foreground (lower left below crosswalk).



**PHARAONIC VENTURES INTO SOUTH SINAI:  
EL-MARKHA PLAIN SITE 346 (pp. 83–116)**

# PHARAONIC VENTURES INTO SOUTH SINAI: EL-MARKHA PLAIN SITE 346

By GREGORY D. MUMFORD *and* SARAH PARCAK

The objectives of the University of Toronto expedition to South Sinai include tracing pharaonic routes to the turquoise and copper mining region, investigating pharaonic and indigenous camps, mines, and their material culture assemblages in this area, and assessing Egypto-Sinaitic cross-cultural relations. The 2000–01 reconnaissance work and 2002 excavations focused on Site 346, a New Kingdom anchorage and copper smelting camp beside the Red Sea, located at the northern end of el-Markha Plain and to the west of the mining region around Serabit el-Khadim. Two contemporary small pottery scatters (Sites 346a–b) and a circular limestone structure (Site 345) were also investigated. The project has incorporated satellite image interpretation to isolate vegetation signatures and associated water sources within the arid el-Markha Plain, thereby detecting potential archaeological sites for ground reconnaissance work.

## **Project objectives and historical context (Gregory Mumford)**

EL-MARKHA Plain is a key coastal area which provided passage, along several *wadi* systems through the South Sinai mountains, to the eastern turquoise and copper mining region (fig. 1). During the pharaonic period expeditions reached el-Markha Plain either via the Red Sea or an overland route from the Wadi Tumilat and the southern Isthmus of Suez. The South Sinai Survey and Excavation Project is a long-term project with broad research objectives concerning the pharaonic exploitation of, and relations with, South Sinai. These objectives include (1) tracing the overland and maritime routes to South Sinai, (2) mapping and excavating selected examples of different site types (e.g. forts, way-stations, anchorages, rest-stops, mines, mining camps, and ancient bedouin camps), (3) investigating and publishing neglected aspects of pharaonic sites (such as mines, mining camps, utilitarian artifacts, and studying cross-cultural relations), (4) assessing material cultural interactions between transient Egyptian expeditions and the indigenous, semi-nomadic pastoralists, and (5) locating archaeological sites through a combination of satellite image interpretation, Geographical Information Systems (GIS), and foot survey work. This report concentrates mainly on the results of the 2000–01 reconnaissance, but incorporates some preliminary results from the 2002 excavations.<sup>1</sup>

<sup>1</sup> For the 2000–02 seasons, the University of Toronto team consisted of Gregory Mumford (project director), Sarah Parcak (satellite image interpretation), Mustafa Rezk (SCA inspector), Laurence Pavlish (geoarchaeologist), Monica Bontty (registrar), Steven Shubert (ceramicist), Rexine Hummel (ceramicist), Debborah Donnelly (assistant ceramicist), Patrick Carstens (photographer), and field assistants Tannis Davidson, Christopher Gilbert, Julie l'Hereaux, and Zoe McQuinn. The Toronto-based project members include Stan Klassen, Shari Stephens, and Arlette Londres. The expedition wishes to thank the colleagues and officials in the Supreme Council for Antiquities, the American Research Center in Egypt, the Department of Near and Middle Eastern Civilizations, University of Toronto, and TM James Multimedia Services (directed by Taber James), for all their assistance

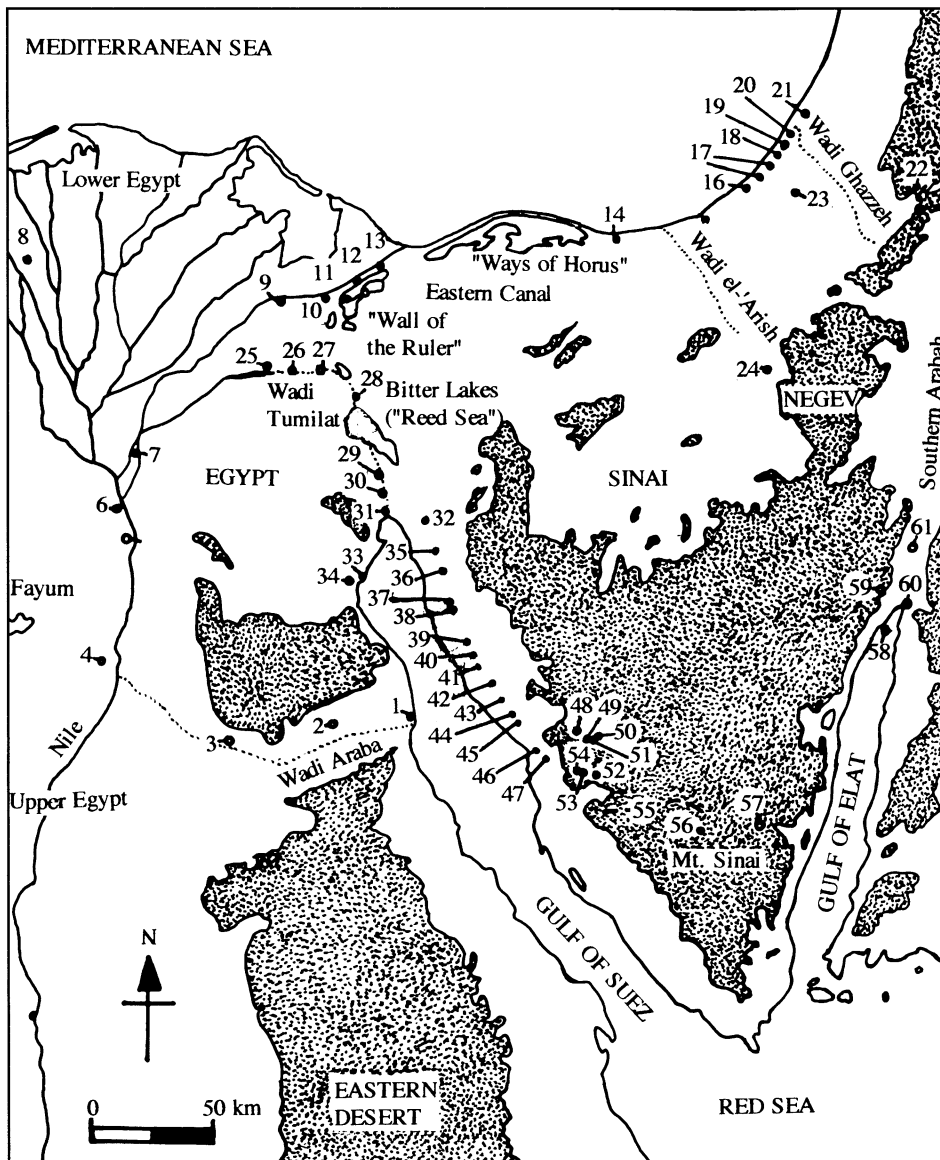


FIG. 1. Egypt and the Sinai; adapted from B. G. Trigger et al., *Ancient Egypt: A Social History* (Cambridge, 1983), 140, fig. 2.10.

Key: 1: Mersa Thelemet, 2: Bir Bikheit, 3: Wadi Sannur, 4: Meidum, 5: Memphis, 6: Giza, 7: Tell el-Yahudiyeh, 8: Sais (Sa el-Hagar), 9: Pi-Ramesses, 10: Tell Defenneh, 11: Tell Abu Sefah, 12: Tell Heboua, 13: Tell Qedwa (T.21), 14: Bir el-Abd (BEA 10), 15: Haruba (A-289), 16: Tell Rafa (Raphia), 17: Tell Abu Salima, 18: Tell Ruqeish, 19: Deir el-Balah, 20: Tell el-Ajjul, 21: Gaza, 22: En-Besor, 23: Arad, 24: Kadesh Barnea, 25: Tell Samad, 26: Tell er-Retabeh, 27: Tell el-Maskhuta, 28: Mound of Serapeum, 29: Gebel Abu Hassa, 30: Gebel Mourr, 31: Kom el-Qolzoum, 32: Ayun Musa, 33: Bir Odeib, 34: el-Ein el Sukhna, 35: Bir Abu Qutifa, 36: Bir Abu Garad, 37: Bir el-Tayib, 38: Bir Taiyib Maliha, 39: Bir el-Nebwi, 40: Ain Hawara, 41: Wadi Gharandal, 42: Bir Waseiyit, 43: Bir Thal/el-Guwisa, 44: Well, 45: Wadi Taiyiba, 46: Site 346, 47: Bir el-Markha, 48: Wadi Kharig, 49: Rod el-Air and Wadi Nasb, 50: Serabit el-Khadim, 51: Wadi Hesif es-Seghair, 52: Wadi Mukhatteb, 53: Wadi Maghara, 54: Wadi Oumm Temain, 55: Wadi Feiran, 56: St Catherine's Monastery, 57: Wadi Reqeita, 58: Geziret el-Faraun, 59: Site 582 (Borot Roded), 60: Tell el-Khaleifeh, 61: Timna (Site 200).



*Archaeological and historical background: Egypto-Sinaitic relations*

Indirect Egyptian exploitation of turquoise and copper<sup>2</sup> from South Sinai occurs as early as the late Predynastic to Early Dynastic Periods. Previous survey work here, by I. Beit-Arieh and others, discovered some Egyptian Protodynastic lithics and one per cent First Dynasty pottery at two earlier Chalcolithic sites (nos. 668 and 1105)<sup>3</sup> and at six contemporary Early Bronze Age I–II sites (nos. 1014, 1018, 1042, 1046–7, 1049, and 1150).<sup>4</sup> The Egyptian pottery consisted of a jug, some ledge-handles from red-burnished Abydos ware vessels (Nile silt), and sherds from cylindrical jars (Petrie SD 78–80; 17 examples of jar type 75b).<sup>5</sup> The latter jars had a pink ware with burnished cream slip. Aside from exporting turquoise to Egypt and receiving some Egyptian products, I. Beit-Arieh, S. Rosen, and others have noted that the South Sinai sites display stronger material cultural links with Arad and Southern Palestine.<sup>6</sup>

The first known direct Egyptian presence in South Sinai appears at Wadi Maghara in the Third Dynasty, and continues here and elsewhere throughout the Old, Middle, and New Kingdoms.<sup>7</sup> During these periods Egyptian activity is attested through inscriptions, structures, and artefacts at various sites (fig. 1). Old Kingdom camps, material culture,

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towards the success of the preliminary seasons. Further thanks go to Larry Bonneau of the Center for Earth Observation at Yale University, for advice in the remote sensing segment of this paper. In addition, the project is indebted to the Social Sciences and Humanities Research Council of Canada and private donors for funds provided towards this project. S. Parcak has contributed the section on satellite image interpretation, while G. Mumford is responsible for the remaining portions of this report.

<sup>2</sup> Although the existence of copper sources in South Sinai has been debated, copper smelting is well-attested by crucibles, stone bellows, tuyeres, ingots, and slag heaps at various pharaonic sites in the region. For references to such activities at Serabit el-Khadim, see I. Beit-Arieh, 'Serabit el-Khadim: New Metallurgical and Chronological Aspects', *Levant* 17 (1985), 89–116; I. Beit-Arieh, 'New Discoveries at Serabit el-Khadim', *Biblical Archaeologist* 45/1 (1982), 13–18. For the discovery at Wadi Maghara of copper ore crushing tools, many crucible fragments, an ingot mould fragment, significant quantities of copper slag, smelting waste, and ore chips, see W. M. F. Petrie, *Researches in Sinai* (London, 1906), 51.

<sup>3</sup> A brief report on the Egyptian Protodynastic pottery and lithics from central Sinai Site 688 is published by B. Rothenberg, 'Sinai', *Revue Biblique* 82 (1975), 75–7.

<sup>4</sup> I. Beit-Arieh, 'A Pattern of Settlement in Southern Sinai and Southern Canaan in the Third Millennium B.C.', *BASOR* 243 (1981), 31–55, fig. 1 (map); I. Beit-Arieh, 'Two Cultures in Southern Sinai in the Third Millennium', *BASOR* 263 (1986), 27–54; I. Beit-Arieh, 'Le Sinai Méridional au Bronze Ancien II', in D. Valbelle and C. Bonnet (eds), *Le Sinai durant l'antiquité et le Moyen Age: 4000 ans d'histoire pour un désert* (Paris, 1998), 33–6. The Early Bronze Age I–II sites include a site at the mouth of Wadi Umm Tumur (Site 1014), a site at the entryway to Waita Pass (Site 1042), Sheikh Muhsen (Sites 1046–7), Nabi Salah (Site 1049), Sheikh Awad (Site 1018), and the eastern entrance to Feiran Oasis (Site 1150). These sites lie east of Wadi Maghara and Serabit el-Khadim.

<sup>5</sup> I. Beit-Arieh, 'An Early Bronze Age II Site at Nabi Salah in Southern Sinai', *Tel Aviv* 1/4 (1974), 151–2 (Site 1049), 155 (fig. 9.10); I. Beit-Arieh, 'A Canaanite Site Near Sheikh Mukhsen', *Expedition* 20/4 (1978), 7 (Site[s] 1046–7); I. Beit-Arieh, 'A Chalcolithic Site Near Serabit el-Khadim', *Tel Aviv* 7/1–2 (1980), 50 and 52 (Site 1105), 53 (fig. 7.14–15); Beit-Arieh, *BASOR* 263, 32, 38, 37 (fig. 11.6), and 39 (fig. 12.20–2).

<sup>6</sup> R. Amiran, I. Beit-Arieh, and J. Glass, 'The Interrelationship Between Arad and Sites in Southern Sinai in the Early Bronze Age II', *Israel Exploration Journal* 23/4 (1973), 193–7.

<sup>7</sup> A. H. Gardiner et al., *The Inscriptions of Sinai*, I. *Introduction and Plates* (MEEF 36; London, 1952); II. *Translations and Commentary* (MEEF 45; London, 1955). For an overview, see G. Mumford, 'Serabit el-Khadim' and 'Wadi Maghara', in K. A. Bard (ed.), *Encyclopedia of the Archaeology of Ancient Egypt* (New York, 1999), 722–5 and 875–8; G. Mumford, 'Sinai', in D. B. Redford (ed.), *The Oxford Encyclopedia of Ancient Egypt* (Oxford, 2001), III, 288–92.

and inscriptions are concentrated at Wadi Maghara<sup>8</sup> and Wadi Kharig.<sup>9</sup> Middle Kingdom occupation and inscriptions expand from Wadi Maghara and Wadi Kharig<sup>10</sup> to Wadi Oumm Temain,<sup>11</sup> Wadi Nasb,<sup>12</sup> and Serabit el-Khadim.<sup>13</sup> New Kingdom activity appears at el-Markha Plain, Wadi Maghara, and Wadi Nasb, but focuses upon Serabit el-Khadim from the reign of Ahmose to that of Ramesses VI.<sup>14</sup> In addition, other New Kingdom traces are seen to the north-east, at Wadi Reqeita in East Sinai and at Borot Roded (Site 582)<sup>15</sup> and Timna (Site 200 and associated sites in the adjacent southern Arabah)<sup>16</sup> in the Negev. Post-New Kingdom visits to Serabit el-Khadim are also known through the discovery of Egyptian amulets,<sup>17</sup> early Roman glass,<sup>18</sup> a piece of Roman pottery,<sup>19</sup> and a Meroitic offering table<sup>20</sup> in the Hathor Temple.

<sup>8</sup> M. Chartier-Raymond, 'Notes sur Maghara (Sinai)', *CRIPPEL* 10 (1988), 13–22, pls. 1–3.

<sup>9</sup> Gardiner et al., *Inscriptions of Sinai* II, 52–66 (nos. 1–22). For the Old and Middle Kingdom inscriptions and a camp at Wadi Kharig, see R. Giveon, 'Short Note: Inscriptions of Sahure' and Sesostri I from Wadi Kharig (Sinai)', *BASOR* 226 (1977), 61–3; R. Giveon, 'Corrected Drawings of the Sahure' and Sesostri I Inscriptions from the Wadi Kharig', *BASOR* 232 (1978), 76.

<sup>10</sup> For the Middle Kingdom inscriptions at Wadi Kharig, see Giveon, *BASOR* 226, 61–3; Giveon, *BASOR* 232, 76.

<sup>11</sup> M. Chartier-Raymond et al., 'Les sites miniers pharaoniques du Sud-Sinai. Quelques notes et observations de terrain', *CRIPPEL* 16 (1994), 36, 38 fig. 4.

<sup>12</sup> For the 'Egyptian ruins' and 'text' marked on the map of Wadi Nasb, see B. Rothenberg, 'Turquoise, Copper and Pilgrims, Archaeology of Southern Sinai', in B. Rothenberg (ed.), *Pharaohs, Miners, Pilgrims and Soldiers* (New York, 1979), 165 fig. 33.

<sup>13</sup> C. Bonnet et al., 'Le temple de la déesse Hathor, maîtresse de la turquoise, à Sérabit el-Khadim. Reprise de l'étude archéologique et épigraphique', *CRIPPEL* 16 (1994), 15–29; Chartier-Raymond et al., *CRIPPEL* 16, 31–77, pls. 1–8; D. Valbelle and C. Bonnet, *Le sanctuaire d'Hathor maîtresse de la turquoise: Serabit el-Khadim au Moyen Empire* (Paris, 1996). See Gardiner et al., *Inscriptions of Sinai* II, 66–74 (nos. 23–43), 76 (no. 46), 77–148 (nos. 47–170), and 199–222 (nos. 324–6, 345, 401–21, 429–31, 500–23, and 526–7).

<sup>14</sup> See Gardiner et al., *Inscriptions of Sinai* II, 74–5 (nos. 44–5), 149–99 (nos. 171–322), 200 (nos. 327, 330, and 332), 201 (nos. 338 and 340), 203 (no. 369), 212–13 (nos. 422–5 and 427–8), 215–16 (nos. 432–3), and 222 (nos. 524–7). Although some kings are absent, such as Akhenaten, Smenkhkare, Tutankhamun, Ay, and Amenmesses, the existence of Horemheb's prenomen on an unpublished faience ring-stand from Serabit el-Khadim (currently in the Royal Ontario Museum, Toronto: 906.16.34 B.3111), suggests further 'missing' royal names may exist in other collections.

<sup>15</sup> The wells of Nahal Roded (Site 582), also termed Borot Roded, lie 11 km to the north-west of the Gulf of Elat and have yielded a large rock-cut inscription with the cartouches of Ramesses III; see B. Rothenberg, *Were These King Solomon's Mines? Excavations in the Timna Valley* (London, 1972), 201, fig. 62.

<sup>16</sup> See B. Rothenberg, *Researches in the Arabah 1959–1984*, I. *The Egyptian Mining Temple at Timna* (London, 1988).

<sup>17</sup> Cooney states that The British Museum collections have '...various amulets, some of them certainly of late date...' (J. D. Cooney, 'Major Macdonald, a Victorian Romantic', *JEA* 58 (1972), 285). The British Museum contains a red-frit *wadjet*-eye amulet (EA 7173) and a glazed composition cowroid (EA 17832) from Macdonald's Sinai collection, though their dating is not clear (Neal Spencer, personal communication).

<sup>18</sup> Cooney has questioned the provenance of a piece of early Roman glass from Macdonald's collection of materials excavated at Serabit el-Khadim in 1845; see J. D. Cooney, *Catalogue of Egyptian Antiquities in the British Museum*, IV. *Glass* (London, 1976), 56 no. 548.

<sup>19</sup> Petrie observed a 'piece of Roman pottery' within the Hathor Temple sanctuary; see Petrie, *Researches in Sinai*, 108.

<sup>20</sup> PM VII, 366 questions the provenance of a Meroitic offering table (Toronto, ROM 921.4.8) which is said to have originated from the Hathor Temple Speos. One cannot discount Currelly's provenance for this piece, however, considering his presence in Petrie's expedition and the existence of other Roman Period activity at Serabit el-Khadim; see J. Leibovitch, 'Les inscriptions protosinaïtiques', *MIE* 28 (1934), 19 fig. 12.

In regards to Egypt's relations with the indigenous populations of Sinai after the Early Dynastic Period, Old Kingdom rock texts at Wadi Maghara depict Egyptian military action, illustrating various pharaohs smiting enemy chieftains and recording skirmishes against hostile *'Iwnwt* and *Mntw* tribes.<sup>21</sup> Wadi Maghara contains a well-fortified camp on a hilltop with 125 stone huts lining the edge. The dangers faced abroad during the late Old Kingdom are illustrated in the biography of Pepy-nakht Heqa-ib, who was dispatched to the Red Sea region to retrieve the body of an expedition commander who had been killed, along with his personnel, by Asiatics.<sup>22</sup>

After an intervening period of minimal or no contact, the renewal of Middle Kingdom activity and texts in South Sinai reflect a definite decrease in hostilities in the area.<sup>23</sup> Inscriptions in Sinai reveal direct Asiatic participation in Egyptian turquoise and copper expeditions, noting 10 Asiatics from Retjenu in an Egyptian mission of 209 persons, while 2 other monuments indicate Egyptian expeditions of unknown size containing 6 and 20 persons of Retjenu, respectively.<sup>24</sup> A depiction of three Asiatic persons, one of whom rides a donkey, was carved upon the base of a stela set up at Serabit el-Khadim.<sup>25</sup> The existence of 'interpreters' and 'overseers of interpreters' in three Old Kingdom and one Middle Kingdom expedition<sup>26</sup> implies extensive interactions between the Egyptians and the indigenous inhabitants and Asiatics working in the mining region.

An increasing Egyptian influence upon Asiatics is evident at Serabit el-Khadim in the Second Intermediate Period, when Asiatics place Proto-Sinaitic inscriptions,<sup>27</sup> derived largely from Egyptian hieroglyphs, on some Middle Kingdom monuments and erect new stelae, some of which contain depictions of Ptah, the Egyptian patron god of craftsmen.<sup>28</sup> Other artefacts from this time include Hyksos scarab types and sherds from

<sup>21</sup> See Gardiner et al., *Inscriptions of Sinai* I-II, 53-8 and 61-3 (nos. 1, 3-8, 10, 14, and 16); pls. i.1, 3-4, ii.5 and 7, iv.6, v.8, vi.10, and viii.14 and 16.

<sup>22</sup> For a translation of the pertinent passage, see D. B. Redford 'Extending the Boundaries', in D. B. Redford and A. K. Grayson (eds), *Papyrus and Tablet* (Englewood Cliffs, 1973), 19. A similar event occurs in Nubia, from where Sabni, a late Sixth Dynasty governor of Elephantine, retrieved the body of his father who had been killed on a trading expedition; see W. S. Smith, 'The Old Kingdom in Egypt and the Beginning of the First Intermediate Period', in I. E. S. Edwards et al. (eds), *Cambridge Ancient History*, I, 2<sup>3</sup> (Cambridge, 1971), 195; see also A. Roccati, *La littérature historique sous l'ancien empire égyptien* (Paris, 1982), 215-20.

<sup>23</sup> For further discussion on the nature of peaceful Asiatic participation in Egyptian mining expeditions, see J. Černý, 'Semites in Egyptian Mining Expeditions to Sinai', *Archiv Orientální* 7 (1935), 384-9, figs. 1-5. On the other hand, during this period the temple at Serabit el-Khadim contains a depiction of a bound prisoner and the stereotypical portrayal of a pharaoh smiting an enemy; see R. Givéon, 'Investigations in the Egyptian Mining Centres in Sinai', *Tel Aviv* 1/3 (1974), 103.

<sup>24</sup> Gardiner et al., *Inscriptions of Sinai* I-II, 116-18 (no. 114), 118-19 (no. 115), and 123 (no. 120).

<sup>25</sup> Gardiner et al., *Inscriptions of Sinai* I-II, 205-6 (no. 405), fig. 17, pl. lxxxv.405.

<sup>26</sup> See Gardiner et al., *Inscriptions of Sinai* II, 229 (index of titles: 'w); E. Bresciani, 'Foreigners', in S. Donadoni (ed.), *The Egyptians* (Chicago, 1997), 229; D. Jones, *An Index of Ancient Egyptian Titles, Epithets and Phrases of the Old Kingdom* (BAR International Series 866; Oxford, 2000), I, 73-4 (no. 327) and 352 (nos. 1309-10); the latter provides the translation 'foreign mercenaries' in addition to 'interpreters'.

<sup>27</sup> This script dates as early as the late Middle Kingdom and extends throughout the Second Intermediate Period. For further references and treatment see F. Briquel-Chatonnet, 'Les inscriptions proto-sinaitiques', in Valbelle and Bonnet (eds), *Le Sinai durant l'antiquité et le Moyen Age*, 56-60. John Darnell has recently discovered a similar script in southern Egypt (personal communication).

<sup>28</sup> See R. F. Butin, 'The Serabit Inscriptions II. The Decipherment and Significance of the Inscriptions', *Harvard Theological Review* 21/1 (1928), 53 (no. 351), pl. iii; R. F. Butin, 'The Protosinaitic Inscriptions', *Harvard Theological Review* 25/2 (1932), 173 (no. 351).

Tell el-Yahudiyeh ware juglets.<sup>29</sup> This suggests that the Hyksos kingdom in northern Egypt maintained contact with South Sinai during this period. The discovery of a few Proto-Sinaitic inscriptions (specifically no. 348) at Wadi Maghara may attest to a similar scenario at this site.<sup>30</sup>

Although a few New Kingdom officials travelling to Serabit el-Khadim have Asiatic names, there is less evidence for direct Asiatic participation in New Kingdom mining expeditions in this region. The New Kingdom inscriptions contain much less detailed information on the personnel of the mining expeditions, but two New Kingdom inscriptions from South Sinai include the Semitic names Aperbaal and Shalim-Shema for high officials participating in expeditions to Serabit el-Khadim.<sup>31</sup> Although these officials are otherwise 'Egyptian' in their official portrayal, it is highly probable that Egyptian mining expeditions to South Sinai either would have contained Sinaitic scouts, or at the very least would have interacted with Sinaitic peoples during their travels and stay in the mining region.

### *Routes from the Nile Valley to el-Markha Plain*

During what season(s), from where, by what means, and by what routes did the ancient Egyptians reach the turquoise and copper mines in South Sinai? Departure dates are known for ten separate Sinai expeditions, spanning the Old, Middle, and New Kingdoms. An examination of the inscriptions from South Sinai reveals that expeditions actually occurred less often during the cooler winter months. Four of the ten expeditions set out during the winter in months one, two, three, and an unknown winter month.<sup>32</sup> In a text describing one expedition dispatched by Amenemhet III, in the third month of winter (with a return date in the first month of summer), the leader emphasizes that this was not the normal season for coming to the South Sinai mining district, but adds that the cooler climate enabled miners to locate turquoise much more easily.<sup>33</sup> Instead, the normal travel period appears to be the summer season, which spans the optimum sailing months. Six of the ten dated Sinai expeditions departed Egypt in the first, second, third, and fourth months of summer.<sup>34</sup>

<sup>29</sup> R. Giveon discovered a few sherds from Tell el-Yahudiyeh ware juglets (unpublished) at Serabit el-Khadim; see R. Giveon, *The Stones of Sinai Speak* (Tokyo, 1978), 61.

<sup>30</sup> Butin, *Harvard Theological Review* 25/2, 126 section 6 (no. 348).

<sup>31</sup> See Mumford, 'Serabit el-Khadim', in Bard (ed.), *Encyclopedia*, 724; Giveon, *The Stones of Sinai Speak*, 135.

<sup>32</sup> One Ramesside text (no. 296) mentions a winter departure date on day 2, but is missing the specific month; another departure dates to the first month of winter, day 2 in year 8 of Sety I (no. 247). A third text (no. 211) mentions departing in the second month of winter, day 9 in year 36 of Amenhotep III. The fourth text (no. 90) includes an abnormal dispatch of an expedition in the third month of winter, during the reign of Amenemhet III; see Gardiner et al., *Inscriptions of Sinai II*, 97–8 (no. 90), 165–6 (no. 211), 175 (no. 247), and 193 (no. 296).

<sup>33</sup> See Gardiner et al., *Inscriptions of Sinai II*, 97–8 (no. 90).

<sup>34</sup> Two texts date to the first month of summer, year 5 of Ramesses IV (no. 275), while another text occurs in month one, day 16, and year 7 of a Middle Kingdom king. Two expeditions depart in month two of summer at some point in the Ramesside Period (nos. 294 and 304). Another Ramesside expedition left Egypt in the third month of summer (no. 302). Pepy I dispatched one expedition in the fourth month of summer, day 5 (no. 16); see Gardiner et al., *Inscriptions of Sinai II*, 187 (no. 275), 189 (no. 276), 193 (no. 294), 195 (no. 304), 194 (no. 302), and 62 (no. 16); M. Abdel-Raziq, 'New Inscriptions at El Ein el-Sukhna', *Memnonia: Bulletin édité par l'Association pour la Sauvegarde du Ramesseum* 10 (1999), 128 (no. 3).

Various Middle and New Kingdom inscriptions allude to turquoise and copper mining expeditions originating from Lower Egypt through the presence of specific titles of officials leading and accompanying the mission. These titles include the ‘governor of Lower Egypt’,<sup>35</sup> the ‘great one of the king of Lower Egypt’,<sup>36</sup> the ‘chancellor/treasurer of the King of Lower Egypt’,<sup>37</sup> and the ‘mayor of Tjaru’ (Tell Heboua).<sup>38</sup> However, only a few titles imply an Upper Egyptian departure point.<sup>39</sup> In contrast, the archaeological evidence indicates multiple departure points from both Lower Egypt and northern Upper Egypt (discussed further below).

Pharaonic texts and graffiti, especially from the Middle Kingdom, provide details of overland and maritime expeditions using donkeys and shipping for transportation to Sinai in both the summer and winter seasons. The extant pharaonic inscriptions from Sinai and el-Ein el-Sukhna reveal expeditions containing 160, 209, at least 470, 734, 3000, and 4000 personnel, the first three in conjunction with groups of 50, 284 and 500 donkeys, respectively.<sup>40</sup> Other monuments display prominent hieroglyphs and depictions of donkeys, some of which carry Asiatics.<sup>41</sup> The quantity of textual and pictorial evidence for naval personnel and boats leaves no doubt that shipping played a major role in the mining expeditions. Old Kingdom and Middle Kingdom naval titles from South Sinai texts include ‘(sea) captain’,<sup>42</sup> ‘overseer of ships’ crews’,<sup>43</sup> ‘overseer of transport ships’,<sup>44</sup>

<sup>35</sup> This title (*imy-r T3-mḥw*) appears in twelve Middle Kingdom inscriptions at Wadi Maghara and Serabit el-Khadim, dating mostly to the reign of King Amenemhet III (eight texts); see Gardiner et al., *Inscriptions of Sinai II*, 68 (no. 26), 80–1 (no. 56), 86 (no. 71), 87 (no. 72), 92–4 (no. 85), 107–8 (no. 103), 108–10 (no. 105), 113–16 (no. 112), 116–18 (no. 114), 118–19 (no. 115), 135–7 (no. 136), and 221 (no. 519).

<sup>36</sup> This title (*ʿ3 n bity*) appears in two texts at Serabit el-Khadim, dating from the reign of King Amenemhet III; see Gardiner et al., *Inscriptions of Sinai II*, 106 (no. 101) and 205–6 (no. 405).

<sup>37</sup> This title (*sq3wty bity*) appears eleven times at Serabit el-Khadim in texts dating to the Twelfth Dynasty (seven examples) and New Kingdom (four examples); see Gardiner et al., *Inscriptions of Sinai II*, 90–1 (no. 83), 100–1 (no. 93), 108–10 (no. 105), 122–4 (no. 120), 131–2 (no. 127), 149 (no. 172), 151 (no. 176), 159–60 (no. 196), 161–2 (no. 199), 187–8 (no. 275), and 211 (no. 417).

<sup>38</sup> One mayor of Tjaru (*ḥty-ʿ n T3rw*) served under Thutmose IV; see Gardiner et al., *Inscriptions of Sinai II*, 81 (no. 58), 230 (index of titles). For the equation of Tjaru with Tell Heboua, see D. Valbelle and M. A. el-Maksoud, ‘La marche du Nord-est’, *Dossiers d’Archéologie: L’Égypte du Delta—Les capitales du nord* 213 (1996), 60–5; M. A. el-Maksoud, ‘Excavations on “The Ways of Horus”. Tell Heboua, North Sinai, 1986–7’, in A. Nibbi (ed.), *Proceedings of Colloquium on the Archaeology, Geography and History of the Egyptian Delta in Pharaonic Times (DE special number 1; Oxford, 1989)*, 173–92.

<sup>39</sup> For example, the title *sdty-nsu* (‘foster-child of the king of Upper Egypt’) may imply a southern departure point; see Gardiner et al., *Inscriptions of Sinai II*, 100–1 (no. 93), 101–3 (no. 94), 104–5 (no. 98), 105–6 (no. 100), and 231 (index of titles).

<sup>40</sup> The first four texts, which date to the Middle Kingdom, appear in Gardiner et al., *Inscriptions of Sinai II*, 208–9 (no. 412), 116–18 (no. 114), 137–8 (no. 137), and 66 (no. 23). Text nos. 3 and 7 at el-Ein el-Sukhna mention 4000 and 3000 persons, respectively; see Abdel-Raziq, *Memnonia* 10, 128–9.

<sup>41</sup> For Egyptian monuments with prominent hieroglyphs and representations of donkeys, once again Middle Kingdom in date, see Gardiner et al., *Inscriptions of Sinai I*, pls. xxxv.110, xxxvi.114, xxxvii.112, xxxix.115, xlv.103, and lxxxv.405.

<sup>42</sup> Two Egyptian titles (*sqd ʿprw* and *ḥrp ʿprw (n) nfr(w)*) with the translation ‘sea captain’ appear in three Old Kingdom texts from Wadi Maghara; see Gardiner et al., *Inscriptions of Sinai II*, 61 (no. 13), 62 (no. 16) and 64 (no. 17).

<sup>43</sup> This title (*imy-r ʿprw*) appears in a Middle Kingdom text from Serabit el-Khadim; see Gardiner et al., *Inscriptions of Sinai II*, 77 (no. 47); another occurrence appears at el-Ein el-Sukhna, cited in Abdel-Raziq, *Memnonia* 10, 128–9 (no. 3).

<sup>44</sup> Four citations of this title (*imy-r ʿḥw*) occur in Middle Kingdom texts from Serabit el-Khadim; see Gardiner

'overseer of boatmen',<sup>45</sup> 'pilot',<sup>46</sup> 'ferryman',<sup>47</sup> and 'rowers'.<sup>48</sup> Some texts mention sea travel and Byblite ships in association with both the author's current trip to Sinai and previous expeditions abroad to Punt and elsewhere.<sup>49</sup> In addition, Middle and New Kingdom graffiti at Rod el-Air, near Serabit el-Khadim, display depictions of boats used by the mining expeditions to cross the Red Sea.<sup>50</sup> One Fifth Dynasty inscription<sup>51</sup> at Wadi Maghara mentions the expedition leader, a sea captain and pilot, named Neankhkhentekhtay, being accompanied—amongst various officials—by four other sea captains (Ebodu, Mernetjerasosi, Neankhmin (?), and Haru), thereby implying the presence of five ships.

One route apparently began in the north-east Delta, possibly from Pi-Ramesses or Tjaru (whence one expedition leader originated), and headed southward to the Gulf of Suez. A variant of this route may have traversed the Wadi Tumilat (East Delta) and turned south along the Isthmus of Suez, which contained a Second Intermediate Period settlement at Tell el-Maskhuta,<sup>52</sup> a New Kingdom settlement and Ramesside fort at Tell er-Retabeh,<sup>53</sup> a Ramesside fortified shrine at Gebel Abu Hassa (containing inscribed jars, texts, and stelae of Sety I and Ramesses II),<sup>54</sup> a stela of Ramesses II erected at Gebel Mourr, and a Ramesside fort at Kom el-Qolzum (Port Suez).<sup>55</sup> The small shrine at Gebel Abu Hassa has yielded a small stela fragment mentioning the goddess Hathor, mistress of the turquoise, attesting to this way-station's role in the passage of expeditions to South Sinai.

et al., *Inscriptions of Sinai* II, 77 (no. 47), 77 (no. 48), 89 (no. 77), and 100 (no. 92); an example appears at el-Ein el-Sukhna, cited in Abdel-Raziq, *Memnonia* 10, 128–9 (no. 3).

<sup>45</sup> One Middle Kingdom text with this title (*imy-r s n d3t*) appears at Serabit el-Khadim; see Gardiner et al., *Inscriptions of Sinai* II, 121 (no. 117).

<sup>46</sup> Three Old Kingdom texts from Wadi Maghara contain this title (*imy-irty*); see Gardiner et al., *Inscriptions of Sinai* II, 60–1 (no. 13), 62–3 (no. 16), and 64 (no. 17).

<sup>47</sup> Two versions (*s n d3t* and *d3y*) of this title occur in ten Middle Kingdom texts from Wadi Maghara and Serabit el-Khadim; see Gardiner et al., *Inscriptions of Sinai* II, 69 (no. 28 (?)), 70–1 (no. 32), 92–4 (no. 85), 100 (no. 92), 100–1 (no. 93), 110–12 (no. 106), 122–4 (no. 120), 134 (no. 133), 208–9 (no. 412), and 209–10 (no. 413).

<sup>48</sup> One example of this title (*hnw*) appears in a Middle Kingdom text from Serabit el-Khadim; see Gardiner et al., *Inscriptions of Sinai* II, 137–8 (no. 137).

<sup>49</sup> For instance, see Gardiner et al., *Inscriptions of Sinai* II, 68 (no. 25) and 165–6 (no. 211).

<sup>50</sup> Gardiner et al., *Inscriptions of Sinai* I–II, 218–22 (nos. 503, 506–7, 517–18, 521, and 524); pls. xciii.503, xciii.506–7, xciv.517–18, xcv.521, and xcv.524.

<sup>51</sup> See Gardiner et al., *Inscriptions of Sinai* II, 60–1 (no. 13).

<sup>52</sup> J. S. Holladay, Jr., *Cities of the Delta*, III. *Tell el-Maskhuta. Preliminary Report on the Wadi Tumilat Project 1978–1979* (Malibu, 1982), 50; J. S. Holladay, Jr., 'A Biblical/Archaeological Whodunit', *Bulletin of the Canadian Mediterranean Institute* 8/2 (1988), 6–8.

<sup>53</sup> W. M. F. Petrie and J. G. Duncan, *Hyksos and Israelite Cities* (BSAE 12; London, 1906), 28–34, pls. xxix–xxxvi.c.

<sup>54</sup> J. Clédat, 'Notes sur l'Isthme de Suez', *BIFAO* 16 (1916); 201–28 and fold-out map. On pp. 204–12, Clédat provides a discussion of his work at Gebel Abu Hassa and Gebel Mourr.

<sup>55</sup> The editor, 'Egypt Unravels Riddles of History after 57 Years of Archaeological Research', in *Egypt Travel Magazine* 94 (June 1962), 33, provides some details about the Ramesside fort at Tell el-Qulzum (Kom el-Qolzum), describing it as having a central governor's residency, storehouses, barracks, a 7 m thick enclosure wall, and a large western gate. Other information and photographs concerning the Ramesside fortress have appeared in J. Leclant, 'Fouilles et travaux en Égypte et au Soudan, 1961–1962', *Orientalia*, N.S. 32 (1963), 85 (no. 7); J. Leclant, 'Fouilles et travaux en Égypte et au Soudan, 1962–1963', *Orientalia*, N.S. 33 (1964), 342 (no. 11), figs. 4–6. A red granite door-jamb of Ramesses II was discovered here prior to 1890 and is published by G. Roeder, *Aegyptische Inschriften aus den Königlichen Museen zu Berlin*, V. *Inschriften des Neuen Reichs: Statuen, Stelen und Reliefs* (Leipzig, 1913), 118, 236 (no. 11164).

Abdel-Raziq quite plausibly suggests that another route to South Sinai departed from the Memphite region and used eastern desert wells (e.g. Bir Qana) to sustain expeditions along the route to el-Ein el-Sukhna. This destination lay 10 km south of an anchorage at Bir Odeib<sup>56</sup> beside the Red Sea at the northern end of the Gulf of Suez. El-Basiuny and Abdel-Raziq recorded eight Middle Kingdom rock-cut inscriptions at el-Ein el-Sukhna,<sup>57</sup> some of which attest to copper and turquoise mining expeditions reaching this region *en route* to South Sinai. The preceding three routes appear to originate from the contemporary royal residence (Itj-tawy in the Twelfth Dynasty; Pi-Ramesses in the Ramesside Period) and reached the northern end of the Gulf of Suez. This would not be unusual since the pharaoh dispatched such expeditions abroad and would often receive the proceeds from foreign expeditions at the royal residence.<sup>58</sup>

A fourth overland and maritime route to South Sinai very likely began from the royal residence at Thebes or Memphis, and crossed the Eastern Desert from the environs of Beni Suef in Middle Egypt. This route traversed Wadi Araba, passing a shrine of Ramesses II at Wadi Sannur and a New Kingdom copper mine and camp near Bir Bikheit and Bir Thimeil.<sup>59</sup> The Red Sea terminus of this route probably lay at Mersa Thelemet<sup>60</sup> opposite el-Markha Plain, which accessed the turquoise (and copper) mining region. The question remains as to what extent pharaonic expeditions used ships along the Red Sea portion of the route to South Sinai, versus an overland route along West Sinai. The Middle Kingdom Red Sea port at Wadi Gawasis<sup>61</sup> lies 300 km south of el-Markha Plain, but is better attested for maritime voyages to the land of Punt.<sup>62</sup>

The Red Sea stage of the trip is more complicated. Although sailing southward along the Red Sea presents no problem virtually all year round, northerly winds (and from June to September north-south currents) have long provided sailors with difficulties in

<sup>56</sup> See K. A. Kitchen, 'Punt and How to Get There', *Orientalia*, N.S. 40 (1971), 197, 204-5 (figs. 1-2); Kümmerly and Frey, *Egypt: Educational School-Map (1:950,000)* (Cairo, 1989).

<sup>57</sup> Abdel-Raziq, *Memnonia* 10, 125-31, fig. 1 (map), pls. xxxiii-xxxvii (inscriptions).

<sup>58</sup> For example, Hatshepsut's year 9 Red Sea expedition to Punt shipped products overland from the Red Sea coast to the Nile Valley, and then re-loaded the Puntite products onto riverine vessels for delivery to Hatshepsut at Karnak Temple in Thebes; see K. A. Kitchen, 'The Land of Punt', in T. Shaw et al. (eds), *The Archaeology of Africa: Food, Metals and Towns* (New York, 1993), 597. In the reign of Ramesses III, P. Harris I (British Museum EA 9999) reveals that the temples of Amun, Re, and Ptah maintained fleets for the collection and return of produce (from Levantine estates owned by these cults) to Thebes, Heliopolis, and Memphis; see P. Grandet, *Le Papyrus Harris I*, I (BdE 109/1; Cairo, 1994), 230, 239, 289.

<sup>59</sup> B. Moritz discovered two limestone stelae of Ramesses II (Cairo JE 34512; Munich G1.29) beside a small 7 by 10 m stone shrine in Wadi Sannur, which lies between Nag Alalma (north of Beni Suef) and the Gulf of Suez. One stela portrayed Ramesses II smiting an enemy before Horus (?), while the other stela showed him dispatching an enemy before Seth. For more details, see G. Brunton, 'Ramesside Stelae from the Eastern Desert', *ASAE* 36 (1936), 201; see PM VII, 339, 424 (Map IV). The location of these stelae at Wadi Sannur, and of a New Kingdom copper mine and camp at Bir Bikheit and Bir Thimeil, are published in G. W. Murray, 'A New Empire (?) Copper Mine in the Wadi 'Araba', *ASAE* 51 (1951), 217-18.

<sup>60</sup> Kitchen, *Orientalia* 40, 197, 204-5 (figs. 1-2).

<sup>61</sup> A. M. A. H. Sayed, 'Discovery of the Site of the 12th Dynasty Port at Wadi Gawasis on the Red Sea Shore', *RdE* 29 (1977), 139-78.

<sup>62</sup> Punt almost certainly lay 1000 km to the south in eastern Sudan and Eritrea, where New Kingdom potsherds, calcite vessel pieces, glass vessel fragments, and some jewellery have been found. Senwosret I dispatched one expedition to Punt from Wadi Gawasis, consisting of several ships carrying 3756 persons led by the 'hereditary prince, mayor, and governor of the town [...], Antefoker'. This official erected a stela at this Red Sea port; see Sayed, *RdE* 29, 169-70; R. Fattovich, 'Punt', in Bard (ed.), *Encyclopedia*, 636-7.

sailing northward along the Red Sea.<sup>63</sup> In regards to an overland route, pharaonic sites have not yet been identified in the 160 km stretch alongside the Red Sea from Port Suez to el-Markha Plain.<sup>64</sup> Egyptian expeditions may have followed an overland route in the winter months, during which northward sailing was trickier,<sup>65</sup> while the winter rains would have provided peak quantities of water in wells and catchment basins throughout West Sinai.<sup>66</sup>

An examination of survey maps and the region along the West Sinai foothills, from Port Suez to el-Markha Plain, reveals a north–south line of fourteen oases, springs, wells, and basins (Table 1; fig. 1).<sup>67</sup> Most of these water sources could easily have provided the daily water requirements for overland expeditions in the winter and to a lesser extent in the summer. The first well, Ayun Musa,<sup>68</sup> which lies to the south-east of a Ramesside fort at Kom el-Qolzoum (Port Suez), contains archaeological remains, including an ushabti fragment and a late Roman to Coptic Period settlement.<sup>69</sup> The second well, Bir Abu Qitifa, is very salty, and could not have supplied drinking water.<sup>70</sup> The eighth water source, Wadi Gharandal, contains a small stream and many trees, furnishing an ideal watering place and camp site, and has yielded archaeological remains from the Roman Period.<sup>71</sup>

<sup>63</sup> P. Mayerson, 'The Port of Clysma (Suez) in Transition from Roman to Arab Rule', *JNES* 55 (1996), 19–20; P. Mayerson, 'The Island of Iotabe in the Byzantine Sources: A Reprise', *BASOR* 287 (1992), 1–4; Kitchen, *Orientalia* 40, 194.

<sup>64</sup> G. Mumford, *International Relations between Egypt, Sinai, and Syria–Palestine during the Late Bronze Age to Early Persian Period (Dynasties 18–26: c.1550–525 B.C.)* (PhD dissertation, University of Toronto, 1998), 504–1313. In particular, see B. Rothenberg, 'An Archaeological Survey of South Sinai. First Season 1967/1968. Preliminary Report', *PEQ* 102 (1970), 4–29 (especially survey maps on pp. 6–14, figs. 1–8), for the presence and absence of sites through time in South Sinai.

<sup>65</sup> Kitchen has noted that tropical storms are unknown in the Red Sea proper (*Orientalia* 40, 195). He also relates that in winter the north/north-west winds continue to dominate the Red Sea north of 20 degrees latitude north (near Port Sudan), making difficult most northward maritime return trips to Port Suez. On the other hand, such wind patterns would not exclude a westward crossing, or even a return voyage southwards to ports such as Wadi Gawasis.

<sup>66</sup> Rain water collects in natural basins providing temporary watering places throughout the Sinai desert; see F. W. Moon and H. Sadek, *Topography and Geology of Northern Sinai*, Part 1: *Session 1919–1920* (Cairo, 1921), 18.

<sup>67</sup> For the location of these water sources, see the Survey of Egypt maps of Sinai, 1937–8 (scale 1:100,000), specifically Sheets 11 (Mitla Pass, Northern Sinai), 15 (Wadi Sudr, Northern Sinai), 1 (Hammam Faraun, Southern Sinai), and 5 (Abu Zenima, Southern Sinai). Egeria's detailed account of her pilgrimage to Mount Sinai, which occurred at some point between AD 381 and 384, provides information about the topography, vegetation, and water sources along the West Sinai coast. Her route followed the coastline more closely and contained fewer rest points: (1) Clysma, (2) a staging post beside the sea, (3) Marah (Abu Mereir?), which contained a few palm trees, (5) a staging-post beside the Red Sea (Abu Senima; site 346?), (6) Paran (Rephidim; modern Wadi Feiran), and (7) Mount Sinai. See J. Wilkinson, *Egeria's Travels*<sup>3</sup> (Warminster, 1999), 103–6, 114–15 (sections Y6–16 and 6.1–6.3). For further information about pilgrimages and routes to South Sinai, see J. Wilkinson, *Jerusalem Pilgrims Before the Crusades* (Warminster, 1977), 15–20, 72–3, 79–89 and 117–21; P. Mayerson, 'The Clysma–Phara–Haila Road on the Peutinger Table', in L. Casson et al. (eds), *Coins, Culture, and History in the Ancient World. Numismatic and Other Studies in Honor of Bluma L. Trell* (Detroit, 1981), 167–76.

<sup>68</sup> This oasis yields brackish but drinkable water. See Moon and Sadek, *Topography and Geology of Northern Sinai*, 18 and pocket-map.

<sup>69</sup> For excavation results from Ayun Musa, see M. A. Ali, 'Pottery Factory Discovered at Oyun Mose, South Sinai', *JSSEA* 25 (1995), 1–6, pls. i–iv. For an inscribed, blue faience ushabti fragment (British Museum EA 1849.08-11.395; Major Macdonald 1845 collection from Sinai) found on the surface near a well at Ayun Musa, see Cooney, *JEA* 58, 281.

<sup>70</sup> The water at Bir Abu Qitifa is very salty and unfit for human consumption; see Moon and Sadek, *Topography and Geology of Northern Sinai*, 18.

<sup>71</sup> Mustafa Rezk (SCA inspector at Abu Zenima), personal communication.



TABLE 1. *Water sources between Port Suez and el-Markha Plain.*

Well number and name	Distance from previous well	Nature of water source
1. Ayun Musa ('Moses' Wells')	15 km south-east of Port Suez	Slightly brackish water
2. Bir Abu Qitifa	19 km south of well 1	Very salty water
3. Bir Abu Garad	10 km south of well 2	—
4. Bir el-Tayib	15 km south of well 3	—
5. Bir Taiyib Maliha	4.5 km south of well 4	—
6. Bir el-Nebwi	18 km south of well 5	—
7. Ain Hawara	6 km south of well 6	—
8. Wadi Gharandal	6 km south of well 7	A small stream with many trees
9. Bir Waseiyit	11 km south of well 8	Palm trees
10. Bir Thal (and Bir el-Guwisa)	10 km south of well 9	—
11. (?)	9 km south of well 10	A salty spring with palms
12. Wadi Taiyiba	4 km south of well 11	Brackish water (this well is located on the coast)
13. Site 346	10 km south of well 12	Winter waterfall and catchment basin
14. Bir el-Markha	8 km south of Site 346	Isolated acacia tree

### El-Markha Plain

#### Site 346

El-Markha Plain provides the most direct access, via wadi systems through hills and mountains, to the inland turquoise mining region in South Sinai (fig. 2; pl. VI, 2). It is thereby best positioned for the placement, and detection, of pharaonic anchorages and way-stations facilitating overland and maritime expeditions to this region. In 1948 W. F. Albright and H. Field discovered an 'Eighteenth Dynasty' coastal site<sup>72</sup> (Rothenberg's later designated Site 346)<sup>73</sup> beside a bay at the northern end of el-Markha Plain, but only brief descriptions were published. Following the 1967 and 1991 visits to Site 346 by B. Rothenberg<sup>74</sup> and M. Chartier-Raymond<sup>75</sup> respectively, the University of Toronto project examined the surface debris here over several days during June, July, and August of 2000 and 2001.

Field described the seaport at the Bay of el-Markha as lying 5 km south of (old) Abu Zenima.<sup>76</sup> The site itself was said to represent a low settlement mound, located upon a low hillock that lay on the northern edge of el-Markha Plain, just over 100 m from the Gulf of Suez.<sup>77</sup> Field noted that it lay beside a protected cove perfect for anchorage.<sup>78</sup>

<sup>72</sup> Albright compared the pottery from the seaport with the Eighteenth Dynasty material in R. Engelbach, *Harageh* (BSAE 28; London, 1923), 17, pls. xlii-v.

<sup>73</sup> Rothenberg, *PEQ* 102, 18 and 25 (Sites 345-6).

<sup>74</sup> See *PEQ* 102, 12 fig. 5 (Sites 345-6), 18, 25 (Sites 345-6).

<sup>75</sup> *CRIPEL* 16, 34 (el-Markha), 35 fig. 2.

<sup>76</sup> H. Field, 'The University of California African Expedition: I, Egypt', *American Anthropologist* 50 (1948), 484 (seaport).

<sup>77</sup> See H. Field, 'Sinai Sheds New Light on the Bible', *The National Geographic Magazine* 94/6 (1948), 800 (photo), 802; Field, *AA* 50, 484; H. Field, 'Sinai Peninsula Programs', *Science* 107 (1948), 669; W. F. Albright, 'Exploring in Sinai with the University of California Africa Expedition', *BASOR* 109 (1948), 10 fig. 2 (site photograph), 13-15.

<sup>78</sup> Field, *National Geographic* 94/6, 802.

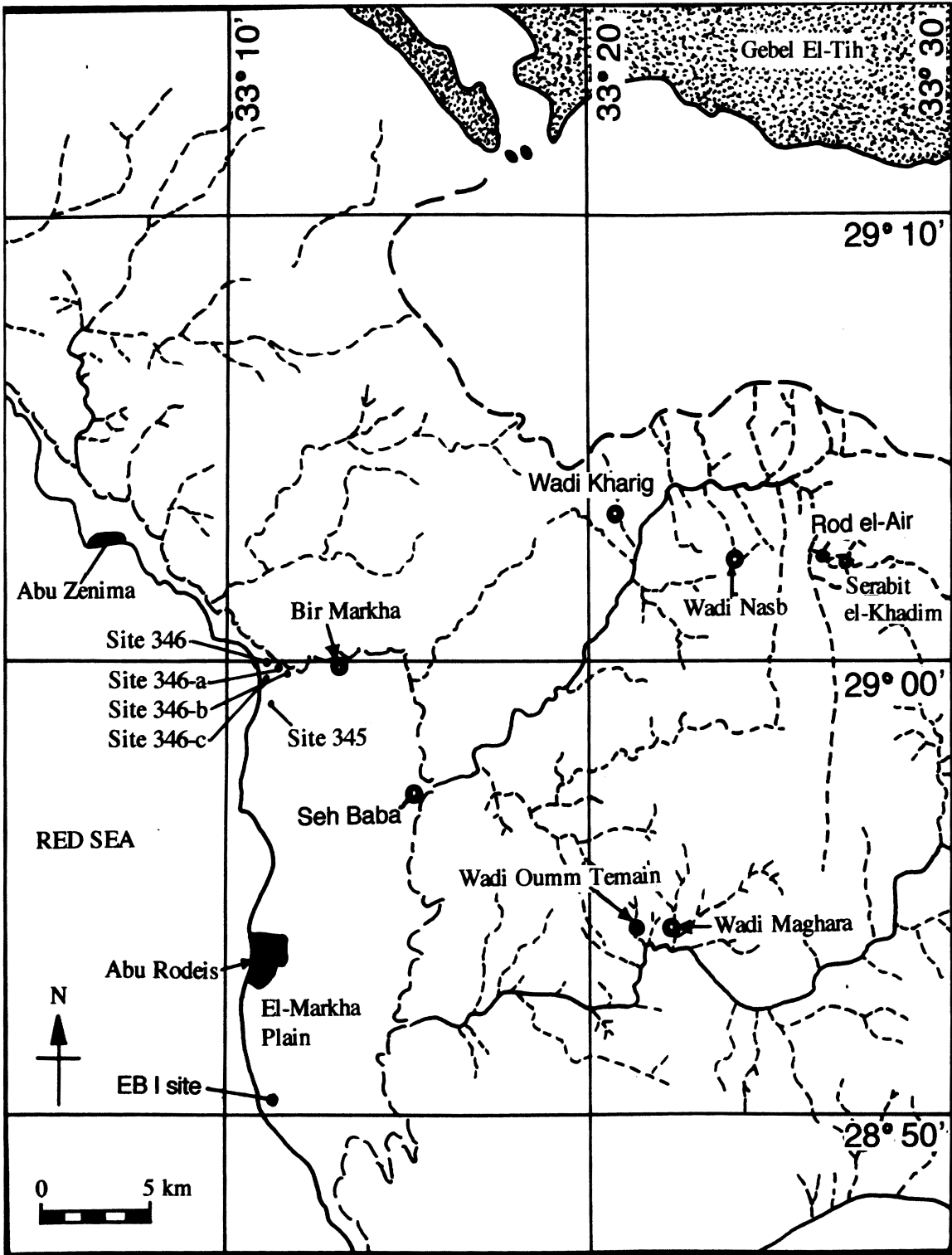


FIG. 2. Map of el-Markha Plain and the mining region; adapted from 1937 Survey of Egypt map, scale 1: 100,000, sheet 5 (Abu Zenima).

Although Field and Albright described the site as measuring 50 by 100 m, Rothenberg later estimated it to be 50 by 110 m.<sup>79</sup> The lowest part of the settlement mound lay about 2 m above the Red Sea high tide mark;<sup>80</sup> in general, the mound lies between 4 and 5 m above (mean Red) sea level.<sup>81</sup> Field and Albright observed that the occupation debris had been almost completely removed by wind erosion.<sup>82</sup> Field noted<sup>83</sup> that Albright had conducted some trial trenches/soundings and a general examination of the site. Elsewhere he clarifies,<sup>84</sup> however, that Albright had examined an existing section through the mound that had been cut by the Sinai Mining Company to accommodate a light railway track to connect the manganese mines of Umm Bogma with the Red Sea. Their investigation of this section, and possibly other soundings, revealed minimal indications of superimposed constructions.<sup>85</sup> Albright concluded that the site contained only one stratum and that the occupation had spanned a relatively short period.<sup>86</sup>

The mound's surface yielded a scattering of sherds, which were drawn and photographed but which remain unpublished and unlocated.<sup>87</sup> The pottery was described as being fragments of crude, dark pottery that were 'unmistakably ancient Egyptian'.<sup>88</sup> The pottery assemblage was said to be quite homogeneous and contained a 'limited number of constantly repeated forms'.<sup>89</sup> G. Brunton and J. Leibovitch examined and dated this pottery by identical fifteenth century BC Egyptian material from Harageh and other sites, citing a date of about 1500 BC and placing the pottery within the reigns of Hatshepsut and Thutmose III.<sup>90</sup> Albright noted that the el-Markha site pottery matched various forms illustrated in Engelbach's publication of Harageh,<sup>91</sup> which included ledge-rimmed bowls (with rounded bases), bowls with flat bases, bowls with pedestal/disk bases, decanters, drop-shaped jars, globular storage jars, biconical jars, beer jars, storage jars, pot stands, and juglets. He also observed<sup>92</sup> that one bowl rim (measuring 21.5 cm in diameter and 12.5 cm high) paralleled a buff bowl potsherd with a black and white stripe found at Serabit el-Khadim by Petrie, and two bowls found here by Butin and Starr.<sup>93</sup> During Rothenberg's South Sinai survey, he designated Albright's seaport site as number 346 and noted much charcoal and pottery, including crucible fragments.<sup>94</sup>

<sup>79</sup> Field, *Science* 107, 669; Albright, *BASOR* 109, 10 (fig. 2), 14; Rothenberg, *PEQ* 102, 25 (Site 346).

<sup>80</sup> Field, *AA* 50, 484; Albright, *BASOR* 109, 10 (fig. 2), 14.

<sup>81</sup> H. Field, 'Archaeological News: Miscellaneous', *AJA* 53 (1949), 40; Field, *Science* 107, 669; Albright, *BASOR* 109, 10 (fig. 2), 14.

<sup>82</sup> Field, *Science* 107, 669; Albright, *BASOR* 109, 10 (fig. 2), 14.

<sup>83</sup> *AA* 50, 484; and *Science* 107, 669.

<sup>84</sup> Field, *National Geographic* 94/6, 802.

<sup>85</sup> Albright, *BASOR* 109, 10 (fig. 2), 14.

<sup>86</sup> *BASOR* 109, 10 (fig. 2), 14.

<sup>87</sup> Field, *National Geographic* 94/6, 802; Field, *Science* 107, 669; Albright, *BASOR* 109, 10 (fig. 2), 14.

<sup>88</sup> Field, *National Geographic* 94/6, 802.

<sup>89</sup> Albright, *BASOR* 109, 14.

<sup>90</sup> Field, *AA* 50, 484; Field, *Science* 107, 669; Albright, *BASOR* 109, 14; W. F. Albright, 'The Early Alphabetic Inscriptions from Sinai and their Decipherment', *BASOR* 110 (1948), 10 and n. 22.

<sup>91</sup> Engelbach, *Harageh*, 17, pls. xlii-v.

<sup>92</sup> Albright, *BASOR* 110, 9, 10, n. 23.

<sup>93</sup> The seaport site yielded identical bowls to two fragmentary, coarse, light red-ware bowls (with direct rims and flat bases) found at Serabit el-Khadim and published by R. F. S. Starr and R. F. Butin, *Excavations and Protosinaitic Inscriptions at Serabit el-Khadem. Report of the Expedition of 1935* (London, 1936), 23, fig. 24, pl. 12 (one example illustrated).

<sup>94</sup> Rothenberg, *PEQ* 102, 25 (Site 346).

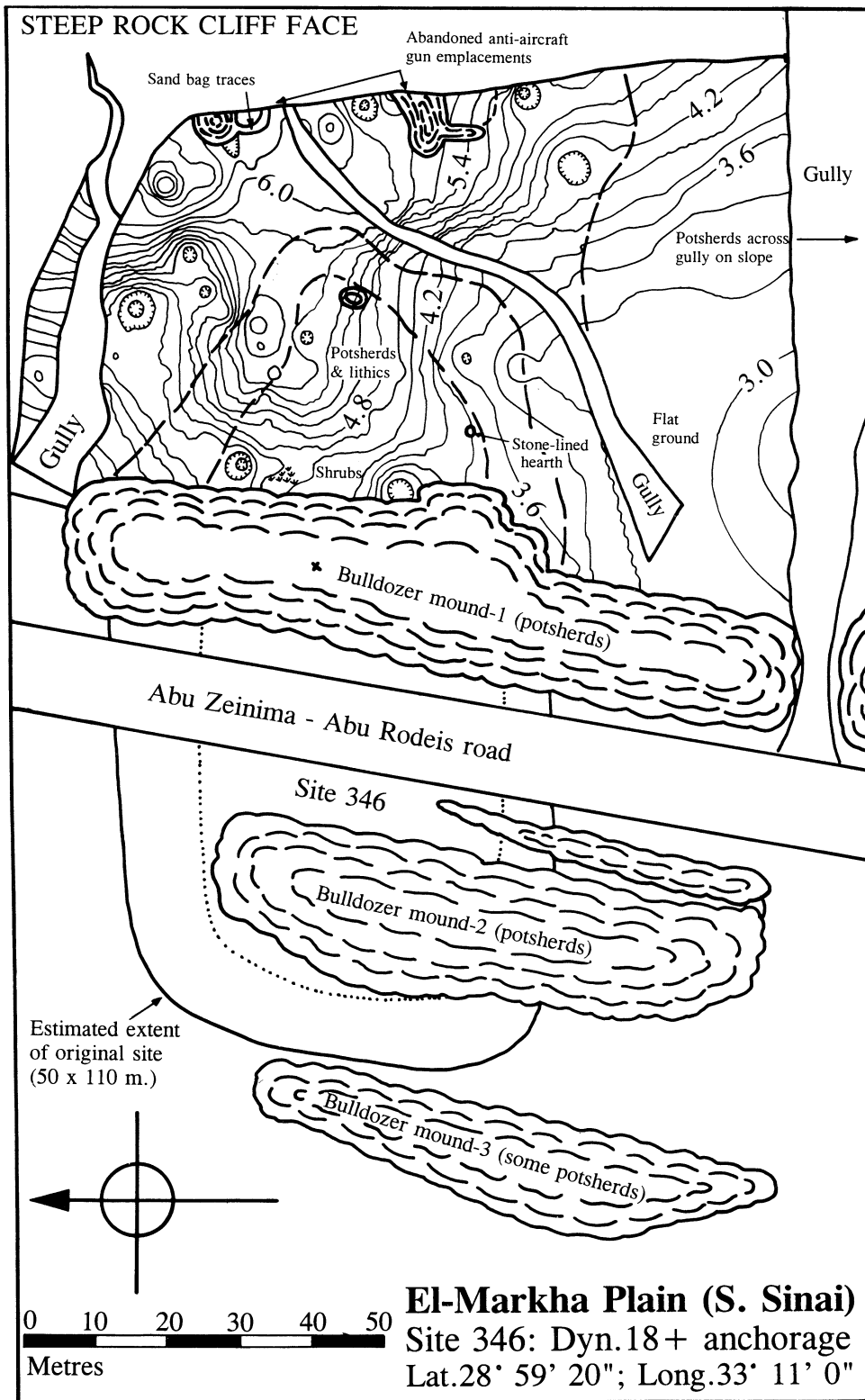


FIG. 3. Topographic map and environs of Site 346 (L. Pavlish and G. Mumford).

Despite the construction of a new road through part of the site in the late 1980s, sufficient portions of the mound survive (i.e. 40 by 50 m) and are worthy of further investigation.

The project geoarchaeologist, L. Pavlish, generated a topographic map of the mound in 2001, with other details added by the author (fig. 3). The surviving mound's surface contained traces of several furnaces and a small, stone lined circle (a hearth?). The material culture assemblage resembled some of the Harageh and Serabit el-Khadim pottery described by Albright and Rothenberg, but also included other variants of New Kingdom bowls, white-slipped amphora, Canaanite storage jars, grinding stones, pounders, lithics, and copper slag. Site 346 can be reconstructed as a transitory coastal camp site with direct access to a nearby small, protected bay (without reefs) where ships could anchor for several months. The evidence of furnaces, crucibles, charcoal, and lumps of copper slag suggest some refining of copper prior to loading ingots onto ships bound for the west side of the Red Sea. The absence of structures implies a temporary camp, presumably using cloth tents with stones weighing down the base.<sup>95</sup> The pottery vessels include closed forms for the storage of liquids and solid food products. The grinding stones reveal the preparation of flour from sacks of grain, while some moulds, cooking pots, and bowls represent utensils for baking, cooking, and eating.<sup>96</sup> Two copper smelting furnaces and a trench in the eastern area of the mound were excavated in 2002; details will be published in a further report.

#### *Sites 345 and 346a-b*

The University of Toronto project has investigated other 'pharaonic' sites identified in el-Markha Plain, and aims to locate further archaeological sites *en route* to Seh Baba and the wadi systems leading eastward to Wadi Maghara and Serabit el-Khadim. For instance, Rothenberg reported one potential 'pharaonic' site (no. 345) to the south of Site 346, at the northern end of el-Markha Plain. This site is described as lying 200 m from the Red Sea with potsherds, copper slag, and traces of a large structure below the sand. During the 2002 season, the University of Toronto expedition relocated this site 1.76 km to the south of Site 346. Excavations in portions of this site revealed that it post-dated the pharaonic period and represented a circular, limestone fort, measuring 42 m in diameter, and contained 5 m wide walls (preserved up to 3.5 m) and a western entry and bastion.

The June 2001 surface survey examined a 50 m stretch extending 3 km south of Site 346 and discovered two more New Kingdom sites along the foothills. These contained only a collection of sherds from broken amphorae (fig. 4.10), representing transitory rest points *en route* to the mining region. Both rest points lay on higher ground, adjacent to wadi beds, and at the foot of the hills bordering the plain. These rest stops, and other similar site placements, imply prudent winter travel during which experienced trekkers

<sup>95</sup> Luxor Temple contains a scene with small and large tents in Ramesses II's camp near Qadesh; see K. A. Kitchen, *Pharaoh Triumphant: The Life and Times of Ramesses II* (Warminster, 1982), 55 fig. 18. The Egyptian word for tent (*ih3yr*, *ihyr*, *p3 ih3yr*) represents a Semitic loan word (*ahl*; *ahlum*), which appears in P. Harris I and in a Karnak Temple inscription detailing Merenptah's Libyan war; see J. E. Hoch, *Semitic Words in Egyptian Texts of the New Kingdom and Third Intermediate Period* (Princeton, 1994), 31 (no. 24).

<sup>96</sup> The Memphite tomb of Horemheb contains blocks illustrating life in a military camp, with a depiction of a commander's tent and personnel grinding grain, fetching water in water-skins, and erecting a tent; see G. T. Martin, *The Hidden Tombs of Memphis* (London, 1991), 56-7 figs. 21-2.

avoided stopping in wadi beds. Expeditions may have minimized the time spent traversing wadi beds which bear deadly flash floods in winter.

Hence, from Sites 346, 346a, 346b, and others, we can extrapolate various ideal site location determinants: access to drinking water (provided by wadis and foothill springs), elevation (above wadi flash floods), and morning shade (afforded by the high hills immediately to the east).<sup>97</sup> The larger New Kingdom site (346), contained all these features, but also had direct access to a natural anchorage 100 m to the west and lay at the southern end of a natural overland passage through the Sinai hills from the West Sinai coastal plain to the north. These hills reach the edge of the Red Sea and prevent overland passage along the shore, making Site 346 a key location for both maritime and overland traffic traversing this area.<sup>98</sup> A brief visit to the adjacent hills revealed nearby flint sources and lithic working sites.

*El-Markha Plain: Pottery from Sites 346, 346a, and 346b*

The 45 vessel sherds from the mound's surface form a representative sample of the pottery from Site 346 (43 sherds) and Sites 346a (fig. 4.10) and 346b (fig. 4.9), which are illustrated in figures 4–7 and described in Table 2.<sup>99</sup> The pottery assemblage consists of 25 (56%) small to large bowls (fig. 5.16–30; fig. 6.31–8; fig. 7.43–4), 15 (33%) storage jars (fig. 4.1–15), 4 (9%) 'moulds' or crucibles (fig. 7.39–42), and 1 (2%) beer jar base (fig. 7.45). Of these vessels, the bowls can be subdivided into 8 larger, thick-walled bowls (fig. 6.31–8) and 17 smaller, thin-walled bowls (fig. 5.16–30; fig. 6.43–4). Although preliminary analysis shows that many of the forms appear in New Kingdom Egypt (Table 2), the project ceramicist (Rexine Hummel) noted that only a few sherds resembled Nile Valley silts. The 2002 season yielded a further 591 sherds, of which 5% originated from the Nile Valley, while the remaining 95% represented Sinaitic fabrics. The material collected in 2001 included five examples of a Canaanite-style storage jar, composing 11% of the pottery corpus from the three sites. Although Brunton and Leibovitch originally dated the 1948 pottery sample to the Eighteenth Dynasty, the 45 diagnostic surface sherds from the recent reconnaissance work date more broadly to the New Kingdom. The particular markers of the early Eighteenth Dynasty await further investigation. The pottery included slipped and unslipped vessels, including examples with a pale yellow slip, a very pale brown slip, a reddish-yellow slip, a pink slip, red slip, and one dark grey slip (Table 2). Many of the sherds had coatings of salt encrustations and exhibited wear from wind erosion. The 2002 season has produced stratified pottery with less abraded surfaces.

<sup>97</sup> The application of these locational determinants to a Geographical Information Systems program for South Sinai, in conjunction with satellite image interpretation, should minimize the amount of ground surface survey work required to locate more ancient sites.

<sup>98</sup> Although the place 'Nose of the Gazelle' is usually located in the Levant, it is tempting to equate Weni's crossing of a sea and his expedition against a band of desert marauders (at 'Gazelle Nose') with South Sinai. The local topography (i.e. a trail behind a coastal mountain range; a suggestively shaped mountain at Hamman Faroun) and the political climate in South Sinai (i.e. attested warfare against bedouins) parallel Weni's descriptions; see M. Lichtheim, *Ancient Egyptian Literature, I. The Old and Middle Kingdoms* (Berkeley, 1975), 20.

<sup>99</sup> The pottery was initially drawn and described by Tannis Davidson, Gregory Mumford, and Sarah Parcak. G. Mumford and Rexine Hummel provided subsequent supplementary descriptions with some suggestions by John Holladay, Jr. and Patricia Paice. G. Mumford inked the pottery drawings, which were scanned, digitized on a computer, and arranged into figures 4–7 by Stanley Klassen and Shari Stephens.

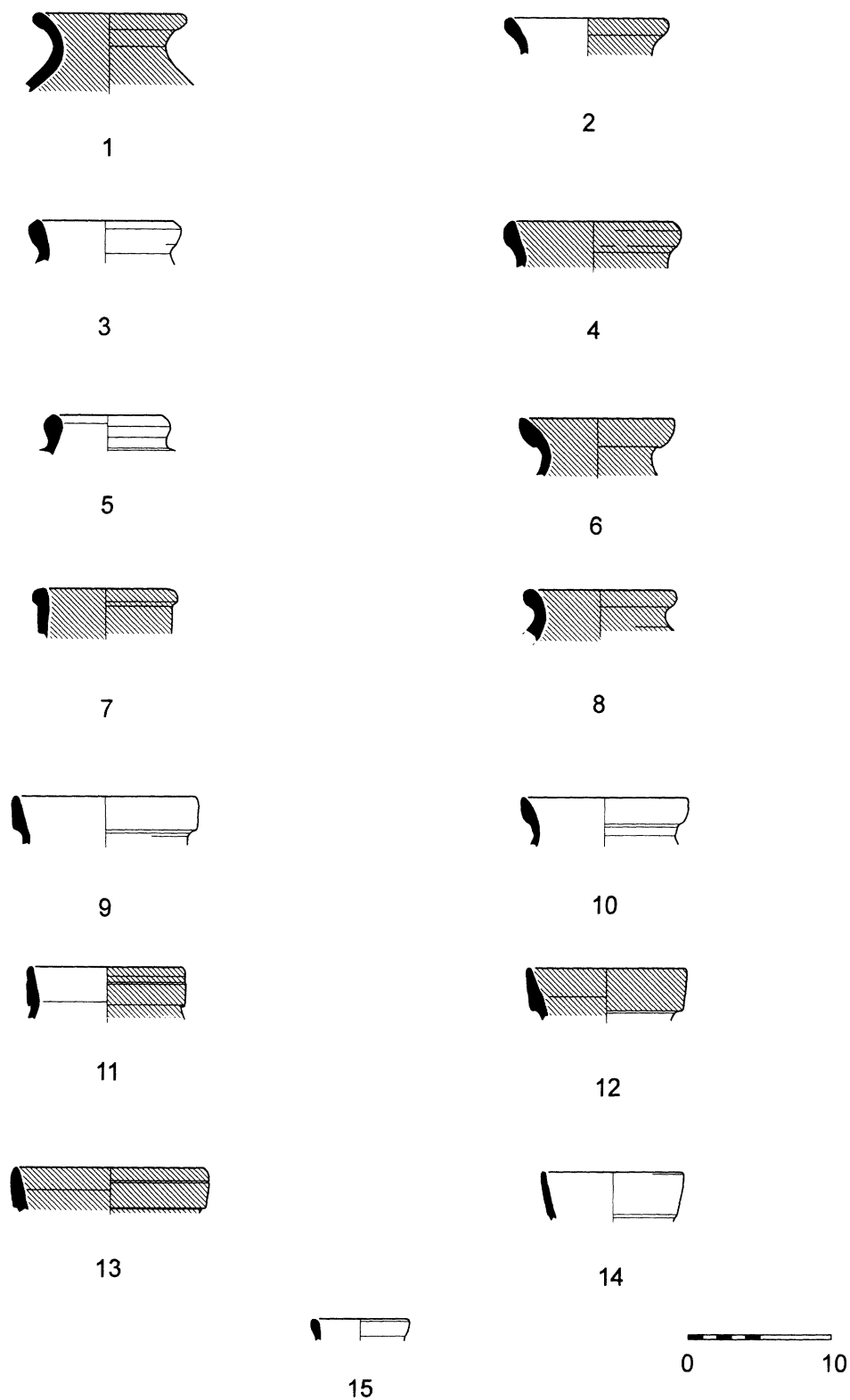


FIG. 4. Jar rims 1-15 from Site 346 and 346a-b (el-Markha Plain, South Sinai).

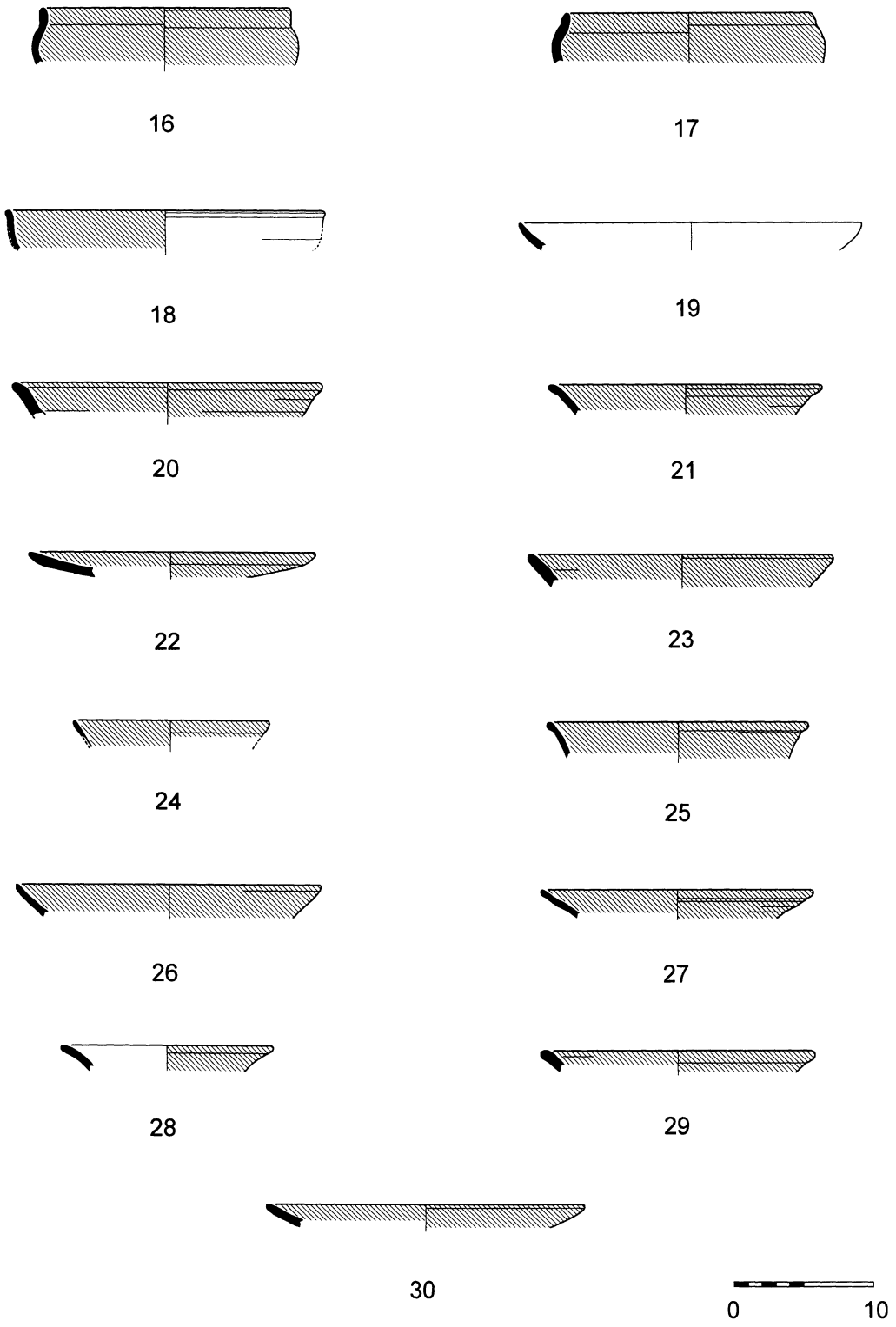


FIG. 5. Bowl rims 16-30 from Site 346 (el-Markha Plain, South Sinai).



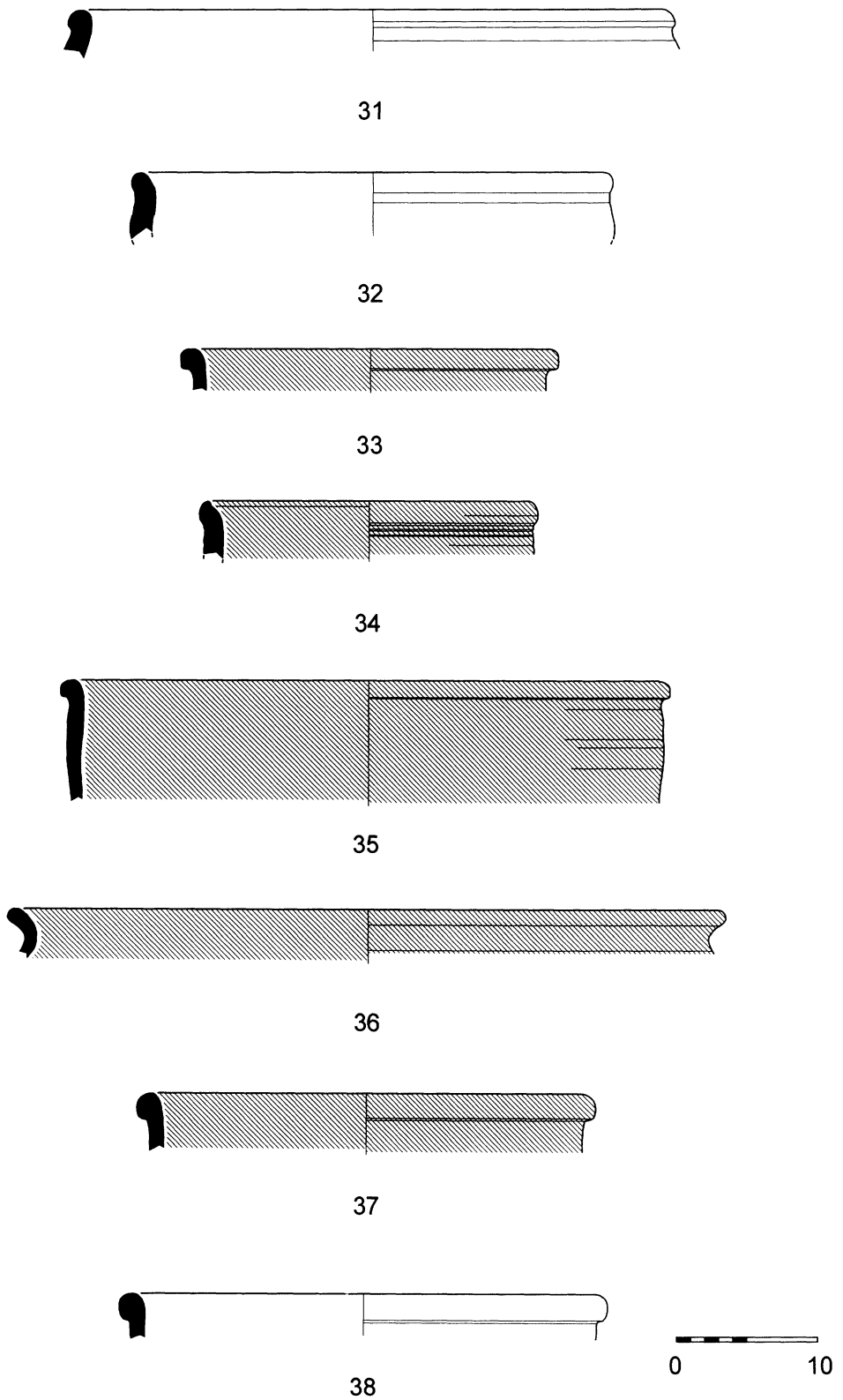


FIG. 6. Bowl rims 31-8 from Site 346 (el-Markha Plain, South Sinai).

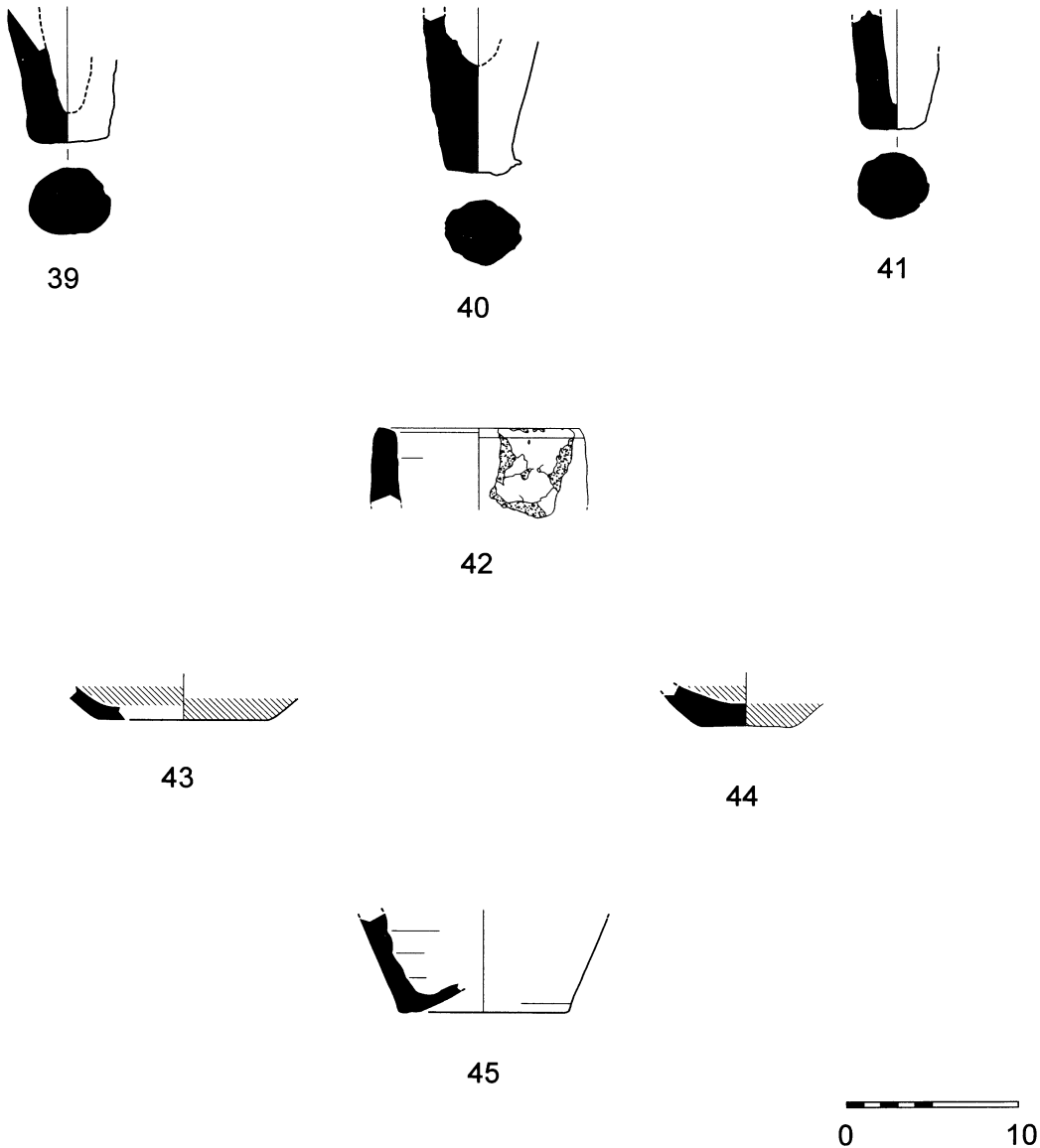


FIG. 7. Crucibles/mounds (39–42), bowl bases (43–4), and beer jar base (45) from Site 346 (el-Markha Plain, South Sinai).

### El-Markha Plain: satellite image interpretation (Sarah Parcak)

Despite various archaeological surveys in the Sinai, its vast geographical area has allowed only superficial land coverage, selected and limited excavation, and unrepresentative publication, leaving many partially surveyed or entirely unexplored areas. The overwhelming temporal and financial requirements needed to conduct comprehensive ground surveys throughout the entirety of the Sinai and its often

impassable mountainous terrain necessitate the introduction of time- and cost-effective techniques to survey this region. Such work and results can be realized by isolating various site location determinants to maximize the detection of areas containing potential archaeological sites.<sup>100</sup> For instance, satellite image analysis makes it possible to pinpoint key regions for archaeological reconnaissance and to assess human settlement patterns in el-Markha Plain.

Although many applications for remote sensing exist in archaeology, this study focuses on the combination of satellite image analysis, using a Landsat TM satellite image (see pl. VII, 1–2), and ground-truthing to isolate archaeological sites in el-Markha Plain.<sup>101</sup> This research began with the idea of using a satellite image to identify vegetation clusters in el-Markha Plain, assuming that vegetation signature would indicate water sources and hence potential archaeological remains.<sup>102</sup> Ground-truthing at and near several vegetation signature areas revealed adjacent archaeological sites, thereby enhancing our understanding of human settlement patterns in el-Markha Plain, and validating satellite image analysis as a technique for detecting archaeological sites in desert environments.

The most important method for analysis was the Normalized Difference Vegetation Index (NDVI), which represents, in essence, a method for identifying green plant biomass.<sup>103</sup> Several additional methods (see further below) helped to identify sixteen vegetation clusters (i.e. potential archaeological sites requiring further ground assessment) through the use of ERMapper, a satellite image processing program. Two dense vegetation clusters (areas 1–2) at the northern end of el-Markha Plain represented modern vegetation watered from ancient wells. Five archaeological sites lay around the perimeter of this pair of vegetation clusters, consisting of Sites 346 (north side), 346a–b (two rest points with sherd scatters to the east), 346c (a scatter of sherds and stone tools to the west), and 345 (a stone structure to the south).

Archaeological sites often appear as *tells*, which can sometimes exceed a square kilometre or more in area. These are thereby relatively easy to locate in aerial photographs and Landsat satellite images with pixel resolutions of 30 by 30 m. Many sites are much smaller, but can display surface and subsurface architectural features that

<sup>100</sup> I would like to thank Larry Bonneau (Yale University) for his guidance in the formative stages of this work, Laurence Pavlish (University of Toronto) for key advice during fieldwork, and Gregory Mumford for editorial suggestions. Thank also go to the SCA South Sinai Inspectorate for their encouragement and support, and Mr Mohamed Saad and the Suez Oil company (Suco) for permitting access to their property to examine vegetation sources. For a preliminary discussion of this work, see G. Mumford and S. Parcak, 'Satellite Imagery Analysis and New Fieldwork in South Sinai, Egypt (el-Markha Plain)', *Antiquity* 76/4 (2002), 953–4.

<sup>101</sup> The application of remote sensing in archaeology is invaluable since sites are disappearing continuously through such factors as urban sprawl, expansion of agricultural land, and erosion and weathering. Satellite images can be purchased through the Earth Observation Systems data gateway (<http://edcimswww.cr.usgs.gov/pub/imswelcome>) and from the Earth Science data on the Global Information System (<http://earthexplorer.usgs.gov>).

<sup>102</sup> The presence of vegetation in arid regions, especially dense growth, provides a good indicator of water sources, in particular wells and subsurface water. Since sufficient quantities of water cannot be transported overland for more than three days (see n. 108), and considering that water provides the absolute minimum, base requirement for survival, especially in arid terrains, the location of water sources in South Sinai is crucial for tracing the routes followed by the turquoise and copper mining expeditions.

<sup>103</sup> For a discussion of NDVI, see T. Lillesand and R. Kiefer, *Remote Sensing and Image Interpretation* (New York, 2000), 445–9, and S. J. Hurcom and A. R. Harrison, 'The NDVI and Spectral Decomposition for Semi-arid Vegetation Abundance Estimation', *International Journal for Remote Sensing* 19/16 (1998), 3109–25.

TABLE 2. *Potsherds from the Surface of Sites 346 and 346a-b (el-Markha Plain, South Sinai)*

Fig.	Type	Diameter	Fabric	Core	Surface treatment	Parallels with dates
4.1	Jar rim (No. 1)	11 cm (23%)	Medium hard, local fabric. Wheel-made.	Black interior core with red exterior areas; sporadic small to large grog particles; many chaff pockets; white flecks rare.	Exterior: Very pale brown slip (10YR 8/3); salt encrustations. Interior: Possible very pale brown slip (10YR 8/3); salt encrustations.	M. S. Giorgini, <i>Soleb</i> , II. <i>Les Nécropoles</i> (Florence, 1971), pl. xvi.40, tomb 28. c.2 (New Kingdom jar).
4.2	Jar rim (No. 2)	11 cm (13%)	Medium to soft local fabric. Wheel-made.	Medium thick black core near rim, with no core lower down; some chaff pockets; some grog; some tiny white flecks and larger white flecks (limestone).	Exterior: Worn; probable traces of very pale brown slip (10YR 8/3). Interior: Worn; possible traces of very pale brown slip (10YR 8/3).	Giorgini, <i>Soleb</i> II, pl. xvi.40 tomb 28 c.2 (New Kingdom jar).
4.3	Jar rim (No. 4)	11 cm (10%)	Medium hard, local fabric. Wheel-made.	Faint purple-grey core; some chaff pockets; many tiny white flecks.	Exterior: Possible traces of very pale brown slip (10YR 8/3). Interior: Possible traces of a very pale brown slip (10YR 8/3).	-
1.4	Jar rim (No. 16)	13 cm (12%)	Medium hard, local fabric. Wheel-made.	Dense, thick grey-brown core with thin red exterior areas; some chaff pockets; many coarse, angular black particles, grog; some tiny white flecks.	Exterior: Slightly smoothed; some very pale brown slip (10YR 8/3). Interior: Slightly smoothed; very pale brown slip (10YR 8/3).	-
4.5	Jar rim (No. 17)	9 cm (18%)	The relative hardness is unknown. Wheel-made.	Orange-red core with chaff pockets and sand inclusions.	Exterior: Orange to dark red; salt encrustations. Interior: Orange to dark red. Observations incomplete (sherd discarded).	-
4.6	Jar rim (No. 21)	11 cm (19%)	Medium hard, local fabric. Wheel-made.	Solid brick-red core; many tiny chaff pockets; some angular white flecks (ground up limestone and shell?); some sand particles and sporadic brown grog particles.	Exterior: Wet-smoothed; very pale brown slip (10YR 8/3). Interior: Wet-smoothed; very pale brown slip (10YR 8/3).	-

Fig.	Type	Diameter	Fabric	Core	Surface treatment	Parallels with dates
4.7	Jar rim (No. 30)	10 cm (13%)	Soft to slightly hard, local fabric. Wheel-made.	Faint reddish core; many chaff pockets; many tiny to medium white flecks.	Exterior: Red slip (10R 4/6); some horizontal burnishing. Interior: Red slip (10R 4/6); some horizontal burnishing.	D. A. Aston, <i>Die Keramik des Grabungsplatzes Q1</i> , I. <i>Corpus of Fabrics, Wares and Shapes</i> (Die Grabungen des Pelizaeus-Museums Hildesheim in Qantir - Piramesse 1; Mainz, 1998), 499 no. 1956; R. Holthoer et al., 'Pottery', in T. Säve-Söderbergh and L. Troy (eds), <i>New Kingdom Pharaonic Sites: The Finds and the Sites</i> (SJE to Sudanese Nubia, 5/2; Uppsala, 1991), 27 fig. 4d ST4 (late Eighteenth Dynasty); G. Nagel, <i>La céramique du Nouvel Empire à Deir el-Médineh</i> , I (DFIFAO 10; Cairo, 1938), figs. 8.2, 10.11, 12.21, 14.31.
4.8	Jar rim (No. 31)	11cm (22%)	Medium-hard, local fabric. Wheel-made.	Thick brick-red core; many tiny white flecks; some chaff pockets.	Exterior: Worn; traces of red slip (10R 5/6); salt encrustations. Interior: Worn; traces of red slip (10R 5/6); salt encrustations.	R. Holthoer, <i>New Kingdom Pharaonic Sites: The Pottery</i> (SJE to Sudanese Nubia 5/1; Uppsala, 1977) . pl. 34 1R/O/h-i (185/264:1) (New Kingdom globular rim jar).
4.9	Jar rim (No. 44) Canaanite? Site 346b	13 cm (15%)	Soft fabric, looks and feels like silt. Local fabric? Wheel-made.	No core; no chaff; abundant, very tiny flecks of limestone; occasional chunks of unmixed clay (one large pebble); a scatter of fine sand. Possibly Nile Silt D?	Exterior: Very worn (no slip). Interior: Very worn (no slip).	C. A. Hope, <i>Pottery of the Egyptian New Kingdom: Three Studies</i> (VCARU Occasional Paper 2; Victoria, 1989), 115, fig. 5.6 category 1c (temp. Amenhotep II); T. E. Peet and C. L. Woolley, <i>The City of Akhenaten</i> , I. <i>Excavations of 1922 and 1923 at el-'Amarneh</i> (MEES 38; London, 1923), pl. xlix no. xxi/212.

Fig.	Type	Diameter	Fabric	Core	Surface treatment	Parallels with dates
4.10	Jar rim (No. 45) Site 346a	12 cm (40%)	Medium-hard, local fabric. Wheel-made.	Many tiny chaff pockets; some angular white flecks (ground up shells?); solid brick-red core.	Exterior: Wet-smoothed. Interior: Some smoothing.	Aston, <i>Die Keramik des Grabungsplatzes</i> , 537 no. 2203 (late Ramesside); Holthoer et al., in Säve-Söderbergh and Troy (eds), <i>New Kingdom Pharaonic Sites</i> , 26, fig. 4c (late Eighteenth Dynasty).
4.11	Jar rim (No. 3) Canaanite?	11 cm (12%)	Soft fabric, looks and feels like silt. Local fabric? Wheel-made.	No core; no chaff; abundant, very tiny flecks of limestone; occasional chunks of unmixed clay; a large pebble; a scatter of fine sand. Possibly Nile Silt D?	Exterior: Wet-smoothed, pink slip (7.5YR 8/4). Interior: Wet-smoothed; no slip.	-
4.12	Jar rim (No. 7) Canaanite?	10 cm (5%)	Soft fabric, looks and feels like silt. Local fabric? Wheel-made.	No core; no chaff; abundant, very tiny flecks of limestone; occasional chunks of unmixed clay; a large pebble; a scatter of fine sand. Possibly Nile Silt D?	Exterior: Wet-smoothed; possible pink slip (7.5YR 8/4). Interior: Wet-smoothed; possible pink slip (7.5YR 8/4).	Aston, <i>Die Keramik des Grabungsplatzes</i> , 671, nos. 2751, 2753, 2766; B. B. Williams, <i>Excavations between Abu Simbel and the Sudan Frontier</i> , 6. <i>New Kingdom Remains from Cemeteries R, V, S and W at Abindan and Cemetery K at Abindan</i> (The University of Chicago Oriental Institute Nubian Expedition 6; Chicago, 1992), 230 fig. 71.e, 315 fig. 136.f, 386 fig. 198.a-b (New Kingdom jars).
4.13	Jar rim (No. 8) Canaanite?	14 cm (8%)	Soft fabric, looks and feels like silt. Local fabric? Wheel-made.	No core; no chaff; abundant, very tiny flecks of limestone; occasional chunks of unmixed clay; a large pebble; a scatter of fine sand. Possibly Nile Silt D?	Exterior: Worn; possible pale yellow slip (2.5Y 8/2) or salts? Interior: Very worn; possible traces of pale yellow slip (2.5Y 8/2) or salts?	Aston, <i>Die Keramik des Grabungsplatzes</i> , 671, nos. 2751, 2753, 2766 (Levantine storage jar); Williams, <i>Excavations</i> 6, 230 fig. 71.e, 315 fig. 136.f, and 386 fig. 198.a-b (New Kingdom jars).
4.14	Jar rim (No. 10) Canaanite	11 cm (20%)	Soft fabric, looks and feels like silt. Local fabric? Wheel-made.	No core; no chaff; abundant, very tiny flecks of limestone; occasional chunks of unmixed clay; a large pebble; a scatter of fine sand. Possibly Nile Silt D?	Exterior: Very worn. Interior: Very worn; salt-encrusted.	-

Fig.	Type	Diameter	Fabric	Core	Surface treatment	Parallels with dates
4.15	Jar rim (No. 20)	8 cm (17%)	Soft fabric, looks and feels like silt. Local fabric? Wheel- made.	No core; some white flecks (limestone) and some fine particles.	Exterior: Very worn. Interior: Very worn.	-
4.16	Carinated bowl rim (No. 14)	18 cm (7%)	Medium- hard, local fabric. Wheel- made.	Some brown particles; many white flecks (ground up shell/limestone); no core.	Exterior: Pale yellow slip (2.5Y 8/2). Interior: Worn; pale yellow slip (2.5Y 8/2).	A. el-Khouli et al., <i>Meidum</i> (Australian Centre for Egyptology Reports 3; Sydney, 1991), pl. 49.7 (large Old Kingdom carinated bowl); Holthoer, <i>New Kingdom Pharaonic Sites</i> , pl. 40, RB1 IIP/O/a- b (176/39:2), RB2 IR/O/a-b (185/167:3) (New Kingdom restricted bowls); Holthoer et al., in Säve-Söderbergh and Troy (eds), <i>New Kingdom Pharaonic Sites</i> , 26 fig. 4c RB1 (late Eighteenth Dynasty); Hope, <i>Pottery of the Egyptian New Kingdom</i> , 28 fig. 8b-c (New Kingdom example).
4.17	Carinated bowl rim (No. 18)	17 cm (5%)	Medium- hard, local fabric. Wheel- made.	Medium thick black core with exterior red to brown areas; some chaff pockets; some grog particles; some white flecks.	Exterior: Worn; traces of red slip (10R 5/6); horizontal burnishing. Interior: Red slip (10R 5/6); horizontal burnishing.	-
4.18	Bowl rim with curved side (No. 9)	23 cm (5%)	Medium- hard, local fabric. Wheel- made.	Thick grey-black core with exterior brown areas; some chaff pockets; sporadic white flecks.	Exterior: Very worn; smoothing. Interior: Smoothed and burnished horizontally; dark grey slip (GLEY1 4/N).	-
4.19	Flaring bowl rim (No. 40)	25 cm (4%)	Medium- hard, local fabric. Wheel- made.	Faint red core with exterior brown areas; some chaff pockets; some white flecks.	Exterior: Worn; red slip (10R 5/6). Interior: Red slip (10R 5/6); horizontal burnishing.	Aston, <i>Die Keramik des Grabungsplatzes</i> , 215 no. 662 (similar form), and 323 nos. 1072-77 (New Kingdom bowl with direct rim).

Fig.	Type	Diameter	Fabric	Core	Surface treatment	Parallels with dates
5.20	Flaring bowl rim (No. 6)	22 cm (4%)	Very hard, local fabric. Wheel-made.	Thick grey core with wide exterior red areas; sporadic chaff pockets; many tiny white flecks; some sporadic large white flecks (shell?).	Exterior: Worn; pale yellow slip (2.5Y 8/3). Interior: Worn; pale yellow slip (2.5Y 8/3).	-
5.21	Flaring bowl rim (No. 11)	20 cm (10%)	Soft to medium hard fabric. Nile silt (?). Wheel-made.	No core; abundant, finely chopped chaff (dung?); a small scatter of round sand (not much).	Exterior: Partly worn; red slip (10R 5/6); some salt encrustations; chaff pockets. Interior: Mostly worn; red slip (10R 5/6). Chaff pockets.	Aston, <i>Die Keramik des Grabungsplatzes</i> , 215 nos. 691, 693 and 695; Holthoer et al., in Säve-Söderbergh and Troy (eds), <i>New Kingdom Pharaonic Sites</i> , 26 fig. 4c PL1 (bowl with a ledge/unmodelled rim, late Eighteenth Dynasty).
5.22	Flaring bowl rim (No. 13)	21 cm (5%)	Soft, local fabric. Wheel-made.	Thick red core with exterior brown areas; some chaff pockets; some white flecks.	Exterior: Traces of red slip (10R 5/6). Interior: Traces of red slip (10R 5/6).	Holthoer, <i>New Kingdom Pharaonic Sites</i> , pl. 27 PL3 IP/O/f-g (400/10:19) (New Kingdom).
5.23	Flaring bowl rim (No. 19)	22 cm (2.5)	Soft to medium local fabric. Wheel-made.	Medium thick red core with exterior areas; many tiny white flecks (limestone); some chaff pockets; some fine sand particles.	Exterior: Red slip (10R 5/6); traces horizontal burnishing. Interior: Very worn; faint traces of red slip (10R 5/6).	Holthoer, <i>New Kingdom Pharaonic Sites</i> , pl. 27 PL3 IP/O/f-g (185/544:2) (small plate, New Kingdom).
5.24	Flaring bowl rim (No. 24)	14 cm (3%)	Soft, local fabric. Wheel-made.	No core; sporadic chaff pockets; some small white inclusions (limestone); sand particles rare.	Exterior: Very worn; traces of very pale brown slip (10YR 8/2). Interior: Worn; smoothed and possible very pale brown slip (10YR 8/2).	Aston, <i>Die Keramik des Grabungsplatzes</i> , 215 no. 734 and 736, 245 no. 771 (New Kingdom direct-rimmed, small bowls).
5.25	Flaring bowl rim (No. 27)	19 cm (8%)	Silt? Relative hardness is unknown. Wheel-made.	Light orange core with some chaff pockets, and some sand and straw inclusions.	Exterior: Red slip; salt encrustation. Interior: Red slip.	Holthoer, <i>New Kingdom Pharaonic Sites</i> , pl. 24 CC5 IP/O/d-e (35/51:3) (large cup, New Kingdom).
5.26	Flaring bowl rim (No. 23)	22 cm (6%)	Soft, local fabric. Wheel-made.	No core; some chaff pockets; some white flecks.	Exterior: Worn red slip (10R 5/6); some horizontal burnishing traces. Interior: Very worn red slip (10R 5/6); some traces of horizontal burnishing.	Aston, <i>Die Keramik des Grabungsplatzes</i> , 215 no. 662 (similar form), 323 nos. 1072-7 (New Kingdom bowl with direct rim).



Fig.	Type	Diameter	Fabric	Core	Surface treatment	Parallels with dates
5.27	Flaring bowl rim (No. 33)	20 cm (5%)	Very soft, local fabric. Wheel-made.	No core; some chaff pockets and some tiny white flecks (limestone).	Exterior: Very worn. Interior: Worn; traces of red slip (10R 5/6); possible horizontal burnishing.	Holthoer, <i>New Kingdom Pharaonic Sites</i> , pl. 27 PL3 IR/O/f-g (185/186:12) (New Kingdom).
5.28	Flaring bowl rim (No. 34)	15 cm (5%)	Soft, local fabric. Wheel-made.	Faint red core with brown exterior areas; some chaff pockets; some tiny white flecks (limestone).	Exterior: Worn red slip (10R 5/6); possible burnishing. Interior: Very worn; salt encrustations.	Aston, <i>Die Keramik des Grabungsplatzes</i> , 215 nos. 691, 693, and 695; Holthoer et al., in Säve-Söderbergh and Troy (eds), <i>New Kingdom Pharaonic Sites</i> , 26 fig. 4c PL1 (ledge/unmodelled rim, late Eighteenth Dynasty).
5.29	Flaring bowl rim (No. 35)	20 cm (2.5%)	Soft, local fabric. Wheel-made.	No core; many chaff pockets; some tiny white flecks.	Exterior: Red slip (10R 5/6); horizontal burnishing. Interior: Red slip (10R 5/6); horizontal burnishing.	-
5.30	Flaring bowl rim (No. 42)	23 cm (3%)	Medium soft, local fabric. Wheel-made.	Very faint grey core; many chaff pockets; some tiny white inclusions; sporadic grey and sand particles.	Exterior: Very worn; traces of red slip (10R 5/6). Interior: Red slip (10R 5/6); traces of horizontal burnishing.	Aston, <i>Die Keramik des Grabungsplatzes</i> , 446, 447 nos. 1613-14 (Nineteenth Dynasty bowls with red slip).
6.31	Large bowl rim (No. 5)	42 cm (4%)	Very hard, local fabric. Wheel-made.	Dense, thick grey-brown core with thin red exterior areas; some chaff pockets; many coarse, angular black particles, grog, and sand; some tiny white flecks (limestone).	Exterior: Slightly rough. Interior: Slightly rough.	El-Khouli, <i>Meidum</i> , 44, pl. 49.11 (similar cooking pot); Peet and Woolley, <i>The City of Akhenaten I</i> , pl. xlvi no. x/1059 (Eighteenth Dynasty).
6.32	Large bowl rim (No. 12)	34 cm (4%)	Very hard, local fabric. Wheel-made.	Dense, thick grey-brown core with thin red exterior areas; some chaff pockets; some coarse, angular particles and grog; sporadic white flecks (limestone).	Exterior: Slightly rough surface. Interior: Slightly rough surface.	-
6.33	Medium bowl rim (No. 22)	27 cm (7%)	Very hard, local fabric. Wheel-made.	Medium black core with wide outer red areas; some chaff pockets; many minute white flecks, some larger, angular white flecks; some sand; sporadic brown particles.	Exterior: Very pale brown slip (10YR 8/3). Interior: Very pale brown slip (10YR 8/3).	Holthoer, <i>New Kingdom Pharaonic Sites</i> , pl. 24 CC5 11R/O/h-i (large bowl 38 cm in diameter, Nineteenth Dynasty).

Fig.	Type	Diameter	Fabric	Core	Surface treatment	Parallels with dates
6.34	Medium bowl rim (No. 23)	24 cm (5%)	Medium fine silt, relative hardness unknown. Wheel-made.	Black core with dark orange- brown exterior areas; chaff pockets; limestone inclusions.	Exterior: Cream slip. Interior: Cream slip.	—
6.35	Large bowl rim (No. 36)	45cm (8%)	Medium-hard, local fabric. Wheel-made.	No core; grey purple colour with many tiny white flecks, some pieces of grog, sporadic brown particles, some chaff pockets, and some sand.	Exterior: Pale yellow slip (2.5Y 8/2) worn off at rim edge; salt encrustations. Interior: Streaky pale yellow slip (2.5Y 8/2).	D. A. Aston, <i>Elephantine</i> , XIX. <i>Pottery from the Late New Kingdom to the Early Ptolemaic Period</i> (AV 95; Mainz, 1999), 17-18, pl. 1.14 (similar storage jar, 48 cm in diameter, but uncoated, Nineteenth Dynasty).
6.36	Large bowl rim (No. 37)	50 cm (4%)	Medium-hard, local fabric. Wheel-made.	No core; many chaff pockets; numerous minute white flecks; sporadic tiny particles.	Exterior: Reddish-yellow slip (5YR 7/6); some salt encrustations. Interior: Traces of reddish-yellow slip (5YR 7/6); dense salt encrustations.	—
6.37	Large bowl rim (No. 39)	32 cm (5%)	Very hard, local fabric. Wheel-made.	Dense, thick grey-brown core with thin red exterior areas; some chaff pockets; some coarse, angular particles and sand; many tiny white flecks.	Exterior: Traces of pale yellow slip (2.5Y 8/2). Interior: Pale yellow slip (2.5Y 8/2).	Aston, <i>Die Keramik des Grabungsplatzes</i> , 197, no. 579 and 583 (similar large, 30 cm diameter, rimmed, open storage jar, Ramesside).
6.38	Large bowl rim (No. 43)	34 cm (4%)	Very hard, local fabric. Wheel-made.	Dense, thick grey-brown core with thin red exterior areas; some chaff pockets; some coarse, angular particles and sand; sporadic white flecks.	Exterior: Slightly rough surface. Interior: Slightly rough surface.	Aston, <i>Die Keramik des Grabungsplatzes</i> , 197, no. 579 and 583 (similar large, 30 cm diameter rimmed, open storage jar, Ramesside).

Fig.	Type	Diameter	Fabric	Core	Surface treatment	Parallels with dates
7.39	Crucible/ mould base	4.8 cm base (100%)	Relative hardness is unknown, local fabric. Hand-made.	Interior zone is pale grey, blending with outer areas. Abundant fine angular sand inclusions with clear, grey and black particles. Some large grog particles (rare).	Exterior: Very coarse; untreated; salt encrustations. Interior: Wet-smoothed.	Peet and Woolley, <i>The City of Akhenaten</i> I, pl. l.xxx 1041 (Eighteenth Dynasty bread mould); P. Rose, 'The Pottery Distribution Analysis', in B. J. Kemp (ed.), <i>Amarna Reports</i> , I (EES Occasional Publications 1; London,1984), 135 fig. 10.1 no. 39 (bread mould, Eighteenth Dynasty); B. Kemp and P. Rose, 'Report on the 1986 Excavations, Chapel 556', in B. J. Kemp (ed.), <i>Amarna Reports</i> , IV (EES Occasional Publications 5; London, 1987), 76-7, 78 fig. 6.7 no. 67293 (mould); S. T. Smith, <i>Askut in Nubia</i> (London, 1995), 144 fig. 6.5 no. A (New Kingdom mould).
7.40	Crucible/ mould base (No. 26)	4 cm base (100%)	Medium- hard, local fabric. Hand- made.	Interior zone is pale grey, blending with outer areas. Abundant fine angular sand inclusions with clear, grey and black particles. Some large grog particles (rare).	Exterior: Very coarse and untreated. Interior: Wet-smoothed.	Kemp and Rose, in Kemp (ed.), <i>Amarna Reports</i> IV, 76-7, 78 fig. 6.7, no. 67293 (bread mould from Chapel 556).
7.41	Crucible/ mould base (No. 28)	3.9 cm base (100%)	Medium- hard, local fabric. Hand- made.	Interior zone is pale grey, blending with outer areas. Abundant fine angular sand inclusions with clear, grey and black particles. Some large grog particles (rare).	Exterior: Very coarse and untreated. Interior: wet-smoothed, untreated.	Peet and Woolley, <i>The City of Akhenaten</i> I, pl. l.xxx 1041 (Dyn.18 bread mould); Rose, in Kemp (ed.), <i>Amarna Reports</i> I, 135 fig. 10.1 no. 39 (bread mould from Eighteenth Dynasty); Kemp and Rose, in Kemp (ed.), <i>Amarna Reports</i> IV, 76-7, 78 fig. 6.7 no. 67293 (bread mould); Smith, <i>Askut in Nubia</i> , 144 fig. 6.5 no. A (New Kingdom bread mould).

Fig.	Type	Diameter	Fabric	Core	Surface treatment	Parallels with dates
7.42	Crucible/ mould base (No. 29)	12 cm rim (12 %)	Medium- hard, local fabric. Hand- made.	Interior zone is pale grey, blending with outer areas. Abundant fine angular sand inclusions with clear, grey and black particles. Some large grog particles (rare).	Exterior: Slightly smoothed; untreated. Interior: Worn; traces of smoothing.	Kemp and Rose, in Kemp (ed.), <i>Amarna Reports IV</i> , 76-7, 78 fig. 6.7 no. 67293 (bread mould from Chapel 556).
7.43	Bowl base (No. 15)	10 cm base (100%)	Soft- to medium- hard, local fabric. Wheel- made.	Thick purple core with exterior red to brown areas; some chaff pockets; some tiny to medium white flecks (limestone); sporadic grey particles.	Exterior: Worn; red slip (2.5YR 4/6) traces of burnishing. Interior: Worn; red slip (2.5Y 4/6); traces of burnishing.	Williams, <i>Excavations 6</i> , 376 no. CB (New Kingdom bowl base).
7.44	Bowl base (No. 41)	5.5 cm base (100%)	Medium- hard, local fabric. Wheel- made.	Some chaff pockets and white flecks; occasional grey particles, no core.	Exterior: Scraped base; salt encrustations. Interior: Smoothed; some pocketing.	Williams, <i>Excavations 6</i> , 376 no. CB (New Kingdom bowl base).
7.45	Beer jar base (No. 38)	10 cm base (13%)	Wheel- made; fine, dense matrix (silt?). Wheel- made.	No core? No obvious chaff or sand.	Exterior: Worn a little. Interior: Dusty grey coating.	Aston, <i>Die Keramik des Grabungsplatzes</i> , 185 no. 524 (New Kingdom (?) beer jar); Aston, <i>Elephantine</i> , XIX, 25 pl. 3.60.

are visible from space or lower altitudes.<sup>104</sup> El-Markha Plain presents difficulties, however, for archaeological reconnaissance from space. It is a sandy region with both natural and artificial low mounds that rise from one to over two metres in height. Such minimal topographical differences, complicated by wind erosion and deflation, have obscured many artificial sites from the surrounding, natural landscape, even during surface surveys. Excepting the presence of obvious clues, such as distinct mounds, architecture, monuments, features, artefacts, and differences in soil composition and colour, in the Sinai desert (specifically el-Markha Plain), the detection of many small to medium-sized sites requires direct, on-site observation of non-natural features and items in an otherwise identical surrounding landscape. Given such difficulties in locating sites

<sup>104</sup> Satellite images also assist in archaeological surveys of both dry and wet areas, and the study of such regions have contributed to our understanding of diverse aspects of past cultures, including landscape changes, settlement patterns, and trade routes. For instance, well-travelled roads and paths are often visible from higher altitudes. Similar projects have taken place in Jordan (tracing Roman roads), China (mapping the Silk Road), and Egypt's western desert (revealing ancient river beds). See D. Kennedy, 'Roman Roads and Routes in North-east Jordan', *Levant* 29 (1997), 71-93; H. Holcomb, 'Shuttle Imaging Radar and Archaeological Survey in China's Taklamakan Desert', *Journal of Field Archaeology* 14 (1987), 129-38; F. Wendorf et al., 'A Survey of the Egyptian Radar Channels: An Example of Applied Field Archaeology', *Journal of Field Archaeology* 14 (1987), 43-63.

through direct ground-truthing, certain approaches can be adopted to maximize the cost, time, and success rate concerning the detection of archaeological sites. In this case, the use of vegetation indices proved to be the most successful.

After calculating the NDVI for the entire el-Markha Plain, 30 areas produced signatures resembling positive NDVI values.<sup>105</sup> After further processing, the satellite image data yielded four areas with positive NDVI values (see pl. VII, 2). Eleven other areas had an NDVI value greater than  $-0.05$ , showing slightly denser concentrations of vegetation than the remaining nineteen areas. These nineteen sites had higher NDVI values ( $-0.12$  or greater) than the surrounding plain. One of the positive NDVI values lay near New Kingdom Site 346.

In addition, in order to assess the varying signatures associated with the 30 initial NDVI areas, 3 methods were applied to the satellite image data: 'supervised', 'unsupervised', and 'thresholding' classifications. The application of supervised classification entailed selecting 'training regions' within the image. Generally speaking, in a supervised classification of an image showing a broad range of areas (e.g. forests, grasslands, ponds, rivers, roads, and housing), one would select homogenous regions in the image to represent each type of landcover. The computer program (ERMMapper) automatically generates a statistical model (training signature) for each landcover type, or class. Finally, the program assesses each pixel and places it in the closest class. El-Markha Plain, however, yielded insufficient numbers of pixels within individual areas containing a positive NDVI.

Another approach, unsupervised classification, involves pre-selecting the number of classes requiring definition in a satellite image. For example, in requesting five classes, the computer program automatically evaluates each pixel and assigns it to the class to which it is statistically most similar. The grouping and separation of each class (e.g. fields and forests) depends upon the similarities in their reflectivity values.<sup>106</sup> In el-Markha Plain, 20 out of the 30 original identified NDVI signatures yielded similar or identical reflectivity signatures.

The most successful technique, 'thresholding', was applied to the satellite image data to compare and assess the results from supervised and unsupervised classifications. Here, assigned values were imposed within the image to highlight certain areas or features. By introducing a specific formula ('If input 1 is greater than  $-0.05$  else null'), the generated image isolated 16 areas yielding an NDVI value greater than  $-0.05$ . Five of these areas had positive NDVI values, while two areas contained NDVI values of 0.

Of the tested methods, thresholding represents the best way to identify areas for archaeological reconnaissance. It revealed the most areas with positive NDVI values, including an additional area to those found in the original NDVI image, and another area with a zero NDVI value. Combining different image data bands worked well in identifying dark areas (i.e. vegetation), but only two of the evaluated areas (Sites 2 and 12) yielded positive NDVI values. In order to select the optimum regions for ground-

<sup>105</sup> NDVI represents a ratio of reflectivity between the visible and near-infrared parts of the electromagnetic spectrum. NDVI values can range from  $-1$  to  $+1$ . Normally green plants have an NDVI in the range of  $0.5$  to  $0.8$ , while soils have an NDVI close to zero. The greater the moisture content of the ground, the brighter the response will be. See J. R. Jensen, *Introductory Digital Image Processing: A Remote Sensing Perspective*<sup>2</sup> (Upper Saddle River, NJ, 1996), 182–4, and H. Masahiro et al., 'Vegetation Classification by Satellite Image Processing in a Dry Area of North-eastern Syria', *International Journal for Remote Sensing* 22/4 (2001), 507–16.

<sup>106</sup> See Lillesand and Kiefer, *Remote Sensing and Image Interpretation*, 532–65.

truthing, it is necessary to evaluate multiple classification methods. The 30 NDVI areas contained relatively lower negative values than the majority of el-Markha Plain. Further analysis and several visits to el-Markha Plain, however, revealed that 14 of the 30 areas had NDVI values between  $-0.05$  and  $-0.12$ , and actually represented dense clusters of salt-water dependent grass. The sixteen remaining areas contained NDVI values greater than  $-0.05$ , indicating higher concentrations of vegetation and potential indigenous water sources in el-Markha Plain.

Ground-truthing commenced at the northernmost part of el-Markha Plain, where NDVI Sites 1 and 2 lay 400 m from archaeological Sites 346, 346a–c, and 345. Site 1 represented a modern bedouin orchard, measuring 200 by 250 m, with trees covering 10–15% of this area and consisting mainly of the Argen (*Medemia argun*) and Baleh (*Balanites aegyptiacea*) species.<sup>107</sup> Site 2 comprised the adjacent bedouin village of Kilo Tisa, which encompassed a 300 by 500 m area and lay 400 m south of Site 346. The village contains clusters of palm trees, shrubs, gardens, housing, and nine wells amongst the dense vegetation. The wells range in depth from 5 to 10 m following the water table, which fluctuates as much as 10–50 cm per year (in relation to rainfall, floods, and water use). These wells are significant to the archaeology of el-Markha Plain since they exploit the same water table that underlies Wadi el-Markha, which lies between Sites 346 and 345. NDVI Sites 3–6 lay within the grounds of the Suez Oil Company (Suco), which was built in 1982. In addition to the buildings, offices, roads, and housing for employees, this compound contained several clusters of trees imported from the Nile Valley for general landscaping and shade. However, this vegetation relies entirely upon water piped in from Egypt, and did not yield evidence for ancient sites.<sup>108</sup>

Ten vegetation signatures, revealed by the thresholding method, occur in Abu Rodeis, a small, coastal petroleum town near the centre of el-Markha Plain. Although most of the vegetation signatures could be identified during the ground survey work, a major well (Bir Rodeis) located on the 1937 Survey of Egypt map remains obscured by the modern settlement. Surface survey work revealed that one apparent ‘vegetation’ signature (no. 7) actually represented a large apartment complex surrounded by many trees and small bushes, while other signatures (nos. 8–10) lay in a petroleum company compound and associated facilities which were inaccessible. A variety of trees and bushes were visible in the general vicinity of the vegetation signature coordinates. The inhabitants of el-Markha Plain have reported an archaeological mound lying near Abu Rodeis, but this awaits future investigation. Site 12, which yielded a positive NDVI signature and a cluster of trees, lay close to the reported location of this mound, but requires future access to determine whether it represents an ancient well. Site 11 represented a cluster of trees, bushes, and some small structures beside a mosque in Abu Rodeis, while the four remaining vegetation signatures (Sites 13–16) lay nearby, inside a government facility.

<sup>107</sup> These trees made up 80% of the total land cover, while the remaining vegetation is represented by several other species of plants. It was not possible to equate individual plant species with specific areas in the Landsat image since the vegetation cover was sparse at site 1; see V. Tackholm, *Students' Flora of Egypt* (Cairo, 1974).

<sup>108</sup> Settlement patterns in South Sinai have changed dramatically in the past century through the introduction of water piped in directly from the Nile Valley and enhanced techniques of obtaining water from subterranean sources. This has allowed an increase in the number of permanent settlements in Sinai. These changes in water distribution patterns have also affected the dispersal of vegetation across the landscape, especially in areas containing modern cultivation.

Ground-truthing operations in el-Markha Plain revealed that some apparent vegetation reflection signatures actually represented modern structures, while other signatures did reveal true vegetation clusters near or beside known and newly discovered archaeological sites. Hence, isolating vegetation clusters within desert environments is promising since vegetation marks the presence of water sources, and it often contains a range of non-food bearing and food-bearing flora (e.g. date palms and fruit trees). In turn, such flora attracts diverse species of fauna, thereby providing ideal resources for both modern and ancient human exploitation, whether through semi-sedentary or year-round occupation.

Aside from the requirements of the indigenous, ancient bedouin population, all ancient Egyptian expeditions to the South Sinai mining district would have needed large amounts of water and food for both their personnel and draught animals.<sup>109</sup> The distance from Egypt and large numbers of expedition members precluded dispatching sufficient quantities of food and water from the Nile Valley. Hence, through necessity expeditions would have located rest stops and camp sites in proximity to water sources and vegetation (visible in satellite images), perhaps exploiting the wild game (e.g. ibex) available in South Sinai.

Of the preceding sixteen vegetation signatures, located in the northern half of el-Markha Plain, only eight (Sites 1–7 and 11) were accessible for ground-truthing. The surface survey work conducted at these 8 areas revealed archaeological sites near or beside 2 vegetation signatures, thereby providing a 25% success rate for the vegetation signatures available for ground-truthing. Each analytical method reduced the amount of time it would have taken to look for vegetation areas across the surface of el-Markha Plain, isolating areas with the highest potential for yielding ancient (and modern) human settlements. In the future, other images will assist in analyzing sub-surface features, comparing the resulting data set with surface features.<sup>110</sup> Alongside these approaches, more comparative work will be done in the coastal regions in Egypt and elsewhere. Remote sensing, in combination with ground-truthing, has much to offer archaeologists in Egypt, especially considering its success in other regions of the world.<sup>111</sup>

Sinai has been less intensively explored in comparison with the Nile Valley, and this project should augment our understanding of transit routes, settlement patterns, and cross-cultural relations between Egypt, Sinai, and Syria–Palestine. There are limitations to the scope of archaeological work conducted in Sinai, owing to budgetary resources, restricted access to various areas, increasing modern construction, and expanding exploitation of resources, all of which affect the investigation of existing archaeological sites. In addition, in el-Markha Plain and elsewhere, many archaeological sites are threatened by the increasing development of roads, towns, industrial facilities, hotels,

<sup>109</sup> Since donkeys consume what they carry within three days, they cannot transport sufficient amounts of water and food for either their own or human long distance consumption; see D. W. Engels, *Alexander the Great and the Logistics of the Macedonian Army* (London, 1978).

<sup>110</sup> These images include Landsat 7 TM, ASTER (Advanced Spaceborne Thermal Emission and Reflection Radiometer) and SIR-C/X-SAR (Shuttle Imaging Radar C and X-Band Synthetic Aperture Radar, utilized by the 1994 Endeavor Mission).

<sup>111</sup> For example, remote images of Egypt could help to identify crop marks, sites buried beneath sand, relic water courses, wells, ancient routes, geological formations, modern environmental trends, and could help generate detailed topographic maps. See R. J. Stern and M. G. Abdel Salam, 'The Origin of the Great Nile Bend from Sir-C/X-SAR Imagery', *Science* 274 (1996), 1696–8; M. El Raey et al., 'Change Detection of Rosetta Promontory Over the Past 40 Years', *International Journal of Remote Sensing* 16/5 (1995), 825–34.

and other aspects of modernization in the Sinai. Hence, the combination of satellite image interpretation and ground-truthing offers multiple levels of detection for surface and sub-surface features, providing a speedier and less costly means by which to identify potential archaeological sites. In addition, the inclusion of satellite images with much finer pixel resolutions will increase substantially the identification of such sites.

### **Conclusion**

Preliminary survey and excavation work by the University of Toronto expedition has shown that archaeological sites cluster on high ground beside wadi beds and at the base of hills bordering el-Markha Plain. The locational determinants for Site 346 encompass its proximity (100 m) to a protected anchorage (el-Markha Bay) and placement on high ground beside a wadi bed (protected from winter flash flooding, but providing access to drinking water). In addition, the continuous, strong northern winds made the site an ideal place for locating copper smelting furnaces. The two newly discovered ancient rest points, 3 km to the south, benefited from nearby wadis (i.e. a source of drinking water) and morning shade from the high eastern hills. Preliminary investigations at Site 345 (a circular fort, and possibly a caravanserai) have shown that it is not pharaonic, but contains some diagnostic pottery dating to the Byzantine and Islamic Periods. Planned future satellite image interpretation and ground-truthing in South Sinai should reveal more sites and thereby the routes used by pharaonic and other expeditions. In addition, careful excavation, recording, and analysis of these sites and their material culture assemblages should refine our understanding of the nature of, and the inter-relationships between, the intrusive Nile Valley pharaonic culture and the indigenous semi-nomadic bedouins.





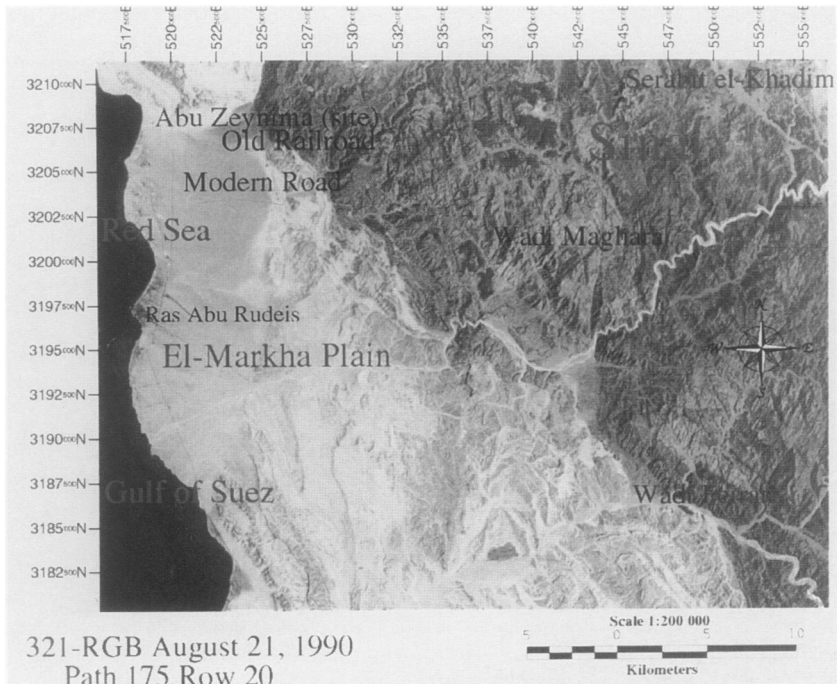
1. Cairo CG 34017. Stela of the Priest of Heqet and Overseer of the domain of Osiris, Nebwawy (from Lacau, *Stèles du Nouvel Empire I*, pl. xi).

**RITUAL FUNCTION AND PRIESTLY NARRATIVE: THE STELAE OF THE HIGH PRIEST OF OSIRIS, NEBWAWY (pp. 59–81)**

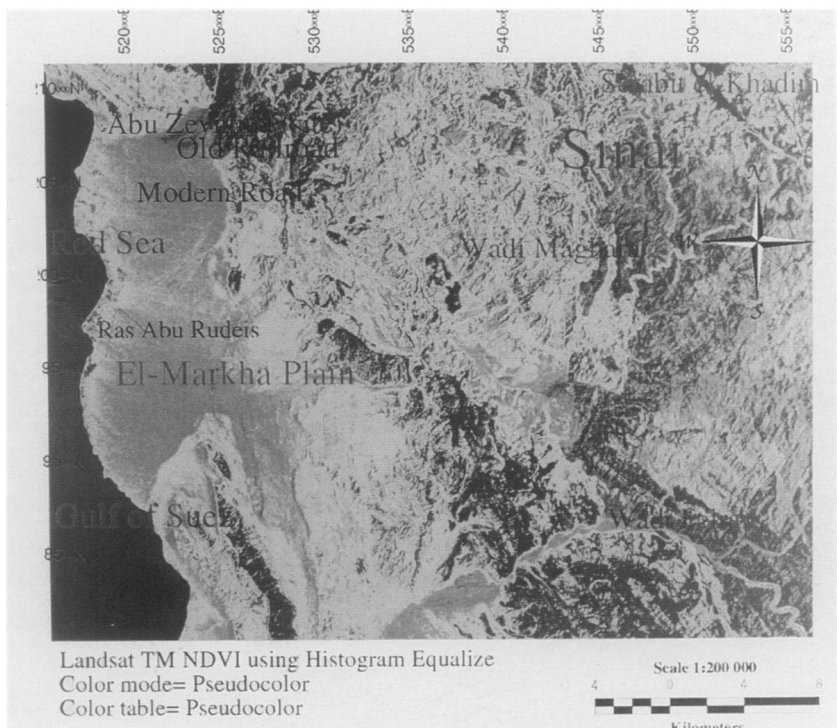
2. Southwest view of el-Markha Plain: Site 346 in foreground (lower left below crosswalk).



**PHARAONIC VENTURES INTO SOUTH SINAI:  
EL-MARKHA PLAIN SITE 346 (pp. 83–116)**



1. El-Markha Plain satellite image (321-RGB, taken August 21, 1990).



2. El-Markha Plain: Landsat TM Normalised Difference Vegetation Index (NDVI) using Histogram Equalise.

**PHARAONIC VENTURES INTO SOUTH SINAI:  
EL-MARKHA PLAIN SITE 346 (pp. 83–116)**

# THE ICONOGRAPHY OF THE BLUE CROWN IN THE NEW KINGDOM\*

By TOM HARDWICK

An interpretation of the functions of the Blue Crown is proposed based on analysis of the context of representations of this head-dress, and supported by the persistent use of a certain type of eye shape in images of kings wearing the Blue Crown. This is used to question the dating of two uninscribed sculptures published as depictions of Amenhotep III. A catalogue discusses all known three-dimensional representations of the Blue Crown dating from the start of the Eighteenth Dynasty up to the Amarna Period.

## **The Blue Crown: its origins and significance**

DEPICTIONS of heads wearing the Blue Crown have long been considered desirable items by museum curators and private collectors. The majority of such heads known today have not been found through controlled excavation, and frequently lack provenance, bodies, and inscriptions. This study proposes a new interpretation of the functions of the Blue Crown and investigates the dating of two heads wearing the Blue Crown, one in the Barber Institute of Fine Arts, University of Birmingham, Great Britain (**A**; pl. VIII, 1–4), the second in a private collection in southern Germany (**B**; pl. IX, 1–2). Capital letters in bold throughout identify catalogue entries.

Vivian Davies<sup>1</sup> traced the origins of the New Kingdom ‘Blue Crown’ back to the round ‘Cap Crown’ of the late Middle Kingdom and Second Intermediate Period—a form that subsequently co-existed with the Blue Crown. Both items were known by the name *hprš*, and the Cap Crown gradually changed in shape during the early Eighteenth Dynasty, becoming taller and less rounded; the archetypal form of the Blue Crown (fig. 1) is first encountered in a relief of Amenhotep I from Karnak.<sup>2</sup> The earliest widespread use of the Blue Crown is visible in the reign of Thutmose III, and it features prominently in a number of relatively specific contexts from then onwards.

Like many other head-dresses, the Blue Crown is worn by the king when presenting offerings.<sup>3</sup> It is especially favoured in scenes of the king making an offering to the

\* I am grateful to Richard Fazzini, Chair of the Department of Egyptian, Classical, and Ancient Middle Eastern Art at the Brooklyn Museum of Art, for the opportunity to work in the departmental archives in the course of an internship in the museum in 2001, where research on this topic began. Discussions with M. E. Cody, J. F. Romano, and E. R. Russmann at the Brooklyn Museum provided numerous helpful suggestions, and I am grateful to John Baines and Helen Whitehouse for extensive comments.

<sup>1</sup> ‘The Origin of the Blue Crown’, *JEA* 68 (1982), 69–76.

<sup>2</sup> A. Varille, *Karnak*, I (FIFAO 19; Cairo, 1943), pl. xliii.

<sup>3</sup> E.g. K. Myśliwiec, *Le portrait royal dans le bas-relief du Nouvel Empire* (Warsaw, 1976), fig. 61 (hereafter *Le portrait royal*).

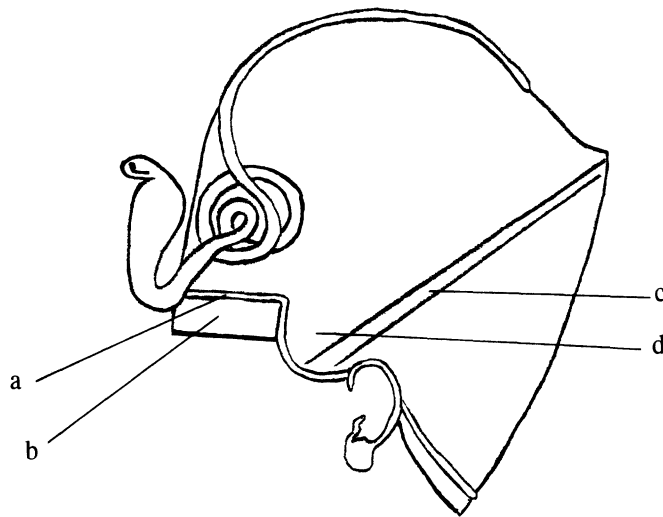


FIG. 1. Schematic drawing of the Blue Crown: a) moulding, b) brow-band, c) flange, d) wing.

sacred barque of a deity.<sup>4</sup> In scenes of combat and its aftermath,<sup>5</sup> the Blue Crown is the most common head-dress. The short, layered 'Nubian' wig is also frequent in these scenes from the Nineteenth Dynasty onwards, and this seems mainly intended to lend variety to a group of similar images: a register in which a king is depicted wearing the Blue Crown is likely to be adjacent to one where he sports a 'Nubian' wig.<sup>6</sup>

When the king is shown with a god in a group implying protection or divine approbation, such as 'coronation' groups, the Blue Crown is the most common head-dress; here the king is often depicted on a smaller scale than the protecting deity.<sup>7</sup> Representations of the king being suckled by a goddess or seated on the knees of his

<sup>4</sup> S. Collier, *The Crowns of Pharaoh: their Development and Significance in Ancient Egyptian Kingship* (PhD thesis, UCLA, 1996; UMI), 117.

<sup>5</sup> One of the statues depicted in a scene of a temple storeroom in the tomb of Rekhmire shows Thutmose III enthroned, his feet resting on a recumbent prisoner: N. de G. Davies, *The Tomb of Rekh-mi-Rē' at Thebes* (New York, 1943), II, pl. 37. Older publications frequently call the Blue Crown a 'war helmet'.

<sup>6</sup> For example, the Libyan campaign from the battle reliefs of Seti I at Karnak shows two scenes of fighting: the king in a chariot, wearing the Blue Crown, and the king fighting on foot, wearing the 'Nubian' wig. These scenes are matched in the same register with the dedication of captives to Amun: the king in a chariot wears the Blue Crown to drive the captives forward; before the gods he wears the 'Nubian' wig (Oriental Institute Epigraphic Survey, *Reliefs and Inscriptions at Karnak, IV. The Battle Reliefs of King Sety I* (Chicago, 1986), pl. 27). The use of the 'Nubian' wig by Amenhotep II is discussed below.

<sup>7</sup> K and N; for an exception, see II. Besides the Blue Crown, the *nemes* is also frequently found in 'coronation' scenes, and depictions of the inscription of the king's name on the *ished*-tree. Katja Goebis suggests that the *nemes* is connected to the *s3 r'* name of the king ('Untersuchungen zu Funktion und Symbolgehalt des *nms*', *ZÄS* 122 (1995), 154–81), and thus emphasizes the king's role as inheritor of the throne in a similar manner to the Blue Crown; she points out that the *nemes* is rarely seen in the reign of Akhenaten, while the Blue Crown becomes more popular (*ZÄS* 122, 180–1). B. Lurson, *Lire l'image égyptienne: Les 'Salles du Trésor' du Grand Temple d'Abou Simbel* (Paris, 2001), 84–5, considers the *nemes* and Blue Crown as 'un couple type', and cites a communication from Goebis, suggesting that 'I suspect that the *khepresh* came to replace the *nms*, with its associations of the kingship/succession of the 'son' (Horus) in many instances, since I also noted that *nms* and *khepresh* seem to have a particular connection'. I am grateful to Dr Goebis for these references and for discussing her work with me.

tutor also tend to show him with the Blue Crown,<sup>8</sup> while the motif of the crouching king holding a finger to his mouth is also frequently linked with the Blue Crown.<sup>9</sup> Outside the Amarna Period, the Blue Crown does not appear in the decoration of royal tombs until the late Ramesside Period.<sup>10</sup>

The uraeus on the Blue Crown takes a form not known before the New Kingdom, with the snake's body making a number of circular coils behind its raised head. When wearing the Blue Crown, the king usually adopts an elaborated costume of some form. Rather than the traditional *shendyt*, or the plain knee-length kilt, he may sport a longer kilt, with a complicated sporran, frequently a tunic or some form of chest covering, and a broad collar or series of necklaces. The most elaborately-clothed surviving example, the granodiorite seated statue of Ramesses II in Turin (NN), shows him holding the *ḥq3*-sceptre, another common characteristic of statues and reliefs with the Blue Crown. Other attributes such as a standard are also often held (GG). I know of no occurrences of the Blue Crown with a false beard (see QQ).<sup>11</sup> The archetypal forms for Egyptian royal statuary, showing a king seated or standing with empty hands or holding minimal attributes, do not wear the Blue Crown. Hardly any statues of kings wearing the Blue Crown are of a colossal scale.<sup>12</sup>

To summarize, the iconographic conventions used for depictions of the king with the Blue Crown in the first half of the New Kingdom emphasize the mortal aspects of the king's personality. He is shown as active, performing human roles such as fighting and

<sup>8</sup> Images of the king wearing the Blue Crown and being suckled by a goddess include a pendant found inside the golden shrine from the tomb of Tutankhamun (M. Eaton-Krauss and E. Graefe, *The Small Golden Shrine from the Tomb of Tutankhamun* (Oxford, 1985), pl. vii), and a relief in the *speos* of Horemheb at Gebel Silsila (PM V, 208 (3); D. C. Forbes, 'Monument Close-up: Speos Horemheb', *KMT* 4/2 (1993), 46–51). In 'teaching' scenes, the king-to-be is often shown nude, sporting a side-lock, but the tomb of Kenamun (TT 93; N. de G. Davies, *The Tomb of Ken-Amun at Thebes* (New York, 1930), II, pl. 9) shows Amenhotep II wearing the Blue Crown, necklaces, and a kilt, seated on his nurse's lap.

<sup>9</sup> Collier, *Crowns of Pharaoh*, 120. See also OO.

<sup>10</sup> G. T. Martin, *The Royal Tomb at El-Amarna, II. The Reliefs, Inscriptions, and Architecture* (EES Archaeological Survey of Egypt 39; London, 1989), pl. 37; for the burial chamber in the tomb of Tutankhamun, see e.g. *Le portrait royal*, fig. 193.

<sup>11</sup> The example cited in R. A. Caminos, *The New-Kingdom Temples of Buhen, I* (EES Archaeological Survey of Egypt 33; London, 1974), pls. 44–5, is doubted by W. V. Davies in his review (*JEA* 65 (1979), 187–8): 'If it is the Blue Crown, then this is a rare example of a king of this period wearing it in conjunction with the royal beard'. Davies's view is followed by B. Lurson, 'Symétrie axiale et diagonale-2: les scènes des piliers de la cour du temple d'Horus à Bouhen', *GM* 182 (2001), 85. The head of the king (Thutmose III) is severely eroded from the nose upwards, and Caminos identifies the crown on the basis of 'a slanting trace above his much-damaged head and a piece of ribbon over his left shoulder'. The 'slanting trace' is not visible in the photograph of the scene and is not reproduced in the drawing. The 'ribbon' only appears on one other representation of the king (pl. 64, with the Blue Crown and no false beard), but is considerably longer in this case. The third figure with the Blue Crown from Buhen (pls. 50–1) lacks both ribbon and beard. Once attributed to the Ramesside Period, a bust said to come from Horbeit and now in Hildesheim (Pelizaeus Museum 384; A. Eggebrecht, *Pelizaeus-Museum Hildesheim: Die Ägyptische Sammlung* (Mainz, 1993), 90–1) depicts a king with the Blue Crown and a long false beard. The rectangular form of the wing of the crown clearly dates it to the Late Period, however, and is thus beyond the scope of this study.

<sup>12</sup> M. Müller, *Die Kunst Amenophis' III. und Echnatons* (Basel, 1988), IV–38: 'Die blaue Krone kommt sonst in der ganzen Königsplastik des Neuen Reiches nie an überlebensgrossen Statuen vor'. I know of one exception from the New Kingdom (II). The fact that this is a representation of Ramesses II may not be irrelevant to the colossal scale of the statue; as discussed below, it is also from a period when conventions governing the uses of the Blue Crown had altered.

hunting, frequently carrying a sceptre that denotes royal power over mankind,<sup>13</sup> and wearing elaborate clothes of a type not worn by the gods. He is never shown with quasi-divine attributes such as a false beard, he is not depicted on an imposing physical scale, and he is frequently shown receiving benefits from deities while wearing the Blue Crown. Whereas other crowns show the uraeus emerging indistinctly from the crown or trailing loosely over the brow,<sup>14</sup> the focal point of the Blue Crown is its tightly coiled uraeus, ready to strike in order to protect its mortal wearer.

The extra protection the king requires in his mortal state, which is implied by the presence of the Blue Crown, may also be provided explicitly in other ways. The king is portrayed attacking foreigners in both the large panels of the chariot body from the tomb of Thutmose IV.<sup>15</sup> On the right the falcon-headed god Montu steadies his arm as he draws his bow, while on the left the king's axe-wielding arm is guided by a falcon which occupies the place usually taken by a protecting vulture goddess. The expansive nature of the king's gesture on this side may have precluded the depiction of another human figure in the chariot, and the god was therefore represented in a way that occupied less space. In a similar fashion, the scenes on the painted box from the tomb of Tutankhamun depict not one but two vultures guarding the warrior king in his chariot:<sup>16</sup> one behind him, and the other mirroring its pose in front of the king. This use of the Blue Crown is reinforced by its presence in the tombs of Akhenaten and Tutankhamun, two royal tombs which eschew conventional royal funerary iconography in favour respectively of scenes of the king's daily duties and his burial by his successor. If the Blue Crown does not appear on the walls of 'orthodox' royal tombs of this period because of the crown's association with the pharaoh as a mortal, royal shabtis with this crown fall into an iconographic grey area, representing images of the living king designed for use after his death. This may be one reason why the Blue Crown appears so rarely on royal shabtis; **R** and **U** are the only two possible exceptions known to me apart from two of the 418 shabtis of Tutankhamun.<sup>17</sup> **U** and the two Tutankhamun shabtis have crowns painted black, not blue (**R**, which may not come from a shabti, is made from a dark stone and appears not to have been painted). It seems a likely hypothesis that the choice of black

<sup>13</sup> M. Lurker, *The Gods and Symbols of Ancient Egypt* (London, 1980), 43: '[the *ḥqꜣ* is] not only carried by gods and kings, but also by high officials'. P. E. Newberry, 'The Shepherd's Crook and the So-called "Flail" or "Scourge" of Osiris', *JEA* 15 (1929), 84–94, cites an example from the tomb of Huy where he holds the *ḥqꜣ* as a symbol of his status as King's Son of Kush and fan-bearer on the right of the king (N. de G. Davies and A. H. Gardiner, *The Tomb of Huy, Viceroy of Nubia in the Reign of Tut'ankhamun* (Theban Tombs Series 4; London, 1926), pl. xx). This use of the *ḥqꜣ* by the holders of these titles is also seen in G. A. Reisner, 'The Viceroys of Ethiopia', *JEA* 6 (1920), 80–1, pls. ix–x.

<sup>14</sup> E.g. *Le portrait royal*, figs. 12, 14. An exception encountered from the Amarna Period onwards is the Cap Crown, itself the forerunner of the Blue Crown, where the coiled uraeus is commonly depicted. Earlier representations of the Cap Crown (Davies, *JEA* 68, 71–5, figs. 2–10) have the more conventional type of uraeus seen on other crowns; either no body is shown and the head of the uraeus emerges at the king's brow, or the body trails along the crown.

<sup>15</sup> H. Carter and P. E. Newberry, *The Tomb of Thoutmôsis IV* (London, 1904), pls. x, xi.

<sup>16</sup> N. Davies, *Tutankhamun's Painted Box* (Oxford, 1962), pls. i–iv.

<sup>17</sup> Cairo JE 60830 (Carter 318A); JE 61044 (Carter 605B), illustrated in T. G. H. James, *Tutankhamun: the Eternal Splendour of the Boy Pharaoh* (Vercelli, 2000), 112, 123. The lack of other royal shabtis with the Blue Crown may only be an accident of preservation; it is noticeable, however, that none are known for Akhenaten, who wears the Blue Crown more than his predecessors, and for whom a large number of shabtis survive. Jaromir Malek and Diana Magee kindly allowed me to study Howard Carter's catalogue of the objects from the tomb of Tutankhamun.

colouring for the crown was intended to add a dash of Osirian symbolism to representations of a deceased ruler. In a similar way, a stela depicting Amenhotep III and Tiye from Amarna<sup>18</sup> depicts the king wearing a black Blue Crown (other elements in the stela are painted blue, so the colour was deliberately chosen). This stela has often been adduced as evidence that Amenhotep III ruled as coregent with Akhenaten, but the colour of the crown may indicate that this need not be the case.

A possible use of the Blue Crown to signify a less formal presentation of kingship can be seen in two juxtaposed scenes on the back of the small golden shrine from the tomb of Tutankhamun.<sup>19</sup> The upper shows him wearing the Blue Crown, several necklaces, and bracelets, relaxing on a chair with a large cushion, and being anointed with perfume by Ankhesenamun. The lower depicts him with the Red Crown, holding the crook and flail, wearing fewer collars and no bracelets, sitting on a block-throne. Ankhesenamun offers him two notched palm ribs bearing ‘emblematic hieroglyphics ensuring the sovereign “all life and dominion”, and one hundred thousand “jubilee” festivals’.<sup>20</sup> Both scenes embody a wish for the king’s health and prosperity, but emphasize different spheres of his dominion. The king’s pose, costume, and surroundings are contrasted in both depictions; it may be significant that the ‘formal’ scene with its iconography of eternal kingship makes explicit reference to the king’s ‘appearance like Re on the throne of Horus’.

Definitions of the Blue Crown in older secondary literature as a ‘war crown’, a ‘coronation crown’, or a ‘crown of inheritance’<sup>21</sup> are too specific, since they encompass only some of its functions. A simpler definition—that the Blue Crown emphasizes the position of the king in this world by being closely associated with the physical duties of kingship and not focusing on his divine attributes—may be less specific but more productive.

### Eye shapes and the Blue Crown

This less specific definition of the Blue Crown is supported by an important aspect of the facial physiognomy of its wearers. Depictions of kings wearing the Blue Crown, whether in statuary or relief, consistently show them with a very specific eye shape.

Egyptian representations of the eye changed over time, and have been used by scholars as a means of dating works and identifying artistic workshops. B. V. Bothmer’s study defines twelve basic eye types, which could be further elaborated by

<sup>18</sup> British Museum EA 57399 (A. P. Kozloff and B. M. Bryan, *Egypt’s Dazzling Sun: Amenhotep III and his World* (exhib. cat.; Cleveland, 1992) (hereafter *Dazzling Sun*), 213–14, cat. 29; E. R. Russmann, *Eternal Egypt: Masterworks of Ancient Art from The British Museum* (exhib. cat.; London, 2001), 143–4, cat. 59).

<sup>19</sup> Eaton-Krauss and Graefe, *The Small Golden Shrine*, pl. xii.

<sup>20</sup> Eaton-Krauss and Graefe, *The Small Golden Shrine*, 23.

<sup>21</sup> Summary of earlier views in Davies, *JEA* 68, 75–6. The specific definition of Collier (*Crowns of Pharaoh*, 124), that the Blue Crown showed the king to be ‘heir to the throne through Amun’, is not supported by any textual evidence and is based on the supposition that the round ‘Cap Crown’ ancestor of the Blue Crown developed from the flat-topped ‘Amun Crown’ worn (with feathers) by that god and Nebhepetre Mentuhotep. It also seems doubtful that the Blue Crown would be worn so frequently during the Amarna Period if it had such a close link to Amun. The use of the Blue Crown to refer to the mortal pharaoh carries an implicit notion of its role as a ‘crown of inheritance’, since the mortal king must have inherited his throne from his predecessor, but I view this as one aspect of the crown’s function.

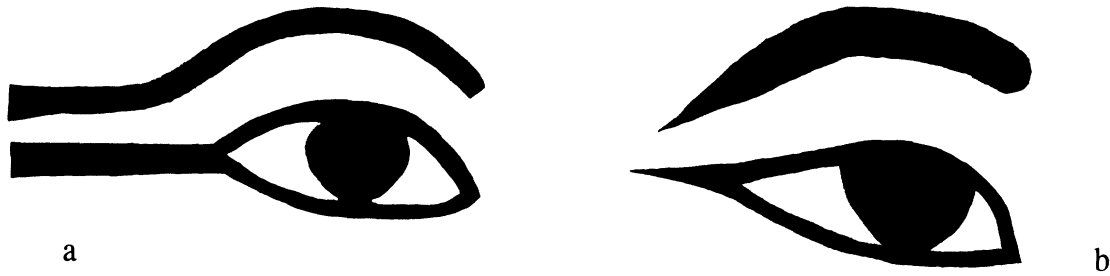


FIG. 2. a) formal eye, b) naturalizing eye (composites from several sources, drawn by the author).

combination.<sup>22</sup> His analysis, however, is constrictive rather than constructive and is entirely connoisseurial: the pieces are presented as artworks and no questions are asked about their context and meaning. For iconographic analysis, a less detailed categorization may be more profitable. Here, the treatment of eyes are split into two categories: the formal eye, and the naturalizing eye. These are illustrated in figures 2 a) and b) respectively.

The formal eye is the more elaborate, two-dimensional, and 'hieroglyphic' of the two types. The key feature is a pronounced slightly splayed, square-ended 'cosmetic line', probably representing an application of eye-paint, which extends from the outer canthus towards the ear. This is surmounted by a thick eyebrow, which closely follows the line of the eye and runs parallel to the cosmetic line, finishing with an extended square-ended tail near the tab of hair by the ear.

The naturalizing eye is different in conception. While it has a wider range of variants, in all of them there is a clear interest in representing the eye as a part of the body. The outer canthus is not decorated with a cosmetic line, but instead may have a shorter pointed tail that extends the line of the upper eyelid. The eyebrow is shorter, usually narrower, and also finishes with a pointed end. Rather than following the line of the eye and the cosmetic line, the eyebrow is frequently more arched than the eye, and the two lines, if projected further, would converge.

In brief,<sup>23</sup> the connection between eye-paint and rank can be traced back to the elaborate cosmetic palettes of the Predynastic and Early Dynastic Periods, and the formal—adorned—eye type possesses associations with decoration, purity, and divinity. During the Old Kingdom, cosmetic lines (i.e. formal eyes) appear only on depictions of deities and kings. In the New Kingdom, they also occur in private monuments. In tomb paintings of this period, they are often only found on representations of the tomb owner or members of his family, while less important figures tend to have naturalizing eyes. If the formal eye indicates high status or divinity, then the naturalizing eye carries an implication of lower status or mortality. Thus, while the formal eye is dominant in

<sup>22</sup> 'Eyes and Iconography in the Splendid Century: King Amenhotep III and His Aftermath', in L. M. Berman (ed.), *The Art of Amenhotep III: Art Historical Analysis* (Cleveland, 1990), 84–92. B. M. Bryan, 'Portrait Sculpture of Thutmose IV', *JARCE* 24 (1987), 3–20, gives a table of 'Eye Shapes for Royal Statuary of the Eighteenth Dynasty', but does not comment on the types of eyes shown.

<sup>23</sup> A more detailed examination of the development and significance of the formal and naturalizing eye types is planned.



representations of the king in the New Kingdom,<sup>24</sup> the principal exception to this is when the ruler is depicted wearing the Blue Crown, where the naturalizing eye is almost invariably used; the mortal status of the king implied by the Blue Crown is reinforced by the use of a less 'divine' eye type.

The distinction between formal and naturalizing eyes is maintained, with a few exceptions discussed below, in royal statuary and relief throughout the Eighteenth Dynasty. The earliest known statue wearing the Blue Crown dates to the reign of Thutmose III (C), and alone among his sculpture, depicts him with naturalizing eyes. The heads attributed to Amenhotep II wearing the Blue Crown (D, E, F, G) also have naturalizing eyes, while most of his other representations show him with formal eyes.<sup>25</sup> The same distinction seems to hold true for Thutmose IV.

Some smaller-scale statues of Amenhotep III,<sup>26</sup> as well as reliefs dating late in his reign,<sup>27</sup> also depict him with a naturalizing eye, but the surviving colossal figures of the king, and depictions of deities, have formal eyes. In the Amarna Period, from which no statues of deities survive, the naturalizing eye is dominant regardless of the type of crown worn. Afterwards, the distinction is briefly restored: in the late Eighteenth Dynasty and at the start of the Nineteenth, heads with the Blue Crown (e.g. NN) have naturalizing eyes, while formal eyes are favoured with representations of other head-dresses.

From the reign of Ramesses II onwards the naturalizing eye falls out of the iconographic repertoire for royal representations, and the iconography of the Blue Crown itself starts to change. The crown grows taller and sits more vertically on the head; some representations of Ramesses II seem to have been altered to conform to this new pattern.<sup>28</sup> The uraeus, which had hitherto always been shown coiled around the base of the Blue Crown, is now frequently depicted in other arrangements derived from the iconography of other crowns.<sup>29</sup> The eyes are more often formal than naturalizing.<sup>30</sup> This development may parallel a change in the significance of the Blue Crown, whereby its use becomes more comparable with ancient head-dresses such as the *nemes*, the White Crown, and the Red Crown. By the Twentieth Dynasty, the Blue Crown begins to

<sup>24</sup> Variations within its shape can be used as dating criteria, e.g. *Le portrait royal*, figs. 11 (Amenhotep I), 71 (Thutmose III), and 133 (Amenhotep III), showing the range of shapes the formal eye can have during a relatively short period.

<sup>25</sup> The naturalizing eye is also used for representations of this king with his characteristic 'Nubian' wig: I. Lindblad, 'Four Pieces of Royal Sculpture from the New Kingdom at Stockholm', *Bulletin of the Museum of Mediterranean and Near Eastern Antiquities* 19 (1984), 28–31; *Le portrait royal*, figs. 101, 102. This is consistent with my interpretation of the naturalizing eye: in many ways the 'Nubian' wig is similar to the Blue Crown in the emphasis it places on the human nature of the king; both are worn in depictions of the king fighting, and never appear in conjunction with a false beard. H. Sourouzian, 'A Bust of Amenophis II at the Kimbell Art Museum', *JARCE* 28 (1991), 68, mentions the naturalizing eyes on D and G as 'exceptional' (E and F are not discussed; the attribution of F is uncertain and it has been extensively reworked).

<sup>26</sup> E.g. Cleveland Museum of Art 61.417 (*Dazzling Sun*, 159, cat. 8). It is significant that all these examples are under life-size figures, showing the king wearing a wig: as in the portrayals of Amenhotep II with the 'Nubian' wig and naturalizing eye, a distinction in status is still being made visible.

<sup>27</sup> E.g. *Le portrait royal*, fig. 144.

<sup>28</sup> E.g. *Le portrait royal*, fig. 231. Akhenaten's Blue Crown becomes elongated, but leans back on the head instead of standing up, and is not as thin as the Ramesside Blue Crown can be. See n. 41.

<sup>29</sup> E.g. LL. Conversely, the Blue Crown uraeus type does not spread to other crowns.

<sup>30</sup> E.g. JJ. The earliest consistent depiction of the Blue Crown with a formal eye is first seen in the reliefs of Seti I in his temple at Abydos, where its quasi-mortuary nature may have dictated the iconography.

appear on the walls of royal tombs.<sup>31</sup> Linguistically, this functional overlap of the Blue Crown with the older crowns is paralleled by its use as the generic determinative for the word *ḥꜥw*, first attested in an inscription of the reign of Horemheb, and common from the Nineteenth Dynasty onwards.<sup>32</sup> The presence of the Blue Crown in the battle scenes of Ramesses II and Ramesses III shows that it continued to carry its earlier implication that the king was engaged in activities relating to his physical nature, but it also took on a less specific symbolism as one of the many crowns the king could wear, a sort of summation of, and representational shorthand for, the royal regalia. The formal eye, with its connotations of elevated status, would be more suitable for this than the naturalizing eye. The most recent survey of ancient Egyptian crowns neatly encapsulates this new function in its description of the Blue Crown as ‘the quintessential crown of the living ruler, which could incorporate the symbolism of other headdresses’.<sup>33</sup>

Exceptions to the rule that in the Eighteenth Dynasty the Blue Crown is accompanied by a naturalizing eye are few, and susceptible to special interpretation. One group occurs in the temple of Thutmose III at Deir el-Bahri,<sup>34</sup> where he is clearly shown with a formal eye in conjunction with an unusual variant of the Blue Crown. This is coloured black and has a strap, but lacks a false beard. This variety of crown is found several times but only in this temple (the Blue Crowns in the temple of Hatshepsut are accompanied by naturalizing eyes; the examples which preserve colouring are blue). I suggest that it was an iconographic experiment, possibly an attempt to make the Blue Crown more formal or more similar to the older crowns, that was confined to his reign.

Another exception is a block of Thutmose III from Elephantine, now in the Louvre.<sup>35</sup> The king is shown with an unusual ‘compromise’ eye, having a typically formal wedge-shaped cosmetic line below a naturalizing arched, tapering eyebrow. Myśliwiec considers this to be a transitional form between two ‘groupes iconographiques’, one of which treated the eye with a long cosmetic line and eyebrow, the other without.<sup>36</sup> His analysis, however, does not take iconographic details into consideration; his second group consists entirely of portraits with the Blue Crown or of women, where a less formal eye would be expected. The use of formal eyes on other figures from the same temple—and even within the block in question—makes it unlikely that this is just a craftsman’s idiosyncrasy. The block clearly comes from a scene showing the king embraced by two gods, and as in the previous example, the eye on the Louvre block may signify the implied equality of king and god by imbuing the Blue Crown-wearing king with more formality, the formal eye of the goddess next to him being *de rigueur* for her.

These examples come from the reign of Thutmose III and Hatshepsut, the first two rulers regularly to be depicted wearing the Blue Crown, a period when the iconographic

<sup>31</sup> The earliest example known to me is in the tomb of Ramesses III (*Le portrait royal*, fig. 284). Royal tombs before Ramesses II rarely depict any head-dress other than the *nemes*.

<sup>32</sup> J. R. Harris, ‘Nefertiti Rediviva’, *AcOr* 35 (1973), 5–13.

<sup>33</sup> K. Goebis, ‘Crowns’, in D. B. Redford (ed.), *The Oxford Encyclopaedia of Ancient Egypt* (New York, 2001), I, 324.

<sup>34</sup> J. Lipińska, ‘Exquisite Details: Relief Fragments from the Temple of Thutmose III at Deir el-Bahari’, *KMT* 7/2 (1996), 46–51. Another example from the same site is *Le portrait royal*, fig. 90.

<sup>35</sup> Louvre B 64: *Le portrait royal*, fig. 78. The whole block is illustrated in colour in G. Andreu, M.-H. Rutschowskaya, and C. Ziegler, *L’Égypte ancienne au Louvre* (Paris, 1997), 113.

<sup>36</sup> *Le portrait royal*, 53.

conventions for this relatively new piece of headwear may have been in process of definition. These two particular treatments seem not to be attested later. A number of other Eighteenth Dynasty representations show the Blue Crown in conjunction with a formal eye.<sup>37</sup> These form, however, a small proportion of the total known, and may best be seen as exceptions to a rule. Significantly, while the formal eye was occasionally used in depictions with the Blue Crown, the converse—representations of kings wearing other crowns with a naturalizing eye—is far rarer.<sup>38</sup>

### Two case studies: the ‘Entdeckungen’ and Barber Institute heads

This categorization of the iconography of the Blue Crown can be tested by analysis of some relatively little-known heads sporting a Blue Crown which have not hitherto been correctly dated. The first piece (**B**; pl. IX, 1–2), a granodiorite head 20 cm high, was published by Sylvia Schoske and Dietrich Wildung in a catalogue (‘Entdeckungen’) of a 1985 exhibition of antiquities from South German private collections; I do not know its present location.<sup>39</sup> The authors and Hans-Wolfgang Müller dated it to the reign of Amenhotep III, but three points make a different dating more likely. First, the head has a formal eye, which is unusual for a head with the Blue Crown before the Nineteenth Dynasty. It also has an incised line running parallel between the eye and the eyebrow, a treatment first seen in the reign of Amenhotep III (e.g. **AA**), but unlike those examples, this one is carved in three dimensions, defining the shape of the socket and eyeball under the eyelid. This sculptural definition of the eye socket does appear on a few statues datable to the last years of Amenhotep III,<sup>40</sup> but is a constant feature in the representation of Akhenaten and his successors, and carries on into the Nineteenth Dynasty. Second, the brow-band of the crown is deeper than on undisputed examples from the reign of Amenhotep III or before. In these earlier examples the band is not as deep as the wing of the crown by the ear, but from the Amarna Period onwards it is normally broader, and as deep as the wing.<sup>41</sup> This later form is the one used on the German head.

<sup>37</sup> **I**; **W**. In relief, some scenes from the reign of Amenhotep III in the temple of Luxor feature the Blue Crown with formal eyes: H. Brunner, *Die südlichen Räume des Tempels von Luxor* (AV 18; Mainz, 1977), pls. 51, 56, 57, 59, 73, 93, 97, a total of eight representations showing the Blue Crown with formal eyes. Eight representations have naturalizing eyes, and a further twelve are illegible. I have not been able to check the original reliefs.

<sup>38</sup> Kimbell Museum AP 1982.04, a head and torso with the White Crown attributed to Amenhotep II, shows no sign of carved eyebrows or cosmetic lines (Sourouzian, *JARCE* 28, 55–74). This may reflect re-working by Ramesses II, who usurped the statue, a lack of finish, weathering, or the eyes may have been painted on. A divine head, Metropolitan Museum of Art 07.228.50 (B. Fay, ‘Tuthmosid Studies’, *MDAIK* 51 (1995), 21–2, pls. 8–9), is an unusual piece with strange naturalizing eyes: the eyebrow is lightly carved and seems to curve right down to the level of the corner of the eye where one would expect the short tail characteristic of the naturalizing eye. Another unusual feature on this piece is the treatment of the tripartite wig by the ears; instead of a plain tab of hair, four (on the right side) or five (on the left) of the locks of hair running horizontally above the temple curve down in front of the ears to form striated ‘sideburns’ instead of plain tabs. The false beard also lacks a strap to secure it.

<sup>39</sup> I am grateful to Dr Alfred Grimm of the Staatliches Museum Ägyptischer Kunst, Munich, for photographs of this head, and to Rhona Dunphy for facilitating my requests.

<sup>40</sup> E.g. Cairo JE 59880: Bothmer, in Berman (ed.), *The Art of Amenhotep III*, fig. 34; also **L** and **M**.

<sup>41</sup> E.g. **HH**. This new representation is predominant throughout the reign of Akhenaten in sculpture and relief, and in representations of Nefertiti wearing her idiosyncratic tall blue crown. Since the brow-band of these crowns was a shiny golden strip, its increase in size and brilliance is apt for a period with an emphasis on the enlivening

The final point is the form taken by the roundels on the crown. Two types of roundels are found in depictions of the Blue Crown. The earliest variant shows one broad circle around a 'dot', rather like a ring doughnut. This is attested in relief from the time of Thutmose III onwards, and in sculpture from the reign of Amenhotep II or Thutmose IV (**H**, **J**). The second variant, the form taken by **B**, consists of two concentric circles around a pronounced 'dot'. This 'double roundel' form is attested twice from the reign of Amenhotep III: on a relief from the tomb of Khaemhat (TT 57),<sup>42</sup> and on a terracotta head from Karnak (**O**). It first appears in profusion in faience models of the Blue Crown, of which the earliest provenanced pieces seem to come from Amarna.<sup>43</sup> In the Amarna Period, however, stone sculptures with the Blue Crown have the 'single roundel' (e.g. **HH**) and it is not until the reign of Ramesses II that the new form with two circles becomes predominant in stone (e.g. **KK**, **NN**). It seems likely that the concentric form of the double roundel was first produced with compasses or a moulded piece of wood on unfired faience or clay, and this form was later translated into stone by Ramesside craftsmen.

If these three features are taken into account and considered together with the low, wide proportions of the face and the deep-cut corners of the mouth, both characteristics of representations of Ramesses II but uncommon in the iconography of Amenhotep III, it is likely that the head in Germany is not an unusual representation of Amenhotep III, shown with a rare treatment of the crown and a doubly unusual treatment of the eye, but instead, a characteristic image of Ramesses II.

The second piece is a gabbro head 60 cm high in the Barber Institute of Fine Arts at the University of Birmingham (**A**; pl. VIII, 1–4).<sup>44</sup> It was acquired by the Institute in 1944 from Sydney Burney,<sup>45</sup> a London dealer in modern sculpture, antiquities, and ethnographic art. Thomas Bodkin, the director of the Institute, had no specialist knowledge of Egyptian art, and bought the head on the recommendation of the Egyptologist Percy Newberry. The first art historian to take a serious interest in the head was Cyril Aldred. He proposed an attribution to Amenhotep III, which was accepted by

nature of the sun's rays. A few representations of Amenhotep III (**L**, **M**) also show this broad brow-band, as well as the sculpturally-rendered socket characteristic of the Amarna Period. Skirting the issue of the possible co-regency between Amenhotep III and Amenhotep IV/Akhenaten, this trend towards a more anatomically objective representation of the eye is one which either begins at the end of the reign of Amenhotep III or at the start of the reign of Amenhotep IV. See W. R. Johnson, 'Amenhotep III and Amarna: Some New Considerations', *JEA* 82 (1996), 72. The Blue Crown of Akhenaten also differs from his father's in its shape: it is longer, thinner, and leans back more (e.g. Louvre E 15593: Johnson, *JEA* 82, pl. vii). Why the Blue Crown should have two distinct forms for the two rulers is uncertain. Akhenaten's and Nefertiti's crowns are in general longer and thinner than those of Amenhotep III (e.g. *Le portrait royal*, figs. 160, 182), and this may mirror the more elongated body proportions of the Amarna Period, or may possibly have served to distinguish more readily between the two kings. I am grateful to the anonymous *JEA* reviewer for suggesting this line of enquiry.

<sup>42</sup> Berlin 14442 (PM I<sup>2</sup>, 115). Illustrated in *Le portrait royal*, fig. 140, and K. Myśliwiec, 'The Art of Amenhotep III: A Link in a Continuous Evolution', in Berman (ed.), *The Art of Amenhotep III*, 16–25, fig. 4d.

<sup>43</sup> Examples in J. Samson, 'Amarna Crowns and Wigs', *JEA* 59 (1973), 47–59.

<sup>44</sup> I am grateful to Prof. Richard Verdi, Director, and Dr Paul Spencer-Longhurst, Senior Curator of the Barber Institute, for allowing me close access to the head in their care and the files concerning its purchase, and to Diana Magee for allowing me to study the Newberry correspondence in the Griffith Institute.

<sup>45</sup> A short biographical sketch of Burney, written by his grandson, is in D. Coke, *The Modern Model Art Gallery*, (exhib. cat.; Chichester, Pallant House Gallery, 1997), 4. Burney seems to have been a collector and patron as much as a dealer; many of the objects in the exhibitions he organized were loaned by collectors, and not offered for sale.

John Cooney of the Brooklyn Museum and Bernard Bothmer of the Museum of Fine Arts, Boston, with whom he discussed the head.<sup>46</sup> It does appear to be a representation of that king; the large slanting almond-shaped eyes, relatively small nose, and pursed mouth with a slight rim around the edge, are attributes shared by other heads acknowledged as his (e.g. **S**, **DD**). There are, however, a number of unusual features.

First, the head is colossal. At 60 cm high, it is almost twice life-size. Apart from the dyad of Ramesses II and a goddess (**II**), from a period when the symbolism of the Blue Crown may have altered, no colossal heads with the Blue Crown survive from the New Kingdom. The two exceptions from the Eighteenth Dynasty are the Birmingham head and one in the Brooklyn Museum (**PP**; I do not think **RR**, **SS**, and **TT**, three others cited by PM, are old). The Brooklyn head, acquired in 1959, was long regarded as a head of Amenhotep III, but recent analysis has established that it is not authentic. It is worrying that this should be the only parallel for the size of the Barber Institute head.

The eyes of the Barber head are, unusually, formal, with a pronounced square-ended cosmetic line parallel to a long square-ended eyebrow. One of the most striking features of the eyes is an incised line running through their upper band. This is unlikely to be a mistake on the part of the sculptor because it is present on both eyes; it is unique to the Barber head. This detail can be seen as a misunderstanding of a particular type of eye which appears first in the reign of Amenhotep III, when the 'natural' eye is sometimes shown with an incised line between the eye and the eyebrow, representing a fold of flesh (see discussion of **B** above; **AA** is an example from the reign of Amenhotep III). A few formal eyes from this period also show a line above the eye,<sup>47</sup> but the Barber Institute head places this fold, a representation of a physical feature, within an abstract representation of a band of cosmetic paint. This is a conflation of two opposing treatments of the eye which has no meaning. The exaggerated, drooping inner canthus is also atypical.

Further stylistic peculiarities include the nose, which is a little smaller than would be expected for a representation of Amenhotep III, and lacks the slightly bulbous tip at the end,<sup>48</sup> and the prominent square chin. The brow-band of the Blue Crown is atypical, carved flush with the forehead rather than raised above it. While undisputed heads from the reign of Amenhotep III or earlier show the band as a parallel strip finishing above the bottom of the wing, the brow-band of the Barber head curves down towards, and meets, the bottom of the wing.

Some features of the head's condition are noteworthy. The projecting head of the uraeus is missing, but the vulnerable nose is intact. Although not an entirely implausible breakage pattern (**JJ** is similarly damaged), it is relatively uncommon, and the appearance of the break is unusual; the damage has a smooth contour and a 'pecked' appearance evincing careful attack with an implement, rather than the clean-edged

<sup>46</sup> The attribution was made in a report dated 1 July 1953 to Kenneth Garlick of the Barber Institute, stating that although 'a possibility remains that the head might be of Tuthmosis IV, the father of Amenophis III...I am inclined to date it as very early Amenophis III with perhaps some hangover from the preceding reign' (report kept in the Barber Institute). Aldred discussed the head in letters to Cooney and Bothmer over the summer and autumn of 1953; these are kept in the Brooklyn and Boston Museums respectively.

<sup>47</sup> E.g. British Museum EA 3, a colossal bust from the king's mortuary temple (*Dazzling Sun*, 125).

<sup>48</sup> E.g. Luxor Museum J. 133: *Dazzling Sun*, 154-5, cat. 5. There are no signs that the nose of the Barber head has been recut recently or in antiquity, perhaps as a result of a chip in the stone, or malicious damage. The unusual form of the nose was noted by Aldred in his report on the head (see above).

fracture likely to result from the statue's being toppled. It is difficult to interpret this as anything but deliberate, although malicious attacks normally concentrate on the eyes and nose. If, however, the head was being copied from an original with an incomplete uraeus, to carve a 'damaged' uraeus would be a convenient way of avoiding the creation of a complete one, with the attendant risk of making a stylistic mistake. In a similar manner, the way in which the head has been broken, with a deep fissure at the back (where the surface of the crown on the right seems to rise out in the manner of a back pillar), but only a small crack on the cheek, is also 'convenient'. Most heads with the Blue Crown lack complete back pillars, and to make a damaged area where one would have been would create an illusion of age as well as avoiding the chance of creating a stylistically incorrect back pillar. The surface of the Blue Crown appears to have been roughened to take a layer of gesso or pigment, as is known on some other examples (S, DD, JJ), but the roughening is unevenly applied, and in places it is difficult to distinguish between these areas and those that have been damaged. Examination of the surface of the crown shows that it was carved, polished, and then roughened, which is a labour-intensive and counter-intuitive procedure. Working with bronze tools and stone pounders, ancient craftsmen would surely have omitted the final stage of polishing the crown rather than roughening up a surface they had previously taken the trouble to smooth. This procedure would be less strange, however, if the makers of the head possessed more powerful tools and had no objection to its sustaining some damage in the course of its roughening-up—in other words, if the head was specially treated so as to appear aged. Finally, the proper right side of the head behind the ear shows a *pentimento*, where the position of the Blue Crown has been carved twice, once correctly and once in a position that makes no sense (pl. VIII, 2). It is difficult to believe that an ancient craftsman familiar with the shape of the royal regalia would have made a mistake like this. In view of all these features, unless new evidence comes to light, the Barber Institute head should not be considered ancient.

If the Barber head is modern, the question arises of when it was made. Burney said he had acquired it from a dealer in Paris in 1939, and the lack of any reference by Cooney (an avid follower of the art market) to an earlier sighting of it suggests that the unidentified dealer in Paris was its first owner.<sup>49</sup> It is impossible to say how long it had been in his possession. Forgeries and copies of Egyptian antiquities have bedevilled museums and collectors for many years,<sup>50</sup> but from the end of the nineteenth century onwards they became more competent and ambitious. During the first two decades of the twentieth century, wealthy American museums and collectors took an increasing interest in Egyptian art. The discovery of the tomb of Tutankhamun in 1922, the publication of the spectacular contents of the studio of the sculptor Thutmose, found in 1912 by the Deutsche Orientgesellschaft at Amarna, and the generally buoyant economy of the 1920s created an appetite for Egyptian objects successfully exploited by ever more ambitious and well-informed forgers.

<sup>49</sup> Photographs of the back of the head show several circular stamps marked 'Douane', confirming that the head had been in France, or a Francophone country, at some point.

<sup>50</sup> The most comprehensive discussion of the forgery of ancient Egyptian art is H. G. Fischer, 'Forgeries', *Grove Dictionary of Art* (London, 1996), X, 85–9. One cannot strictly term an object a forgery unless one knows that it was deliberately made to deceive and knowingly sold under a false attribution. Here, however, I use the term more loosely to describe a piece that has been incorrectly presented as ancient.

It is a connoisseurial commonplace that forgeries possess a 'shelf-life' of a generation or two before their exposure, because most forgers cannot avoid interpreting the objects they copy after the taste of their own period. As years pass, however, incongruous elements more reminiscent of the time the piece was created may be revealed.<sup>51</sup> As the number of forgeries that have escaped discovery cannot be known, the point can be debated, but is broadly true. On the Barber Institute head, the un-Egyptian curve formed by the eyebrows which sweeps down into the nose and out again at the nostrils may be one such anachronistic element. This treatment of the eyebrows and nose as a single unit is more reminiscent of twentieth century works by Modigliani and Brancusi than ancient Egypt. This, together with the known increase in forgeries after World War I, makes a date in the 1920s or 1930s most likely for the creation of the Barber head. Perhaps the best-known manufacturer of Egyptian 'antiquities' from this period is Oxan Aslanian, the 'Berlin Master'.<sup>52</sup> From about 1915 onwards, he produced a large number of forgeries, mainly in the styles of the Amarna Period and the Old Kingdom. The Barber head, however, is probably not a creation of his: it has none of his mannerisms, particularly visible in the treatment of the eyes; the majority of his works are executed in limestone with extensive polychromy; and the scale is larger than usual for his work.

No other pieces can be attributed at present to the craftsman who made the Barber head, but its first known appearance in Paris may suggest the place of manufacture. Paris was the centre of the art trade—and therefore of forgeries—between the World Wars, so one might expect the head to have been made there. This is supported by a number of points related to the head itself. Only four large heads of Amenhotep III with the Blue Crown were extant in the 1930s: one in Paris (**DD**), a terracotta head from the Karnak cachette, now in Cairo (**O**), one in Alexandria (**K**), and one in The British Museum (**AA**). The Cairo and British Museum heads bear little resemblance to the one in the Barber Institute. While the Alexandria head resembles the Barber example a little more, it is from a 'coronation group' and has the remains of Amun's hand on the top of the crown. Furthermore, the only publication of the Alexandria head, from 1928, is obscure and poorly illustrated. The Paris head, however, is very similar. It shares with the Barber piece the curiously fat coils of the uraeus. Both have a roughened surface on the crown. In both cases the upper moulding of the brow-band seems to merge into the flanges of the crown instead of looping over the ears, a peculiarity seen elsewhere only on the Brooklyn head, itself derived from the one in Paris. Both heads depict the right ear of the king slightly squashed under the flanged wing. The backs of both pieces are broken in the same way. Whereas most figures with the Blue Crown have a small, tapering back pillar which has neatly broken away from the head, the Paris head has a large segment of the back of the crown missing, a feature paralleled in the Barber head (pl. VIII, 3).

The errors in the Barber head, such as the *pentimento* in the depiction of the lower edge of the crown and the too-small nose, occur in areas where the Paris head is damaged or equivocal. The sides of the Paris head do not indicate the lower edge of the

<sup>51</sup> An appealing example of this is a Madonna in the style of Botticelli, which today can be seen 'to reflect the notions of beauty embodied in the screen goddesses of the 1920s': M. Jones (ed.), *Fake? The Art of Deception* (exhib. cat.; London, 1990), 34–5, cat. 7.

<sup>52</sup> The most recent study of his work is R. Krauss, 'Zwei Beispiele für Echtheitsuntersuchungen an Aegyptiaca', *Jahrbuch Preußischer Kulturbesitz* 23 (1986), 155–64. One of the earliest illustrations of a work of his is a female bust then in the Carnarvon collection, published (under an unfortunately apt title) by A. H. Gardiner 'A New Masterpiece of Egyptian Sculpture', *JEA* 3 (1917), 1–3.

crown, and the original shape of its nose cannot be distinguished from what remains: cast upon his own imagination, the maker of the Barber head made a mistake. The only conspicuous departure from the Paris head is the treatment of the eyes. Why the sculptor of the Barber piece chose not to copy its naturalizing eyes in favour of formal eyes is impossible to say, but perhaps he felt that formal eyes were more recognizably 'Egyptian' and thus a guarantee of authenticity.

These similarities indicate that the Barber head was probably copied from the head in Paris. Since the Paris piece was first published after the Barber head was purchased,<sup>53</sup> and the backs of the two heads are so similar, it was probably made by someone who had seen the Paris head. Combined with the head's first appearance there, it seems likely that the head now in Birmingham was both made and launched on the market in Paris, at some point in the 1930s.

The distinction of status—old versus young, royal versus divine, the living versus the dead, divine versus mortal—was closely observed and interpreted in many areas of Egyptian art. Detailed investigation of two potential iconographic components, the Blue Crown and the form taken by the eye, shows that their depiction is guided by specific iconographic rules. Analysis of these can assist in dating uninscribed and contextless works of art, as well as helping us to understand the meanings of these signifiers to the ancient Egyptians.

### Catalogue: Sculptural representations of the Blue Crown

This lists objects mentioned in the text and a full list of pieces commonly dated to the Eighteenth Dynasty up to the Amarna Period known to me. All pieces are uninscribed heads unless stated otherwise. The identifications follow those of PM and other publications (while occasionally expressing doubts), except in cases where a different attribution can be positively supported. A select bibliography is given. Following art-historical convention, 'attributed' describes uninscribed pieces which can be assigned to a particular period with some certainty; 'ascribed' indicates a greater degree of doubt by a previous author or on my part.

#### *Pieces illustrated and discussed in the text*

A University of Birmingham, Barber Institute of Fine Arts 44.1

Gabbro H. 60 cm

Provenance unknown. Acquired on the London art market, 1944; said to have been offered for sale in Paris in 1936.

Colossal head. Attributed to Amenhotep III but a modern piece, probably based on Louvre A 25 (DD). The stone was identified by the conservation department at The British Museum (unpublished report in the Barber Institute).

*Published:* PM VIII, 800-730-300; Bothmer, in Berman (ed.), *The Art of Amenhotep III*, 87, fig. 26; R. Verdi, *The Barber Institute of Fine Arts* (London, 1999), 16; P. Spencer-Longhurst, *The Barber Institute of Fine Arts: Handbook* (Birmingham, 1993), 104.

<sup>53</sup> The first reference known to me is J. Vandier, *La Sculpture égyptienne au Musée du Louvre* (Paris, 1954), pl. 13, cited in PM. I have been unable to find out if the piece was illustrated earlier in postcards or photographs such as those of Alinari.



**B** Private collection, South Germany

Granodiorite H. 20 cm

Provenance unknown. In a South German collection, 1985; files at the Brooklyn Museum show that the head was on the European art market in the mid-1960s.

Attributed to Amenhotep III in its publication, but considered here a representation of Ramesses II.

*Published:* PM VIII, 800-732-853; S. Schoske and D. Wildung, *Entdeckungen: Ägyptische Kunst in Süddeutschland* (Mainz, 1985), 61, cat. 44.

### *Thutmose III*

**C** Cairo CG 42192

Granodiorite H. 35 cm

Provenance: Karnak cachette

Seated figure of a king, wearing *šndyt*-kilt and holding *hq3* and flail, inscribed 'Menkheperre' on belt. Most of face and crown missing, but enough preserved to show that figure has naturalizing eyes and wears the Blue Crown, which has a shallow brow-band and plain surface, roughened. Remains of gilding representing anklets and bracelets on the biceps and wrists. Laboury (p. 382) catalogues this work among 'statues problématiques'. The lack of the top part of the face makes identification difficult, but the rest of the piece is not stylistically inferior to works from the reign of Thutmose III. The belt is inscribed 'Menkheperre', although not in a cartouche (a stylistic feature also met with in an unquestioned statue of Thutmose III: Laboury, 224), and the back is inscribed with a text of poorer execution than the rest of the statue, mentioning Shoshenq I and Psusennes II. Legrain considered this an indication of usurpation from Thutmose III. Laboury's explanation (p. 383), that the statue may have been made for Shoshenq I, mentioning the High Priest of Amun Menkheperre, a putative grandfather of his predecessor Psusennes II, is complicated and begs the question of why Shoshenq I would have dedicated a pre-eminently kingly statue to a non-royal ancestor. The original presence, however, of 'Menkheperre' on an usurped statue would be a legitimizing act with special resonance for Shoshenq. The earlier date thus seems almost certain.

*Published:* PM II<sup>2</sup>, 138; G. Legrain, *Statues et statuettes de rois et de particuliers*, III (CG; Cairo, 1914), 1; D. Laboury, *La statuaire de Thoutmosis III: essai d'interprétation d'un portrait royal dans son contexte historique* (Liège, 1998), 382-4.

### *Amenhotep II*

**D** Baltimore, Walters Art Gallery 22.229

Granodiorite H. 26 cm

Provenance unknown. Purchased by Henry Walters in Paris through Dikran Kelekian, 1913.

Crown has plain surface, shallow brow-band, and coiled uraeus lacking head. Head has naturalizing eyes, missing nose. Surface of piece has a number of deep cracks. Remains of triangular-topped back pillar. Attributed to Amenhotep II.

*Published:* PM VIII, 800-730-165; L. Trusheim, 'The Conservation and Attribution of an Egyptian Sculpture: A Collaboration between Conservators and Curators', *JWAG* 59 (2001), 23-7.

**E** Cairo CG 24635 (JE 32496)

Wood (acacia), formerly gilt H. 22 cm

Provenance: Valley of the Kings, tomb of Amenhotep II (KV 35)

Surface of crown covered with gesso to take layer of gilding, hacked off in antiquity. Face painted red. Hollows for inlays of eyes. Published picture does not allow a conclusive identification of eye type, but it seems to be naturalizing; no cosmetic line is visible, the inlays for the eyes are set at a relative slant, more suggestive of a naturalizing eye than a formal one, and the publication only mentions the existence of painted eyebrows, not cosmetic lines.

*Published:* G. Daressy, *Fouilles de la Vallée des Rois (1898-1899)* (CG; Cairo, 1902), 161, pl. xxxv.

**F** Chicago, Field Museum A.105183

'Granodiorite' H. 22 cm

Provenance unknown. Acquired in 1908 as part of a large purchase of Egyptian, Nubian, and Italian objects.

Crown has smooth surface, coiled uraeus, shallow brow-band, and remains of back pillar. Face has naturalizing eyes. A note in the curatorial files of the Field Museum says the head has been partially recut. This is clear in photographs: the coils of the uraeus have been ineptly recarved to create a new head out of the remains of the old one; the profile of the nose is rather flat; the lips are crudely formed; and the chin is too small. The surface of the crown is badly abraded and chipped, and it seems likely that the whole head was originally similarly affected before being reworked to make it more presentable. It is ascribed by Vandier to Amenhotep II, 'si ... authentique'. To judge only from photographs, the head is ancient, but the amount of reworking—and the extent to which its original form is compromised—is harder to ascertain. The head clearly predates the Amarna Period, and the thin lips without a vermillion line are uncharacteristic of Amenhotep III. The eyes seem more 'classical' than those of Thutmose IV or Amenhotep III, and the resemblance to **D** is close.

*Published:* PM VIII, 800-731-050.

**G** New York, Metropolitan Museum of Art 44.4.68

Granodiorite H. 29 cm

Provenance unknown. Acquired 1944; formerly in the collection of J. P. Morgan (ob. 1913), purchased in Egypt early in the twentieth century.

Head and bare torso of a king holding *hq3*. Crown has plain, highly-polished surface, shallow brow-band, and coiled uraeus, its head damaged. Triangular-topped back pillar. Face has naturalizing eyes with long pointed tails, nose damaged. Published as a mid-Eighteenth Dynasty work (attributed to Amenhotep II), then as a piece from the Third Intermediate Period (Laboury, *La statue*, 380). The most recent mention of the head (Russmann, *Eternal Egypt*, 45, n. 69) favours an earlier dating to 'probably...Thutmosis III'. Sourouzian (*JARCE* 28, 55–74, nn. 58–61) accepts both **D** and **G** here as belonging to Amenhotep II. The dating of the bust is problematic, and some aspects point to its having been reworked or being a modern artefact: the piece's unusually high polish, the slightly awkward fit of the over-large crown on the head, the rather thick neck, and the diminutive waist are explicable as the errors of a modern craftsman, or as a consequence of reworking a damaged piece. Against the idea that the head is an entirely recent creation, when compared to other probably modern pieces (see below), it is surprising that the aesthetically-valuable nose is more injured than the uraeus. Furthermore, its makers, if it is modern, were able to give the head the 'correct' eye shape as well as the pointed-topped back pillar typical of the period, although I cannot think of any three-dimensional models for the bust that were known in the early years of the last century.

*Published:* PM VIII, 800-725-640.

**H** Leipzig, Ägyptisches Museum Inv. 1640

Crystalline limestone H. 8.7 cm

Provenance unknown

Remains of inscription on triangular-topped back pillar. Crown covered with single roundels, fully modelled; coiled uraeus, missing head. Naturalizing eyes. Ascribed to Amenhotep II by Krauspe, but the comparison is not entirely convincing. The eye shape is more slanted and less 'classical' than on other heads of Amenhotep II, and the configuration of the coils of the uraeus is the same as that of **J**, attributed to Thutmose IV. The sample of early Eighteenth Dynasty heads with the Blue Crown is not large enough to permit a firm identification.

*Published:* PM VIII, 800-731-520.

### *Thutmose IV*

**I** Munich, Staatliches Museum Ägyptischer Kunst ÄS 6770

Steatite H. 7.5 cm

Provenance unknown. Purchased on the art market around 1982.

Crown is covered with incised single roundels; shallow brow-band; and coiled uraeus of unusual form, fully preserved. No back pillar. Head has formal eyes. Ascribed variously to Amenhotep III and Thutmose IV. The latter seems more likely, although the aquiline nose and the full, low cheeks are not entirely reminiscent of this king.

*Published:* PM VIII, 800-731-790.

**J** Paris, Louvre E 10599

Granodiorite H. 28.5 cm

Provenance unknown. Purchased in Egypt from Mr Cattai, 1893.

Crown covered with single roundels, fully modelled; shallow brow-band; coiled uraeus, head missing. Remains of narrow back pillar. Face has naturalizing eyes; tip of nose missing. Surface generally battered. Attributed to Thutmose IV.

*Published:* PM VIII, 800-732-020.<sup>54</sup>

### *Amenhotep III*

**K** Alexandria Museum 406

Granodiorite H 24.5 cm.

Provenance: Karnak. Given by Tigrane Pasha, 1896.

Crown has plain surface; coiled uraeus, damaged; shallow brow-band. Thin back pillar, acting as support for right hand of deity at back of crown. Face has naturalizing eyes. Joins a group at Karnak inscribed for Amenhotep III showing king, wearing cloak and holding two flails, kneeling in front of Amun.

*Published:* H. Sourouzian, 'Raccords de statues d'Aménophis III entre Karnak-Nord et le musée d'Alexandrie', *BIFAO* 97 (1997), 239–52. Head first published by L. Borchardt, 'Königskopf von einer Gruppe. Amon setzt Amenophis III die Königsperücke auf', *BSAA* 23 (1928), 349–54, pls. ii–iii.

**L** Boston, Museum of Fine Arts 11.1506

Limestone H. 3.75 cm

Provenance unknown, probably from Amarna. Given by Joseph Lindon Smith, 1911.

Crown has plain surface, deep brow-band with remains of blue pigment and gilding, and coiled uraeus. Rectangular back pillar. Face has naturalizing eyes with moulded eyelid, eyebrows not indicated in relief, and pierced ears. Considered a representation of Amenhotep III, probably made in the reign of Akhenaten.

*Published:* PM VIII, 800-730-415; Johnson, *JEA* 82 (1996), 65–82, pl. viii.

**M** Brooklyn, Brooklyn Museum of Art 48.28

Wood, gilded, and inlaid H. 26.3 cm

Said to be from Thebes. Purchased, 1948.

Standing figure of king wearing kilt with sporran. Kilt, coiled uraeus, and deep brow-band of crown gilt; eyes and eyebrows inlaid. Crown covered with single roundels; no back pillar. A pin at the back of the neck probably originally served to attach a separate collar. Arms made separately, now missing. An inscription on the base identifies the figure as Amenhotep III. Mention of the *pr h'jj*, the deep brow-band, and the moulded eyelid are indicators of a date late in the reign of Amenhotep III (Bothmer) or in the reign of Akhenaten (Müller).

*Published:* PM I<sup>2</sup>, 783; Müller, *Kunst*, IV–32–3; Bothmer, in Berman (ed.), *The Art of Amenhotep III*, 84, fig. 1.

<sup>54</sup> I am grateful to Mme Cécile Giroire for information regarding the acquisition of the head.

**N** Cairo JE 38247, CG 42086

Limestone H. 19.5 cm

Provenance: Karnak cachette

Fragmentary group showing Amun (head missing) protecting or presenting a king wearing Blue Crown, carrying *hq3* in left hand. Large collar round neck. Surface of face abraded and form of eyes uncertain. Coiled uraeus. Inscribed for Amenhotep III on belt of kilt, which has an ornate sporran.

*Published:* M. Seidel, *Die königlichen Statuengruppen, I: Die Denkmäler vom Alten Reich bis zum Ende der 18. Dynastie* (HÄB 42; Hildesheim, 1996), Dok. 77

**O** Cairo JE 38597

Clay and stucco H. 38 cm

Provenance: Karnak cachette

Crown covered with single roundels, fully modelled; coiled uraeus. Tip of nose and head of uraeus missing. Back pillar missing; its dimensions are hard to estimate, but as a large part of the back of the crown is lacking it was probably tall and broad. Head has naturalizing eyes. Remains of red pigment on face and crown. Attributed to Amenhotep III.

*Published:* PM II<sup>2</sup>, 140; *Dazzling Sun*, 254 (fig. 46a). C. Ziegler (ed.), *The Pharaohs* (exhib. cat.; Venice, 2002), 463, cat. 192.

**P** Cairo JE 52541

Limestone H. 33 cm

Provenance: Karnak

Right-hand side of face missing, the rest extensively damaged by fire. Crown has plain surface, coiled uraeus, and deep brow-band. Remains of back pillar. Eye is naturalizing, lacking eyebrow. Attributed to Amenhotep III by Strauß-Seeber, by Hornemann to the New Kingdom.

*Published:* PM II<sup>2</sup>, 51; B. Hornemann, *Types of Ancient Egyptian Statuary*, II (Munksgaard, 1957), 370 (schematic line drawing, no details of face); C. Strauß-Seeber, 'Kriterien zur Erkennung der königliche Rundplastik Amenophis' III', in Berman (ed.), *The Art of Amenhotep III*, 9–15, fig. 11 (drawing of the eye).

**Q** Cambridge, Fitzwilliam Museum EGA.4504.1943

Copper alloy H. 4.5 cm

Provenance unknown. Given by R. G. Gayer-Anderson, 1943.

Crown covered with single incised roundels. Coiled uraeus, shallow brow-band. No back pillar. Eyes probably naturalizing, as there are no signs that the eyebrows were defined, nor of any lines around the eyes (cf. L for a similar treatment). Although the surface of the head is corroded, traces of these would probably still be visible had they existed (personal communication, Fitzwilliam staff). Pierced ears. Ascribed tentatively to Amenhotep III by Vassilika, with the reservation that the composition of the alloy is more similar to Third Intermediate Period bronzes than those of the New Kingdom. Pierced ears are known from other images of Amenhotep III (cf. L), and the features are closer to this king than any other of the New Kingdom.

*Published:* PM VIII, 800-745-100; E. Vassilika, 'Egyptian Bronze Sculpture Before the Late Period', in E. Goring, N. Reeves, and J. Ruffle (eds), *Chief of Seers. Egyptian Studies in Memory of Cyril Aldred* (London, 1997), 291–302.

**R** Chicago, Oriental Institute Museum 16687

Diorite (serpentine?) H. 6.9 cm.

Provenance: Medinet Habu

Crown has plain surface, coiled uraeus, damaged, and shallow brow-band. No back pillar. Nose and chin broken. Naturalizing eyes. Attributed to Amenhotep III. Johnson sees this as coming from a small votive figure, but says it could also derive from a shabti of the king. See also U.

*Published:* Johnson, *JEA* 82, 65–82, pl. v.

**S** Cleveland, Cleveland Museum of Art 52.513

Granodiorite H. 39.1 cm

Provenance unknown. Purchased from the dealer Milton Girod, 1952.

Crown has plain surface (roughened) with remains of blue and yellow polychromy, and shallow brow-band. Coiled uraeus, head missing. Very thin back pillar, broken. Face has naturalizing eyes. Ears made separately and attached. Nose damaged, restored in antiquity. Attributed to Amenhotep III.

*Published:* PM VIII, 800-731-110; *Dazzling Sun*, 166-7, cat. 11; L. M. Berman, *The Cleveland Museum of Art; Catalogue of Egyptian Art* (New York, 1999), 222-4, cat. 164.

**T** Durham, Oriental Museum N.498

Glazed steatite H. 8.0 cm

Provenance unknown. Acquired by the Duke of Northumberland in the first half of the nineteenth century.

Crown covered with single roundels, fully modelled; shallow brow-band. Coiled uraeus, head added separately, now missing. Back pillar not mentioned in publications. Naturalizing eyes. Eyes and eyebrows originally inlaid, now missing. Attributed to Amenhotep III.

*Published:* PM VIII, 800-731-270; Bothmer, in Berman (ed.), *The Art of Amenhotep III*, 88, fig. 29.

**U** Highclere Castle, H 60

Wood H. 10.7 cm

Provenance: West Valley of the Kings, tomb of Amenhotep III (WV 22). Awarded to Lord Carnarvon in division of finds; by descent.

Crown has smooth surface, painted black, and shallow brow-band. Hollows for inlays of naturalizing eyes. The wood has laminated and the back of the head, uraeus, nose, and lower part of the face have flaked off. This fragment matches other shabtis of the king in scale and material. See also **R**.

*Published:* N. Reeves, *Ancient Egypt at Highclere Castle: Lord Carnarvon and the Search for Tutankhamun* (Highclere, 1989), 27, fig. 25; unpublished Carter MSS, Griffith Institute I.J.386-7, no. 74.<sup>55</sup>

**V** Hildesheim, Pelizaeus Museum 53a

Ebony H. 5.8 cm

Provenance: possibly from Gurob. Acquired in Cairo, c. 1905.

Seated figure wearing kilt, right arm held to chest to hold a sceptre (missing). Face has naturalizing eyes, moulded eyelids. Crown has incised single roundels, coiled uraeus, and shallow brow-band. No back pillar. A pair with a similar statuette of a queen; both were possibly made as standard emblems for a standard-bearing statue. Attributed to Amenhotep III, probably made in the Amarna Period.

*Published:* *Dazzling Sun*, 211-12, cat. 27.

**W** Hildesheim, Pelizaeus Museum 6221

Alabaster H. 8.7 cm

Provenance unknown

Crown covered with single roundels, lightly incised; remains of coiled uraeus; shallow brow-band. No back pillar. Head has formal eyes with cosmetic lines incised into surface. Bianchi ascribes the Hildesheim head to Amenhotep III but it is hard to see a stylistic resemblance. The eyes have a classicizing look which is more common to the earlier Eighteenth Dynasty or post-Amarna Period than the reign of Amenhotep III, while the shallow brow-band makes a post-Amarna date less likely. The head is extremely battered and may have been re-worked: the differing sizes of the roundels on the crown is a feature I have not seen elsewhere.

<sup>55</sup> I am grateful to Dr C. N. Reeves for this reference, for information about the dimensions of the head, and for confirming that the crown is painted black.

*Published:* R. S. Bianchi, *Egipto milenario: Vida cotidiana en la época de los faraones* (exhib. cat.; Barcelona, 1998), 65, cat. 31; Sotheby (London) *Antiquities Sale Catalogue* (December 14, 1990), no. 390.

**X** Khartoum Museum 5829

Steatite H. 7.7 cm

Provenance: Faras

Crown has plain surface. Uraeus has no coils, and is carved into the surface of the crown. No brow-band. Tall back pillar. Face extensively worn. Naturalizing eyes. Attributed by Shinnie to Tutankhamun, by Johnson to Amenhotep III. The earlier dating seems more likely considering the proportions of the face, although the tall shape of the crown is more reminiscent of the Amarna Period.

*Published:* P. L. Shinnie, 'A New Kingdom Head from Faras', *JEA* 39 (1953), 109–10 (illustrated); Johnson, *JEA* 82, 71, n. 39.

**Y** Lausanne, Fondation Jacques-Edmond Berger

Bronze H. 6 cm

Provenance unknown. In Berger collection by 1995

Seated figure of a king wearing the long *sed*-festival cloak and bracelets, holding *ḥqꜣ* and flail. Throne made separately, now missing. Crown has plain surface, shallow brow-band, and coiled uraeus. Severely corroded; the eye type cannot be determined from the photo, but the catalogue entry describes a naturalizing eye. Attributed to Amenhotep III.

*Published:* PM VIII, 800-745-790; M. Page-Gasser and A. B. Wiese, *Égypte, Moments d'éternité: Art égyptien dans les collections privées, Suisse* (exhib. cat.; Basel and Geneva, 1997), 124, cat. 75 (German edition of catalogue cited in PM).

**Z** Lisbon, Gulbenkian Museum Inv. 139

Faience H. 3.7 cm

Provenance unknown. In the MacGregor collection by 1898; acquired by Gulbenkian at his sale, 1922.

Crown covered with single roundels, fully modelled; has three holes arranged vertically for attachment of uraeus. No back pillar. Naturalizing eyes, inlaid. Attributed to Amenhotep III.

*Published:* PM VIII, 800-731-550.

**AA** London, British Museum EA 30448

Red quartzite H. 22.5 cm

Provenance: said to be from Thebes. Purchased from the dealer Panayotis Kyticas, 1899.

Crown with roughened surface and coiled uraeus; remains of thin back pillar. Moulding of crown is not carved in relief but flush with surface of shallow brow-band and crown. Head of uraeus and nose of figure intact. Naturalizing eyes. Attributed to Amenhotep III.

*Published:* PM II<sup>2</sup>, 533; Bothmer, in Berman (ed.), *The Art of Amenhotep III*, 87, fig. 19. Ziegler (ed.), *The Pharaohs*, 397, cat. 29 (photograph is reversed). First published in E. A. W. Budge, *Egyptian Sculpture in the British Museum* (London, 1914), pl. xxxiii (called Ramesses II).

**BB** Mantua, Galleria e Museo di Palazzo Ducale, Inv. 186

Granodiorite H. 31 cm

Provenance unknown. Collected in Egypt and given by Giuseppe Acerbi in 1840.

Fragment of head, left hand side of crown, ear (pierced), and part of naturalizing eye and cheek preserved. Crown covered with single roundels, fully modelled; shallow brow-band. Catalogued in PM as 'late Dyn. XVIII or Dyn. XIX'; ascribed by Donatelli to Amenhotep III. The pierced ear begins to appear in royal sculpture from the reign of Amenhotep III onwards (cf. **L**, **Q**) but is unusual in large-scale representations before the reign of Akhenaten. The ear of **BB** is damaged and the 'piercing' may be serendipitous damage; it is not distinct in the published photograph. Positive

factors in favour of the earlier dating are the shallow brow-band, the use of single roundels on the crown, and the lack of modelling of the eye socket.

*Published:* PM VIII, 800-731-740.

**CC** New York, Metropolitan Museum of Art 56.138

Brown quartzite H. 34.5 cm

Provenance: said to come from the temple of Ptah at Memphis. Purchased, 1956.

Crown has plain surface, shallow brow-band, coiled uraeus, and remains of back pillar. Uraeus and nose of figure damaged. Figure has naturalizing eyes. Attributed to Amenhotep III.

*Published:* PM III<sup>2</sup>, 840; Bothmer, in Berman (ed.), *The Art of Amenhotep III*, 87, fig. 2; *Dazzling Sun*, 162-3, cat. 9.

**DD** Paris, Louvre A 25

Granodiorite H. 34 cm

Provenance unknown. Acquired from Bernardo Drovetti, 1827.

Crown has plain surface, roughened, and coiled uraeus; shallow brow-band. Damaged area at back of crown where back pillar would be found. Naturalizing eyes. Head of uraeus and nose of figure damaged. Attributed to Amenhotep III.

*Published:* PM VIII, 800-732-000; *Dazzling Sun*, 164-5, cat. 10.

**EE** Present location not known, formerly (1972) Basel, Münzen und Medaillen.

Schist H. 6 cm

Provenance unknown

Left-hand side of head and Blue Crown, covered with incised single roundels. Uraeus missing. Publication does not mention back pillar. Face seems to have naturalizing eyes (although the surface is abraded). Shape of mouth and angle of eyes suggests an attribution to Amenhotep III.

*Published:* PM VIII, 800-732-740.

### *Amarna Period*

**FF** Bologna, Museo Civico 1802

Granodiorite H. 35.5 cm

Provenance unknown. Acquired in the mid-nineteenth century from the Neri-Baraldi collection.

Fragmentary portion of a head from nose to middle of crown. Crown has single roundels, fully modelled, remains of coiled uraeus, with socket for inlaid head, and deep brow-band. Nose and eyes of figure damaged. Attributed to Amenhotep III (PM) or Akhenaten (Müller). The narrow slanted eyes with elegantly arched eyebrows, the moulded eye socket, and the extremely deep brow-band all point to the reign of Akhenaten.

*Published:* PM VIII 800-730-352; Müller, *Kunst*, IV-93-4.

**GG** Cairo JE 37032, CG 42095

Petrified wood H. 60 cm

Provenance: Karnak cachette

Standing figure of a king, feet and right elbow missing. Crown, plain, has coiled uraeus and deep brow-band. Head has naturalizing eyes (inlays missing) and pierced ears. Left arm holds remains of a standard, top missing. Broad collar around neck. Inscribed for Horemheb on tall straight back pillar; probably usurped from Tutankhamun.

*Published:* PM II<sup>2</sup>, 140-1; G. Legrain, *Statues et statuettes de rois et de particuliers*, I (CG; Cairo, 1906), 55.

**HH** Cairo JE 67921A

'Hard limestone' H. 24 cm

Provenance: presented to King Fouad I 'by certain inhabitants of Amarna', where it is said to have

been found. Given by him to the museum, 1937.

Crown covered in single roundels, fully modelled. Deep brow-band. Coiled uraeus, head inserted separately (now lost). Short back pillar, placed slightly off-centre. Nose of figure damaged. Naturalizing eyes, eyebrows not indicated in relief. Moulded eyelid with incised line. Attributed to Akhenaten.

*Published:* R. Engelbach, 'A Limestone Head of King Akhenaten in the Cairo Museum', *ASAE* 38 (1938), 95–107; Müller, *Kunst*, IV–120.

### *Nineteenth Dynasty and Later*

**II** Cairo, T. 27/5/67/1 a

Granite H. 2.83 m

Provenance: Tanis

Statue group: a striding figure of Ramesses II protected by a goddess, touching his crown and shoulder. King is slightly shorter than the goddess. Crown has plain surface; uraeus has flattened oval coil, and an additional uraeus (one sporting the Red, the other the White Crown) carved in low relief at each side of the crown (see **JJ**), and deep brow-band. Nose damaged; formal eyes. King held a sceptre (probably *hq3*), now missing, in right hand.

*Published:* M. Saleh, 'Varia from the Egyptian Museum in Cairo', in H. Guksch and D. Polz (eds), *Stationen: Beiträge zur Kulturgeschichte Ägyptens, Festschrift für Rainer Stadelmann* (Mainz, 1998), 353–6, pl. 17.

**JJ** New York, Metropolitan Museum of Art 34.2.2

Quartzite H. 48 cm

Provenance: Karnak. Acquired from Howard Carter, 1934.

Crown has plain surface, deep brow-band and incised 'seam' around upper edge. Uraeus has flattened oval coil. Paired uraei (one pair sporting the Red, the other the White Crown) carved in low relief at each side of the crown (see **II**). Face well-preserved. Formal eyes, moulded eyelids. Pierced ears. Remains of red and yellow pigment on face and crown. Joins a standard-bearing statue of Amenmesse now in the Hypostyle Hall, Karnak.

*Published:* P. Cardon, 'Amenmesse: an Egyptian Royal Head of the Nineteenth Dynasty in the Metropolitan Museum', *MMJ* 14 (1979), 5–14.

**KK** New York, formerly Josephson collection

Granodiorite H. 18.4 cm

Provenance unknown. In Josephson collection by 1976.

Crown covered with double roundels. Coiled uraeus, head damaged. Deep brow-band, an interesting peculiarity of which is that the head and coils of the uraeus are placed so low that they overlap the brow-band. Rectangular back pillar with remains of inscription. Head has formal eyes with incised line and moulded eyelid. Attributed to Ramesses II.

*Published:* PM VIII, 800-732-701, 800-732-760 (listed twice under different owners).

**LL** New York, private collection

Brown quartzite H. 29.2 cm

Provenance unknown. In the Heeramanek collection by 1979; sold 1992.

From a standard-bearing statue. Crown has plain surface with deep brow-band and undulating, not coiled, uraeus, with socket for the head (now missing). No back pillar visible in publications. Nose and chin damaged. Formal eyes. Ascribed to the later part of the reign of Ramesses II.

*Published:* PM VIII, 800-732-636. On temporary display in Brooklyn in 2001.

**MM** Paris, Louvre N 443 (AF 505)

Wood, inlaid H. 27.5 cm

Provenance unknown (Deir el-Medina?). Acquired 1826, possibly from the Salt collection.



Striding figure, right arm extended to hold a staff (missing). Crown plain, with non-coiled uraeus; no back pillar. Inlaid formal eyes. Short plain kilt. PM ascribes to Amenhotep III. The uraeus does not have the coils typical of an Eighteenth Dynasty representation, the king's body is too slim to belong to Amenhotep III or any of his successors, and the hooked nose, small mouth, and large cheeks are Ramesside traits. Andreu dates it to the Nineteenth Dynasty, but states that the eyes and uraeus, among other parts, are modern restorations. The uraeus seems to be of poor quality and may be a recent restoration, but the eyes seem better-made. If the eye inlays had been removed in antiquity (either as part of a malicious attack or to extract the materials for re-use), one would expect signs of damage around the eye sockets, and these are lacking.

*Published:* PM VIII, 800-703-600; G. Andreu (ed.), *Les artistes de pharaon: Deir el-Médineh et la Vallée des Rois* (exhib. cat.; Paris, 2002), 255, cat. 203.

**NN** Turin, Museo Egizio 4563

Granodiorite H. 194 cm

Provenance: Karnak

Seated figure wearing elaborate pleated robes, broad collar, and holding *hq3*-sceptre in right hand. Crown has double roundels, fully modelled, coiled uraeus, and broad brow-band. Rectangular back pillar. Head has pierced ears and naturalizing eyes with a moulded eyelid. Inscribed for Ramesses II, thought to have been made at the start of his reign.

*Published:* PM II<sup>2</sup>, 214.

**OO** Private collection

Bronze H. 10 cm

Provenance unknown. In a private collection by 1984.

Crouching naked king, wearing collar; hands crossed, holding *hq3* and flail. Small of figure's back has appliqué scarab and sun-disc. Eyes hollowed for inlay; no eyebrows. Crown plain, shallow brow-band. Uraeus has flattened oval coil. Dated to the Amarna Period or later. The form of the uraeus and cast of the face are not consistent with the Amarna Period, and a dating to the Nineteenth Dynasty or later seems more likely. The figure is crudely made by comparison with other royal bronzes from the New Kingdom or later, and the combination of the figure's head-dress and naked state is unusual. Rößler-Köhler states that the figure has been authenticated by spectrographic analysis, but the results are not given.

*Published:* PM VIII, 800-745-950; U. Rößler-Köhler, 'Der König als Kind, Königsnamen und Maatopfer', *Studien zu Sprache und Religion Ägyptens. Zu Ehren von Wolfhart Westendorf überreicht von seinen Freunden und Schülern* (Göttingen, 1984), II, 929-46.

### *Dubious pieces*

**PP** Brooklyn, Brooklyn Museum of Art 59.19

Dark stone H. 60 cm

Provenance unknown. Acquired 1959; said to have been in the Esterhazy collection, Austria, since c. 1870.

Colossal head; crown has plain surface with coiled uraeus (head damaged), shallow brow-band, and thin back pillar. Face has naturalizing eyes. Not old. An unpublished paper given by Romano at the Fourth International Congress of Egyptology in Munich noted a close similarity to two heads in the Louvre (**J** and **DD**), and proposed a modern origin in Paris for the Brooklyn head.

*Published:* PM VIII, 800-730-520; J. F. Romano, 'Colossal Head of Amenhotep III', in S. Schoske (ed.), *Fourth International Congress of Egyptology: Abstracts of Papers* (Munich, 1985), 193.

**QQ** Lisbon, Gulbenkian Museum Inv. 48

Faïence H. 7 cm

Provenance unknown. Acquired by Gulbenkian at sale of the Fouquet collection, 1922.

Crown made of dark blue faïence, with double roundels; no back pillar. Has hole for attachment of

uraeus, now missing. Head made of pale blue faience. Holes for inlaid eyes (missing). Beard-strap inlaid in turquoise faience or glass; chin has hole for beard (lost). A pastiche, made from two separate pieces. The head and crown clearly do not belong: crown is too large for head; head has beard-strap, not otherwise encountered with the Blue Crown; the glazes of the crown and the head are of different qualities, differently weathered. The crown probably dates to the Amarna Period; the faience of the head seems to be of a type commonly encountered in the Nineteenth or Twentieth Dynasty, as are the wrinkles under the neck. Pastiche of antique fragments are not uncommon; Baltimore WAG 54.391 is a similar composite of a stone Blue Crown with an inlaid bronze head, also with a strap and socket for a false beard (G. Steindorff, *Catalogue of the Egyptian Sculpture in the Walters Art Gallery* (Baltimore, 1946), cat. 133).

*Published:* PM VIII, 800-731-560.

**RR** Paris, E. Ascher collection

Granite Exact height not known (PM says 'colossal')

Provenance unknown. In Ascher collection by 1988 (date when photocopies of photographs of head deposited in the Griffith Institute).<sup>56</sup>

Crown has plain surface and shallow brow-band. The scale of the head, and its state of preservation—it is the front half of a head with the Blue Crown, the head of the uraeus destroyed, but the nose of the figure preserved—are suspicious. Probably a modern creation, based on Paris A 25 (**DD**), with which it shares the same fat uraeus (also broken in the same way) and eye shape. The head is most convincing from a three-quarter view, but is somewhat pinched when seen from the front, suggesting that it may have been copied from a three-quarter view photograph of the Paris head.

*Published:* PM VIII, 800-732-510.

**SS** Paris, E. Ascher collection

Red quartzite Exact height not known (PM says 'colossal')

Provenance unknown. In Ascher collection by 1988 (date when photocopies of photographs of head deposited in the Griffith Institute).

Blue Crown covered with single roundels, fully modelled. Coiled uraeus, damaged. Shallow brow-band; remains of back pillar. Naturalizing eyes, showing no traces of a modelled eyebrow. The king's face does not immediately suggest any particular pharaoh, but seems to contain elements of styles from the reign of Amenhotep III, the Amarna Period, and the early Nineteenth Dynasty. The intact nose and lips seem rather too broad for the face, and the curve formed by the eyebrows sweeping down into the nose (paralleled in **A**) is not especially Egyptian. The undulating wriggle made by the tail of the uraeus is also without parallel in other New Kingdom pieces with the Blue Crown, where the tail of the uraeus lies straight along the crown (see also **VV**).

*Published:* PM VIII, 800-732-511.

**TT** Zurich, J. Brun collection

Red granite Exact height not known (PM says 'colossal')

Provenance unknown. In Brun collection by 1988 (date when photocopies of photographs of head deposited in the Griffith Institute).

Crown has plain surface, coiled uraeus, shallow brow-band, and tall back pillar. The head's colossal scale, and the use of red granite, the pre-eminently 'colossal' stone, for a head with the Blue Crown, are unusual. The head of the uraeus is missing, but the nose of the figure is perfectly preserved. Stylistically it is clearly based on Brooklyn 59.19 (**PP**), copying its unusually-formed uraeus, banded slanting eyes, eyebrows, and small pouting mouth.

*Published:* PM VIII, 800-732-570.

<sup>56</sup> Jaromir Malek kindly allowed me to study photocopies of several unpublished photographs of **RR**, **SS**, and **TT** in the Griffith Institute, on which these entries are based.

**UU** Private collection

Basalt Height not known

Provenance unknown. First recorded in the Netherlands, 1931; in a private collection in Austria after World War II.

Crown plain, with a slightly roughened surface; shallow brow-band (ineptly formed). Coiled uraeus, head damaged. Face has formal eyes, nose intact. Possibly inspired by Turin 4563 or Paris A 25 (NN, DD). The crown lacks a brow-band, and the edge of the front of the crown is carved as a groove instead of a semi-circular moulding.

*Published:* PM VIII, 800-732-880.

**VV** At Christie's, 2003

Limestone H. 10.2 cm

Provenance unknown. Formerly in a European private collection, acquired in the 1980s. Crown has smooth surface, coiled uraeus, the head originally inlaid, shallow brow-band, and remains of back pillar. Face has naturalizing eyes. The right hand side of the neck and the back of the crown seem to be roughly worked. Judging only from photographs, there are a number of disquieting features about the crown: it is noticeably lop-sided; the brow-band is disproportionately shallow in relation to the depth of the wing; in the profile view, the moulding and brow-band do not loop over the ear, but appear in a disconnected manner above it; the uraeus is rather thin, and wiggles (see also SS) along the top of the crown. The face is also strange: the ears are extremely large and ineptly formed; the mouth is small and the pout of the bottom lip larger than in other examples; the lower jaw is square. The right eye seems to be lower and more slanted than the left. This piece may be an ancient work left unfinished, although a later origin is also possible.

*Published:* Christie, (*New York*) *Antiquities Sale Catalogue* (11 June 2003), no. 13.

PLATE VIII



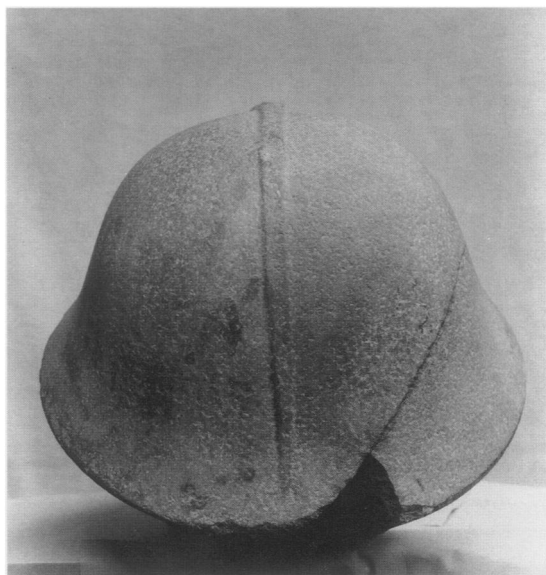
1. Full-face



2. Right profile



3. Rear



4. Top

Barber Institute of Fine Arts 44.1 (photographs courtesy the Barber Institute of Fine Arts, the University of Birmingham).

ICONOGRAPHY OF THE BLUE CROWN IN THE NEW KINGDOM (pp. 117–41)



1. Three-quarter view



2. Full-face

Head with the Blue Crown, private collection, Germany (photographs courtesy of the Staatliches Museum Ägyptischer Kunst, Munich).

ICONOGRAPHY OF THE BLUE CROWN IN THE NEW KINGDOM (pp. 117–41)



3. Reconstructed back of an anthropoid bust from P47.4 (ÄMP 25847).

THE MATERIAL EVIDENCE FOR DOMESTIC RELIGION AT AMARNA AND  
PRELIMINARY REMARKS ON ITS INTERPRETATION (pp. 143–63)

# THE MATERIAL EVIDENCE FOR DOMESTIC RELIGION AT AMARNA AND PRELIMINARY REMARKS ON ITS INTERPRETATION\*

*By ANNA STEVENS*

The archaeological record at Amarna offers scope to enhance current understanding of domestic religion at this site. The material evidence suggests that conduct undertaken included offering rituals and the use of magic and amuletic images, and involved the royal family and Aten, some 'traditional' deities and private ancestors. Domestic religion appears to have interacted with daily, secular conduct and to have been subject to influence by a variety of factors. The picture of domestic religion at Amarna presented here has potential relevance for domestic religion in general in New Kingdom Egypt.

THE creation of theoretical subsets of religious conduct can be an important stage in the analysis and comprehension of ancient religions, whether in broad groupings, such as state or funerary religion, or more specific subsets, of which domestic and fertility religion can be considered examples. Domestic religion, defined here as religious conduct undertaken strictly within the confines of the house,<sup>1</sup> is a particularly useful subset for scholars using archaeological data. In this case, the basis upon which conduct is grouped—a common household environment—has a relatively direct archaeological correlate in the physical remains of the house and its contents. The potential of archaeological data to enhance understanding of domestic religion in ancient Egypt is illustrated particularly well at Deir el-Medina. The structure of domestic religion remains poorly understood, however, and the potential of the archaeological record to provide information on this realm has not been exhausted.

Amarna provides an appropriate context in which to explore domestic religion and is a site where the archaeological evidence is particularly significant, given the overall lack of direct textual and epigraphic sources. Archaeological evidence has certainly not been excluded from previous studies of 'non-state' religion during the Amarna Period

\* This article derives from research being undertaken towards a PhD dissertation on the material evidence for non-state religion at Amarna in the Centre for Archaeology and Ancient History, Monash University, Melbourne. I would like to thank Colin Hope and Olaf Kaper for their very helpful comments on versions of this paper and Jo Aitken for proofreading a draft. I am also grateful for the advice I received from the *JEA* reviewers; their observations have had a significant impact on the structure and scope of this article. I wish to thank the Egypt Exploration Society, Barry Kemp and the Ägyptisches Museum und Papyrussammlung, Berlin, for permission to discuss a number of objects that are previously unpublished, or published in limited detail. Gratitude is also expressed to the EES, the Deutsche Orient-Gesellschaft and the Deutsches Archäologisches Institut for permission to reproduce the figures in the text.

<sup>1</sup> Conduct undertaken outside the house, including that which occurred in the garden or house compound, is excluded.

although, to date, discussion has often focused upon its significance in relation to the impact of Akhenaten's religious reforms.<sup>2</sup> There remains a need for clarification of the material evidence for domestic religion preserved at Amarna. In addition, there is scope for closer consideration of its role in contributing to understanding of the broader domestic religious system at the site, both in the period in which Akhetaten served as Egypt's capital, from the reign of Akhenaten into that of Tutankhamun, and during any subsequent occupation.<sup>3</sup> The aim here is first to provide an overview of the evidence, of which two general categories can be identified: permanent cult emplacements and portable objects. The archaeological record offers the broadest scope to investigate two specific aspects of domestic religion, the nature of the conduct and the identities of the associated divinities.<sup>4</sup> These are then examined. Whilst a reasonably high level of understanding of these areas exists, it is enhanced when the corpus of material is clarified and considered as a whole. This will ultimately have implications for understanding of the impact of Akhenaten's religious reforms and for the general understanding of domestic religion in the New Kingdom.

<sup>2</sup> Statues and stelae of the royal family and Aten have been discussed extensively. See, for example, L. Borchardt, *Porträts der Königin Nofret-ete aus den Grabungen 1912/13 in Tell el-Amarna* (Leipzig, 1923); J. Assmann, 'Palast oder Tempel? Überlegungen zur Architektur und Topographie von Amarna', *JNES* 31 (1972), 153; id., 'Die "loyalistische Lehre" Echnatons', *SAK* 8 (1980), 26; C. Aldred, *Akhenaten and Nefertiti* (London, 1973); R. Krauss, 'Die Amarnazeitliche Familienstele Berlin 14145 unter Besonderer Berücksichtigung von Massordnung und Komposition', *Jahrbuch der Berliner Museen* 33 (1991), 7–36; D. Arnold, *The Royal Women of Amarna* (New York, 1996), 96–108. See also G. Pinch, 'Childbirth and Female Figurines at Deir el-Medina and el-'Amarna', *Or* 52 (1983), 405–14; R. Hari, 'La religion amarnienne et la tradition polytheiste', in F. Junge (ed.), *Studien zu Sprache und Religion Ägypten zu Ehren von Wolfhart Westendorf* (Göttingen, 1984), II, 1043–6; S. Ikram, 'Domestic Shrines and the Cult of the Royal Family at el-Amarna', *JEA* 75 (1989), 89–101; A. H. Bomann, *The Private Chapel in Ancient Egypt* (London, 1991); B. J. Kemp, *Ancient Egypt: Anatomy of a Civilization* (London, 1991), 304–5; id., 'How Religious were the Ancient Egyptians?', *CAJ* 5/1 (1995), 30–2; H. Györy, 'Remarks on Amarna Amulets', in C. J. Eyre (ed.), *Proceedings of the Seventh International Congress of Egyptologists* (OLA 82; Leuven, 1998), 497–507; E. Hornung, *Akhenaten and the Religion of Light* (Ithaca, NY, 1999), 111.

<sup>3</sup> The nature and extent of occupation after the official abandonment of the city by the court early in the reign of Tutankhamun remains unclear. Evidence for later activity includes the sculpture fragments naming Horemheb and the hieratic inscription naming Horemheb and Seti I excavated in the Main City: F. G. Newton, 'Excavations at el-'Amarna, 1923–24', *JEA* 10 (1924), 293; H. Frankfort, 'Preliminary Report on the Excavations at Tell el-'Amarna', *JEA* 13 (1927), 210; B. J. Kemp, 'Tell el-Amarna', *LÄ* VI, 310. The Workmen's Village might have been occupied until the end of the reign of Tutankhamun (Kemp, *LÄ* VI, 310), whilst excavations at complex Q48.4 have revealed a building phase that could represent quite substantial activity some time into the reign of this king (C. Kirby, 'Report on the 1987 Excavations: The Excavation of Q48.4', in B. J. Kemp (ed.), *Amarna Reports*, V (EES Occasional Publications 6; London 1989), 15–55; B. J. Kemp, 'Appendix: Workshops and Production at el-Amarna', in Kemp (ed.), *Amarna Reports* V, 63). The early excavators encountered additions to buildings that they attributed to 'squatter activity', for example, H. Frankfort and J. D. S. Pendlebury, *The City of Akhenaten*, II (MEES 40; London, 1933), 3 (hereafter *CoA* II); J. D. S. Pendlebury, 'Excavations at Tell el Amarna: Preliminary Report for the Season 1933–4', *JEA* 20 (1934), 134–5. A number of later burials have been encountered, the earliest of which might date shortly after the official abandonment of the site, for example, L. Borchardt, 'Ausgrabungen in Tell el-Amarna 1911. Vorläufiger Bericht', *MDOG* 46 (1911), 29–30; F. Ll. Griffith, 'Excavations at el-'Amarna', 1923–24', *JEA* 10, 302; J. H. Taylor and A. Boyce, 'The Late New Kingdom Burial From Beside the Main Chapel', in B. J. Kemp (ed.), *Amarna Reports*, III (EES Occasional Publications 4; London, 1986), 118–46.

<sup>4</sup> Aspects such as the identities of the participants and the motivations behind the religious conduct, the place of domestic religion in the broader non-state religious system, and the impact of Akhenaten's religious reforms will be given closer consideration within my dissertation.

### Permanent cult emplacements

#### *Altars*

Altars within houses comprise a significant category of evidence, although it is difficult to determine the original number present at the site, given the vagaries of preservation and problems identifying altars in the published plans. In 1923, Borchardt produced a preliminary study of the altars based on the excavations of the Deutsche Orient-Gesellschaft, in which he identified sixteen examples.<sup>5</sup> When the structures excavated by the EES are considered, the number of altars can be increased to approximately 40. Most are located in the Main City and North Suburb, but they also occur in the Central City and possibly the Workmen's Village.<sup>6</sup> Altars can be identified primarily in houses with a floor area of over 100 square metres.

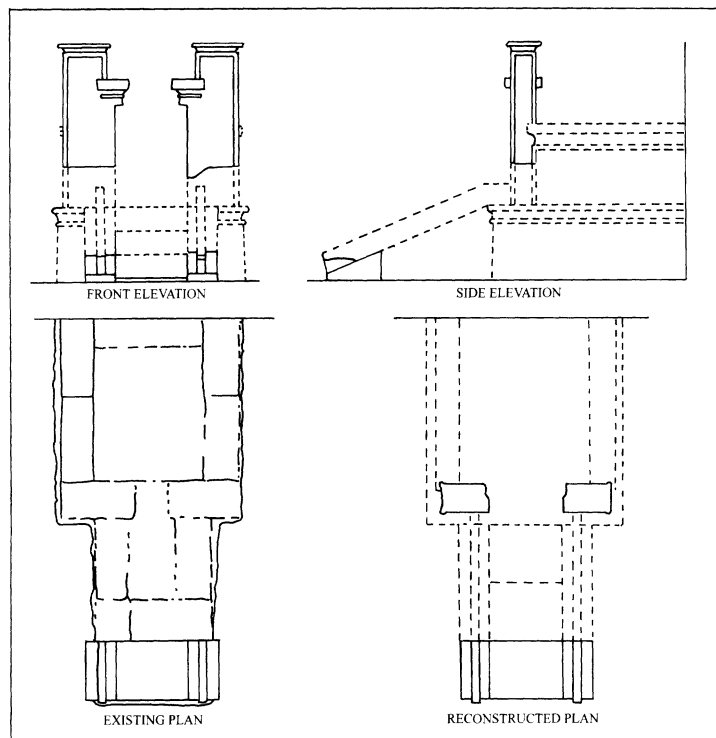


FIG. 1. Domestic altar from house T41.1 (after, *CoA* III, 27, fig. 6; courtesy of the EES).

<sup>5</sup> *Porträts*, 20–4. The altars have also been considered briefly by Assmann, *JNES* 31, 153, n. 64; P. T. Crocker, 'Status Symbols in the Architecture of el-'Amarna', *JEA* 71 (1985), 56; and Ikram, *JEA* 75, 96–7, among others.

<sup>6</sup> Houses J49.1, M50.1, M51.1, N48.14, N49.10, N49.21, N50.17, N51.2, O48.8, O48.11, O49.9, O49.16, O49.17, P47.5, P47.7, P47.11a, P47.22, P47.23, P48.2, P49.13, P49.15, Q44.1, Q46.1, Q46.3, Q46.9f, Q47.23d, R46.2, R46.3, T33.1, T35.6, T35.17, T36.5, T41.1, U35.3, U35.25, U35.26, U36.22, U37.1 and Long Wall Street 10: Borchardt, *Porträts*, 21–4, Abb. 15–16; Newton, *JEA* 10, 292, pl. xxv; T. E. Peet and C. L. Woolley, *The City of Akhenaten*, I (MEES 38; London, 1923), 24, 84, pl. i (hereafter *CoA* I); *CoA* II, 12, 34–5, 42, 50, 68, pls. iii–iv, vi–x, xx.6, xxi.1; J. D. S. Pendlebury, *The City of Akhenaten*, III (MEES 44; London, 1951), 26–7, fig. 6, pls. xi, xxx.1, xxxi (hereafter *CoA* III); L. Borchardt and H. Ricke, *Die Wohnhäuser*



The most elaborate altar is that from T41.1 in the Central City, the 'official residence' of the First Servitor of the Aten, Panehesy (fig. 1).<sup>7</sup> This takes the form of a miniature chapel, fronted by a doorway with broken lintel and uraeus cornice, and was originally approached by a small flight of stairs or a ramp. Behind the doorway, projecting walls with a cavetto cornice extended to join the wall of the room in which the altar was located. The front face of the altar is decorated with scenes of Akhenaten, Nefertiti and three princesses worshipping the Aten. The shrine appears to have been approximately 1.5 m high originally. This is the only altar of this form in a private house identified to date.

Most of the remaining altars are made of mud-brick. At least eleven take the form of a rectangular platform approached by a staircase, or in a few cases possibly a ramp, flanked by balustrades that sometimes end in short returns (fig. 2).<sup>8</sup> A parapet, of varying height, is often preserved around the top edge of the platform. These altars appear to have measured up to 1 m in width and to have been preserved to heights of between approximately 30 to 90 cm. Apart from patches of gypsum plaster on a few examples, they bore no preserved decoration.

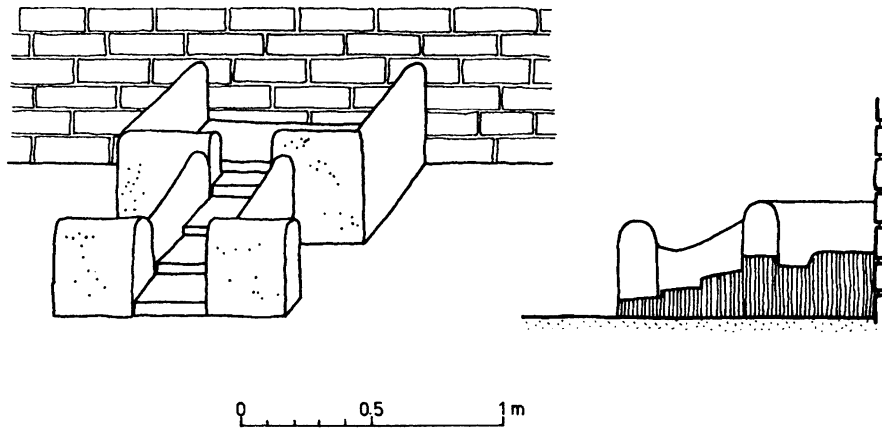


FIG. 2. Domestic altar with approaching staircase in house P47.22 (after Borchardt and Ricke, *Die Wohnhäuser*, 132, Abb. 18; courtesy of the DOG and the DAI).

in *Tell el-Amarna* (WVDOG 91; Berlin, 1980), 24, 30, 50, 103, 107, 113, 132, 134, 165, 187, 208, 219, 228, 247, 255, 275, 278, 280–1, 306, 328, Abb. 18, 30, 38, Tafeln 13A, 18B, Hauspläne 2, 4, 12–13, 28–30, 32–3, 49, 55, 60, 63, 68, 78, 82, 90–1, 93, 101, 109; B. J. Kemp, 'Wall Paintings from the Workmen's Village at el-'Amarna', *JEA* 65 (1979), 49, 52. See B. J. Kemp and S. Garfi, *A Survey of the Ancient City of el-'Amarna* (EES Occasional Publications 9: London, 1993) for the layout of the site.

<sup>7</sup> *CoA* III, 26–7, fig. 6, pls. xi, xxx.1, xxxi. The altar is now reconstructed in the Egyptian Museum, Cairo (JE 65041).

<sup>8</sup> Houses M51.1, N49.21, O49.16, O49.17, P47.5, P47.22, P47.23, P48.2, P49.15, Q46.1 and T36.5: *CoA* I, 24, pl. i; Borchardt, *Porträts*, 21–3, Abb. 15–16; *CoA* II, 50, pls. ix, xx.6; Borchardt and Ricke, *Die Wohnhäuser*, 24, 103, 132, 134, 219, 255, 278, 281, Abb. 18, 30, 38, Tafeln 13A, 18B, Hauspläne 2, 29, 32–3, 63, 82–3, 91, 93.

At least fifteen altars take the form of a simple platform, but lack the adjoining stairs or ramp.<sup>9</sup> Apart from one possible stone example,<sup>10</sup> all are mud-brick. These are particularly difficult to identify from the published plans. It is not always clear whether the staircase or ramp is simply not preserved, but some seem to have been constructed without this feature. It is also uncertain whether such altars possessed a parapet. Altars of this type for which measurements are available are preserved to heights of between 25 and 90 cm. Gypsum plaster was again noted on a few examples.

Few features are present or can be identified on top of most altars, both those with and without steps. In at least one case, the back of the altar platform is raised (fig. 2). It is possible that the raised area formed a pedestal for an object such as a stela or statue, or that a stela or structural element was inserted in the depression along the front. The mud-brick altars are unlikely to have supported stone elements on the scale of the Panehesy shrine, which was set on plaster foundations.

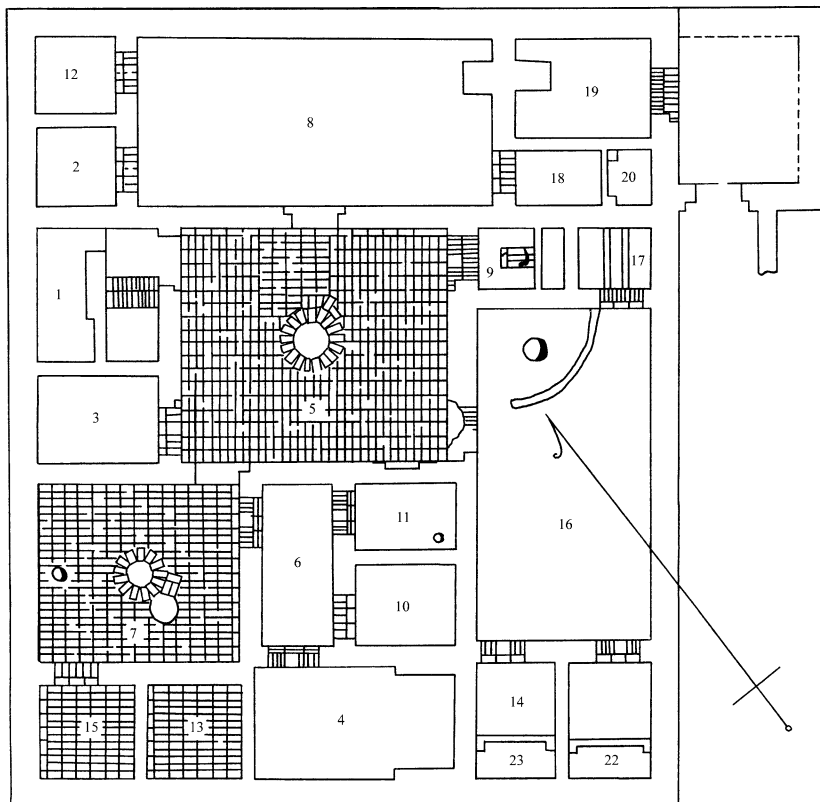


FIG. 3. Plan of house M50.1 with possible domestic altar in room 9, opening off the north-east corner of the central room (after Borchardt and Ricke, *Die Wohnhäuser*, Hausplan 93; courtesy of the DOG and the DAI).

<sup>9</sup> Houses N49.10, N50.17, O48.8, O48.11, P47.5, P47.7, P47.11a, P49.13, Q46.3, Q46.9f, Q47.23d, R46.2, R46.3, T33.1 and T35.17: Borchardt, *Porträts*, 21–2; *CoA* II, 68, pls. viii, x; Borchardt and Ricke, *Die Wohnhäuser*, 30, 37, 50, 103, 107, 113, 165, 202, 208, 275, 306, Hauspläne 4, 7, 12–13, 28–30, 49, 60, 90, 101.

<sup>10</sup> That in house Q47.23d: Borchardt, *Porträts*, 21; Borchardt and Ricke, *Die Wohnhäuser*, 165, Hausplan 49.

Three possible mud-brick altars take a different form. They are rectangular pedestals spanning the entire width of the small room in which they are located. In M50.1, this emplacement is situated in a room opening off the central room (fig. 3). In J49.1, it is in a room in the eastern corner of the house, opening off the 'north loggia', whilst in O49.9, it lies in a room in the western corner of the house.<sup>11</sup> In all these cases, the 'altar' appears to comprise the central feature of the room; that in M50.1 occupies most of the room. This structure has a parapet along its front edge and is approached by a staircase flanked by balustrades. Central projections adjoining the other two examples might be the remains of similar staircases. The altar in M50.1 measures 1.50 m in length and was preserved to a height of 0.30 m, whilst that in O49.9 was preserved to a height of between three and four courses of brickwork. There are no published details of the decoration of these structures; presumably none was preserved.

A few miscellaneous emplacements may also have served as altars, although their identification as such is particularly tentative. For example, Kemp has noted that a 'square bin' located beneath a painting of a group of women and children in Long Wall Street 10 at the Workmen's Village could have been the foundation of a small offering table.<sup>12</sup> At Q44.1, raised mud-brick blocks flanking a mastaba in the central room have been suggested as pedestals for statues.<sup>13</sup> At O48.8, a white-washed, rectangular, mud-brick structure with parapet was built directly against the inner recess of a vertical niche in the central room. Similarly, at U37.1 a rectangular, mud-brick emplacement with a possible stone step was erected on a stone slab beside a vertical niche in the central room. The niche itself did not continue below the level of the mud-brick structure, which bore traces of gypsum plaster.<sup>14</sup> The excavators again suggested this served as an altar.

Borchardt stated that the altars were generally located on the eastern wall of the central room 'sodaß der von den Altar Tretende sich der aufgehenden Sonne zuwendet', but observed that they occasionally appeared in other rooms.<sup>15</sup> In the final report of the DOG excavations, it was noted that 'Raum und Himmelsrichtung sind fast in jedem Hause, in dem ein Altar gefunden wurde, verschieden'.<sup>16</sup> When the altars excavated by the EES are also considered, both assessments emerge as partially accurate. In up to 22 houses, the altar is located in the central room, whilst in those houses that do not conform to the 'standard' Amarna house type, it is situated in one of the larger, central rooms.<sup>17</sup> Altars also appear in other rooms, with up to four in the 'square room',<sup>18</sup> one perhaps in the 'north loggia',<sup>19</sup> one possible example in the 'bedroom',<sup>20</sup> two possibly

<sup>11</sup> Borchardt, *Porträts*, 22; Borchardt and Ricke, *Die Wohnhäuser*, 228, 247, 280, Hauspläne 68, 78, 93.

<sup>12</sup> Kemp, *JEA* 65, 49.

<sup>13</sup> Newton, *JEA* 10, 292, pl. xxv.

<sup>14</sup> See Borchardt and Ricke, *Die Wohnhäuser*, 202, Hausplan 60 on O48.8, and *CoA* II, 12, pl. iii on U37.1

<sup>15</sup> Borchardt, *Porträts*, 22.

<sup>16</sup> Borchardt and Ricke, *Die Wohnhäuser*, 255–6.

<sup>17</sup> Houses M51.1, N49.21, O48.11, O49.16, P47.5, P47.7, P47.23, P48.2, R46.2, T33.1, T36.5 and T41.1; and perhaps N48.14, O48.8, P47.11a, Q44.1, Q47.23d, T35.17, U35.3, U35.26, U36.22 and U37.1: *CoA* I, 24, pl. i; Newton, *JEA* 10, 292, pl. xxv; *CoA* II, 12, 34, 50, 68, pls. iii–iv, vi, viii–x; *CoA* III, 26–7, pl. xi; Borchardt and Ricke, *Die Wohnhäuser*, 50, 103, 107, 113, 134, 165, 187, 202, 208, 219, 255, 281, Hauspläne 13, 28–30, 33, 49, 55, 60, 63, 82, 93.

<sup>18</sup> Houses P49.15 and Q46.1, and possibly N51.2 and Q46.3: Borchardt and Ricke, *Die Wohnhäuser*, 24, 30, 278, 328, Hauspläne 2, 4, 91, 109.

<sup>19</sup> House N50.17: Borchardt and Ricke, *Die Wohnhäuser*, 306, Hausplan 101.

<sup>20</sup> House P49.13: Borchardt and Ricke, *Die Wohnhäuser*, 275, Hausplan 90.

in the 'second entrance hall',<sup>21</sup> up to seven in small or larger rectangular rooms off the central room, sometimes in the corner of the house,<sup>22</sup> and two in rooms in the corner of the house, opening off a loggia.<sup>23</sup> The possible altar in the front room of Long Wall Street 10 at the Workmen's Village has been noted. The decision to erect altars in places other than the central room appears to have been rarely influenced by limitations of space in the central room. It is not always possible to determine the orientation of the altars from the published reports, but at least fourteen are built against an east wall, ten against a north wall, eight against a south wall and up to two against a west wall. Thus, whilst the altars tend to conform to certain locations and orientations, there is significant variation. There is also greater variation in their form than is reflected in Borchardt's preliminary study.

The only material recorded in close association with domestic altars were fragments of lamp stands excavated near that in house Q46.1 and pottery vessels sunk in the ground near those in P49.15 and P47.22, although objects such as stelae were occasionally found in the same house complex.<sup>24</sup>

Domestic altars of varying forms have been identified at a number of other settlements; the Deir el-Medina *lits clos* are particularly well known. There remains some debate whether the *lits clos* functioned as beds, possibly with particular ritual significance during sexual intercourse or childbirth, formed a focus of active religious rituals as altars, or were used for a combination of such purposes.<sup>25</sup> In this respect, the form and location of the larger stepped structures in J49.1, M50.1 and O49.9 may be significant. It has been proposed that the Amarna altars and the Deir el-Medina *lits clos* differed in terms of scale, the latter being larger, and in the sense that the *lits clos* were enclosed to a greater degree, possessing more substantial perimeter walls.<sup>26</sup> This comparison is based on the smaller, stepped podiums at Amarna (fig. 2). The emplacements in J49.1, M50.1 and O49.9 provide closer parallels as they are of similar size to those at Deir el-Medina, whilst their location in a separate room possibly enhanced the sense that they were enclosed or isolated. If the interpretation of the latter as altars is correct, these parallels provide further evidence that the *lits clos* also functioned as such.

### *Vertical niches*

Vertical recesses built into internal walls were relatively common features of Amarna houses. These could be either one or two bricks deep with single- or double-rebated

<sup>21</sup> Houses P47.5 and R46.3: Borchardt and Ricke, *Die Wohnhäuser*, 50, 103, Hauspläne 12, 29.

<sup>22</sup> Houses M50.1, O49.17, P47.22 and possibly N49.10, Q.46.9f, T35.6 and U35.25: *CoA* I, pl. i; *CoA* II, 35, 42, pls. vi–vii, xxxi.1; Borchardt and Ricke, *Die Wohnhäuser*, 37, 132, 255, 280, Hauspläne 7, 32, 83, 93.

<sup>23</sup> Houses J49.1 and O49.9: Borchardt and Ricke, *Die Wohnhäuser*, 228, 247, Hauspläne 68, 78.

<sup>24</sup> On the vessels, see Borchardt and Ricke, *Die Wohnhäuser*, 24, 26, 132, 278, Hauspläne 32, 91. The stelae comprise primarily an example depicting Taweret from N49.21 (*CoA* I, 25, pl. xii.2) and a stela with no preserved decoration from Q46.3 (Borchardt, *Porträts*, 22–3; Krauss, *Jahrbuch der Berliner Museen* 33, 35).

<sup>25</sup> B. Bruyère, *Rapport sur les fouilles de Deir el Médineh (1934–1935). Troisième Partie: le village, les décharges publiques, la station de repos du col de la Vallée des Rois* (FIFAO 16; Cairo, 1939), 61–4; Kemp, *JEA* 65, 52; J. F. Romano, *Daily Life of the Ancient Egyptians* (Pittsburgh, 1990), 26–7; F. D. Friedman, 'Aspects of Domestic Life and Religion', in L. H. Lesko (ed.), *Pharaoh's Workers: The Villagers of Deir el Medina* (Ithaca, NY, 1994), 97–111; L. Meskell, 'An Archaeology of Social Relations in an Egyptian Village', *Journal of Archaeological Method and Theory* 5/3 (1998), 223; id., *Archaeologies of Social Life* (Oxford, 1999), 99–102.

<sup>26</sup> Friedman, in Lesko (ed.), *Pharaoh's Workers*, 110. The *lits clos* measure, on average, 1.7 × 0.8 m and 0.75 m in height (Bruyère, *Rapport (1934–1935)*, 56).

edges, although the backs of the niches appear to have been flat, with no further internal recesses. The niches measured up to approximately 1.5 m in width and seem to have been around the same height as the doorways originally.<sup>27</sup> Although it is again sometimes difficult to identify examples from the published plans, they can be recognised in approximately 136 houses, many of which contain more than one niche. Approximately 125 niches can be identified within the central room,<sup>28</sup> around 37 in the front hall or north loggia,<sup>29</sup> up to 15 in the square room,<sup>30</sup> 5 in the west loggia,<sup>31</sup> 1 in the bedroom<sup>32</sup> and at least 3 in other rooms.<sup>33</sup>

The discovery of these niches prompted considerable debate over whether they functioned simply as architectural counterweights or possessed religious significance.<sup>34</sup> Support for the first interpretation can be found in the fact that the vast majority are located opposite a doorway or so as to balance a doorway on the same wall, whilst a limited number are placed opposite or so as to balance another niche.<sup>35</sup> In only a small number of cases niches do not appear to balance other architectural features.<sup>36</sup> A few niches are also decorated with modelled mud plaster to imitate the panels of doors.<sup>37</sup>

Possible evidence that the niches possessed religious significance is to be found primarily in the painted reliefs found around and within them. Niches in houses K50.1, M50.16 and P47.19 bore decoration that included prayers to the Aten and possible scenes of worship of the royal family.<sup>38</sup> These scenes were located in the upper portion of the niches, above painted red and yellow panels, and further examples have probably

<sup>27</sup> Petrie, *Tell el-Amarna*, 21; *CoA I*, 42.

<sup>28</sup> For example, house V37.6: *CoA II*, 9, pl. iii.

<sup>29</sup> For example, house N49.18: *CoA I*, 10, pls. i, ix.3.

<sup>30</sup> Houses J49.1, O49.20, P47.19, P47.33, Q46.2, Q48.1, R46.3, V36.1, V36.5 and possibly Q46.3 (*CoA I*, 36, pl. ii; *CoA II*, 11, pls. iii, v; Borchardt and Ricke, *Die Wohnhäuser*, 28, 30, 50, 127, 224, 228, 258, Hauspläne 3–4, 12, 23, 66, 68, 84).

<sup>31</sup> Houses K50.1, M47.3, O48.14 and P47.19: *CoA I*, 7, 43, pl. iii; Borchardt and Ricke, *Die Wohnhäuser*, 58, 126, 212, Hauspläne 17, 23, 61.

<sup>32</sup> House R46.3: Borchardt and Ricke, *Die Wohnhäuser*, 51, Hausplan 12.

<sup>33</sup> Houses R46.3, U36.39 and V37.4: *CoA II*, pls. iii–iv; Borchardt and Ricke, *Die Wohnhäuser*, 50, Hausplan 12. All are in rooms off the central room apart from in R46.3, where there is a possible niche in a narrow room in the south-west corner of the house.

<sup>34</sup> For example, Borchardt, *MDOG* 46, 22; ‘Excavations at Tell el-Amarna, Egypt, in 1913–1914’, *Annual Report of the Smithsonian Institution* (1915), 451; C. L. Woolley, ‘Excavations at Tell el-Amarna’, *JEA* 8 (1922), 65; *CoA I*, 42–3; F. W. F. von Bissing, ‘Zur Geschichte der “roten Nischen” in el-Amarna’, *Afo* 3 (1926); S. R. K. Glanville, ‘The Decoration of the Houses’, in H. Frankfort (ed.), *The Mural Painting of el-Amarnah* (London, 1929), 39–40, 50; *CoA II*, 9.

<sup>35</sup> Borchardt, *MDOG* 46, 22; id., ‘Ausgrabungen in Tell el-Amarna 1911/12. Vorläufiger Bericht’, *MDOG* 50 (1912), 18–19; id., ‘Ausgrabungen in Tell el-Amarna 1912/13. Vorläufiger Bericht’, *MDOG* 52 (1913), 15; id., ‘Ausgrabungen in Tell el-Amarna 1913/14. Vorläufiger Bericht’, *MDOG* 55 (1914), 20–1.

<sup>36</sup> Consider the possible niches in J49.2, O49.12 and U36.1: *CoA II*, pl. iii; Borchardt and Ricke, *Die Wohnhäuser*, 229, 250, Hauspläne 69, 80.

<sup>37</sup> H. Frankfort, ‘Preliminary Report on the Excavations at el-Amarna, 1928–9’, *JEA* 15 (1929), 147, n. 1, pl. xxvi.2; *CoA II*, 32, pl. xviii.6.

<sup>38</sup> Woolley, *JEA* 8, 65; *CoA I*, 6, 19, 43; Borchardt and Ricke, *Die Wohnhäuser*, 124, 127; S. Seidlmayer, ‘Die Inschriften’, in Borchardt and Ricke, *Die Wohnhäuser*, 342–5. Niches preserving fragments of the name and titles of the house owner were also found in N49.18 and Q46.1 (T. E. Peet, ‘Excavations at Tell el-Amarna: A Preliminary Report’, *JEA* 7 (1921), 171–2; Woolley, *JEA* 8, 65; *CoA I*, 10, pl. ix.3; Borchardt and Ricke, *Die Wohnhäuser*, 24).

been destroyed.<sup>39</sup> The significance of such decoration is difficult to determine, however, as some doorways also bore prayers to the Aten, scenes showing the worship of the royal family and Aten, and the names and titles of the house owners.<sup>40</sup> Decoration was preserved on least 45 additional niches. The majority were either painted red with a central yellow panel or were entirely red, occasionally with a white border.<sup>41</sup> There are no published details of the decoration of the remaining examples; in many cases, it was probably not preserved.

A small number of objects and emplacements were also excavated in association with niches. A pottery vase was found buried in front of a niche in K50.1, where fragments of a hymn to the Aten were located. The excavators suggested this was a receptacle for offerings.<sup>42</sup> The association of possible altars with vertical niches at houses O48.8 and U37.1 has been noted, but there are no published details of the decoration of the niches in either house. A stepped structure interpreted as an altar was also built against a niche with red and yellow painted panels in the central room of N49.21. The excavators identified the structure as an addition to the room not built during the same construction phase as the niche.<sup>43</sup>

‘[B]emalte Falkenköpfe aus Nilschlamm’ were also excavated in the vicinity of a double niche in the central room of O49.1.<sup>44</sup> Borchardt implied that these formed part of a frieze and suggested that the niche was decorated in a similar manner to the double niches in the chapels of the temple of Seti I at Abydos, which were topped with carved uraeus friezes.<sup>45</sup> Although he later favoured the idea that the niches were purely architectural balances, on the basis of their location, he cited this parallel initially as evidence that some possessed religious significance. In the list of objects from O49.1 in the final report of the DOG excavations is a mud ‘Fledermauskopf (?), gelb mit blauer and schwarzer Bemalung’ (excavation number 11/303).<sup>46</sup> A painted mud model with this excavation number from Amarna is in the collection of the Ägyptisches Museum und Papyrussammlung, Berlin. In the opinion of the author, it resembles the bust of a falcon more closely than a bat and is probably one of the falcon heads found at the niche.<sup>47</sup> The

<sup>39</sup> The vertical preservation of houses is rarely recorded in the early excavation reports, but those in the city proper generally do not seem to have been preserved to a substantial height when excavated (Kemp, *JEA* 65, 51).

<sup>40</sup> *CoA* I, 9, 22, 26, 33, 37, 42–3, pls. x.4, xxxiii.6; II, 109, pl. xxiii.4; III, 27, 189, pl. lx.4; Borchardt, *MDOG* 46, 19; Borchardt and Ricke, *Die Wohnhäuser*, 57, 62, 112, 137, 241, 262, Taf. 26; Seidlmayer, in Borchardt and Ricke, *Die Wohnhäuser*, 342; id., ‘Zur einigen Architekturinschriften aus Tell el-Amarna’, *MDAIK* 39 (1983), 183–206.

<sup>41</sup> *CoA* I, 18, 22, 24, 28–9, 34, 43; II, 9, 11, 15, 21, 32–3, 38–9, 27, 49, 51, 56, 68, 77; III, 117; Borchardt and Ricke, *Die Wohnhäuser*, 28, 60, 187, 191, 211.

<sup>42</sup> *CoA* I, 43.

<sup>43</sup> *CoA* I, 24, pl. i. In contrast to most stepped altars, the steps of this structure run along the wall rather than project out from it. The niche is incorporated into the side of the structure rather than the back, which gives the impression that it was not intended as a focal point of the installation.

<sup>44</sup> Borchardt, *MDOG* 46, 22.

<sup>45</sup> *MDOG* 46, 22. The parallel is again suggested in Borchardt and Ricke, *Die Wohnhäuser*, 239, where the falcon heads are stated directly to have been part of a frieze. See also the discussion in *CoA* I, 42–3. On the niches at the temple of Seti I, see A. M. Calverley and M. F. Broome, *The Temple of King Sethos I at Abydos, II: The Chapels of Amen-Re, Re-Harakhti, Ptah, and King Sethos* (London, 1935), pls. 9, 25.

<sup>46</sup> Borchardt and Ricke, *Die Wohnhäuser*, 241.

<sup>47</sup> The model was examined in the museum magazine by the author in May 2000, at which time it was not accessioned. I would like to thank Prof. Wildung and the Ägyptisches Museum und Papyrussammlung for

base of the bust is roughened, but it is not clear whether this resulted from attachment to another object or surface. If joined to a wall as part of a frieze, it would project directly outwards and be oriented parallel to the floor. This seems unusual; the bust might be expected to face outwards. Thus, there is some question about Borchardt's reconstruction of the niche and the validity of parallels drawn between it and the niches in the temple of Seti I, both in terms of appearance and religious significance. The possibility remains, though, that the figures were used in religious conduct that focused upon the niche.<sup>48</sup>

There is also evidence of domestic niches with cult significance at Deir el-Medina, where vertical niches with rebated edges often occurred, particularly in the second room, and occasionally balanced doorways. Some appear to have been decorated with cult scenes, such as the worship of Ahmose Nefertari and Amenhotep I, whilst others bore traces of red and yellow paint, the latter in a central band.<sup>49</sup> A number of scholars have noted the similarity between domestic niches and false doors in tombs used to facilitate the movement of the *k3*;<sup>50</sup> Meskell has raised the possibility that the red- and yellow-painted niches at Deir el-Medina served as points of contact with deceased ancestors.<sup>51</sup> The function of the Amarna niches cannot be confirmed, but the possibility that some possessed religious significance must remain, particularly given the presence of possible cult emplacements at a few examples and the apparent cult significance of those at Deir el-Medina.

### *Rectangular or round-topped niches*

The excavators occasionally noted that smaller niches were also cut into the walls of the houses. These were recorded in particular during excavations at the Workmen's Village.<sup>52</sup> Unfortunately, the published reports provide few details of these emplacements. They were generally interpreted as receptacles for lamps, and the blackening inside some niches supports this identification.<sup>53</sup> It is possible, however, that others served as emplacements for cult items such as stelae and figurines. The niches

permission to discuss it here. There are no other artefacts in the list of objects from this house in the excavation report that match the description of the falcon heads, although these are mentioned in the description of the complex itself; see n. 45.

<sup>48</sup> Potential parallels include the unprovenanced model mud vultures and ram-heads in the British Museum (for example, EA 61670, 61915) suggested to have been connected with the New Kingdom cults of Mut and Amun at Thebes: S. Quirke, *Ancient Egyptian Religion* (London, 1992), 8, fig. 2; L. Giddy, *The Survey of Memphis*, II: *Kom Rabi'a. The New Kingdom and Post-New Kingdom Objects* (EES Excavation Memoir 64; London, 1999), 19. Similar mud vulture and ram-heads were found near the temple of Ramesses II at Abydos: D. O'Connor, 'Abydos: A Preliminary Report on the Pennsylvania-Yale Expedition, 1967', *Expedition* 10/1 (1967), 17. The Amarna figure is simpler in form than these.

<sup>49</sup> Bruyère, *Rapport (1934-1935)*, 67-9, pl. xii; D. Valbelle, 'Les ouvriers de la tombe': *Deir el-Médineh à l'époque ramesside* (BdE 96; Cairo, 1985), 261; Meskell, *Journal of Archaeological Method and Theory* 5/3, 231-2.

<sup>50</sup> W. M. F. Petrie, *Religion and Conscience in Ancient Egypt* (London, 1898), 34-5; Bruyère, *Rapport (1934-1935)*, 67; von Bissing, *AfO* 3, 175-6.

<sup>51</sup> *Journal of Archaeological Method and Theory* 5/3, 231-2.

<sup>52</sup> Woolley, *JEA* 8, 57; *CoA* I, 63, 81, 87, 89-90. The fact that fewer examples were noted from the city proper may be due again to the poorer vertical preservation of houses beyond the village; see n. 39.

<sup>53</sup> For example, Woolley, *JEA* 8, 57; *CoA* I, 63, 81.

themselves provide little direct evidence to support such a function, although some were round-topped, perhaps in imitation of a round-topped stela.<sup>54</sup> In some cases, the dimensions of the niche might also indicate cult use. At West Street 13, a round-topped niche measuring 45 cm in height, 30 cm in width and 10 cm in depth was cut into the north wall of a chamber beneath the staircase.<sup>55</sup> This niche was perhaps too shallow to hold a lamp, but it could have accommodated an object such as a stela. There is also some indirect evidence for the use of niches as cult emplacements: the presence of gypsum plaster on the back of the royal family stela in Berlin (ÄMP 14145) could indicate that it was erected in a niche.<sup>56</sup>

The use of small niches as emplacements for cult objects is also well attested at shrines, where they have been found with votive stelae *in situ* or in close association. At Amarna itself, stelae were apparently found in round-topped niches in the tomb of Any.<sup>57</sup> The houses at Deir el-Medina had small rectangular and round-topped niches, some of which seem to have been cult emplacements, and domestic shrines at Askut incorporated small niches; one was found with a stela *in situ*.<sup>58</sup> Niches in some Roman Period houses might also have been used as shrines, as terracotta figurines of this period depicting deities in shrines that possibly represent niches with moulded decoration are known from Karanis and other sites.<sup>59</sup>

### *Cultic cupboards*

There has been some confusion as to whether the Amarna domestic altars incorporated cupboards. Peet and Woolley noted that a fertility figurine, a stela depicting Taweret and two model beds were found 'in the small cupboard beneath the stairs' in house N49.21.<sup>60</sup> N49.21 contained a probable domestic altar with an approaching staircase in the central room, but also incorporated a full-scale staircase leading to the roof of the house. Some scholars have interpreted the excavators' statement to mean that the objects were found in a cupboard beneath the stairs of the altar,<sup>61</sup> and it has been implied that these spaces were used for the storage of cult equipment.<sup>62</sup> The excavators made no

<sup>54</sup> CoA I, 86, 89–90.

<sup>55</sup> CoA I, 86.

<sup>56</sup> Krauss, *Jahrbuch der Berliner Museen* 33, 7–9, Abb. 2; Arnold, *Royal Women*, 97–8.

<sup>57</sup> N. de G. Davies, *The Rock Tombs of El Amarna*, V. *Smaller Tombs and Boundary Stelae* (EES Archaeological Survey 17; London, 1908), 9. See L. Borchardt, *Das Grabdenkmal des Königs Šaḥu-Re*, I (Leipzig, 1910), 126, Abb. 171, for examples from a temple context.

<sup>58</sup> Bruyère, *Rapport (1934–1935)*, 76–7, 193–6, 332, figs. 86, 204, pls. xv–xx; F. D. Friedman, 'On the Meaning of Some Anthropoid Busts from Deir el-Medina', *JEA* 71 (1985), 83; id., in Lesko (ed.), *Pharaoh's Workers*, 113, 115; A. G. McDowell, *Village Life in Ancient Egypt: Laundry Lists and Love Songs* (Oxford, 1999), 103; S. T. Smith, *Askut in Nubia: The Economics and Ideology of Egyptian Imperialism in the Second Millennium B.C.* (London, 1995), 66, 139–47, fig. 6.3, pls. 7, 15–17.

<sup>59</sup> D. Frankfurter, *Religion in Roman Egypt: Assimilation and Resistance* (Princeton, 1998), 134–5.

<sup>60</sup> CoA I, 24–5. Two fertility figurines are listed from this context in the field notebook (Kemp, *Ancient Egypt*, 346, n. 64).

<sup>61</sup> Pinch, *Or* 52, 414; id., *Votive Offerings to Hathor* (Oxford, 1993), 216; G. Robins, 'Dress, Undress and the Representation of Fertility and Potency in New Kingdom Egyptian Art', in N. Boymel Kampen (ed.), *Sexuality in Ancient Art* (Cambridge, 1996), 29.

<sup>62</sup> See Meskell's discussion of niches at Deir el-Medina in *Journal of Archaeological Method and Theory* 5/3, 223. She identifies these as cultic cupboards, based partially on the incorporation of a similar cupboard in the



reference to a cupboard within the altar itself, however, and none of the other altars at the site seems to have incorporated such a feature. It is more likely that the artefacts were actually found in the alcove beneath the staircase leading to the roof.<sup>63</sup>

The concentration of cult material in the staircase alcove in N49.21 raises the question of whether these spaces should be considered cult emplacements. These alcoves appear to have been common at the site.<sup>64</sup> In most cases, access to them was gained through an entrance from the central room, in which emplacements such as altars were sometimes located, but there is no evidence of a close physical link between these installations. There are few details available of the architecture of specific alcoves, and the possible significance of the round-topped niche in that in West Street 13 has been noted. The material found in the alcoves may give some indication of their function. The published excavation records provide details regarding the contents of the alcoves in the Workmen's Village. These contained a range of material, including plant and animal matter, vessels, jar sealings, textiles, furniture and miscellaneous items such as fragments of molten glass. Whilst some of this can be associated potentially with religious conduct, the only artefacts that can be assigned with relative confidence to this sphere are a rudimentary female figurine and a headrest decorated with protective deities from Long Wall Street 12 and West Street 13 respectively.<sup>65</sup>

Thus, there is little evidence that the alcoves at the Workmen's Village were used exclusively for the storage of ritual goods, although this may have occurred in some cases. If they were used for the general storage of belongings upon abandonment of the site, however, we will be witnessing the material remnants of abandonment processes, rather than of everyday activity. The lack of space in the village houses is also significant. It seems unlikely that a significant proportion of the available space would be devoted to the storage of cult equipment, at least exclusively. Hence, there remains a degree of uncertainty regarding the extent to which the situation at the Workmen's Village is typical of the site as a whole.

### *Lustration slabs*

Over 40 stone 'lustration slabs' in houses in the North Suburb and Main City, predominantly in the central room, can be identified from the excavation records.<sup>66</sup> They can again be difficult to identify in the published plans and additional examples may have been removed.

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Amarna altar. On the latter, she cites A. A. Loose, 'Woonhuizen in Amarna en het domein van de vrouwen', *Phoenix* 38/2 (1992), 23; Robins, in Boymel Kampen (ed.), *Sexuality in Ancient Art*, 29.

<sup>63</sup> Cf. Kemp, *Ancient Egypt*, 305.

<sup>64</sup> For example, Newton, *JEA* 10, 292; B. J. Kemp, 'Report on the 1985 Excavations: Work Inside the Walled Village', in Kemp (ed.), *Amarna Reports* III, 7, 16–19.

<sup>65</sup> *CoA* I, 86, pls. x.2, xxiii.1. On the contents of the alcoves in general, see Woolley, *JEA* 8, 55, 59; *CoA* I, 71, 78–9, 83, 85–6, pls. x.2, xix.4, xx.2.

<sup>66</sup> *CoA* I, 7, 21, 29, pls. i, iii, v.4; II, 8, 11, 16, 34, 42, 69, 71–2, 76, pls. iii–iv, vi, xi; III, pl. xi; Borchardt and Ricke, *Die Wohnhäuser*, 17, Hauspläne 1–2, 9, 12, 16, 23, 26, 44, 51, 54, 63, 65, 69, 73, 83, 94, 96, 103, 107; P. T. Crocker, *Social and Spatial Groupings among the Domestic Quarters at el-Amarna, Egypt* (Cambridge, unpublished MPhil dissertation, 1984), 11; C. Tietze, 'Amarna: Analyse der Wohnhäuser und soziale Struktur der Stadtbewohner', *ZÄS* 112 (1985), 69. Examples in or near rooms thought to have served as bathrooms are not included.

They generally take the form of a low, rectangular platform with a slightly raised edge. A short, central projection often, but not always, occurs at the front. A vessel or rectangular stone trough is sometimes sunk in the ground adjacent to the edge of the platform; other examples have depressions cut out of the surface of the platform itself. The vessels and depressions appear designed to collect liquid run-off. Few dimensions of the platforms are recorded, but they seem to have differed slightly in size.<sup>67</sup> Lustration slabs can occasionally be identified in the same house or room as altars. There is again generally little indication of a close association between these emplacements, although a 'whitewashed "altar" on a lustration place' was recorded from T35.6 in the North Suburb.<sup>68</sup>

There is little evidence to link the slabs directly with cult; they have generally been interpreted as emplacements for water jars, possibly associated with washing.<sup>69</sup> Nonetheless, the importance of purification and libation rituals in state and funerary cult raises the possibility that the slabs were associated with similar rituals in the domestic sphere.<sup>70</sup> There is no indication that they were necessarily linked exclusively or intimately with cult, but it is conceivable that they functioned in preparatory rites prior to a main ritual, for example.

### *Domestic reliefs and inscriptions*

Domestic reliefs and inscriptions can be considered, on the one hand, as documentary evidence of religious belief or practice, and on the other to have possessed religious significance in their own right as, for instance, foci of cult or amuletic images. Along with the reliefs and inscriptions relating to the cult of the Aten or royal family found around doorways and associated with vertical niches as noted above, a small number of painted scenes relating to the royal family were excavated in the Workmen's Village. Painted images of royal figures, in both cases possibly Tutankhamun, were found in West Street 2/3 and Long Wall Street 7.<sup>71</sup> Peet and Woolley suggested that fragments of painted plaster from Main Street 9 formed part of a scene of Aten worship, although the fragments may have derived from a private birth arbour scene.<sup>72</sup> Scenes relating to cults or religious activity in domestic contexts other than that involving the Aten and royal family are preserved only in a few painted representations in the Workmen's

<sup>67</sup> One example measured approximately 1.5 m in width and 80 cm in depth (Borchardt and Rieke, *Die Wohnhäuser*, Taf. 19A).

<sup>68</sup> CoA II, 42. The exact nature of this emplacement is uncertain.

<sup>69</sup> CoA I, 6; T. Kendall, 'The House', in E. Brovarski, S. K. Doll and R. E. Freed (eds), *Egypt's Golden Age: The Art of Living in the New Kingdom* (Boston, 1982), 30; Crocker, *Social and Spatial Groupings*, 11; Tietze, *ZÄS* 112, 69–70; Kemp, *Ancient Egypt*, 295–6.

<sup>70</sup> See A. M. Blackman, 'Purification (Egyptian)', in J. Hastings (ed.), *Encyclopedia of Religion and Ethics*, X (Edinburgh, 1918), 476–82; H. W. Fairman, 'Worship and Festivals in an Egyptian Temple', *Bulletin of the John Rylands Library* 37 (1954), 173–86; J. F. Borghouts, 'Libation', *LÄ* III, 1014–15.

<sup>71</sup> CoA I, 83; B. J. Kemp, 'The Amarna Workmen's Village in Retrospect', *JEA* 73 (1987), 44; F. Weatherhead, 'Report on the 1986 Excavations: Fragments of a Painted Royal Figure with Artist's Grid from West Street 2/3', in B. J. Kemp (ed.), *Amarna Reports*, IV (EES Occasional Publications 5; London, 1987), 17–29.

<sup>72</sup> CoA I, 59–60, 80, pl. ix.2; Kemp, *JEA* 65, 51. A scene in the front hall of Long Wall Street 7 possibly also depicted a birth arbour (CoA I, 83; Kemp, *JEA* 65, 52). For fragments of plaster with a possible offering formula from Main Street 10, see B. Gunn, 'Inscriptions of 1922', in CoA I, 146–7; Kemp, *JEA* 73, 45.

Village and these have been discussed by Kemp.<sup>73</sup> The most notable is part of a scene depicting Bes figures and probably Taweret in the front room of Main Street 3. In the front room of Long Wall Street 10, was the lower part of a scene depicting a number of human figures, all probably women and girls, perhaps participating in a celebration or ritual associated with childbirth. There was a structure that possibly served as a simple altar beneath.

### Portable objects

A link with the religious sphere can sometimes be suggested for portable objects excavated at Amarna, primarily on the basis of iconography, textual or epigraphic parallels, or the presence of similar material in distinct cult contexts elsewhere. This material might not always have functioned as a central component of religious ritual, or served solely in the religious realm, but this is not necessary for it to have possessed a degree of religious significance. The linking of portable objects with potential religious associations specifically to the domestic sphere is problematic. Although these objects were often excavated amongst residential areas, the fact that they were readily transportable creates uncertainty as to whether they were actually used in domestic contexts. In other cases, material was found in areas that served other functions, such as workshops. Problems regarding the dating of these objects are also significant, particularly as early excavators rarely investigated the stratigraphy of the site.<sup>74</sup> It can be assumed that a proportion of the material was deposited during the period in which the city served as Egypt's capital, but there is little opportunity to investigate the quantity or range of material deposited at that time.

### Offering tables

At least eighteen intact and fragmentary offering tables have been recorded from domestic contexts in the Workmen's Village and the Main City.<sup>75</sup> The majority measure approximately 15–25 cm in length. One miniature example from West Street 17 measured 6.6 × 6 cm.<sup>76</sup> The offering tables can be rectangular or square in shape, and both spouted and spoutless examples occur. A possible example found in the central room of M50.13 was raised on legs and had five large, basin-shaped depressions in its upper face. This was of considerable size, measuring 73 × 59 × 36 cm.<sup>77</sup> Another probable offering table with short legs and five circular depressions was excavated outside house L51.1.<sup>78</sup>

<sup>73</sup> JEA 65, 47–53.

<sup>74</sup> I. Shaw, 'Sifting the Spoil: Excavation Techniques from Peet to Pendlebury at el-Amarna', in A. Leahy and J. Tait (eds), *Studies in Honour of H. S. Smith* (EES Occasional Publication 13; London, 1999), 284–5.

<sup>75</sup> CoA I, 18, 66, 68–7, 71, 73, 75, 77–8, 81, 87–9, 102, pls. vi.2, xiv.5, xxiii.3; Borchardt and Ricke, *Die Wohnhäuser*, 20, 164, 217. Some fragmentary examples possibly derived from statues of the royal family; see F. L. Griffith, 'Excavations at Tell el-'Amarnah, 1923–4. A. Statuary', JEA 17 (1931), 181.

<sup>76</sup> CoA I, 88. Details of its dimensions and decoration, not mentioned in the excavation report, are provided on the original object registration card in the EES Amarna Archive; no. 22/132. I am grateful to the EES for permission to cite this.

<sup>77</sup> CoA I, 18, pl. vi.2.

<sup>78</sup> CoA I, 18. Consider also the limestone block with in-built bowls containing 'grease' from a room beside the bathroom in T36.11 (CoA II, 25, pls. xii, xix.3, xx.3; B. J. Kemp, 'Chapel Group 528–531', in B. J. Kemp (ed.), *Amarna Reports*, II (EES Occasional Publications 2; London, 1985), 50).

Many offering tables bore no trace of decoration, but at least one had images of birds and flowers.<sup>79</sup> The miniature offering table was decorated with six *nfr*-signs. An example found in East Street 1 at the Workmen's Village bore a head incised on the back, and a fragment excavated at Q47.22 was decorated with a prayer to Osiris around its edge.<sup>80</sup> Fragments of a 'table', perhaps an item of cult equipment, from M50.13 bore ink drawings of the early form of the name of the Aten, possibly an additional cartouche and 'meaningless lines'.<sup>81</sup>

### *Basins*

Stone basins or troughs and large stone bowls were occasionally recorded from domestic contexts.<sup>82</sup> There is little direct indication in the excavation reports that any served religious functions and there is a range of utilitarian, secular purposes for which they would have been suitable. Details regarding these receptacles are limited, and it is difficult to assign any function to them. A chalkstone basin found in the central room of P47.17 bore a figure of a worshipper, which suggests that this example at least functioned in cult.<sup>83</sup>

Indirect evidence of a religious role for some of these receptacles can be seen in the significance afforded libation and purification rituals in temple and funerary cult. Some basins and bowls found in public areas of temples and tombs, including examples from the Amarna private chapels, are thought to have held liquids such as water for lustration rituals, or functioned as receptacles for libations.<sup>84</sup> A number of fragments of stone basins and bowls were also found amongst houses at Deir el-Medina, occasionally bearing decoration including prayers to deities, images of worshippers and *ꜥḥ iqr n R<sup>c</sup>*-formulae.<sup>85</sup>

### *Shrines and naoi*

There is little clear evidence of portable shrines or naoi in domestic contexts in the excavation records, although as these were generally made of wood, they would have been particularly prone to destruction. A small number of wooden uraei were excavated in residential areas. These were possibly decorative elements of shrines similar to an example from the House of the King's Statue,<sup>86</sup> although wooden uraei could also be

<sup>79</sup> Borchardt and Ricke, *Die Wohnhäuser*, 20.

<sup>80</sup> *CoA* I, 66, 71; Borchardt and Ricke, *Die Wohnhäuser*, 164. The former apparently had 'nothing to do with the cult of the Aten' (*CoA* I, 66).

<sup>81</sup> *CoA* I, 19.

<sup>82</sup> For example, *CoA* I, 26, 30; II, 65; Borchardt and Ricke, *Die Wohnhäuser*, 119.

<sup>83</sup> Borchardt and Ricke, *Die Wohnhäuser*, 119, Hausplan 31.

<sup>84</sup> J. Jacquet, 'Un bassin de libation du nouvel empire dédié à Ptah. Première partie: l'architecture', *MDAIK* 16 (1958), 161-7; H. Wall-Gordon, 'A New Kingdom Libation Basin Dedicated to Ptah. Second Part: The Inscriptions', *MDAIK* 16 (1958), 168-75; L. Habachi, 'Varia from the Reign of King Akhenaten', *MDAIK* 20 (1965), 70-3; Bomann, *Private Chapel*, 21, 29, 32; Pinch, *Votive Offerings*, 301-2.

<sup>85</sup> Bruyère, *Rapport (1934-1935)*, 210, 237-335; R. J. Demarée, *The ꜥḥ iqr n R<sup>c</sup>-Stelae: On Ancestor Worship in Ancient Egypt* (Egyptologische Uitgaven 3; Leiden, 1983), 146-53, 287.

<sup>86</sup> Uraei were recorded from O47.14, P47.17, S39.1 and T33.10: *CoA* II, 70; III, 22; Borchardt and Ricke, *Die Wohnhäuser*, 86, 122. On the shrine at the House of the King's Statue, see *CoA* III, 141, pl. lxxix.7; Kemp, *Ancient Egypt*, 283-5, fig. 95.

incorporated into objects such as statues and staves. Pieces of decorated wood and fragments of boxes are also mentioned in the excavation reports, some of which could have been parts of shrines or naoi.<sup>87</sup> A wooden Hathor head was found in the Workmen's Village, which the excavators suggested derived from a casket. It possibly originated from a shrine similar to an example with Hathor-headed columns from Deir el-Medina.<sup>88</sup>

*Statues, stelae, figurines, ostraca, implements, vessels and miscellaneous materials*

A range of additional objects with potential significance for domestic religion has been excavated in residential areas, including jewellery, figurines, statues, stelae, ostraca, implements, vessels and other miscellaneous materials.<sup>89</sup> The corpus of jewellery, most of which is made of faience, includes images of divinities, animals, anthropomorphic figures, various hieroglyphic motifs and royal names; *wedjat*-eyes and Bes images occur most frequently.<sup>90</sup>

Amongst the figurines are anthropomorphic images, particularly fertility figurines; animals, often cobras or monkeys; deities including Taweret and Bes images; and non-figurative objects, such as model balls.<sup>91</sup> Most figurines are made of pottery or unfired clay, but faience and stone examples also occur. Images of the royal family dominate the statuary, but deities such as Thoth and possibly Ptah occasionally appear, as do private individuals.<sup>92</sup> Images of the royal family and Aten also occur most frequently on stelae, where divinities such as Taweret, Thoth, Ptah, sacred animals and private individuals are also represented.<sup>93</sup> Similar images occasionally appear on ostraca.<sup>94</sup>

<sup>87</sup> For fragments of wood with the names or images of the Aten and royal family, see *CoA* III, 32; Borchardt and Ricke, *Die Wohnhäuser*, 303. See Borchardt and Ricke, *Die Wohnhäuser*, 27, 290, for other decorated fragments; and *CoA* I, pl. xix, fig. 4, for a 'box lid' that is possibly the door of a shrine.

<sup>88</sup> See *CoA* I, 72, pl. xx.1, on the Amarna fragment, and E. Leospo, 'Woodworking: Furniture and Cabinetry', in A. M. Donadoni Roveri (ed.), *Egyptian Civilization: Daily Life* (Turin, 1988), fig. 215, on the Deir el-Medina shrine. For wooden Hathor columns and sistra, see C. Tutundjian, 'A Wooden Sistrum Handle', *VA* 2 (1986), 73–8; Pinch, *Votive Offerings*, 140–1.

<sup>89</sup> It is beyond the scope of the current article to provide a comprehensive discussion of this material. The reader is referred to the excavation reports and the examples in the following footnotes.

<sup>90</sup> For example, Petrie, *Tell el-Amarna*, pls. xiv–xx; *CoA* II, pls. xlix–l; III, pl. cxii; A. Boyce, 'Collar and Necklace Designs at Amarna: A Preliminary Study of Faience Pendants', in B. J. Kemp (ed.) *Amarna Reports*, VI (EES Occasional Publications 10; London, 1995), 336–71; Györy, in Eyre (ed.), *Proceedings of the Seventh International Congress*, 497–507.

<sup>91</sup> For example, *CoA* I, 84, pl. xxiii.5; II, 35, pl. xxxviii.1–3; Pinch, *Or* 52, 405–14.

<sup>92</sup> Over 300 fragments of statues have been recorded from beyond the Central City, most of which appear to have represented members of the royal family; see n. 2 for examples. On statues of deities and private individuals, see Borchardt, *MDOG* 50, 26; J. D. S. Pendlebury, 'Preliminary Report of the Excavations at Tell el-'Amarnah', *JEA* 19 (1933), 117–18, pls. xvii–xviii; Borchardt and Ricke, *Die Wohnhäuser*, 48, 253; M. M. el-Damaty, 'Squatting Statues in the Cairo Museum', *MDAIK* 46 (1990), 5, pl. 5.D, E; J. L. Haynes, 'Statuette of Thoth and a Scribe', in R. E. Freed, Y. J. Markowitz and S. H. D'Auria (eds), *Pharaohs of the Sun: Akhenaten, Nefertiti, Tutankhamun* (Boston, 1999), 258, no. 185.

<sup>93</sup> For royal family stelae, see Borchardt, *Porträts*, 2–24, Abb. 5; id., *MDOG* 50, 26–8, Abb. 9; F. Ll. Griffith, 'Stela in Honour of Amenophis III and Taya, from Tell el-'Amarnah', *JEA* 12 (1926), 1–2; *CoA* II, 46, pl. xl.7; Borchardt and Ricke, *Die Wohnhäuser*, 143, 160, 182, 310; Ikram, *JEA* 75, 89–101. For examples showing other deities, see *CoA* I, 25, 66, 80, 85, pls. xii.2, xxiii.4; II, 48, 66, 76, pl. xxxv.3,5,6; Borchardt and Ricke, *Die Wohnhäuser*, 78, 248, 295. On a stela depicting a private individual, see *CoA* I, 66, 68; Demarée, *The šh ikr n R'-Stelae*, 164, pl. xix.C7.

<sup>94</sup> For example, *CoA* II, 19, 83; Borchardt and Ricke, *Die Wohnhäuser*, 22, 174, 241, 310.

Implements excavated amongst residential areas that were conceivably used in domestic cult include possible sistra and bronze tongs.<sup>95</sup> A link can be suggested between some vessels and cult. These sometimes bear images such as Bes figures, Hathor heads or modelled cobras.<sup>96</sup> Miniature pottery vessels and tall pottery stands are identifiable in a few domestic contexts. Although both vessel types conceivably fulfilled a variety of functions, a cult use for some is suggested by their excavation in defined cult contexts whilst, in religious scenes, the stands are sometimes depicted holding incense and other goods.<sup>97</sup> Shallow bowls with traces of resin, including those with out-turned rims, also occur in residential areas. Although essentially a utilitarian form, the use of such bowls as censers for the burning of incense is attested again in representations of offering scenes.<sup>98</sup> Finally, materials such as plant remains, shell, semi-precious stones and pieces of wax-like substances occur. The original function of these is generally unclear. However, as there is evidence that they could be used in religious contexts, particularly in magical rituals, often in a manner that would leave little trace in the archaeological record,<sup>99</sup> their presence at the site should be noted.

### Interpretations of the archaeological record

In investigating domestic religion from the archaeological record in general, deposits associated with identifiable cult spaces are particularly significant. These can be identified with relative confidence as having entered the archaeological record as a direct result of religious conduct. Such deposits are rare at Amarna, however, and it is necessary to interpret the evidence in terms of its general nature and on the basis of conduct reflected in alternative sources. Thus, whilst a broad picture of the domestic religious system can be obtained, there is little opportunity to examine isolated instances of religious conduct.

<sup>95</sup> Newton, *JEA* 10, 289; *CoA* II, 19, 24, 58 74, 77; Borchardt and Ricke, *Die Wohnhäuser*, 142, 201, 278; P. Lacovara, 'Tongs with Hands', in Freed et al. (eds), *Pharaohs of the Sun*, 251, no. 158.

<sup>96</sup> Kemp, *JEA* 67, 14, fig. 6; P. J. Rose, 'Report on the 1987 Excavations: The Evidence for Pottery Making at Q48.4', in Kemp (ed.), *Amarna Reports* V, 91-2; C. A. Hope, 'Blue-Painted and Polychrome Decorated Pottery from Amarna: A Preliminary Corpus', *CCE* 2 (1991), 17-92.

<sup>97</sup> On miniature vessels, see *CoA* II, 78-9, 82-3, 86-90; Borchardt and Ricke, *Die Wohnhäuser*, 106, 176, 179. On offering stands, see *CoA* I, 103, 105, 108, pls. xxvii.1, xlvi; L. Hulin, 'Pottery Cult Vessels from the Workmen's Village', in B. J. Kemp (ed.), *Amarna Reports*, I (EES Occasional Publications 1; London, 1984), 175; P. J. Rose, 'The Pottery Distribution Analysis', in Kemp (ed.), *Amarna Reports* I, 140; id., 'Pottery from the Main Chapel', in Kemp (ed.), *Amarna Reports* III, 101; Bomann, *Private Chapel*, 9, 11, 15-16. A few intact and fragmentary pottery lamp stands that were possibly tall offering stands were also recorded from the DOG excavations, such as those excavated near the altar in Q46.1 (Borchardt and Ricke, *Die Wohnhäuser*, 26, 175, 325).

<sup>98</sup> N. de G. Davies, *The Rock Tombs of El Amarna, I: The Tomb of Meryra* (EES Archaeological Survey 13; London, 1903), 25, pl. xii; id., *The Rock Tombs of El Amarna, IV: Tombs of Penthu, Mahu, and Others* (EES Archaeological Survey 16; London, 1906), pl. xv; G. Nagel, *La céramique du Nouvel Empire à Deir el Médineh*, I (DFIFAO 10; Cairo, 1938), 176-81; Rose, in Kemp (ed.), *Amarna Reports* I, 140; id., 'The Pottery from Gate Street 8', in Kemp (ed.), *Amarna Reports* IV, 135; M. Serpico and R. White, 'The Botanical Identity and Transport of Incense During the Egyptian New Kingdom', *Antiquity* 74 (2000), 889-90.

<sup>99</sup> For example, J. F. Borghouts, *Ancient Egyptian Magical Texts* (Leiden, 1978), 16-19; M. J. Raven, 'Wax in Egyptian Magic and Symbolism', *OMRO* 64 (1983), 9-32; id., 'Resin in Egyptian Magic and Symbolism', *OMRO* 70 (1990), 10-18.

The archaeological evidence indicates that several types of conduct were undertaken. The occurrence of rituals involving the offering of goods is suggested first by the presence of appropriate emplacements for perishable and non-perishable offerings, particularly offering tables and probably domestic altars. The receptacles built into some of the former might indicate the specific offering of liquids.<sup>100</sup> Traces of whitewash on some altars could reflect simply the ritual purity of the structure, but may also indicate the use of liquid libations. As already noted, some stone basins possibly functioned in rituals involving liquids, perhaps libation or purification rituals; lustration slabs could have been used in similar rites. The small number of identifiable pottery stands constitute potential evidence of offering rituals involving incense. Many vessel types conceivably functioned as containers in offering rituals, such as the bowls with traces of resin. The pottery bowls with three-dimensional cobra figures might have combined a divine image with a receptacle for offerings in a single object. This is supported by the association of the cobra image with several divinities, the occurrence of free-standing cobra figurines that possibly served as cult images, and the wavy rim of the bowls, which suggests that they were intended to hold liquids. Several categories of evidence also occur that were probably used as offerings themselves, such as figurines and items of jewellery. Although individual examples used as such cannot be identified, it is noteworthy that similar objects have been excavated in votive deposits at shrines beyond Amarna,<sup>101</sup> and these were conceivably suitable components of offering rituals in the domestic sphere.

The use of amulets and talismans is presumably reflected in the presence of jewellery and small figures, particularly those with motifs such as divinities, hieroglyphs, animals or body parts. A range of other objects may have been perceived to possess prophylactic properties, although individual examples that functioned as such are again unidentifiable. For example, vessels with motifs such as Bes images and Hathor heads, even if not used directly as elements in religious ritual, might have been understood to possess protective properties in a household context similar to headrests decorated with divinities. Statues, stelae, figurines and ostraca may sometimes have been perceived similarly, whilst domestic reliefs such as those of the Bes images and Taweret figure, and women and girls, were conceivably prophylactic images.<sup>102</sup>

Several types of items occur that could have been used during magical rituals, particularly those that required the manufacture or manipulation of images. Figurines from the site are regularly broken and sometimes show signs of burning, although there is little indication that this resulted from the deliberate breakage or burning during magical rites. The use of figurines and other images as components of magical rituals is well attested in spells, however, and examples are known that record the use of images that occur at Amarna, such as cobra and anthropomorphic figurines.<sup>103</sup> The fact that

<sup>100</sup> Gypsum-coated receptacles that possibly contained ritual liquids or oils were also built into benches in Building 528, part of a chapel complex at the Workmen's Village: Kemp, in Kemp (ed.), *Amarna Reports II*, 43–5, 50, figs. 4.1–5; Bomann, *Private Chapel*, 19, 61.

<sup>101</sup> For example, Pinch, *Votive Offerings*, 160–300.

<sup>102</sup> See Kemp, *JEA* 65, 53, on the possible protective qualities of the latter.

<sup>103</sup> Consider the well-known spell against nightmares in which the use of four clay uraei is prescribed (R. K. Ritner, 'O. Gardiner 363: A Spell Against Night Terrors', *JARCE* 27 (1990), 25–41); and the spell for protection against scorpions preserved primarily in P. Turin 1993, in which Isis models a serpent from the earth (Borghouts, *Ancient Egyptian Magical Texts*, 51–5, no. 84). Anthropomorphic images are also well attested as components of spells, for example, Borghouts, *Ancient Egyptian Magical Texts*, 32, 39, nos. 48, 60–1.

many figurines from the site are hand-modelled, often from materials with potential magical properties such as clay, and unfired, could be explained by their actual manufacture during magical rituals. The inherent magical qualities of small amulets such as scarabs, beads and *wedjat*-eyes also rendered them appropriate components of magical rituals in general.<sup>104</sup> The use of material such as resins and plant matter in magical rituals, and the presence of such material at the site, has been noted. Religious conduct involving the use of such materials was presumably more widespread than can now be recognised.<sup>105</sup>

Some domestic religious conduct at Amarna clearly focused upon cult images and spaces, sometimes probably through the direct worship of the former. This is suggested by the presence of probable cult images and of permanent and temporary cult emplacements. Amongst the corpus of material preserved, statues and stelae of high quality can be identified as the most likely examples of cult images, but figurines, simple stelae, figured ostraca and vessels such as cobra bowls could sometimes have served as such, particularly for those unable to acquire higher quality images. Altars and offering tables constitute the clearest examples of domestic cult spaces, but the limited evidence for smaller niches, pottery offering stands and wooden shrines is noteworthy. The presence of vessels and altar-like constructions that could have served as offering emplacements at some vertical niches and at the painted scene of the females in the Workmen's Village raises the possibility that these also served as cult foci.<sup>106</sup> A greater number and a wider variety of both cult images and emplacements were probably once present than is reflected in the archaeological record. Many examples are likely to have been removed or destroyed, whilst the cult significance of some is likely simply to be unrecognisable. For example, the origin of the stone offering table in the Old Kingdom appears to have been the combination of a *h̥tp*-loaf and a vessel placed on a mat.<sup>107</sup> There is little reason to suppose that the use of mats or baskets for the placement of objects used in religious ritual was completely superseded by the introduction of the offering table. These may have provided an affordable and accessible means of delineating a sacred, relatively clean space within a domestic setting.<sup>108</sup>

Scenes of Amarna houses preserved in a few reliefs are also of significance in this respect. In an Amarna house depicted on a block found at Hermopolis, is a free-standing, rectangular feature with a rounded object, seemingly on top. This is not dissimilar to the hieroglyphic *h̥tp*, although the base is higher; it may represent a stone offering table or altar.<sup>109</sup> In an apparent representation of the house of the official Meryra in his Amarna tomb, a raised shrine-like structure with flared cornice, seemingly approached by steps or ramps with balustrades, is also depicted in the central

<sup>104</sup> For example, Borghouts, *Ancient Egyptian Magical Texts*, 23, 36–7, nos. 30, 55.

<sup>105</sup> Cf. Kemp, *CAJ* 5/1, 26.

<sup>106</sup> *CoA* I, 43; Kemp, *JEA* 65, 49.

<sup>107</sup> C. Kuentz, 'Bassins et tables d'offrandes', *BIFAO* 81 (1981), 244; Bomann, *Private Chapel*, 106.

<sup>108</sup> I am indebted to Barry Kemp for this suggestion. For the *h̥tp* at Deir el-Medina, apparently baskets or mats, see J. J. Janssen, *Commodity Prices from the Ramessid Period* (Leiden, 1975), 160–1; note the relatively low price of some examples. See also Pinch, *Votive Offerings*, 321, on the use of baskets as receptacles for offerings at Hathor shrines.

<sup>109</sup> J. D. Cooney, *Amarna Reliefs from Hermopolis in American Collections* (Brooklyn, 1965), 74–5, no. 47. He identified this as a representation of the service quarters of the Great Palace, but Kemp, *Ancient Egypt*, 298, fig. 100, has interpreted it as a house.



room.<sup>110</sup> Simple wooden stands are shown supporting vessels in representations of Amarna Period houses on *talatat* from Karnak, including some being presented as offerings to the Aten, probably in an outdoor shrine.<sup>111</sup> Such stands could also have been used as portable altars.

The apparent lack of cult emplacements in another possible representation of an Amarna house in the tomb of Mahu serves as a reminder that these were probably not uniform features,<sup>112</sup> and that domestic religion is unlikely to have always focused upon defined physical spaces. Indeed, whilst the offering of votive goods or the undertaking of magical rites was probably often done at defined cult spaces, other forms of religious conduct were presumably constrained to a lesser degree by physical boundaries. The wearing of amuletic items of jewellery illustrates this.

Attempts to identify the divinities associated with domestic religious conduct at the site are complicated by the fact that whilst divinities are sometimes represented or named directly on the material, this is not always the case. Interpretations of the domestic altars have generally been polarised between their association with the royal family and Aten and, less frequently, with the cults of traditional, 'minor' deities, particularly those linked with human fertility.<sup>113</sup> There has also been a tendency to assign a single interpretation to the altars as a whole in terms of the divinities venerated. The imagery of the Panehesy altar indicates a clear association with the cult of the royal family and Aten, whilst the east-west orientation of some mud-brick altars may reflect a similar link with the solar cult, as was noted by Borchardt. It is also noteworthy that open-air, stepped podiums are features of 'Sunshades of Re', or Re-Chapels,<sup>114</sup> whilst at Amarna itself, podiums with a ramp or staircase appear frequently in official cult and ceremonial contexts, as throne platforms, Windows of Appearance and altars. The latter include examples in probable 'Sunshades of Re', which may have been associated particularly with female members of the royal family at the site.<sup>115</sup> This suggests a potential link between the stepped domestic altars and solar cults in general, or the official Aten cult of the Amarna Period specifically. Simple, unstepped altars also occur in official cult contexts at Amarna.<sup>116</sup> The possibility that the state had considerable

<sup>110</sup> Davies, *El Amarna* I, 38–9, pls. xxv, xxxiii.

<sup>111</sup> C. Traunecker, 'Les maisons du domaine d'Aton à Karnak', *CRIPÉL* 10 (1988), 74–5, 81–5, figs. 1–3.

<sup>112</sup> See Davies, *Rock Tombs* IV, 17, pls. xxv, xxviii, although note that the scene is not preserved fully.

<sup>113</sup> On the link with the former, see Borchardt, *Porträts*, 20–4; Aldred, *Akhenaten and Nefertiti*, 102, 130, 168; Assmann, *JNES* 31, 153; id., *SAK* 8, 26; R. Stadelmann, 'Altar', *LÄ* I, 146; Crocker, *JEA* 71, 56 (although see Crocker, 'Uses of Space in Amarna Architecture: Domestic and Royal Parallels', *BACE* 3 (1992), 15); Krauss, *Jahrbuch der Berliner Museen* 33, 35–6; Friedman, in Lesko (ed.), *Pharaoh's Workers*, 110–11. For their association with traditional cults, see Pinch, *Votive Offerings*, 216; Robins, in Boymel Kampen (ed.), *Sexuality in Ancient Art*, 29–30.

<sup>114</sup> R. Stadelmann, 'šwt-R'w als Kultstätte des Sonnengottes im Neuen Reich', *MDAIK* 25 (1969), 159–78; P. A. Spencer, *The Egyptian Temple: A Lexicographical Study* (London, 1984), 121–5; B. J. Kemp, 'Outlying Temples at Amarna', in Kemp (ed.), *Amarna Reports* VI, 454–5.

<sup>115</sup> On stepped podiums, see Davies, *Rock Tombs* I, 30, 39, pls. x.A, xii, xxxii; B. J. Kemp, 'The Window of Appearance at el-Amarna, and the Basic Structure of this City', *JEA* 62 (1976), 89; id., in Kemp (ed.), *Amarna Reports* VI, 454–5; I. Shaw, 'Balustrades, Stairs and Altars in the Cult of the Aten at el-Amarna', *JEA* 80 (1994), 109–27. On 'Sunshades', see W. H. Fairman, 'The Inscriptions', in *CoA* III, 200–8; Stadelmann, *MDAIK* 25, 162–6; and Kemp, in Kemp (ed.), *Amarna Reports* VI, 454–5, 458–61.

<sup>116</sup> Davies, *Rock Tombs* I, 41, pls. x.A, xi–xii, xxv, xxvii–xxviii, xxxii–xxxiii; *CoA* III, 15–16, pl. iv.

influence on the design of houses at the site also exists.<sup>117</sup> This could indicate that, if erected at the time of construction of the house, the altars were at least intended to be associated with the official cult.

Conversely, both stepped and unstepped altars occur in contexts that did not necessarily have links with the official religious doctrine of the Amarna Period or with solar cults in general. For example, altars in houses of Second Intermediate Period to Eighteenth Dynasty date at Lisht took the form of simple, unstepped platforms. Altars in some houses at Medinet Habu, apparently of late Eighteenth Dynasty and Third Intermediate Period date, were stepped, as were the *lits clos* at Deir el-Medina.<sup>118</sup> This raises the possibility that some mud-brick altars were erected as 'generic' cult emplacements, suitable for a range of cult, rather than imitations of official cult structures or simplified versions of the Panehesy-type of shrine. Further support for this can be found in the fact that they were not open to the sun and were not always oriented east-west.<sup>119</sup>

The decoration preserved on the vertical niches suggests that if these did possess cult significance, at least some were associated with the royal family or Aten. Although additional scenes relating to the royal family and Aten may have been destroyed, it cannot be assumed that all niches with traces of decoration originally bore such scenes. Given the parallels with false doors in funerary contexts, the possibility that some were associated with funerary or ancestor cults should be considered. It is impossible to determine whether the smaller niches, if used for religious purposes, were cult-specific. There is also little indication in the decoration of offering tables found amongst residential areas that these were intended to serve particular cults. It is noteworthy that they generally lack the inscriptions relating to the royal family and Aten present on at least some offering tables from state complexes in the Central City, and on some offering tables held by statues of the royal family.<sup>120</sup> If the identification of the wooden uraei as fragments of shrines is correct, the excavation of the uraeus-topped shrine at the House of the King's Statue and the scenes depicting the royal family within shrines with uraeus friezes are noteworthy.<sup>121</sup> However, representations of both deified royalty and other deities in shrines with uraeus friezes in Eighteenth and Nineteenth Dynasty private tombs could indicate that the three-dimensional versions were not associated exclusively with the official cult during the Amarna Period.<sup>122</sup>

<sup>117</sup> Cf. Traunecker, *CRIPEL* 10, 92–3.

<sup>118</sup> A. C. Mace, 'Excavations at Lisht', *BMMA* 16 (1921), 12, fig. 2; U. Hölscher, *The Excavation of Medinet Habu*, II. *The Temples of the Eighteenth Dynasty* (OIP 41; Chicago, 1939), 68–9, figs. 54, 56; id., *The Excavation of Medinet Habu*, V. *Post-Ramessid Remains* (OIP 66; Chicago, 1954), 7, fig. 6, pl. 6.i; Bruyère, *Rapport* (1934–1935), 61–4.

<sup>119</sup> Although the garden shrines at the site are also not always so oriented. Ikram, *JEA* 75, 101, has suggested this may be explained by their dedication to the royal family, instead of the Aten. Note also Kemp's observation, in Kemp (ed.), *Amarna Reports* VI, 455, that stepped platforms at Amarna have been found to be 'frequently and unexpectedly oriented towards the north and south'. There could also have been a greater degree of flexibility in the orientation of solar shrines in private contexts than in the official cult sphere.

<sup>120</sup> See *CoA* III, 67, 81, pl. lxiv.4–6.

<sup>121</sup> On the latter, see Davies, *Rock Tombs* I, pl. vii; id., *The Rock Tombs of El Amarna*, II: *The Tombs of Panehesy and Meryra II* (EES Archaeological Survey 14; London, 1905), pls. xxxii–xxxiv.

<sup>122</sup> See J. Vandier, *Manuel d'archéologie égyptienne*, IV (Paris, 1964), 544–71; S. Johnson, 'Uraeus Statuettes', in S. D'Auria, P. Lacovara and C. H. Roehrig (eds), *Mummies and Magic: The Funerary Arts of Ancient Egypt* (Boston, 1988), 144.

Therefore, although the preserved decoration of a small number of cult emplacements indicates that they were intended to serve the cult of the royal family and Aten, there is little surviving evidence that the majority were cult-specific installations. If they were actually perceived as generic installations by the residents of the city, associations with particular cults were presumably conveyed primarily through the erection of cult images. In turn, there may have been considerable variation in the conduct undertaken at similar emplacements located in different households at the site and at individual emplacements on different occasions.

The royal family and Aten are the most frequently represented subject matter which most likely acted as cult images. A small number of statues and stelae that possibly served as cult images relating to other divinities also occur. If objects such as figurines, ostraca and vessels were sometimes worshipped directly, the number of cult images associated with the latter would be increased. Potential foci for royal ancestor cults include statues of Eighteenth Dynasty royalty and the well-known stela depicting Amenhotep III and Tiye (BM EA 57399). These have been discussed most recently by Johnson.<sup>123</sup> In addition, a number of objects appear to have served as foci of private ancestor cults. A stela excavated opposite Main Street 4 at the Workmen's Village has been identified by Demarée as an *ꜥḥ iqr n Rꜥ*-stela.<sup>124</sup> Amongst the sculpture fragments recovered from P47.4, a house complex located in the vicinity of the workshops of the sculptor Thutmose, were fragments of the back half of a chalkstone anthropoid bust, now reconstructed in the Ägyptisches Museum und Papyrussammlung, Berlin (25847; pl. IX, 3). The figure wears a long, straight wig and, although the top of the head is not preserved, it does not appear to have worn a crown or other royal headwear. It measures 17.6 cm in height and is 12.0 cm wide.<sup>125</sup> It does not resemble the other royal busts excavated at the site,<sup>126</sup> but is similar to the anthropoid busts known from Deir el-Medina and elsewhere. There is some debate over the function of the latter, but they are generally thought to have been associated at least in part with private ancestor cults.<sup>127</sup> At T35.4 in the North Suburb, an 18 cm high limestone figure of a seated man wearing a kilt and holding a lotus flower across his chest was discovered. A similar statuette of a seated male in a kilt and clasping a lotus bud against his chest measuring 8.9 cm in height appears to have been excavated in the North City.<sup>128</sup> In contrast to that from

<sup>123</sup> W. R. Johnson, 'Amenhotep III and Amarna: Some New Considerations', *JEA* 82 (1996), 72–80. On the inscriptional evidence for 'houses', 'mansions' and 'sunshades' of Eighteenth Dynasty royalty at the site, see Fairman in *CoA* III, 199–205.

<sup>124</sup> Demarée, *The ꜥḥ iqr n Rꜥ-Stelae*, 164, pl. xix.c7. Note also the votive stelae from the tomb of Any that attest to at least the commemoration of this individual (Davies, *Rock Tombs* V, 9–11, pls. xxi–xxiii; Kemp, *Ancient Egypt*, 304).

<sup>125</sup> The bust was recorded in the excavation report as the 'hintere Hälfte einer Büste' (Borchardt and Ricke, *Die Wohnhäuser*, 102, exc. no. 1912/13,601). It was examined in the museum magazine by the author in May 2000, and I am grateful again to Prof. Wildung and the Ägyptisches Museum und Papyrussammlung for permission to discuss it here.

<sup>126</sup> See W. Kaiser, 'Zur Büste als einer Darstellungsform ägyptischer Rundplastik', *MDAIK* 46 (1990), 280–3, pls. 65–6.

<sup>127</sup> J. L. Keith-Bennett, 'Anthropoid Busts: II. Not from Deir el Medineh Alone', *BES* 3 (1981), 43–72; Kaiser, *MDAIK* 46, 270–2; Friedman, *JEA* 71, 82–97; id., in Lesko (ed.), *Pharaoh's Workers*, 114–17. The excavation of a 'Frauenbüste' at P47.4 might also be noteworthy; see Borchardt and Ricke, *Die Wohnhäuser*, 102, exc. no. 1912/13,576.

<sup>128</sup> See *CoA* II, 43, pl. xxxvii.1–4, on the former; and T. Whittemore, 'The Excavations at el-'Amarna, Season

T35.4, it is not sculpted in the Amarna style. It has been proposed that these statuettes were placed in domestic shrines,<sup>129</sup> but their function can possibly be identified more closely. They appear to belong to a group of sculptures suggested to be three-dimensional representations of figures on *šh iqr n R<sup>c</sup>*-stelae and possible forerunners to the ancestor busts. These are typically in the form of seated figures holding lotus flowers to their chests.<sup>130</sup> A headless figurine of a seated individual, probably male, from U33.1, might also be of this type.<sup>131</sup>

Amongst material such as figurines and models, small stelae of relatively low quality, ostraca and items of jewellery, the quantity of objects that can be associated with divinities other than the Aten and royal family increases. Bes, Hathor, Taweret and probably one or more cobra deities feature most prominently on such material from residential areas, but other cults appear in a more limited quantity and range of evidence, including Amun, Anukis, Heqet, Min, Serqet and Thoth.<sup>132</sup> At least fifteen pendants in the shape of anthropoid busts have also been excavated at the Workmen's Village, North Suburb, Main City, Central City and Kom el-Nana, although not always within houses.<sup>133</sup> Pendants of this form are generally thought to be related to the larger bust sculptures,<sup>134</sup> and comprise further evidence of an ancestor cult.

Little material beyond architectural spaces and cult images can be related directly to the official cult, although the names or images of members of the royal family and the names of the Aten do appear on objects such as jewellery and vessels.<sup>135</sup> The presence

1924-5', *JEA* 12 (1926), 12, pl. viii, on the example from the North City. Both statuettes have been published recently with colour photographs by R. E. Freed, in Freed et al. (eds), *Pharaohs of the Sun*, 255, nos. 172-3.

<sup>129</sup> Freed, in Freed et al. (eds), *Pharaohs of the Sun*, 255, nos. 172-3; E. Pischikova, in Freed et al. (eds), *Pharaohs of the Sun*, 255, no. 174.

<sup>130</sup> A. R. Schulman, 'Some Observations on the *šh iqr n R<sup>c</sup>*-Stelae', *BiOr* 43 (1986), 307-8; J. R. Ogdon, 'A Fragmentary New Kingdom Statue at Buenos Aires', *GM* 119 (1990), 65-72; Friedman, in Lesko (ed.), *Pharaoh's Workers*, 113, 179, n. 55.

<sup>131</sup> This figure, preserved to a height of 4 cm, appears to hold an elongated object to its face (*CoA* II, 72, pl. xlv.7).

<sup>132</sup> Bomann, *Private Chapel*, 57-79, suggested that the deities worshipped at the private chapels probably included Amun, Aten, Hathor, Isis, Min, Nut, Re, Re-Harakhty, Renenutet, Shed and Wepwawet. Only the cults of Amun, Aten, Isis and Shed are represented by inscriptional evidence.

<sup>133</sup> *CoA* II, 84, 86, 92, 96; III, 85, 104; Borchardt and Ricke, *Die Wohnhäuser*, 89, 166. EES Amarna Archive object registration card 24-5/15 also seems to record a pendant of this form; I would like to thank the EES for permission to mention it here. In addition, object numbers 1789, 2998, 3364, 4665 and 30250 from the current EES excavations at the site are pendants of this form. These were examined on site by the author in May 2000, and I am again grateful to the EES and to Barry Kemp for permission to list them here. All originate from the grounds immediately south of the Workmen's Village, apart from 30250, which was excavated at Kom el-Nana. Petrie, *Tell el-Amarna*, pl. xvii.277-8, also illustrated an anthropoid bust amulet and mould from the site; see Keith-Bennet, *BES* 3, 44-5. Pendants thought to have originated from Amarna are in the Petrie Museum (U.C. 2400: Keith-Bennett, *BES* 3, 45), Hunterian Museum and Art Gallery (D.1925.35) and Egyptian Museum, Cairo (Amarna Room, Case 55525), whilst moulds are in the Petrie Museum (U.C. 2031) and Ashmolean Museum (1893.1-41(684)). Some of these may provide additional examples to those mentioned in the excavation records.

<sup>134</sup> Keith-Bennett, *BES* 3, 46, 52-4, 63.

<sup>135</sup> I. Shaw, 'Ring Bezels at el-Amarna', in Kemp (ed.), *Amarna Reports* I, 124-32; E. Shannon, 'Ring Bezels with Royal Names at the Workmen's Village', in Kemp (ed.), *Amarna Reports* IV, 154-9; Borchardt and Ricke, *Die Wohnhäuser*, 18, 174, 185. On jewellery with the names of deceased rulers such as Amenhotep II and Thutmose III, again potential evidence of royal ancestor cults, see Shannon, in Kemp (ed.), *Amarna Reports* IV, 156.

of a royal name could indicate simply that an object was manufactured in a state workshop,<sup>136</sup> or was distributed on an official occasion, but such material may nonetheless have been considered to possess amuletic properties or to be an appropriate component of rituals. In the state sphere, the Aten was provided with offerings such as flowers, incense, food and gifts in the shape of cartouches of the god, whilst the Aten is depicted offering symbols including *w3s*- and *ḥh*-signs and images of uraei to the royal family.<sup>137</sup> The extent to which knowledge of images connected with the official cult spread into the private realm and to which their use was considered appropriate in the latter is unclear. It is conceivable, though, that material incorporating motifs such as these, and hence a greater quantity of material beyond cult images and spaces, was originally linked with the cult in the private domestic sphere.

### Conclusions

Although the quantity of material from Amarna that can be linked with absolute confidence to domestic religion is limited, particularly in comparison to that excavated at Deir el-Medina, there is a greater quantity and variety of potential evidence than is often recognised. The material suggests that a range of domestic religious activity occurred at the site. This included the offering of perishable and non-perishable goods. The exact manner in which these were used is difficult to isolate, but goods could have been offerings to sustain a cult image or votive gifts to a divinity, with some perhaps used in rituals intended to purify cult images, spaces or participants. Other forms of activity probably included the use of amuletic images and the undertaking of magical rituals. Domestic religious conduct sometimes focused upon defined cult spaces and images, probably with the worship of the latter, but this is unlikely always to have been the case.

Although the explicit presence or direct influence of a divinity was probably not required in all forms of religious conduct, in other cases divinities were clearly involved. The material evidence relating to the cult of the royal family and Aten, and to a lesser degree that of traditional deities, has long been recognised. The presence of a private ancestor cult at the site has been suggested,<sup>138</sup> but there is a greater quantity and variety of evidence for this than recognised previously. It is possible to envisage a number of scenarios under which additional material relating to such a cult has been removed or is unidentifiable, particularly if its material components extended beyond images of the deceased and included generic cult objects.<sup>139</sup>

<sup>136</sup> Cf. Pinch, *Votive Offerings*, 329.

<sup>137</sup> Davies, *El Amarna I*, 25, 29, pls. x.a, xxviii; II, pls. v, xii; IV, 19, pls. xxxi, xliv; id., *The Rock Tombs of El Amarna*, VI: *Tombs of Parennefer, Tutu, and Ay* (EES Archaeological Survey 18; London, 1908), 4, pl. iv; A. M. Blackman, 'A Study of the Liturgy Celebrated in the Temple of the Aton at el-Amarna', in *Recueil d'études égyptologiques dédiées à la mémoire de Jean-François Champollion* (Paris, 1922), 517–23; C. Aldred, 'The Beginning of the el-'Amarna Period', *JEA* 45 (1959), 24–5.

<sup>138</sup> Bomann, *Private Chapel*, 58, 68, 74, proposed that ancestor cults figured prominently at the private chapels at the Workmen's Village, on the basis primarily of the occurrence of such cults at Deir el-Medina, and the fact that whilst the chapels appear to be connected with the funerary sphere, their large number in relation to tombs suggests they were not all funerary chapels. See also Demarée, *The 3ḥ ikr n R<sup>c</sup>-Stelae*, 164; Kemp, *Ancient Egypt*, 305.

<sup>139</sup> Consider the possibility that fertility figurines excavated in the outer areas of tombs were offerings to the dead (Pinch, *Votive Offerings*, 218).

There was at least the facility for conduct that focused directly upon cult images of the royal family and Aten in some houses. However, the presence of images of traditional deities and private ancestors, and the likelihood that some cult emplacements were generic installations suggests that such behaviour was not restricted to the royal family and Aten. It can be implied from the relative prominence of Bes, Taweret and Hathor on personal items such as jewellery, and the occurrence of Bes and Taweret on a domestic relief, that they were favoured as protective images. The anthropoid bust pendants seem to indicate that private ancestors were sometimes also perceived as sources of protection for the individual, whilst the possibility that the royal family and Aten were sometimes viewed similarly must remain, given their presence on items of jewellery in particular.

It is generally inappropriate to comment on the popularity of particular types of conduct on the basis of archaeological data, as the degree to which evidence has been preserved and can now be identified is unlikely to be uniform. The same is true regarding assessments of the popularity and roles of particular divinities. Given the problems dating the material, it is also largely unclear whether there were differences in the prominence of certain cults or types of conduct during specific periods within the phase of occupation under Akhenaten and Tutankhamun. This is particularly true for cults and forms of conduct reflected in a limited amount of material or predominantly on portable objects.

Hence, the impact of Akhenaten's religious reforms on domestic religion is difficult to assess from the archaeological record. The significance of the Amarna material for understanding these reforms cannot be discussed fully here, but it is noteworthy that many aspects of the domestic religious system reflected in it can be paralleled at other sites, such as Deir el-Medina. The range of conduct reflected is similar to that attested at Deir el-Medina, whilst the types of divinities represented can also be paralleled to an extent, particularly when the evidence of a private ancestor cult is included.<sup>140</sup> This raises the possibility that at Amarna, Akhenaten's religious reforms did not penetrate the existing domestic religious system to the extent that is sometimes suggested.

These parallels also increase the significance of the Amarna material as a source for domestic religion in general in New Kingdom Egypt. In particular, the range of conduct at the site and the potential variation in the degree to which forms of conduct required a strict physical focus are presumably of wider relevance. There are also two broader features of domestic religion conveyed by the archaeological record at Amarna that are of note in this respect. The first is a sense that domestic religious and secular conduct interacted to a significant degree. This is reflected in the evidence for behaviour such as the wearing of amulets or talismans, in which minimal physical or conscious effort of the human participant was required, and which would leave them able to participate physically and consciously in secular activity. It is also suggested by the incorporation of religious imagery on items of daily use such as headrests, and in the presence of objects and emplacements that potentially functioned in both the secular and religious realms, including vessels and perhaps lustration slabs. The overall association between identifiable, permanent cult emplacements such as altars and the central room is also significant. This room has generally been viewed as a focus of communal, possibly

<sup>140</sup> See Friedman, in Lesko (ed.), *Pharaoh's Workers*, 95–117; J. F. Borghouts, 'Magical Practices among the Villagers', in Lesko (ed.), *Pharaoh's Workers*, 119–30.

family-oriented, activity, although highly mundane tasks were presumably undertaken beyond its limits when space allowed.<sup>141</sup> The possession of the altars such as they survive appears to have been the prerogative of those of relatively high socio-economic status,<sup>142</sup> and their location in an area in which they would have been noticed by visitors could have been prompted in part by status-related concerns. Nonetheless, the lack of strict delineation between cult and secular space in these houses is noteworthy. A sense of integration with secular conduct has again been identified as a feature of domestic religion at Deir el-Medina.<sup>143</sup>

The second overall feature is a sense of variation in conduct across households at the site. The possibility that most emplacements were not cult-specific and that a variety of potential images could have been erected at these installations has been cited as evidence for such variation. This variety may also be reflected in the differences in the location of cult emplacements. Although these frequently occur in the central room, this is not always the case. One interpretation of the presence of altars in rooms of their own, for example, is that in these houses religious conduct was segregated from general household activity to a greater degree than in those where the altar was located in the central room. The factors that caused such differences are difficult to identify, but possibly included social aspects and more pragmatic elements, such as the amount of space available in the home.

By clarifying the material evidence for domestic religion at Amarna, it is possible to increase understanding of the associated divinities, and also of the range of conduct undertaken at this site. When parallels are then drawn between the Amarna material and that at Deir el-Medina in particular, the significance of the former as a source of information for Akhenaten's religious reforms and for domestic religion in general in the New Kingdom is enhanced. This process of clarification, comparison and interpretation of the Amarna material has not been exhausted, but if its full potential is to be realised, it will be necessary for there to be greater consideration of domestic religion and its material manifestations at other settlement sites.

<sup>141</sup> See B. J. Kemp, 'The Character of the South Suburb at Tell el-'Amarna', *MDOG* 113 (1981), 82-4; id., *Ancient Egypt*, 295-7; Crocker, *JEA* 71, 60; id., *BACE* 3, 14-17.

<sup>142</sup> Cf. Crocker, *JEA* 71, 56, 63, Table 2; I. Shaw, 'Ideal Homes in Ancient Egypt: The Archaeology of Social Aspiration', *CAJ* 2/2 (1992), 161.

<sup>143</sup> Meskell, *Journal of Archaeological Method and Theory* 5/3, 237-9.



1. Three-quarter view



2. Full-face

Head with the Blue Crown, private collection, Germany (photographs courtesy of the Staatliches Museum Ägyptischer Kunst, Munich).

ICONOGRAPHY OF THE BLUE CROWN IN THE NEW KINGDOM (pp. 117–41)



3. Reconstructed back of an anthropoid bust from P47.4 (ÄMP 25847).

THE MATERIAL EVIDENCE FOR DOMESTIC RELIGION AT AMARNA AND PRELIMINARY REMARKS ON ITS INTERPRETATION (pp. 143–63)



# A NEW MILITARY SITE ON 'THE WAYS OF HORUS'— TELL EL-BORG 1999–2001: A PRELIMINARY REPORT\*

By JAMES K. HOFFMEIER and MOHAMED ABD EL-MAKSOUH

This is a preliminary report of the archaeological excavations at Tell el-Borg, North Sinai, from 1999–2001. Tell el-Borg is a New Kingdom military site on Egypt's frontier with Sinai and was most likely one of the forts on the 'Ways of Horus'. Blocks from a temple of Ramesses II were uncovered, as well as tombs from the late Eighteenth to early Nineteenth Dynasties. Two separate mud-brick forts were also uncovered that appear to date to the Eighteenth and Nineteenth Dynasties respectively.

THE military road across North Sinai connecting Egypt to the Levant has been the subject of scholarly investigation since the early part of the twentieth century.<sup>1</sup> Sir Alan Gardiner made the first systematic attempt to identify this route by linking the sequence of toponyms on the so-called 'Ways of Horus' from the battle reliefs of Seti I at Karnak and the itinerary outlined by the scribe in P. Anastasi I with the known *tells* in North Sinai.<sup>2</sup> Gardiner proposed that Tjaru, the key frontier town and fort of Egypt, was Tell

\* The excavations at Tell el-Borg are a part of the East Frontier Archaeological Project concentrating its research on understanding Egypt's frontier with Sinai. James K. Hoffmeier, director of the project, is Professor of Near Eastern Archaeology at Trinity International University, which is the academic sponsor. The Harvey L. Miller Family Foundation has provided the financial backing since 1999. The support of both institutions is greatly appreciated. This article is a collaborative effort, with contributions by several team members. The architectural drawings are by James E. Knudstad who also supervised the work in Fields I and IV. Work in Field III in 2000 was supervised by Thomas Davis and by Scott Haddow in 2001, and work in Field II was supervised by Greg Mumford in 2001. All other artwork was produced by Lyla Pinch Brock. Photography for this article was done by Heather Alexander, Harvey L. Miller and Jessica Hoffmeier. Stephen Moshier (Associate Professor of Geology, Wheaton College) is the project's geologist who is directing the paleo-environmental study of the region. In 2001, he was joined by Ali el-Kalany of the Egyptian Geological Survey, and assisted by Lauren Powell, a recent graduate of geology at Wheaton College. Kenneth A. Kitchen, our epigraphic consultant, has studied the textual materials and offered his transcriptions, translations and comments, some of which are cited here with his permission. Valerie Broucek, a project member, assisted in preparing the illustrations for this publication.

We need to offer our thanks to our colleagues in the Supreme Council for Antiquities whose assistance and support since 1998 has been outstanding. Special thanks to Mohammed Abdul Semie, Mohammed Abdul Fatah, Rifaat Gindy, Mahmoud Mansour, Sayed Abdul Aleem and Hisham Hussein. Our colleague and collaborator in this effort, Mohamed Abd el-Maksoud, has been a true partner in our work since the beginning. He first interested us in work in Sinai in 1988 when he invited us to work in the region. His abiding interest in the history of Egypt's eastern frontier has continued to inspire us.

<sup>1</sup> Cf. C. Küthmann, *Die Ostgrenze Ägyptens* (Leipzig, 1911).

<sup>2</sup> A. H. Gardiner, 'The Ancient Military Road between Egypt and Palestine', *JEA* 6 (1920), 99–116. For a recent study of this travel route during the Ptolemaic through Byzantine Periods, see P. Figuera, *From Gaza to Pelusium: Materials for the Historical Geography of North Sinai and Southwestern Palestine (332 BCE–640 CE)* (Beer Sheva, 2000).



Abu Sefeh (3 km east of Qantara East), that 'The Dwelling of the Lion' (or Sese) was possibly Tell Habwe<sup>3</sup> (not Tell Hebua located 7 km north-northeast of Tell Abu Sefeh) and that the third in the sequence, 'Migdol Menmaatre', was at Tell el-Herr (fig. 1). In the 1880s, F. Ll. Griffiths discovered some inscribed blocks of Seti I and Ramesses II at Tell Abu Sefeh that contributed to the belief that it was Sile (Tjaru).<sup>4</sup> He also reported having dug a few trenches which revealed only Roman Period remains,<sup>5</sup> a factor that unfortunately was not taken seriously by the subsequent generations of scholars who have sought to identify this site. Beyond this brief investigation, little archaeological work was undertaken in this area in the next century due largely to the military activity in Sinai from the 1940s to the early 1980s. Over the decades, Gardiner's reconstruction was widely accepted, but unverifiable and largely unchallenged.

During the Israeli military occupation of Sinai after the 1967 war, a systematic archaeological survey of North Sinai was conducted by Eliezer Oren between 1972 and 1982. He identified more than 150 New Kingdom sites of varying sizes between the Suez Canal and Gaza.<sup>6</sup> His excavations of New Kingdom sites were primarily focused in the el-Arish area, viz. Bir el-Abd (site BEA 10) to its west and Haruba (sites A-289 and A-345) to its east.<sup>7</sup> One site briefly excavated by Oren in the Qantara-Baluzza region was Tell Qedua (T 21), which has only produced seventh and sixth century BC remains.<sup>8</sup> He also visited Tell Abu Sefeh where he collected pottery from the surface and made some soundings. The earliest materials encountered were Persian and 'a few specimens of the Saite period'.<sup>9</sup>

While Oren's survey of the Qantara region identified some New Kingdom sites, none was excavated. Therefore, not until the excavations of Mohamed Abd el-Maksoud of the Supreme Council for Antiquities (SCA) at Hebua I in the mid-1980s was the first New Kingdom site, with a massive fortification system, discovered. Tjaru should be a region, which had a city by the same name, along with its fort (*Htm n Trw*).<sup>10</sup> While all

<sup>3</sup> This site is likely Tell el-Ahmar as named by the Egyptian Antiquities Organization, cf. anon. 'Projet de sauvetage des sites antiques du Nord-Sinai', *DE* 24 (1992), 7-12. In W. M. F. Petrie, *Tanis*, II. *Nebesheh (Am)*, and *Defenneh (Tahpanhes)* (MEEF 4; London, 1888), 97-108.

<sup>4</sup> Petrie, *Tanis* II, 97-108. The inscriptions are available in K. A. Kitchen, *Ramesside Inscriptions*, I (Oxford, 1975), 105-7 and II, 402-3, and commented upon in K. A. Kitchen, *Ramesside Inscriptions Translated and Annotated: Notes and Comments*, I (Oxford, 1993), 13-14.

<sup>5</sup> Petrie, *Tanis* II, 97-8.

<sup>6</sup> E. Oren, 'The "Ways of Horus" in North Sinai', in A. F. Rainey (ed.), *Egypt, Israel, Sinai: Archaeological and Historical Relationships in the Biblical Period* (Tel Aviv, 1986), 76; id., 'Sinai', in E. Stern (ed.), *The New Encyclopedia of Archaeological Excavations in the Holy Land* (New York, 1993), IV, 1388.

<sup>7</sup> Oren, in Rainey (ed.), *Egypt, Israel, Sinai*, 77-112.

<sup>8</sup> E. Oren, 'Migdol: A New Fortress on the Edge of the Eastern Nile Delta', *BASOR* 256 (1984), 7-44. He proposed that this was 'Migdol' mentioned in the biblical books of Jeremiah (44:1) and Ezekiel (29:10 and 30:6) which is spoken of as Egypt's frontier town, but, owing to the absence of earlier materials, he believed that Migdol of New Kingdom times and the biblical exodus tradition (Exodus 14:2) must be found elsewhere. Donald Redford excavated a few seasons at Kedula during the 1990s ('Report on the 1993 and 1997 Seasons at Tell Qedwa', *JARCE* 25 (1998), 45-60).

<sup>9</sup> Oren, in Rainey (ed.) *Egypt, Israel, Sinai*, 113, n. 3.

<sup>10</sup> M. Abd el-Maksoud, *Tell Heboua (1981-1991): Enquête archéologique sur la Deuxième Période Intermédiaire et la Nouvel Empire à l'extrémité orientale du Delta* (Paris, 1998). Initially, he thought that Hebua was the second fort in the Seti I sequence, 'The Mansion of the Lion', in *Abstracts of the Fifth International Congress of Egyptology*, 4-5 (see n. 14 here) and 'Une nouvelle forteresse sur la route d'Horus Tell Heboua 1986 (Nord-Sinai)', *CRIPPEL* 9 (1987) 13-16, but now the evidence favours Hebua I being the fortress Tjaru; see M. Abd el-Maksoud, 'Tjaru porte de l'Orient', in D. Valbelle (ed.), *Le Sinai* (Lille, 1998), 61-5.

the archaeological evidence hinted at Hebua being the city of Tjaru, the matter was settled in May 1999 when a Ramesside Period sandstone statue was discovered by Abd el-Maksoud's team at Hebua I within a New Kingdom temple. Fortunately, the two principal writers of this article were able to examine the statue together on the day it was discovered and we were able to confirm the writing of Tjaru on it.<sup>11</sup> Consequently, this site can now be identified confidently with the long-sought Tjaru, the starting point of the military road to Canaan as recorded in P. Anastasi I, the *Annals of Thutmose III* and other historical texts. The specific direction of the route from Tjaru eastwards has remained uncertain.<sup>12</sup> On the other hand, Tell Abu Sefeh and Tell el-Herr have been excavated in recent years, and they have revealed no New Kingdom remains.<sup>13</sup> Consequently, Tell Abu Sefeh cannot be associated with Tjaru, and Gardiner's 'Military Highway' has to be significantly revised. The recent excavations at Tell el-Borg, we believe, will shed new light on this matter.

### Reconnoitering in North Sinai: 1994–8

Following the appeal by the SCA at the International Congress of Egyptologists at Turin in 1991 to assist with the salvage effort in North Sinai because of the threat posed to the archaeological sites by the As-salam irrigation project, an initial visit to the Qantara region was made in the spring of 1994 by project members.<sup>14</sup> Initially, the research focused upon the so-called 'East Frontier Canal' which had been discovered by Israeli geologists in the early 1970s.<sup>15</sup> The canal's date, its route and the relationship between it and Egypt's frontier defense system were questions we were interested in pursuing. Another important issue was to investigate whether the toponym *T3 dnit* (a canal?) depicted in the Seti I relief at Karnak was the feature discovered by the Israeli geologists. Two further visits to the region in 1995 and 1998 were made, but the rapid development in the area had largely obliterated the canal traces that the Israeli team had seen over twenty years earlier.<sup>16</sup> Our study of the region was aided by Corona satellite

<sup>11</sup> Publication of the statue is in preparation by M. Abd el-Maksoud and should appear in a forthcoming issue of the *BIFAO*.

<sup>12</sup> In 1997, Hoffmeier had proposed that the route ran due east along the dune ridge on which Hebua I is situated (*Israel in Egypt* (New York, 1997), fig. 2). Now, in the light of the work at Tell el-Borg, the regional study of the paleo-lagoon to its east, and the dune ridge to the north, it is clear for archaeological and geological reasons that the military road did not follow the dune ridge.

<sup>13</sup> For Tell el-Herr, see D. Valbelle and G. Nogara, 'La forteresse du IV<sup>e</sup> siècle avant J.-C. à Tell el-Herr (Nord-Sinaï)', *CRIPPEL* 21 (2000), 53–66; D. Valbelle, 'A First Persian Period Fortress at Tell el-Herr', *EA* 18 (Spring 2001), 12–14. Publication of the finds at Tell Abu Sefeh are in progress, but first-hand briefings on the site by its various excavators between 1995 and 2001 is the basis for the conclusion mentioned here. Information was kindly provided by Mohamed Abd el-Maksoud and Mohamed Kamal on the preliminary results of their work, and only Graeco-Roman Period remains have been documented.

<sup>14</sup> Hoffmeier became interested in the archaeology of this region during the 1988 Congress in Cairo when he met Mohamed Abd el-Maksoud, who had reported on his excavations at Tell Heboua (cf. 'Egyptian Excavations on the "Way of Horus": Tell Heboua North Sinai (1986–8)', in *Abstracts of the Fifth International Congress of Egyptology*, 4–5). He encouraged Hoffmeier to come work in North Sinai, and gave him a copy of his article, 'Une nouvelle forteresse sur la route d'Horus Tell Heboua 1986 (Nord-Sinaï)', *CRIPPEL* 9 (1987), 13–16.

<sup>15</sup> A. Sneh, T. Weissbrod and I. Perath, 'Evidence for an Ancient Egyptian Frontier Canal', *American Scientist* 63 (1975), 542–8.

<sup>16</sup> In 1995, James Hoffmeier and Ronald Bull conducted an augering survey of the area between Hebua I and II to study the soil and shells in order to determine whether the Nile, a lake or the canal had passed through this region.

images from the 1960s and early 1970s (pl. X)<sup>17</sup> prior to the building of a power plant, electrical lines and the new irrigation canal branches and associated pipelines. It became clear that when the new el-Arish road between New East Qantara and the area where the road turns north towards Pelusium was constructed, after the Israeli withdrawal, it was laid directly on the traces of the ancient canal. This same satellite image revealed further that the canal's traces continued farther east than the Israeli aerial photographs show, and it does not make a sharp turn northwards and east of Tell el-Herr as the Israeli reconstruction proposed.<sup>18</sup>

Hebua I is situated on an ancient barrier island or coastal ridge (fig. 1, pl. X). According to G. A. Goodfriend and D. J. Stanley's recent study of the northern Delta and western North Sinai, this coastal ridge was the Mediterranean coastline during the Middle Kingdom, and probably during the New Kingdom too.<sup>19</sup> South of Hebua was either a narrow lagoon or a branch of the Pelusiac, and the large lake (or lagoon) east of Hebua was most probably an estuary of that branch.<sup>20</sup> No additional New Kingdom sites have been identified on the coastal ridge east of Hebua I, most likely because the coastal ridge was punctuated with wide openings that allowed water to pass back and forth between the Mediterranean and the lagoon. Traversing these gaps would have been hazardous, suggesting that the route to the Levant did not follow this line, as we had thought at an earlier stage of our research.<sup>21</sup> These gaps can still be seen in recent topographical maps and on satellite images (fig. 1, pl. X).<sup>22</sup> Probably by the first millennium BC, this area had dried up when the Mediterranean coastline expanded northwards as the Nile Delta developed, and the Pelusiac had migrated to the north (see fig. 1). Between the lagoon south of the coastal ridge and the northern end of the Ballah lakes was a narrow strip that would have required a military installation or the massive New Kingdom fort at Hebua I (Tjaru) would have been of limited defensive value. An invading force could have infiltrated the Delta through this area. Hence, we posited that a New Kingdom fort was necessary in this area for strategic reasons. The Corona satellite images narrowed the area of our investigation, and it is within this area that Tell el-Borg was discovered.

### Initial visit to Tell el-Borg

During a survey in the Qantara-Baluzza region in 1998, members of the SCA came across a New Kingdom site a few kilometres east of New Qantara (E), and about 3 km

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Publication of this material will take place in the final report, along with the current work directed by Stephen Moshier.

<sup>17</sup> Pl. X is a mosaic of three different negatives that were expertly matched by Stephen Moshier to produce this image. These pictures were taken in 1968.

<sup>18</sup> Compare pl. X and the map of the Israeli geologists in Sneh et al., *American Scientist* 63. In May 1998, Stephen Moshier and James Hoffmeier walked along the easternmost trace of the canal. They attempted to auger within the trace, but owing to deep sand dunes that have covered the feature, were not able to reach the original profile of the canal.

<sup>19</sup> 'Rapid Strandplain Accretion in the Northern Nile Delta in the 9th Century AD, and the Demise of the Port of Pelusium', *Geology* 27/2 (1999), 147-50. See also V. A. Coutellier and D. J. Stanley, 'Late Quaternary Stratigraphy and Palaeogeography of the Eastern Nile Delta, Egypt', *Marine Geology* 77 (1987), 257-75.

<sup>20</sup> During the 2001 season, our geological team identified a distributary of the Nile that actually passed between Fields II and IV at Tell el-Borg. This branch also emptied into this same lake.

<sup>21</sup> Hoffmeier, *Israel in Egypt*, 183-7, fig. 2.

<sup>22</sup> Sneh et al., *American Scientist* 63, 543; B. Marcolongo, 'Évolution du paléo-environnement dans la partie orientale du Delta du Nil depuis la transgression flandrienne (8000 B. P.) par rapport aux modèles de peuplement

north of the el-Arish road. The site was called Tell el-Borg.<sup>23</sup> At the invitation of Mohamed Abd el-Maksoud, a small team led by James K. Hoffmeier returned to North Sinai in 1999 to investigate Tell el-Borg,<sup>24</sup> and thus began our collaboration.

Tell el-Borg is situated at N 30° 55.516' E 32° 24.621' and appears to be site T-108 of Oren's survey.<sup>25</sup> It is located in the very area in which we thought a military base of the New Kingdom should be found. However, this site was not included by the Egyptian Antiquities Organization (now the SCA) as a site for salvaging in the Qantara-Balouza region.<sup>26</sup> The present elevation and shape of the *tell* was altered by the Israeli and Egyptian armies during the 1960s and 70s. It appears that in order to create a more elevated, defensive advantage, the outer areas of the site were bulldozed towards the middle, creating a higher *tell*. This action formed a crater-like area (c. 200 m in diameter) in the centre, while exposing and destroying much of the outer limits of the *tell*. The Egyptian military dug a system of trenches and bunkers within this perimeter and fortified them with fired-brick walls. These structures were subsequently destroyed when the site was abandoned, leaving hundreds of bricks scattered around the site. After the camp was vacated in the early 1980s, local robbers apparently noticed the cultural remains and began a systematic plundering of the site that continued up until winter-spring of 2000. This observation is based upon the large amounts of pottery (with fresh breaks) and bone fragments around the depressions left by the illicit diggings. The fact that Tell el-Borg served as a military camp, and that some of the surrounding area contained land mines, explains why this large site was not explored

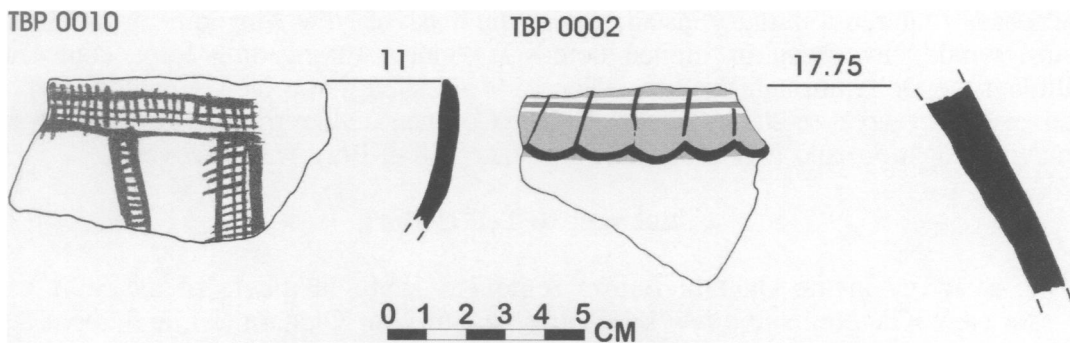


FIG. 2. New Kingdom potsherds.

anciens', *CRIPEL* 14 (1992), fig. 1; D. Valbelle et al., 'Reconnaissance archéologique et géomorphologique à la pointe orientale du Delta: Rapport préliminaire sur les saisons 1990 et 1991', *CRIPEL* 14 (1992), 15, fig. 1.

<sup>23</sup> It is unclear how this name was attached to this site. *Borg*, of course, means 'tower' in Arabic. Whether the name is due to a modern feature at the site (there are a couple of higher mounds on the site from the recent military occupation that may have served as 'look-outs') or is more ancient is not clear. Approximately 10 km south of Tell el-Borg, there is a 'Bir el-Borg' on the 1943 Geographical Survey of Egypt map. J. Clédât recorded a site called Tell el-Bourg in North Sinai in 1909 that is evidently the site we are excavating (cf. D Valbelle and F. Le Saout, 'Les archives Clédât sur le Nord-Sinai', *CRIPEL* 20 (1999), 73 and 78). This is the earliest attestation of Tell el-Borg we have found.

<sup>24</sup> Team members included James Hoffmeier, Stephen Moshier, Harvey Miller, Benjamin Scolnic and Lyla Pinch Brock.

<sup>25</sup> Oren, in Rainey (ed.), *Egypt, Israel, Sinai*, 79, fig. 4.

<sup>26</sup> Anon., *DE* 24 (1992), 8.

sooner. Not until the beginning of the As-salam irrigation project in the 1990s was the area swept for mines, making it possible for archaeological exploration.

Potsherds abound all over the site. Of special interest were the scores of fragments of worked granite, sandstone, quartzite, travertine, sandstone conglomerates and limestone fragments and chips, especially on the south side of the *tell* in what became Field II. Protruding from the sand in the same area was a large piece of roughly hewn pink granite that measured over a metre in length—a sarcophagus or a stela, we speculated. Near to it, a travertine (alabaster) block had been recently exposed. Limestone slabs of various sizes (typically 8–17 cm in thickness) and fragments were noted, especially in Field II, and at the west end of the site. A number of Eighteenth to Nineteenth Dynasty wares were retrieved, including blue-painted 'Amarna' ware, black-painted red ware and Cypriote White Slip (II) milk bowls (fig. 2). Many small and large objects were documented among the surface finds, including spindle whorls, flint blades, grind stones, pounders, a granite statue fragment, fragments of clay coffins (some with moulding), fragments of bowls made of basalt, black granite and travertine, a limestone bowl-mortar and sandstone and basalt saddle querns. The presence of these stones at Tell el-Borg is significant in that none of these are naturally found in North Sinai; rather, they come from South Sinai (?), Gebel Ahmar (near Cairo) and Aswan.

The west and east ends of the site, both areas badly pitted by looters, are covered with countless sherds, fragments of limestone, pieces of bones and teeth (human and animal) and fragments of bricks with shells. The eastern end of the site was bisected by a drainage canal approximately 40 m across (fig. 3).<sup>27</sup> Upon the canal's embankments<sup>28</sup> sherds and bone fragments were visible, indicating that when this feature was excavated, a significant segment of the site had been destroyed.

Based upon our preliminary investigation, it appeared that Tell el-Borg was largely a burial site from the New Kingdom. No traces of standing architecture (i.e. mud-brick walls) were spotted anywhere on the site. This suggested that the limestone slabs had been thrown out of adjacent, looted tombs. At Hebua (IV), approximately 6 km northwest of Tell el-Borg, tombs dating to the New Kingdom were excavated by the Austrian mission. These mud-brick tombs used similar limestone slabs and blocks in the doorways and for flooring.<sup>29</sup>

The accumulated data led us to conclude that this site needed to be excavated, better yet, salvaged, and very soon owing to the continuing destructive progress of the irrigation project. Without the benefit of excavations Tell el-Borg appeared to be approximately 500 m long and 300 m wide at the centre, and hence was a significant frontier site, whatever its nature. And we speculated that if it were only a cemetery, an even larger military site ought to be nearby.

<sup>27</sup> This measurement includes a pair of roads that run parallel to the canal. The site map shown in figure 3 represents the completed survey map from April 2002, and therefore shows Fields V–VIII which were excavated in 2002. Only Fields I–IV are dealt with in the present report.

<sup>28</sup> The embankments were formed when the canal was excavated in 1995 or 1996. The plan of the canal engineers is to remove the debris and use it to level low-lying areas nearby. Most of the canal embankments in the area have since been removed. With the discovery of Tell el-Borg, fortunately, the SCA was able to secure an agreement that these mounds of debris would not be removed without our supervision.

<sup>29</sup> J. Dorner, 'Vorbericht über die Grabungskampagnen 1993/94 auf Tell Hebua IV/Süd am Nordsinai', in M. Bietak (ed.), *Ägypten und Levante*, VI (Vienna, 1996), 171–3.

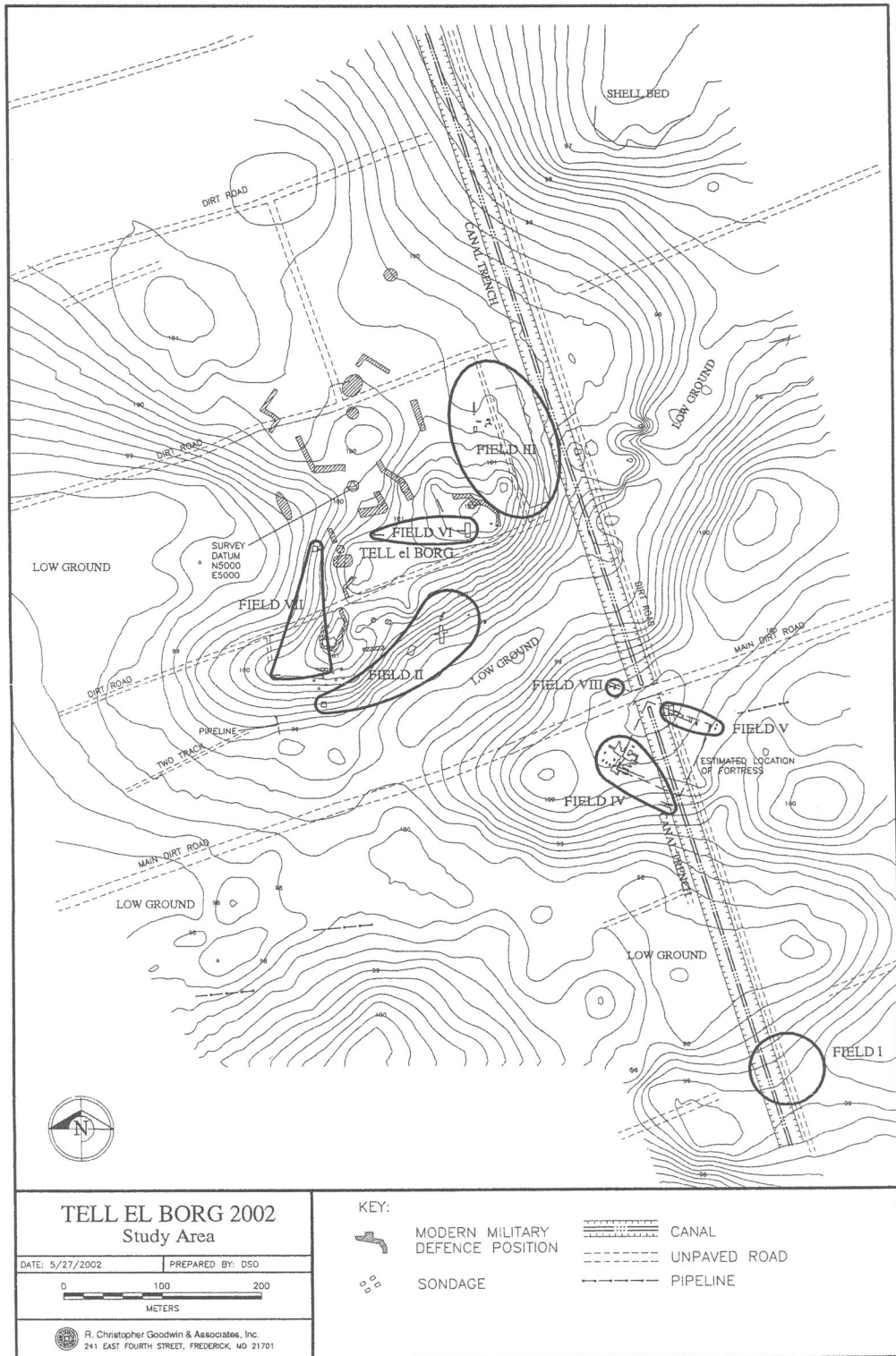


FIG. 3. Tell el-Borg 2002.



### The January 2000 season

In January 2000 surveying to create a contour map began.<sup>30</sup> In the intervening months since our initial visit to Tell el-Borg, another east-west road had been laid across the site north of the main road (fig. 3), and a pipeline dug through the *tell* in a north-south direction. On the final day of mapping, we explored the area south of the site along the drainage canal to see if any cultural remains had been exposed when it was excavated several years before. We had thought that the site was limited to the area north of the east-west road. However, approximately 400 m south of the east-west bridge, on the east side of the canal, a number of limestone blocks were visible at the water's edge, as well as some fragments strewn about onto the embankment adjacent to the canal road. Clearly, when the canal had been excavated, the blocks were exposed and others were tossed onto the embankment. Two important inscribed pieces were retrieved from the embankment. TBO 1 (36 × 50 × 50 cm) is a relief showing the upper part of a male deity (fig. 4). The partial remains of a *serekh* are visible to the right of the deity's head. The legs of the Horus-falcon are preserved above the top of the *serekh*, and within one can see the horn of a bull. The bull figure is widely used in the Horus name of Eighteenth and Nineteenth Dynasty pharaohs. What is unique about this relief is that the *serekh* is placed behind the deity rather than behind the king, whose figure should appear opposite the deity. One known parallel to this orientation is a block of Ramesses II discovered by Petrie at Tell el-Retabeh.<sup>31</sup>

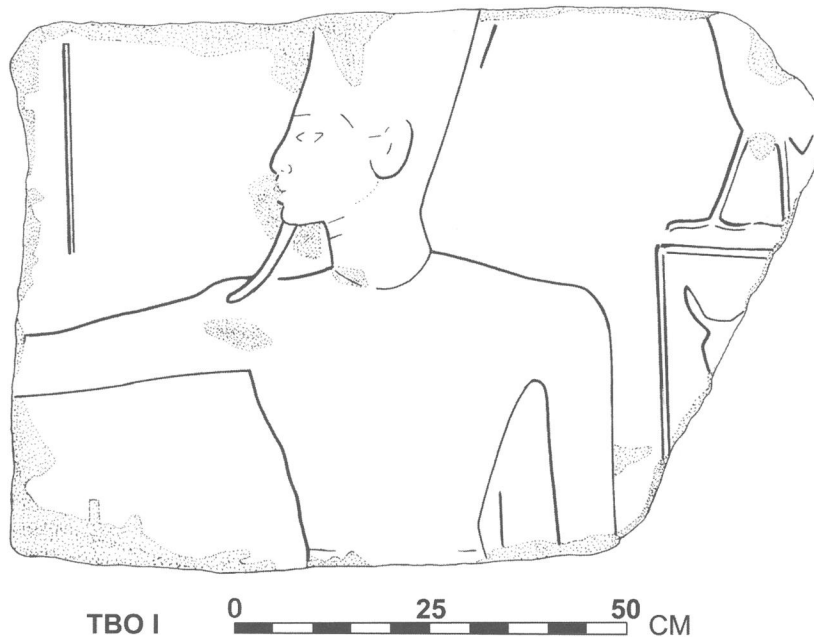


FIG. 4. Relief with the upper portion of a male deity (TBO 1).

<sup>30</sup> The mapping project was directed by Thomas Davis and David Olney of Christopher Goodwin and Associates, a cultural resource management firm based in Frederick, MD.

<sup>31</sup> W. M. F. Petrie, *Hyksos and Israelite Cities* (London, 1906), pl. 30.

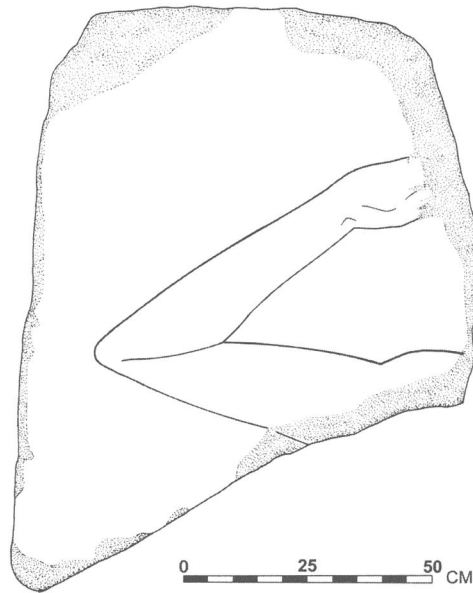


FIG. 5. Relief with an arm in the archer's pose (TBO 5).

Another important piece is TBO 8 which contains the top of a cartouche containing the ibis sign *Dhwtj* (-*mss*?), *Thut*(mose?), and a second surface carved at a different period which contains the feet of a deity standing on a platform. In all, eight blocks were retrieved from the edge of the canal. This included one that was 83 × 45 × 23 cm, and two inscribed pieces. A nicely carved sun-disc is on a smaller fragment (TBO 6; 37 × 20 × 7 cm), while the larger one (TBO 5; 66 × 50 × 25 cm) contains a deeply incised arm in what appears to be the archer's pose (fig. 5), based upon comparisons with Ramesside battle reliefs.<sup>32</sup>

### The first two seasons of excavations: 2000–01

Excavations were conducted in four different fields during two six-week seasons in March and April 2000 and 2001. It had been determined that the area adjacent to the canal and on the embankment needed to be examined thoroughly (Field I), and the area around the large granite block (Field II) was a priority. In the two months since the survey took place, we discovered that the large embankment (c. 150 × 30 m) on the west side of the canal, located north of the bridge, had been removed. To our dismay, when the embankment debris was removed, it was apparent that the loaders or bulldozers had actually cut as much as 2 m down into the *tell*, especially towards the northern end of the cut. This excavation project exposed some darker soils suggestive of brick. Additionally, the recently exposed area had been systematically probed by robbers in search of antiquities. This unexpected development prompted us to initiate a salvage operation in the exposed area (Field III). Finally, the fourth area of investigation (Field IV) was discovered quite by accident after a dust storm in April 2000 uncovered a brick wall on the west side of the canal, south of the bridge.

<sup>32</sup> Epigraphic Survey, *The Battle Reliefs of King Sety I* (OIP 107; Chicago, 1986), pls. 2, 3, 5 and 33.

*Field I*<sup>33</sup>

The area by the canal's eastern edge where the blocks had been retrieved two months earlier was investigated. From 5–15 cm of wind-blown sand on the canal's bank covered a pit (locus IA) where the blocks were discovered in January. Once this loose sand had been cleared, the outline of a pit was discernible. Its length was 7.6 m, oriented in an east–west direction perpendicular to the canal. The maximum width of the pit was 2.8 m. As several blocks were extracted from beneath the water, the pit originally extended beyond the water's edge. However, no blocks or fragments were found on the west bank of the canal. Beneath the recently laid, wind-blown sand, a dark (brown) marly sand had filled the pit, the outline of which was clearly visible in the basal sand. Most of the blocks were found covered by the marly sand or lying on the basal sand which formed the bottom of the pit.

Despite the fact that some of the pit's contents had been disturbed when the canal was excavated, it is clear that they were not in an architectural context. A very limited number of sherds were discovered in association with the pit. Approximately 90 per cent were of Nile silt and nearly 10 per cent were marl. Only one diagnostic, clearly datable sherd was found in IA, viz. a Mycenaean IIIA2 sherd of a flask (fig. 6) which dates to the Amarna Period (c. fourteenth century BC).

In all, the pit area yielded eighteen uninscribed blocks, some as large as 88 × 54 × 24 cm (TBO I 2052), 72 × 38 × 19 cm (TBO I 2056), and 71.5 × 22 × 32 cm (TBO I 2040). Two blocks (TBO I 2050 and 2054), measuring 53 × 35 × 19 cm and 53 × 34 × 19 cm respectively, appear to be *talatat*, pointing to an Amarna Period date for the original context of the blocks. Seven pieces with discernible inscriptions were recovered from IA, and one significant piece (TBO I 6) measuring 81 × 46 × 16 cm was found within the embankment (I B).<sup>34</sup> It contains two vertical lines of text, the lower portions of which are missing. The extant lines read: 1) *(d)i.n n.k ...* 2) *tšw.k im ...* The shoulder, upper arm, elbow and part of the forearm of a deity are carefully executed on the block. It appears that this is a portion of a triumph scene in which the god (typically

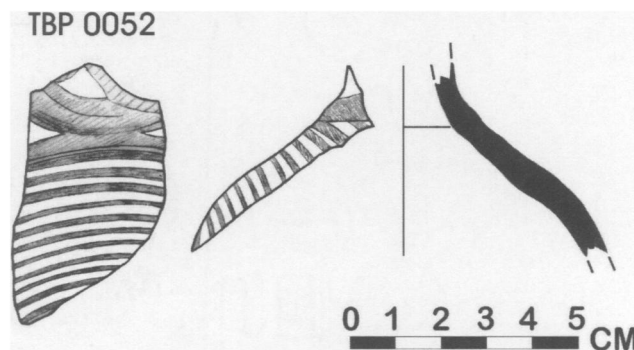


FIG. 6. Mycenaean IIIA2 flask sherd.

<sup>33</sup> James Knudstad was the field supervisor for Field I and was assisted by Ronald Bull.

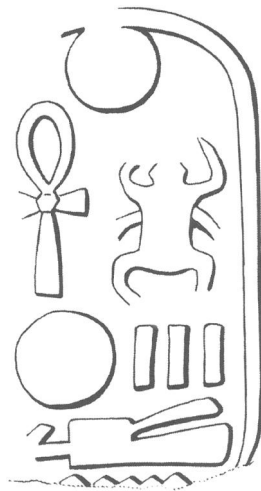
<sup>34</sup> Digging on the embankment was curtailed after a few days as the sand, which had been below the water table in highly salinized water, had dried to a near concrete-like hardness. We hope to secure permission to use heavier equipment to see if further pieces might be discovered.

Amun-Re) extends his arm and offers a sword to the king, encouraging him to go to war and expand his borders. This type of scene would usually appear on a temple pylon. Two of the blocks contained the partial nomen and prenomen of Ramesses II. Thus, Field I produced blocks that had been part of possibly two or three temples spanning the early to mid-Eighteenth Dynasty, the Amarna Period and the Ramesside era.

Why these blocks were relocated to this pit, nearly a half kilometre from the *tell*, and when this occurred, were questions the excavations in Field I did not answer. The other important question is, from where did they come? While we need to hold out the possibility that these blocks originated from elsewhere, our assumption is they were from Tell el-Borg, and possibly from Field II, to which we now turn.

### *Field II*

This field is located on the south side of the *tell*, roughly at its centre, and was divided into two sub-sections: Area 1 occupies the west side of Field II and Area 2 the east side (fig. 3). Area 1 contained a strange anomaly—a crater-shaped pit that measured approximately 15 × 6 m. Given the recent military occupations of the site, our initial impression was that it had been dug out for an artillery piece or a tank. Fragments of limestone blocks and many sherds occupied the sandbanks that surrounded the pit. Hassan Mohammed, our bedouin guard, informed us of his recollection as a young boy some ten to fifteen years before when he saw in this pit some stone steps descending into a hole in the ground. Our interest piqued, we began to clear the surrounding sand and the pit itself. It was immediately evident that this feature had been extensively plundered by robbers, and that some of their debris had simply blown back into what turned out to be three deeper holes they had dug (pl. XI, 1). The largest one (Area 1, C, a) measured 8 × 4 m and the robbers actually tunnelled into the southern wall of the pit, creating a cave-like feature. Numerous limestone blocks were uncovered and several uninscribed *talatat* were noted, and it was apparent that the three pits had cut through a well



TBP 0207/TBO II 37

FIG. 7. Stamped jar handle with the prenomen of Smenekhcare.

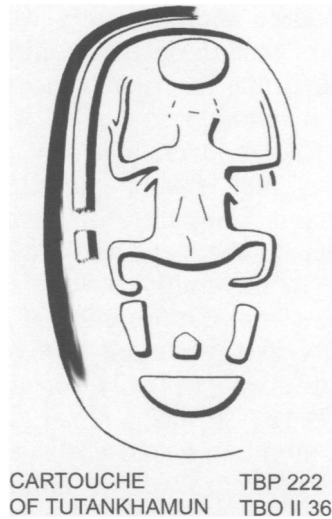


FIG. 8. Stamped jar handle with the prenomen of Tutankhamun.

stratified area. Several important small finds were recovered from the fill in the largest hole (C, a) at a depth of about 1.1 m: a stamped jar handle (TBO II, 37) with the cartouche of *ḥnh-ḥprw-rꜥ [wꜥ n] rꜥ* (fig. 7), the prenomen of Smenekhkare, Akhenaten's ephemeral and mysterious coregent or successor, and a second one (TBO II, 36) bearing the impression *Nb-ḥprw-rꜥ*, the prenomen of Tutankhamun (fig. 8).

As the northernmost of the three holes (C, c) was cleared, limestone blocks began to appear. They proved to be descending stairs, made up of pairs of reused, uninscribed *talatat*,<sup>35</sup> lying side by side, and clearly *in situ*. With the robbers' debris cleared, a square (3.5 × 2.0 m) was laid to expose the staircase and investigate the stratigraphy (Field II, Area 1, square D). Four steps made of pairs of uninscribed *talatat* were uncovered,<sup>36</sup> followed by a fifth which was constructed of three stretchers. Just below these three *talatat* and abutting them lay a slab (78 × 40 cm) that appears to be in its original location because it nearly matches the width of the three-block step. Beneath this slab, a sixth and final step protrudes, which is also made of three parallel *talatat* blocks (pl. XI, 2). The steps descend into a stone-lined pit, approximately 6.5 × 2.0 m. The stones that lined the pit are of varying size and are roughly hewn. Some of the blocks, such as several additional *talatat* and column bases, were reused from earlier structures. No mortar of any kind was found in association with the stones in the pit, while some was evident between the *talatat* steps. Additionally, patches of limestone plaster were found, and striations were visible in the sections. How these were formed is uncertain, although later burning of the limestone to make the plaster is a possibility.

Only one limestone fragment from the pit bore a relief (TBO II, 33). It was decorated with raised stars (c. 16–18 cm across) with traces of a blue-painted background. It was evidently a ceiling block which, in its style and execution, matches a large ceiling block

<sup>35</sup> Our view that these were reused *talatat* was confirmed by Charles Bonnet and Dominique Valbelle when they examined the stepped structure in April 2001. The *talatat* could have been brought to the site from elsewhere or there may have been an Amarna Period temple at Tell el-Borg.

<sup>36</sup> We assume they are uninscribed, but we have not removed them to inspect the bottoms.

(TBOX 36), a surface find, discovered approximately 300 m to the east beside the main road bridge (east side). It appears that these two ceiling pieces were from the same temple, possibly the one from which the inscribed blocks in Field I came.

At the southwest side of the pit, another square (4 × 2 m) was excavated (Field II, Area 1, square E). At the very lowest level, a poorly preserved mud-brick wall was uncovered. Its curvature suggests that it surrounded the stepped pit structure, the function of which remains uncertain. The nature of the construction seems to preclude it being a cistern for storing water. If the steps and pit led to a well, the water source would have been located further to the south (beyond the robbers' tunnelling) which remains to be excavated. It is clear from the presence of Amarna Period royal names in the pit that the late Eighteenth Dynasty was well represented in the area. The reused *talatat* demonstrate that the structure was probably constructed in the Ramesside Period and cut through the Eighteenth Dynasty levels.

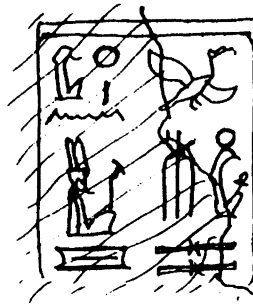
Field II (Area 2) attracted our attention because of the presence of a partially visible pink granite block and a travertine block, as well as numerous fragments of various hard stones and scores of limestone fragments and chips strewn about. Four large, flat limestone slabs lay 25–30 m southeast of the granite block. One of the larger ones (TBO II; 001–99 × 55 × 13 cm) and the smallest one which had been broken (TBO II; 004–56 × 41 × 13 cm) had holes toward the right end. These were possibly thresholds with door sockets. Signs of illicit digging were prevalent throughout this area, indicating that the robbers also saw this as a potentially fruitful area. Regrettably, this area also had been bulldozed to create the military camp, so that much of Field II had been significantly disturbed. This also means that the illicit digging had likely occurred after the military camp had been abandoned, probably in the early 1980s.

On the surface near the granite block, two granite fragments were found on which were some engraved hieroglyphs. TBOX 34, a fine quality piece of Aswan granite, measures 25 cm in length and reads:  $p^3$  [ $R^c$   $n$ ]  $R^c$ -[ $m$ ]s-s( $w$ ) (fig. 9).<sup>37</sup> Kenneth A. Kitchen suggests that this piece came from a royal monument that linked the name of Re with that of Ramesses II.<sup>38</sup> The second fragment, TBOX 43, is from a different type of granite object. Only the right half of the two signs is preserved, the top one being a seated deity (no beard), possibly Maat, over a sun-disc. It is tempting to restore it as the prenomen of Ramesses II, [ $Wsr$ -]  $m^c$ st [- $r^c$  stp-n-]  $r^c$ . In this case, however, one would expect to see the tall *wsr*-sign to the right of the deity (and there is certainly space for it) but nothing appears there. Comparison with granite from the large block shows that it was not chipped from the block.

In order to expose the granite block fully, a square of 3 × 4 m was excavated around it (Field II, Area 2, Square A). Additionally, a metre wide, north–south trench 25 m long was excavated perpendicular to the east end of II A to examine the stratigraphy in this area. The first level of II, 2, A, approximately 20 cm thick, contained lumps of mud-brick and soil that was brown with decomposed brick, along with limestone and granite chips. The sherds collected from the surface and stratum 1 were largely made of Nilotic silt with a few marl wares. They represented a variety of wares (red, green, cream and peach slips), with amphorae being the most frequently represented vessels, along with jars and bowls. These wares date to the New Kingdom, some to the

<sup>37</sup> This is K. A. Kitchen's reading of the text, and the facsimile in figure 9 was produced by him.

<sup>38</sup> As the epigraphic consultant for this project, Kitchen has provided us with a written report of all epigraphic materials. His observations are reflected here.



TBOX 34

FIG. 9. Inscribed granite fragment.

Nineteenth and perhaps Twentieth Dynasties. Once cleared, the solid, unscribed pink granite block, which measured  $2.75 \times 1.30 \times 1.16$  m (maximum dimensions), was found to be lying in a sandy pit. It was roughly hewn and not square (pl. XII, 1). Its function, or whatever it was intended to be, remains uncertain, although a base of an obelisk, a large plinth or a naos are ideas that occurred to us.

The block was surrounded by a network of mud-brick walls which in some areas were only one brick thick in preservation, while in others the bricks stood two or three courses high. The width of the walls vary from 80–90 cm, with the bricks being  $38 \times 17$  cm. Robber pits, which are found all over Field II, actually punctured the walls, often going down to the basal sand into which the foundations had been dug. There is a gap of 4–5 m between the end of the northernmost wall (locus 11)<sup>39</sup> and a mud-brick structure that was thoroughly investigated in 2001. This flat structure (Field II, Area 2, squares E and F, locus 2), a platform or floor, measures  $6.75 \times 7.6$  m (fig. 10). The feature is roughly oriented in an east–west direction, with the western section being entirely scraped away when the area was bulldozed. Traces of lime plaster on some bricks suggest that it was a floor. In the eastern end of the floor are three rectangular holes. They were clearly constructed and not dug after the floor was laid. The dimensions are not identical, although the western ends of the insets were constructed on the same line. The northernmost is  $0.80 \times 1.8$  m, with some bricks missing in the northeastern corner giving the feature an L-shape. The middle hole measures  $1.0 \times 1.5$  m, and the southern one is  $1.2 \times 2.1$  m. The latter is probably longer because of the loss of bricks on the east. The earliest pottery found in association with this brick structure were the so-called black rimmed bowls—black-painted rims on red-slipped Nile silt. The sherds are typical for the early to mid-Eighteenth Dynasty.

The three rectangular holes may have been insets for plinths. In fact, the above mentioned travertine block, found 13 m west of this brick structure, may have served such a purpose. Its full length is not preserved, and it measures  $48 \times 59 \times 25$  cm. A pair of clay or faience clusters of grapes (TBO 0011 and TBO II 52) was also found in square F, and was likely votive in nature. Immediately west of the building was a rubbish pit that contained animal bones, broken pottery and a small, smashed royal statue. These factors suggest that this brick structure was a temple, but if so, nothing was discovered to suggest that the inscribed blocks found in Field I were originally associated with it.

<sup>39</sup> The wall originally may have continued east and connected with this feature.

However, the fact that limestone fragments are ubiquitous throughout Field II, both on the surface and below it, in addition to the reused blocks found in the nearby stepped stone-lined pit, suggest that one or more stone (or brick and stone) temples stood on the south side of the site, somewhere in the vicinity of Field II, if not actually in it. Furthermore, the widespread presence of the limestone chips in this field (and used as fill in Field IV—see below) suggests that one or more of the temples had been violently dismantled.

### *Field III*

A salvage operation took place along the eastern face of the *tell*. This was exposed by the recent removal of the canal debris embankment that was piled next to the canal when it was excavated. Since the destructive cut was made, sand had blown in, covering the exposed section. Our strategy was to remove the sand and debris that had blown in and covered the cut in order to assess what might have survived and to ascertain what we could about the stratigraphy of the site. As it turned out, Field III was a cemetery area. Two large tombs and two small ones, all constructed of mud-brick, were uncovered in 2000. The contents of all tombs were sifted, resulting in the discovery of scores of beads, a few amulets and abundant fish bones.

Most of the superstructure of Tomb 1, located in square G, had been destroyed by the earth-moving equipment when the canal debris was removed. Tooth-mark impressions from the large shovels were present in the floor and a few places at the lower portions of walls. Oriented to face the east, its outer dimensions are 3.75 × 3.25 m, the inner

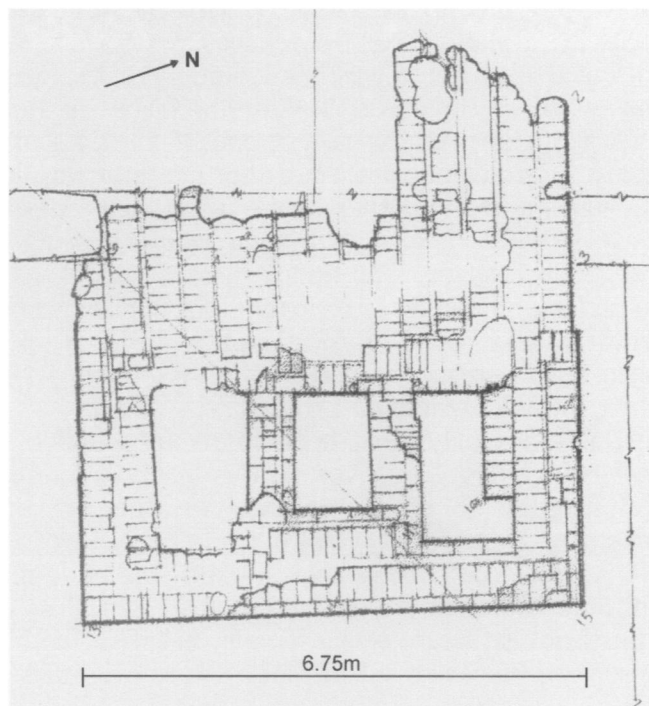
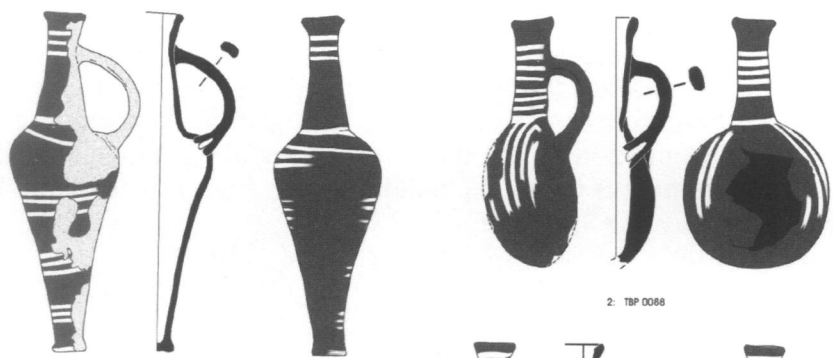


FIG. 10. Flat feature in Field II, Area 2.



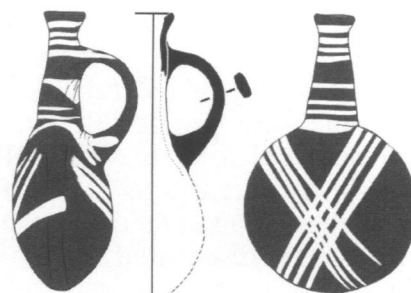


1: TBP 0086

2: TBP 0088

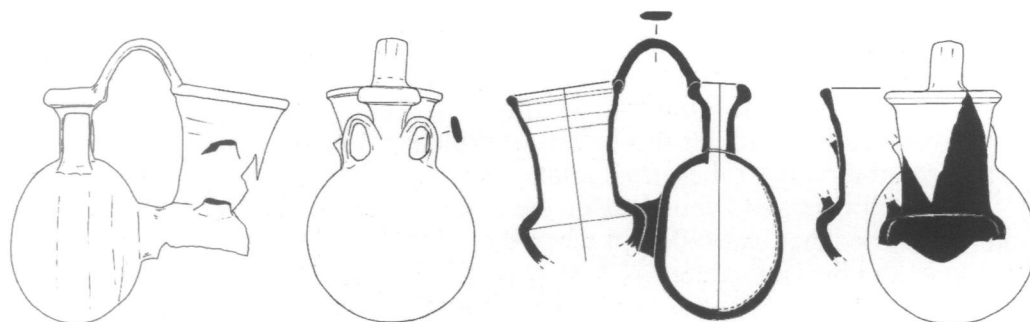
**FIELD III  
Tomb 1**

(computerised illustrations, L.P. Brock)



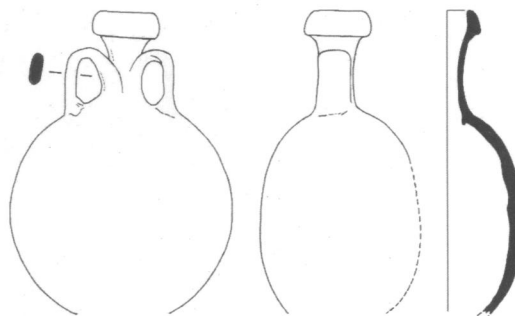
3: TBP 0085

a)



1: TBP 0087

2: TBP 0095



3: TBP 0089

**FIELD III  
Tomb 1**

(computerised illustrations, L.P. Brock)

b)

FIG. 11. a) Cyproite and b) Egyptian pottery from Tomb 1.

being 2.70 × 2.0 m. The back wall and the northwest corner escaped the devastation and are preserved up to thirteen brick courses high. From what remains, it is clear that this had been a well-constructed tomb that originally had a vaulted roof. If this tomb had a burial shaft like those found in Tombs 2 and 4, it had been completely obliterated.

Despite the poor condition of the tomb, a wonderful cache of smaller vessels was uncovered a few centimetres below the bulldozer cut. Both Egyptian and foreign wares were present, including (fig. 11a–b):

1. An intact Cypriote Base Ring II Spindle Bottle (TBP 0086).
2. Two intact Cypriote Base Ring II flasks (TBO 0085 and 88).
3. An Egyptian Double Vessel (TBP 0087). This interesting type of lentoid flask with an attached smaller flask one dates from the reign of Amenhotep III to the early Nineteenth Dynasty, according to Bourriau.<sup>40</sup>
4. An Egyptian copy of a Canaanite LB IIA Lentoid Flask (TBP 0089). This flask is of the same ware type as TBP 0087.
5. A Nile silt bowl with red slip (TBP 0095), 22 cm in diameter.

The ceramic evidence suggests a date for this tomb in the late Eighteenth Dynasty. Owing to the robbing in antiquity and the recent destruction of most of the tomb, no human remains were discovered.

Just 3 m west of the northwest corner of Tomb 1, in square A a, a smaller tomb of someone of much humbler means was excavated (Tomb 3). Designed for a single individual and only a handful of grave goods, this tomb measured approximately 2.50 m in length (its western end was completely missing) and 0.75 m wide. It was robbed in antiquity and was completely empty when excavated.

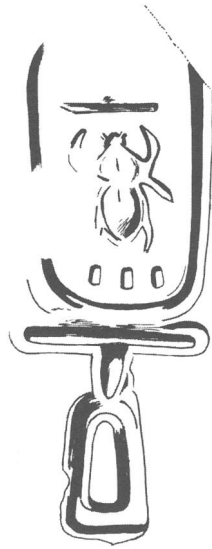
Tomb 2 was uncovered 34 m north of Tomb 1, in square D and D a. Oriented along the same axis as Tomb 1, Tomb 2's burial shaft was largely destroyed by the recent earth removal work, although the lower section survived. It is 2.0 m long and 1.6 m wide, and the doorway to the burial chamber was sealed by mud. The burial chamber was fairly well preserved, with part of the vaulted roof still intact and supported by a section of the roof that had fallen in when the tomb was robbed in antiquity. The outer dimension of the burial chamber is 3.8 × 3.2 m, making the overall length of the tomb 5.8 m. Human bone fragments were collected and are being studied by our osteologist, Scott Haddow. Ten pottery vessels of Nile silt were uncovered in Tomb 2, including blue-painted ware (TBP 0122, TBP 0154) suggestive of a Nineteenth Dynasty date.<sup>41</sup> Part of the southwest corner of Tomb 2 was accidentally dug out in antiquity to build a small, child's tomb (Tomb 2a). It measures just 80 × 60 cm and was completely robbed out.

The largest tomb uncovered was cleared in April 2001, having been detected by earlier magnetometer readings taken west of Field III (fig. 12). Tomb 4 is located in Field III, Area 2, which was covered by a heavy concentration of potsherds and pitting from robbers. The mud-brick walls of the tomb began to appear about 10 cm below the surface. The roof was completely lost as a result of the several robberies in antiquity.

<sup>40</sup> J. D. Bourriau, 'Double Vessel', in E. Brovarski, S. K. Doll and R. E. Freed (eds), *Egypt's Golden Age: The Art of Living in the New Kingdom 1558–1085 B.C.: Catalogue of the Exhibition* (Boston, 1982), 83–4.

<sup>41</sup> Dating based on David Aston's analysis (*Die Keramik des Grabungsplatzes. Q 1 Teil 1, Corpus of Fabrics, Wares and Shapes* (Forschungen in der Ramses-Stadt. Die Grabungen des Pelizaeus-Museums Hildesheim in Qantir–Pi-Ramesse I; Mainz, 1998), 354). We are grateful to David Aston for visiting us at Tell el-Borg during the 2000 and 2001 seasons and consulting with our ceramicists.





TBP 0248/TBO 0071  
Amenhotep II

FIG. 13. Prenomen of Amenhotep II incised on sherd TBP 71.

Scattered inside and outside of the tomb were large, thick fragments of a clay coffin, some with paint and others with moulding, suggesting that at least two different coffins were represented. We should be able to reconstruct these, and we theorize that one may actually have been a rounded lid that fitted over the crypt. On the wall over the crypt was a patch of plaster with traces of red and blue paint, indicating that the tomb originally had a polychrome decoration. Only a few bone fragments were uncovered in the first chamber, and no whole vessels were found.

The most important find from this tomb was a red body sherd with an incised cartouche containing the prenomen,  $\text{3-hprw-r}^c$ —Amenhotep II (TBP 71; fig. 13). However, given the fact that this tomb and most likely those that surrounded it were all looted, it is possible that this sherd is intrusive. Immediately beneath the cartouche is what appears to be the *di*-sign, giving the impression that the configuration of the two signs was to be seen as an *nh*-sign—a playful writing for ‘Ankh-kheperu-re gives life’.<sup>42</sup> Another possibility is that the sign below the cartouche is the *wn*-pillar sign, i.e. Heliopolis,<sup>43</sup> perhaps pointing to a royal vineyard in the area of Heliopolis. Another problem in dating this tomb is that the smaller back room is not accessible from the central chamber. It appears to be a part of an earlier tomb onto which the eastern portion was added subsequently. If the Amenhotep II sherd originated in the back chamber, then that was the earliest part of the tomb. Since this tomb was cleared at the very end of the season, time did not allow the sherds to be studied thoroughly. However, a few diagnostic sherds were recognized to be from the late Eighteenth to early Nineteenth Dynasties.

<sup>42</sup> Lyla Brock, the project’s artist, and I both came to this observation independently.

<sup>43</sup> This suggestion is made by K. A. Kitchen.

The excavations in Fields I–III, to our surprise, had revealed no evidence of any sort of fortifications. However, we had a clue of the military nature of the site from a chance surface find of a small limestone inscription discovered by Lyla Brock in the pile of debris heaped up by the bridge that spans the drainage canal. TBO X27 measures 13.5 × 11.0 × 5.0 cm, is trapezoidal in shape and contains three complete lines of text (pl. XII, 2) which read:

- 1) *s3 3 'Imn, 'Imn h<sup>c</sup> nt*
- 2) *n Wsr-m3<sup>c</sup>t-r<sup>c</sup> Stp-n-r<sup>c</sup> di ʿnh mi R<sup>c</sup> dt*
- 3) *ir.n ʿi-h<sup>c</sup>w H<sup>c</sup>*

- 1) The Great Company (of) Amun, 'Amun appears gloriously and victorious
- 2) for Usimare Setepenre, given life like Re forever'
- 3) Made by the weapons-bearer, Kha.<sup>44</sup>

This text suggests that the regiment named 'Amun appears gloriously and victorious for Usimare Setepenre' of the division of Amun was stationed at Tell el-Borg during the reign of Ramesses II. No parallels exist for this type and shape of inscription, which leads us to suggest that this piece might have been a name plate that identified the office or the living quarters of the weapons-bearer, Kha.<sup>45</sup> This discovery, made during the first week of excavations of the 2000 season, confirmed our intuition, based on the frontier location, that this site served a military purpose. Not until work began in Field IV was evidence of a fort discovered.

#### *Field IV*<sup>46</sup>

Midway through the season, after a strong *khamasin* swept through the site, a brown patch appeared in the sand along the west bank of the canal, approximately 110 m south of the bridge. This observation led us to begin excavations in Field IV. The brown patch turned out to be a mud-brick wall. The bricks (light brown and rather sandy) measured between 36–38 cm long, by 18–19 cm wide and 8–9 cm in thickness. Initially, it appeared to us that Wall A, which ran roughly in an east–west direction, was of casemate construction. It measured 2.8 m at its widest, the fill area between the parallel north–south service road that ran along the canal. In the section, it appeared that the outer walls slumped outwards. The eastern end of this wall tapers off as it descends the embankment toward the canal. At the eastern end of Wall A, some limestone fragments, one the size of a *talatat* (uninscribed), along with some broken pieces of red-brick were uncovered. However, since the area east was most heavily bulldozed, it was not clear to us whether these were originally associated with the wall or had been relocated to their current position. There was a similar problem with pottery. Only a few sherds were collected and it was uncertain whether they could be used for dating purposes, although they were of a New Kingdom date.

The picture became clearer with further exploration of Wall A in the 2001 season. When the fill between the two walls was cleared, it was evident the walls tapered inwards to form a V-shape. Thus, it was not a casemate wall, but the bottom of a fosse

<sup>44</sup> The transliteration and translation are provided by K. A. Kitchen.

<sup>45</sup> This suggestion is made by K. A. Kitchen based on his study of a photograph of TBO X27.

<sup>46</sup> Excavations in Field IV were directed by James Knudstad, assisted by Rosa Frey and Ronald Bull.

or moat (Fosse A). The top of the fosse had been shaved off by earth-moving equipment when the canal was cut through the site. This interpretation was confirmed when another metre beyond the western section from the 2000 season was excavated. This was as far as we could dig because of the presence of the service road (pl. XII, 3). Here an additional 70 cm of the walls of Fosse A had survived the bulldozer's blade. Furthermore, over the brick construction, a smooth mud plaster had been smeared to line the fosse. What little was left of the east end of the wall (close to the water's edge) was fully exposed. It was evident that the mud-brick fosse had been built on a bed of stone and fired brick. However, because this area was significantly disturbed when the canal was dug, a section was cut through Fosse A towards the west end in order to obtain a clear picture of how it was constructed (IV A-1). The fosse was built on two parallel walls of neatly laid limestone blocks on the inside, and the outside of the stone, fired bricks and fragments (pl. XII, 4). The limestone blocks were the correct length for *talatat* (c. 50–52 cm), but had been split in half lengthwise. Although the ceramic remains were negligible in Field IV, square A, they were able to provide a date for the fosse. Sherds of red-slipped, red-rimmed and red-burnished wares were uncovered, along with a blue-painted one, all of which date to the late Eighteenth and early Nineteenth Dynasties. Some of these were found sealed in A-1. These data, along with the presence of reused *talatat*, suggest that Fosse A was most likely constructed some time late in the Amarna Period (i.e. after the death of Akhenaten) or as late as the reigns of Horemheb or Seti I. The discovery of the stamped jar handles of Smenekhkhare and Tutankhamun in Field II may suggest that the site was occupied during the late Eighteenth Dynasty.

An effort was made to find Fosse A on the west side of the service road (IV, Area B). The ground, however, was so hardened by salts mixed with sand that it was nearly impenetrable by hand-digging equipment, and so was abandoned. However, to the north of this, a large area of dried mud mingled with thousands of shells was investigated (Field IV, Area C and D). A year or two earlier, the canal's debris embankment in this area had been cleared (as in Field III), and obviously, this removal had occurred after a heavy rain, because mud was widely smeared and teeth marks from the digging equipment were visible in the dried mud. The plethora of shells initially gave the impression that this area may have been an ancient pond or swamp. However, after careful study and some trowel-scraping, it became evident that this feature was indeed part of a massive mud-brick wall of which as much as a metre had been lost during the recent clearance of the area. Meticulous excavation work revealed a wall (Wall C) that was 3.8 m wide and made of bricks that measured 45 × 20 × 10 cm (fig. 14). Distinguishing the wall from the smeared mud was difficult indeed. The bricks themselves contained bivalve shells as the source for the mud was likely a nearby lagoon. Nearly 30 m of Wall C was preserved, only two to four bricks high (Field IV, Area C). This limited preservation meant that the recent clearing of the area had obliterated the floor levels of the structure, which explains why so little pottery and other artifactual evidence were found inside the wall. The ceramic materials collected in squares C 1 and D 4 contained red-burnished bowl sherds which were examined by David Aston as they were being retrieved in April 2000 (fig. 15). He dated them to the late Eighteenth Dynasty, a point consistent with what he has said in print about these wares: 'In general red slipped and burnished vessels of New Kingdom date tend to be more characteristic of the Eighteenth and early Nineteenth Dynasties than later, a

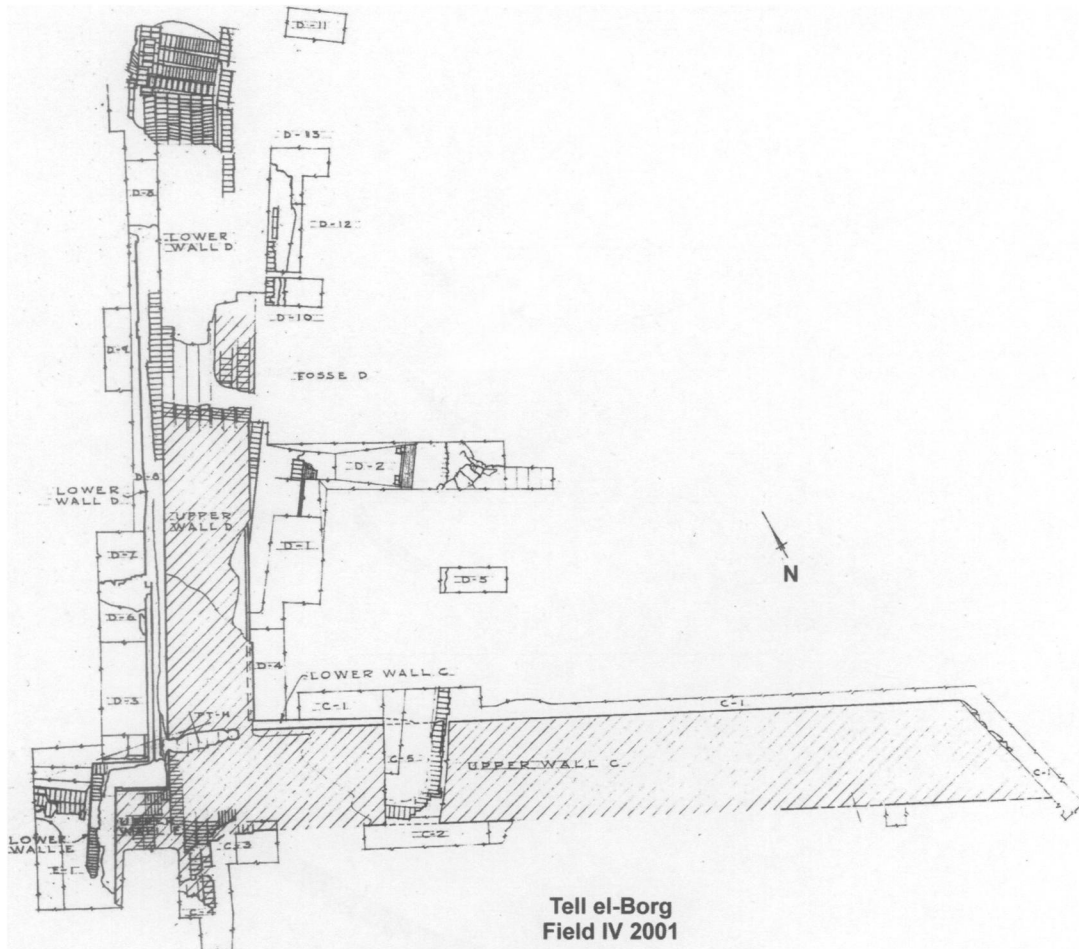


FIG. 14. Field IV walls.

pattern which is paralleled at Qantir'.<sup>47</sup> This dating aligns with other data and leads us to suggest provisionally that the second fort was built late in the Eighteenth Dynasty.

Wall C is oriented roughly in an east-west direction and runs parallel to Fosse A. Hence, Fosse A appears to be associated with the fort represented by Walls C and D. The east end of the wall was severed when the north-south service road was constructed, while the western end is preserved nearly a metre higher, having avoided the recent destruction when the canal debris embankment was removed. The highest preserved area appears to be the corner where there may have been a defense tower. From there the wall turns north (Field IV, Area D, Wall D) and disappears under the heap of sand and debris beside the bridge about 40 m away (fig. 14). It is now clear why the mound of sand by the bridge on both sides of the canal abounds in pottery, bricks (both unfired and fired), and other remains. This material had been removed from Field IV for the construction of the bridge. It might be recalled that it was in this same heap that the three line, inscribed nameplate of Kha was discovered.

<sup>47</sup> *Die Keramik des Grabungsplatzes Q 1*, 77.

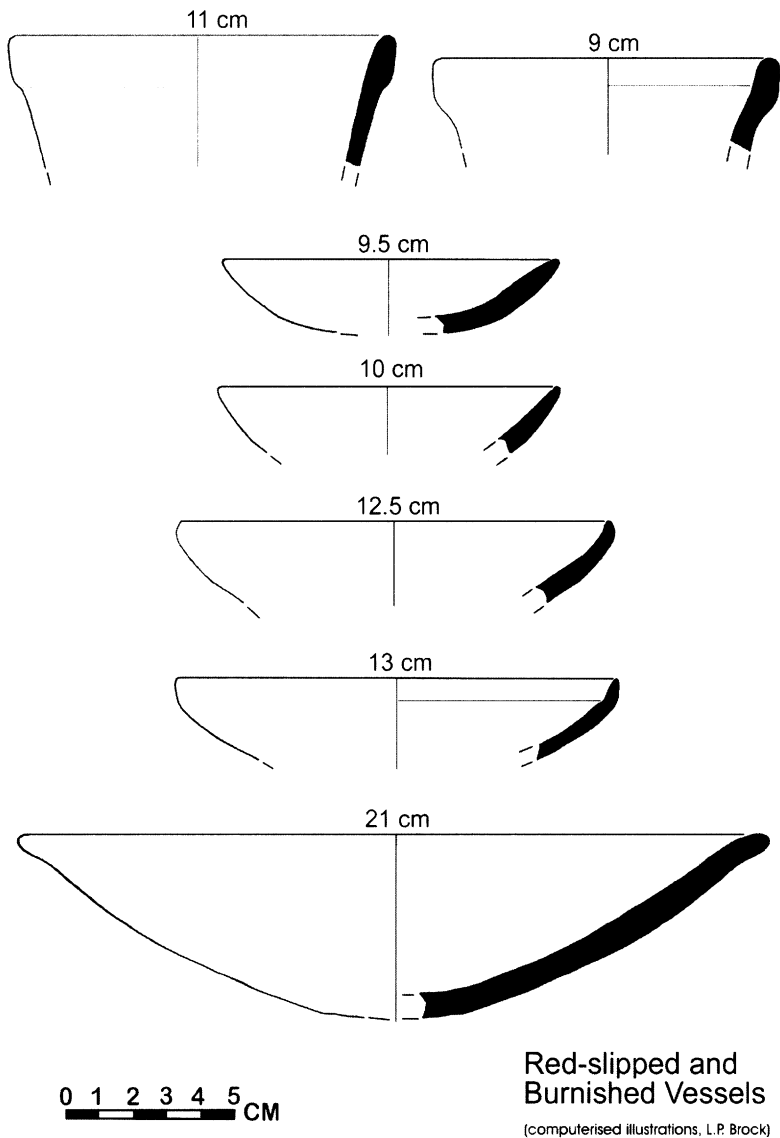


FIG. 15. Ceramic material from Field IV.

In order to investigate the preserved depth of Wall D, a one-metre-wide square was dug along its eastern face (D 1). At the bottom of the first brick in the wall, a hard mud surface was revealed that sloped down away from the wall. Realizing the potential significance of this feature, the square was expanded to a length of 5 m along Wall D and 2.5 m in width. Initially, it appeared that this feature was a glacis covered with mud plaster. It was also noticed that the alignment of this feature was not square with Wall D, suggesting that they were not contemporaneous. In an effort to follow this structure to its depth, a trench 1 m wide and 10 m long was excavated east following the original line of D 2. Trench D 2 was excavated to a depth of 3.45 m in the centre until basal sand was reached. Further investigation and the evidence provided from the section of square D 1 showed that this feature was a fosse, similar to that in IV A, but built on a



much larger scale. The fill in the fosse sloped downwards until the mid-point, and then began to rise as it moved east, indicating the shape of a large fosse. This fosse (Fosse D) was intentionally filled. At a depth of 1.3 m, the sand and mud fill strata gave way to a layer of limestone chips that in places exceeded 1.5 m in thickness. Traces of blue and yellow paint on some of these indicated that the blocks had originally been decorated and were very likely a part of a temple.

Because of the remote location of Tell el-Borg on the eastern frontier and the lack of a nearby source for stone building blocks, the use of limestone fragments and chips to fill the fosse is curious indeed. One would expect blocks transported to this site to be used and reused, not crushed for use as fill. Sand was readily available for such a task. It seems to us that a temple once stood somewhere on the site and was deliberately dismantled and destroyed, and some of this material found its way into Fosse D. Such action, it might be provisionally suggested, is in keeping with the dismantling of Akhenaten's temples. While it is certainly possible that Amarna Period *talatat* were among blocks transported to the site for reuse, it is hard to believe that they were simply smashed and thrown into this fosse. It seems more likely to us that either at Tell el-Borg, or a nearby site like Hebua (Tjaru), there stood a temple or chapel built during the Amarna Period that was dismantled as Akhenaten's temples were in Thebes, Amarna and Heliopolis. If it were located at Tell el-Borg, Field II with its hundreds of limestone and granite fragments on the surface is a possible area where a temple might have been dismantled.

While the outer wall of the fosse was not reached in the 2000 season, we were certain of its existence since its top was exposed protruding from under Wall C in square C 1 (locus 4). This, of course, meant that Walls C and D were built after Fosse D, and that it was most likely filled in order to build a second fort.

During a brief trip to the site in January 2001, and after eight months of exposure, we noticed the outline of bricks that form the inner face of Fosse D. This discovery suggested that Fosse D was similar in construction to that of Fosse A. During the 2001 season, trench D 2 was extended and the outer wall was reached approximately 5.5 m from the top of the inner wall. As the mud-brick outer wall was being cleaned, fired brick began to appear below (pl. XIII, 1). These bricks were of a fine quality, thoroughly burned and hard, and typically measured 35.5 × 15.5 × 6.5 cm. Nine courses of fired bricks came to light in the outer wall, the rows alternating between headers and stretchers. Subsequently, it was determined that the inner wall of the fosse was also built on a foundation of fired bricks. The discovery of fired brick on this large a scale in a New Kingdom structure is rare indeed. Further comparative study of these bricks will take place in the future after more of this unique feature is excavated.

Nevertheless, some preliminary observations about the method of constructing the fosse can be made. A trench was dug to a depth of at least 2 m and at least 6 m across. Two parallel walls of fired brick were laid without mortar. No brick or mud plaster floor was uncovered between the walls of the fosse. On top of the fired brick foundations, an outer shell of mud-brick was laid, and these in turn were sealed with a mud plaster.

The question of dating the construction of Fosse D is problematic, although a date for when it was filled for the building of the second fort can be approximated. From the pottery discovered along Wall C in C 1 and C/D, it seems that this structure was functioning late in the Eighteenth Dynasty. A small window (D 12, locus 2) was cut along the northern end of Wall D. There a collection of sherds was uncovered just

beneath the top of the inside wall of Fosse D, including a stamped jar handle bearing the cartouche of *ḥh-hrw-rꜥ wꜥ n rꜥ*. The stamp is virtually identical to TBO II 37 discovered in Field II (see fig. 7). The presence of this ephemeral Amarna king's name found on an object at the very top of the fill suggests that the filling of the moat and the building of the second fort at Tell el-Borg must have occurred during or after Smenkhkare's reign. Given the presence of the limestone fragments from a temple, and the reuse of *talatat* blocks in the construction of Fosse A (perhaps associated with the fort represented by Walls C and D), it might be provisionally proposed that an Amarna Period temple had been demolished by Horemheb,<sup>48</sup> and then, or a short time later, this debris was used to fill Fosse D, and the second fort was built.

Mention was made above that the outer top of Fosse D was detected continuing south under Wall C (C 1), and that in D 1 the inside top of the fosse was not properly aligned with Wall D. In D 4, the inside top of Fosse D turned west and disappeared under Wall D. Subsequently, the fosse walls were picked up on the west side of Wall D in D 6 and 7. In a series of sondages (E 5 and E 6) the inner wall was uncovered, heading in a westerly direction. Meanwhile, the outer wall of Fosse D did not appear in square C 2 on the south side of Wall C. Hence, a cut was made through wall C (C 5) and the outer corner of the fosse was located, turning west under that wall (pl. XIII, 2). It continued under Wall C, exiting on its west side in E 1 (fig. 14). It was also found in squares E 2, 3 and 4, which run parallel to the wall in D 6 and D 7.

The discovery of the fosse walls running west of Fosse D means that it was the easternmost limit of the first fort, while Walls C and D, which overlie Fosse D, come from a later fort that stretched east of Field IV. A large section of this fort was destroyed when the canal and the service roads were cut through this area. Excavation east of the canal, opposite Field IV, to see if the second fort has survived is planned for the 2002 season.

In the process of excavating D 4, where Walls C and D meet, forming the inside corner, it became clear that these walls were built directly on top of an earlier wall. When the second phase of the second fort was built, they were laid directly on the foundations of the first phase of the second fort. In E 1, all three building phases were visible, showing their relative chronology (pl. XIII, 3). The outer fosse wall is severed by a wall from the first phase of the second fort, which in turn was partially excavated to lay the foundation for the second phase of the second fort.

The data presently available suggests that the three building phases can be provisionally dated. The second building phase, represented by the filling of the large fosse and construction of the first phase of Walls C and D, dates to the late Eighteenth Dynasty, perhaps during the reign of Horemheb. After two seasons of work, only Fosse D itself has survived from the earliest building phase in Field IV. The area inside this fosse (i.e. west and north of it) has not yet been excavated. Given the size of Fosse D, the fine quality of its construction, along with the presence of early to mid-

<sup>48</sup> Tutankhamun, whose name was attested in Field II, seems like an unlikely candidate to have dismantled Akhenaten's temples. It is known that at Karnak he actually added to the Aten temples (cf. D. B. Redford, 'Studies on Akhenaten at Thebes: A Report on the Work of the Akhenaten Temple Project of the University Museum, University of Pennsylvania', *JARCE* 10 (1973), 93 and id., 'Studies on Akhenaten at Thebes, II: A Report on the Work of the Akhenaten Temple Project of the University Museum, University of Pennsylvania, for the Year 1973-74', *JARCE* 12 (1975), 11-12. Horemheb, on the other hand, was the Amarna iconoclast who apparently undertook the demolition of the Aten Temples (D. B. Redford, *Akhenaten: The Heretic King* (Princeton, 1984), 227-31).

Eighteenth Dynasty pottery elsewhere on the site, the occurrence of the cartouche of Thutmose (III ?) on the limestone fragment from Field I, and the recovery of the stamped sherd with the name of Amenhotep II in Field III, it might be proposed that Fosse D and its accompanying fort were built during the reign of Thutmose III. The last building phase in Field IV, we suggest, is from the lengthy reign of Ramesses II.<sup>49</sup> Some Twentieth Dynasty pottery has been found at Tell el-Borg, suggesting that the fort continued in use into the twelfth century BC.

### Paleo-environmental considerations

The East Frontier Archaeological Project is undertaking a systematic study of the region around Tell el-Borg that will be reported on in a future publication. However, one extremely significant discovery must be mentioned here, albeit briefly. Under the direction of the project's geologist, Stephen Moshier, an early, defunct branch of the Nile (Pelusiac ?) was discovered that actually cut through the site in New Kingdom times (fig. 1). The site plan (fig. 3) shows that there was a low-lying area between Fields II and IV. During the excavation of trench D in Field II, area 2, which extended along the southern side of the *tell*, we failed to reach the basal sand at the usual depth (e.g. 0.5–1.0 m). Instead a black-brown, muddy soil appeared. This probe continued to a depth of 3.15 m, and shells of a Nilotic type were recovered. What this square yielded was the actual northern shoreline of what we believe was a New Kingdom (and earlier) branch of the Nile. This proposed date is based on the presence of New Kingdom sherds found in the muddy strata of Trench D. An examination of the nearby banks of the drainage canal at the east side of the site showed that it had cut across the ancient Nile branch as dark Nilotic soils could be seen in the section created by the canal's recent cut. This riverine branch ran east from the Delta, passed by Tell el-Borg and emptied into the paleo-lagoon 2 to 3 km to the east. The presence of this branch of the Nile explains why the fort was located to its southeast and why no defensive walls have been found around Fields II and III: the Nile served as a natural defense to the temple and funerary areas.

### Site identification

With the discovery of fortification walls from three different periods in the New Kingdom, along with two different fosses, it can be said with some certainty that one of the forts of the so-called 'Ways of Horus' has been uncovered, but which one? The sequence of the first three stops on the itinerary of Seti I at Karnak and on P. Anastasi I, which Gardiner correctly harmonized in 1920,<sup>50</sup> is: 1) *Htm n T3rw*, 'The Fortress of Tjaru', 2) *T3 ʿt [//]* or *Ssy*,<sup>51</sup> 'The Dwelling of the [Lion]'<sup>52</sup> or Sese (P. Anastasi I) and

<sup>49</sup> The rebuild or second phase of the later fort was a major undertaking, indicating that the earlier phase had been significantly eroded. This might point to a greater period of time between these two building phases, which may discourage a proposal of Seti I and Ramesses II as the builders of the two phases of the fort. This evidence suggests that the second fort may have been built during Horemheb's reign. However, we cannot dismiss the possibility that the second phase of the second fort dates to later in the Nineteenth or even the early Twentieth Dynasty.

<sup>50</sup> *JEA* 6, 99–116.

<sup>51</sup> Written within a cartouche as *Ssy sw*, an abbreviated writing for Ramesses.

<sup>52</sup> According to the Epigraphic Survey, *The Battle Reliefs of King Sety I*, 21–2, note r, the lion sign was visible to Champollion, but has since been lost.



FIG. 16. Seti I relief at Karnak showing *T3 dnit*.

3) *P3 mktr n Mn-m3t-r*, 'The Migdol of Menmaatre'. Since the identification of the fortress of Tjaru with Hebua I is now certain, the question remains, where are the next forts in the sequence? A narrow lagoon or Nile branch (Pelusiac?) separates Hebua I and II (fig. 1; pl. X). Could this waterway be *T3 dnit* of the Karnak relief (fig. 16)?<sup>53</sup> These two sites are just over a kilometre apart. Hebua II has only been cursorily examined by the SCA, and it too has produced New Kingdom remains.<sup>54</sup> Because it is so close to Hebua I, it might be a part of the Tjaru complex rather than the second fort in the sequence. In other words, Hebua II might be identified with the structure labeled *p3 (Htm n Trw)* which is closest to Seti I and his chariot in the Karnak relief, and the fort at Hebua I would be the buildings shown to the left of *T3 dnit* (fig. 16). If this reconstruction is correct, Tell el-Borg, located 5 km southeast of Hebua II, would be the second fort in the sequence, viz. 'The Dwelling of the Lion'. However, if Hebua II turns out to be independent of Tjaru, and hence 'The Dwelling of the Lion', then Tell el-Borg could be the third stop in the sequence, 'The Migdol of Menmaatre'. In support of this interpretation, although it may be purely coincidental, is the fact that the Arabic word *borg* means 'tower' or 'castle'<sup>55</sup> as does the Semitic word 'migdol'.<sup>56</sup> Only further exploration at Hebua II and Tell el-Borg will settle the matter. In the meantime, we

<sup>53</sup> The Epigraphic Survey, *The Battle Reliefs of King Sety I*, pl. 6.

<sup>54</sup> This material is not yet published.

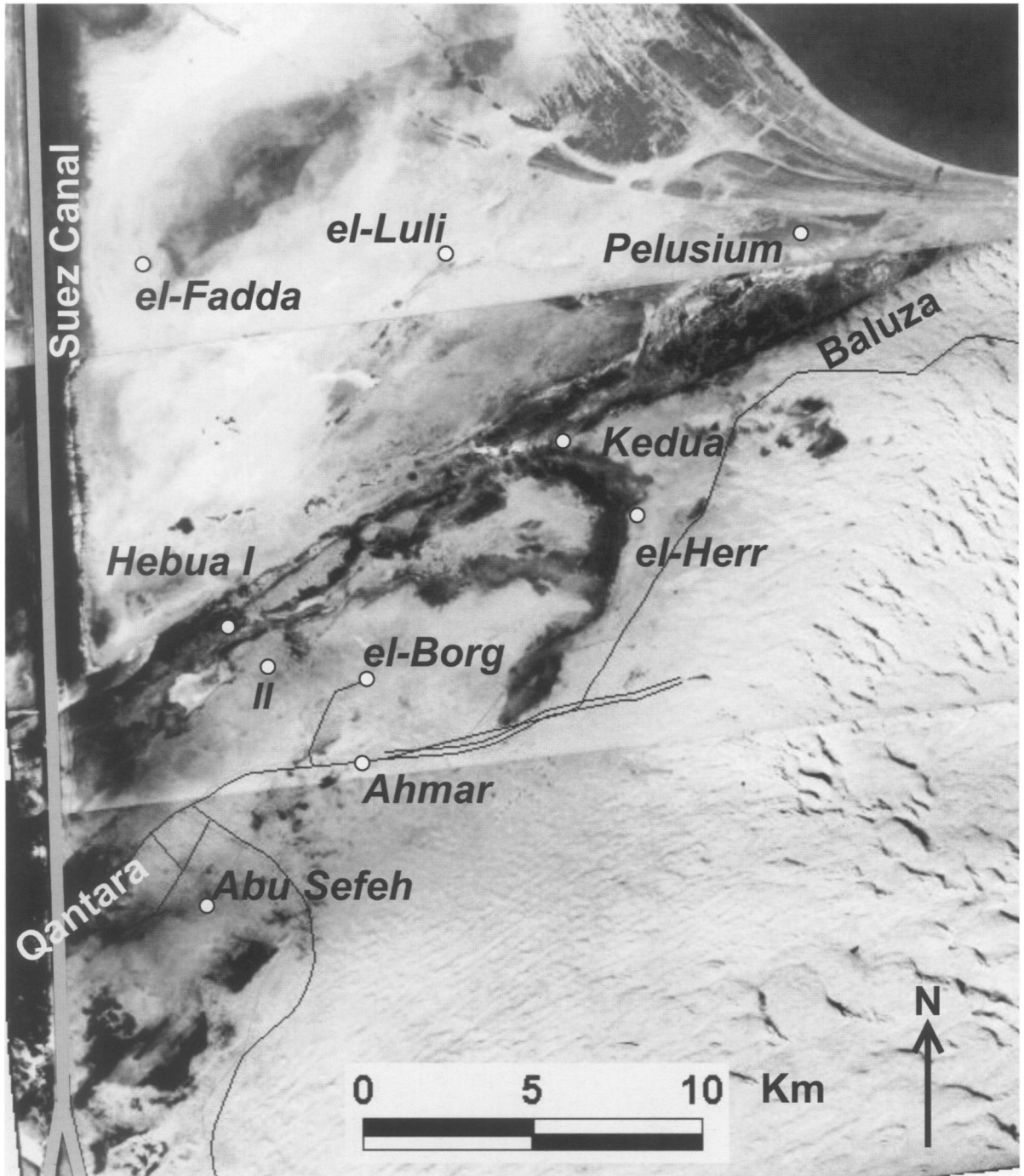
<sup>55</sup> H. Wehr, *Arabic-English Dictionary*<sup>3</sup> (Ithaca, NY, 1973), 50.

<sup>56</sup> L. Köhler and W. Baumgartner, *Lexicon in Veteris Testamenti Libros*<sup>2</sup> (Leiden, 1985), 492-3. The Egyptian *mktr* is recognized as a Semitic loan word from *mgdl* (*Wb.* II, 164-5).

might provisionally suggest that our site is 'The Dwelling of the Lion'. In support of this identification, Gardiner noted that this site was 'the farthest point along the Syria road that could be reached by water'.<sup>57</sup> He based this understanding on a passage in P. Anastasi V (24, 3–24, 8) that mentioned the shipping of three stelae and their plinths from the capital to 'The Dwelling of the Lion'. In Tell el-Borg we have a site that meets this specification, especially with the recent discovery of the branch of the Nile—unknown to all previous scholars who have attempted to correlate the archaeological and textual data—that passed by this fortified establishment.<sup>58</sup> If we are right in believing that Hebua I, Hebua II and Tell el-Borg mark the beginning of the military highway or 'Ways of Horus', then the next segment of the route should be found circling south around the eastern lagoon before turning north towards the Mediterranean coast and then turning east to Canaan (fig. 1).

<sup>57</sup> *JEA* 6, 107.

<sup>58</sup> In the final stages of writing this report, an article by G. Cavillier ('The Ancient Military Road Between Egypt and Palestine Reconsidered: A Reassessment', *GM* 185 (2001), 23–31) was published that sought to correlate some of the recently excavated sites with the toponyms from the Karnak itinerary and those in P. Anastasi I. Based only on the brief announcements of our discoveries at Tell el-Borg in *Abstracts of the VIII International Congress of Egyptologists* (2000) and 'Notes and News' and 'Digging Diary' in *EA* 17 (Autumn 2000), 11 and 32, he proposed that Tell el-Borg is 'The Migdol of Menmaatre'. While we have considered this possibility, Cavillier does not take into account Hebua II and its role in the sequence of sites. In fact, he does not mention it at all!



NASA Corona Satellite Image of western North Sinai.

A NEW MILITARY SITE ON 'THE WAYS OF HORUS'—TELL EL-BORG  
1999–2001: A PRELIMINARY REPORT (pp 169–97)



1. Exposed robber pits in Field II, Area 1, C.

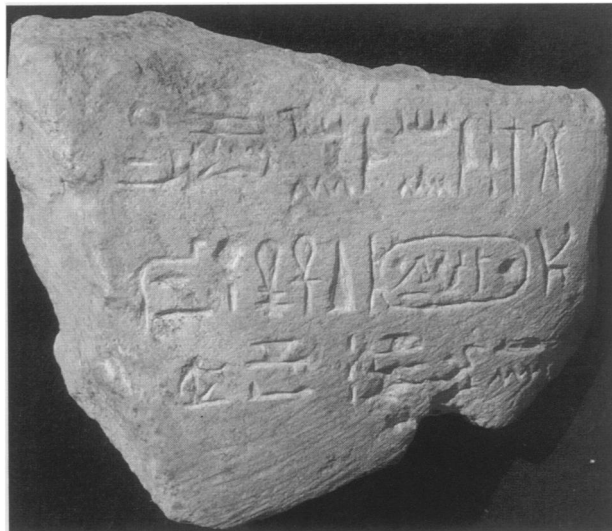


2. Steps descending into stone-lined pit in Field II, Area 1, C.

A NEW MILITARY SITE ON 'THE WAYS OF HORUS'—TELL EL-BORG  
1999-2001: A PRELIMINARY REPORT (pp 169-97)



1. Large granite block in Field II, Area 2, A.



2. Name-plate of the weapons-bearer, Kha.

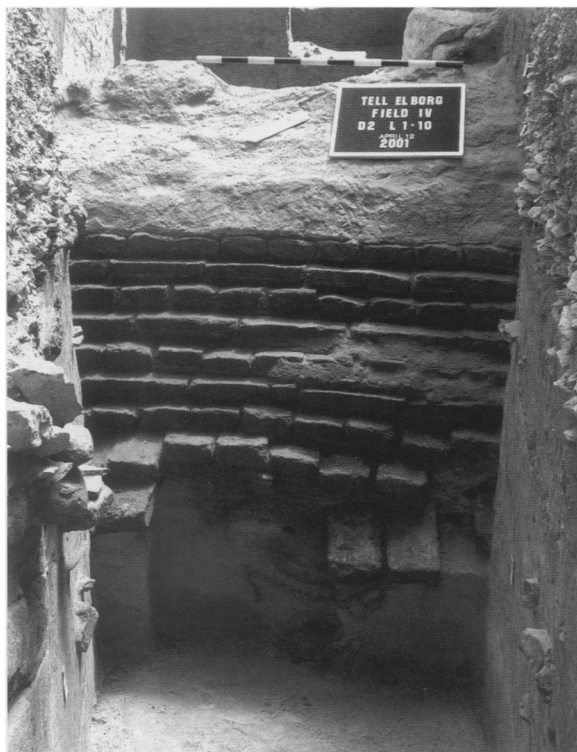


3. Fosse A in Field IV, A.



4. Cut through Fosse A, revealing its construction technique.



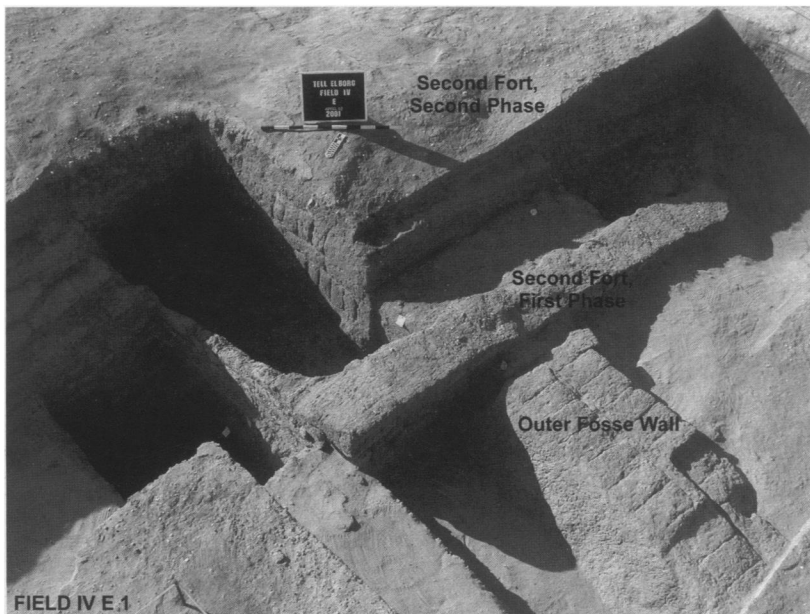


1. Fired brick foundation of outer wall of Fosse D in Field IV, D 2.



2. Cut through Wall C, C 5, exposing corner of outer wall of Fosse D.

3. Three building phases of forts in Field IV, E 1.



# HARSIÉSIS, UN VIZIR OUBLIÉ DE L'ÉPOQUE LIBYENNE?

Par FREDERIC PAYRAUDEAU

Stylistic study of the cartonnage Brooklyn 34.1223 indicates that it could date from the reign of Osorkon II to the first years of Takeloth II and Sheshonq III. This cartonnage mentions in the ancestry of the deceased a new vizier Harsiese who probably officiated in the first reigns of the Twenty-second Dynasty or who may be identified with the already known vizier Harsiese son of Nespaqashuty.

## Le cartonnage Brooklyn 34.1223

LE Brooklyn Museum of Art<sup>1</sup> conserve sous le n° 34.1223 un cartonnage appartenant à une dame Gaoutseshen (pl. XIV, 1-2).<sup>2</sup> Parmi les ancêtres de la dame, on trouve un vizir Harsiésis. Cette mention d'un vizir a été peu notée dans la littérature égyptologique.<sup>3</sup> Seeber donne la généalogie et les titres du vizir, et attribue le cartonnage aux XXV<sup>ème</sup>-XXVI<sup>ème</sup> dynasties.<sup>4</sup> De Meulenaere rapproche ce vizir Harsiésis d'un homonyme de l'époque koushite dont il publiait une statue, sans toutefois se prononcer sur l'identification.<sup>5</sup> Plus récemment, J. Elias a, quant à lui, évoqué la possibilité que Gaoutseshen soit la dame Gaoutseshen (ii), épouse du directeur du Trésor de Pharaon Hormaât, deux générations avant Montouemhat, c'est à dire qu'il plaçait Harsiésis au début de la domination éthiopienne.<sup>6</sup>

En tout état de cause, le style du cartonnage permet, semble-t-il, d'écarter ces éventualités. L'usage du cartonnage dans les matériels funéraires semble avoir disparu au tournant des VIII<sup>e</sup> et VII<sup>e</sup> siècles avant J.-C., ce qui exclut une date sous les dynasties koushite et saïte. Ceci est confirmé par la place réduite accordée aux textes, alors que ceux-ci prennent une place prédominante dans la décoration des cercueils à partir de

<sup>1</sup> Je tiens à remercier Edward Bleiberg et Richard Fazzini, qui ont bien voulu m'accorder la permission de publier ces remarques et m'ont aimablement fourni les photographies de l'objet, ainsi que le Professeur H. De Meulenaere qui a enrichi cet article de ses commentaires précieux. L'ensemble des conclusions relèvent bien sûr entièrement de ma responsabilité.

<sup>2</sup> J. Capart, 'Two Mummy Cartonnages', *The Brooklyn Museum Quarterly* 24/1 (Janv. 1937), 20-5 et id., *L'Art égyptien*, IV (Bruxelles, 1947), 777, gauche. Cf. aussi PM I<sup>2</sup>, 823 (avec erreur sur la généalogie).

<sup>3</sup> Il est ainsi absent de la liste des vizirs de la Troisième Période Intermédiaire dressée par K. A. Kitchen, *The Third Intermediate Period in Egypt* (1100-650 B.C.)<sup>3</sup> (Warminster, 1996), 597-8 (= Kitchen, *TIP*<sup>3</sup>) et de celle de M. L. Bierbrier, 'The Viziers Harsiese in the Third Intermediate Period', *JSSEA* 12 (1982), 153-4. Ajouter aussi à ces listes un Harsiésis mentionné parmi les ancêtres de la dame Nestanebishérou sur une stèle datable de l'époque saïte (R. El-Sayed, 'Deux monuments du Musée du Caire', *BIFAO* 85 (1985), 173-81, pls. 29-30, datation à corriger).

<sup>4</sup> C. Seeber, *Untersuchungen zur Darstellungen des Totengerichts im Alten Ägypten* (MÄS 35; Munich, 1976), 220/53.

<sup>5</sup> H. De Meulenaere, 'La statue d'un vizir thébain', *JEA* 68 (1982), 141.

<sup>6</sup> *Coffin Inscription in Egypt after the New Kingdom* (UMI; Chicago, 1993), 718, n. 14.

l'époque koushite. Le cartonnage de Gaoutseshen est du type à fond blanc et motifs très colorés popularisé à partir du règne d'Osorkon I<sup>er</sup>, ce qui exclut également la XXI<sup>ème</sup> dynastie, époque où les cercueils sont en bois et à fond jaune.<sup>7</sup>

Si on veut préciser la date du cartonnage de Brooklyn, c'est vers la première moitié de la XXII<sup>ème</sup> dynastie que les indices portent. Ce cartonnage n'appartient pas au type 'à deux faucons' très diffusé à partir de la fin du règne d'Osorkon I<sup>er</sup>, mais au type 'à registres', un peu moins fréquent.<sup>8</sup> D'une manière générale, le type 'à registres' est daté de la première moitié de la XXII<sup>ème</sup> dynastie. Un exemplaire du musée de Berlin<sup>9</sup> contenait une momie avec des bandelettes aux cartouches du roi Osorkon I<sup>er</sup>. Ce type de cartonnage se caractérise par les éléments suivants: en dessous du collier, on trouve un scarabée-Khépri qui déploie ses ailes sur la poitrine du défunt. Puis le reste du sarcophage est divisé en registres horizontaux, chacun présentant une scène ou un symbole du monde des morts. Sur le cartonnage de Brooklyn, on trouve d'abord deux scènes symétriques (pl. XV, 1-3). A gauche, la défunte joue des sistres devant 'Ounnéfer, roi des dieux et souverain de l'Occident', coiffé de la couronne blanche (pl. XV, 2). Derrière elle se trouve deux fils d'Horus, Amset (le seul nommé) et Hapy. A droite, Anubis effectue la pesée de l'âme devant 'Osiris, maître de l'éternité', coiffé de la couronne rouge (pl. XV, 3). Derrière eux se tiennent Douamoutef (seul nommé) et Qebhsenouf. En dessous, la barque de Sokar est encadrée par des serpents ailés personnifiant Neith et Selkis. Le reposoir de la barque de Sokar est représenté notamment sur les cartonnages de type 'à registres' suivants:

- cartonnage Bologne KS 1972, Nakhtbastetirou fille du quatrième prophète d'Amon Nakhtefmout A<sup>10</sup>
- cartonnage Caire T. 21.11.16.5, Shaouimenes, fille de 'l'enfant de chef des Mâ' Takelot<sup>11</sup>
- cartonnage Caire, inédit, numéro inconnu, situé Salle 41, Vitrine 21-A
- cartonnage Londres BM EA 30720, Nespernoub.<sup>12</sup>

Le motif du fétiche abydénien<sup>13</sup> encadré par deux béliers et protégé par deux faucons identifiés avec l'Horus de Behedet 'maître du ciel', se retrouve sur les cartonnages Londres BM EA 22939 et Chicago E22827.<sup>14</sup> Ici, le fétiche est plus imposant et son

<sup>7</sup> Sur les développements stylistiques des cercueils à l'époque libyenne, cf. A. Niwiński, 'Särg, NR-Spzt', *LÄ* V, 460-6; J. H. Taylor, *Egyptian Coffins* (Londres, 1985), 47-52 et id., 'The Development of Cartonnage Cases', dans S. D'Auria, P. Lacovara et C. H. Roehrig (éds), *Mummies and Magic. The Funeral Arts of Ancient Egypt* (Boston, 1988), 166-72.

<sup>8</sup> Taylor, dans D'Auria, Lacovara et Roehrig (éds), *Mummies and Magic*, 220-1, fig. 170.

<sup>9</sup> Cartonnage de Tentamon, Berlin 7325 = *Ägyptischen Altertümer und Gipsabgüsse. Königliche Museen zu Berlin* (Berlin, 1899), 235-6.

<sup>10</sup> *La collezione egiziana. Museo Civico Archeologico di Bologna* (Bologne, 1994), 93.

<sup>11</sup> Inédit, cf. R. K. Ritner, 'An Oblique Reference to the Expelled High Priest Osorkon?', in E. Teeter et J. A. Larson (éds), *Gold of Praise. Studies on Ancient Egypt in Honor of E. F. Wente* (SAOC 38; Chicago, 1999), 355-6, dont la datation est à revoir.

<sup>12</sup> W. R. Dawson et P. H. K. Gray, *Catalogue of the Egyptian Antiquities in the British Museum, I. Mummies and Human Remains* (Londres, 1968), pl. v.b.

<sup>13</sup> Sur le fétiche d'Abydos: E. Otto, 'Abydos-Fetisch', *LÄ* I, 47-8 et H. Beinlich, *Die Osirisreliquien. Zum Motiv der Körpergliederung in der altägyptischen Religion* (ÄA 42; Wiesbaden, 1984), 222-3.

<sup>14</sup> Cf. respectivement Dawson et Gray, *Mummies and Human Remains*, pl. v.a., et T. H. Allen, *A Handbook of the Egyptian Collection* (Chicago, 1923), 12-15.

pilier sert de colonne de texte (pl. XVI), ce qui semble indiquer une date plus avancée dans la période de fabrication du cartonnage.<sup>15</sup>

De même, contrairement aux deux exemples suscités et à d'autres similaires, le dernier registre du cartonnage de Gaoutseshen est organisé de façon moins claire (pl. XVI). On y trouve un ensemble de divinités posées sur des pavois ou les unes sur les autres: Anubis, Thot, Horus, le bélier de Mendès, les flèches entrecroisées de Neith. Cet ensemble disparate est aussi présent, mais plus structuré, sur le cartonnage Bologne KS 1972, qui date vraisemblablement de la fin du règne d'Osorkon II ou du début des règnes conjoints de Takélot II et Shéshonq III.<sup>16</sup> Les bandes qui séparent les registres, sur Brooklyn 34.1223 comme sur Bologne KS 1972, prennent la forme d'une frise 'égyptienne' à métopes alternant des couleurs vives alors que sur les exemplaires de l'époque d'Osorkon I<sup>er</sup>, ces mêmes bandes sont plus austères, souvent constituées de simples lignes horizontales alternativement noires et rouges.

Il semble donc que l'ensemble des caractéristiques stylistiques de ce cartonnage permettent de le dater du milieu de la XXII<sup>ème</sup> dynastie (Osorkon II), plutôt que du début (Osorkon I<sup>er</sup>).<sup>17</sup>

### Le vizir Harsiésis

La dame Gaoutseshen est donc vraisemblablement décédée dans le courant du règne d'Osorkon II ou au début du règne suivant (Takélot II/Shéshonq III). Le placement chronologique du vizir Harsiésis est moins facile à cerner. En effet, le lien entre Gaoutseshen et Harsiésis n'est pas limpide. L'ascendance de la propriétaire est indiquée comme suit dans la colonne centrale du cartonnage (fig. 1 et pl. XVI):

'L'Osiris, la maîtresse de maison, Gaoutseshen, dont la mère est Tanyny, dont la mère est Gaoutseshen, dont la mère est Nésykhonsoupakhéred, fille du prophète d'Amon, directeur de la Ville et vizir Harsiésis, justifié.'

La question est de savoir si le vizir Harsiésis est le père de Gaoutseshen, rejeté en fin de filiation, ou bien simplement le père de Nésykhonsoupakhéred, c'est-à-dire l'arrière arrière-grand-père de Gaoutseshen. La première solution peut-être soutenue par les parallèles avec de nombreuses filiations masculines, dans lesquelles le défunt énumère ses père, grand-père, arrière-grand-père, etc., repoussant la mention de sa mère introduite par *ms(w) n* ou *mwt=f* à la fin.<sup>18</sup> Par parallélisme, le scribe a pu préférer mentionner ici en premier les ancêtres féminines de la propriétaire. De plus, il serait étonnant que la défunte ne mentionne pas son père sur sa dernière enveloppe funéraire.<sup>19</sup>

<sup>15</sup> Pour une évolution similaire dans le type 'à deux faucons', cf. Elias, *Coffin Inscription*, 395-417 et aussi Taylor, dans D'Auria, Lacovara et Roehrig (éds), *Mummies and Magic*, 169.

<sup>16</sup> Cf. *La collezione egiziana. Museo Civico Archeologico di Bologna*, 93. La propriétaire, Nakhtbastetirou, est fille du quatrième prophète d'Amon Nakhtefmout A, lui-même contemporain des rois Osorkon II et Harsiésis I<sup>er</sup>. Voir aussi les motifs similaires sur le cartonnage Caire, Salle 41, Vitrine 21-A.

<sup>17</sup> J. H. Taylor était parvenu à une conclusion similaire dans sa thèse *The Development of Theban Coffins during the Third Intermediate Period: A Typological Study* (inédite, PhD thèse, Université de Birmingham, 1985), I, 459-60, et II, 209, n° Th.II.50.

<sup>18</sup> Ainsi, Caire CG 42211 = G. Legrain, *Statues et statuettes*, III (CGC; Le Caire, 1914), 31-2; Caire CG 42217 = *ibid.* 41-2; Caire CG 42221 = *ibid.* 48-50; Caire CG 42224 = *ibid.* 56.

<sup>19</sup> En règle générale, lorsqu'il y a peu de place, la seule personne mentionnée est justement le père.



FIG. 1. Texte de Brooklyn 34.1223, la colonne centrale.

Le vizir Harsiésis serait donc le père de Gaoutsshen, ayant vécu une génération avant elle, soit sous les règnes d'Osorkon II et ses prédécesseurs thébains.<sup>20</sup> Dans l'hypothèse probable où Gaoutsshen serait décédée jeune, peut-être avant son père,<sup>21</sup> ce dernier pourrait être identifié avec le vizir Harsiésis (D) fils du vizir Nespaqashouty qui exerça sa juridiction durant le règne de Shéshonq III.<sup>22</sup>

La seconde solution a pour elle l'avantage d'expliquer la mention de trois générations d'ancêtres en ligne féminine, cas extrêmement rare.<sup>23</sup> Aucun titre ne leur est donné, et si Gaoutsshen a tenu à les mentionner, ne serait-ce pas parce qu'elles sont justement le lien qui la relie au vizir Harsiésis? Ce serait une explication satisfaisante, mais, dans ce cas, Gaoutsshen n'aurait pas mentionné son père.<sup>24</sup> Le vizir Harsiésis serait l'ancêtre à la quatrième génération de Gaoutsshen et aurait vécu sans doute au début de la XXII<sup>ème</sup> dynastie.<sup>25</sup>

Un document nous aurait volontiers fait pencher pour la seconde hypothèse. Les fouilles d'Amélineau à Abydos à la fin du XIX<sup>e</sup> siècle ont révélé trois vases canopes<sup>26</sup> appartenant à une 'maîtresse de la maison, Nésykhonsoupakhéred, fille du prêtre d'Amon,<sup>27</sup> *t3yty s3b*, Harsiésis'. Le titre d'Harsiésis est typique de la titulature des vizirs et ont doit sans doute incorporer cet Harsiésis à la liste des vizirs de la Troisième Période Intermédiaire, comme l'avait fait Weil.<sup>28</sup> Ainsi, il a bien existé une Nésykhonsoupakhéred fille d'un vizir Harsiésis. Cependant, ces canopes, maintenant conservés au Musée du Louvre,<sup>29</sup> indiquent aussi que le père d'Harsiésis s'appelait Nespaqashouty, c'est à dire qu'on doit très vraisemblablement identifier la propriétaire de ces canopes comme une fille du vizir Harsiésis (D) fils du vizir Nespaqashouty (A).<sup>30</sup> Il aurait été tentant d'identifier ainsi le vizir

<sup>20</sup> Peut-être Maâtkhéperre Shéshonq II et Harsiésis I<sup>er</sup>.

<sup>21</sup> Cela est fortement suggéré par la découverte dans le cartonnage d'une momie d'enfant: Taylor, *The Development of Theban Coffins* II, 209.

<sup>22</sup> La statue funéraire Caire CG 42232 du vizir Nespaqashouty est datée du roi Shéshonq III et du grand prêtre d'Amon Harsiésis B = Kitchen, *TIP*<sup>3</sup>, § 171.

<sup>23</sup> Je n'en ai pas trouvé d'autre attestation sur les cercueils de la XXI<sup>ème</sup> à la XXVI<sup>ème</sup> dynasties.

<sup>24</sup> A moins de supposer qu'une généalogie différente et plus complète figurait sur les cercueils médian et extérieur de Gaoutsshen.

<sup>25</sup> Le décompte des générations reste un exercice périlleux en matière de chronologie. Ici, on a affaire à quatre générations féminines. Si on compte une moyenne de 25 ans par génération, Harsiésis aurait vécu une centaine d'année environ avant Gaoutsshen, soit sous Shéshonq I<sup>er</sup> ou Osorkon I<sup>er</sup>. Mais il suffirait que Nésykhonsoupakhéred soit née lorsque Harsiésis avait 40 ou 50 ans pour que le *floruit* de ce dernier soit repoussé sous Psousennès II.

<sup>26</sup> E. Amélineau, *Fouilles d'Abydos 1895-1896* (Paris, 1899), 52.

<sup>27</sup> Le signe devant le *ntr*, mal gravé, pourrait être aussi bien un vase pour *it-ntr* (père divin) qu'un signe *hm* pour *hm-ntr*.

<sup>28</sup> A. Weil, *Die Veziere des Pharaonenreiches* (Strasbourg, 1908), 158, § 38.

<sup>29</sup> Louvre E 21339, 21340 et sans numéro. Cette information m'a été très aimablement communiquée par le Professeur H. De Meulenaere.

<sup>30</sup> Sur ce personnage: Kitchen, *TIP*<sup>3</sup>, § 207.

Harsiésis du cartonnage, père possible d'une Nésykhonsoupakhéred et le vizir Harsiésis (D), père d'une dame homonyme, mais cela se révèle très improbable, car cela placerait le *floruit* de leur descendante Gaoutséshen au milieu du VIII<sup>ème</sup> siècle, ce qui ne s'accorde pas avec ce qu'on a pu dire du style de son cartonnage, datable au plus tard du règne de Shéshonq III.

Il reste donc deux solutions. Si on décide de faire du vizir Harsiésis l'ancêtre en ligne féminine de Gaoutséshen et si on s'en tient à la date que nous avons avancée pour le cartonnage aux alentours du règne d'Osorkon II, le vizir serait définitivement placé au tout début de la XXII<sup>ème</sup> dynastie. Il ne saurait alors être identifié au vizir Harsiésis (D) fils de Nespaqashouty, qui a du exercer dans le courant du règne de Shéshonq III. L'autre solution serait d'identifier les deux vizirs Harsiésis, et d'interpréter la généalogie dans le sens de la première hypothèse évoquée, à savoir qu'Harsiésis serait le père de Gaoutshéshen et époux de Tanyny. La dame Nésykhonsoupakhéred des canopes abydéniens serait une autre de ses enfants et non l'ancêtre homonyme de Gaoutséshen.<sup>31</sup>

Un oushebti (n° 54 des fouilles de la Troisième Période Intermédiaire au Ramesseum), appartenant à un Harsiésis, fils de Shepeniset, fille du *mr nwt t3ty* [Har]siésis<sup>32</sup> semble indiquer qu'il a existé un vizir Harsiésis au début de la période libyenne. Les tombes fouillées par la mission Quibell appartiennent pour l'essentiel à la période Osorkon I<sup>er</sup>-Osorkon II, ce qui place le *floruit* d'Harsiésis sous Shéshonq I<sup>er</sup> ou Osorkon I<sup>er</sup>. Ceci nous ferait donc pencher pour la première solution, à savoir qu'il a bien existé un vizir Harsiésis au début de la XXII<sup>ème</sup> dynastie, distinct du vizir Harsiésis (D) et qui pourrait être l'ancêtre de Gaoutséshen.<sup>33</sup>

Pour terminer, il ne paraît pas inutile de rappeler la liste des vizirs Harsiésis de la Basse Époque, ainsi que les attributions d'autres documents à l'un ou l'autre de ces personnages:

- 1) Le vizir étudié ici-même, début de l'époque libyenne: cartonnage Brooklyn 34.1223, et oushebti du Ramesseum.
- 2) Le vizir Harsiésis (D), fils du vizir Nespaqashouty (A), époque de Shéshonq III: stèle Liverpool 13916,<sup>34</sup> inscription rupestre d'Éléphantine<sup>35</sup> et vases canopes Louvre E 21339, 21340 et sans numéro.

<sup>31</sup> Si Nésykhonsoupakhéred et Gaoutséshen sont deux filles d'Harsiésis issues de son mariage avec Tanyny, cela ferait de cette seconde Nésykhonsoupakhéred l'arrière-petite-fille de la première, mentionnée sur le cartonnage de Brooklyn.

<sup>32</sup> J. E. Quibell, *The Ramesseum* (BSAE 2; Londres, 1898), pl. v. La lecture [Hr]-s3-Ist, quoique non prouvée, est suggérée par la tradition papponymique.

<sup>33</sup> J'écarte ici la possibilité que le vizir Harsiésis du cartonnage de Brooklyn soit le vizir Harsiésis (E) de Kitchen, *TIP*<sup>3</sup>, § 300 (*floruit* c. 790 av. J.-C.). En effet, la lecture du nom de ce personnage n'est pas assurée (cf. *infra* nn. 36-7). Toutefois, si son existence était avérée, alors on devrait admettre que Gaoutséshen serait obligatoirement sa fille, car faire d'elle sa descendante serait en contradiction avec la datation du cartonnage, au plus tard vers 790 av. J.-C. justement.

<sup>34</sup> Kitchen, *TIP*<sup>3</sup>, § 207 et id., 'A Lost Stela of the Third Intermediate Period', dans C. Berger et al. (éds), *Hommages à Jean Leclant*, IV (BdE 106/4; Le Caire, 1994), 163-7.

<sup>35</sup> H. Kees, 'Ein Bild des Vizirs Harsiese, Sohnes des Nespakashuti', *ZÄS* 80 (1955), 77-9. Ce relief gravé sur un rocher de l'île Éléphantine porte l'image et les titres du 'vizir, t3yty s3b, préposé à Nékhen, prophète de Maât, Harsiésis, fils de Nespaqashouty'. Malgré les doutes de Kees, il est extrêmement probable qu'il s'agisse du

- 3) On doit peut-être encore considérer un vizir Harsiésis, fils d'un certain Pa[séh]eniset mentionné sur le fragment n° 7 des *Annales des prêtres d'Amon à Karnak* daté de l'an 39 de Shéshonq III.<sup>36</sup> Le nom est mal conservé, mais la plupart des commentateurs ont lu Harsiésis. K. Jansen-Winkel a cependant récusé cette lecture et proposé [...] -*m*-[*hwt*].<sup>37</sup>
- 4) Le 'prophète d'Amon, chef des secrets dans la maison du roi, juge, directeur des grandes cours, directeur de la Ville, Harsiésis, fils de Djediâh', mentionné sur la stèle Caire JE 43197.<sup>38</sup> Le titre propre de vizir (*t3ty*) est absent, mais les autres titres portés par Harsiésis sont bien ceux d'un vizir, ainsi que son costume. La stèle date probablement de l'époque saïte au vue des caractéristiques stylistiques,<sup>39</sup> mais Harsiésis, donné comme ancêtre à la quatrième génération de la défunte, appartient sans doute à la fin de l'époque libyenne ou au début de l'époque éthiopienne.
- 5) Le vizir thébain Harsiésis (F), fils de Pétisis, arrière-grand-père de Montouemhat, début de la XXV<sup>ème</sup> dynastie.<sup>40</sup> On notera qu'aucun document contemporain ne lui donne le titre de vizir,<sup>41</sup> qui lui est constamment attribué sur les documents de ses descendants.<sup>42</sup>
- 6) Le vizir thébain Harsiésis (G) surnommé Pehrer, fils du vizir Khâemhor (A), petit-fils du précédent, XXV<sup>ème</sup> dynastie.<sup>43</sup>
- 7) Le vizir Harsiésis,<sup>44</sup> père du vizir Djedkarê et de la dame Nanefherheres, XXV<sup>ème</sup> dynastie. Harsiésis et son fils semblent avoir exercé leurs responsabilités dans le Nord du pays.<sup>45</sup>
- 8) Le vizir Harsiésis, fils du vizir Horkhébyt, XXV–XXVI<sup>ème</sup> dynasties:<sup>46</sup> statue New York MMA 35.8.1.<sup>47</sup>

vizir homonyme, seul vizir de ce nom ayant un père nommé Nespaqashouty. Le fait que son père Nespaqashouty ne porte pas le titre de vizir sur l'inscription n'est pas discriminant.

<sup>36</sup> J.-M. Kruchten, *Les annales des prêtres de Karnak (XXI–XXIII<sup>èmes</sup> dynasties) et autres textes contemporains relatifs à l'initiation des prêtres d'Amon* (OLA 32; Louvain, 1989), 59 et 64.

<sup>37</sup> Compte rendu de Kruchten, *Les annales des prêtres de Karnak*, dans *BiOr* 48 (1991), 766.

<sup>38</sup> El-Sayed, *BIFAO* 85, 180–1, pls. 29–30.

<sup>39</sup> Cf. la forme des pagnes et des perruques. Corriger en ce sens El-Sayed, *BIFAO* 85, 180 qui la datait de la XXII<sup>ème</sup> dynastie et P. Munro, *Die spätägyptischen Totenstelen* (ÄF 25; Glückstadt, 1973), 42, n. 1, qui élargissait la datation entre les XXII<sup>ème</sup> et XXV<sup>ème</sup> dynasties.

<sup>40</sup> G. Vittmann, *Priester und Beamte im Theben der Spätzeit* (Beiträge zur Ägyptologie 1; Vienne, 1978), 149–50.

<sup>41</sup> Ainsi sa statue funéraire Caire CG 42233 et celle de son fils Khâemhor Caire CG 42234 = Legrain, *Statues et statuettes* III, 81–2 et 82–4.

<sup>42</sup> Ainsi, par exemple, le cercueil Caire CG 41058.

<sup>43</sup> Vittmann, *Priester und Beamte*, 152.

<sup>44</sup> Cf. Kitchen, *TIP*<sup>3</sup>, §§ 490–1 et Bierbrier, *JSSEA* 12, 153–4, n° 5; H. De Meulenaere, 'Notes de prosopographie thébaine IV', *CdE* 57 (1982), 225–7.

<sup>45</sup> Cf. De Meulenaere, *JEA* 68, 139–44 et *CdE* 57, 226.

<sup>46</sup> Cf. De Meulenaere, *JEA* 68, 141. Le petit-fils de ce vizir a signé le papyrus Vienne D 12002 de l'an 25 de Psammétique I<sup>er</sup> = B. Menu, 'Un document juridique kouchite: le P. Vienne D 12002', dans Berger et al. (éds), *Hommages à Jean Leclant* I, 294.

<sup>47</sup> L. Bull et H. E. Winlock, 'A Group of Egyptian Antiquities', *BMMA* 30 (1935), 142–4, fig. 3. Le père de ce vizir, Horkhébyt, lui même vizir thébain est probablement différent du vizir Horkhébyt mentionné par la statuette Naples 237 = E. K. Lillesø, 'A Seated Man Wearing a Cloak (Naples no. 237)', *JEA* 73 (1987), 230–4, pl. xviii. D'après ses titres, ce dernier a certainement exercé dans la région de Memphis.

- 9) Une stèle fragmentaire du Sérapéum mentionne un vizir Harsiésis, fils du vizir Ânkhshéshonq.<sup>48</sup>
- 10) Le vizir Harsiésis, fils de Ounnéfer, contemporain des rois de la XXX<sup>ème</sup> dynastie.<sup>49</sup>

Quelques documents nommant un vizir Harsiésis sans plus de précision doivent probablement être rattachés aux dix dossiers énumérés ci-dessus, ou bien constituer des éléments pour un autre vizir de ce nom:

- Un scarabée mentionné par P. Newberry au nom et titres du ‘prophète d’Amon-Rê, *mr nwt t3ty*, Harsiésis’.<sup>50</sup> Cet objet est en théorie attribuable à n’importe lequel des nombreux vizirs homonymes des époques libyenne, éthiopienne et saïte.
- Contrepoids de ménat Berlin 23733.<sup>51</sup> Souvent attribué de façon erronée à un prétendant royal et grand prêtre Harsiésis, il mentionne en réalité un simple ‘prophète (d’Amon?), directeur de la Ville et vizir Harsiésis’.<sup>52</sup> L’objet est dans la droite ligne des réalisations en bronze des époques libyenne et éthiopienne et ne peut, par conséquent, être attribué précisément à un des vizirs Harsiésis entre la XXII<sup>ème</sup> et la XXVI<sup>ème</sup> dynastie.

<sup>48</sup> Aimablement signalée par H. De Meulenaere et mentionnée probablement par D. Devauchelle, ‘Présentation des stèles nouvellement découverte au Serapeum’, *BSFE* 106 (1986), 39, n° RB 18395. Le père, le vizir Ânkhshéshonq, est peut-être le même que celui mentionné sur la stèle du Sérapéum IM 4097 = E. Chassinat, ‘Textes provenant du Sérapéum de Memphis (suite)’, *RT* 23 (1901), 78-9 et Weil, *Die Veziere des Pharaonenreiches*, 141-2. Dans ce cas, il serait datable du début de la période saïte. Sur ce vizir, voir aussi A. Leahy, “‘May the King Live’: The Libyan Rulers in the Onomastic Record”, dans A. B. Lloyd (éd.), *Studies in Pharaonic Religion and Society in Honour of J. Gwyn Griffiths* (EES Occasional Publication 8; Londres, 1992), 149-50.

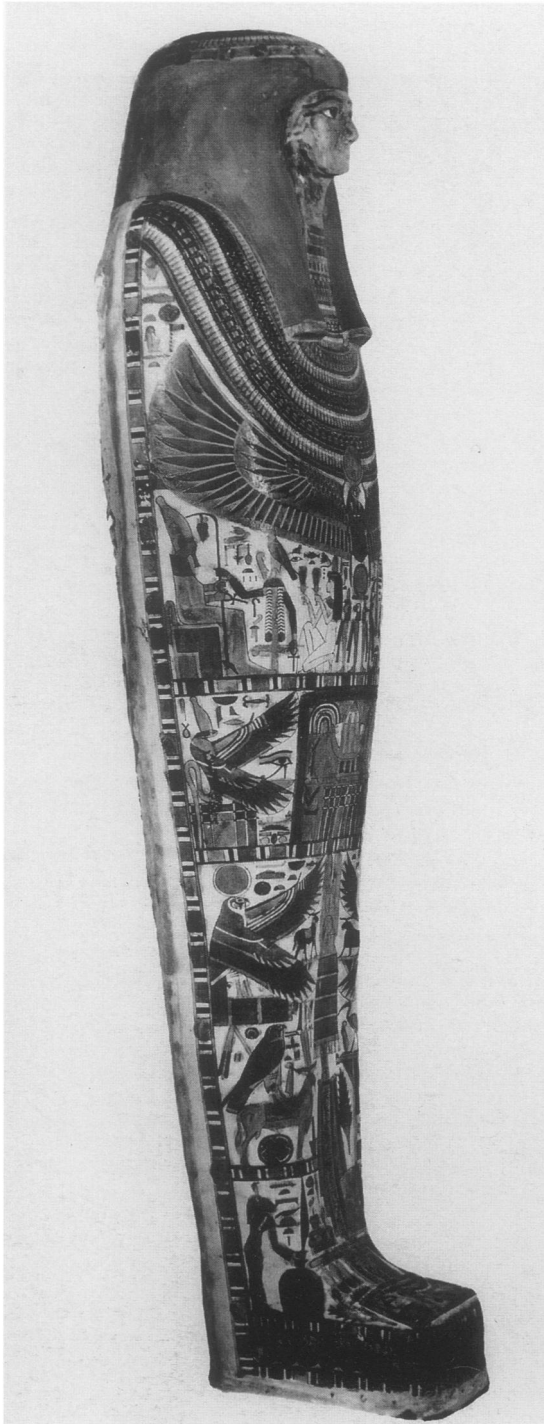
<sup>49</sup> H. De Meulenaere, ‘Le vizir Harsiésis de la 30<sup>ème</sup> dynastie’, *MDAIK* 16 (1958), 230-6 et plus récemment, J.-C. Goyon et M. Gabolde, ‘Une base du vizir Harsiésis’, *Bulletin des Musées et Monuments Lyonnais* (1991), n° 3-4, 2-15 où on trouvera une liste des documents appartenant ou mentionnant ce personnage.

<sup>50</sup> P. E. Newberry, *Scarabs. An Introduction to the Study of Egyptian Seals and Signet Rings* (Londres, 1906), pl. 38.

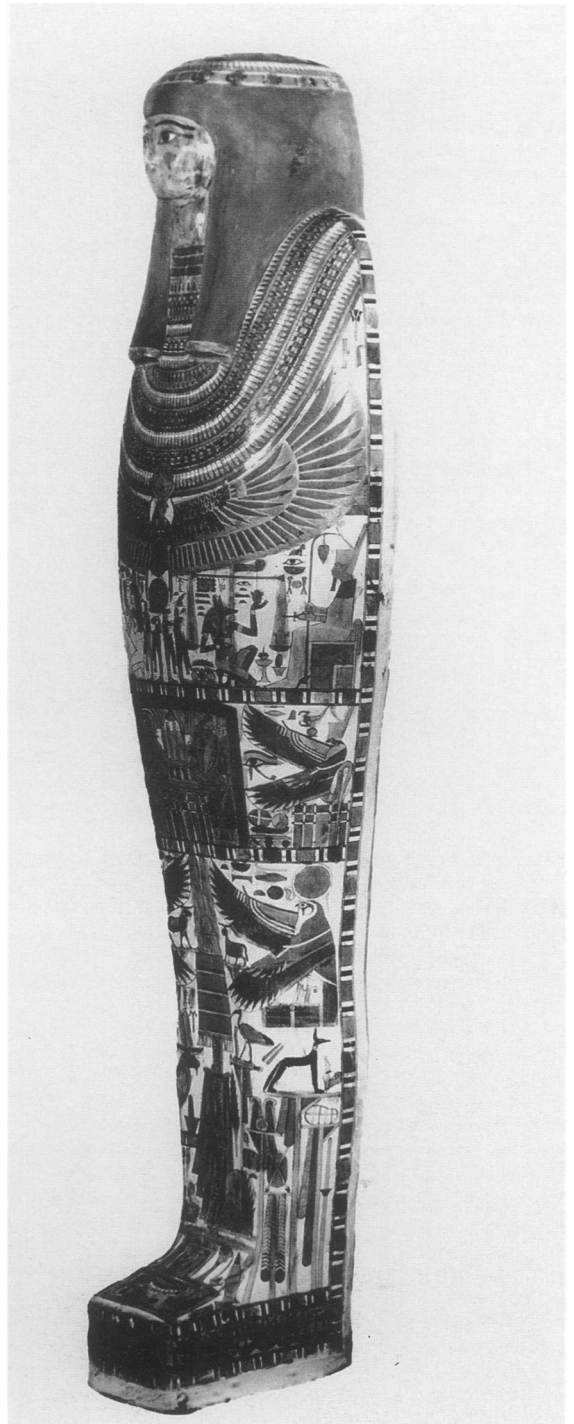
<sup>51</sup> F. W. von Bissing, ‘Unterteil eines Menits’, *NGWG* III, 4 (1939), 89-115, pls. 2-3 et J. Leclant, ‘Sur un contrepoids de Menat au nom de Taharqa: allaitement et “apparition” royale’, dans *Mélanges Mariette* (BdE 32; Le Caire, 1961), 271-2, pl. i, C.

<sup>52</sup> Aucun de ses titres ne révèle de prétentions royales. Ce personnage ne saurait donc être identifié avec le roi Harsiésis (A). Selon la documentation disponible, ce dernier n’a d’ailleurs jamais été ni grand prêtre d’Amon, ni vizir. Le grand prêtre Harsiésis (B) n’a quant à lui jamais été vizir et n’a jamais eu de prétentions royales. Sur ces deux Harsiésis (A) et (B), cf. K. Jansen-Winkel, ‘Historische Probleme der 3. Zwischenzeit’ *JEA* 81 (1995), 129-36.

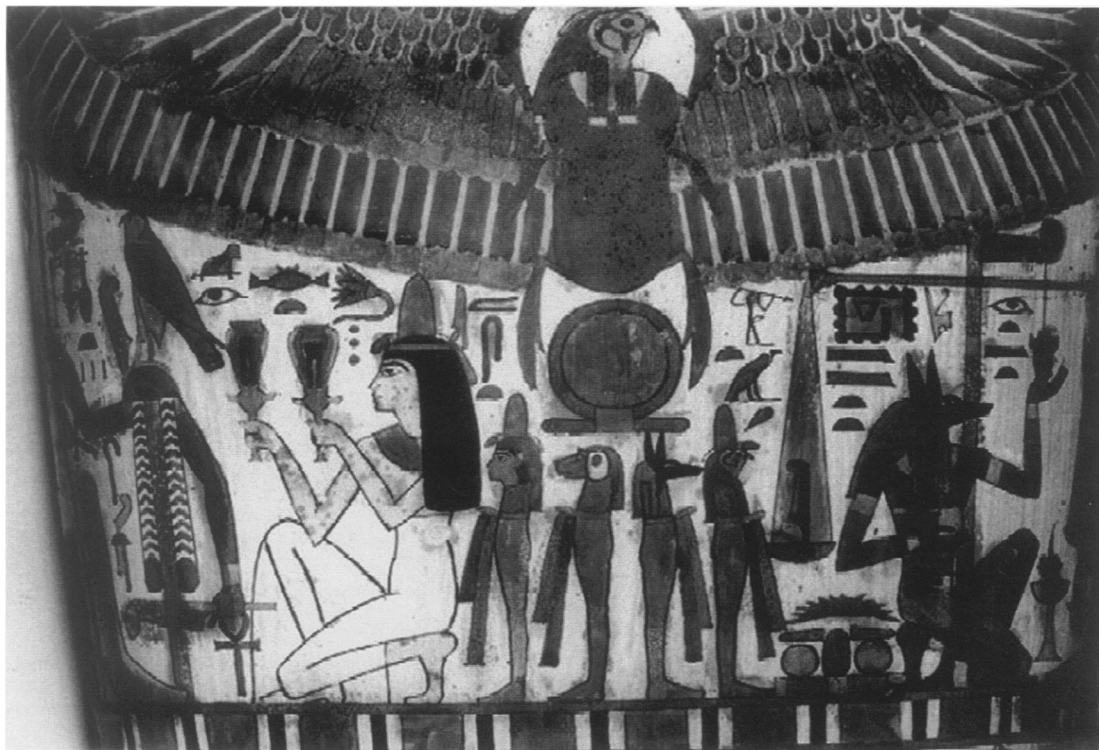




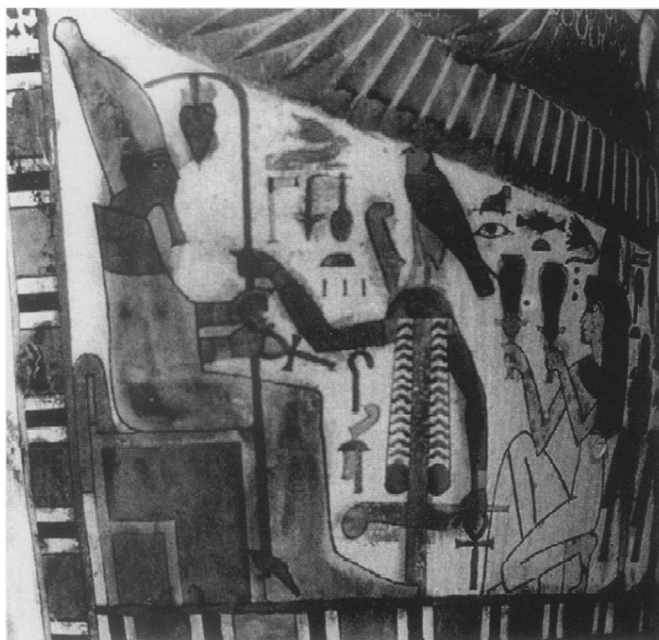
1. Le cartonnage Brooklyn 34.1223, côté droit  
(photograph Brooklyn Museum of Art).



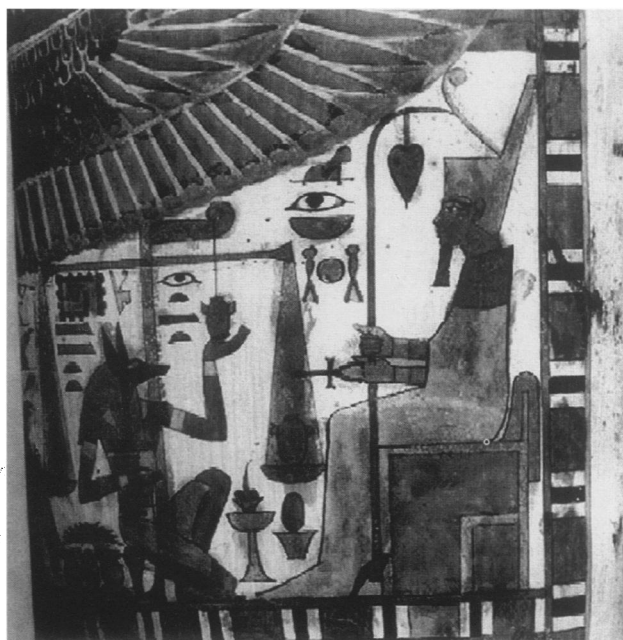
2. Cartonnage Brooklyn 34.1223, côté gauche  
(photograph Brooklyn Museum of Art).



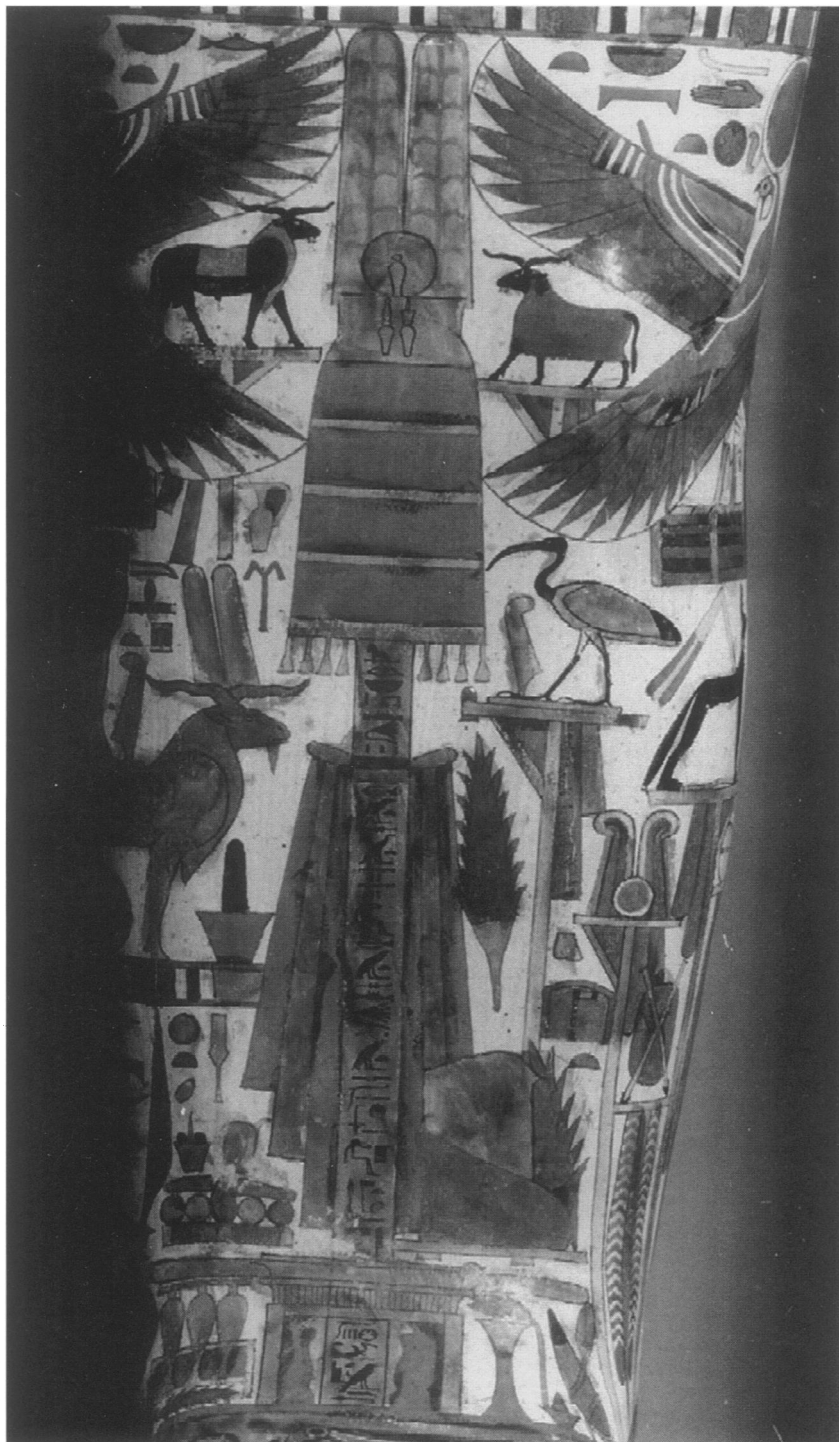
1. Premier registre: scènes symétriques (photograph Brooklyn Museum of Art).



2. Gaoutséshen devant Ounnéfer (photograph Brooklyn Museum of Art).



3. La pesée de l'âme par Anubis devant Osiris (photograph Brooklyn Museum of Art).



Cartonnage Brooklyn 34.1223, partie inférieure: fétiche abydénien et colonne de texte.  
(photograph Brooklyn Museum of Art).

HARSIÉSIS, UN VIZIR OUBLIÉ DE L'ÉPOQUE LIBYENNE? (pp. 199-205)

# THE GEOLOGY OF THE ROSETTA STONE\*

By ANDREW MIDDLETON *and* DIETRICH KLEMM

For many years the Rosetta Stone was said to have been made from basalt, a fine-grained igneous rock. Recent cleaning and conservation work provided the opportunity to investigate the nature of the stone, its geological classification and its possible geological source. Petrographic observations, coupled with examination and elemental analysis in a scanning electron microscope, have shown that the stone is not basalt, differing both in mineralogy and chemical composition. Rather, it is a granodiorite, similar in composition to the so-called 'black granite' from Aswan but somewhat finer-grained than most examples of that rock. It is most probable that the slab of rock used for the Rosetta Stone was obtained from the Ptolemaic quarrying sites to the south of Aswan. The description of the Stone as 'une pierre de granite noir', applied by the French soon after its discovery, was essentially correct and the designation 'basalt' erroneous.

## Introduction

THE Rosetta Stone was found in mid-July 1799 by a company of French soldiers working at Rosetta, now known as el-Rashid (fig. 1). The Stone is a part of a larger stela that was inscribed with the Memphis Decree, issued in 196 BC, which was concerned with the cult of King Ptolemy V Epiphanes (205–180 BC). Much has been written concerning its discovery and the pivotal role that the Rosetta Stone has played in our understanding of Egyptian hieroglyphs.<sup>1</sup> It is approximately 114 cm in height, 72 cm wide and 28 cm thick and its weight has been estimated to be in excess of 750 kg. The inscriptions are lightly incised into the smoothed front surface but the sides are not smoothed, though relatively even; the back was left with a rough finish that was presumably not intended to be seen once the stela had been erected.<sup>2</sup> Although a fragment broken from a larger artefact, the generally very good preservation of the stone bears witness to its toughness and durability. This paper is concerned with the nature of the stone itself.

Until recently, the Rosetta Stone was said to be made of basalt,<sup>3</sup> a fine-grained, dark-coloured igneous rock. However, it was not always referred to in this way. In the

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<sup>1</sup> See, for example, C. Andrews, *The Rosetta Stone* (London, 1981); R. Parkinson, *Cracking Codes. The Rosetta Stone and Decipherment* (London, 1999); R. Solé and D. Valbelle, *The Rosetta Stone*, translated by S. Rendall (London, 2002) and references therein.

<sup>2</sup> Parkinson, *Cracking Codes*, 26–8.

<sup>3</sup> For example, Andrews, *The Rosetta Stone*, 9.

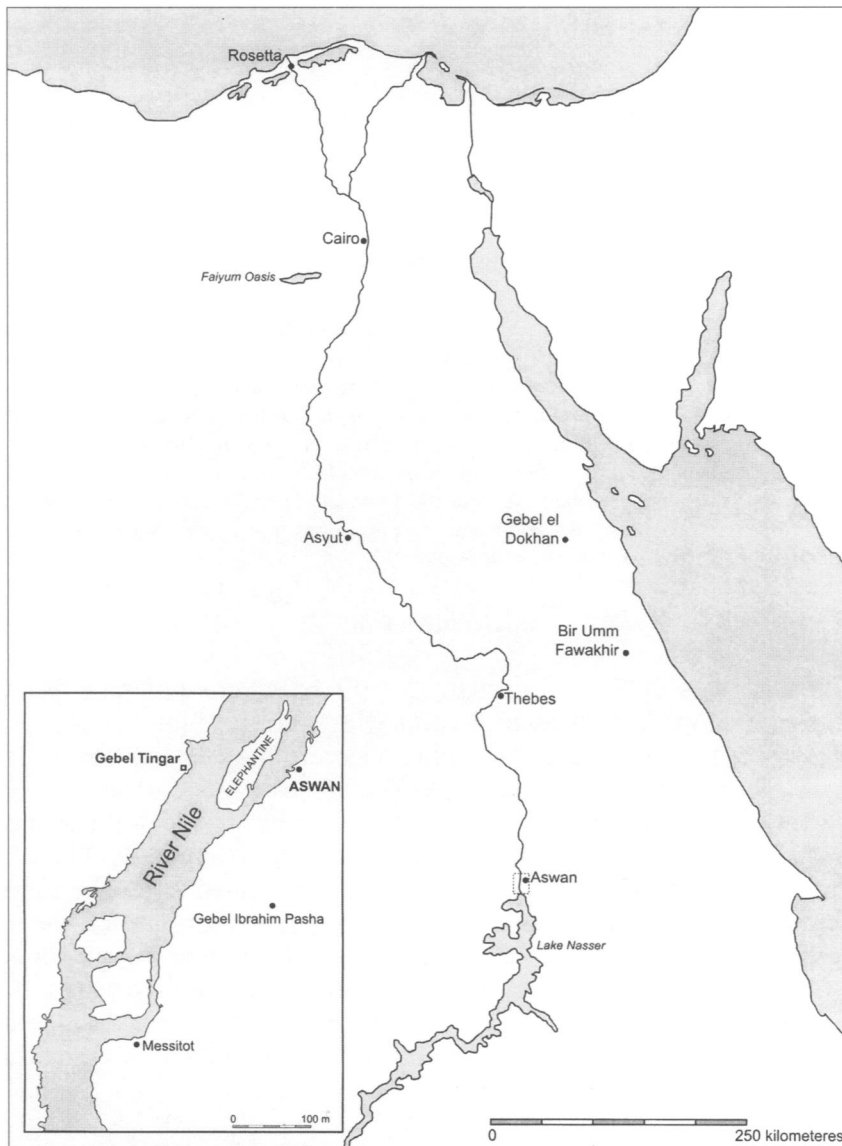


FIG. 1. Map of the Nile Valley, showing the location of Rosetta, Aswan and other sites mentioned.

catalogue of pieces of sculpture to be taken by the British Forces in Egypt from the French Army in Alexandria, received from Joseph Fourier, Secretary to the French Institut d'Égypte, it is referred to as 'Une pierre de granite noir chargée de trois bandes de caractères hiéroglyphiques Grecs et Égyptiens trouvée à Rosette'.<sup>4</sup> In the English list, signed by Colonel Turner in September 1801, the type of stone is not mentioned

<sup>4</sup> British Museum Archive CE 115/3, British Museum Cuttings and Extracts to c. 1862. Folio 69. Copy of the Catalogue received from J. Fourier, Secretary to the French Institute, delivered to Col. Turner. See also M. L. Bierbrier, 'The Acquisition by the British Museum of Antiquities Discovered During the French Invasion of Egypt', in W. V. Davies (ed.), *Studies in Egyptian Antiquities. A Tribute to T. G. H. James* (British Museum Occasional Paper 123; London, 1999), 111–13.

and the entry reads simply 'A Stone with three inscriptions', although some years later, in a letter to the Society of Antiquaries dated 30 May 1810, Turner (by then Major General) referred back to Fourier's description of the stone as 'black granite'.<sup>5</sup> Similarly, the Stone is referred to as 'black granite' in the *Description de l'Égypte* published between 1809 and 1828.<sup>6</sup> Nevertheless, it seems that for many years the Rosetta Stone was referred to simply as 'stone' in British Museum Synopses, although in the 1847 edition the Stone is described as 'basalt'.<sup>7</sup>

It has not been possible to establish why the decision was taken to refer to the Rosetta Stone as 'basalt' rather than 'black granite'. However, examination of the stone shows that this decision, although erroneous, is perhaps understandable. The stone appears to be a dark-coloured, fine to medium-grained, crystalline rock, a description that would be applied to few granites but could properly be applied to many basalts.<sup>8</sup> The possibility for confusion of the two rock types was recently noted by Brown and Harrell,<sup>9</sup> who commented that phenocrysts may sometimes be absent from 'black granite', leading to its misidentification as 'dolerite' (a rock of the same composition as basalt but with a somewhat coarser grain size).

Once applied, the term 'basalt' seems to have been used consistently for many years, both within the Museum and more widely.<sup>10</sup> A preliminary reassessment<sup>11</sup> was made following observations by one of the authors (Klemm), indicating that the Rosetta Stone was made not of basalt but of a rock type similar to the so-called 'black granite' (= granodiorite) of Aswan, suggesting a return to the name applied originally by Fourier in 1802. The purpose of this paper is to provide some record of the nature of the stone, its geological classification and its possible geological source. Recent cleaning and conservation work, carried out in preparation for the re-display of the Rosetta Stone,<sup>12</sup> provided both the impetus and the opportunity for this study.

For many years the Rosetta Stone presented a striking image, with bright white inscriptions set against a dense black background. This was not its original appearance, as the cleaning revealed, and was not how the Stone had appeared at the time of its discovery in 1799. It had been thought that the black background might be due in part to the residues of ink used in January 1800 to make 'contact prints' from the Stone

<sup>5</sup> Letter dated 30 May 1810, from Turner to Nicholas Carlisle, Secretary to the Society of Antiquaries. Printed as 'An Account of the Rosetta Stone', *Archaeologia: or Miscellaneous Tracts Relating to Antiquity* 16 (Society of Antiquaries of London, 1812), 212–14.

<sup>6</sup> *Description de l'Égypte ou Recueil des observations et des recherches qui ont été faites en Égypte pendant l'Expédition de l'armée française*, V. *Antiquités* (Paris, 1823), 547.

<sup>7</sup> *Synopsis of the Contents of the British Museum* (London, 1847), 113–14.

<sup>8</sup> A. Allaby and M. Allaby, *The Concise Oxford Dictionary of Earth Sciences* (Oxford, 1990). Whether the pink vein that runs obliquely across the top of the Stone (see discussion in text), and which might have prompted a more detailed examination, was already obscured by the presence of dark-coloured surface coatings (see text) is not known.

<sup>9</sup> V. M. Brown and J. A. Harrell, 'Aswan Granite and Granodiorite', *GM* 164 (1998), 33–7.

<sup>10</sup> Andrews, *The Rosetta Stone*, 9; *Encyclopaedia Britannica* 19 (Chicago, 1944), 558.

<sup>11</sup> See Andrews, *The Rosetta Stone*, 21<sup>st</sup> impression (1999), 9, in which the Rosetta Stone is referred to as a 'granitoid stone'. In B. G. Aston et al., 'Stone', in P. T. Nicholson and I. Shaw (eds), *Ancient Egyptian Materials and Technology* (Cambridge, 2000), 37, the Rosetta Stone is included in a list of examples of granodiorite from Aswan.

<sup>12</sup> See Parkinson, *Cracking Codes*, 23; also E. Miller et al., 'The Examination and Conservation of the Rosetta Stone at the British Museum', in A. Roy and P. Smith (eds), *Tradition and Innovation, Advances in Conservation* (London, 2000), 128–32.

itself.<sup>13</sup> However, analysis showed that it was probably due mainly to the application of a protective layer of carnauba wax which had absorbed dirt and finger grease over many years, obscuring the true colour of the stone.<sup>14</sup> It was known that the white of the inscriptions had been retouched on several occasions, most recently in 1980. Now that the surface has been cleaned and the modern white inlay removed, it can be seen that the stone has an overall dark grey colour with a distinct 'sparkle' caused by reflections from crystals within the rock. A pink vein cuts across the top left hand corner and can be seen also on the left side and back of the Stone.

### Observations

A small fragment was removed from the back of the Stone and this was prepared as a polished thin section. Petrographic examination was undertaken using a polarizing microscope; a scanning electron microscope (SEM; JEOL JSM-840), equipped with an energy-dispersive analysis (EDXA; Oxford Instruments ISIS) accessory, was used for examination and chemical analysis.

The texture of the stone can be seen much more clearly on the freshly fractured surface of the fragment removed for sectioning. The rock is dark coloured (melanocratic) and fine-grained, with some grains distinguishable with the aid of a hand lens; some crystals are visible with the naked eye, particularly when at a suitable angle to catch the light on well-developed cleavage faces. The stone is not dissimilar in appearance to basalt, and rather different from the so-called 'black granite' of many ancient Egyptian statues, which typically is coarser grained and usually porphyritic, with large white phenocrysts of feldspar.

However, in thin section, it is immediately obvious that the Rosetta Stone was not carved from a slab of basalt (compare pl. XXVII, 1 and 2); it lacks both olivine and pyroxene but contains quartz as a major phase, features that are incompatible with it being a basalt. Further, there are several features of the rock that suggest that it may have been subject to geological processes of metasomatism or metamorphism,<sup>15</sup> which have altered the original mineralogy and texture (see appendix). Discussion of this topic, which impinges on a longstanding discussion (at times controversial) concerning the origin of granites, is beyond the scope of this paper; for convenience, terms appropriate to igneous rocks are used here to describe the Rosetta Stone. The texture is moderately even, with a typical grain size of *c.* 0.2–0.4 mm, but with some larger crystals (phenocrysts) up to a few millimetres in length. Minerals present in amounts more than *c.* 5% include quartz, feldspar (both alkali feldspar and plagioclase), hornblende and biotite; minerals present in smaller amounts include opaque iron oxides, apatite and titanite (sphene). A more complete description is given in the appendix.

Examination of the polished thin section in the SEM, using back-scattered electron imaging, showed clearly the texture of the stone (pl. XXVI, 1). Contrast in the back-scattered electron images is sensitive to differences in mean atomic number, so that in general the different mineral phases appear in the images as grains with different grey

<sup>13</sup> C. C. Gillispie and M. Dewachter (eds), *Monuments of Egypt: The Napoleonic Edition: The Complete Archaeological Plates from La Description de l'Égypte* (Princeton, 1987), 21–2.

<sup>14</sup> Miller et al., in Roy and Smith (eds), *Tradition and Innovation*, 128–32.

<sup>15</sup> D. Shelley, *Igneous and Metamorphic Rocks under the Microscope* (London, 1993), ch. 5, 245–313.

TABLE 1. Comparison of 'Whole Rock' Analyses of Rosetta Stone and Sample 489 with some Published Data

Sample	Rosetta Stone	Sample 489	Meneisy et al., <i>Chemie der Erde</i> 38 (1979), 121-35	Higazy and Wasfy, <i>Bulletin de l'Institut de d'Égypte</i> 6 (1956), 209-56	Cox et al., <i>The Interpretation of Igneous Rocks</i>	Cox et al., <i>The Interpretation of Igneous Rocks</i>	Cox et al., <i>The Interpretation of Igneous Rocks</i>
n	3	2	mean of 5 granodiorite analyses	mean of 3 granodiorite analyses	Basalt	Granodiorite	Tonalite
SiO <sub>2</sub>	62.7	61.6	59.50	59.93	49.20	66.09	61.52
TiO <sub>2</sub>	1.3	2.5	1.92	1.70	1.84	0.54	0.73
Al <sub>2</sub> O <sub>3</sub>	14.5	14.1	14.42	14.13	15.74	15.73	16.48
Fe <sub>2</sub> O <sub>3</sub>	**	**	2.07	2.38	3.79	1.38	1.83
FeO	8.4	8.0	5.96	6.29	7.13	2.73	3.82
MnO	<0.1	0.2	0.08	0.16	0.20	0.08	0.08
MgO	1.3	1.3	3.00	1.96	6.73	1.74	2.80
CaO	4.0	4.2	4.45	4.55	9.47	3.83	nd
BaO	nd	nd	na	na	nd	nd	5.42
Na <sub>2</sub> O	4.5	4.4	3.53	3.58	2.91	3.75	3.63
K <sub>2</sub> O	2.3	2.5	3.07	3.35	1.10	2.73	2.07
P <sub>2</sub> O <sub>5</sub>	1.0	1.1	0.97	1.09	0.35	0.18	0.25
CO <sub>2</sub>	na	na	na	0.10	0.11	0.08	0.14
H <sub>2</sub> O							
(total)	na	na	1.22	1.01	1.38	1.04	1.24
Total	100.0	99.9	100.19	100.23	99.95	99.90	100.01

\* normalised analyses

\*\* total iron, expressed as FeO, was analysed

levels, those of higher mean atomic number being 'brighter'. Thus, quartz, which has one of the lowest mean atomic numbers amongst the minerals present, appears almost black, whilst mica and hornblende, which have higher mean atomic numbers, appear almost white. The energy-dispersive X-ray analyser was used to analyse the rock chemically. In order to obtain an estimate of the 'whole-rock' chemistry selected areas of the section (typically *c.* 4 sq. mm) were analysed. This procedure may have introduced some errors into the analyses for some of the elements (typically up to *c.* 10% relative).<sup>16</sup> The results, which should be regarded as semi-quantitative, are given in Table 1.

<sup>16</sup> Discussed by A. L. Albee et al., 'Source and Magnitude of Errors in "Broad-Beam Analysis" (DBA) with the Electron Probe', *Proceedings of the Eighth Lunar Science Conference, Geochimica et Cosmochimica Acta*, Supplement 8 (1977), 7-9.



Geological samples from the collection of Egyptian stone brought together by Dietrich and Rosemarie Klemm<sup>17</sup> were examined to determine if any offered a match and perhaps a potential source of the rock used for the Rosetta Stone. These samples were available both as hand specimens and as thin sections. It was noted that several samples from the Aswan area, identified as 'xenoliths', were more or less similar in appearance, both in hand specimens and as thin sections, to the Rosetta Stone. An example is sample 489, which came from a small granodiorite quarry at Gebel Tingar, where it is overlain by Nubian sandstone. The quarry is adjacent to the River Nile on the west bank, to the west of Elephantine (fig. 1).<sup>18</sup> The appearance of this rock in thin section (pl. XXVII, 3) indicates it is similar in texture and mineralogy to the Rosetta Stone (pl. XXVII, 1). In order to facilitate further examination and analysis in the SEM, a polished thin section was made from a portion of sample 489. Observation of this confirmed the textural similarity of the two rocks (compare pl. XXVI, 1 and 2). Chemical analyses of selected areas were again undertaken using the EDXA facility on the SEM to estimate the composition of the 'whole rock' (see Table 1).

### Geological classification

As noted already, the Rosetta Stone lacks both pyroxene and olivine but contains quartz as a major phase, so that it cannot be classified on the basis of its mineralogy as basalt (or its coarser-grained equivalent, dolerite). The chemical data support this interpretation. Amongst other chemical differences, the Rosetta Stone is too rich in silica and too low in calcium oxide to be classified as basalt. It is closer to the composition of granodiorite (see Table 1).

The most widely accepted scheme for the classification of crystalline igneous rocks is that proposed by the IUGS.<sup>19</sup> It is based upon the mineralogy of the various rock types and the relevant part of this scheme, the Quartz, Alkali feldspar, Plagioclase feldspar (QAP) triangular diagram, is reproduced as figure 2. In order to use this system it is necessary first to quantify the relative proportions of quartz, alkali feldspar and plagioclase feldspar in the rock. This is frequently done by 'point counting', a well established petrographic technique in which the thin section is viewed in the polarizing microscope and the minerals present at each of several hundred points on a notional grid are recorded and then used to estimate the proportions of each mineral present.<sup>20</sup> In the present case, however, optical examination (coupled with the SEM observations, see below) of the thin sections of the Rosetta Stone and sample 489 suggested that it would be difficult to distinguish reliably between the plagioclase, alkali feldspar and quartz. This difficulty is especially acute because most of the fine-grained plagioclase appears to be untwinned, a feature that is usually diagnostic of this group of minerals. This same

<sup>17</sup> These collections have now been donated to The British Museum and are housed in the Department of Ancient Egypt and Sudan.

<sup>18</sup> R. Klemm and D. Klemm, *Steine und Steinbrüche im Alten Ägypten* (Berlin, 1993), fig. 355.

<sup>19</sup> A. L. Streckeisen, 'Plutonic Rocks—Classification and Nomenclature Recommended by the IUGS Subcommittee on the Systematics of Igneous Rocks', *Geotimes* 18 (1973), 26–30. See also texts such as A. R. McBirney, *Igneous Petrology* (Boston, 1993), 24–32; Shelley, *Igneous and Metamorphic Rocks*, 24–33.

<sup>20</sup> J. S. Galehouse, 'Point Counting', in R. E. Carver (ed.), *Procedures in Sedimentary Petrology* (New York, 1971), 385–407.

TABLE 2. *Summary of Estimates of Modal Mineralogy from SEM Micrographs*

	Rosetta Stone		Sample 489	
	number of areas	re-normalised Q+A+P=100%	number of areas	re-normalised Q+A+P=100%
Quartz (Q)	4	36	4	37
Plagioclase feldspar (P)	38	55	29	47
Alkali feldspar (A)	6	9	13	16
Hornblende + biotite	30		32	
Iron/titanium oxides	1		3	

For both samples each area examined was *c.* 4 sq. mm.

problem was encountered by Meneisy et al. in their study of Aswan granitic rocks.<sup>21</sup> They resorted to staining their thin sections using sodium cobaltinitrite,<sup>22</sup> a chemical process, involving etching, that would not have been acceptable on the thin section of the Rosetta Stone.

Instead, the Oxford Instruments (ISIS) image analysis software was used to obtain estimates of the proportions of quartz, plagioclase, alkali feldspar, hornblende plus biotite, and iron/titanium oxides, each being defined by a particular grey level range in the SEM images of the thin sections. The results are summarized in Table 2. The values for quartz (Q), alkali feldspar (A) and plagioclase (P) were recalculated so that these three minerals summed to 100% and the new values plotted on the QAP (fig. 2). It can be seen that the Rosetta Stone, and also sample 489, fall in the *granodiorite* field of the diagram in figure 2; the Rosetta Stone is close to the boundary with the *tonalite* field.

The chemical data for the Rosetta Stone may be compared with average major element compositions for basalt, granodiorite and tonalite reproduced in Table 1.<sup>23</sup> Examination of these data supports the interpretation of the petrographic and SEM observations that the Rosetta Stone is a granodiorite, close to tonalite in composition.

### Provenance

The close petrographical and chemical similarity between the Rosetta Stone and sample 489 from Gebel Tingar suggest that the stone used for the stela of which the Rosetta Stone is a part was obtained from an outcrop in the Aswan area. This inference is supported by comparison with previously published analyses of rocks from Aswan (see Table 1 and fig. 2). From these it can be seen that the chemical and mineralogical composition of the Rosetta Stone is within the range expected for dark-coloured rocks from the Aswan area. Another feature that links the Rosetta Stone to rocks from Aswan is the relative abundance of apatite, which has been remarked upon by several investigators.<sup>24</sup> This abundance of apatite reflects the relatively elevated levels of

<sup>21</sup> M. Y. Meneisy et al., 'Contributions to the Petrography, Petrochemistry and Classification of Aswan Granitic Rocks, Egypt', *Chemie der Erde* 38 (1979), 121-35.

<sup>22</sup> This procedure is described by G. M. Friedman, 'Staining', in Carver (ed.), *Procedures in Sedimentary Petrology*, 511-30.

<sup>23</sup> K. G. Cox, et al., *The Interpretation of Igneous Rocks* (London, 1979), appendix 2.

<sup>24</sup> R. A. Higazy, and H. M. Wasfy, 'Petrogenesis of Granitic Rocks in the Neighbourhood of Aswan, Egypt',

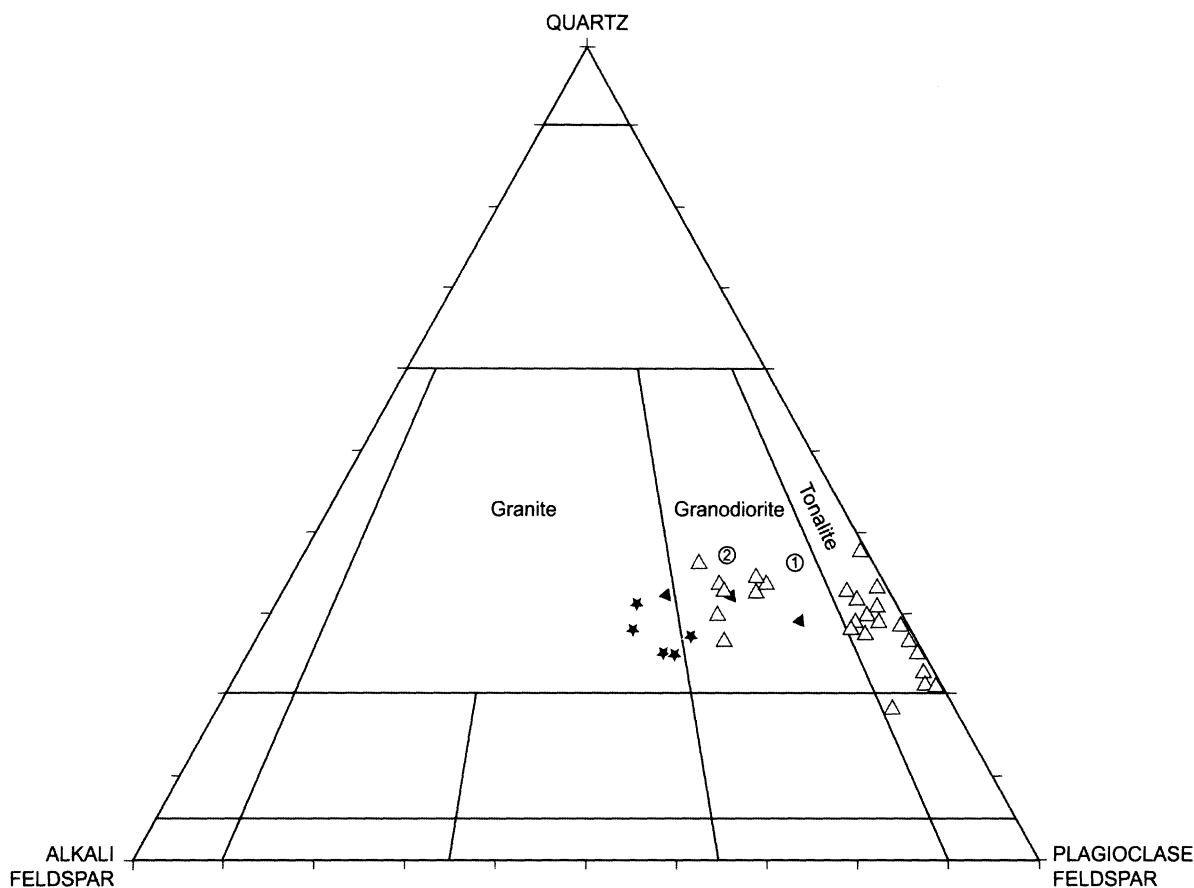


FIG 2. Ternary diagram, showing the IUGS classification of felsic plutonic rocks; the Rosetta Stone [1] and sample 489 [2] are plotted based upon image analysis of SEM images (see text for details). Some comparative published data for dark-coloured rocks from the Aswan area are also shown: Solid triangles: from Brown and Harrell, *GM* 164, Table 1, analyses 4–6; Hollow triangles: from Klemm and Klemm, *Steine und Steinbrüche*, fig. 395; Stars: from Meneisy et al., *Chemie der Erde* 38, Table 1, analyses 1–5.

phosphorus that are apparent from the chemical analyses: the Aswan granodiorites typically show levels of phosphorus (as  $P_2O_5$ ) of about 1%, compared to a level of 0.18% given for ‘average granodiorite’ (see Table 1).

The presence of the pink vein cutting across the upper left corner of the Stone is consistent with an origin in the Aswan region. Within the Aswan outcrop, there are areas where dark-coloured rocks and red granite grade into one another,<sup>25</sup> and outcrops in which dark-coloured rocks are cut by veins of pink granite occur at Gebel Ibrahim Pasha, to the south of Aswan, and also in the vicinity of Messitot (fig. 1).

*Bulletin de l'Institut de Desert d'Égypte* 6 (1956), 209–56; Klemm and Klemm, *Steine und Steinbrüche*, 339–50; and B. G. Aston, *Ancient Egyptian Stone Vessels: Materials and Forms* (SAGA 5; Heidelberg, 1994), 18.

<sup>25</sup> See, for example, Higazy et al., *Bulletin de l'Institut de Desert d'Égypte* 6, 209–56; Klemm and Klemm, *Steine und Steinbrüche*; and Aston, *Ancient Egyptian Stone Vessels*, quoting observations by J. Ball, *A Description of the First or Aswan Cataract of the Nile* (Cairo, 1907), 77–8.

Despite these affinities with the Aswan granodiorites, it was felt that potential sources other than the Aswan area should be considered. Plutonic rocks, including dolerite, tonalite and granodiorite, form the lower-lying ground to the east and west of Gebel Gattar (south of Gebel el-Dokhan, see fig. 1) in the Eastern Desert. Inspection of mineralogical and chemical data for rocks from the region<sup>26</sup> suggested that although there are some similarities, the granodiorite from Gebel el-Dokhan differs from the Rosetta Stone in several respects. The plagioclase feldspars are more sodic in composition and appear, from the description given, to be less altered than those in the Rosetta Stone; the Gebel el-Dokhan granodiorite is less ferruginous and there is less hornblende; apatite is reported as an accessory mineral but the level of P<sub>2</sub>O<sub>5</sub> is lower than in the Rosetta Stone. Thus, the evidence suggests that Gebel el-Dokhan did not provide the rock used for the Rosetta Stone. Another possible match appeared to be a fine-grained granodiorite rock described by Aston.<sup>27</sup> This was used for stone vessels, and like the Rosetta Stone, plots close to the tonalite boundary of the granodiorite field of the QAP diagram. However, it contains less quartz, and mica is not reported, eliminating this as a good match for the Rosetta Stone. Similarly, the Rosetta Stone does not match the published description of the granodiorite from another Eastern Desert quarry, Bir Umm Fawakhir (fig. 1).<sup>28</sup>

### Conclusion

Petrographic examination and analysis of a fragment of stone from the Rosetta Stone has shown that it is a fine-grained granodiorite, perhaps modified by metamorphic and/or metasomatic processes. Although finer grained, it is otherwise similar chemically and mineralogically to the so-called 'black granite' (i.e. granodiorite) from Aswan. It is most probable that it originated from Ptolemaic quarrying sites to the south of Aswan, where dark-coloured rocks such as this, sometimes cut by veins of pink granite, are to be found.<sup>29</sup> The description of the Stone as 'une pierre de granite noir', which was applied by the French savants at the time of its discovery was essentially correct, and the name 'basalt', used for many years, is erroneous.

### Appendix: Petrographic descriptions

#### *Rosetta Stone*

The rock has an interlocking granular texture; most grains are less than 0.3–0.4 mm in diameter, but there are larger grains up to several millimetres in length. Dark-coloured minerals constitute about a third of the rock.

*Plagioclase feldspar:* Plagioclase is the most abundant mineral in the rock, but much of it is untwinned, making distinction from alkali feldspar difficult. It is present as tabular crystals (often with ragged boundaries) and anhedral grains up to c. 0.6 mm long; also as occasional larger phenocrysts up to c. 2 mm, which may be zoned and altered (saussuritized and/or sericitized).

<sup>26</sup> E. H. Khalaf, *Petrography, Geochemistry and Petrogenesis of Volcanics and Associated Rocks of Gebel el Dokhan area, Northeastern Desert, Egypt* (unpublished PhD thesis; Cairo University, 1994); thanks are due to M. El-Sharkawy for enabling consultation of this thesis.

<sup>27</sup> *Ancient Egyptian Stone Vessels*, 15.

<sup>28</sup> Aston et al., in Nicholson and Shaw (eds), *Ancient Egyptian Materials and Technology*, 38.

<sup>29</sup> It would be of interest to establish the extent to which stone similar to this was used during the Ptolemaic Period, but this lies outside the scope of this paper.

Larger crystals show polysynthetic twinning. *c.* 35–50%.

*Quartz:* Quartz occurs as anhedral grains up to *c.* 0.2 mm; some grains show undulose extinction, indicating strain during growth or subsequent geological history; the grains are frequently interlocking with other grains of quartz and feldspar; some show evidence of recrystallization with triple points of contact. *c.* 20–30%.

*Alkali feldspar:* It is difficult to distinguish the alkali feldspar from plagioclase (see above); quartz is usually less cloudy, but it is subordinate to plagioclase and quartz. It occurs as rather ragged, anhedral grains up to *c.* 0.3 mm; some show simple twinning; others alteration along cleavage planes, leading to cloudiness of the grains. *c.* 10%.

*Biotite:* Occurs as flakes typically *c.* 0.3 mm; strongly pleochroic from deep brown to straw yellow, strong absorption when cleavage traces parallel to polariser. Some grains appear to show incipient alteration to hornblende and rarely epidote. *c.* 15–20%.

*Hornblende:* Prismatic crystals of irregular outline, typically *c.* 0.4 mm; larger crystals are poikilitic (poikiloblastic?), with inclusions of quartz; pleochroic from dark green to yellow or yellow-green. *c.* 10%.

*Opaque minerals:* Mainly as small (< 0.05 mm) euhedral to subhedral (square/hexagonal sections) but also as larger aggregates; may occur as inclusions in biotite and hornblende or interstitially. *c.* 1%.

*Apatite:* Present as euhedral grains (prismatic crystals, hexagonal sections), with moderate relief and first order grey interference colours. *c.* 1%.

*Titanite (sphene):* Interstitial grains with high relief and extreme birefringence may be titanite but may include a carbonate mineral. *c.* 1%.

### *Sample 489, from quarry at Gebel Tingar*

The rock is similar to the Rosetta Stone, with an interlocking granular texture, but is somewhat finer-grained, with most grains less than 0.3 mm in diameter; it has a more variable and altered appearance than the Rosetta Stone. As in the Rosetta Stone, there are a few larger, prismatic crystals of feldspar up to several millimetres in length. Dark-coloured minerals again constitute about one third of the rock.

*Plagioclase feldspar:* Plagioclase is the most abundant mineral in the rock, but (as in the Rosetta Stone) much of it is untwinned, making distinction from alkali feldspar difficult. It is present as tabular crystals (often with ragged boundaries), some more than 2 mm in length, and as smaller laths up to *c.* 0.6 mm long; may be zoned and altered (saussuritized and/or sericitized). Larger crystals show polysynthetic twinning. *c.* 35–50%.

*Quartz:* Present as anhedral grains up to 0.2 mm, some show undulose extinction; the grains are frequently interlocking with other grains of quartz and feldspar; some show evidence of recrystallization with triple points. *c.* 20–30%.

*Alkali feldspar:* Sparse; as rather ragged grains up to *c.* 0.3 mm; there is simple twinning; some alteration to sericite along cleavage planes. As for the Rosetta Stone, it is difficult to distinguish the alkali feldspar from plagioclase (see above); quartz is usually less cloudy. *c.* 10%.

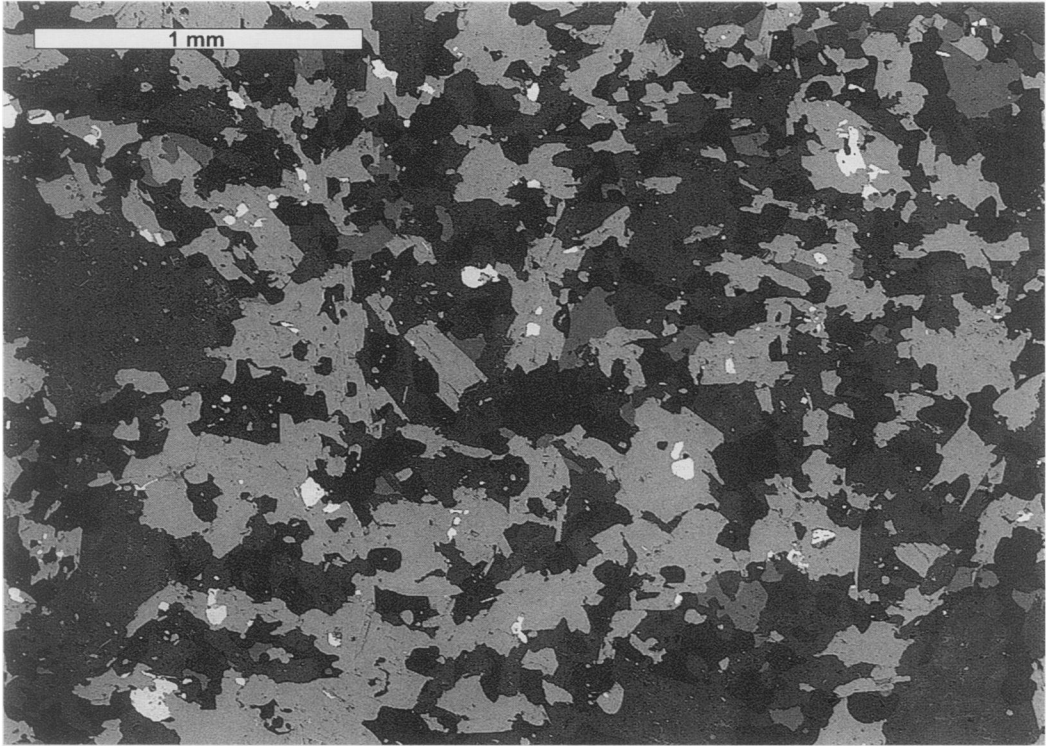
*Biotite:* Flakes up to *c.* 0.2 mm; strongly pleochroic from pale yellow-brown to dark brown, strong absorption when cleavage traces parallel to polariser. Some grains show alteration to hornblende along cleavage traces. *c.* 20%.

*Hornblende:* Sparse; as ragged prismatic crystals, typically *c.* 0.2 mm; larger crystals are poikilitic (poikiloblastic?), with included crystals of quartz; pleochroic from dark green to yellow. *c.* 10%.

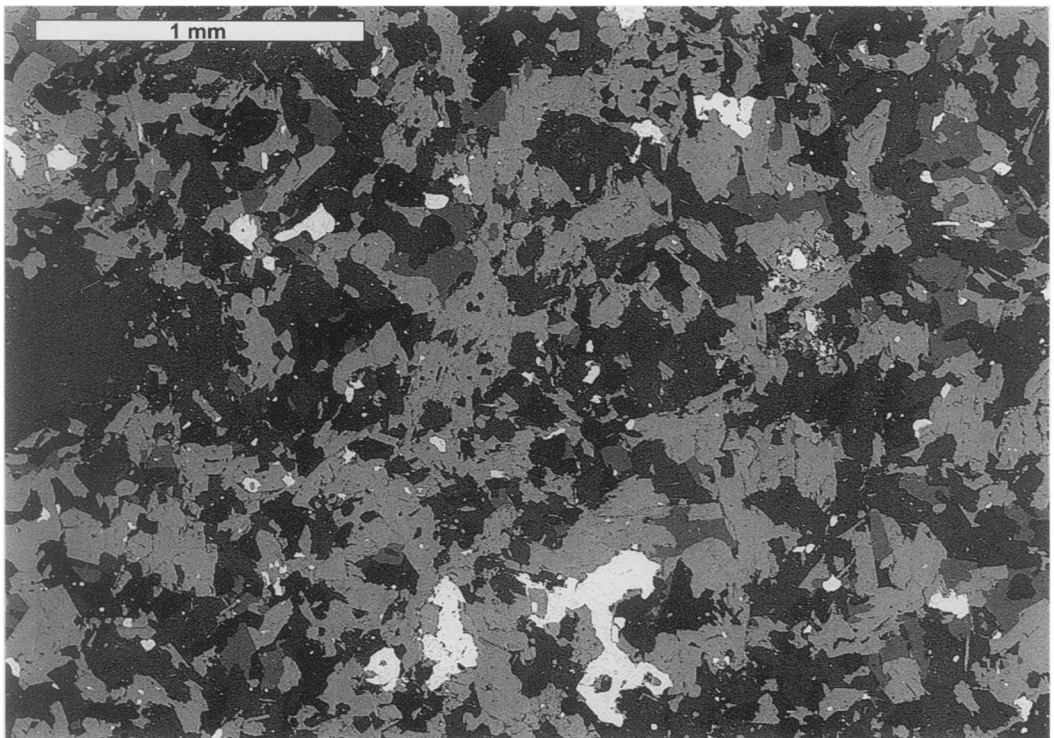
*Opaque minerals:* Mainly as a 'dusting' of small (typically < 0.04 mm) euhedral grains (square/hexagonal sections) scattered throughout the rock, as inclusions in biotite and hornblende or interstitially. Also as larger aggregates. < 5%.

*Apatite:* Euhedral, prismatic crystals, with hexagonal sections; moderate relief and first order grey interference colours. *c.* 1%.

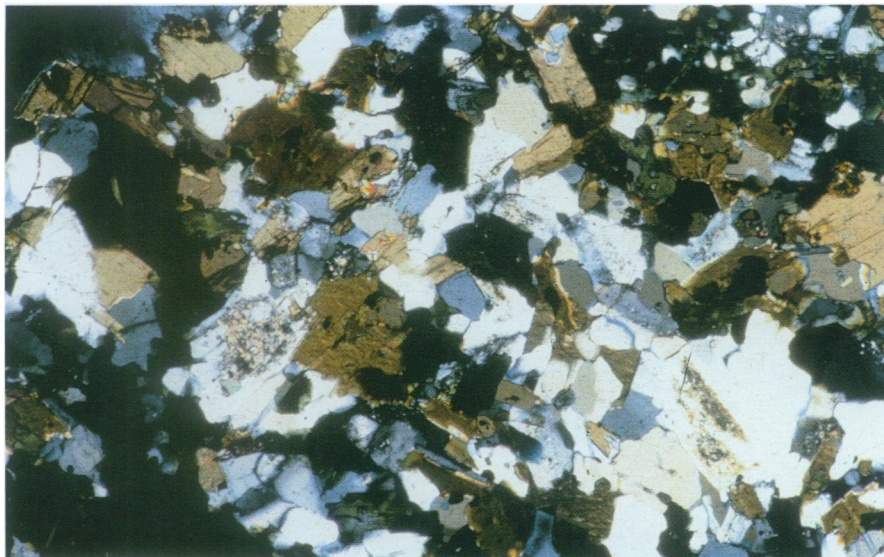
*Titanite (sphene):* Interstitial grains with high relief and high birefringence may be titanite but may include a carbonate mineral. *c.* 1%.



1. SEM photomicrograph of the Rosetta Stone (back-scattered electron image); scale bar represents 1 mm.

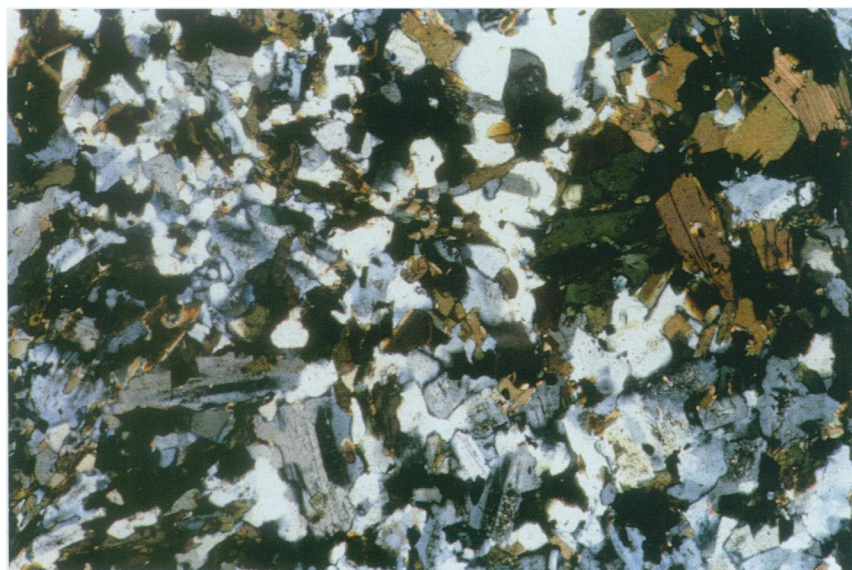
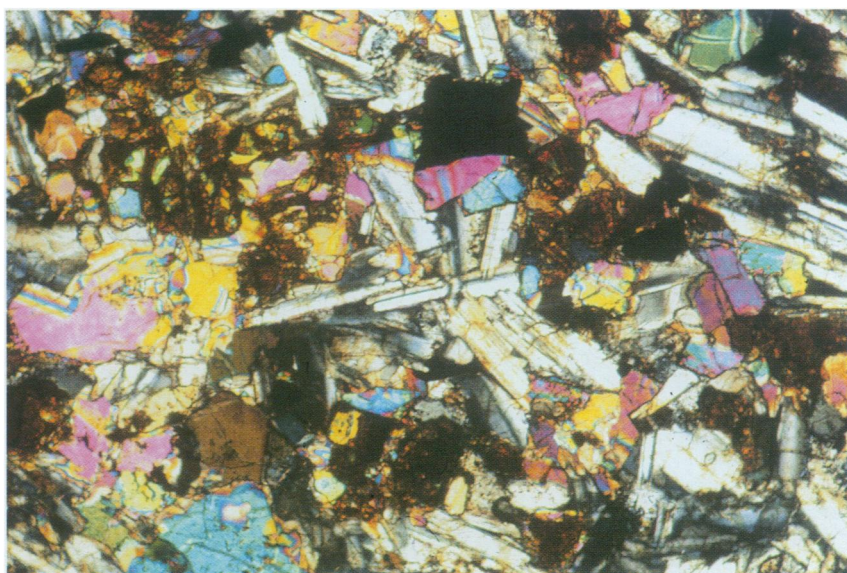


2. SEM photomicrograph of sample 489 (back-scattered electron image); scale bar represents 1 mm.



1. Photomicrograph of fragment from the Rosetta Stone in thin section, crossed-polars; width of image c. 2 mm.

2. Photomicrograph of basalt in thin section, crossed-polars; width of image c. 2 mm.



3. Photomicrograph of sample 489, from quarry at Gebel Tingar, near Aswan, in thin section, crossed-polars; width of image c. 2 mm.

# A ROMAN PERIOD DEMOTIC MANUAL OF HYMNS TO RATTAWY AND OTHER DEITIES (P. ASHM. 1984.76)\*

By HOLGER KOCKELMANN

First publication of P. Ashm. 1984.76, a modest Demotic papyrus fragment of Roman date from a religious text mentioning the goddess Rattawy. The commentary includes discussion of the goddess and a catalogue of references to her in other published Demotic texts.

THE present fragment (fig. 1 and pl. XVII), which is conserved in the storerooms of the Ashmolean Museum at Oxford, contains part of what appears to be a series of hymns or invocations addressed to the goddess Rattawy and to at least one other, male deity. Although small in size, the fragment is still of scientific value, since it is the first published Demotic text in which the rarely attested Egyptian goddess Rattawy occurs within a religious composition. Moreover, the text of P. Ashm. 1984.76 is of interest for its vocabulary, phraseology and outer form, despite the fact that none of its lines preserves more than three or four complete words.

## Physical description of the papyrus

The fragment measures 16.2 cm in height and 3.6 cm maximum in width. Its narrow and rather tall shape reveals that it is a strip of a papyrus which was kept rolled up; when the roll was flattened at some point, it broke along the creases into strips of the characteristic form displayed by P. Ashm. 1984.76. Unfortunately, even this single strip is not complete in itself, as parts of it are wanting at the top and the bottom. Consequently, it is impossible to ascertain the original height of the sheet. The partly translucent papyrus material is of light-yellow colour and rather fine quality.

P. Ashm. 1984.76 has been reassembled from five separate pieces. Breaks are visible between line  $x + 17$  and line  $x + 18$  and between line  $x + 21$  and line  $x + 22$ ; moreover, two small fragments have been re-affixed in the left top corner. There is a hole in the top left area, where a small piece of the horizontal surface has broken away. Additionally some small holes can be observed in the upper and lower parts of the

\* I am most grateful to Dr Helen Whitehouse, Ashmolean Museum, Oxford, for her kind permission to study and publish the papyrus fragment and for providing an excellent photograph of the text. I would also like to express my special thanks to my supervisor Dr Mark Smith, Oriental Institute, University of Oxford, not only for suggesting that I should work on P. Ashm. 1984.76, but also for giving valuable comments on the present article and for checking the English; of course, all remaining mistakes and inaccuracies are my own responsibility. I am also indebted to Dr Richard Jasnow, Johns Hopkins University, Baltimore, who relinquished the publication of the papyrus fragment in my favour. In conclusion, I should like to thank Prof. Dr Christian Leitz, University of Cologne, for granting me permission to consult the records which are kept on the goddess Rattawy in his project 'Lexikon der ägyptischen Götter und Götterbezeichnungen'.



fragment and a few fine cracks, both vertical and horizontal, occur. To fix the five individual pieces and stabilise the cracks, strips of Japanese tissue have been stuck on the verso.

### General remarks on the text and its script

The fragment bears a small section of 24 lines of text. These run parallel to the horizontal fibres of the papyrus, which means that the so-called recto of the sheet was used by the scribe. This side has a surface which is slightly smoother than the blank verso. The Demotic hand displays small and elegant signs which stand close to each other. As is obvious from the regular thickness of the strokes of the signs, a reed pen and not an Egyptian brush was used for writing the text.<sup>1</sup> In lines  $x + 16$  to  $x + 20$  the appearance of the script changes markedly; the strokes of the signs become thinner, probably due to resharpening the pen.<sup>2</sup>

As already remarked, no definite statement as to how many lines have been lost at the top and bottom of the fragment can be given. Perhaps there were some 30 or 40 lines of text for the complete column as is the case, for instance, for P. Harkness<sup>3</sup> or 25–40 lines as in the Magical Papyrus of London and Leiden (hereafter Mag. Pap.).<sup>4</sup> There are also no indications as to how long the composition was in total. However, as the numbering  $p\beta mh-7$ , ‘the seventh’, in line  $x + 16$  reveals, there must have been six other invocations in the preceding text, but it is hard to tell how many lines each of them might have comprised, nor does one know how many other invocations followed. A clue to the answer of the former question is offered by the seventh invocation, which seems to extend over seven lines (cf. lines  $x + 16-x + 22$ ).

### Distinctive features of the manuscript

#### Rubrics

Two rubrics can be found within the text.<sup>5</sup> They consist of ordinal numbers preceded by the masculine article  $p\beta$ , both of which are given in red:  $P\beta MH-7$  (line  $x + 16$ ) and  $P\beta [MH-8]$  (line  $x + 22$ ). Rubrics were used relatively rarely in Demotic texts during the Ptolemaic era, but in later times, when Demotic increasingly replaced the hieratic script for religious compositions, red ink begins to occur more frequently.<sup>6</sup> As in earlier times,

<sup>1</sup> W. J. Tait, ‘Rush and Reed: the Pens of Egyptian and Greek Scribes’, *Proceedings of the XVIII International Congress of Papyrology, Athens 25–31 May 1986* (Athens, 1988), II, 477–81.

<sup>2</sup> For another example of this phenomenon cf. also P. Carlsberg 207: W. J. Tait, ‘Two Columns of a Setna-Text’, in P. J. Frandsen (ed.), *Demotic Texts from the Collection, The Carlsberg Papyri*, I (CNIP 15; Copenhagen, 1991), pl. 2; or J. F. Quack and K. Ryholt, ‘Notes on the Setne Story P. Carlsberg 207’, in P. J. Frandsen and K. Ryholt (eds), *A Miscellany of Demotic Texts and Studies, The Carlsberg Papyri*, III (CNIP 22; Copenhagen, 2000), pl. 24.

<sup>3</sup> The papyrus has 32–8 lines: T. J. Logan, ‘Papyrus Harkness’, in *Studies in Honor of George R. Hughes, January 12, 1977* (SAOC 39; Chicago, 1976), 147; and an average of 35 lines per column: M. Smith, ‘Papyrus Harkness’, *Enchoria* 18 (1991), 95.

<sup>4</sup> Cf. F. Ll. Griffith and H. Thompson, *The Demotic Magical Papyrus of London and Leiden* (Oxford, 1904–9, and reissued 1921): see II. *Hand Copy of the Text*.

<sup>5</sup> The rubrics are indicated in capital letters in the transliteration below.

<sup>6</sup> M. Depauw, *A Companion to Demotic Studies* (Papyrologica Bruxellensia 28; Brussels, 1997), 84.

red was used for headings and introductory words, as, for instance, in the Demotic magical papyrus P. Louvre E3229 which dates to the third century AD.<sup>7</sup> The remarkable darkness of the red signs in P. Ashm. 1984.76 might be ascribed to a special sort of ink or to the use of the same pen both for red and black text without any cleaning beforehand, which might have led to a mixture of the red ink with black pigment. Another explanation would be that the scribe wrote the numerals first in black and then wrote over them in red ink; for an example of this practice, see the late hieratic text P. Berlin P. 23057.<sup>8</sup>

### *Supralinear addition*

The Demotic possessive article *t3j=n*, ‘our’, was added above line  $x + 7$  as a variant to or emendation of the original *t3*, ‘the’ (see the commentary on line  $x + 7$  below).

### *Scribal irregularities and peculiarities*

The scribe placed a dot under the seated-goddess determinative of *R<sup>c</sup>.t-t3.wj* in line  $x + 1$ , but not under the same sign in *R<sup>c</sup>.t-t3.wj* in lines  $x + 7$  and  $x + 8$ , *hnw.t* (line  $x + 7$ ), *Nw.t* (line  $x + 11$ ) or *shne* (line  $x + 13$ ). Moreover, two dots have been added above the lotus determinative of *bljlwe* (lines  $x + 9$  and  $x + 12$ ).

In some places it is possible to see when the reed pen became dry and the scribe dipped it into the ink container again, for example, in line  $x + 12$  between *bljlwe* and *n3j/t3j*, and in line  $x + 17$  between *phw* and the following fragmentary word.

The text seems to distinguish between *r* and *l*.<sup>9</sup>

## **The provenance and date of the papyrus**

Unfortunately, nothing is known of where the papyrus was discovered. As the museum records show,<sup>10</sup> the fragment became part of the Ashmolean collection in 1983–4, after it had been transferred from the Griffith Institute, where it had been housed until that date. When the papyrus came to the museum, it belonged to a group of numerous other Egyptian papyri in Demotic and hieratic script, which had been in the possession of Professor F. Ll. Griffith.<sup>11</sup> The Rattawy text was already mounted between two pieces

<sup>7</sup> J. H. Johnson, ‘Louvre E3229: A Demotic Magical Text’, *Enchoria* 7 (1977), 58.

<sup>8</sup> See the commentary by G. Burkard and H.-W. Fischer-Elfert, *Ägyptische Handschriften*, Teil 4 (Verzeichnis der Orientalischen Handschriften in Deutschland 19/4; Stuttgart, 1994), 120.

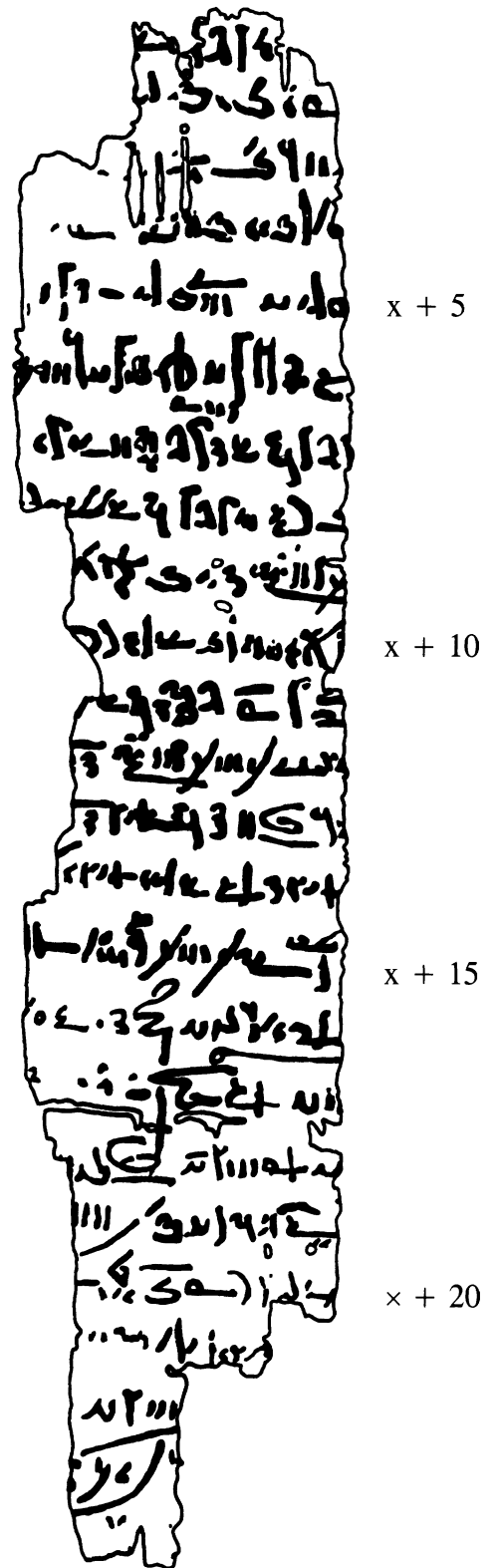
<sup>9</sup> Cf. the words *bljlwe* (lines  $x + 9$ ,  $x + 12$ ), *gljl* (line  $x + 15$ ) and *mrj[ ]* (line  $x + 19$ ).

<sup>10</sup> I am grateful to Dr Whitehouse for checking the museum records on P. Ashm. 1984.76.

<sup>11</sup> Some texts of this group have already been published: R. Jasnow, ‘A Demotic Wisdom Papyrus in the Asmolean Museum (P. Ashm. 1984.77 Verso)’, *Enchoria* 18 (1991), 43–54; J. F. Quack, ‘Ein neues medizinisches Fragment der Spätzeit (pAshmolean Museum 1984.55 rt.)’, *ZÄS* 126 (1999), 141–9. The Eighteenth Dynasty hieratic fragment P. Ashm. 1984.61.I probably also belongs to the same group (A. v. Lieven, ‘Fragmente eines Feldregisters im Ashmolean Museum’, *SAK* 27 (1999), 255–60). According to a list which was compiled after the lot of documents had been brought to the Ashmolean, the present fragment was found together with late hieratic religious texts in the Griffith Institute; however, P. Ashm. 1984.76 cannot meaningfully be connected with any of the hieratic papyri with which it was found. The material as a whole appears to be rather diverse in terms of its provenance: as Quack states, many of the hieratic papyri of the 1984 group seem to originate from the Fayum; as Jasnow notes, the wisdom text is likely to stem from Thebes.

of cracked glass when it became the property of the Ashmolean Museum, but no notes or records were found with it. The content gives the text a setting at or near Thebes, which is, of course, no absolute proof for a Theban provenance for the piece.

The text offers more significant evidence on the date of the present piece. A couple of words and signs are written in a very similar way to that of Mag. Pap.: see *hnqe.w*, 'beer' (Mag. Pap. III, Index, [59] no. 589), the end of *Njw.t*, 'Thebes' (ibid. [43] no. 430) and *Hnsw*, 'Khonsu' (ibid. [67] no. 663). For the writing of the characteristic animal determinative in *m3j*, line x + 18 as  $\text{𓆎}$ , compare identical forms attested in Mag. Pap., as, for example, in *m3j*, 'lion' (III, Index, [35] nos. 347 + 349) and *msh*, 'crocodile' (ibid. [39], no. 403). The orthographic and palaeographic similarity between Mag. Pap. and P. Ashm. 1984.76 points to a rather late date for the Ashmolean papyrus fragment; I would suggest a date in the second half of the third century AD.<sup>12</sup>



<sup>12</sup> Mag. Pap. dates to the third century AD or slightly later: Johnson, *Enchoria* 7, 55.

FIG. 1. Facsimile of P. Ashm. 1984.76.

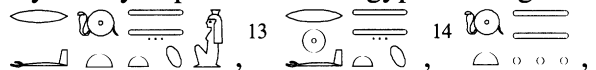
### Transliteration and translation

Due to the fact that only a small section of each line has been preserved, the following translation remains in some parts rather hypothetical.

Transliteration	Translation
<p>x + 5    ] <i>R<sup>c</sup>.t-t3.wj</i> [</p> <p>          ] [ ... ]<sup>7</sup>t jr = [ t ]<sup>7</sup> m [ ... ]<sup>7</sup> [</p> <p>          ] [ ... ]<sup>7</sup> dd [ = n (?) ] ... ]<sup>7</sup> [</p> <p>          ] [ ... ]<sup>7</sup> jmj = t mj [ ... ]<sup>7</sup> [</p> <p>          ] n = k (?) <i>Hnsw-p3-hrt</i> p3 <i>sif</i> [</p>	<p>] Rattawy [</p> <p>] [ ... ]<sup>7</sup>t you made m [ ... ]<sup>7</sup> [</p> <p>] [ ... ]<sup>7</sup> we (?) speak [ ... ]<sup>7</sup> [</p> <p>] [ ... ]<sup>7</sup> come, cause [ ... ]<sup>7</sup> [</p> <p>Th]ebes, the town of Amun ... [</p> <p>] for/to you (?) Khonsu-the-child, the</p> <p>  [noble (?)] child [</p>
<p><i>R<sup>c</sup>.t]-t3.wj t3 `t3j = n' hnw.t</i> [</p> <p>          ] [ jr ]<sup>7</sup> ntj nb <i>R<sup>c</sup>.t-t3.wj</i> [ sh.t ]<sup>7</sup> [</p>	<p>Rat]tawy, the (<i>var.</i>: our) mistress [</p> <p>the one] who (?) makes everything,</p> <p>  Rattawy the field [</p>
<p>x + 10    ] <i>blj]lwe t3j = f mj</i> [</p> <p>          ] p3j = j (?) h]j p3j &lt; = j &gt; jrj ntj</p> <p>          ] [ mn (?) ]<sup>7</sup> [</p> <p>          ] <i>J]npw n Nw.t</i> [</p> <p>          ] [ nfr ]<sup>7</sup> blj]lwe [ t3j/n3j ]<sup>7</sup> [</p> <p>          ] [ shne nfr ]<sup>7</sup> t3/n3 ]<sup>7</sup> [</p> <p>          ] n3-]nfr t3j = k rnp.t nfr.t [ r / l ]<sup>7</sup> [</p>	<p>flour]ish (?), his mj[</p> <p>my (?) hus]band, my companion who</p> <p>  is/has not (?) [</p> <p>A]nubis to (?) Nut [</p> <p>] good. May flourish (?) this/these [</p> <p>] good fortune, [ t3/n3 ]<sup>7</sup> [</p> <p>] favourable may be your favourable year</p> <p>  [ r / l ]<sup>7</sup> [</p>
<p>x + 15    ] <i>w<sup>c</sup> gljl r d</i> [</p> <p>          ] [ hs ]<sup>7</sup>.tj = k P3 <i>MH-7 n3-c n</i> [</p> <p>          ] [ ... ]<sup>7</sup> p3j = k phw [ n ... ]<sup>7</sup> [</p> <p>          ] p3 m3j n p3 hntj [</p> <p>          ] <i>h]nqe.w p3 mrj</i> [</p>	<p>] a burnt offering r d [</p> <p>] praising you. THE 7<sup>TH</sup>: Beautiful is [</p> <p>] [ ... ]<sup>7</sup> behind you [ n ... ]<sup>7</sup> [</p> <p>] the lion of the hntj [</p> <p>b]eer, the mrj [</p>
<p>x + 20    ] [ ... ]<sup>7</sup> ntj jn-n<sup>c</sup>. [ k ]<sup>7</sup> [</p> <p>          ] [ nfrw.t ]<sup>7</sup> jr [ š (?) ] ... ]<sup>7</sup> [</p> <p>          ] [ ... ]<sup>7</sup> j ]<sup>7</sup> P3 [ <i>MH-8</i></p> <p>          ] [ s ]<sup>7</sup> r = f [ ... ]<sup>7</sup> [</p> <p>          ] [ ... ]<sup>7</sup> [</p>	<p>] [ ... ]<sup>7</sup> that has come [</p> <p>] good ... cold (?) [</p> <p>] [ ... ]<sup>7</sup> j ]<sup>7</sup>. THE [8<sup>TH</sup>:</p> <p>] he arranged [ ... ]<sup>7</sup> [</p> <p>] ... [</p>

### Commentary

x + 1: The goddess Rattawy who is invoked in the beginning of P. Ashm. 1984.76 ranks with the deities who are comparatively rarely represented in Egyptian religious texts and depictions. Her name *R3.t-t3.wj*



<sup>13</sup> *Urk.* VIII, 51, 19.

<sup>14</sup> *Urk.* VIII, 68, 10.

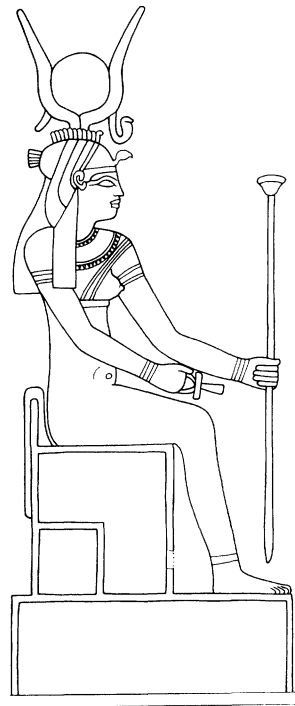
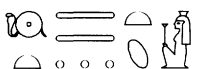
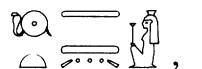


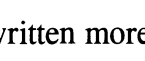




FIG. 2. The goddess Rattawy, after the relief published in Zivie, *Deir Chelouit* III, 163.

 <sup>15</sup>  <sup>16</sup> incorporates the name of the sun-god Ra in its female form ('Ra.t'),<sup>17</sup> to which *t3.wj* is added as an attribute in a direct genitive construction: 'Ra.t-of-the-two-lands'.<sup>18</sup> In Demotic, the standard form of the name is <sup>19</sup> or .<sup>20</sup> In our text it is written more elaborately as  with the addition of the determinatives  and .

Rattawy became an independent deity during the Nineteenth Dynasty; at that time, she was not yet associated with a specific geographical area. During the Graeco-Roman Period, however, she became closely linked to Hermonthis (Armant) where she accompanied Montu in the role of his wife and the main local goddess.<sup>21</sup> Due to her

<sup>15</sup> LD IV, 61g.

<sup>16</sup> LD IV, 60b.

<sup>17</sup> A. Gutbub, 'Rait', *LÄ* V, 87.

<sup>18</sup> A form using the indirect genitive is attested as well: *R<sup>c</sup>.t-n.t-t3.wj*, cf. A. Gutbub, 'Rat-tai', *LÄ* V, 153 n. 16. Another variant is *R<sup>c</sup>.t-m-t3.wj*, 'Rait-in-the-two-lands' (D IX, 72, 7-8). In addition to this, more expanded forms of her name are found, e.g. *R<sup>c</sup>.t-n.t-t3.wj-hn<sup>c</sup>-jdb.w*, 'Rait-of-the-two-lands-and-the-river-banks' (C. M. Zivie, *Le temple de Deir Chelouit*, III (Cairo 1986), 157, no. 144, 11); *R<sup>c</sup>.t-t3.wj-mj-kj=sn*, 'Rait-of-the-two-lands-in-their-entirety' (*Rapport sur les fouilles de Médamoud* (1925) (Cairo, 1926), 47, no. 105).

<sup>19</sup> M. Lichtheim, *Demotic Ostraca from Medinet Habu* (OIP 80; Chicago, 1957), 69, no. 154, line 3.

<sup>20</sup> O. Bodl. 668, line 4. For the reading of the name see W. Spiegelberg, 'Die demotische Schreibung der Göttin *R<sup>c</sup>.t-t3.wj*', *ZÄS* 54 (1927), 127-8.

<sup>21</sup> As Tenenet-Rattawy, see Gutbub, *LÄ* V, 151.

aspect as the companion of Montu, Rattawy also appears frequently outside Armant in those temples where Montu plays a major role, as, for instance, in Medamud, Tod and Thebes.<sup>22</sup> Her close connection with the Theban area in general is reflected by P. Ashm. 1984.76 as well, which mentions her name in proximity to ‘Thebes, the town of Amun’ and ‘Khonsu-the-child’ (cf. line x + 5–7).

Traditionally Rattawy appears in human form as a woman wearing a Hathor-crown on her head (cf. fig. 2). Four statues of her dating to the fourth or third century BC were discovered in a cachette beneath the floor of the temple of Montu at Medamud; they show the four forms of the goddess (Rattawy of Tod, Thebes, Medamud and Armant), each represented as a seated woman, once adorned with a Hathor-crown that is now lost.<sup>23</sup> She could also be depicted as a falcon with human head<sup>24</sup> or as a woman with the head of a cow.<sup>25</sup>

The divine name *R<sup>c</sup>.t-*t3*.wj* is not recorded in Erichsen’s *Glossar* and—at least to my knowledge—no mention of her occurs in any published Demotic religious composition, apart from a stereotyped text on a Bucheum stela (see list below). Most of the Demotic data on Rattawy stems from ostraca bearing documentary texts, which provide only limited information on the goddess herself. However, it might be useful to offer a compilation of published Demotic references to Rattawy:

Graffito MH 228, line 1 <sup>26</sup>	The graffito mentions the curse of Rattawy who dwells in Thebes and the curse of Rattawy who dwells in Medamud. Date: 50 BC.
Graffito MH 45, line 14 <sup>27</sup>	Ditto. Date uncertain. For the curse of Rattawy see also O. Leiden Inv. no. F 1897/6.306 below.
O. Berlin P. 6562, line 1 <sup>28</sup>	Text mentioning <i>n3 m3<sup>c</sup>.w n R<sup>c</sup>.t-<i>t3</i>.wj</i> , ‘the places of Rattawy’. Receipt issued by the priests of the ‘places’ (ie. a shrine or temple) of Rattawy for wine. Year 8 of Antoninus.
O. Berlin P. 6580, line 3 <sup>29</sup>	Text attesting a temple of Rattawy, the great goddess ( <i>p3 ˆ.wj n R<sup>c</sup>.t-<i>t3</i>.wj t3 ntr.t ˆ3.t</i> ). Year 7 of Hadrian.
O. Berlin P. 6585, line 3 <sup>30</sup>	This ostrakon contains a further attestation of the ‘temple of Rattawy’ ( <i>p3 ˆ.wj n R<sup>c</sup>.t-<i>t3</i>.wj</i> ). Year 22 of Hadrian.
O. Berlin P. 6588, line 2 <sup>31</sup>	Another attestation of the temple of Rattawy, the great goddess ( <i>p3 ˆ.wj n R<sup>c</sup>.t-<i>t3</i>.wj t3 ntr.t ˆ3.t</i> ). Year 20 of Hadrian.

<sup>22</sup> Gutbub, *LÄ V*, 151–2; outside Armant, she is attested as ‘the lady of Heliopolis-of-the-South’ (*nb.t Jwnw-šm<sup>c</sup>.w*) or as ‘dwelling in Heliopolis-of-the-South’ (*hrj-jb Jwnw-šm<sup>c</sup>.w*), for instance, in Deir Shelwit; cf. C. M. Zivie, *Le temple de Deir Chelouit*, I (Cairo, 1982), 126 (no. 48) and III, 161 (no. 145).

<sup>23</sup> *Un siècle de fouilles françaises en Égypte 1880–1980* (exhib. cat.; Cairo, 1981), 325, no. 348bis (b).

<sup>24</sup> *Tôd II*, 41 and 284 (courtesy Chr. Leitz).

<sup>25</sup> J. Berlandini, ‘La déesse bucéphale: une iconographie particulière de l’Hathor memphite’, *BIFAO* 83 (1983), 33 n. 4.

<sup>26</sup> W. F. Edgerton, *Medinet Habu Graffiti. Facsimiles* (OIP 36; Chicago, 1937), pl. 57, and H. J. Thissen, *Die demotischen Graffiti von Medinet Habu. Zeugnisse zu Tempel und Kult im ptolemäischen Ägypten* (Dem. Stud. 10; Sommerhausen, 1989), 134–5.

<sup>27</sup> Edgerton, *Medinet Habu Graffiti*, pl. 18, and Thissen, *Die demotischen Graffiti von Medinet Habu*, 30–1.

<sup>28</sup> G. Mattha, *Demotic Ostraka from the Collections at Oxford, Paris, Berlin, Vienna and Cairo* (Publications de la Société Fouad I de Papyrologie, Textes et documents 6; Cairo, 1945), 191–2, no. 266.

<sup>29</sup> Or P. 6581? Mattha, *Demotic Ostraka*, 190, no. 263, and Index, 255.

<sup>30</sup> Mattha, *Demotic Ostraka*, 191, no. 265.

<sup>31</sup> Mattha, *Demotic Ostraka*, 190–1, no. 264.

- O. BM 21406, line 2<sup>32</sup> Text mentioning a temple or sanctuary (*n3 ʿ.wj.w*) of Rattawy. Year 9 of Antoninus.
- O. BM 21426, line 4<sup>33</sup> Ditto. Year 10 of Antoninus.
- O. BM 23040, line 3<sup>34</sup> Ostrakon referring to a banquet in the temple (*p3 ʿ.wj*) of Rattawy. Year 11 of Hadrian.
- O. Bodl. 668, line 4<sup>35</sup> A tree-garden (*šn.t*) of Rattawy in which dates are harvested is mentioned here. Probably early Roman Period.
- O. Bodl. 734<sup>36</sup> Fragment of a temple oath, mentioning Rattawy as the deity before whom the oath is sworn.
- O. Karnak Lac Sacré 1101.14<sup>37</sup> Temple oath which is sworn before Rattawy. Unearthed near the Sacred Lake of Karnak. Late Ptolemaic.
- O. Leiden Inv. no. F 1897/6.121, line 1<sup>38</sup> Just one line of what might have been a dedication has been preserved: *m-b3ḥ Rʿ.t-t3.wj tr.t* ..., 'in the presence of Rattawy, through...' Thebes, Ptolemaic Period.
- O. Leiden Inv. no. F 1897/6.259, line 2<sup>39</sup> This document refers to the goddess in an uncertain context. Thebes, Ptolemaic Period.
- O. Leiden Inv. no. F 1897/6.306, line 1–2<sup>40</sup> The curse (*p3 ḥt*) of Rattawy, who dwells in *Tn* (?). Thebes, Ptolemaic Period. For the curse of Rattawy see also Graffiti MH 45 and 228 above.
- O. Leiden Inv. no. F 1897/6.347, line x + 8<sup>41</sup> This ostrakon records a feast/procession (*ḥʿ*) of Rattawy. Thebes, Ptolemaic Period.
- O. Leiden Inv. no. F 1899/1.135, line 2<sup>42</sup> Ostrakon referring to a 'field of Rattawy' (*3ḥ Rʿ.t-t3.wj*), which is leased by a private person. Thebes, Roman Period.
- O. MH 537, line 3<sup>43</sup> Private letter. 'Harsiesis, son of Petenephtes, greets Pamonthes, son of Neferhotep, here before the Bull of Medamut, Montu, and Rattawy'. Date uncertain.
- O. Strasbourg 1774<sup>44</sup> In this text, the 'horoscope (?)' of Rattawy is referred to.
- O. Vienna 19 (?)<sup>45</sup> Fragment of a temple oath. This ostrakon is quoted by Kaplony-Heckel in (n. 37) as mentioning Rattawy in the role of the goddess before whom an oath is sworn; according to Kaplony-Heckel, however, Rattawy's name is not preserved on the ostrakon in question.<sup>46</sup>
- Stela Bucheum 200, line 6<sup>47</sup> In this text, the names of Rattawy and Hathor appear side by side. 62 BC.

<sup>32</sup> S. V. Wängstedt, 'Demotische Steuerquittungen nebst Texten andersartigen Inhalts', *OrSu* 16 (1967), 40, no. XV.

<sup>33</sup> S. V. Wängstedt, 'Einige demotische Urkunden der Ostrakonsammlung im British Museum', *OrSu* 12 (1963), 56, no. XII.

<sup>34</sup> Wängstedt, *OrSu* 12, 54, no. XI.

<sup>35</sup> U. Kaplony-Heckel, *Die demotischen Tempeleide*, I. Text (ÄA 6; Wiesbaden, 1963), 201, no. 109.

<sup>36</sup> Kaplony-Heckel, *Tempeleide* I, 381.

<sup>37</sup> Mentioned in U. Kaplony-Heckel, 'So wahr der Stier von Medamod lebt! Ueber die Ortsgötter in den Tempel-Eiden', in C. Eyre et al. (eds), *The Unbroken Reed. Studies in the Culture and Heritage of Ancient Egypt in Honour of A. F. Shore* (EES Occasional Publications 11; London, 1994), 152 and 157 n. 14.

<sup>38</sup> M. A. A. Nur el-Din, *The Demotic Ostraca in the National Museum of Antiquities at Leiden* (CNMAL 1; Leiden 1974), 262, no. 328.

<sup>39</sup> Nur el-Din, *The Demotic Ostraca*, 58, no. 68.

<sup>40</sup> Nur el-Din, *The Demotic Ostraca*, 262–3, no. 331.

<sup>41</sup> Nur el-Din, *The Demotic Ostraca*, 276, no. 342.

<sup>42</sup> Nur el-Din, *The Demotic Ostraca*, 60, no. 71.

<sup>43</sup> Lichtheim, *Demotic Ostraca*, no. 154.

<sup>44</sup> Spiegelberg, *ZÄS* 54, 128 n. 3.



<sup>45</sup> Cf. Kaplony-Heckel, in Eyre et al. (eds), *The Unbroken Reed*, 157 n. 14; Kaplony-Heckel, *Tempeleide* I, 403.

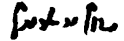
<sup>46</sup> Kaplony-Heckel, *Tempeleide* I, 403.

<sup>47</sup> A. Farid, *Die demotischen Inschriften der Strategen* (VAS 4; San Antonio, TX, 1993), part 1, 35.






43513, line 4),<sup>52</sup>  (O. MH 522, line 1),<sup>53</sup>  (O. Leiden F 1897/6.250 recto, line x + 10)<sup>54</sup> in particular which show at least some similarity with the form of the name in line x + 6 of P. Ashm. Mus. 1984.76.

A reference to Khonsu would fit the context well, since the preceding line deals with ‘Thebes, the town of Amun’, where Khonsu is the divine child par excellence.  *Hnsw-p3-hrt*, ‘Khonsu-the-child’, occurs in Demotic, for instance, as an element of theophorous personal names.<sup>55</sup>

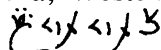
An attribute might have followed after *sjf*, possibly *šps*, ‘noble’.<sup>56</sup>

x + 7: A variation or alteration of the text has been added above the line. The original wording of the passage runs as follows: *R<sup>c</sup>.t-t3.wj t3 hnw.t*, ‘Rattawy, the lady...’ Here the simple article *t3* was changed into the more personal possessive article *t3j=n*, ‘our’, which indicates that this part of the text was recited by a group of several persons or by a single individual on behalf of a group.

x + 8: Presumably, this line characterises Rattawy as a beneficent goddess. Though damaged, the reading of the signs  as *sh.t*, ‘field’, is beyond doubt; cf. *Glossar*, 450–1. *sh.t*, ‘field’, might refer to Rattawy herself as the creator of everything and a guarantor of plenty. For this aspect of the goddess, compare the unfortunately heavily damaged hieroglyphic inscription in the temple of Deir Shelwit published in Zivie, *Le temple de Deir Chelouit* III, no. 131, 109, lines 8–11. For *3h.t*, ‘field, arable land’, as an epithet of another female divinity in a similar function cf. *Philä* II, 31, 9: (Hathor) *3h.t ms wnn.t Rnn.t ʿš3* [‘the field that brings forth everything, Renenutet of many a [’].

At the beginning of this line, a phrase such as *t3 ntj (jr ntj nb)*, ‘the one who (makes everything)’, should probably be restored.

x + 9: *t3j=f mj[* : It is not possible to say to whom the third person singular masculine suffix in *t3j=f* refers, nor is the meaning of *mj[* certain, since the last part of the word is missing in the lacuna. Possibly restore *mj.t*, ‘way, manner’; cf. *Glossar*, 152.

x + 9 and x + 12: *bljlwe*: This word is not listed in the *Glossar*, nor does it seem to be attested in any other published Demotic text. The incomplete state of the present papyrus does not allow a conclusive interpretation of the term. However, *bljlwe* is likely to mean something pleasant or joyful, as can be judged from the lotus determinative. A word  $\text{OY}\omega\omega\lambda\epsilon$ , var.  $\text{B}\lambda\lambda\lambda\epsilon$ , (Crum, *CD*, 38a and 477 a; Westendorf, *KHB*, 269–70 and 24) exists in Coptic which derives from Demotic  *wl<sup>c</sup>l<sup>c</sup>*, ‘to flourish/prosper, to be well off’ (W. Vycichl, *Dictionnaire étymologique de la langue copte* (Leuven, 1983), 232). It appears very likely that *bljlwe* is related to this word.

<sup>52</sup> As an element of the personal name *P3-tj-Hnsw*; after the photograph published in Wängstedt, *OrSu* 16, 50, no. XX.

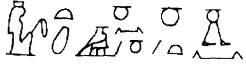
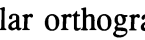
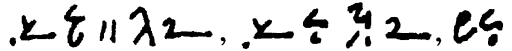

<sup>53</sup> Lichtheim, *Demotic Ostraca*, pl. 18, no. 97.



<sup>54</sup> Nur el-Din, *The Demotic Ostraca*, 673, no. 431.

<sup>55</sup> *P3-tj-Hnsw-p3-hrt*; cf. *Demot.Nb.*, I.5, 338.


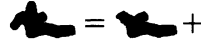
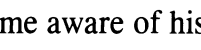

<sup>56</sup> For Khonsu-the-child who was born in Thebes as the *sjf šps*, ‘noble child’, cf. *Urk.* VIII, 52, 13–15; for *sjf šps* as an epithet of Khonsu-the-child, see also *Urk.* VIII, 64, 2.

x + 11: At the first glance one may be tempted to read the theonym *Jnpw*, ‘Anubis’, at the beginning of the line. Problematic for this reading, however, is the short diagonal stroke at the left end of the *n* of *Jnpw* that goes to the top right (as in the sign for *t*). If the reading *Jnpw* is correct, the following *n* could either belong to the divine name *Nw.t* as an additional phonogram or it could be the preposition *n*. Otherwise it might also be taken as the genitive *n*: ‘...of Nut’.

*Nw.t*: The name of the goddess here is written . Some other examples of the name of Nut having a similar orthography are:  (Glossar, 211);  (K.-Th. Zauzich, ‘Ein vieldiskutiertes Wort im Titel des Hieros Polos der Königin Kleopatra III’, in W. Clarysse et al. (eds), *Egyptian Religion, the Last Thousand Years. Studies Dedicated to the Memory of Jan Quaegebeur* I, (OLA 84; Leuven, 1998), 747);  (J. F. Quack, ‘Beiträge zum Verständnis des Apisrituals’, *Enchoria* 24 (1997/98), 48–9).

Apart from these Demotic writings, hieratic and late hieroglyphic texts sometimes show a fairly unorthodox orthography of the divine name *Nw.t* as well; cf., for instance,  in P. Louvre 3284, second half of the second century BC (F. R. Herbin, *Le livre de parcourir l'éternité* (OLA 58; Leuven 1994), 513, line 4), and  on a coffin in Amsterdam, APM 7069, second century AD (W. M. Van Haarlem, *CAA Allard Pierson Museum Amsterdam*, IV (Amsterdam, 1998), 91). In Demotic, the *jn*-group was often written before words beginning with *n*; cf. M. Smith, ‘Lexicographical Notes on Demotic Texts II’, *Enchoria* 13 (1985), 111–14. The ink-marks after *Nw.t* look like traces of *l* or *r*.

x + 12: The traces at the beginning of the line look like the end of *nfr*, cf. the same word in line x + 14.

x + 13: *shne nfr*, ‘good fortune’: *shne* has the same determinatives as the divine names Rattawy and Nut: . In the case of *shne*, however, the seated-goddess determinative and the first part of the following word *nfr* are written over each other:  =  + .<sup>57</sup> Apparently the scribe forgot the *nfr*-sign at first; when he became aware of his mistake, he altered the seated-goddess determinative rather than adding the *nfr*-sign above the line. The combination *shne nfr*, ‘good fortune’, is well attested in Demotic as an equivalent of Greek ἀγαθὴ τύχη (cf. *Glossar*, 456).

x + 14: *n3-]nfr t3j=k rnp.t nfr.t*. The expression *rnp.t nfr.t* usually refers to the new year which is called the ‘good year’ in Egyptian texts; for *rnp.t nfr.t* as an equivalent of ‘new year’, see, for example, J. Osing, *Hieratische Papyri aus Tebtunis*, I (CNIP 17; Copenhagen, 1998), 164 n. c and the Dendera text quoted in 165 n. d. The words of line x + 14 call to mind the fixed phrase *n3-nfr n=k t3 rnp.t t3j=k rnp.t nfr* which is

<sup>57</sup> This was drawn to my attention by M. Smith.

attested as a greeting formula in letters written on New Year's Day; cf. P. Loeb 4, lines 1–3; 6, lines 2–3 and 22, lines 2–3.<sup>58</sup> The same formula is found in O. Hor no. 3 in conjunction with *šhne nfr*, 'good fortune' (in the context of blessing the king).<sup>59</sup> In view of the Hor ostrakon it is likely that lines x + 13–x + 14 also represent parts of a benediction addressed to a male deity.

x + 15: *gljl*, 'burnt offering', corresponds to Coptic Ⲅⲗⲓⲗ (Černý, *CED*, 328; Crum, *CD*, 811a; Vycichl, *Dictionnaire étymologique*, 338) and hieroglyphic *qrr/krr* (*Wb.* V, 61, 11–13). It is apparently a Semitic loan-word; for the etymology and significance of this term, see J. Quaegebeur, 'L'autel-à-feu et l'abattoir en Égypte tardive', in J. Quaegebeur (ed.), *Ritual and Sacrifice in the Ancient Near East* (OLA 55; Leuven, 1993), 342–7, esp. 344–5. In the inscriptions of the temples of Kom Ombo, Edfu and Dendera, *qrr/krr* occurs often in a festival context: P. Wilson, *A Ptolemaic Lexikon* (OLA 78; Leuven, 1997), 1066–7.

*r d[*: the traces between *gljl* and the break look more like *d* than *b* or the first part of *nfr*.

x + 16: *P3-MH 7* and *P3-[MH 8]*: The numbering of each single invocation in red ink may suggest that P. Ashm. 1984.76 represents a fragment of a collection or handbook of hymns and incantations. The existence of such compilations of hymns and invocations on papyrus is known, for instance, from an inscription in the temple of Khnum at Esna which mentions the 'reading of a book of hymns (*šdj md3.t dw3w*)' for Neith.<sup>60</sup> As the masculine article in *P3-MH 7* and *P3-[MH 8]* signifies, a masculine term is implied after the ordinal number. This word is presumably an expression for 'recitation' or 'praise', such as *tw3*, 'hymn', or *hs*, 'song, praise'. The numeration would have facilitated the use of the repertoire of hymns<sup>61</sup> or it might have corresponded to a fixed order in which the invocations were to be recited.

x + 18: Perhaps restore 'lion of the South' here.

x + 19: For the writing of *hnqe.w*, 'beer' cf. *Glossar*, 315 and Mag. Pap. III, [59] no. 589. For the plural-strokes after the pot determinative which are frequently added to non-countable materials and substances, for instance, liquids, see the hieroglyphic writings of *hnq.t* in *Wb.* III, 169. See also the remarks by J. Leclant, 'La Chronique du Prince Osorkon', *Orientalia* 30 (1961), 409 n. 5, and P. Lacau, 'Liquides et matières en grains employés au pluriel', *BIFAO* 56 (1957), 161–72 (I owe these references to Mark Smith).

As the article *p3* indicates, the following word *mrj[* is of masculine gender. However, no suitable expression could be found in the *Glossar* that would fit the remaining signs. Maybe the word in question is to be understood as a term for another beverage; provided this guess is correct, one might think of restoring *\*mrjs*, cf. Coptic ⲙⲣⲓϢ, 'new wine,

<sup>58</sup> W. Spiegelberg, *Die demotischen Papyri Loeb* (Munich, 1931), 11–12 with n. 2; 17; 54–5.

<sup>59</sup> Recto, lines 2–3 and line 12: J. Ray, *The Archive of Hor* (EES Texts from Excavations 2; London, 1976), 20–1.

<sup>60</sup> S. Sauneron, *Esna* III, no. 207, 17 (p. 35, 11) and *Esna* V, 278.

<sup>61</sup> For this see the comments by Ray on the use of numbering in dream texts, which may have served the same purpose: J. D. Ray, 'Phrases used in Dream Texts', in S. P. Vleeming (ed.), *Aspects of Demotic Lexicography* (Studia Demotica 1; Leuven, 1987), 85.

must' (Crum, *CD*, 183a; Černý, *CED*, 89), 'kind of beer' (see references quoted by Vycichl, *Dictionnaire étymologique*, 120).

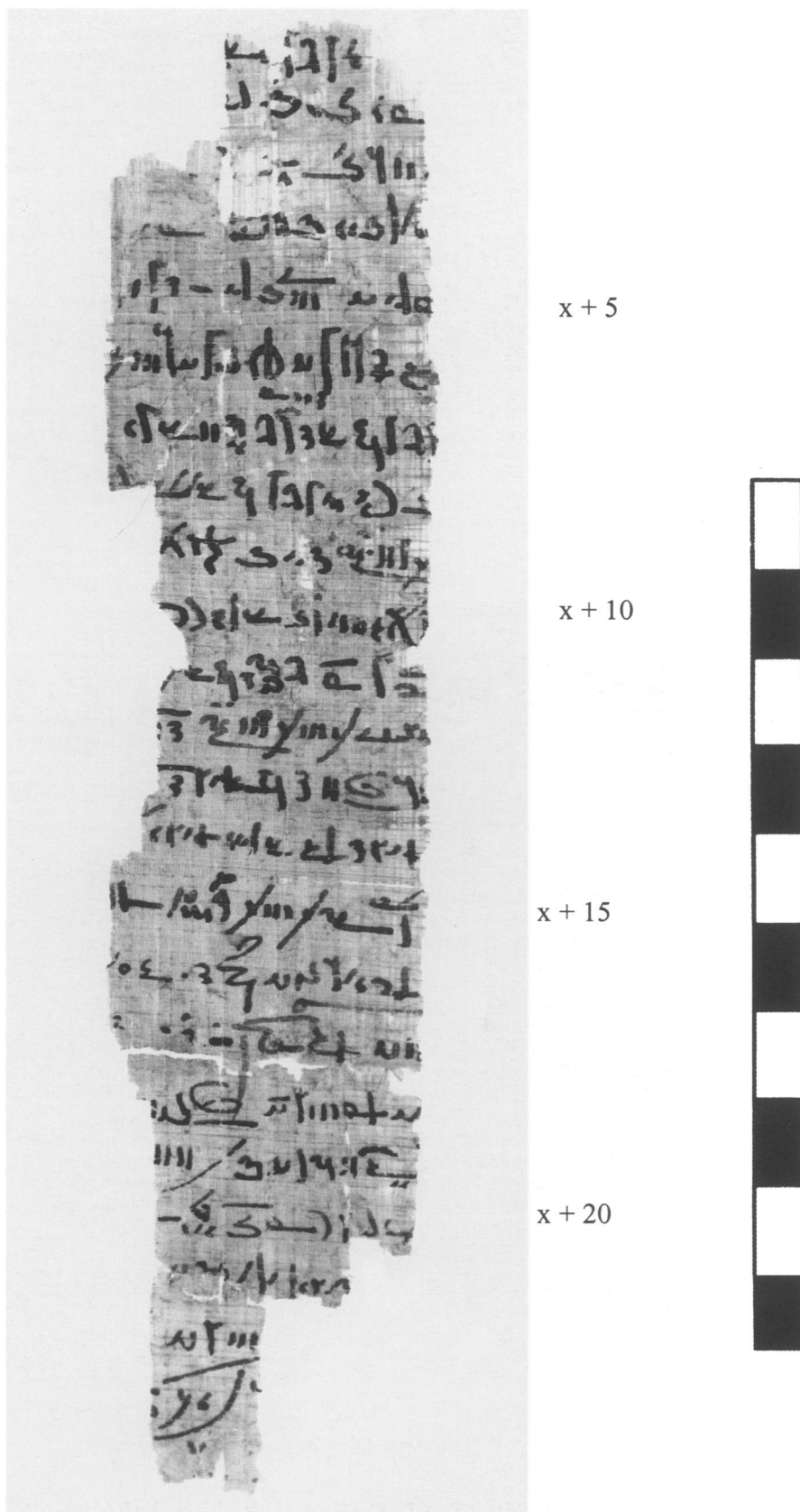
x + 20: 「...」 *ntj jn-n<sup>c</sup>*: The damaged word before *ntj jn-n<sup>c</sup>* seems to have the animal determinative (cf. *m3j* in line x + 18) or, less likely, the plant determinative, which can have a similar form. The remaining traces at the beginning of the line look somewhat like *rt* (M. Smith).

x + 21: The damaged word at the beginning of the line ends with the book-roll determinative, *t* and plural strokes; the word in question is certainly *nfrw.t* (M. Smith). The reading *j* and *r* at the beginning of the following word is quite certain; the next sign could be a damaged *š* or alternatively an *m*. Perhaps restore *jrš*, 'cold' (*Glossar*, 40).

x + 22: After the lacuna, the *j*-group and the animal determinative follow; perhaps read *m3j* again (this was suggested to me by M. Smith). The long tail before this word might belong to an *f* or *p3y*: probably 'this lion' is to be understood.

*P3* [*MH*-8]: Because the article *p3* is written in dark-red ink one should restore a numeral in the gap after *p3*, in accordance with the red *P3 MH*-7 in line x + 16. However, it can not be said with absolute certainty whether the numeral in line x + 22 was actually *mḥ* + 8 or *mḥ* + a number which is higher than 8, since another ordinal number might have been included in the lost parts of the text between line x + 16 and line x + 22.

x + 24: Almost no traces of script survive.



P. Ashm. 1984.76 (photograph courtesy of the Ashmolean Museum, Oxford).

# ‘... AS SAFE AS IN THE BRITISH MUSEUM’: PAUL DE LAGARDE AND HIS BORROWING OF MANUSCRIPTS FROM THE COLLECTION OF ROBERT CURZON\*

By HEIKE BEHLMER

The Coptic collection of Robert Curzon, fourteenth Baron Zouche (1810–73), now in the British Library, contains two manuscripts loaned to and published by the gifted but controversial German orientalist Paul de Lagarde (1827–91): fragments of a Sahidic psalter and an exegetical catena to the Gospels in Bohairic. Lagarde’s papers, today in the possession of the University of Göttingen, where he taught oriental languages from 1869–91, throw fresh light on the history of this loan. His correspondence not only forces us to revise the chronology of the publication process, it also lays open how a German professor of limited financial means would resort to half-truths and stratagems in order to persuade a British nobleman to send his valuable Coptic manuscripts out of the country.

ONE of the most interesting collectors of, among other things, Coptic manuscripts is Robert Curzon, fourteenth Baron Zouche (1810–73).<sup>1</sup> His collection was bequeathed to the British Museum in 1917 by his daughter Darea, but had already been deposited there in the spring of 1876, most probably on 19 April, by his son.<sup>2</sup>

Among the scholars who profited from this collection is the German orientalist Paul de Lagarde (1827–91), professor of oriental languages at the University of Göttingen from 1869 until his death.<sup>3</sup> Lagarde had come into contact with Robert Curzon in 1866. At that time, following his career as a secondary-school teacher in Berlin for several

\* Paul de Lagarde’s papers, which form the basis of this article, are kept in the Department ‘Handschriften und seltene Drucke’ (Manuscripts and Rare Prints) of the Niedersächsische Staats- und Universitätsbibliothek Göttingen. I wish to thank Helmut Rohlfing, director of the department, for allowing me to study Lagarde’s correspondence and for granting permission to publish the letters reproduced here, and Bärbel Mund for her help during my stays in the reading room. Stephen Emmel most kindly provided information, advice, and copies of his own publications. Finally, I am indebted to Patricia Usick for searching for possible traces of Lagarde’s letters to E. A. W. Budge in the British Museum archives.

<sup>1</sup> For Robert Curzon and his collection of Coptic manuscripts, see S. Emmel, ‘Robert Curzon’s Acquisition of White Monastery Manuscripts’, in M. Rassart-Debergh and J. Ries (eds), *Actes du IV<sup>e</sup> congrès copte, Louvain-la-Neuve, 5–10 septembre 1988* (Louvain-la-Neuve, 1992), II, 224–31; id., ‘Robert Curzon’s “Very Large Folio” Coptic–Arabic Gospel of Matthew, and Ms Coptic 1 in the Beinecke Library: A Question of Identity’, *Yale University Library Gazette* 63 (1988), 158–63; B. Layton, *Catalogue of Coptic Literary Manuscripts in the British Library Acquired since the Year 1906* (London, 1987), xliv–xlix.

<sup>2</sup> See S. Emmel, *Shenoute’s Literary Corpus* (PhD dissertation Yale University, 1993), 86 n. 104.

<sup>3</sup> For a biography of Lagarde with a focus on his scholarly life, see A. Rahlfs, *Paul de Lagardes wissenschaftliches Lebenswerk, im Rahmen einer Geschichte seines Lebens* (Göttingen, 1928). More recent biographical sketches are R. Heiligenthal, ‘Paul de Lagarde’, in *Theologische Realenzyklopädie* 20 (Berlin and New York, 1990), 375–8, and B. Steimer, ‘Lagarde, Paul Anton de’, in *Lexikon für Theologie und Kirche* 6 (1997), 586–7. Besides the project of a critical edition of the text of the Greek Old Testament, to which he devoted much of his life, but which flourished only under the directorship of his pupil Rahlfs, Lagarde is known for his political writings. In numerous essays Lagarde attacked a state which he saw in the grip of materialism and liberalism. To this state he

years, Lagarde was living the life of a private scholar at Schleusingen, a small town in the Thuringian Forest. A three-year grant by Wilhelm I, King of Prussia, made it possible for him to work on his research projects without having to earn a living.<sup>4</sup> In 1866 Lagarde had already been pursuing for some years the project of a critical edition of the text of the Septuagint. One of the main tenets of his editorial criticism, the value of the oriental versions, led him to approach Curzon for the loan of his oriental, and especially Coptic, manuscripts. Curzon allowed him to consult his collection, under the express condition, however, that this consultation was to take place in England. On 1 May 1866, he wrote (see pl. XVIII, 1–2):

I have received your letter respecting the Oriental versions of the Septuagint. I have several manuscripts in Coptic, and other Eastern languages, some of considerable antiquity, I should be glad to give you the use of them if you was in England, but they are too valuable to be sent to another country. I fear that I could not make any arrangements by which you could consult those manuscripts at present, as my affairs are in a disorganised state, owing to a severe affliction.

We know, however, that two of Robert Curzon's Coptic manuscripts were sent to Göttingen after his death. It is intriguing to trace the exchange of letters that led Curzon's son Robert to depart from his father's explicit wish. Moreover, this correspondence, which we shall look at in some detail in the following, throws light on the way in which international scholarly exchange and manuscript loans were conducted in the 1870s and 1880s.

On 23 October 1874 Lagarde wrote to Lord Zouche, as I shall call the son in the following to distinguish him from the homonymous father,<sup>5</sup> to ask for the loan of psalter manuscripts from the Curzon collection.<sup>6</sup> He quoted Robert Curzon's 1866 letter in a way which must be called ingenious at the least, leaving out all passages detrimental to his own interest, while keeping intact both the sequence and the grammatical form of the words. One can fully appreciate Lagarde's skill only if one compares his excerpt with the original cited above (see pl. XVIII, 3):<sup>7</sup>

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opposed the idea of a nation understood as a community united by a common historical destiny. Lagarde's chauvinist and anti-semitic writings were widely read after the First World War and especially popular during National Socialism. The most influential study of Lagarde's political writings is still F. Stern, *The Politics of Cultural Despair: A Study in the Rise of the Germanic Ideology* (Berkeley, 1961). A new biography of Paul de Lagarde is currently being prepared by Marburg historian Ulrich Sieg.

<sup>4</sup> Rahlfs, *Paul de Lagardes wissenschaftliches Lebenswerk*, 53.

<sup>5</sup> Both Emmel and Layton use the nickname 'Robin' to distinguish Curzon's son from the father. However, for reasons of loyalty to my research object, it seems appropriate to follow Lagarde, who must have worried about the correct form of addressing the son and who seems to have inquired expressly after his first names. In a letter dated 8 February 1886 Ernest Alfred Wallis Budge, then Assistant Keeper of Egyptian and Assyrian Antiquities in the British Museum, sent an answer to this inquiry: 'Lord Zouch's names are Robert Nathaniel, Cecil, George Curzon'. Incidentally, Budge's spelling of the son's title ('Zouch' instead of 'Zouche') misled Lagarde into temporarily changing his own spelling (cf. below with n. 12) and into sending Lord Zouche a whole page of apologies for having misspelled his name (copy of a letter by Lagarde dated 28 March 1886). Both letters and any other referred to in the following are kept in the Department of Manuscripts and Rare Prints, Niedersächsische Staats- und Universitätsbibliothek Göttingen, Lagarde Papers, and quoted by permission.

<sup>6</sup> British Library Or. 8808, formerly MS Parham 111, cf. Layton, *Catalogue*, no. 13.

<sup>7</sup> The source for this quotation is a copy of Lagarde's letter to Lord Zouche. Lagarde's habit to keep copies of many of his own letters makes it quite often possible to follow an exchange solely on the basis of documents from the Lagarde papers. Unlike his quotations, these copies seem to be faithful, as I was able to establish by comparing selected copies with their originals.

In a letter dated 24 Arlington street S. W. London May 1 1866 your Lordships father wrote to me

I have several manuscripts in Coptic, and other Eastern languages, some of considerable antiquity. I should be glad to give you the use of them ... I fear ... not at present as my affairs are in a disorganised state, owing to a severe affliction.

May I trouble your Lordship at present, to grant me the use of your Coptic psalters? You are in possession of 44 leaves of the Sahidic version—n<sup>o</sup> 6—and if I am not mistaken, also of a memphitic copy.<sup>8</sup>

This more than creative quotation from the late Robert Curzon's letter had the desired effect. Lord Zouche granted the request, and the fragments of the Sahidic psalter were published by Lagarde.<sup>9</sup> Lagarde managed not only to publish the Psalms from the Curzon collection, he also obtained permission to edit a second manuscript: the Bohairic catena to the Gospels.<sup>10</sup> Based on the way in which Lagarde presented the loans in his preface to the edition of the catena, subsequent scholarship has assumed that both manuscripts were sent to Göttingen in 1874.<sup>11</sup>

Here again, Lagarde referred to Robert Curzon's 'permission' of 1866, without mentioning any restrictions incumbent on the loan:

iam quum Robertus Curzon...mihi Silusiâ eum literis adeunti librorum pretiosissimorum ab se collectorum usum liberum Kalendis Maiis anni 1866 promississet, anno 1874 psalterium aegyptiacum editurus filium viri generosissimi ad superos evocati, Robertum dominum Zouch, rogavi ut quod pater pollicitus esset ratum haberet [since already Robert Curzon...when I approached him by letter from Schleusingen, had promised me on 1 May 1866 the free use of the extremely valuable books he had collected, in 1874, when I was about to edit the Coptic Psalter, I asked the son of that most generous man who had been called to the heavenly spheres, Robert Lord Zouch, whether he would honour his father's promise].<sup>12</sup>

The following sentence seems to indicate that the fragments of the Psalms and the catena had been sent to Göttingen simultaneously in 1874:

qui perhumaniter et fragmenta psalmodum aegyptiacorum vetustissima et codicem de quo nunc loquutus sum evangeliorum inauditâ prorsus benivolentiâ religioni et doctrinae meae

<sup>8</sup> The numeration is that of Robert Curzon's 1849 *Catalogue of Materials for Writing, Early Writings on Tablets and Stones, Rolled and Other MSS and Oriental MS Books, In The Library of the Honourable Robert Curzon at Parham in the County of Sussex*; cf. Layton, *Catalogue*, xlvi and 17 n. 2. Lagarde seems to have been mistaken about the 'memphitic copy'.

<sup>9</sup> *Psalterii Versio Memphitica e recognitione Pauli de Lagarde. Accedunt Psalterii thebani fragmenta Parhamiana, Proverbium memphiticorum fragmenta Berolinensia* (Göttingen, 1875). Lagarde's edition gave the Coptic text in transcription, but in a 1925 re-edition two Coptologists added Coptic characters: *Psalterii Versio Memphitica e recognitione Pauli de Lagarde. Réédition avec le texte copte en caractères coptes par Oswald H. E. Burmester et Eugène Dévaud* (Louvain, 1925).

<sup>10</sup> For the history of the manuscript (British Library Or. 8812, formerly MS Parham 106) see Layton, *Catalogue*, no. 249; Emmel, in Rassart-Debergh and Ries (eds), *Actes*, esp. 226–8. Lagarde's edition appeared as *Catena in Evangelia aegyptiace quae supersunt Pauli de Lagarde studio et sumptibus edita* (Göttingen, 1886).

<sup>11</sup> Rahlfs, *Lagarde's wissenschaftliches Lebenswerk*, 65; Layton, *Catalogue*, 394.

<sup>12</sup> *Catena*, IV (the loan is presented in a similar way: *Psalterii Versio Memphitica*, VI). This preface must have been written shortly after 8 February 1886, since Lord Zouche's name is spelled without the final 'e' (cf. n. 5 above). It cannot have been written later than mid-March of the same year, since by that date the printing of the catena must have been all but completed (see below with n. 25). It is perhaps an unfortunate side effect of my research that the image of Robert Curzon as an extremely generous collector who even sent his valuable manuscripts abroad (cf.



Gottingam commisit [he most kindly entrusted both the very ancient fragments of the Coptic Psalter and the Gospel codex of which I just spoke (*scil.* the catena manuscript) with unheard-of benevolence to my conscientiousness and erudition at Göttingen].

The Lagarde papers, however, give a completely different picture of the entire process. The loan of the manuscripts took place in two separate phases and required lengthy negotiations—especially in the case of the catena manuscript—and the intervention of three famous British scholars: William Wright (1830–89), then Professor of Arabic at Cambridge, Joseph Barber Lightfoot, Bishop of Durham (1828–89),<sup>13</sup> and Edward Maunde Thompson (1840–1929), at the time Keeper of Manuscripts in the British Museum.<sup>14</sup>

The psalter fragments were sent to Göttingen not in 1874, but on, or shortly after, 3 April 1875. The basis for this assumption is a letter written to Lagarde by William Wright. In his request for the loan of the Psalms written on 23 October 1874, Lagarde had given Lord Zouche Wright's name as that of a renowned British scholar willing to vouch for him ('my best friend in England'; see pl. XVIII, 3). On April 5 of the following year Wright forwarded a letter sent to him by Lord Zouche, in which the latter apologised for not having sent the manuscript to Lagarde earlier. He added: 'I will send it to him without any further delay'. The letter by Lord Zouche is dated 3 April 1875, and a note written by him on 29 July 1875 proves that the manuscript cannot have been sent much later than that date: in it Lord Zouche thanked Lagarde for his 'kind present [*scil.* the completed edition of the Coptic psalter!] which arrived safely to hand with my book which you returned, a few days since'.<sup>15</sup>

The request for a loan of the catena manuscript, on the other hand, was not made until April 1881. In the first instance, Lord Zouche denied this request (letter dated 11 June 1881, in answer to a letter by Lagarde dated 4 April 1881; see pl. XIX, 1–2). He referred Lagarde to the British Museum where the collection had since been deposited and where Lagarde would be able to consult it at any time. Lagarde was to apply to Edward Maunde Thompson. After Lagarde had in fact consulted the manuscript during a brief stay in the Museum in July/August 1881, but without being able to speak to Thompson,<sup>16</sup> he asked for the intervention of the Bishop of Durham (see pl. XIX, 3):

Let me add one word more.

Lord Zouche formerly has sent me his manuscripts to Goettingen. At present they are kept in Thompsons room in the Museum, though still being the property of Lord Zouche. Thompson

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Layton, *Catalogue*, xlix), an image to which Lagarde's words of praise contributed in a substantial way, is slightly marred by the results, since he emerges as a more cautious person than previously assumed, at least in this matter.

<sup>13</sup> Joseph Barber Lightfoot, Bishop of Durham since 1879, is the author of many influential works in the fields of New Testament criticism, early Christianity, and the Apostolic Fathers. A short biography and discussion of his œuvre can be found in M. E. Glasswell, 'Lightfoot, Joseph Barber (1828–1889)', in *Theologische Realenzyklopädie* 21 (Berlin and New York, 1991), 196–9.

<sup>14</sup> Thompson was Keeper of Manuscripts in the British Museum from 1878–88. From 1888–99 his title was 'Principal Librarian and Secretary', later 'Director and Principal Librarian'. He retired in 1909. Biographical information can be found in P. R. Harris, *A History of the British Museum Library: 1753–1973* (London, 1998), esp. 279 n. †, 302, 364 and 440 f.

<sup>15</sup> Letter from William Wright to Paul de Lagarde dated 5 April 1875 and letter from Lord Zouche to Paul de Lagarde dated 29 July 1875.

<sup>16</sup> During this stay, Lagarde also collated fragments of Shenoute's—and maybe also of Besa's—works from the Curzon collection, which he intended to publish eventually. See my 'Schenute, Besa und Lagarde—eine unbekannt Episode der Forschungsgeschichte', to appear in the *Journal of Coptic Studies* 5 (2003).

was out of town, so I could not speak to him. Besides Your Lordships word is of more importance than is mine.

Could you not manage to get the so-called Macarius-manuscript sent to Goettingen—not to the library, but to my house—for publication? I examined it when in London, and from comparison with the dated manuscripts of the Vatican I had seen in Rome I found it to be of the tenth century. Its leaves are in a most shocking disorder.

I cannot stay for a year in London, but I can very well do the whole business required here while still printing my LXX, when allowed to use the manuscript in my own abode.

I consider it as being of high importance, though it is a fresh translation from the Greek.

Lightfoot fulfilled Lagarde's request and wrote to Thompson. This is made certain by Thompson referring to Lightfoot's intervention in a letter to Lagarde dated 9 September 1881:

The Bishop of Durham has written to me about your wish to have the loan of Lord Zouche's Coptic Ms. of Macarius. I do not know if Lord Zouche will consent; but I shall be very happy to do what I can in your favour.

Thompson asked Lagarde for a letter written in English stating his interest and describing his research project. In his answer dated 14 September 1881 (see pl. XX), Lagarde repeated his own condensed version of Robert Curzon's permission to use his collection and mentioned the 1875 loan of the Psalms as a precedent. Painting a picture of himself as the self-sacrificing servant of an ungrateful discipline, he argued moreover that his financial situation did not allow him to transcribe the lengthy and important manuscript in London and asked once more that it be sent to his home at Göttingen:

You know from the charming book of Dean Burgon the importance of the chains. You know also that the so-called Macarius manuscript of the Parham collection is a chain. I examined this book when lately in London. Severus of Antioch being frequently quoted in it, it must be written after 530 A.D. From comparison with what I have seen of dated Coptic manuscripts in the Vatican library, I am inclined to think that it belongs to the tenth century. It ought to be printed entire, as the quotations of the fathers contained in it are as valuable as the text of the gospels, which is not taken from the Egyptian version, but translated afresh from a Greek original. The Greek chains will in a most efficient way be controlled by this book.

It is in an excellent state of preservation, though far from being complete. It being very bulky and its leaves being badly arranged, it would cost a long stay in London to transcribe it. As I cannot afford to live a long time away from my house, I request the favour of you asking Lord Zouche to lend me the book to be used in my own private residence in Goettingen. You know my house, and you know me: the manuscript will be in my hands quite as safe as in the British Museum.

The late Mr. Curzon promised me the use of his collection. Lord Zouche himself has sent me his Sahidic Psalms. I trust, that when you and the Bishop of Durham help me, the noble proprietor might be engaged to grant my request.

I earned nothing from all the pains I have taken for promoting science, neither money nor honour nor even the impression of having been useful: divinity is a stepchild with our age. Let me hope, that Lord Zouche will do something for me, by obliging me with materials for fresh troubles, this being the only reward I like to get.

As to my place in Coptic philology you may ask Mr. R. S. Poole,<sup>17</sup> and you may consult L. Sterns Coptic grammar ix.<sup>18</sup>

<sup>17</sup> Reginald Stuart Poole (1832–95), at the time Keeper of Coins and Medals in the British Museum (1870–93), author of numerous articles on Egyptological topics and well-known for the part he took in the foundation of the Egypt Exploration Fund.

<sup>18</sup> L. Stern, *Koptische Grammatik* (Leipzig, 1880), ix: 'Fördersamer ist der wissenschaft geworden was nach

The intervention of both Lightfoot and Thompson seems to have convinced Lord Zouche to change his mind. After an interval of one year due to the latter's absence from England, on 15 September 1882 Thompson informed Lagarde that he had been charged with arranging the transfer of the manuscript to Göttingen to be deposited in the University Library (see pl. XXI). Although Lagarde had insisted that he needed to consult the manuscript in his home, Lord Zouche stipulated that the manuscript was to be deposited in the University Library. The reason for this is given by Thompson in the same letter: 'The restriction of placing the Ms. in the library is of course to prevent, as far as possible, any accident to the Ms. from fire' (see pl. XXI below). Fire as a possible risk had not been mentioned in the correspondence about the previous loan, and the reason for this increase in caution lies, in all probability, in a traumatic event which changed the lending policy of many European collections: the destruction by fire of the library of the famous historian Theodor Mommsen in July 1880. This fire had destroyed not only Mommsen's books and personal notes, but also two manuscripts on loan from Brussels and Halle. This loss caused museums and libraries to reconsider their attitude with respect to loaning originals to scholars, to be studied in their private residences: they no longer seemed to be 'quite as safe as in the British Museum'.<sup>19</sup> Lagarde was very upset about the restrictions resulting from the event, and he publicly lamented that his own edition of the Septuagint had suffered as a consequence of Mommsen's carelessness.<sup>20</sup>

Following this exchange of letters, considerable time passed before Lagarde actually received the manuscript. He seems not to have pursued the matter of the loan for a period of more than two years since, on 3 February 1885, Thompson wrote:<sup>21</sup>

Did not Lord Zouche stipulate that the Ms. was to be deposited in your University Library while you had it at Göttingen? In any case, I think it will be necessary to get his leave again, as it is so long since the matter was before him. As I have my mind occupied from day to day with a multitude of things in the course of business, I fear that I might forget to send the Ms. at the particular time you name. I think, therefore, that your best course will be to write to remind me in the middle of April. If you will do so I will then communicate with Lord Zouche. But meanwhile, can you refresh my memory with the conditions on which you were to have the Ms., or refer me to the date of the negotiation so that I may refer back to my correspondence.

We are well prepared against the dynamite ruffians—The Museum is more like a garrison at the present moment.

Thompson's letter reveals that Lagarde must have tried one final time to have the manuscript sent to his private residence, perhaps speculating that after the long interval,

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Schwartz vor allen andern P. de Lagarde und Eug. Revillout geleistet haben. Der erstere, in seiner forschung auf den bedeutenden endzweck der kritik des bibeltextes gerichtet, lieferte vortreffliche ausgaben der unterägyptischen übersetzung ...'

<sup>19</sup> A concrete example for Lagarde suffering from the change in museum policy can be found in his correspondence with Oscar von Lemm (1856–1918), curator with the Asiatic Museum in St. Petersburg. When Lagarde wished to borrow the Museum's Persian Dioscurides manuscript, von Lemm wrote that he did not foresee any problems with the loan, but that the manuscript would not be sent to his home because of the fear caused by the fire in Mommsen's library (letter dated 23 April/5 May 1885).

<sup>20</sup> P. de Lagarde, *Mittheilungen*, II (Göttingen, 1887), 280–1.

<sup>21</sup> Letter from Edward Maunde Thompson to Paul de Lagarde dated 3 February 1885.

the conditions originally imposed might have slipped Thompson's memory.<sup>22</sup> However, following Thompson's answer Lagarde resigned himself to accepting Lord Zouche's conditions,<sup>23</sup> and the manuscript was duly sent to Göttingen on or after 1 May 1885. Thompson informed Lagarde of its having been mailed in the following letter:<sup>24</sup>

Dear Sir,

on receipt of your letter, I entered into correspondence with Lord Zouche; and he has consented to allow you to have the Ms.; it being understood that you alone make use of it. I have therefore sent it to you today.—paying for carriage 6s/2<sup>d</sup> and for insurance (at the rate of £ 300) 7s/6<sup>d</sup>—in all 13s & 8<sup>d</sup>.

The subsequent correspondence between Thompson and Lagarde consists of a reminder to return the manuscript, and the ensuing negotiations for an extension of the loan until 1 April 1886. On 9 March 1886, before the expiration of the deadline, Thompson acknowledged safe receipt of the manuscript.<sup>25</sup> After this, the intensity of the correspondence between both scholars seems to have diminished rapidly, and the Lagarde papers contain only one more item: a short note by Thompson dated 22 February 1888, which is not, however, at all concerned with Coptic, but instead, with yet another one of Lagarde's wideranging research interests, namely Giordano Bruno.<sup>26</sup>

Paul de Lagarde's letters to Thompson, Lord Zouche, and the Bishop of Durham show this controversial scholar at his most typical. The character traits surfacing in the few letters presented here recur throughout his entire correspondence: his genuine enthusiasm for the subject of his research, especially for Coptic philology, his persistence and even unscrupulousness in pursuing his goals, and his self-stylisation as the 'suffering servant' of scholarship. They also open a window on an era of scholarship in which we can visualise the successful orientalist in the centre of a 'spider's web' of contacts with other scholars, museums, government agencies in foreign countries, and private collectors. These contacts were cultivated by means of extensive letter writing, facilitated by an efficient postal service that often enough delivered letters between Göttingen and London faster than today. Such a scholar could reasonably expect libraries all over Europe, and if he could persuade them, private collectors, to send the

<sup>22</sup> A further insight to be gained from the letter is that Lagarde must have enquired after the dynamite attacks on the Tower and the Houses of Parliament, which shook London on 24 January 1885. Dynamite bombings of various public buildings had taken place in London in 1883–5 and been attributed to the Irish Republican Brotherhood, an Irish Nationalist organisation. Two men named Cunningham and Burton were found guilty, on 18 May 1885, of causing the explosions in the Tower and the Houses of Parliament, and sentenced to imprisonment for life. See K. R. M. Short, *The Dynamite War: Irish–American Bombers in Victorian Britain* (Dublin, 1979), 200–28 at 205–10. In the wake of the attacks, plainclothes policemen were stationed in the most important buildings of the city, among which was the British Museum (*ibid.* 208).

<sup>23</sup> In a letter to Edward Maunde Thompson dated 16 November 1885 Lagarde gave various reasons for a delay in the publication process of the catena and assured Thompson: 'Finally my medical colleagues advised me most seriously, to take a four weeks holyday, which I did, leaving Lord Zouche's manuscript, locked up and sealed by me, at the charge of Wilmanns' at the university library'. August Wilmanns (1833–1917) was the director of the University Library from 1875 to 1886.

<sup>24</sup> Letter from Edward Maunde Thompson to Paul de Lagarde dated 1 May 1885.

<sup>25</sup> At that time, Lagarde's edition of the catena was already completed, and, on 26 March 1886, Lord Zouche thanked him for sending him 'your work upon my Ms'.

<sup>26</sup> Cf. his *Le opere italiane di Giordano Bruno Ristampati da Paolo de Lagarde* (Göttingen, 1888) in two volumes.

manuscripts he wished to study to his home town, if not his private residence. For a professor without a personal fortune, such as Paul de Lagarde, this policy could enormously facilitate his work.

While one may not sympathise with his methods, the correspondence presented here allows us to see Lagarde's reasons for resorting to half-truths and stratagems, in particular after the idyllic scholarly situation of his earlier career was brought to an abrupt end by the catastrophic experience of the fire in Mommsen's library. They served to achieve a scholarly objective very close to his own heart: first-hand access to the Coptic manuscripts from the collection of Robert Curzon.

24 Arlington St<sup>29</sup> S.W. London  
 May 1. 1866

Sir

I have received your letter respecting the oriental versions of the Septuagint. I have several manuscripts in Coptic, and other Eastern languages, some of considerable antiquity, I should be glad to give you the use of them if you was in England, but they are too valuable to be sent to another country.

I fear that I could not make any arrangements by which you could consult these manuscripts at present.

as my affairs are in a disorganised state, owing to a severe affliction.

I am Sir  
 Yours &c. &c.

R Curzon

1. and 2. Letter from Robert Curzon, fourteenth Baron Zouche, to Paul de Lagarde, dated 1 May 1866, pp. 1 and 2 (Department of Manuscripts and Rare Prints, Niedersächsische Staats- und Universitätsbibliothek Göttingen, Lagarde Papers).

3. Letter (in copy) from Paul de Lagarde to Robert Curzon, fifteenth Baron Zouche, dated 23 October 1874, p. 1 (Department of Manuscripts and Rare Prints, Niedersächsische Staats- und Universitätsbibliothek Göttingen, Lagarde Papers).

144  
 Lord de la Louche.  
 Göttingen octobre 23. 1874.

My Lord

In a letter dated 24 Arlington street S.W. London May 1866 your Lordship's father wrote to me I have several manuscripts in Coptic and other Eastern languages, some of considerable antiquity, I should be glad to give you the use of them. I fear ... not at present, as my affairs are in a disorganised state, owing to a severe affliction. May I trouble your Lordship at present, to grant me the use of your Coptic papyrus? You are in possession of 44 leaves of the Sahidic version - 22 b and if I am not mistaken, also of a memphitic copy. If your Lordship should deem it prudent to have the book sent through the hands of the German ambassador, I should at once apply to Prince Bismarck in order to get his permission for Count Münsterberg to send it to me with the government dispatches. Whatever your Lordship would be kind enough to bid me.

My best friend in England is Professor W. Bright, Esq., of Cambridge, who no doubt will give me any information concerning any person, that might be deemed necessary. I beg to state that the late Dr. Tatham, who gave to your Lordship's father some of the leaves, I venture to ask the loan of

114  
 53. Albemarle St. W.  
 London. June 11. 1881.  
 Dear Sir  
 I regret that owing to  
 pressure of business your  
 letter of the 15<sup>th</sup> has  
 remained so long unanswered.  
 With regard to your request  
 to inspect the MSS offered  
 to, I regret that it would

be out of my power to the works offered to are  
 forward them to Göttingen any time you may happen  
 but you could easily have in England, would be  
 obtain access to them at equally convenient.  
 the British Museum in I am sorry not be able  
 London where they are to allow them to leave the  
 at present deposited in country - I am however  
 making application to your able friend  
 Mr E. M. Thompson in London  
 whose immediate custody Professor Paul de Lagarde & C.  
 University of Göttingen -

1. and 2. Letter from Robert Curzon, fifteenth Baron Zouche, to Paul de Lagarde dated 11 June 1881, pp. 1 and 2-3 (Department of Manuscripts and Rare Prints, Niedersächsische Staats- und Universitätsbibliothek Göttingen, Lagarde Papers).

not saying, but what is strictly necessary.  
 Tell me what one would more.  
 said Lagarde formerly has sent me his manuscript  
 to Göttingen. He said they are kept in Thomp-  
 son's room in the Museum, though still being the  
 property of said Lagarde. Thompson was out of  
 town, so I could not speak to him. Besides your  
 Lagarde's word is of more importance than is  
 mine.  
 Could you not manage to get the so-called Ma-  
 carian manuscript sent to Göttingen - not to  
 the library, but to my house - for publication?  
 I examined it when in London, and from compari-  
 son with the oldest manuscript of the Vatican  
 I had seen in Rome I found it to be of the tenth  
 century. It leaves out in a most striking dis-  
 order.  
 I cannot stay for a year in London, but I  
 can very well do the whole business required  
 here while printing my LXX, when allowed to use  
 the manuscript in my own abode.  
 I consider it as being of high importance though  
 it is a fresh translation from the Greek.  
 I hope to receive a transcript of the Coptic  
 translation of a great many of (Beyron's) homi-  
 lies (some of the tenth century). I should like to  
 publish this together with the canon of the

Apocrypha, some Apocrypha of the N.T., Ecclesiastical  
 and Wisdom and the Samaritan manuscript in one  
 volume.  
 This day week I shall deliver Genesis of my great  
 work to the printer.  
 Your Lagarde's promised fragments are eagerly  
 expected.  
 I pray that I shall be spared to see the end  
 of my work.  
 I remain,  
 my Lord,  
 Yours very faithfully  
 P. de Lagarde.

3. Letter (in copy) from Paul de Lagarde to Joseph Barber Lightfoot, Bishop of Durham, dated 9 September 1881, pp. 2-3 (Department of Manuscripts and Rare Prints, Niedersächsische Staats- und Universitätsbibliothek Göttingen, Lagarde Papers).

Hornby 170  
an E. Maunde Thompson, British Museum.

Göttingen Sept. 14. 1881.

My Dear Sir

My Septuagint having gone to press, I look out for some work, which may as far as possible prevent my falling into the same miserable slaver which has done about the last days of Tregeller and Tischendorf. It appears impossible to keep in a tolerably good state of health, when nothing but voracious reading are the food of the mind.

I therefore have decided upon printing my *Artische ca. Syriaca* and my *Biblicalca Hægyptiaca* in the same time with my Septuagint.

I collected precious materials, and I request the favour of your helping me to get some more.

You know from the dreaming book of Dean Burgon the importance of the chain. You know also that the so called Macarius manuscript of the Durham collection is a chain. I examined this book when lately in London. Several of the folios being frequently quoted: it must be written after 530 A.D. From comparison with what I have seen of faded Coptic manuscripts in the Vatican Library, I am inclined to think that it belongs to the tenth century. It ought to be printed entire, as the quotations of the fathers contained in it are as valuable as the text of the gospels, which is not taken from the

Letter (in copy) from Paul de Lagarde to Edward Maunde Thompson, dated 14 September 1881, (Department of Manuscripts and Rare Prints, Niedersächsische Staats- und Universitätsbibliothek Göttingen, Lagarde Papers).

Egyptian version, but translated almost from a Greek original. The Greek name will in a most efficient way be controlled by this book.

It is in an excellent state of preservation, though far from being complete. It being very brittle and its leaves being badly arranged it would cost a long stay in London to transcribe it. So I cannot afford to live a long time away from my home. I request the favour of your asking Lord Trenchard to lend me the book to be used in my own private residence in Göttingen. You know my home and you know me. The manuscript will be in my hands quite as safe as in the British Museum.

The late Mr. Curyon promised me the use of his collection. Lord Trenchard himself has sent me his tablet in London. I trust that when you and the Bishop of Durham help me, the noble proprietor might be engaged to grant my request.

I learned nothing from all the pains I have taken for promoting science, neither money nor honours, nor even the impression of having been useful. Divinity is a step-child with our age. I hope that Lord Trenchard will do something for me by obliging me with materials for fresh troubles, this

being the only reward I like to get. To be my place in Coptic philology you may ask Mr. R. S. Peck, and you may consult Libani's Coptic grammar 18.

Did me add that if the book be granted, it ought to be sent registered.

Believe me yours most truly  
Paul de Lagarde, 22.



184

15 Sept. 1882.

Dear Sir,

I have heard from  
Lord Jauch at last.

He has been away from  
England for more than a  
year and only received  
our letters on his return.

He desires me to say  
that

Letter from Edward Maunde Thompson to Paul de Lagarde, dated 15 September 1882, pp. 1 and 2-3 (Department of Manuscripts and Rare Prints, Niedersächsische Staats- und Universitätsbibliothek Göttingen, Lagarde Papers).

that he has no objection  
to deposit the MS. in  
the University Library  
at Göttingen for your  
use, and leaves me to  
arrange matters. I hope  
that the permission does  
not come too late for  
your work. — Write

and tell me what is the  
number of the MS., for  
I am not sure; it is  
so long since the request  
was first made. —

The restriction of placing  
the MS. in the library is  
of course to prevent,  
as far as possible,  
any accident to the  
MS. from fire. —

## BRIEF COMMUNICATIONS

### **Fallen heroes?—Winlock's 'slain soldiers' reconsidered\***

About eighty years ago an excavation unit of The Metropolitan Museum of Art, working in Deir el-Bahri and led by Herbert E. Winlock, discovered a mass grave with more than sixty individuals. The corpses showed evidence of violence and were accompanied by military equipment; therefore, they were identified as soldiers killed in combat. Winlock was convinced that they could be connected to a specific historical event, and the dead were interpreted as soldiers of the victorious Theban army of Mentuhotep II slain during the storming of the fortress of Herakleopolis. This article aims to reassess Winlock's arguments and to present a new interpretation of the evidence.

At the end of its spring campaign in 1923, a team from the New York Metropolitan Museum working at Deir el-Bahri discovered the entrance of a previously unknown rock tomb (MMA 507). Situated on the northern slope of the bay in the middle of a row of graves of high officials of the early Middle Kingdom, this tomb is directly adjacent to that of the chancellor Khety (TT 311 = MMA 508) (pl. XXII, 1). The excavators glanced only briefly at the intermingled remnants of human remains inside tomb MMA 507, taking them to be the bodies of Coptic monks. The recent discovery of Tutankhamen's tomb in the nearby Valley of the Kings made the newly-found grave seem less interesting, so they sealed it and delayed investigation until a later date.<sup>1</sup>

Three years later, interest in the discovery was raised when a handful of workers, sent to re-examine the linen bandages, found on them a number of names typical of the Middle Kingdom.<sup>2</sup> Subsequent investigation of the complex uncovered the bodies or part of bodies of at least 60 individuals originally piled up in the corridors and chambers. All showed signs of external violence, such as arrowheads stuck in the bodies, as well as a variety of fractures.<sup>3</sup> Study of the biometric characteristics ended in the assumption that the slain must have belonged to a stronger and taller race than the Thebans. Douglas E. Derry, responsible for the examination of the skeletal material, suggested that the dead could have been descended from marriages between foreign mercenaries and indigenous women from Upper Egypt.<sup>4</sup> He observed that: the wounds on four of the men showed evidence of healing, and thus predated death (nos. 14, 26, 53 and 74); 45 individuals had suffered from severe injuries, causing death, including 10 hit or killed by arrows; approximately 15 showed a combination of injuries of which the first was not necessarily lethal; 6 individuals had been scavenged by vultures, so must have lain exposed for some time after death; in many cases substantial quantities of sand was found on the bodies; all of the slain were wrapped

\* Revised paper given by the author at the 'Ständige Ägyptologenkonferenz' 2001 in Münster/Westphalia under the title: 'Anthropologische und militärhistorische Überlegungen zur Massenbestattung gefallener Soldaten in Deir el-Bahri'. After the congress, I had the opportunity to verify my conclusions at The Metropolitan Museum in New York where Winlock's original records and some of the finds are kept. I would like to thank the Director of the Department of Egyptian Art, Dorothea Arnold, for her invaluable encouragement and the permission to examine the material. Thanks are also due to Ariane Kemkes-Grottenthaler, Hubert Sudhues and Mary Goßen.

<sup>1</sup> H. E. Winlock, *The Slain Soldiers of Neb-hepet-Re-Mentu-Hotpe* (PMMA 16; New York, 1945); H. E. Winlock, *Excavations at Deir el Bahri 1911-1931* (New York, 1942), 122-7.

<sup>2</sup> Winlock, *Slain Soldiers*, 1-2, 23-30.

<sup>3</sup> For the individual injuries, see Winlock, *Slain Soldiers*, 7-24.

<sup>4</sup> In Winlock, *Slain Soldiers*, 8.

in linen bandages without mummification; and in some cases the bandaging had been done at the most unsuitable moment, during rigor mortis.<sup>5</sup>

The individuals were fitted out with military equipment—for example, several wrist guards were found, one of which was still tied around the wrist of its owner.<sup>6</sup> This suggested that the owners were archers who sought to protect their arms from the rebounding string while drawing the bow. From this, it was concluded that the remains obviously belonged to a military man killed in combat. The discovery of two wooden coffins, painted yellow on the outside but otherwise undecorated, suggested that two of the soldiers may have been of a higher rank.<sup>7</sup>

#### *The course of events according to Winlock*

Winlock, leader of the excavation team, was convinced that the injuries could only have been caused by an attack on a fortress because of the angle of impact of the (head-)injuries. This suggested that the arrows had been shot from high above by archers standing on ramparts, as depicted in well-known scenes from wall paintings (fig. 1).<sup>8</sup> Other wounds resulted from attacks while scaling ladders and undermining the rampart's base. Different traumata in or near the skull were explained by combustibles thrown down from higher ground and are another indicator for an attack on a fortress. According to Winlock, the final, mortal wounds to the fifteen soldiers showing a combination of injuries, of which the first had not led to death but was sufficiently severe to prevent continuing in battle, could only be explained by hand-to-hand fighting in close combat. Thus, after repulsing their enemy, the defenders had emerged from their fortress to examine the dead and to club to death any assailant still alive.<sup>9</sup>

Winlock, convinced that the discovery could be connected to a specific historical event, regarded the dead as former soldiers of the victorious Theban army, who had been killed in the storming of Herakleopolis.<sup>10</sup> This theory has found broad acceptance since then, whether in its original form or

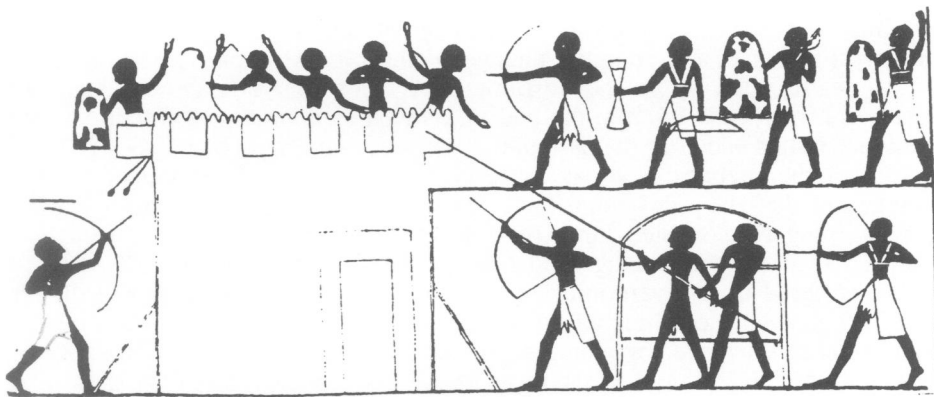


FIG. 1. Assault on a fortress. Tomb of Amenemhet, Beni Hasan no. 2 (from Newberry, *Beni Hasan I*, pl. xiv).

<sup>5</sup> In Winlock, *Slain Soldiers*, 19, 21.

<sup>6</sup> MMA acc. no. 27.3.135.

<sup>7</sup> According to Winlock (MMA Theban Expedition Tomb Card 1623) the two coffins measured 39 and 42 cm wide and were made of sycamore wood. In Winlock, *Slain Soldiers* 22–3 the material is omitted.

<sup>8</sup> I.e. the tomb of Amenemhet, Beni Hasan no. 2: P. E. Newberry, *Beni Hasan*, I (ASE 1; London, 1893), pl. xiv.

<sup>9</sup> Winlock, *Slain Soldiers*, 15–16.

<sup>10</sup> H. E. Winlock, 'The Egyptian Expedition, 1925–1927', *BMA Section II* (February 1928), 3–58, esp. 11–16; Winlock, *Slain Soldiers*.

slightly modified,<sup>11</sup> one reason for this being the attractiveness of Winlock's data. Who would be awarded such an honourable burial site in close proximity to their king's tomb if not the heroes of Herakleopolis, who had died in the fight for the unification of Egypt? The recent article by Sydney Aufrère serves as the most current example for the uncompromising acceptance of Winlock's interpretation.<sup>12</sup> Aufrère assigns the mortal remains of the slain soldiers to three tombs (MMA 101, 506 and 507), although only the last contained the buried soldiers in question. He follows Winlock's arguments with regard to their last place of active service and identifies the arrowheads remaining in the bodies as typical Egyptian shapes from the period of Mentuhotep II, similar to parallel finds from Mentuhotep's own funerary complex.<sup>13</sup> In his opinion, therefore, a battle with foreign warriors is out of the question, and Winlock's dating is supported at the same time.

Hans Wolfgang Müller in his publication on Ahmose's wrist guard<sup>14</sup> deviates from the 'standard' interpretation: 'Gegen diese Annahme H. E. Winlock's wäre auch zu erwägen, ob diese Krieger nicht einer "Eliteeinheit" der geschlagenen Herakleopoliten angehört haben könnten. Denn in den Pyramidenanlagen König Teti's und Pepi's I. der 6. Dynastie in Saqqara wurden Kalksteinfliguren von gefesselten (bezwungenen) Feinden Ägyptens beigesetzt. Die Bestattung der im Kampf Gefallenen in Deir el-Bahari könnte auch als ein Zeichen des Triumphs des Reichseinigers interpretiert werden. Die Aufsichtung der Toten in einem Massengrab ist nach ägyptischen Jenseitsvorstellungen nicht sehr "ehrentvoll"'.<sup>15</sup>

Therefore, a number of questions deserve reconsideration. Is tomb MMA 507 indeed an 'honourable' tomb? On which facts is the actual dating of the complex based and do these allow it to be assigned to the reign of Mentuhotep II? And why must the soldiers have died in a siege?

#### *The assessment of Winlock's findings*

Winlock's main contention was that the acute angle of the arrows remaining in the slain could only be explained by archers shooting down from a rampart. However, the angle of incidence depends on many factors, including the targeting angle and the position of the target in relation to the shot. In addition, the law of ballistics applies.<sup>15</sup> The arrows, which entered their targets at a steep angle, could also have been shot by archers who, in trying to shoot far over the point-blank zone, aimed their weapons upward to an angle of 45°. Such an arrow would hit the target near the maximum range at a steep angle, resulting from the decreasing driving force and the increasing gravitational force. This shooting technique is the common method for a unit of archers acting in formation. Thus, a steep angle into the target can more easily be explained by troops acting on an open battlefield in order to avoid injuring a fellow soldier.<sup>16</sup> Scenes showing the 45° angle of the arrow in normal ground battles can be found in the Hypostyle Hall at Karnak dated to Seti I (fig. 2).

<sup>11</sup> G. Steindorff and W. Wolff, *Die thebanische Gräberwelt* (LÄS 4; Glückstadt and Hamburg, 1936), 26; P. H. Schulze, *Der Sturz des göttlichen Falken* (Herrsching, 1983, 1986), 163; S. Donadoni, *Heilige Stadt der Pharaonen* (Munich, 2000), 125; G. M. Sanchez, 'A Neurosurgeon's View of the Battle Reliefs of King Sety I: Aspects of Neurological Importance', *JARCE* 37 (2000), 162, 164.

<sup>12</sup> 'Les vétérans de Montouhotep Nebhépetrè. Une garnison funéraire à Deir al-Bahari?', *Égypte Afrique et Orient* 19 (2000), 8–16.

<sup>13</sup> Aufrère, *Égypte Afrique et Orient* 19, 11, with reference to Di. Arnold, *Der Tempel des Königs Mentuhotep in Deir el-Bahari, III: Die königlichen Beigaben* (AV 23; Mainz, 1981), 47–8.

<sup>14</sup> *Der 'Armreif' des Königs Ahmose und der Handgelenkschutz des Bogenschützen im alten Ägypten und Vorderasien* (SDAIK 25; Mainz, 1989), 16–17, Anm. 25a, Taf. 5a–d.

<sup>15</sup> For information on the ballistics and the wounding potential of different arrows, see P. H. Blyth, 'Ballistic Properties in Ancient Egyptian Arrows', *Journal of the Society of Archer-Antiquaries* 23 (1980) 34–9 = <http://www.student.utwente.nl/campus/sagi/artikel/egyptian/egyptian.html>; B. Karger et al., 'Experimental Arrow Wounds: Ballistics and Traumatology', *Journal of Trauma* 45/3 (September 1998), 495–501; Sanchez, *JARCE* 37, 143–65.

<sup>16</sup> In an extreme variant of this shooting technique—the so-called 'mortar-shot'—the archer aims his arrow at an angle close to 90° which will bring the arrow back to earth at a nearly vertical angle. Such arrows can easily penetrate unarmoured targets.

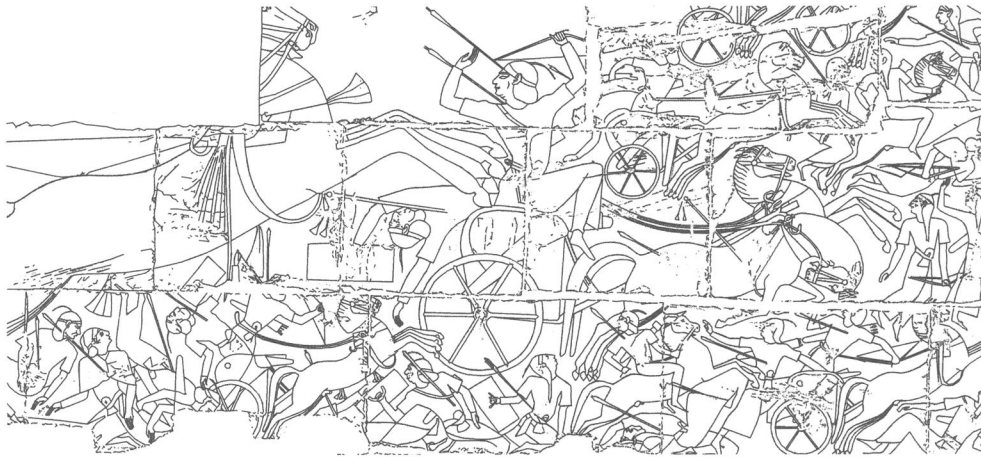


FIG. 2. King Seti I attacking the Hittites (from *The Epigraphic Survey*, Oriental Institute of the University of Chicago, *Reliefs and Inscriptions at Karnak, IV. The Battle Reliefs of King Sety I* (Chicago, 1986), pl. 34).

Winlock viewed the position of the tomb in close proximity to the mortuary temple of Mentuhotep as an important factor in its dating. However, the most recent investigations by Dorothea Arnold and James Allen, re-dating the tomb of Meketre (TT 280) to the early years of Amenemhet I, have also led to new approaches in the dating of MMA 507 and adjacent tombs.<sup>17</sup> Allen pointed out that Winlock's assumption that Khety's tomb must have been built after tomb 507 is not convincing.<sup>18</sup> The affiliation of a mud-brick staircase, which points at tomb 507 in its axis and which is intersected by the forecourt of Khety's tomb (MMA 508), remains unproven and is not a suitable argument for dating without further excavation (fig. 3).<sup>19</sup> Arnold's theories have gained supporters, and the opponents of her proposed dating have not been able to offer better alternatives.<sup>20</sup>

From a palaeographic viewpoint, there is little in favour of a classification of the burial complex to the reign of Mentuhotep.<sup>21</sup> The private names, written in hieratic on the linen

<sup>17</sup> Do. Arnold, 'Amenemhat I and the Early Twelfth Dynasty at Thebes', *MMJ* 26 (1991), 5–48; J. P. Allen, 'Some Theban Officials of the Early Middle Kingdom', in P. der Manuelian (ed.), *Studies in Honor of William Kelly Simpson* (Boston, 1996), I, 1–26.

<sup>18</sup> Allen, in Manuelian (ed.), *Studies in Honor of William Kelly Simpson* I, 21.

<sup>19</sup> Even Winlock (*Slain Soldiers*, 3) admitted that the staircase could have belonged to Khety's tomb, built to provide easier access during construction.

<sup>20</sup> See the arguments by W. Grajetzki, *Die höchsten Beamten der ägyptischen Zentralverwaltung zur Zeit des Mittleren Reiches. Prosopographie, Titel und Titelseiten* (Berlin, 2000), 241–3.

<sup>21</sup> A detailed study on the palaeography of the inkmarks by Dorothea Arnold is in preparation. Personal communication from her 11/05/2001: B. Bryan, in P. Dorman (ed.), *Theban Studies I*, forthcoming. In his review of W. K. Simpson, *Personnel Accounts of the Early Twelfth Dynasty: Papyrus Reisner IV. Transcription and Commentary. With Indices to Papyrus Reisner IV, Sections F and G Prepared by Peter der Manuelian* (Boston, 1986), Detlef Franke (*BiOr* 45 (1988), 98–102, esp. 102), pointed out that the slain soldiers' inkmarks could even go back to the reign of Senwosret I: 'W. K. Simpson bespricht in pR II, S. 46, das merkwürdige Zeichen der "pitch-fork series" (Group 21), das bei einigen Materialien und Personennamen hinzugefügt ist. Meines Erachtens gleicht es sehr dem häufigen Zeichen auf den Mumienbinden, in die Winlocks "slain Soldiers" eingewickelt waren. Dies Zeichen ist also nicht nur für die Zeit Mentuhotep Neb-hepet-Re's typisch, sondern auch später benutzt worden. Sind vielleicht auch die "slain Soldiers" gar nicht in der Zeit dieses Königs, sondern in der Zeit Sesostris I. gefallen und begraben, worauf ja immerhin auch einige der Personennamen hinzudeuten scheinen?' I would like to thank Joachim Quack for bringing this reference to my attention.

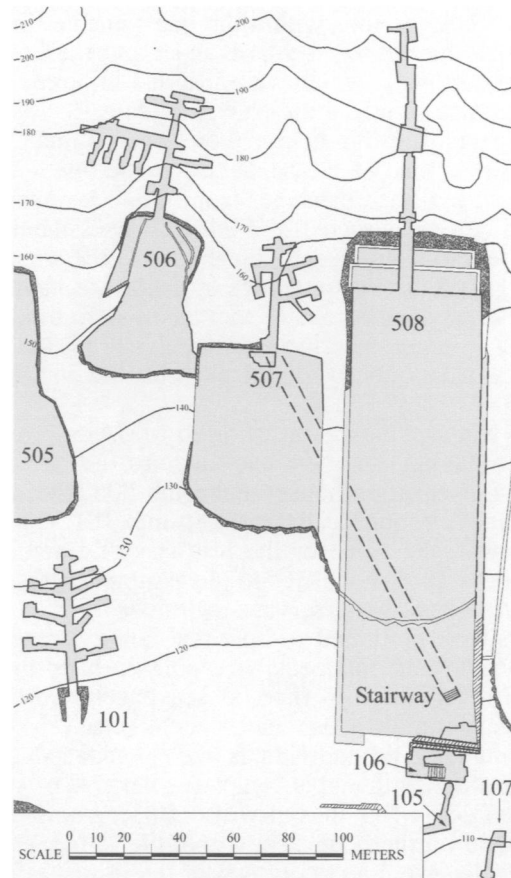


FIG. 3. MMA 507 and neighbouring tombs. Position of the stairway as assumed and marked by Winlock, leading from Kheti's courtyard to the entrance of MMA 507. (Winlock, *Slain Soldiers*, pl. i).

bandages, which the excavators assumed were not those of the slain,<sup>22</sup> could support a date in the early Twelfth Dynasty, since they are partly modelled on the birth names of Amenemhet I and Senwosret I: *Štp-ib*, *Hpr-k3* and *S-n-Wsr.t*.<sup>23</sup> Others mention gods common in the Twelfth and Thirteenth Dynasties: *Imni* and *Sbk*.<sup>24</sup>

Neither a study of the arrowheads from the mortuary temple of Mentuhotep discussed by Aufrère nor a typological investigation of the wrist guards<sup>25</sup> discovered in the tomb yields an indisputable date for the complex.<sup>26</sup> Both groups of finds consist of shapes that hardly allow a

<sup>22</sup> Winlock, *Slain Soldiers*, 25.

<sup>23</sup> Winlock, *Slain Soldiers*, 28–32.

<sup>24</sup> Winlock, *Slain Soldiers*, 28–32.

<sup>25</sup> MMA acc. nos. 27.3.135–7 and Cairo JE 51874. Five wrist guards from tomb MMA 507 are mentioned several times, e.g. in Müller, *Der 'Armreif' des Königs Ahmose*, 16; in fact, only the four examples were found.

<sup>26</sup> Dorothea Arnold favours a re-dating of the complex into the reign of Sesostri I based upon her palaeographic research on the linen marks and typological considerations regarding the wrist guards. Her results, given as two papers in Baltimore (Annual symposium on the archaeology and art history of Thebes, organized by the Oriental Institute, the University of Chicago, and Johns Hopkins University, 16 September 2000) and New York (Egyptological Seminar, 1 December 2000) will be published shortly.

differentiation into 'early' or 'late' periods within the questionable time span of a few decades.<sup>27</sup> Too few clearly dated parallels for the wrist guards exist and the arrows taken into the battle—sharpened points made out of hardwood which were inserted into reed shafts—are chronologically indistinct, since this type was also in use in the New Kingdom.<sup>28</sup>

The bioanthropological data offer no help either. The estimate of 60 individuals by the excavators is questionable, since none of the bandages on the bones were found intact. In every instance, tomb robbers had slit the linen bandages from the face down to the knees.<sup>29</sup> Thus, only ten complete skeletons could be reconstructed.<sup>30</sup> Winlock's assessment was based on the presence of 59 skulls and 52 right femurs, but due to the high degree of destruction, the number of individuals could be even higher.<sup>31</sup> The average age of death was estimated to be between 30 and 40 years based on the extent of tooth abrasion.<sup>32</sup> From the modern biological anthropological point of view, dependence on a single criterion for establishing age would be insufficient.<sup>33</sup> Determination of the sex was made only by simple examination and led to the conclusion that all the dead were male.<sup>34</sup>

The question remains of whether the layout of tomb MMA 507, especially its gallery-shape, can offer assistance with the dating. The best parallels are the two adjacent tombs: tomb 101, situated in front of the Polish excavation house, and tomb 506, the western neighbour of 507.<sup>35</sup> MMA 506 was found completely robbed. Contents of tomb 101 also fail to offer elucidation: a linen cloth discovered in it with the name of the priestess of Hathor and wife of Mentuhotep, Neferu, who was buried in tomb TT 319, has led to the assumption that tomb 101 could have been a collective grave for relatives of the royal servants of this lady.<sup>36</sup>

It is clear that the soldiers were not killed without resistance. Isolated fractures in the forearms indicate that they tried to parry their opponents' weapons in hand-to-hand combat. In addition, they must have lain exposed for a period of time, as scavengers fed on them and tore their flesh and muscles. However, its duration must have been relatively short, as anthropological investigations have shown that several individuals were bandaged during rigor mortis. Rigor mortis begins about one hour after death and is complete after five or six hours. It disappears after approximately two days when decay sets in, but will disappear more quickly in a warm climate. Furthermore, the traces of sand on the bodies show that the slain were only scantily cleaned, no mummification of the corpses occurred and only two of the dead were buried in coffins.

<sup>27</sup> A tendency towards the reign of Senwosret I can be seen among the few surviving wrist guards. A detailed typological discussion by Dorothea Arnold is in preparation, and thus a short listing of the possible parallels is sufficient:

1) The wrist guard of an archer made out of leather from tomb 812, found in a linen bag which contained different utensils. MMA acc. no. 31.3.47B. Winlock, MMA Theban Expedition Tomb Card 2452.

2) A leather wrist guard bought in Luxor, accompanied by two shells bearing the name of Sesostris I. One of these still shows the imprint of the leather lacing that originally lay on it. MMA acc. no. 23.2.76B. H. E. Winlock, 'Pearl Shells of Se'n-Wosret I', *Studies Presented to F. Ll. Griffith* (London, 1932), 388–92; K. Butterweck-Abdelrahim, *Untersuchungen zur Ehrung verdienter Beamter* (Aegyptiaca Monasteriensia 3; Aachen, 2002), 50–2.

<sup>28</sup> Winlock, *Slain Soldiers*, pl. v.b. In the tomb of Tutankhamun, where more than three hundred arrows were found, this type is also documented: W. E. McLeod, *The Self Bows and other Archery Tackle from the Tomb of Tut'ankhamun* (Tut'ankhamun's Tomb Series 4; Oxford, 1982).

<sup>29</sup> Winlock, *Slain Soldiers*, 23.

<sup>30</sup> Nos. 2, 4, 6, 9, 10, 14, 18, 25, 28 and 29.

<sup>31</sup> Winlock, *Slain Soldiers*, 7.

<sup>32</sup> Winlock, *Slain Soldiers*, 8–9.

<sup>33</sup> The skeletons were reburied at their original location (I have to thank Dorothea Arnold for this information). An anthropological re-examination would be very useful.

<sup>34</sup> Winlock, *Slain Soldiers*, 7.

<sup>35</sup> See Winlock, *Slain Soldiers*, pl. ii.

<sup>36</sup> Winlock, *Slain Soldiers*, 4. The disarray here could have also been caused by tomb robbers.

This raises several questions, in particular, whether the sand came from ritual purifications before the funeral or from the battlefield itself. But why was the sand not removed from the corpses more carefully before they were wrapped in linen bandages? Winlock described the granulation of the sand as characteristic of that found at the entrances of the desert valleys,<sup>37</sup> and he postulated that the slain were covered with sand where they had died, in order to start the process of dehydration. However, a discrepancy between the statements in his publication and in the original record kept in The Metropolitan Museum in New York is shown by the following partly crossed out, yet easily legible, passage in the latter:

... Such sand is not found in the flood plain of the Nile, but is common along the desert edge at the mouth of ~~extinct~~ torrents — ~~an extensive deposit existing, for example, along the borders of the Theban Necropolis, about 1.000 meters away from this tomb.~~ In such places the sand usually contains a quantity of small pebbles, while that associated with the bodies contained few, if any, grains more than 2 mm. in diameter...<sup>38</sup>

Why was this statement crossed out in red ink and never mentioned later? Because it stood in the way of the conclusion that the remains originated from a battlefield at Herakleopolis?

From the evidence, therefore, it is difficult to conclude with certainty where and when the soldiers of Deir el-Bahri met their deaths. However, it is unlikely that they died in the storming of Herakleopolis, if this historical event ever took place at all. It is also difficult to understand why anyone would take on the burden of transporting 60 or more dead soldiers over a distance of several hundred kilometres only to bury them in a mass grave. Apart from honourable proximity to a royal tomb—and this only if one continues to base the dating in question on the reign of Mentuhotep—this kind of eternal resting place possesses little respectability.<sup>39</sup> All signs speak rather of the hasty clearing of a battlefield, a scanty cleaning and preparation of the dead and a swift search for a suitable burial place. The decision to use tomb MMA 507 as a final resting place would have been based on its availability rather than on its location. The grave may have been laid out during the reign of Mentuhotep, but not been used by its actual owner. This seems to have been the case with tomb MMA 505 (TT 310). Situated not far from tomb 507 but never used, it is assumed to have been originally planned for Meketre before he ordered a new tomb, TT 280, to be built close to the unfinished royal mortuary temple.<sup>40</sup> In view of the current availability of evidence, why should conflict a considerable distance away be more acceptable than one occurring locally, probably in the reign of either Amenemhet I or Senwosret I? Numerous hints of armed conflict can be found in the early Twelfth Dynasty, but picking out one specific event and associating it with MMA 507 would mean replacing one weak hypothesis with another.

CAROLA VOGEL

<sup>37</sup> Winlock, *Slain Soldiers*, 21.

<sup>38</sup> With reference to *MMA Theban Expedition*, VI. XI Dynasty, *Anatomical Material*, 63.

<sup>39</sup> Even if one agrees with the argument that Mentuhotep II's mortuary temple had become a 'sacred area' within a short period of time, the question as to why no offerings could be found at a supposed 'honourable tomb' remains unanswered. Although the tomb had been robbed, neither Winlock's publication nor the original records in The Metropolitan Museum gives any references to offerings. In particular, the entire absence of funerary pottery is worthy of note. A re-investigation could perhaps provide valuable information.

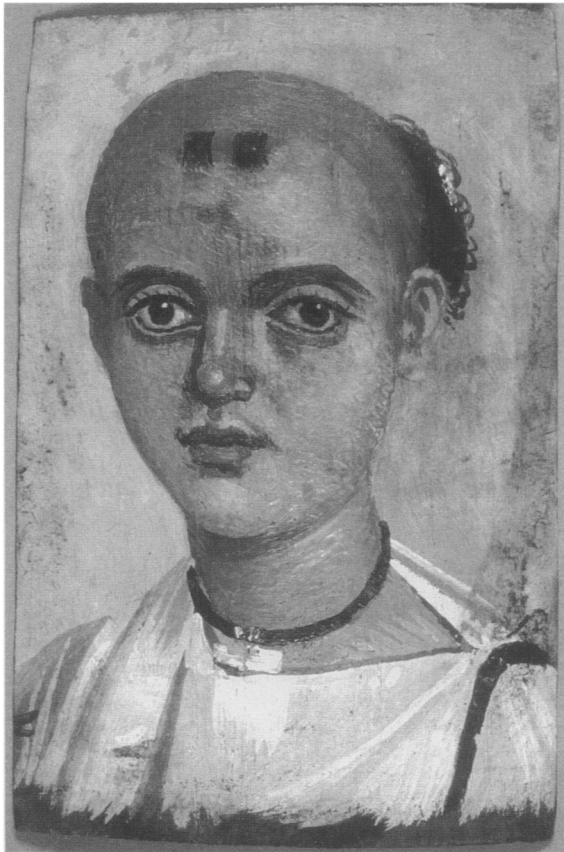
<sup>40</sup> See Allen, in Manuelian (ed.), *Studies in Honor of William Kelly Simpson I*, 25.





1. The tombs on the hillside above the mortuary temple of Mentuhotep II in Deir el-Bahri. The entrance of the tomb of the slain soldiers is somewhat lower than the others (copyright Carola Vogel).

FALLEN HEROES?—WINLOCK'S 'SLAIN SOLDIERS' (pp. 239–45)



2. Mummy portrait, AD 150–200 (Collection: Courtesy The J. Paul Getty Museum, 78.AP.262).

BARBERING THE BEARDLESS (pp. 247–51)

### Nochmals zum Gebrauch des Titels *dw3t-ntr* in der Spätzeit

The author rejects the proposal of A. Dodson in *JEA* 88 (2002), 179–86, to see the Late Period title *dw3t-ntr* as a designation of the adopted heiress as the future God's Wife in office.

AIDAN Dodson versuchte in *JEA* 88 (2002), 179–86 glaubhaft zu machen, der Titel *dw3t-ntr* könne unter bestimmten Umständen dazu gedient haben, die adoptierte 'Erbin' einer Gottesgemahlin als solche zu kennzeichnen. Im wesentlichen hängt die Plausibilität des Vorschlages von der Interpretation der Darstellung auf zwei Denkmälern ab: a) dem Türsturz Kairo JE 29251B<sup>1</sup> und b) dem Türsturz am Ende der Eingangstreppe von TT 279.

Auf a) sind in den symmetrischen Mittelbildern rechts Nitokris (I) (*hmt-ntr*) und links Amenirdis (II)<sup>2</sup> (*drt-ntr*) mit Maat vor Amun und je einer weiteren Gottheit dargestellt. Jeweils außen sehen wir eine (Gottesverehrerin) Schepenupet,<sup>3</sup> beidesmal gefolgt von Nitokris' Obervermögenverwalter Padihorresnet aus der Zeit Nechos II. Dodson nimmt an, es sei doch merkwürdig, wenn Padihorresnet nicht hinter seiner Herrin dargestellt sei, sondern hinter der längst verstorbenen Schepenupet II, und das noch zweimal und ohne ihre Filiation. Er sieht daher in dieser Schepenupet eine weitere einmal als Gottesgemahlin vorgesehene und adoptierte Prinzessin \*'Schepenupet IV'.

Das ist keineswegs zwingend. Daß die Filiation außen fehlt, dürfte an Platzmangel liegen; die äußeren Szenen sind nämlich schmaler als die mittleren. Gegen die zweimalige Darstellung von Schepenupet II bestehen überhaupt keine Einwände, wenn wir als Grund dafür annehmen, es sei Wert darauf gelegt worden, sie als die Adoptivmutter sowohl von Amenirdis II als auch Nitokris I zu zeigen. Padihorresnet als nicht-königliche Person konnte, wenn die Adoptivmutter dargestellt werden sollte, gar nicht anders als ganz außen abgebildet werden, ohne Rücksicht darauf, daß er ihr gar nicht gedient hatte.<sup>4</sup>

Auf b) ist eine andere Darstellung zu sehen. Das zentrale Motiv 'Schu erhebt die Sonnenbarke'<sup>5</sup> ist flankiert von der Darstellung je einer Gottesgemahlin: Links *dw3t-ntr* Nitokris, *z3t hmt-ntr* Schepenupet, rechts *dw3t-ntr* Schepenupet *z3t drt-ntr* Amenirdis. Auf beiden Seiten ganz außen ist wieder jeweils ein Obervermögenverwalter dargestellt, dieses Mal der Grabherr Pabasa. Die verschiedenen Interpretationsmöglichkeiten werden von Dodson diskutiert. Links könnte Nitokris, Tochter von Schepenupet II gemeint sein, rechts Schepenupet II, Tochter von Amenirdis I (oder Nitokris unter ihrem Alternativnamen Schepenupet (III), Tochter von Amenirdis II). Die Kombination mit Schepenupet II rechts möchte Dodson ausschließen, wieder mit dem Argument, Schepenupet II sei bei Anlage des Grabes schon viel zu lange tot gewesen. Dieses Mal scheint dies am Platz. Dodson hätte für die erstgenannte Interpretation auch anführen können, daß Pabasa auf beiden Seiten als *b3k m3c nj st-jb=s* 'Ihr wahrer Lieblingsdiener' bezeichnet ist. Er ist also zweimal hinter Nitokris dargestellt, nur daß diese einmal als Schepenupet III bezeichnet ist. Allein auf dieser rechten Seite ist der Haupttitel des Pabasa *jmj-r<sup>c</sup> pr.w wr* mit Bezug auf seine Herrin *dw3t-ntr (njt-jqrtj)* aufgeführt, was man als Klarstellung zum Gebrauch des sonst nur auf der Adoptionsstele genannten 'Loyalitätsnamens' 'Schepenupet III' sehen könnte. Fall b) ist eine Parallele zu a): Auf a) erscheint Schepenupet II zweimal als Mutter zweier Gottesgemahlinen, auf b) Nitokris zweimal mit ihren beiden Adoptivmüttern.

<sup>1</sup> Irrtümlicherweise als JE 29254B bezeichnet.

<sup>2</sup> Der Name des Vaters ist ausgehackt, aber mit Dodson ist Amenirdis II die wahrscheinlichere Kandidatin.

<sup>3</sup> Rechts nur Spuren des...*wpt* in Kartusche, Titel zerstört, links *dw3t-ntr* Schepenupet. Übrigens ist nach Ingrid De Strooper, *De Bouwactiviteit van de Godsgemalinnen van Amon van de 25e en 26e Dynastie* (unpublizierte Doktorarbeit Gent 1997), 152, Anm.142 inzwischen in Kairo das fehlende rechte Eckstück hinzugefügt worden. Sie sagt aber nichts weiter über die Inschriftreste.

<sup>4</sup> So schon De Strooper (Anm.3).

<sup>5</sup> Siehe dazu D. Eigner, *Die monumentalen Grabbauten der Spätzeit in der Thebanischen Nekropole* (UKÖAW 8, Wien 1984), 114 mit Hinweis auf die Parallele aus dem Grab des Petamenophis TT 33. Die Oberfläche des heute in Medinet Habu liegenden Granitblocks ist stark zerstört, aber es handelt sich um das gleiche Motiv.

Mir scheint also mithilfe dieser Türsturz-Bilder nicht wahrscheinlich gemacht zu werden können, *dw3t-ntr* kennzeichne die zukünftige Gottesgemahlin 'im Wartestand'. Zu Zeiten des Pabasa war Nitokris längst etablierte Gottesgemahlin. In seinem Grab wechseln die beiden Haupttitel *hmt-ntr* und *dw3t-ntr* laufend und unregelmäßig wie bei allen anderen Funktionären ihrer Institution auch.

ERHART GRAEFE

### **Barbering the beardless: a possible explanation for the tufted hairstyle depicted in the 'Fayum' portrait of a young boy (J. P. Getty 78.AP.262)**

The article is an exploration of the significance of certain hairstyles found in Fayum mummy portraits, particularly amongst young males. Connections to continuing folk traditions are also made, especially with regard to issues concerning health and healing.

A wealth of books and articles has been written about different aspects of the so-called Fayum mummy portraits since W. M. F. Petrie's discovery and publication of a finely painted group of portraits from the Graeco-Roman necropolis at Hawara in the 1880s. The literature has addressed diverse questions regarding these portraits: artists' styles, techniques of painting, their geographical spread, dating criteria, the issue of portraiture, their role in funerary and domestic cults, and their use in interpreting the material culture of the time.<sup>1</sup> This brief article suggests a possible new interpretation for an unique hairstyle that is featured in a portrait of a young boy, now in the J. P. Getty Museum in Malibu (78.AP.262; pl. XXII, 2).

Fayum portraits are painted on wooden (frequently sycamore wood, as well as imported lime wood) panels measuring about 30 × 15 cm, using encaustic painting techniques: hot wax colours were fused together and fixed to the panel by being further exposed to heat. These portrait panels were placed over the head and face of wrapped mummies, and kept in place by resin and additional bandages lashed around their edges. These portraits first appear in the mid-first century AD, and continued to be used until the third century AD.<sup>2</sup> These images, to some extent, combined the function of pharaonic Egyptian cartonnage masks, in that they identified and protected the deceased, and the role of Roman funerary/commemorative portraits.<sup>3</sup> Although the portraits are called 'Fayum portraits', after their initial find spot, they have been found throughout Egypt. All genders and ages are represented by the portraits, although the majority of the depictions are of men.

Although this is a matter of debate amongst specialists, some scholars believe that the Fayum portraits were painted during the course of the person's lifetime, and kept at home until the person's death, when they were used as part of the funerary equipment.<sup>4</sup> Studies show that

<sup>1</sup> For an overview of the literature on the subject, see C. Riggs, 'Facing the Dead: Recent Research on the Funerary Art of Ptolemaic and Roman Egypt', *AJA* 116/1 (2002), 85–101.

<sup>2</sup> S. Walker, 'A Note on the Dating of Mummy Portraits', in S. Walker (ed.), *Ancient Faces: Mummy Portraits from Roman Egypt* (New York, 2000), 36.

<sup>3</sup> There is some discussion as to whether these portraits are a Roman or an Egyptian feature. This author believes that this was an instance when Roman traditions meshed easily with local beliefs, with some reinterpretation of the role of the portrait. For more discussion on the subject, see B. Borg, 'The Dead as a Guest at Table? Continuity and Change in the Egyptian Cult of the Dead', in M. Bierbrier (ed.), *Portraits and Masks. Burial Customs in Roman Egypt* (London, 1997), 26–32; L. Corcoran, *Portrait Mummies from Roman Egypt* (Chicago, 1995), 74–5.

<sup>4</sup> This is discussed at some length by D. Montserrat, 'Death and Funerals in the Roman Fayum', in Bierbrier (ed.), *Portraits and Masks*, 33–44. Montserrat and Walker do not believe that these images were kept as domestic portraits, while Borg and Corcoran do. The author is grateful to D. Montserrat for his discussions and comments on this brief article.

frequently the mummy itself is of a much older individual than is depicted in the portrait.<sup>5</sup> These portraits were no doubt somewhat idealized, as portraits frequently tend to be.<sup>6</sup> It has been argued that portraits of children and adolescents are rarer because they had died prematurely, so their portrait panels would not have been prepared in advance. Clearly the portraits of children must belong to wealthy families with beloved children, as the portraits were not available to all economic classes.<sup>7</sup>

The portraits were presumably painted for wealthy<sup>8</sup> Greek and Roman<sup>9</sup> residents of Egypt who were followers of Egyptian religion, and especially involved with the Egyptian cults of Isis and Osiris, and the later cult of Serapis. These cults were quickly picked up by the Romans, and, to some extent, syncretized with the mystery religions.<sup>10</sup> The Romans who were members of these cults would also, no doubt, have acquired other Egyptian beliefs and habits in addition to mummification and the promise of rebirth and resurrection.

In addition to depicting the face of the deceased, the portraits also convey a host of other information: age, sex, religious affiliations, and social status.<sup>11</sup> The symbols used to express this information include hairstyles, ornaments, clothing, and objects held or worn by the deceased. Thus, certain hairdos show the viewer a style that is indicative of a specific time period, religious affiliation (e.g. the corkscrew curls associated with Serapis),<sup>12</sup> and class. Ornaments point to wealth, status, and association with a specific divinity (e.g. the star of Serapis).<sup>13</sup>

Portrait J. P. Getty Museum, Malibu 78.AP.262,<sup>14</sup> c. AD 150–200, shows a young boy whose head is shaved, save for a sidelock of youth or Horus lock on the right (and correct) side of his

<sup>5</sup> Corcoran, *Portrait Mummies*, 17; K. Parlasca, *Mumienporträts und verwandte Denkmäler* (Wiesbaden, 1966), 666.

<sup>6</sup> For discussions on issues of portraiture, see S. Walker, 'Mummy Portraits and Roman Portraiture', in S. Walker and M. Bierbrier (eds), *Ancient Faces* (London, 1997), 14–16; Corcoran, *Portrait Mummies*, 4–5; K. Gschwantler, 'Graeco-Roman Portraiture', in Walker (ed.), *Ancient Faces*, 14–22; D. Montserrat, 'The Representation of Young Males in "Fayum Portraits"', *JEA* 79 (1993), 215–25, especially 225, n. 58; B. Borg, *Mumienporträts: Chronologie und kultureller Kontext* (Mainz, 1996).

<sup>7</sup> It has been suggested that it might have been considered more important to honour children who died young with portraits, as the religio-magical literature of the period underlines the danger and magical potential held by the untimely dead (*ahoroi*), and stresses the need of special propitiation. However, were this the case, might one not expect many more portraits of children as the infant mortality rate remained high through this period? For a thorough discussion of the vengefulness of the *ahoroi*, see S. I. Johnston, *Restless Dead: Encounters between the Living and the Dead in Ancient Greece* (Berkeley, CA, 1999).

<sup>8</sup> The cost of mummification, a painted portrait, and elaborate burials would be considerable, so it is unlikely that poorer sections of society owned such portraits. Furthermore, the majority of the portraits made for women show them with elaborate jewellery, clearly indicative of wealth.

<sup>9</sup> For a discussion of the population of Roman Egypt, see R. Bagnall, 'The People of the Roman Fayum', in Bierbrier (ed.), *Portraits and Masks*, 7–15, with an especially useful bibliography.

<sup>10</sup> Initially, Isis and Osiris, to a degree, became associated with Demeter, Persephone, and Bacchus, before becoming independent Romanized cults. There is some debate about the degree of cultic involvement of the portrait owners; for discussions on the subject, see Corcoran, *Portrait Mummies*, and Borg, *Mumienporträts*.

<sup>11</sup> For more information concerning the symbolism used in Fayum portraits, see Corcoran, *Portrait Mummies*, 65–73; Montserrat, *JEA* 79, 215–25; Borg, *Mumienporträts*; and especially, B. Borg, "Der zierlichste Anblick der Welt"...*Ägyptische Porträtmumien* (Mainz, 1998).

<sup>12</sup> Parlasca, *Mumienporträts*, 87–8.

<sup>13</sup> Parlasca, *Mumienporträts*, 87–8, and H. R. Goette, 'Kaiserzeitliche Bildnisse von Serapis-Priestern', *MDAIK* 45 (1989), 173–86. However, it should be noted that Goette misinterprets the clothing of the priests: they are actually wearing Greek mantles, not togas, as they were not Roman citizens.

<sup>14</sup> Its supposed provenance is Oxyrhynchus. H: 20.3 cm, W: 13 cm. D. Thompson, *Mummy Portraits in the J. Paul Getty Museum* (Malibu, 1982), 40–1, 65 no. 5; Walker and Bierbrier, *Ancient Faces*, 113–14, no. 109; Walker, *Ancient Faces*, 99–100 no. 61; K. Parlasca *Repertorio d'arte dell'Egitto greco-romano B, Ritratti di mummie*, II (Palermo, 1977), 67, no. 674; E. Doxiadis, *The Mysterious Fayum Portraits: Faces from Ancient Egypt* (London, 1995), 37, 224 no. 7; Borg, *Mumienporträts*, 107, 114, 119, pl. 19.2; Borg, "Der zierlichste Anblick", 68–9, fig. 81.

head, and two tufts of hair above his forehead. The sidelock is ornamented with a gold and garnet pin. His dark eyes are lined with *kohl*. Around his neck, on a black (leather?) thong, he wears a gold amulet case, studded with garnets to match the pin. He is dressed in a creamy tunic with a narrow purple *clavus*, and wears a mantle over his left shoulder that is 'decorated with a horizontal H-motif. On the neck beside the mantle is a pinkish white undergarment with a brown border, the latter carried along the edge of the tunic'.<sup>15</sup> His face has been described as having 'huge eyes of irregular form [with] shadows beneath them, with the pallor of the skin suggesting mortal illness'.<sup>16</sup>

The Malibu boy's hairstyle is unique in that his head is shaved,<sup>17</sup> and he has two other tufts of hair above his forehead. Only one other boy's portrait shows similar tufts above the forehead, British Museum EA 6715, which has four tufts above the brow and a more traditional hairstyle starting further back on the scalp.<sup>18</sup> A marble bust of a child also sports a similar hairstyle.<sup>19</sup> Most other portraits of children show the boy or girl with short to longish hair and a length of longer hair, tied in some way, on the right side of the head.<sup>20</sup> In the Roman Period, this sidelock, or Horus lock, associated with the pharaonic Egyptian sidelock of youth which was generally indicative of a boy's age status, was worn by both boys and girls dedicated to the Isis cult.<sup>21</sup> Hair offerings are a well attested cultic practice/offering known from several Greek mystery religions, and hair is often used to express religious affiliations, beliefs, and states of mind.<sup>22</sup> The shearing of hair can also be part of a rite of passage.<sup>23</sup>

The only explanation so far offered for the Malibu boy's unusual hairstyle is his affiliation with the Isis cult. However, there is another possible explanation for his shaved head and the tufts of hair that are not a part of the standard Horus lock hairstyle of the Isis cult. Perhaps these tufts of hair are survivals of a pharaonic Egyptian ritual that still manifests itself in modern Egypt. In *The Fellahin of Upper Egypt*, written in the earlier twentieth century, W. S. Blackman describes different customs that result in a tufted hairstyle similar to that worn by 78.AP.262. In several parts of Egypt, most especially in the Fayum and in and around Middle Egypt, young boys who were unwell would be taken to the shrines of Muslim or/and Coptic sheikhs (holy men or saints), and dedicated to the sheikh. Their hair was shaved off, save for a few tufts. If the child was cured, the tufts would be shaved off at the shrine amidst a celebration, and the hair buried in the side of the shrine, beside it, loose, or enclosed in a clay ball. Sometimes the boys were dedicated to sheikhs just to keep them safe and from ill-health, and after achieving an age deemed 'safe' (presumably safe from the many diseases that claimed young children), the hair was shaved off at the shrine(s) of the sheikh(s) who had kept the child healthy and alive. Another custom which resulted in this tufted hairstyle was when a son-less woman prays to a sheikh for a son and gave birth to one, the son was dedicated to that sheikh, and his hair cut in this manner and dedicated

<sup>15</sup> Walker and Bierbrier, *Ancient Faces*, 114.

<sup>16</sup> Walker and Bierbrier, *Ancient Faces*, 114.

<sup>17</sup> Thompson, *Mummy Portraits*, 40.

<sup>18</sup> This is a full-length portrait of a boy in tempera on a linen shroud, AD 230–50: Walker, *Ancient Faces*, 117–18, no. 75.

<sup>19</sup> This was mentioned to the author by D. Montserrat, but has not been seen by the author herself.

<sup>20</sup> Borg, *Mumienporträts*, 114.

<sup>21</sup> Borg, "Der zierlichste Anblick", 68–9; Borg, *Mumienporträts*, 114, 119; H. R. Goette, 'Römische Kinderbildnisse mit Jugend-locken', *Athenische Mittheilung* 104 (1989), 203–17. Goette not only concludes that the sidelocks have Isiac affiliations, but goes on to state that they represent the parents' desire to protect and care for the child.

<sup>22</sup> E. R. Leach, 'Magical Hair', *Journal of the Royal Anthropological Institute* 88/2 (1858), 147–64; Borg, *Mumienporträts*, 113 ff.

<sup>23</sup> Discussed in Borg, *Mumienporträts*, 113 ff. D. Montserrat has discussed hair cutting as part of the *mallokoouria* ritual, the ceremony of cutting of the tresses that marks a rite of passage for young men, accompanied with a change in their tax and other status. However, he does not see this particular portrait as representing the ritual. See Montserrat, *JEA* 79, 218, 224; D. Montserrat, 'Mallocoouria and Therapeuteria: Rituals of Transition in a Mixed Society?', *Bulletin of the American Society of Papyrology* 28 (1991), 45–7, 49, nn. 10, 11.

to that sheikh. The child would have a special relationship to the sheikh for the rest of his life. Also, in the Fayum, when a boy was seen with this tufted hairstyle, it signified that he was an only son, and this hairstyle would ensure his good health and a long life. Blackman also states that a boy's hair was shaved in a performance of a vow.<sup>24</sup> These hair rituals involving the safety of a child are also found in other cultures.<sup>25</sup>

It appears that a similar custom was practiced in ancient Egypt.<sup>26</sup> Tufts of infantile hair enclosed in clay balls have been found at Tell el-Amarna,<sup>27</sup> as well as in a tomb dating to the Twentieth Dynasty at Lahun.<sup>28</sup> These hair balls were no doubt associated with keeping children safe and dedicating them to a deity. With reference to children's heads being shaved as part of a vow, Blackman suggests that a passage in Herodotus might also be relevant. Herodotus writes: 'The manner...of performing vows is as follows: praying to the god...they shave the heads of their children—sometimes completely, sometimes only a half or a third part—and after weighing the hair in a pair of scales, give an equal weight of silver' [as a dedication to the god] (II: 65).<sup>29</sup> Similarly, from the Roman Period various papyri mention locks of hair being dedicated by adolescents to Serapis and Thoeiris.<sup>30</sup> The tomb of Tutankhamun also contained two balls of human hair (Cairo JE 61762), which in the past have been equated with these clay balls. However, recent studies show that they bear no relation to these clay-covered clumps of hair.<sup>31</sup> Other clay balls have been found in Old Kingdom funerary contexts from Abydos and Reqaqna, but these differ from the hair balls in that they are inscribed with hieroglyphic signs, and contain cloth, carbon, pottery, bone, or reed fragments.<sup>32</sup>

It is possible that the Malibu boy's tufted hairstyle is a manifestation of an indigenous Egyptian remedy.<sup>33</sup> The Horus lock that he wears on the right side of his head clearly associates him with the Isis cult, and is found on both male and female children throughout Egyptian history. However, the tufts of hair above the boy's forehead are unusual, with only one parallel located thus far, BM EA 6715. It is possible that the hairstyle is in some way associated with a vow, but it is far more likely that it was an attempt, which failed, to keep him healthy and alive. As mentioned above, the shadows under his eyes, his colouring, and visage suggest 'mortal illness'.<sup>34</sup> In such an extreme case, it is quite probable that a child's parents would use all varieties of medical and religious cures available to them, regardless of whether they were Greek, Roman, or Egyptian. In fact, an association with the Isis cult would argue that the initiates were sympathetic to indigenous Egyptian beliefs and remedies.

The Malibu boy is also wearing an amulet case. Portraits of children, especially boys, wearing amulet cases are not uncommon,<sup>35</sup> although it is far more common to see depictions of children

<sup>24</sup> W. S. Blackman, *The Fellahin of Upper Egypt* (Cairo, 2000 reprint), 84–7, 290.

<sup>25</sup> Leach, *Journal of the Royal Anthropological Institute* 88/2, 155.

<sup>26</sup> Blackman, *The Fellahin*, 290.

<sup>27</sup> T. E. Peet and C. L. Woolley, *The City of Akhenaten, I. Excavations of 1921 and 1922 at El-Amarnah*, (MEES 38; London, 1923), 66.

<sup>28</sup> W. M. Crompton, 'Two Clay Balls in the Manchester Museum', *JEA* 3 (1916), 128.

<sup>29</sup> Herodotus, *The Histories*, trans. A. de Selincourt (New York, 1954), 155.

<sup>30</sup> D. Montserrat, *Sex and Society in Graeco-Roman Egypt* (London, 1996), 39–40.

<sup>31</sup> J. Fletcher and D. Montserrat, 'The Human Hair in the Tomb of Tutankhamun: a Re-evaluation', in C. J. Eyre (ed.), *Proceedings of the Seventh International Congress of Egyptology* (Leuven, 1998), 401–7.

<sup>32</sup> T. E. Peet, 'A Remarkable Burial Custom of the Old Kingdom?', *JEA* 2 (1915), 8–9.

<sup>33</sup> It is always slightly dangerous, albeit seductive, to assume that habits from antiquity continue unchanged into the present. Certainly, when these 'continuations' are of a concrete nature, be it technological (e.g. brick-making, rope-making, etc.), or philological, (e.g. the ancient Egyptian word for crocodile *msh* leading to the modern Arabic *timsah*), the thread of continuity is easier to trace than in instances of cultural practices. In this article the author is merely putting forward a suggestion as there is no concrete evidence to support this theory.

<sup>34</sup> Walker and Bierbrier, *Ancient Faces*, 114.

<sup>35</sup> Examples include: Dublin, National Museum of Ireland, Inv. 1902.4, in Borg, *Mumienporträts*, Taf. 53.2; Louvre AF 6488, in M.-F. Aubertand and R. Cortopassi, *Portraits de l'Égypte romaine*, (Paris, 1998), 64 (21); Cairo CG 33240, in W. M. F. Petrie, *Hawara, Biahmu and Arsinoe* (London, 1889), 19, pl. 11; Tel Aviv Museum Haaretz

without amulets. These amulet cases, known from ancient Egypt, and still in use in modern Egypt, contained papyri inscribed with spells and prayers that would protect children from disease, evil spirits, black magic, and the evil eye.<sup>36</sup> Could this not be another manifestation of trying to protect him from ill-health and malevolent beings? The Malibu boy's eyes are also outlined in black, suggesting that they were ringed with *kohl*. *Kohl* has historically been used in Egypt (and other countries) to ward away the evil eye and to encourage good health for the wearer.

Thus, the evidence suggests that the Malibu boy, an initiate of the Isis cult, was quite sickly, and extreme measures were taken in order to return him to good health. Encircling his throat/neck with an amulet case containing protective spells and prayers and outlining his eyes with *kohl* were just two manifestations of these defensive measures. The tufted hairstyle might have been a third, more extreme and poignant, expression of divine or supernatural protection that had been invoked in an effort to restore the boy to health. It is sad that despite all the religious and medical efforts made on his behalf, the Malibu boy died so young.<sup>37</sup>

SALIMA IKRAM

### Yesbokheamani—der Löwe von Qasr Ibrim

A statue of a lion found at Qasr Ibrim and now exhibited in the Nubian Museum at Aswan bears an inscription in Meroitic hieroglyphs which can be translated as 'It is Yesbokheamani, the king, beloved of Amun of Luxor'.

Im zentralen Raum des Nubischen Museums in Assuan<sup>1</sup> ist ein Löwe aus nubischem Sandstein (c. 78 cm hoch und 44 cm breit) ausgestellt (pl. XXIII), unter dessen Mähne eine zweizeilige Inschrift in meroitischen Hieroglyphen eingraviert ist (Inventar-Nummer Kairo JE 90879). Die gut lesbare Inschrift nennt den meroitischen König Yesbokheamani, dessen Regierung ungefähr im späten dritten Jahrhundert n. Chr. anzusetzen ist.<sup>2</sup> Von ihm sind drei weitere Texte bekannt, in denen sein Name verzeichnet ist. Die Inschrift unter der Mähne des Löwen ist jedoch bisher unpubliziert geblieben, obwohl sie in der wissenschaftlichen Literatur schon Erwähnung gefunden hat.<sup>3</sup>

Die Löwenplastik wurde 1966 bei Ausgrabungen in Qasr Ibrim gefunden und von J. M. Plumley in mehreren Vorberichten erwähnt.<sup>4</sup> Die nicht ganz vollständige Plastik (Fundnummer 66/99) kam unter Raum B des in christlicher Zeit errichteten Hauses LC1-184<sup>5</sup> zum Vorschein.

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Inv. 152658, in Parlasca, *Mumienporträts* 50.1; and an example in Warsaw's Museum Narodowe, in K. Parlasca and H. Seemann, *Augenblick: Mumienporträts und ägyptische Grabkunst aus römischer Zeit* (Munich, 1999), 34.

<sup>36</sup> Montserrat, *JEA* 79, 224; I. E. S. Edwards, *Hieratic Papyri in the British Museum: Oracular Amuletic Decrees of the Late New Kingdom* (London, 1960); J. and R. Janssen, 'A Cylindrical Amulet Case: Recent Investigations', in I. Gamer-Wallert and W. Helck (eds), *Gegengabe: Festschrift für Emma Brunner Traut* (Tübingen 1992), 161–4.

<sup>37</sup> Unfortunately the J. P. Getty Museum only has the portrait panel and not the mummy, so there is no way of examining the mummy to find out its age or possible cause of death. BM EA 6715, the shroud depicting the only other example of a boy with a tufted hairstyle, contained a mummy of a boy that probably died between the ages of eight and ten years (J. Filer, 'If the Face Fits...', in Bierbrier (ed.), *Portraits and Masks*, 123).

<sup>1</sup> Main Exhibition Hall, Exhibition Zone K; s. *Nubia Museum* (Aswan o. J.), 76–7.

<sup>2</sup> T. Eide et al. (eds), *Fontes Historiae Nubiorum. Textual Sources for the History of the Middle Nile Region between the Eighth Century BC and the Sixth Century AD*, III. *From the First to the Sixth Century AD* (Bergen 1998), 1049–51.

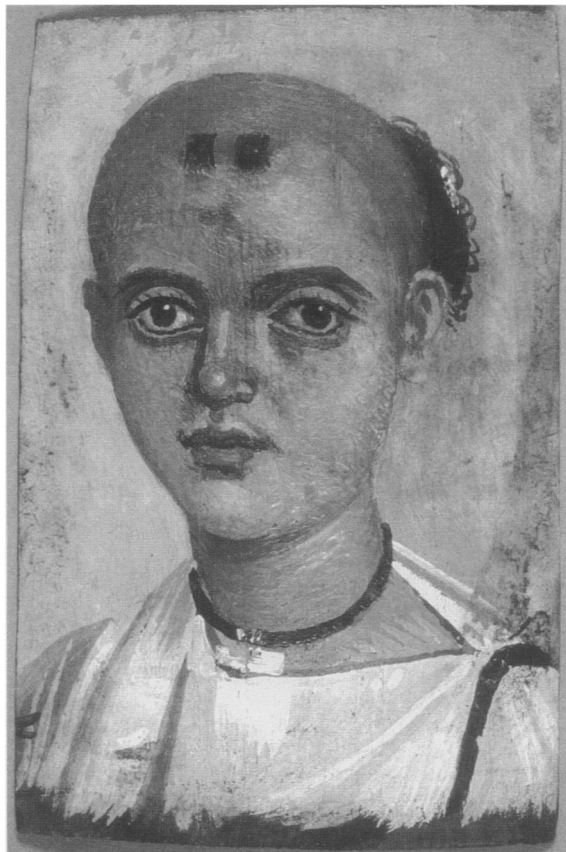
<sup>3</sup> J. M. Plumley, 'Qasr Ibrim 1966', *JEA* 52 (1966), 12 und pl. iv/3; W. Y. Adams, *Qasr Ibrim. The Late Mediaeval Period* (London 1996), 205 c und d; zuletzt: *Fontes Historiae Nubiorum*, 1049. Ich bin der Egypt Exploration Society und speziell der Leiterin der Ausgrabung in Qasr Ibrim, Dr Pamela Rose, sehr zu Dank verpflichtet, diese interessante Inschrift publizieren zu dürfen.

<sup>4</sup> Plumley, *JEA* 52, 12 und pl. iv/3; J. M. Plumley, 'Qasr Ibrim December 1966', *JEA* 53 (1967), 3, fig. 1.



1. The tombs on the hillside above the mortuary temple of Mentuhotep II in Deir el-Bahri. The entrance of the tomb of the slain soldiers is somewhat lower than the others (copyright Carola Vogel).

FALLEN HEROES?—WINLOCK'S 'SLAIN SOLDIERS' (pp. 239–45)



2. Mummy portrait, AD 150–200 (Collection: Courtesy The J. Paul Getty Museum, 78.AP.262).

BARBERING THE BEARDLESS (pp. 247–51)





FIG. 1. Inschrift auf dem Löwen von Qasr Ibrim, Kairo JE 90879 (eigene Umzeichnung).

Sie wurde aus den Trümmern eingestürzter Mauern aus spätkristlicher Zeit geborgen, die einst zwei aufeinanderzulaufende Treppen begrenzt haben.<sup>6</sup> Da die Mauern aus wiederverwendeten Blöcken errichtet waren, bleibt der ursprüngliche Standort der Plastik unklar.<sup>7</sup>

Die linksläufige Inschrift in zwei Zeilen ist wie folgt zu lesen (fig. 1):

(1) *a e m n i e y e s e b o ḥ e q o* (2) *r e m n p t k e l o*:

Die Inschrift bildet einen vollständigen meroitischen Satz, dessen Ende durch einen Worttrenner markiert ist. Wie in vielen Texten steht er auch in dieser Inschrift nicht hinter den Einzelwörtern, sondern bildet den Abschluß der gesamten Nominalphrase. Deren Inhalt kann trotz der Tatsache, daß das Meroitische zwar zu lesen, aber nur rudimentär zu übersetzen ist, relativ genau ermittelt werden, da die meisten Wörter in ihrer Bedeutung bekannt sind:

1) *a e m n i e y e s e b o ḥ e*: Der Name des Herrschers Yesbokheamani setzt sich aus dem Namen des Gottes Amun und einer in ihrer Bedeutung unbekanntem Phrase zusammen. *Yeseboḥe* ist sowohl alleine als auch in Verbindung mit anderen Götternamen im Textkorpus der meroitischen Inschriften belegt.<sup>8</sup> Die vorliegende Schreibung des Königsnamens ist nicht mit der der anderen Quellen identisch:

REM 0119 und REM 0120:<sup>9</sup> *y e s e b o ḥ e m n i*

<sup>5</sup> Adams, *Qasr Ibrim*, 32 (fig. 3).

<sup>6</sup> Vgl. den Plan in Plumley, *JEA* 53, 3 (fig. 1).

<sup>7</sup> Teile ähnlich gestalteter Löwenplastiken, die aber ebenfalls sekundär verbaut waren, fanden sich 1974 (J. M. Plumley, 'Qasr Ibrim, 1974', *JEA* 61 (1975), 12 und pl. vii/3) sowie—nach freundlichem Hinweis von Dr Pamela Rose—1980. Bei letzterem, unter der Objekt Nummer 80.1.30/61 registrierten, Fragment handelt es sich um einen Teil vom Oberkörper und Kopf eines Löwen mit Mähne und Seitenpartie, gefunden in der in spätkristlicher Zeit wiedererrichteten Umfassungsmauer der südlichen Bastion, der von Stil und Größe her mit dem beschrifteten Löwen Yesbokheamanis identisch ist.

<sup>8</sup> J. Leclant et al. (eds), *Répertoire d'épigraphie méroïtique. Corpus des inscriptions publiées*, I–III (Paris 2000) [= REM]: *yeseboḥe* allein: REM 0094 und REM 0370, Zl. 5–6; *ariteneyeseboḥe* REM 0823B; *aryeseboḥe* REM 0815; letztere sind ebenfalls Namen meroitischer Könige; zur Interpretation von *yeseboḥe* s. C. Rilly, 'Une nouvelle interprétation du nom royal Piankhy', *BIFAO* 101 (2001), 367–8.

REM 0407: <sup>10</sup>	<i>a m n i y e s e b o ḥ e</i> <sup>11</sup>
REM 0407:	<i>y e s e b o ḥ e</i> <sup>12</sup>
Löwe von Qasr Ibrim:	<i>a e m n i e y e s e b o ḥ e</i>

Die Unterschiede betreffen zum einen die Stellung des Gottesnamens vor bzw. nach *y e s e b o ḥ e* und zum anderen die Verstärkung des anlautenden *a* und des auslautenden *i* durch ein *e* im Namen des Amun. Eine Voranstellung des Gottesnamens, wie sie in hieroglyphischen Inschriften Ägyptens überreich belegt ist,<sup>13</sup> findet sich auch in den Schreibungen des Namens des Königs Natakamani.<sup>14</sup> Die Vokalverstärkung durch *e* scheint eine Besonderheit ausschließlich der vorliegenden Inschrift zu sein und kann noch nicht befriedigend erklärt werden.<sup>15</sup>

2) *q o r e*: ist das oft belegte Wort für König.<sup>16</sup> Ohne Endung geschrieben steht es hier als Apposition hinter dem Namen des Herrschers.

3) *m n p*: Für dieses Wort liegen zwei verschiedene Übersetzungen vor: 'Amun von Luxor'<sup>17</sup> und 'Amun von Napata'.<sup>18</sup> Ersterer ist aber der Vorzug zu geben, denn zum einen ist mit *amnpte* ein Wort für 'Amun von Napata' belegt, das in korrekter Weise auch das auslautende *-t* des Namens Napata wiedergibt.<sup>19</sup> Zum anderen lautet der Name des Amuntempels von Napata entgegen der Argumentation von I. Hofmann nicht *ip.t* sondern *ip.t-s.wt*.<sup>20</sup> Und schließlich tritt *amn p* auch noch

<sup>9</sup> Beide Inschriften in meroitischen Kursiva sind einander gegenüberliegend am Durchgang vom Hadrianstor zum Isis-Tempel in Philae angebracht. Erstpublikation von F. Ll. Griffith, *Meroitic Inscriptions*, II. *Napata to Philae and Miscellaneous* (ASE 20, London 1912), 44–5.






<sup>10</sup> Sandsteinstele mit meroitischen Kursiva aus dem Löwentempel von Meroe (Tempel M6), veröffentlicht von F. Ll. Griffith, 'The Inscriptions from Meroë', in J. Garstang (ed.), *Meroë, the City of the Ethiopians: Being an Account of a First Season's Excavations on the Site, 1909–1910* (Oxford 1911), 65–7.

<sup>11</sup> In Zeile 1–2 des Textes; Lesung nach I. Hofmann, *Beiträge zur meroitischen Chronologie* (Studia Instituti Anthropos 31, St. Augustin bei Bonn 1978), 166. Die vier Zeichen vor *yesebohe* sind nicht sicher und werden von L. Török in *Fontes Historiae Nubiorum*, 1051 *kemp(l)* gelesen, was mir weniger wahrscheinlich scheint.

<sup>12</sup> In den Zeilen 4, 7 und 10–11 der Stele. Auffallend ist bei diesen drei Belegen das Fehlen des Gottesnamens und auch die Tatsache, daß ihnen nicht das Wort *qore* folgt, so daß m.E. hier (wie in REM 0370) vielleicht nicht der Königsname sondern die schon genannte Phrase *yesebohe* vorliegt.

<sup>13</sup> Siehe z.B. A. H. Gardiner, *Egyptian Grammar*<sup>3</sup> (Oxford 1957), § 57.

<sup>14</sup> Vgl. *Fontes Historiae Nubiorum*, 896–7 und die dort genannten Einzelquellen. Vorangestellt wird der Göttername in den Kartuschen seiner ägyptisch abgefaßten Inschriften. Seine sowohl in Hieroglyphen als auch in Kursiva aufgezeichneten meroitischen Texte schreiben konsequent Natakamani.

<sup>15</sup> In den Grammatiken wird auf dieses Phänomen nicht eingegangen (s. F. Hintze, 'Zur Interpretation des meroitischen Schriftsystems', *BzS* 2 (1987), 48–50; I. Hofmann, *Material für eine meroitische Grammatik* (Veröffentlichungen der Institute für Afrikanistik und Ägyptologie der Universität Wien 16. Beiträge zur Afrikanistik 13, Wien 1981), 31. Nach persönlicher Mitteilung von Claude Rilly, dem ich auch sonst für vielfältige Hinweise zu Dank verpflichtet bin, könnte dieses Phänomen durch eine fehlerhafte Umsetzung der Kursivzeichen in Hieroglyphen entstanden sein: 'Il me semble plutôt que ces graphies  pour *a* et  pour *i* sont une adaptation des signes cursifs, ressentis comme comportant un  (ou ) ancien en seconde position (le *i* se trace en effet en trois traits, dont le dernier, quasi vertical, peut rappeler un  ou son équivalent démotique | )'.

<sup>16</sup> Schon von F. Ll. Griffith, 'Meroitic Studies', *JEA* 3 (1916), 124 so gedeutet.

<sup>17</sup> F. Ll. Griffith, *Karanòg: the Meroitic Inscriptions of Shablül and Karanòg* (Eckley B. Coxe Junior Expedition to Nubia 4, Philadelphia 1911), 55.

<sup>18</sup> Der Name soll auf *Imn-m-ip.t* zurückgehen, wobei *ip.t* den Tempel des Amun von Napata bezeichnen soll: I. Hofmann, 'Die meroitische Religion. Staatskult und Volksfrömmigkeit', in W. Haase (ed.), *Aufstieg und Niedergang der Römischen Welt*, Teil II, Band 18.5 (Berlin und New York 1995), 2813; s. auch L. Török, *The Image of the Ordered World in Ancient Nubian Art. The Construction of the Kushite Mind, 800 BC–300 AD* (Probleme der Ägyptologie 18, Leiden, Boston und Köln 2002), 316.

<sup>19</sup> C. Peust, *Das Napatansiche. Ein ägyptischer Dialekt aus dem Nubien des späten ersten vorchristlichen Jahrtausends* (Monographien zur Ägyptischen Sprache 3, Göttingen 1999), 216–17.

in spätmeroitischer Zeit in Inschriften gleichberechtigt und sogar im selben Kontext neben *amnpte* auf, was dafür spricht, daß sich unter diesen beiden Ausdrücken verschiedene Gottheiten verbergen.<sup>21</sup> Es ist daher höchst unwahrscheinlich, daß *mn* den Namen des Amun von Napata bezeichnet.

4) *t k e*: ist wohl ein Verbalkomplex, der vielleicht dem ‘geliebt von’ (*mrj*) in ägyptischen Inschriften entspricht. *Mnptke* möchte ich demnach als ‘geliebt von Amun von Luxor’ auffassen.<sup>22</sup>

5) *l o*: fungiert als Kopula ‘ist es’.<sup>23</sup>

Somit ließe sich die Inschrift dann wie folgt übersetzen:

Yesbokheamani, der König, geliebt von Amun von Luxor, ist es.

Sie entspricht in ihrem Aufbau exakt dem Beginn eines ebenfalls mit Hieroglyphen geschriebenen Textes des Königs Amanikhareqerem auf einer weiteren Tierplastik, dem Widder von Soba,<sup>24</sup> der folgende Struktur aufweist: ‘Name eines Königs + *qore* + Name eines Gottes + *tke* + *l*’.

Mit der vorliegenden Inschrift besitzen wir darüber hinaus ein weiteres Zeugnis für einen sonst quellenmäßig eher spärlich belegten König aus der Spätzeit des meroitischen Reiches, dessen Einflußbereich sich der Fundlage seiner Inschriften nach noch von Meroe bis nach Philae erstreckt haben dürfte.

JOCHEN HALLOF

### A barbarian found

In 1801, British troops besieging the French-occupied city of Alexandria found a high-relief colossal statue of an oriental barbarian. It has recently been located outside the Royal Brass Foundry in Woolwich Arsenal, on the Thames in east London.

A few years ago I wrote a short paper entitled ‘A Lost Barbarian’, based on an early lithograph in the British Museum of a ‘Statue found in digging the British entrenchments before Alexandria and placed by Col: Turner on the lines. Anno 1801. Figure 8 feet high. W.A fec<sup>t</sup>. from a sketch made on the spot by Col. T. H. Turner—3<sup>d</sup> Guards’ (pl. XXIV,1). This lithograph, according to Antony Griffiths, Keeper of Prints and Drawings in the British Museum, may be the work of William Alexander (1767–1816). The paper was published in 1998 in a *Festschrift* for Peter Grossmann, so well known for his work on the archaeology of the early church in Egypt.<sup>1</sup> The

<sup>20</sup> Vgl. Peust, *Das Napatanische*, 218.

<sup>21</sup> Stele des Tanyidamani (REM 1044), Zeile 26–7: *qoleb amnp idebh*; Zeile 125–6: *qoleb amnpte idebhi*; Stele der Amanirenas und des Akinidad (REM 1003), Zeile 37: *amnpte pidelke*; Zeile 39–40: *amnp pidelke*.

<sup>22</sup> Weitere Verbindungen von *tke* mit einem Götternamen sind in meroitischen Texten belegt: *mnitel* (REM 0001; 1151); *mnitke* (REM 0094), *wostkel* (REM 0386); vgl. zu letzterem aber A. M. Abdalla, ‘Beginnings of Insight into the Possible Meanings of Certain Meroitic Personal Names: (2) Verbal Sentences and Sentences that are Partly Verbal and Partly Non-verbal’, *BzS* 4 (1989), 21.

<sup>23</sup> F. Hintze, *Beiträge zur meroitischen Grammatik* (Meroitica 3, Berlin 1979), 61; 192–3.

<sup>24</sup> REM 0001: ...*reqerem*... : [*qore* : *mni tk l*.]; die Widderplastik ist jetzt im Garten des Nationalmuseums von Khartum aufgestellt.

<sup>1</sup> D. M. Bailey, ‘A Lost Barbarian’, in M. Krause and S. Schaten (eds), *ΘΕΜΕΛΙΑ, spätantike und koptologische Studien* (Sprachen und Kulturen des christlichen Orients 3; Wiesbaden, 1998), 25–31. The lithograph is in the collections of the Greek and Roman Department of the British Museum. Another copy of the print is in the possession of descendants of Turner and was published in A. P. Loveday, *Sir Hilgrove Turner, 1764–1843* (Dover, 1964), 43.



Kairo JE 90879, jetzt im Nubischen Museum in Assuan (copyright Egypt Exploration Society).

YESBOKHEAMANI—DER LÖWE VON QASR IBRIM (pp. 251–4)

sculpture was also illustrated, from a rather less competent drawing entitled 'Antique Statue dug up in front of the 3<sup>rd</sup> Regt. of Guards Eastward of Alexandria', made by Captain Thomas Walsh, in his book on the British campaign against Napoleon's forces in Egypt.<sup>2</sup>

The sculpture is a high-relief figure of an oriental barbarian standing against a backing slab, his left hand on his hip, the right arm raised so that its (lost) hand would support (or appear to support) an architrave or lintel of the building to which it once belonged; there would have been a matching figure with its arms disposed in an opposite manner. He wears a long tunic, belted high at the waist, with a generous overfall causing the hem of his tunic to rise above his knees. A long cloak is draped over the shoulders; it falls almost to ground level behind, but is rendered only summarily in the lithograph. There are some indications of leggings, but the arms appear to be free of drapery, although it is very likely that the figure's tunic had sleeves. The head, inclined slightly to the sculpture's left, has a Phrygian cap with generous lappets; footwear is indicated. It was made sometime between the first and the third century AD. For a fuller description of the barbarian, its comparanda, mainly examples collected together by R. M. Schneider,<sup>3</sup> and its possible placing at Alexandria, see my paper mentioned in note 1, where I speculated concerning the fate of this sculpture and came to the conclusion that it had been left behind at Alexandria, to disappear without trace.

The lithograph (pl. XXIV, 1) shows Alexandria viewed from the east at the time of the siege. On the extreme left two ships are shown in what must be Lake Mareotis, which had been flooded from 21 March 1801, prior to the normal Nile inundation, by the British cutting a gap in the embankment that held the Alexandria (Mahmudiyeh) Canal and allowing the fresh water from the canal and also the salt water from Lake Aboukir (Lake Edkou) to run into the dried-up Lake Mareotis,<sup>4</sup> thus allowing warships into the lake. At the edge of the lake is a tall object that must be Pompey's Pillar; on the right is another tall structure that could be the standing 'Cleopatra's Needle' now in New York. The British lines are in front of the well-defended heights of Nicopolis, in which position they remained until after the French surrender, brought about by an attack from the west. The lithograph also shows details beyond the sculpture that can be recognised from the engraved 'View of the French fortified heights to the eastward of Alexandria' published by Walsh,<sup>5</sup> but which are seen from a viewpoint more to the south, as the varying positions of Pompey's Pillar in the lithograph and in the engraving indicate. The flags to the left are exactly the same as the 'Four Flags hoisted by the French after the 21st of March' shown in Walsh's engraving and so described in its captions. To the right is Fort Caffarelli, and the more highly positioned fort, Fort Crétin, is hidden behind the sculpture.

Colonel Turner, later Major-General Sir Tomkyns Hilgrove Turner, who had erected the statue when it was found, shipped out the material taken officially from the French as spoils of war, including the Rosetta Stone. The Rosetta Stone, a black granite statue of Roy, High Priest of Amun-Re (British Museum EA 81), and a chest of manuscripts, were loaded aboard a captive French frigate, *L'Égyptienne*, and the remaining objects were placed on another ship, the *Madras*. Turner also sent back a block with hieroglyphs that he owned and which was found in the camp of the 3<sup>rd</sup> Guards; this is now in the British Museum (EA 104). None of the various lists, often incomplete, of the objects sent to England, that the author has seen, mentions the barbarian<sup>6</sup> (but see the first letter

<sup>2</sup> *Journal of the Late Campaign in Egypt* (London, 1803), pl. 29; Bailey, in Krause and Schaten, *ΘΕΜΕΛΙΑ*, 31, fig. 2.

<sup>3</sup> *Bunte Barbaren* (Worms, 1986), 98–138, 200–10.

<sup>4</sup> Walsh, *Journal*, pl. 24.

<sup>5</sup> *Journal*, pl. 25.

<sup>6</sup> These, amongst others, include what may be the original list compiled by Jean Baptiste Fourier, Secretary of the French Institute in Egypt, now in the British Library, Add.Mss. 46839F; also a list in the *Gentleman's Magazine* 72, part 2 (1802), 726–7: quoted in E. A. W. Budge, *The Rosetta Stone in the British Museum* (London, 1929), 28–30; H. Turner, writing in May 1810 (no title) in *Archaeologia* 16 (1812), 212–14; J.-J. Fiechter, 'La pierre de Rosette et les autres antiquités égyptiennes prises par les Anglais en 1801', *RdE* 48 (1997), 283–9; M. Bierbrier, 'The Acquisition by the British Museum of Antiquities Discovered during the French Invasion of Egypt', in W. V. Davies (ed.), *Studies in Egyptian Antiquities, a Tribute to T. G. H. James* (British Museum Occasional Paper 123; London, 1999), 111–13; see also Appendix 3.

in Appendix 1 below). There appears to be no record of where the objects other than the Rosetta Stone were landed in England: *L'Égyptienne* made landfall at Portsmouth in February 1802, and proceeded on to the Custom House at Deptford on the Thames at London, where the Stone was put ashore. The material confiscated from the French was presented to George III, who in turn donated it to the British Museum.

In July of 1999, my colleague Peter Higgs, of the Department of Greek and Roman Antiquities of the British Museum, found in the Department's archival material a small packet of letters which appeared to relate to the barbarian (Appendix 1). These show that, if the identification was correct (and there seemed to be little doubt that this was so), this sculpture did indeed come to England. A letter from Colonel George Pearse of the Royal Artillery, written from the United Services Club in Pall Mall on Sunday 27 March 1876 to Colonel E. Wray CB at the Royal Arsenal at Woolwich, declares that he had come across Walsh's book (n. 2) and 'There I find the statue figured of the Moon God which we brought to light two years ago.—And which Milward erected.—' Pearse states that an Appendix on p. 136 of Walsh's publication shows that the sculpture 'was sent home in Sept. 1802, in charge of Colonel Turner.—' This Appendix does not appear in the first edition of the book and must be from a later edition, but one published in the same year, 1803. Only the first edition is kept at the British Library, but the existence of a second edition, which I have not seen, is signalled by a transcription of this Appendix (No. 37) bound into a copy of *The Journal of Hellenic Studies* 6 (1885) in the library of the Greek and Roman Department of the British Museum (our Appendix 3). Appendix 37 in the first edition deals with a different subject. The transcription lists the objects taken from the French, but the barbarian, which Pearse mentions, is not included, and has either been omitted in the transcription, or was not in Appendix 37, Colonel Pearse assuming from the preamble of that Appendix, and the presence of an illustration of the barbarian in Walsh's book, that this sculpture was also brought to England by Turner: only a sight of this particular edition will resolve this.

The following day Wray wrote to one G. Fraser, sending Pearse's letter and saying that the latter had:

assisted me about three years ago, in checking a piece of rank vandalism by rescuing from destruction, the stone figure, now resting against a wall in ye Dept. We literally *dug* it out, from a heap of earth; old crates (?) & other rubbish, and Col. P. set to work to trace its origins. We (?) should, I humbly submit, present it [word unread] to our own Museum; the Rotunda [at Woolwich], or to the U.S. [United Services] Institution. Its a pity to see it where it is, as it is there comparatively un noticed.

On 10 April 1876 Fraser replied to Wray from the Royal Laboratory at Woolwich:

I gather that the Moon God stood for years in the Laboratory on the site of the present large Machine Room—& that he was respected up to the time when ground was broken for the erection of this room. He was lastly rescued from a position of much indignity—when you completed the disinterment as referred to in your note of 28/3—....I don't think that this property has done us any particular good & therefore with reference to your suggestion I shall be prepared to hand him & his inscription to any institution which would appreciate him. Our own should have the refusal I think—

Two other letters from illegibly (to me) named correspondents have nothing to add, except one states that the sculpture was outside the Royal Laboratory office rather than inside as Fraser has it.<sup>7</sup>

<sup>7</sup> I am grateful to Gabi Fabri for pointing out on site the two surviving separate buildings of the Royal Laboratory. The area between these and other ancillary buildings was roofed over in 1854, to become the large Machine Room (W. Harry, *The Royal Arsenal Woolwich* (London, 1987), 12).

A further letter from Wray bound into the letter files of the Greek and Roman Department of the British Museum has a bearing on this sculpture (Appendix 2 below). It is addressed to a woman relative of Wray's, a Miss Lecoin (?):

My dear Jessie.—You will see by the accompanying notes—that I have an art treasure, which your friend at the British Museum may have for the asking and if he will arrange for carrying it up to Town.—It is a statue ancient Roman or Greek: can't say which about 8 ft high—dug up by the Guards, in front of their Camp at Alexandria in 1801 and sent to this arsenal with the stones.<sup>8</sup>— It has been knocking about here ever since, and three years ago, I saw the feet sticking out under a mass of rubbish, & had it dug out.—If your friend would like to come down and look at it, tell him I'll do the needful.—'

Jessie's friend was likely to have been Charles Newton, Keeper of Greek and Roman Antiquities or his assistant Alexander Murray: I can find no records that the barbarian was examined by anyone from the British Museum. Wray also mentions other ancient architectural masonry, used 'to fend off carts': these too may have been well worth acquiring by the British Museum, but it is too late now.

I had not yet approached the Royal Arsenal, as I was not sure whom to contact: the area had been largely given up by the military and disposed of for modern development, although many of the buildings are listed and have to be retained. But providentially, in late October 1999, Harold Chapman came to the British Museum with a sketch of the barbarian that he had made a couple of years earlier at an Open Day at the Arsenal. He had become concerned about its condition and what might subsequently happen to it as the development progressed. At last we knew that it still existed and where it was (pls. XXIV, 2–XXV). He arranged with the developers, English Partnerships, for a visit to be made, and he and I went there on 30 October. The barbarian stands against the wall of a fine early eighteenth-century red-brick building, the Royal Brass Foundry, protected by a wooden awning.<sup>9</sup> It seems that the Foundry was acquired by the National Maritime Museum about thirty years ago, and the barbarian was then situated where we saw it in October 1999.

Except perhaps for a period when the sculpture may have been in the Royal Laboratory at Woolwich, it has stood in the open air for much of its two-hundred-year sojourn in England, and has suffered grievously; the canopy that was erected over it during the decades it has been placed outside the Royal Brass Foundry would, however, have given it some protection. The stone is very probably a white marble with very large pink inclusions, known as breccia corallina from Verziken in Bithynia, in Turkey.<sup>10</sup> Most of the surface has been eroded and it has the appearance so often seen in stone buildings and statues suffering from the effects of London pollution of the nineteenth and twentieth centuries before the Clean Air Acts of the 1960s: areas blackened by deposits caused by innumerable coal-burning fires, domestic and industrial, and areas washed white by driving rain. The details displayed in the lithograph made from Colonel Turner's drawing are much deteriorated, but indications of the hang and folds of the cloak show clearly when the sculpture is viewed from the sides. Incidentally, the lower fall of the tunic is more accurately rendered in Walsh's engraving, despite its faults, than in Turner's.

<sup>8</sup> Does this mean that the *Madras* landed its cargo at Woolwich?

<sup>9</sup> I am grateful to Nicola Monk of English Partnerships for being very helpful during my initial visit in 1999, and for the information that the Royal Brass Foundry belongs to the National Maritime Museum. Thanks are also due to members of the staff of the National Maritime Museum for aiding me in various ways: Geraldine Charles, Angela Doane, Sarah McCormick, Clare Nunns, and in particular, Jeremy Michell and Gabi Fabri, curators at the Royal Brass Foundry. Above all, I am most grateful to Harold Chapman for bringing the actual barbarian to my attention.

<sup>10</sup> For this identification I am grateful to Andrew Middleton of the British Museum Research Laboratory and his colleague Robin Sanderson. For an example of this marble with much white and very little red, as in our statue, see P. Pensabene and M. Bruno, *Il marmo e il colore, guida fotografica, i marmi dell'Collezione Podesti* (Rome, 1998), no. 43. It was customary in Roman times to use coloured marbles in statues of barbarians: Schneider, *Bunte Barbaren*, passim.

The sculpture now has a concrete plinth into which its base is slightly sunk, and is about 2.4 m high. Inserted between the legs is a metal plaque, no doubt produced in a workshop of the Royal Arsenal, with relief letters reading DEUS LUNUS | LATE ROMAN WORK | BROUGHT FROM EGYPT: this is the inscription mentioned in Pearse's and Fraser's letters and therefore must have been placed there (or on an earlier base) before its burial in rubbish. Thus, the barbarian was brought back from Alexandria, perhaps in the *Madras*, possibly placed aboard under instructions from Colonel Turner, but was evidently left at the Royal Arsenal at Woolwich. There it was displayed for a while at the Royal Laboratory, but then cast aside in 1854 when the Machine Room was erected, and subsequently buried in rubbish. Found again in 1873 or 1874, it was re-erected, 'resting against a wall in ye Dept', which may or may not be its present position, outside the Royal Brass Foundry, designed by the architect Sir John Vanbrugh, completed in 1717 (pl. XXIV, 2).

*Appendix 1: Material found by Peter Higgs in a box of letters in the Greek and Roman Department of the British Museum.*

1.

United Services Club,  
Pall Mall, S.W.  
Sunday. 27th.? March/76—

My dear Wray,

I have just come across a singular discovery; & as I know not who has succeeded our old friend Milward, I write to you so that you may make it known to him.—I have been looking over Capt'n Thos.: Walsh's "Journal of the late Campaign in Egypt," Publd. by T. Cadell of the Strand. London 1803. 4°.—

There I find the statue figured of the Moon God which we brought to light two years ago.—And which Milward erected.—Vide pl. 29. page 133. Also Appendix pages 132 & 136.—It appears this was "dug up in front of the Regt: of Guards eastward of Alexandria"—i.e. during the Siege in Augt: 1801.—

It appears vide p. 136 Appendix it was sent home in Septr. 1802, in charge of Colonel Turner.—I do not now perfectly & correctly remember what the inscription at the foot of the statue is. But it now can safely be stated to be "Found by the Brit: Army at Alexandria, 1801".—

Kindly bring all this to notice in the proper quarter & believe me

Yrs very Sincerely  
Geo. G. Pearse

Coll Wray CB RA &c  
Woolwich

2.

[First hand]: From Col Wray C.B.  
Royal Arsenal  
Woolwich

[Second hand (Wray's own)]:

My dear Fraser,

I have rec<sup>d</sup>. the accompanying note from Col. Pearse, R.A. a celebrated antiquary who assisted me about three years ago, in checking a piece of rank vandalism by rescuing from destruction, the stone figure, now resting against a wall in ye Dept.

We literally *dug* it out, from a heap of earth, old crates (?) & other rubbish, and Col P. set to work to trace its origins.

We (?) should, I humbly submit, present it [word unread] to our own Museum; the Rotunda, or to the U.S. Institution.

Its a pity to see it where it is, as it is there comparatively un noticed.



There are other relics of the same kind near ye Pattern room—Remains of columns of ancient Palaces or Temples which Pearse knows all about

They are used as corner stones, to fend off carts, and would be quite as well represented by ancient Smooth bores.—[i.e. old cannon used as bollards].

Ever Yrs  
E. Wray

March 28/76

3.  
My dear Angell

There was a stone statue dug up by the Guards before Alexandria in 1801—and it was sent here in 1802—see enclosed, which please return.

Can you trace anything of it in our records that I sent you

Always  
H. W. [surname unread]

31 3/76

4.

Royal Laboratory  
WOOLWICH, S.E.  
10/4/76

My dear Wray—I gather that the Moon God stood for years in the Laboratory on the site of the present large Machine Room—& that he was respected up to the time when ground was broken for the erection of this room. He was lastly rescued from a position of much indignity—when you completed the disinterment as referred to in your note of 28/3—

Since the receipt of that note Gordon [Angell?] has kindly been endeavouring to find out when & how &c—the god came to the R. L. [the Royal Laboratory, presumably]—but you will see by enclosed note [not present] he has failed in obtaining any information—

I don't think that this property has done us any particular good & therefore with reference to your suggestion I shall be prepared to hand him & his inscription to any institution which would appreciate him. Our own should have the refusal I think—

Perhaps you & Col Pearse will kindly move for his removal when you have found a suitable home for him - & believe me

Yours Truly  
G. Fraser

5.

Birdstown - Londonderry  
Ireland  
27th July

Dear Wray.

among the old books I found in this house I found

“Journal of the Late Campaign in Egypt” | by Thomas Walsh | Captn 93<sup>rd</sup> A.D.C. to Major | Gnrl [Sir Eyre] Cooté | London | Cadell Junr & Davies | 1801 (*sic*)

At plate 29 page 131, is figured an alto relievo statue “dug up in front of the 3<sup>rd</sup>. Regt of Guards eastwards of Alexandria”

Unless I am much mistaken this is the statue you shewed me outside the R. Laby office. It would be worth while getting the book & comparing it with the original: if found greatly corresponding it would authenticate the statue beyond a peradventure.

Bravo! the old F[unread] G[unread].

How did your interview with the [three words unread]. Satisfactorily, I warrant.

Yours ever  
Henry H. [surname unread]

*Appendix 2: Letter located in the main correspondence file of the Greek and Roman Department of the British Museum.*

The pack of letters in Appendix 1 probably came to the Department with this, and were 'the accompanying notes'.

From Col Wray  
to  
Miss Lecoin (?)  
My dear Jessie.—

You will see by the accompanying notes—that I have an art treasure, which your friend at the British Museum may have for the asking and if he will arrange for carrying it up to Town— It is a statue ancient Roman or Greek: can't say which about 8 ft. high—dug up by the Guards, in front of their Camp at Alexandria in 1801 and sent to this arsenal with the stones.—It has been knocking about here ever since, and three years ago, I saw the feet sticking out under a mass of rubbish, & had it dug out.—If your friend would like to come down and look at it, tell him I'll do the needful.—a (*sic*) perhaps when you are next in Town you might bring him, if he thinks it worth coming for.—There are other relics, rec<sup>d</sup>. at the same time which he might consider worth carrying off—

My people have this day returned from France  
Topsy increasingly grown.  
I have not seen you for an age.:

Ever yr aff cousin (?)  
E. Wray

August 3<sup>d</sup>. 76

*Appendix 3*

Typewritten transcript of Appendix 37 of a second (?) edition of Walsh's publication (n. 2), bound into a copy of *The Journal of Hellenic Studies* 6 (1885) in the library of the Department of Greek and Roman Antiquities of the British Museum; it is a variant of the several similar lists known. Much fuller, recent descriptions of the objects listed can be found in the publications of Fiechter and Bierbrier in note 3.

*Extract* Journal of the late Campaign in Egypt: including descriptions of that Country, and of Gibraltar, Minorca, Malta, Marmorice, and Macri: with an Appendix; containing Official Papers and Documents: by Thomas Walsh. Ed. 1803.

136

APPENDIX  
*Appendix, No. 37*

No. 37.

Pieces of Ancient Sculpture, &c. taken by the British Forces, under the Command of Lieutenant-General Lord Hutchinson, from the French Army in Alexandria, and sent to England in Charge of Colonel Turner, Sept. 1802.

1. An Egyptian sarcophagus, with hieroglyphics, of a stone called by the French *breche verte*, from the mosque of St. Athanasius in Alexandria. [BM EA 10]

2. Do. do. of black granite, from Cairo. [BM EA 23]
3. Do. do. of basaltes, from Menouf. [BM EA 86]
4. The fist of a colossal statue, supposed to be Vulcan, found in the ruins of Memphis. [BM EA 9]
5. Five fragments of statues, with lions heads, black granite, brought from the ruins of Thebes. [Not identifiable amongst the British Museum Sekhmet figures]
6. A mutilated figure kneeling, black granite. [BM EA 25]
7. Two statues, white marble, supposed to be Septimius Severus and Marcus Aurelius found in the researches made in Alexandria. [BM GR 1802.7-10.1-2]
8. A stone of black granite, with three inscriptions, hieroglyphic, Cophtic, and Greek, found near Rosetta. [BM EA 24]
9. A statue of a woman sitting, with a lion's head, black granite, from Upper Egypt. [BM EA 88]
10. Two fragments of lions heads, black granite, from Upper Egypt. [Like 5 above, not identifiable]
11. A small figure kneeling, with hieroglyphics, black granite, from Upper Egypt. [BM EA 137]
12. Five fragments of statues, with lions heads, black granite, from Upper Egypt. [Like 5 and 10 above, not identifiable]
13. A fragment of a sarcophagus, black granite, from Upper Egypt. [BM EA 66]
14. Two small obelisks, remarkably fine, with hieroglyphics, basaltes, from Upper Egypt. [BM EA 523-4]
15. A Colossal ram's head, of a stone called by the French rouge grais, from Upper Egypt. [BM EA 14]
16. A statue of a woman sitting on the ground, of black granite; between the feet is a model of a capital of a column of the temple of Isis at Dendera. [BM EA 81]
17. A fragment of a statue, with a lion's head, black granite, from Upper Egypt. [Like 5, 10 and 12 above, not identifiable]
18. A chest of Oriental Manuscripts, amounting to sixty-two, Cophtic Arabic, and Turkish, belonging to the Library of the French Institute at Cairo. [British Library Oriental Mss. 5963-91, 5995-6026]

(Signed) Fourier.  
(Counter-Signed) T. H. Turner,  
Col. And Capt. 3<sup>rd</sup> Guards.

DONALD M. BAILEY



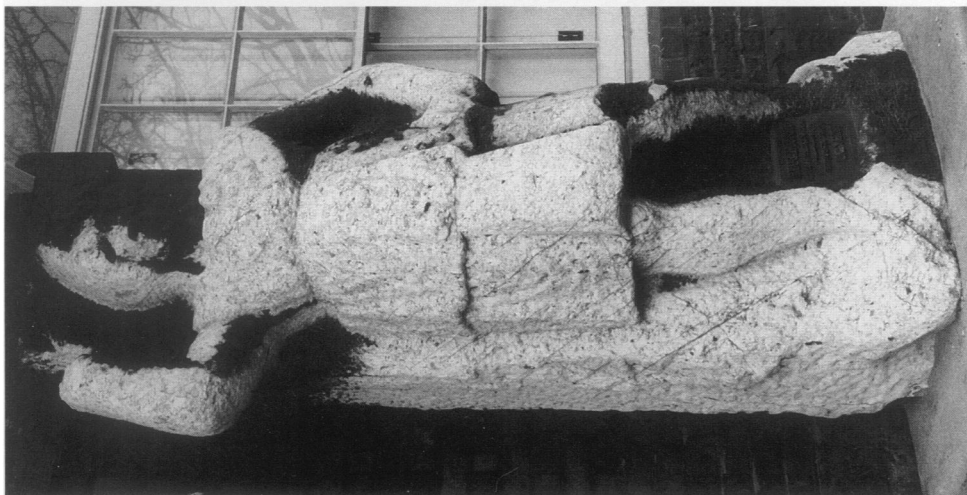
1. Lithographic print of a sculpture of an oriental barbarian found in Alexandria in 1801 (British Museum photograph).

2. Sculpture of a barbarian outside Sir John Vanbrugh's Royal Brass Foundry in the Royal Arsenal at Woolwich (author's photograph).





1.



2.



3.

Sculpture of a barbarian from Alexandria (author's photographs).

A BARBARIAN FOUND (pp. 254-61)

## REVIEWS

*The Papyrus of Nu.* By GÜNTHER LAPP, with a contribution by T. SCHNEIDER. Catalogue of the Books of the Dead in The British Museum, I. Pp. 91, pls. 88. London, British Museum Press, 1997. ISBN 0 7141 1902 4. Price £45.

Nicht ohne Grund ist der Papyrus des Nu für den ersten von weiteren Katalogbänden der Totenbuch-Exemplare des British Museum ausgewählt worden, und so wird Günther Lapp den bleibenden Verdienst für sich in Anspruch nehmen dürfen, dieses zweitlängste (nur pNeb-senj ist mit 23,60 m länger), textlich qualitativste und mit den meisten Tb-Sprüchen ausgestattete Totenbuch der 18. Dynastie publiziert zu haben.

Mehr als die Hälfte der Publikation nehmen die großformatigen Photos (und die sie betreffenden Appendices) ein, über deren Qualität man nicht genug Lobendes anmerken kann. Zudem geben die vier Farbtafeln ein lebhaftes Bild von der Kolorierung des Papyrus. Dank der guten Photo-Qualität und der ausgezeichneten Lesbarkeit des Textes kann man leicht auf eine sonst sinnvolle Transliteration verzichten, zumal in Appendix 4 auch alle Rubra wiedergegeben werden. Bei jeglichem Textvergleich arbeitet man also direkt mit der originalen Wiedergabe, kann in Zukunft bei Referenzen auf die mehr als 100 Jahre alte Budge-Ausgabe verzichten, auf die bisher leider zum Zitieren immer zurückgegriffen werden mußte.

Unter den technischen Daten zu dem Papyrus findet sich zum Layout eine gute Detail-Beobachtung, die sonst kaum bemerkt wird: die Ziehung der Hilfslinien. Allerdings vermißt man die Maße der Zeilenbreite und besonders die Maße der einzelnen Blätter, kenntlich an ihren Klebungen. Da wir relativ selten so gut erhaltene, fortlaufende Tb-Exemplare für solche Fragestellungen zur Verfügung haben, ist pNu ein wichtiger Textzeuge für derartige Untersuchungen, und es hätte gelohnt, dies in der vorliegenden Publikation aufzubereiten.

Die Frage der Datierung des pNu und damit seines Besitzers ist meines Erachtens nicht so leicht zu klären. Weder sein Titel noch die Belege für seinen möglichen Arbeitgeber helfen weiter, selbst wenn sich bei der Zusammenstellung aller Belege aus dem NR ergibt, daß ein Hausverwalter Nu im Grab eines Schatzmeisters Sebek-hetep aus der Zeit Thutmosis' IV. attestiert ist. Solche möglichen Zuweisungen erscheinen dann zwar äußerst verlockend, müßten aber mit allen anderen, zur Datierung verwendeten Argumenten, in Einklang zu bringen sein. Das Fazit, eine Datierung des pNu in der Zeit Thutmosis' IV. als wahrscheinlich, aber als nur nicht gesichert anzusehen, hieße, alle bisher erarbeiteten Datierungskriterien beiseite zu schieben. Dann allerdings hätten wir vom Autor auch eine neue Argumentation zugunsten der Zeit Thutmosis' IV. erwarten dürfen. Bei der in Ägypten durch alle Zeiten geübten Praxis der Namensweitergabe zur übernächsten Generation und der Titelvererbung könnte meines Erachtens aber das Individuum Nu im Grab des Sebek-hetep viel eher ein Enkel unseres Totenbuch-Besitzers Nu gewesen sein. Diese Möglichkeit ist jedoch erst gar nicht in Betracht gezogen worden. Unter den Sequenzen und Sub-Sequenzen findet man leider nur solche wiederholt, die bereits in I. Munro, *Totenbuch*, aufgelistet sind, während spätere einschlägige Publikationen,<sup>1</sup> weitere Parallelen mit prägnanten Sequenz-Übereinstimmungen hätten liefern können.

Interessant ist der kurze Abschnitt über das Vorkommen von Sargtexten in Totenbuch-Exemplaren und das Verhältnis von Sargtexten und Totenbuch in NR-Handschriften. Der besonders in Sargtexten versierte Autor wird von einer gerade in Bonn fertiggestellten Magisterarbeit<sup>2</sup> lernen können, daß dieser Sarg (auf Innen- und Außenwänden) nicht nur nicht 'fast ausschließlich' Tb-Sprüche trägt, sondern neben den bisher identifizierten Tb-Sprüchen eine beachtliche Anzahl an Sargtexten (immerhin 12!) aufweist.

<sup>1</sup> I. Munro, *Die Totenbuch-Handschriften der 18. Dynastie im Ägyptischen Museum Cairo* (ÄA 54, Wiesbaden 1994) oder I. Munro, *Das Totenbuch des Jah-mes (pLouvre E. 11085) aus der frühen 18. Dynastie* (HAT 1, Wiesbaden 1995).

<sup>2</sup> Chr. Geisen, *Die Totentexte des verschollenen Sarges der Königin Mentuhotep aus der 17. Dynastie* (SAT 8, Wiesbaden 2004).

Bei einer insgesamt positiven Bilanzierung dieser Publikation seien mir drei kritische Anmerkungen erlaubt:

Die erste betrifft die weit ausgreifende Behandlung der möglichen Lesung des Namens des Tb-Besitzers mit sämtlichen Bezeugungen (insgesamt 10 Seiten), über deren Länge man zwar streiten könnte, deren Sinn aber für die publizierte Handschrift wohl nicht in Frage steht. Vollends abgehoben und irrelevant für den publizierten Papyrus erscheint allerdings der Appendix 1 von Thomas Schneider, der meines Erachtens in einem eigenen kleinen Artikel besser untergebracht gewesen wäre.

Der zweite Kritikpunkt betrifft die Tabelle, in der die Konkordanz von Photo-Tafel, Tb-Spruch/Sprüche und Blatt-Nummer aufgelistet ist, leider bei 20 von 88 Tafeln unkorrekt. Wahrscheinlich waren die Photo-Ausschnitte ursprünglich größer gewählt, die Veränderung aber in der Tabelle nicht nachträglich korrigiert worden.

Die dritte Anmerkung ist eher marginaler Art und betrifft die Optik der sonst durchweg übersichtlichen Darstellungsweise des Textes mit seinen vielen Tabellen: Gleich auf mehreren Seiten (S. 25, 29, 33, 50 und 52) erscheint am Ende einer Seite nur die Überschrift für einen Text, der auf der nächsten Seite steht, eine nicht gerade geschickte Textanordnung, weil bei den betroffenen ungeraden Seiten wegen des notwendigen Umblätterns man Überschrift und zugehörigen Text mit dem Auge nicht zusammen aufnehmen kann.

Meine hier genannten Kritikpunkte schmälern jedoch in keiner Weise den hohen Stellenwert, den die Publikation dieses wichtigen Textzeugen der 18. Dynastie für die Totenbuch-Forschung einnehmen wird.

IRMTRAUT MUNRO

*New Kingdom Pottery Fabrics. Nile Clay and Mixed Nile/Marl Clay Fabrics from Memphis and Amarna.* By J. D. BOURRIAU, L. M. SMITH and P. T. NICHOLSON. EES Occasional Publication 14. Pp. 95, figs, pls. 9. London, Egypt Exploration Society, 2000. ISBN 0 85698 149 4. Price £40.

In many ways it is difficult to review a book which was conceived as, and is, in essence, an article (note the comment that 'further study is essential to confirm our results and to follow up the suggestions made' on p. 32), a companion to 'Marl Clay Pottery Fabrics of the New Kingdom from Memphis, Saqqara and Amarna', by two of the three authors of the present book (J. D. Bourriau and P. T. Nicholson), published in *JEA* 78 (1992), 29–92. As the work grew too large to be published in *JEA* a decision was taken to issue this article as an Occasional Publication. It is thus to be regretted that having made this decision the EES did not reprint the earlier *JEA* article and reissue it as part one of the present publication, as constant reference is made to the article, and, in the case of Table 4 (p. 25) in particular, the reader needs to have it to hand. In any case, it is hard to understand for whom this book is intended. On page 1 it boldly states that the aim of this study is to characterize the Nile Clay fabrics in use at Memphis and Amarna, and to define criteria by which a concordance can be established between the fabric classifications used at the two sites. In this it invariably succeeds; thus Memphis G1 = Amarna I.1, etc. Both G.1 and I1, however, are equated with Vienna System Nile B2, and since the Vienna System has found widespread acceptance within Egyptological circles, being used on most modern excavations, this book appears to be nothing more than an 'internal memo' between Memphis and Amarna. Of more import to the general reader and student of Egyptian ceramics are the five questions set out later on page 1 (here paraphrased):

1. Can any of the inclusions be identified as filler as opposed to those naturally occurring in the unprocessed clay?
2. How far do the archaeologists' fabric classes correspond to different 'recipes' in the potters' paste?

3. How far is the archaeologist's definition of fabric classes influenced by variation resulting from the firing process?
4. Are fabric classes demonstrably linked to vessel shape, decoration or function?
5. How do the different methods of analysis (visual examination of a fresh break under the microscope; thin section description; grain size analysis; and chemical analysis) contribute to the answering of these questions?

These are major questions, and, of course, they have been frequently asked in archaeological literature, particularly in the realm of Meso-American ceramics—the excellent works of Anna Shepard and Prudence Rice being cases in point—but so far not within a purely Egyptological sense.

To follow the order of the book, the first pages (pp. 2–4) are devoted to the methodology of thin section analysis and data treatment. As I am no expert in this field I presume that this was professionally done and the science presented is correct, and I thus confine myself only to the archaeological inferences drawn from this data. Pages 5–12 deal with Vienna System Nile B fabrics, namely Memphis fabrics G1 and G2, and Amarna Fabrics I.1, I.3 and I.5. Of course, it must be understood that these fabrics are defined by the modern ceramicist, in this case by Janine Bourriau for Memphis and Pamela Rose for Amarna, and may or may not correspond to what the ancient Egyptians conceived of as different clays. Memphis G2 is used mainly for small dishes and rarely for cups, and the question is asked whether G2 is a fine variant of G1 or a truly separate fabric, as Bourriau supposes, whilst it is assumed by Rose that fabrics I.3 and I.5 are merely fine variants of fabric I.1. Thin section analysis appears to vindicate both ceramicists, and much is made in Appendix 3 (pp. 83–93) of comparisons between G1 and I.1, I.3 and I.5 and between the three Amarna fabrics. I am surprised, however, that no direct comparison was made between G2 and the fine Amarna version I.5, which may or may not have indicated some similarity between these two fine variants. This is perhaps the result of an unsubstantiated statement attributed to Rose (p. 5) that fabric G2 does not occur at Amarna; scientific confirmation, however, would have been valuable. It is also argued that fabric G2 was specifically selected (if naturally a finer variant), or manufactured (by the potter preparing the raw clay in a different fashion to G1), only for these thin-walled dishes which were, apparently, often used as lids and almost always bear blue-painted decoration. The illustrated example (fig. 1.1), however, is painted only on the interior, and if such dishes were used as lids, the blue-painted decoration would not be visible, which makes their primary function as lids rather debatable. It should perhaps be pointed out that the Memphis pieces from which sherd samples were taken are presented in line drawings in figures 1–2, so that the reader is able to check the functional interpretations for him/herself, whereas the Amarna samples are only typed to generalized whole shapes and the reader cannot check the accuracy of the typing. In terms of the Nile B2 fabrics, it is concluded that G1 and the Amarna fabrics I.1, I.3 and I.5 all belong within the broad category of the Vienna system Nile B2 but represent different potters' pastes, and the authors conclude that 'at present it is not possible to say for certain whether these differences would have been within the usual range of variation accepted within a paste "recipe", or were a deliberate variation on the "standard" paste recipe in order to obtain some particular effect in the finished vessels' (p.10). However, some important caveats must be made. Of the six sampled Memphis G1 sherds, only two were contemporary with those from Amarna, and the difference in paste could be chronological, but of more import is the fact that research on modern Nile clay vessels by, in particular, H. Hamroush, C. A. Redmount and M. E. Morgenstein<sup>1</sup> indicates that it is possible to define, within broad limits, where a given Nile Clay vessel was made. The result—that the pastes in Amarna and Memphis differ from one another—is surely proof, if it were needed, that the Memphis vessels were made in Memphis and the Amarna vessels in Amarna. If they had turned out to be entirely the same in material composition, then surely we would have to think in terms of a centralized pottery industry from whence vessels were sent out all over Egypt, as indeed the authors imply, probably correctly, for Marl D amphorae (p. 32).

<sup>1</sup> E.g. C. A. Redmount and M. E. Morgenstein, 'Major and Trace Element Analysis of Modern Egyptian Pottery', *JAS* 23 (1996), 741–62.



Page 13 is devoted to Vienna System Nile C, and its parallel Memphis fabric G4, though no equivalent Amarna fabric is studied. Of the four G4 samples, one, a 'bread platter' (fig. 1.10), was reclassified to G1 as a result of this study. This is perhaps significant since at Amarna such vessels were already classified under fabric I.1, albeit at the coarse end of the fabric range. A redefining of the Memphis example brings this type of vessel at both Memphis and Amarna into the same fabric class. A paragraph is then devoted to a comparison of bread moulds, as opposed to bread platters, between the two sites. It is found that at Amarna, the typical bread moulds (type fig. 3.21) are made out of a specialized fabric utilized only for such vessels (as, indeed, is the case for somewhat later New Kingdom bread moulds found at Tell el-Daba, and within the mortuary temple of Merenptah in Western Thebes). In the case of the Amarna vessels the fabric appears, as a result of this study, to be a Nile D fabric. This is contrasted with Memphis where, it is suggested, no specialized fabric was used, and the clay is of Nile C type (Memphis G4). The interpretation of the Memphis sample may, however, be incorrect. The supposed bread mould (fig. 2.8) could equally be the base of a small stand. In this respect, the drawing shows no indication of the typical smoothed inner surface found on true New Kingdom bread moulds.

Nile D fabrics—Memphis G5 and Amarna I.4—are discussed on pages 15–16, and call for little comment. It is there seen that G5 is a Vienna System Nile B2 with added limestone, whilst I.4 is a Vienna System Nile C with added limestone. This is followed by discussions of Memphis fabrics G6a and G7, which have no equivalents at Amarna since they are of different date. Fabric G7, found in early Eighteenth Dynasty levels, was utilized for Nubian (or Nubian style) cooking pots, with thin section analysis proving it to be a Nile clay, though it was impossible to say whether such bowls were true imports or made locally. Fabric G6a, on the other hand, dates from the Nineteenth and Twentieth Dynasties and was utilized most often for the production of amphorae. Visually it seems very similar to Marl D, even to the extent of having limestone particles (as mentioned on p. 17, but denied on p. 19) within the paste, but Neutron Activation Analysis (not presented in this book) indicates that this clay ought to be classified with the Nile silts. An apparent higher percentage of basalt in the clay fabric mentioned on page 18 is surely worthy of greater note than the authors give since, at least during the Middle Kingdom and Second Intermediate Period, basalt is entirely absent from Egyptian clays.<sup>2</sup> Similarly, more could have been made of the fact that a supposed Marl D amphora was found in Memphis deposit RAT 707, supposedly dating to the late Second Intermediate Period (p. 18). Since this is so much earlier than any other known example (and such amphorae are known in their thousands), this comment well deserves, at the very least, a thin section analysis to confirm/disprove that it is Marl D and, ideally, a publication of the context. Since neither is presented due to the sherd having not been sampled during this study, this entire statement should be considered unsubstantiated. The misidentification, described above on the same page, of G6a as a Marl clay, should serve as a cautionary tale.

Pages 19–24 are devoted to the enigmatic question of mixed clays. Ethnographic studies of modern Egyptian potters have shown that silt and marl clays are sometimes mixed, and it has thus been presumed that the ancients did the same, although this is hard to detect in the archaeological record. Nevertheless, Memphis fabric G6b is thought to be an example of such a mixed clay since it is clearly closely related to G6a, but has abundant fine limestone inclusions in apparent contrast to fabric G6a, which here (p. 19) is said to contain no limestone, despite what is said on pages 17–18. Indeed, as described macroscopically in this book, G6a and G6b cannot be distinguished, although marked differences show up in the thin sections (figs. 22 and 26). Following an observation by Smith that true marls had abundant carbonate particles throughout the matrix, whereas in Nile clays such particles were sporadic, it was decided to look for mixed clays by attempting to isolate clay fabrics which appeared to have an intermediate number of carbonate particles. Though one might expect limestone tempered Nile (D) clays to fall into this intermediate stage, it was clear from thin sectioning that what were obviously limestone tempered clays had a different cluster not only from true marls and true silts, but also from a fourth group, the presumed mixed clay group. As a result of this, the authors were able to postulate the existence of no fewer

<sup>2</sup> A. Pape, 'Keramik—eine schwierige Quelle: Interdisziplinäre Methoden ihrer Erforschung', *ZÄS* 118 (1991), 65–6.

than four mixed clay fabrics, though as three of them are attested by only one sample each, confirmation of these as separate mixed clay groups ought to wait until more sherd sampling has been undertaken. If a mixed clay group is accepted, as indeed seems to be the case with regard to fabric G6b, the question must be asked as to whether this mixing occurred through deliberate admixture by the potters or as the result of natural processes. Though it is not clearly stated, the impression given is that the authors believe the former to have been the case (see p. 30); the present reviewer is of a different opinion. The authors have themselves shown that the visual differences between Marl D and fabrics G6a and G6b are slight; indeed, fabric G6 (before it was sub-divided into G6a and G6b) was first thought to be a variant marl clay. The identification of fabric G6a as a Nile clay only came about as the result of neutron activation, and G6b as a mixed clay as the result of thin section analysis. The point remains that to the naked eye all three clays are very similar to each other. Moreover, as the authors themselves also point out, fabrics G6a and G6b were utilized for the same vessel shapes as Marl D, especially in the production of amphorae. In reference to vessels made with fabric G6a it is stated on page 28, 'that they were made in the same workshops as the amphorae made in Marl D. Moreover, amphorae of the same shape were also made in a mixed clay fabric (Memphis G6b). This suggests specialization in the making of amphorae defined by the vessel shape and function and not by the material' and 'we can also see that the manufacturing tradition involved in the production of amphorae belonged to that of Marl clay pottery making even when Nile clays were used'. Since no Marl D, G6a or G6b kiln sites have yet been found the first statement quoted above is somewhat puzzling. As for the second statement, I would contend that the potters who produced the amphorae in fabric G6a did not even realize that it was a 'Nile' clay. Rather, I would think that the raw clays behind fabrics G6a and G6b are natural mixtures which, to all intents and purposes, appeared to the potters to be so similar to Marl D that they were utilized as if they were Marl D! This is not as far-fetched as it may seem. Over 25 years ago Karl Butzer had already pointed out that clays laid down at wadi mouths are naturally mixed as a result of flash floods,<sup>3</sup> and this may well apply to the clays concerned here, G6a having more sand and less dissolved limestone in the matrix than G6b.

Pages 27–8 are devoted to fabric groups and vessel shapes. It is observed that meat jars and bowls, probably used as lids for the jars, were made out of both Marl D and, as defined in this book, mixed clays (G6b). On the other hand, jars, *zirs* (storage jars) and a spinning bowl were made both from Nile D clays and mixed clays, but different to the mixed clays utilized for the meat jars. Within this latter group at least, 'there is no obvious correlation here between clay, shape, and function. All the shape types in the group also occur in Nile B2 fabrics'. This appears, though it is not actually stated, to indicate that there were only two basic ceramic traditions, a Nile clay tradition including vessels made from Nile clay with deliberate lime temper (Nile D), and a marl clay tradition, with no obvious overlap between the two, which again strengthens my belief that the ancients believed G6a to be a marl clay. Although not discussed in the book under review, there also exists a small number of vessels made (usually) in a Nile B2 fabric which belong in the Marl clay repertoire, but such vessels are invariably white slipped and obvious imitations of true, marl clay vessels.

In the conclusions (pp. 31–2), the preliminary nature of the study is emphasized, and it is there stated that the studied sample series is small, but to return to the five questions raised on page 1, unfortunately none of them is specifically answered. The first is unanswered because no analysis was made of raw clay samples, hence there is no 'scientific' evidence for the addition of filler, though it is logical to assume that this was the cause, particularly for G5 and I.4 to which limestone seems to have been added. Question 2 follows the assumption that filler was indeed added to the raw clay, and since the archaeologist's fabric definitions, particularly when equated with the Nile fabrics in the Vienna System, are determined by the addition of different filler (Nile C by definition contains added chopped organic particles and Nile D added limestone), it is clear that the archaeologists' fabric definitions do correspond to different recipes. Question 3 remains unanswered since it was discovered that the differences within the Nile B2 group, which is only subdivided at Amarna (fabrics I.1, I.3 and I.5, corresponding to fabric G1 at Memphis), 'may be

<sup>3</sup> 'Egyptian Pottery Clays and Predynastic Buff Ware', *JNES* 33 (1974), 377–82.

due to different potters' methods of processing their material'. The question of firing is not addressed anywhere in the book. In answer to question 4 the authors respond with an unequivocal affirmative, but this is not entirely correct. For instance, they argue that as Memphis fabric G2 was utilized only for blue-painted bowls and cups, this is proof of a link between a fabric class, vessel shape and decoration; however, the fact that blue-painted bowls and cups are made out of different fabrics at Amarna (where, they argue, G2 does not exist) and Qantir (where a sand-tempered Nile E clay is used) indicates rather that the link noticed at Memphis is specific either to site or potter. The point is that it was not absolutely necessary to utilize such a fine fabric for the shape of the vessel or its decoration. The argument that a particular Nile D fabric is used specifically for bread moulds is negated by their own comments on page 13, where it is argued that the Memphis bread moulds are not made of such clay (though here, as noted above, this may be a false equation). That the argument is sound, however, is indicated by the fact that New Kingdom bread moulds at Tell el-Daba and Luxor are indeed made out of a vessel-specific fabric. Marl D is not, as implied here, amphora-specific; it is used for a wide variety of shapes, both open and closed, and, based on the small sample of sherds examined in this study, it is somewhat premature to argue that fabrics G6a and G6b are also amphora-specific. Indeed, in the reviewer's experience, fabric G6b is used during the Twentieth Dynasty to produce a number of different vessel types which were formerly made in Marl D clays. In this case it is probable that by the later New Kingdom, the Marl D clay beds were becoming exhausted, forcing the potters either to experiment with clay mixtures (as the authors would presumably prefer) or (as the reviewer would prefer) to look elsewhere for their sources of raw material. It is indeed true that meat jars, and what are assumed to be their lids, are only made of Marl D and mixed clays at Memphis and Amarna, but the same type of vessel is frequently found to be made from a Marl A4 fabric, especially in the south. The point concerning fabric G7, that it was only utilized for the production of bowls made in the Nubian ceramic tradition, would indeed be the only true case where a special fabric, form, function and here even decoration, are combined. However, since the authors were unable to determine whether these bowls were locally made (which would imply that a special fabric was manufactured only for the production of these Nubian style vessels) or were imports from Nubia (in which case the Memphite potters had no control over their production), the point is not proven. Question 5 is totally ignored as the book is entirely concerned with petrographic analysis, thin sections and point counts, with no comparable chemical analyses presented at all.

Finally the authors point out that, as often argued before though perhaps without 'scientific proof', the marl and mixed clays found at Memphis and Amarna are of such similar composition that they were undoubtedly made in the same place, implying a centralized industry with all that that encompasses in terms of organization and distribution, whilst the Nile clay fabrics from both sites show considerable differences, suggesting that such fabrics were made locally at each site.

The remaining 60 pages of the book are devoted to the descriptions of the individual sherd samples, and the statistical analysis of the point counts revealed by the thin sections, and their accompanying charts.

D. A. ASTON

*The Memphite Tomb of Horemheb, Commander-in-Chief of Tut'ankhamun, II. A Catalogue of the Finds.* By HANS DIEDERIK SCHNEIDER, with contributions by C. J. EYRE and Y. M. HARPUR. Excavation Memoir 60. Pp. xxii + 114, figs. (in text) 6, pls. 108 (2 in colour). Leiden, Rijksmuseum van Oudheden and London, Egypt Exploration Society, 1996. ISBN 0 85698 131 1; ISSN 0307 5109. Price £80.

This volume represents the (very much delayed) second part of the publication of Horemheb's Memphite tomb, the first having appeared back in 1989.<sup>1</sup> It is gratifying to have now the (nearly) full picture of this highly important tomb before us.

<sup>1</sup> Reviewed by M. Eaton-Krauss in *JEA* 78 (1992), 336-8.

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The book's Introduction gives an excellent conspectus of the form of the tomb, its context, and the nature of finds deriving from it. The latter span almost the whole period from the Old Kingdom to Coptic times, with only the Middle Kingdom and the first two Intermediate Periods missing. Very handily, reduced copies of plans and sections originally published in volume I are reproduced as text figures in this section, greatly aiding comprehension without the need for simultaneously manhandling both, fairly bulky, volumes. There is also an amendment to the first volume: Shafts II and III (inconsistently referred to with both upper- and lower-case roman notation within this volume) are now regarded as having been first cut in Late Period/Ptolemaic times, rather than the Old Kingdom. It would perhaps have been helpful to have been told the reasoning behind this re-dating.

A fairly detailed account is provided of the find locations of objects in the various shafts of the substructure, with some discussion. The latter includes the debate as to the date of the burial of Amenia, with the author apparently undecided between the reigns of Tutankhaten and Ay; one should note the inadequacy of the internal cross-reference in footnote 12—surely a page number is to be expected! The treatment of above-ground find-spots is less detailed—quite understandably, given the multiple reuse of the area.

The catalogue itself (Part I) is systematically arranged, split between pharaonic and Coptic material. The former begins with papyri, then moves on to ostraka, (small) stelae, funerary equipment, objects of adornment, stone and faience vessels, jewellery, seal impressions, and objects of daily and miscellaneous use. Pottery and human remains are reserved for a later volume, although this seems nowhere to be stated. Coptic material is arranged along similar lines.

Many items catalogued are not original to Horemheb's tomb but include material deriving from secondary burials, together with many 'strays' from adjacent tombs. In particular, significant objects from the tomb of the Tias are published, including one of Princess Tia's canopic jars, a number of her shabtis, and a shabti of her husband. All have also now been included as well in the publication of the Tias' tomb.<sup>2</sup> However, box fragments also bearing the princess' name, found in Shaft I, are argued possibly to derive from an original votive deposit there, rather than being 'strays'. Also belonging to a member of Ramesses II's family are two shabtis of Princess Bintanath, whose description is accompanied by an interesting discussion of whether they are votives, or whether they might indicate an early tomb of the lady at Saqqara, later superseded by QV 71.<sup>3</sup>

It appears fairly certain that Queen Mutnodjmet was buried in the tomb, a conclusion supported by objects bearing her name. One fragmentary jar bears what may be the end of a canopic formula (Cat. 261). This had been usurped from a male, and the author suggests that the jar definitely of the queen in The British Museum may also be a reused piece.

Schneider is commendably ready to provide detailed comments on the broader significance of individual objects, a good example being a bead naming the mysterious King Khabbash (Cat. 202). Here, we are treated to an excellent summary of the facts and views regarding that monarch's reign.

Beyond the catalogue, Parts II–V cover respectively a page from the *Maxims of Ani* (from the pen of Eyre), statuary, the Old Kingdom blocks from the site (by Harpur), and New Kingdom reliefs from other tombs. The latter excludes those from the adjacent tomb of the Tias, the blocks in question having now appeared in the publication of that sepulchre. On the other hand, 'stray' objects from there found within Horemheb's boundary are included both in the present volume and in the Tia publication. There is some further duplication of items published in *Horemheb* volume I, with 'major' items of statuary included there also mustered with 'lesser' pieces in Part III of the present volume. One of the latter (St. 10) confirms that a queen's calcite torso at Dendara is indeed from a statue of Mutnodjmet, rather than Nefertiry, as has been claimed by some. Part V (New Kingdom reliefs) also includes items to be published elsewhere, when the tombs from which they come are themselves eventually published. Although this could be seen as potentially wasteful, this

<sup>2</sup> G. T. Martin et al., *The Tomb of Tia and Tia: a Royal Monument of the Ramesside Period in the Memphite Necropolis* (EES Excavation Memoir 58; London, 1997).

<sup>3</sup> Cf. C. Leblanc, 'Isis-Nofret, grande épouse de Ramsès II. La reine, sa famille et Nofretari', *BIFAO* 93 (1993), 326–7.

approach is commended by the reviewer. On the one hand, it gives coherence to the book as indeed a record of all that has been found at a given site, while on the other it guards against the perils of the promissory notes that bedevil Egyptological literature. There are far too many books that one sees trailed over a period of years, only to founder through indolence, decease, disease or dispersal of material!

All objects are illustrated, with two plates in colour employed as frontispieces. A considerable number of objects appear in both photograph and line drawing, and all together complete a fine record of the tomb's finds.

The book concludes with a Concordance and Indices. The former does not, however, include any museum numbers: have no pieces at all made their way to Cairo? As a treatment of the finds from a site, the volume appears admirable in placing the objects and their context before the academic community. The only pity is the time that has elapsed between the completion of the excavation in 1979 and its emergence, exacerbated by the fact that publication of the tomb is still not concluded. Nevertheless, one should rejoice that we now have a largely-complete picture of what has been called, perhaps rightly, the most important New Kingdom tomb in the Memphite necropolis.

AIDAN DODSON

*La guerre de Ramsès II contre les Hittites.* French translation by CLAUDE VANDERSLEYEN and original German text, *Der Hettiterkrieg Ramses' II.* By J. STURM. Pp.xiv + 234, pls. 4. Brussels, Connaissance de l'Égypte ancienne, 1996. ISBN 2 87268 005 5. Price not stated.

Elegant and well organized, this volume makes a rarely cited monograph on the the great Qadesh battle of Ramesses II more widely available to the interested public. In doing this, Claude Vandersleyen has also performed a commendable service in helping to perpetuate the memory of the young savant responsible for the original work, Josef Sturm. Sturm is a little-known figure today. Even now he has no entry in the third edition of *Who Was Who in Egyptology*. Having died at the tragically early age of just 24 years in 1937, Sturm's main legacy is his work on the greatest battle of Ramesses II's Hittite wars.

Originally submitted as his doctoral dissertation at the University of Vienna in 1935, *Der Hettiterkrieg Ramses' II.* was published (in a form not fully revised) four years later, due largely to the initiative of Sturm's close friend, Heinrich Balcz. However its appearance on the eve of the Second World War, and the upheavals of post-conflict Europe, more or less doomed Sturm's principal publication to many years of subsequent neglect. That this state of affairs has now been remedied is only fitting and proper, for despite its initial appearance some 64 years ago, it remains in many ways an outstanding piece of work, especially as a first effort by one so young and at the very beginning of his academic career. Indeed, to judge by the quality of this book and the few published articles penned by Sturm, it is clear that his premature death was a major loss to both Egyptology and Near Eastern studies in general.

Vandersleyen's re-issue of Sturm's work is of enhanced value in that his reprint of the German study is prefaced by a modern French translation of the whole original text, which in turn is linked to the original pagination. This ensures uniformity with the *editio princeps* of 1939 and is therefore far easier to use and to consult. The text is in a clear typescript throughout and is in every way an admirable example of book production. In addition to the bilingual text and a bibliography of the books and papers quoted by Sturm, there are indices of cited texts and plates, a general index, four colour plates of battle-scenes from the Ramesseum (curiously, these are detached from the main body of the book) and a modern map (after an original by Arnulf Kuschke) of the topography of ancient Qadesh (modern day Tell Nebi Mendu) and the surrounding terrain.

Despite the fact that both time and scholarship have marched on relentlessly since 1939, a great many of Sturm's findings remain valid and convincing today. Clearly he worked very industriously at his theme and was thoroughly abreast of the latest historical research of the time. However, there are

one or two important facts relating to his original study which were unknown in the 1930s. Foremost in this regard is that next to nothing was known on the year 5 Qadesh campaign from Hittite cuneiform sources when Sturm undertook his research. Important new material from these sources, edited and published in recent years by Elmar Edel, deals with the immediate aftermath of the famous battle.<sup>1</sup> These cuneiform texts establish that after the effective stalemate induced by two days of intensive fighting the Hittite emperor, Muwatallis II, pursued the retreating Ramesses II down the Biqa valley (the high-level defile lying between the Lebanon and Anti-Lebanon) after the latter had crossed the Orontes river with his armies, perhaps at Shabtuna. The Egyptian pharaoh only escaped from this precarious situation by crossing over the mountains of central Lebanon to reach the Phoenician coast, most probably at Sidon.<sup>2</sup> Fearing an ambush in the unfamiliar territory of the mountainous Lebanon range, Muwatallis wisely broke off his pursuit and headed for home, honour satisfied.

Even in Sturm's own day (so *Der Hettiterkrieg Ramses' II.*, 169) just such a chase scenario had been suspected, and openly suggested by Albrecht Götze, but without conclusive evidence. Now the matter is beyond any real doubt. From Sidon (?) Ramesses would then have moved off southward through Canaan, reaching the Nile Delta and his principal residence at Pi-Ramesses, through the Sile frontier, early in his sixth regnal year. Doubtless he arrived home a chastened and more thoughtful military commander after a campaign which in large part had been a political near-disaster and which had been saved only by his personal heroism on the first day of fighting.

New revelations such as the above have added to the overall picture of our topic, and even at the time of writing a potentially important new discovery at Karnak may further elaborate the story of Ramesses II's battle for Qadesh. While collating the reliefs on the south exterior wall of the Hypostyle Hall, which depict Ramesses II's wars in Syria, including an earlier erased version of the year 5 battle of Qadesh, Peter Brand and members of the Karnak Hypostyle Hall Project team have apparently found that within the so-called 'Bulletin' version of the Qadesh text inscribed there, there are new phrases and variants not known from any of the other attested versions of this inscription.<sup>3</sup> The final published results of these new discoveries are awaited with the keenest interest, as, no doubt, Josef Sturm would have done were he still alive.

To conclude, this re-edition of Sturm's work on the great Qadesh campaign of Ramesses II is to be welcomed above all in that it is a well-produced handbook edition of an important historical text. Many old works do not deserve to be reprinted as they are hopelessly outdated and irrelevant in the modern world (most notably the unnecessary reprints of some of Budge's error-ridden works). Sturm's remarkable and highly convenient study from 1939 is one that does, as Claude Vandersleyen has had the good sense to recognize. This volume represents a praiseworthy accomplishment all round.

A. J. PEDEN

*Die datierten und datierbaren Ostraka, Papyri und Graffiti von Deir el-Medineh.* By †WOLFGANG HELCK. Edited by ADELHEID SCHLOTT. Ägyptologische Abhandlungen 63. Pp. 573. Wiesbaden, Harrassowitz, 2003. ISBN 3 447 03586 2. Price Euros 150.

The late Professor Helck had wide interests in the field of Egyptology and wrote extensively on a variety of subjects covering religion, literature, and history. It is perhaps fitting that this volume, published ten years after his death, is concerned with one topic to which he devoted much time, namely chronology. It deals in particular with the chronology of the documentation from Deir el-Medina which impacts on the dating of the reigns of the rulers of the Nineteenth to Twentieth

<sup>1</sup> E. Edel (ed.), *Die ägyptisch-hethitische Korrespondenz aus Boghazköi in babylonischer und hethitischer Sprache*, I (Opladen, 1994), 58–69.

<sup>2</sup> See now on this K. A. Kitchen, *Ramesside Inscriptions, Translated and Annotated: Notes and Comments*, II (Oxford, 1999), 48 and Map 11.

<sup>3</sup> L. Giddy, 'Digging Diary 2001–2002', *Egyptian Archaeology* 21 (Autumn 2002), 32.

Dynasties. The subject has been covered before by Manfred Gutgesell in two volumes, published in 1983 and 2002 (the second reviewed by me in *JEA* 88 (2002), 271–2), the latter of which was not available in published form to the author or editor of this study although it is not clear if either saw his manuscript, which had been written before 1983.

After the table of contents (pp. 5–6), there follow brief forewords by the editor of the series, the editor of the book, and Professor Helck himself (pp. 7–9), a list of abbreviations (pp. 11–13), and a brief bibliography (pp. 15–16). As this work was largely written up by 1993, it is obvious that the work of the last decade in analysing the documents of Deir el-Medina has not been included although it is more up-to-date than the work of Gutgesell. The provenances, mostly from museums or private collections, and accession numbers and dates of the ostraca, papyri, and graffiti used in this study are then given (pp. 17–28), but the dating is deceptive since most of the royal names are in fact *deduced* by Helck and but not actually written on the documents themselves. It would perhaps have been preferable to have placed this list after the main study when this fact would have been more obvious and the reader would already have been able to understand the reasoning behind the dating. After a few more pages of notes and a chronological list of Deir el-Medina foremen (pp. 31–4), a brief listing of corrections to the dating of ostraca in D. Valbelle, *‘Les ouvriers de la Tombe’: Deir el-Médineh à l’époque ramesside* (BdE 96; Cairo, 1985) is given, as well as an attempt to cite the provenance of some of the ostraca following the work of C. N. Reeves (*Valley of the Kings: The Decline of a Royal Necropolis* (London, 1990), (pp. 35–6). It is not clear why the remarks about Valbelle’s work could not have simply been given under their appropriate entries in the main study, where their re-dating is mentioned again. The find-spots in the Valley of the Kings have important chronological implications and would be worthy of more detailed study in the future.

The main body of the work (pp. 37–573) consists of the reign-by-reign listing of the dated documentation from Sethos I to Ramesses XI. Each regnal section begins with a note of the accession date of the king when known, though as many are far from certain, only the possible limits can be indicated. However, J. Janssen has recently made clear<sup>1</sup> that he, for one, has doubts about the general accuracy of the scribes at Deir el-Medina, and that using their documents to determine accession dates is fraught with uncertainty. The documents of each reign are then listed in chronological order with short indications of the reasoning for the dating as required. Finally, the documents are either translated or, if extensive groupings of names, summarized in chart form. The translations are a very important contribution both to Egyptologists and non-Egyptologists for the study of the history, economy, and society of Deir el-Medina and Ramesside Egypt. The documents, of course, contain the names of the workmen, which are vital to the dating of the documents themselves. Still, the dating of some documents without regnal names and of those with names which might be assigned to differing reigns, must remain uncertain in default of unimpeachable evidence. Helck’s dating of documents to Sethos I may be correct but it is open to question since it appears to be based solely on ‘ähnlichkeit’ to only one securely dated ostrakon of that reign. Dating by palaeography is problematic, and the names on these ostraca could just as well suit the early reign of Ramesses II. Again, the contentious graffito 1860 of a year 8 has been dated to Ramesses X by me,<sup>2</sup> to Ramesses VI by Lanny Bell,<sup>3</sup> and now to Ramesses VII by Helck. Only further information on the careers and life-spans of the officials named could establish a firm dating.

It is obvious that further research will enable modification of a few of the suggestions put forward by Helck, but until major new evidence is discovered, his observations will largely stand. What is needed is full publication of many of the ostraca which are known solely from transcripts, usually made by Černý and later published by K. A. Kitchen, as well as publication of those documents which still remain unread and untranscribed in museum collections. Corrections to published ostraca and transcriptions of unpublished ones can now be found in ‘The Deir el-Medina Database’ ([www.leidenuniv.nl/nino/dmd/dmd.html](http://www.leidenuniv.nl/nino/dmd/dmd.html)). The importance of unpublished material is underlined by the recent publication of an ostrakon recording the execution of the chancellor Bay

<sup>1</sup> ‘Once Again the Accession Date of Ramesses IX’, *GM* 191 (2002), 59–66.

<sup>2</sup> M. Bierbrier, ‘A Second High Priest Ramessesnakht?’, *JEA* 58 (1972), 195–9.

<sup>3</sup> ‘Only One High Priest Ramessenakht and the Second Prophet Nesamun His Younger Son’, *Serapis* 6 (1980), 7–27.



in year 5 (presumably of Siptah).<sup>4</sup> There is also the possibility of new discoveries of ostraca such as those from recent excavations in the Valley of the Kings, which may revise or confirm Helck's conjectures. It is to be hoped that his important work will not remain the last word on the subject.

M. L. BIERBRIER

*Elephantine, XX. Der Chnumtempel Nektanebos' II.: Architektur und baugeschichtliche Einordnung.* By WALTER NIEDERBERGER. Archäologische Veröffentlichungen 96. Pp. 145, pls. 40, and plan. Mainz, Philipp von Zabern, 1999. ISBN 3 8053 2542 8. Price Euros 92.50.

The twentieth publication of the DAIK excavations at Elephantine is a detailed archaeological and architectural presentation of the Thirtieth Dynasty temple of Khnum, investigated between 1969 and 1997, thus providing the context for the relief fragments already published in H. Jenni, *Elephantine, XVII. Die Dekoration des Chnumtempels auf Elephantine durch Nektanebos II.* (AV 90; Mainz, 1998). Additionally, the book represents an update on H. Ricke's monograph, *Die Tempel Nektanebos II. in Elephantine und ihre Erweiterungen* (BABA 6; Cairo, 1960), as the results of the last three decades of work at Elephantine have significantly modified our understanding of the building history at the temple of Khnum. The atypical nature of such archaeological evidence deserves highlighting: it is rare that a stone temple of any pharaonic period is in the particular state of preservation that allows analysis of the foundations, yet also reveals the plan and elements of the wall decoration and architecture, with a clearly visible relationship to the adjacent urban environment. This is particularly true of the Late Period: significant temple structures of this period are often concealed by remains of the Ptolemaic and Roman Periods.

Following an introduction to Late Period history and the evolution of Elephantine, the core of the book is taken up by the publication of the basic architectural data, on the temple proper (Part 2), the sacred precinct (Part 3), architectural elements (Part 4) and the three monolithic naoi set up in the sanctuary area (Part 5). Subsequent sections cover building techniques (Part 6), and the process of decay and destruction (Part 7). An interpretative chapter considers architectural developments throughout the first millennium BC, and similarities between the temple at Elephantine and those at other sites (Part 8). The volume concludes with appendices summarizing new temple structures from the late Ramesside era to the Roman Period, and known examples of *wabet*-chapels and temple staircases. An English summary is also included.

Typically for this series, the text is interspersed with high quality drawings, showing plans, sections and elevations, and axonometric projections of relevant areas. The black and white photographs gathered as plates at the rear of the book are also of impeccable quality, and include some archival images from the French work of 1906. A small point for criticism lies in the inconsistent use of scale in the new photography: some images of architectural features do not include a scale. Finally, credit is due to both author and publisher for the fold-out plan (pl. 40) that can be consulted alongside the text, without the need to turn pages repeatedly.

Despite the modest appearance of the temple remains today, this study shows how much can be extracted through careful excavation and recording. The temple's foundations were set into the rubble of earlier periods, and featured mud-brick and sandstone foundation walls (up to 4 m deep in places), subsequently filled with nearly 1900 cubic metres of clean sand, apparently levelled with water (pp. 93–5). The upper faces of the top foundation course were incised with the outlines of the walls to be built above (p. 95); some blocks were marked with a line representing the intended temple axis (p. 99). Unfortunately, Niederberger does not take the opportunity to compare the nature of foundation levels investigated at other Thirtieth Dynasty sites such as Tell el-Balamun, Tanis and el-Ashmunein, or even to earlier foundations that are well preserved, like those at Mendes. Symmetry in the internal room layout was evidently of paramount importance. However, due to the extra thickness of the outer south wall (necessary to house the staircase and

<sup>4</sup> P. Grandet, 'L'exécution du chancelier Buy', *BIFAO* 100 (2000), 339–46.

crypts), this could only be achieved with a shift of the axis 41 cm to the north of the true middle axis (pp. 20–1). In a building of this width, such a shift would be unnoticeable, but underlines the importance of proportions and layout in ensuring a cult temple was effective (the proportional system used in each room is also discussed, pp. 103–6). The layout and structure (where known) of each room and doorway is discussed in detail, including the crypts located within the wall thicknesses and cachettes set into the floor of the main columned hall (pp. 40–1). The recovery of small stone fragments has allowed the nature of the windows to be reconstructed, including roof openings and small light shafts (pp. 54–5, 84). The detailed folding plan of the temple's excavated remains, included as loose-leaf, will allow future researchers to ascertain quickly which parts of the reconstruction are based more on Niederberger's interpretation than the primary archaeological evidence (throughout the book, the author frequently illustrates several possibilities for reconstruction, e.g. for the entrance to the stairwell or the layout of the rear rooms).

The range of materials used in temples of this period, as well as the specific uses for each material, deserves to be highlighted. The core temple structure was built of sandstone (including re-used blocks in the foundations, p. 93), with granite used for the door-jambes upon the temple axis and the ceilings above the central sanctuary and antechamber. This would have created a striking visual impression, particularly after painting and gilding of certain decorated surfaces, including granite.<sup>1</sup> Such information from Elephantine reminds us that the quantity of hard stone preserved at some Delta sites is misleading: many of these Late Period temples were built largely of limestone, now attested through areas of chippings, as found at Samanud, Tell el-Balamun and Tell el-Muqdam.<sup>2</sup> Recent work at Tell Tebilla also suggests the presence in ancient times of a temple built largely of limestone but with considerable amounts of granite.<sup>3</sup> Three naoi were set up at the core of the temple of Khnum at Elephantine: one of red granite (originally measuring 4.4 m in height), one of granodiorite and another of black diorite. Despite the number of naoi preserved from the reigns of Nekhtnebef and Nekhtorheb (e.g. Cairo CG 70012–22),<sup>4</sup> Elephantine still represents the only site where these have been found in a manner which allows them to be assigned to specific sanctuaries. At sites such as Bubastis, there is considerable debate about how many naoi were included in the Thirtieth Dynasty temple, and how these were arranged. I am currently undertaking a study of the large naos from this site (British Museum EA 1078–80 and 1005, and CG 70016), thus far only partially published as line-drawings.<sup>5</sup>

Such large temple building projects do not happen in a sacred vacuum: the expansion of the temple area with respect to its New Kingdom/Saite predecessor necessitated cutting through areas of the Aramaic town to the rear, or west, of the temple (the Nile prevented further expansion eastward). This report features details of the wall built to outline the temple site, effectively delineating the new, enlarged, sacred area. Niederberger notes how the focal point of Elephantine had become religious, with bureaucratic and military institutions probably based in Aswan itself. As Elephantine is one of very few sites where temple and contemporary settlement have been excavated with modern rigour, it is unfortunate that this aspect was not discussed in more detail, as it follows on naturally from the foundation of a new temple. Surprisingly, there is no plan showing the temple in its urban context, or even a map of Elephantine.<sup>6</sup> Though this may be deemed unnecessary for those familiar with the previous volumes and the lengthy reports

<sup>1</sup> As illustrated in Jenni, *Elephantine* XVII, 23–5, pls. 113–14.

<sup>2</sup> See N. A. Spencer, 'Samanud: The Urban Context', *JEA* 87 (2001), 25, n. 9 with references.

<sup>3</sup> G. D. Mumford, 'Reconstructing the Ancient Settlement at Tell Tebilla', *ARCE Bulletin* 182 (Spring–Summer 2002), 22.

<sup>4</sup> Note the recent discovery of a quarry site for naoi of this period: J. A. Harrell, 'Pharaonic Stone Quarries in the Egyptian Deserts', in R. Friedman (ed.), *Egypt and Nubia. Gifts of the Desert* (London, 2002), 240–1.

<sup>5</sup> E. Naville, *Bubastis* (MEEF 8; London, 1891), pls. xlvii–xlviii.

<sup>6</sup> For a map of the contemporary housing, readers could consult D. Aston, *Elephantine*, XIX. *Pottery from the Late New Kingdom to the Early Ptolemaic Period* (AV 95; Mainz, 1999), 248, fig. 10; the most recent monograph with a map showing the position of the temples is E. Laskowska-Kusztal, *Elephantine*, XV. *Die Dekorfragmente der ptolemäische-römischen Tempel von Elephantine* (AV 73; Mainz, 1996) (with a folding map at the back).

published in *MDAIK*, I find this a rather basic omission in any archaeological publication. Unfortunately, this book appeared too early fully to take into account the small structure ('temple A') discovered north of the Khnum temple, which was probably used as a temporary cult place during the construction work of the Thirtieth Dynasty.<sup>7</sup>

An interesting aspect not discussed is how the topography of the site may have dictated a different approach to the sacred enclosure than that visible at other contemporary sites. This is particularly noticeable in terms of the small extent of the enclosure. For example, there is little room for structures on casemate foundations to have been aligned to the main temple axis. These are familiar from temples at other sites, whether sacred storehouses,<sup>8</sup> peripteral shrines<sup>9</sup> or the larger platforms thus far only known from Delta temple enclosures.<sup>10</sup> This topography may also have affected the plan of the temple itself. Niederberger notes (p. 45) that the *wabet*-chapel was accessed from the first columned hall, rather than the antechamber to the sanctuary as in Ptolemaic temples; the loss of Thirtieth Dynasty temple plans at more spacious sites such as el-Ashmunein, Tanis and Tell el-Balamun hinder any further investigation of this theme.

Part 6 focuses on building materials and methods, from foundation levels to the preparation of blocks to receive decoration. The temple provides securely dated evidence for certain construction methods previously thought to have been introduced in the Ptolemaic era, particularly the bands scratched on upper surfaces of masonry to receive a layer of mortar (pp. 94–100), or the use of exactly fitting masonry, rather than filling wall cavities with rubble (p. 103). The author also devotes attention to tool marks on the blocks, and suggests the types of implements which may have been used during transport and levering of the blocks into place (pp. 101–2, fig. 59).

Like many Thirtieth Dynasty structures, the temple was not finished before the country was subjected to a second period of Persian occupation. Unfinished parts include the enclosure wall, two of the naoi and much of the relief decoration. This should not be seen as a reflection of an over-stretched weak central government, struggling to fend off a series of three foreign invasions while undertaking a nationwide building programme. Instead, Nekhtnebef and Nekhtorheb seem to have erected new temples, or made significant additions to existing buildings, at nearly every major site in Egypt.<sup>11</sup> At some sites, an existing structure was destroyed and a new temple erected in its place; this occurred at Elephantine, as well as at Tanis,<sup>12</sup> Tell el-Balamun<sup>13</sup> and Hermopolis Magna.<sup>14</sup> The building of massive enclosure walls, using a construction technique first attested at this period,<sup>15</sup> was a notable facet of this programme, and it is worth noting how domestic structures within temple enclosures were often removed during this period. This is attested

<sup>7</sup> W. Kaiser et al., 'Stadt und Tempel von Elephantine. 21./22. Grabungsbericht', *MDAIK* 55 (1999), 145–8.

<sup>8</sup> C. Traunecker, 'Les "temples hauts" de Basse Époque: un aspect du fonctionnement économique des temples', *RdE* 38 (1987), 147–62.

<sup>9</sup> As known from a depiction upon an offering table; see H. Ricke, 'Eine Inventortafel aus Heliopolis im Turiner Museum', *ZÄS* 71 (1935), 111–33. Structures excavated at Tell el-Balamun may have fulfilled a similar function: A. J. Spencer, *Excavations at Tell el-Balamun 1995–1998* (London, 1999), 45–56.

<sup>10</sup> A. J. Spencer, 'Casemate Foundations Once Again', in A. Leahy and J. Tait (eds), *Studies on Ancient Egypt in Honour of H. S. Smith* (EES Occasional Publications 13; London, 1999), 295–300.

<sup>11</sup> The basic source is still F. K. Kienitz, *Die politische Geschichte Ägyptens von 7. bis zum 4. Jahrhundert vor der Zeitwende* (Berlin, 1953), 199–230. Excavations in the last fifty years have revealed further Thirtieth Dynasty temple structures, see Jenni, *Elephantine XVII*, 87–100, and D. Arnold, *Temples of the Last Pharaohs* (Oxford, 1999), 93–134. A complete catalogue is included in my PhD dissertation, currently being prepared for publication: *Sustaining Egyptian Culture: Royal and Private Temple Building Initiatives in the First Millennium B.C.* (University of Cambridge, 2000).

<sup>12</sup> Temple of Khonsu; cf. J. Yoyotte and P. Brissaud, 'Mission Française des Fouilles de Tanis. Rapport sur les XXVe et XXVIe campagnes', *BIFAO* 78 (1978), 105–17.

<sup>13</sup> A. J. Spencer, *Excavations at Tell el-Balamun 1991–1994* (London, 1996), 36–42.

<sup>14</sup> A. J. Spencer, *Excavations at el-Ashmunein, II. The Temple Area* (London, 1989), 71–3.

<sup>15</sup> J.-C. Golvin et al., 'La grande enceinte à assises courbes de Karnak', *CRAIBL* (1990), 917–34.

archaeologically<sup>16</sup> and also through private statue inscriptions.<sup>17</sup> Both aspects amount to an expansion and re-emphasis of sacred space. These wider aspects of the Thirtieth Dynasty construction programme are evidently outside the purpose of the Elephantine volume, but Niederberger does propose one perplexing theory. Considering the monuments of Nekhtnebef at Philae and the temple of Nekhtorheb at Elephantine, he concludes that these kings had to concentrate on one of these sites at the expense of the other, for such kings residing in the Delta would not have had the ability to conduct two large projects. Such an argument relies rather too much on the vagaries of preservation. Nekhtnebef erected a large gate upon Elephantine, possibly an addition to the standing Saite structure. His work at Philae amounts to a gate and portico (later re-used as a kiosk), but whether this formed part of a new temple or was simply an extension of the Saite structure, attested in blocks re-used in the Ptolemaic foundations, is unknown. Evidence from elsewhere in Egypt suggests temple building sites in close proximity were not ruled out at this period (Karnak, Luxor, Medinet Habu, Medamud and Tod experienced construction under Nekhtnebef; Nekhtorheb built significant structures at Samanud, Behbeit el-Hagar and possibly Busiris).

This volume devotes a commendable amount of space to the later history of the temple, in particular the modifications in Ptolemaic times. It is interesting to note that the construction of a forecourt, so clearly part of the original plan, did not occur for several centuries; modern reconstructions of temple precincts often fail to acknowledge the fact that the ancient Egyptians evidently came to terms with such a state of incompleteness (which cannot all be ascribed to political or military turmoil). Few studies of Egyptian structures have dedicated detailed attention to the processes of decay and destruction, though these often occurred in ancient times, and thus would have formed part of the experience of those living in close proximity. In this case, the destruction occurred in the early Coptic era (as dated by ceramics found in robbed out foundation trenches, p.110) when part of the site was occupied with dwellings. Niederberger presents a summary of how the western section of the temple sank into the settlement deposits into which it had been founded, with a break occurring along the line of a significant mud-brick wall of the Old Kingdom town, clearly demonstrated by cracks in the foundation masonry. This may well have been an unusual situation. Elephantine is a distinct site in many ways, not least in having its late temple built high on levelled fill of an earlier era. Elsewhere, the floor level of temples stayed relatively constant from the New Kingdom onwards (as clearly illustrated at sites like Buto and Edfu, where settlement deposits rise in areas immediately adjacent to the temple precincts). Did the unusual topography of the site preclude the preservation of near-original levels for later temples? In addition, the location of the town, originally upon two islands,<sup>18</sup> precluded expansion eastwards, further favouring a build-up of structural and settlement remains.<sup>19</sup> Stone robbers focused on sandstone at Elephantine, it being easier to re-use than granite; temples further north typically suffered from the removal of limestone for burning.

Broader, interpretative discussion is mostly confined to Part 8, 'Baugeschichtliche Einordnung'. This chapter focuses on three aspects of temple plans, excurses on prior developments, and the influence these had on buildings of the Ptolemaic and Roman eras. The elements of temples discussed are: the development of a 'Grundrisstyp' in the Thirtieth Dynasty, the introduction of a perambulatory around the sanctuary, and the move from an open-air room associated with Re to a *wabet*-court, with a chapel reached by steps (the Elephantine temple as

<sup>16</sup> The Thirtieth Dynasty temple foundations cut into domestic debris and kilns at Tell el-Balamun (Spencer, *Balamun 1991-1994*, 37).

<sup>17</sup> A clear example from shortly after the Thirtieth Dynasty is in the inscription upon the healing statue of Djedhor, Cairo JE 46341: E. Jelínková-Reymond, *Les Inscriptions de la statue guérisseuse de Djed-Hor-'le Sauveur'* (BdE 23; Cairo, 1956), 101-5. For a likely parallel upon a Thirtieth Dynasty statue, see J. Vercoutter, 'Les Statues du General Hor, Gouverneur d'Hérakleopolis, de Busiris et d'Héliopolis', *BIFAO* 49 (1950), 86, 89 n. (t).

<sup>18</sup> Kaiser et al., *MDAIK* 55, 104, fig. 1.

<sup>19</sup> In contrast, at Memphis, due to the movement of the Nile, new land seems to have been available for temple and palace complexes in the early New Kingdom: D. Jeffreys and A. Tavares, 'The Historic Landscape of Early Dynastic Memphis', *MDAIK* 50 (1994), 158.

reconstructed by Niederberger represents the earliest known example). While admitting (pp. 114–17) the lack of sources for tracing a development from the late New Kingdom temple plans to those of the Thirtieth Dynasty, Niederberger bases his notion of a typical ‘Thirtieth Dynasty temple plan’ on a mere two sites: Elephantine and Behbeit el-Hagar. On pages 117–18 he compares the two plans, a speculative enterprise at best, considering our present knowledge of the latter’s layout. Niederberger criticizes Favard-Meeks’ plan of Behbeit el-Hagar (pp. 117–18, n. 691), though this was ‘obligatoirement, partiel et provisoire’, based on the distribution of reliefs upon the ground and the plan published in the *Description de l’Egypte*.<sup>20</sup> Nonetheless, Niederberger is correct in expressing doubt that one of the hypostyle hall columns was omitted to allow space for a staircase to the roof; this seems a very un-Egyptian solution to accommodating elements within a sacred space. Until the clearance and possible excavation of the foundations have been undertaken, the ‘plan’ of the Behbeit el-Hagar temple should not be used to support any theories on Egyptian temple architecture and layout. One of the central features of the Khnum temple arrangement of the gods’ naoi underlines how much variation is attested in Late Period temples. At Elephantine, excavations have revealed three adjacent rooms for monolithic shrines; at Bubastis we know there were at least seven monumental naoi in the Thirtieth Dynasty temple. Other sites provide further solutions: the Saite temple at Mendes featured four naoi seemingly arranged in a central court.<sup>21</sup>

Niederberger’s interpretation of the perambulatory around the sanctuary as an architectural expression of magical protection is plausible. However, it is possible that this development happened earlier in the Late Period, but few temple plans have survived. It is interesting to note that the tripartite sanctuary at Elephantine is not a separate structure, as at Behbeit (p. 85) and in Ptolemaic temples. Furthermore, such ‘protective architecture’ fits in with other aspects of the contemporary building programme (particularly the expansion in area of many temple precincts and the provision of monolithic stone naoi within sanctuaries). The erection of a stone enclosing wall around the temple proper probably performed the same role, ensuring a level of sanctity beyond that provided by the massive brick *temenos* walls.<sup>22</sup> Niederberger proposes that these architectural developments were a reaction to the threat posed by foreign cultures and military power, effectively a consequence of the preceding periods of foreign occupation (p. 12), echoing the theories put forward by Assmann.<sup>23</sup>

The construction programme of the Thirtieth Dynasty is notable for its scope but also for the varying treatments imposed on sites: at Elephantine, Hermopolis Magna and Tell el-Balamun, the principal temple was dismantled to pave the way for a new structure. Elsewhere, additions, embellishments, renewal inscriptions, usurpations and renovations were deemed sufficient. In particular, there was a focus on doorways, entrance porticoes and sacred avenues. Thus, it is difficult to envisage a more uniform internal plan at temples throughout Egypt. Indeed, at all periods, a response to local cult and topographical conditions seems to have been foremost in the architects’ minds. Niederberger (p. 128) believes such variations were more prevalent in Roman times, citing el-Qala. However, our knowledge of large Ramesside temples (cf. p. 113) is largely confined to Thebes (especially royal mortuary temples), with no complete plan yet recovered from the Delta, the political and royal centre of the country at the period. With a similar silence from the archaeological record of the Third Intermediate Period and Saite era, and the above-mentioned

<sup>20</sup> As stated by C. Favard-Meeks, *Le temple de Behbeit el-Hagara. Essai de reconstitution et d’interprétation* (SAK Beihefte 6; Hamburg, 1991), 300.

<sup>21</sup> D. P. Hansen, ‘The Excavations at Tell el-Rub’a’, *JARCE* 6 (1967), 5–9. Niederberger does cite these variations in sanctuary layout, yet still prefers to see a standard Thirtieth Dynasty temple plan (p. 119).

<sup>22</sup> Niederberger states this is the first known example of a stone enclosure (p. 126), but the remains of such a wall may have been found at Tanis: P. Brissaud, ‘Les principaux résultats des fouilles récents à Tanis (1987–1997). L’émergence d’une vision nouvelle du site’, in P. Brissaud and C. Zivie-Coche (eds), *Tanis. Travaux récents sur le Tell Sâh el-Hagar* (Paris, 1998), 20, pl. 4 [b]. In *Anhang* 1, Niederberger only cites the publications of Montet with respect to Tanis; recent work has allowed significant modification of many of his interpretations.

<sup>23</sup> J. Assmann, ‘Der Tempel der ägyptischen Spätzeit als Kanonisierung kultureller Identität’, in J. Osing and K. E. Nielsen (eds), *The Heritage of Ancient Egypt. Studies in Honour of Erik Iversen* (Copenhagen, 1992), 9–26.

variations in temple layout known from the Thirtieth Dynasty, I believe assuming such a degree of uniformity in temple plans is untenable.

Appendix 1 features a list of new temple foundations from the time of Ramses III through Antoninus Pius (pp. 11, 132–6). Niederberger explicitly states that additions and embellishments to sanctuaries, and mammisis and bark stations are not included. Though very useful, in particular the use of bold type to indicate those temples whose internal plan is known, and the provision of a fold-out figure 62 which features a series of temple plans reproduced at the same scale, I have some reservations. Concentrating on the Thirtieth Dynasty section, many of the sites listed have not yielded sufficient archaeological evidence for us to state unequivocally that a new temple was erected in the Thirtieth Dynasty. While the temples at Samanud, Behbeit el-Hagar, that of Nehematawy at Hermopolis Magna and the structure erected by Nekhthorheb at Bubastis may all have replaced earlier structures, there is no explicit evidence for the nature of the preceding sanctuary at these sites. Nonetheless, these can plausibly be described as new Thirtieth Dynasty temples. For many other temples in the list, there is simply far too little evidence for any such statements to be made. One example will suffice. Niederberger cites the el-Masara quarry inscription as evidence for a new temple erected by Nekhthorheb at el-Baqlieh (Hermopolis Parva), though the inscription only states that the quarrying was ‘to undertake excellent work in the temple of Thoth’. This temple is not archaeologically attested at el-Baqlieh, so it cannot be stated that Nekhthorheb founded a new structure. Indeed, Nekhtnebef had already been active at the site.<sup>24</sup>

Early Ptolemaic temples exhibit many of the same features as their Thirtieth Dynasty antecedents (pp. 123–7); this provides a nice parallel to the similarities in sculptural and relief styles. The practical advantages of using Thirtieth Dynasty temples as a prototype is duly noted: many earlier monuments were not standing (p. 122). It is interesting that links to a more ancient past are suggested in temples of the later Ptolemaic Period.<sup>25</sup>

In conclusion, I would like to reiterate the immense value of this book, which provides a glimpse at the aims and methods of Thirtieth Dynasty temple building, as attested at the site of Elephantine, but also the effect such building work had on the surrounding town, and the final stages of a building’s history, destruction. Niederberger asserts the simultaneously traditional and innovative nature of Thirtieth Dynasty temple construction, as seen at one site.

NEAL SPENCER

*Ancient Naukratis, II. The Survey at Naukratis and Environs. Part I. The Survey at Naukratis.* By WILLIAM D. E. COULSON. Oxbow Monograph 60. Pp. xvi + 202, pls. 21. Oxford, Oxbow, 1996. ISBN 1 900188 22 8. Price £30.

The survey of Naukratis and the area to the north and west of the ancient city (located at Kom Geif) started in December 1977 and ended in 1983. The work builds on the earlier excavations of the site by Flinders Petrie, Ernest Gardner and David Hogarth, and this volume concentrates on the survey in the immediate vicinity of Naukratis. It should be noted that the text of the volume was completed in 1987 and has been revised by Iphigeneia Leventi, and that the description of the Naukratis survey presented in Astrid Möller, *Naukratis: Trade in Archaic Greece* (Oxford, 2000), 93–4, now needs to be revised.

<sup>24</sup> Cf. L. Habachi, ‘Notes on the Delta Hermopolis’, *ASAE* 53 (1955), 448–56, 465–6; also add a statue now in Madrid (M. de C. Perez Die, *Museo Arqueológico Nacional. Egipto y Próximo Oriente. Salas XIII y XIV* (Madrid, 1991), 103–4, fig. 11); a torso recently seen at auction (*Antiquities and Islamic Art. New York, June 4, 1998* (Sotheby’s Sale Catalogue, New York), no. 67); and the lions in the Vatican (PM VII, 414). The latter three objects’ provenance is suggested by their inscriptions.

<sup>25</sup> S. Sauneron, ‘Le dégagement du Temple d’Esné: mur nord’, *ASAE* 52 (1954), 37; F. Daumas, ‘Derechef Pépi Ier à Dendara’, *RdE* 25 (1974), 13–15.

The methodology of the survey is presented (Chapter 2), though previous discussions can also be found in W. D. E. Coulson and A. Leonard Jr., *Cities of the Delta*, I. *Naukratis* (Malibu, 1981).<sup>1</sup> The area round the lake to the north-west of Kom Geif was divided into strips 5 m in width (Area A) and 10 m in width (Areas B–E). The falling level of the lake provided opportunity to study further areas. It should be noted that ‘only the diagnostic sherds in each strip were collected’ (p. 5), though what should be considered ‘diagnostic’ is subject to the perceptions of those in the field. The geological investigations around Naukratis are presented by Cathleen A. Villas (Chapter 6), who notes sea rises during the Ptolemaic Period which ‘may have drowned the delta plain in the vicinity of Naukratis’ (p. 171).

The earliest piece of pottery found by the survey comes from a Chian bowl or *cothon* (no. 55) and was found on the south-west perimeter of the lake (Area A). It is noteworthy that for a site which has yielded large quantities of archaic Greek pottery through excavation, relatively little of such material was found during the survey. A parallel can be drawn from the Greek settlement at Euesperides (near Benghazi) in the Cyrenaica, where the earlier survey only recorded occupation from the mid-fifth century BC onwards, whereas excavation now suggests occupation from the late seventh century. A density map for recovered sherds would have been helpful in this volume, showing concentrations of Hellenistic, imperial Roman and Late Roman material. Concentrations of Hellenistic black-glossed—a term this reviewer prefers to ‘black glazed’ found in this volume—material have been noted to the west of Tal Gebril Abas, in the area where Hogarth tried to locate the Hellenion. Material to the west of the lake was essentially Roman in date, and Coulson suggests that ‘the development of the ancient city of Naukratis appears to have been chronological rather than ethnic’ (p. 11). The survey also demonstrates that the settlement—though its exact extent is not immediately clear from this volume—continued into the Late Roman Period (see p. 17 and n. 27, for the view that there was no occupation after the second century AD). The latest phase is marked by Late Roman Cypriot Red Slip ware which is usually dated to the early seventh century AD (p. 31, fig. 14, ‘Type F’). The handful of sherds of this kind are widely distributed: the north-west shore of the lake and beyond (Area B; Nebire A), to the north of the lake (S-15), to the north-east of the lake (Field D-E1), to the east of the lake (S19), and to the east of Kom Geif (S-6).

The survey also investigated the ‘slag-heaps’ identified by Petrie. One 75m<sup>2</sup> area at Kom Hadid (‘Mound of Iron’) yielded material that had been derived from ‘vitrified pieces of brick formed through intensive heat’ (p. 9, pl. viii. 4), suggesting the presence of kilns or possibly furnaces. The survey also noted some 21 fluted column-drums reused in Kom Geif (p. 14, fig. 7, pls. vii–viii). The presence of Greek masons’ marks suggests a possible Ptolemaic date. Hellenistic pottery to the north and east of the lake attests to the vitality of the city in the Ptolemaic Period (p. 11). Several Hadra *hydriai* now in the Alexandria Museum and ‘supposedly’ from Naukratis can be dated to the third century BC (nos. 1880–1885). Four coins, issued by Ptolemy IV, VI and VIII are listed (pp. 145–6, nos. 27–30).

The core of this volume is a discussion of the pottery finds (arranged by fabric) (pp. 19–98) followed by a pottery catalogue arranged by survey area (pp. 99–138). The pottery is arranged by a typology devised for processing large numbers of finds and ignores more widely used terms. The worn nature of surface pottery collected in surveys makes identification difficult. I suspect that the red-figured ‘Skyphoi/Bowls’ of Type G dated to the ‘early third century BC’ are in fact fourth-century Attic red-figured heavy-walled cup-skyphoi (pp. 22–3, fig. 9, nos. 571, 1153). The Type C5 base of a plate is decorated with ‘a series of broad flutes and ribs on the interior which may represent a floral design similar to the elongated petals on Megarian profiles’ (pp. 25–6, fig. 11, no. 1000). To my eye this looks like the profile and decoration from a mid-fifth century BC delicate class stemless cup. If such misidentifications are typical of the black-glossed pottery, it may be necessary to reinterpret the material from the fifth to the third centuries BC. The black-

<sup>1</sup> For an alternative survey methodology from the Methana peninsula in Greece, see C. B. Mee and H. A. Forbes (eds), *A Rough and Rocky Place: The Landscape and Settlement History of the Methana Peninsula, Greece. Results of the Methana Survey Project Sponsored by the British School at Athens and the University of Liverpool* (Liverpool, 1997), 33–41.

glossed material also includes a sherd with a possible bipartite commercial graffito,<sup>2</sup> the reading of which assumes it to be part of a continuous text (pp. 84–5, fig. 47, no. 1866).

The pottery includes an important selection of coarse and plain wares, some locally produced. A case might have been made to consolidate the catalogue with some of the analysis from the later chapters. For example, black-glossed lamps appear as ‘Type B miscellaneous bases’ in the pottery catalogue (p. 27, fig. 12) as well as in the general finds section of Chapter 4 (p. 139). It would also have been helpful to have consolidated the impressive selection of transport amphoras which are grouped by rims, toes and handles in the pottery section (pp. 46–64), with the stamped amphora handles (Chapter 5, by James W. Rehard) that include material excavated by Petrie and now in the Ashmolean Museum in Oxford. The stamped material includes Rhodian amphoras from as early as the fourth century BC, Thasian of the fourth and third centuries BC, Cnidian of the third and second centuries BC, and Chian of the third century BC. Virginia Grace noted 708 stamped amphora handles from Naukratis in The British Museum; their inclusion in this study would have aided a quantified analysis of the imported amphoras (although see summary at p. 62, tables 1 and 2). The problem of identifying amphoras with particular products is highlighted by a Late Roman amphora sherd with depinto from Egypt which indicated that its contents were pistachio nuts.<sup>3</sup>

The volume concludes with a study of ‘Psammetichus I and the foundation of Naukratis’ by (the late) Richard D. Sullivan (Chapter 7). He suggested that Petrie may not have found the earliest levels, and presented an argument that Naukratis may have been founded in the early part of the reign of Psammetichus I. A further interpretation is now outlined by Möller.<sup>4</sup> Sullivan’s chapter also has three brief appendices: the gods of Naukratis; the language of the inscriptions; and the Herodotus fragments.<sup>5</sup>

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*The Roman Imperial Quarries Survey and Excavation at Mons Porphyrites, 1994–1998, I. Topography and Quarries.* By VALERIE A. MAXFIELD and DAVID P. S. PEACOCK, with other contributors. Pp. xi + 339, figs. 381, tables 9. London, Egypt Exploration Society, 2001. ISBN 0 85698 152 4. Price £62.

The Roman quarry of Mons Porphyrites is located in the central part of Egypt’s Eastern Desert, 50 km west of the seaside resort city of Hurgada. The workings and ruins are scattered across the slopes and adjacent valleys (wadis) of a mountain called Gebel Dokhan. Along with Mons Claudianus, 50 km to the south, Mons Porphyrites is one of the two largest of the thirteen known Roman quarries for ornamental stones in the Eastern Desert. It was active from the early first to early fifth centuries AD, a period much longer than that for the other quarries, which were all abandoned by the third century AD. The stone quarried at Mons Porphyrites is a volcanic rock called dacite-andesite porphyry or, equivalently, quartz-andesite porphyry. The geological term ‘porphyry’, which is derived from the Roman name for this stone, refers to a rock with large, easily visible crystals (phenocrysts) that are surrounded by a finer-grained crystalline matrix. The Romans recognized three varieties of porphyry coming from Mons Porphyrites: *porphyrites* or *rubet porphyrites* with white to pink phenocrysts and purplish-red to reddish-purple matrix, *hieracitis* with white to pale-green phenocrysts and greenish-black matrix, and *melanos* (or *niger*) *porphyrites* with white phenocrysts and black matrix. Italian stonecutters of the Renaissance and later periods referred

<sup>2</sup> For this type see D. W. J. Gill, ‘A Greek Price Inscription from Euesperides, Cyrenaica’, *Libyan Studies* 29 (1998), 83–8.

<sup>3</sup> J. C. Shelton, ‘More Ostraca from the Fitzwilliam Museum’, and D. W. J. Gill, ‘An Archaeological Note on Two Ostraca from the Fitzwilliam Collection’, *Zeitschrift für Papyrologie und Epigraphik* 86 (1991), 267–7.

<sup>4</sup> *Naukratis*, 32–8.

<sup>5</sup> On which see also D. W. J. Gill, ‘Two Herodotean Dedications from Naukratis’, *Journal of Hellenic Studies* 106 (1986), 184–7.



to these same stones by their now familiar names of, respectively, *porfido rosso antico* or *egiziano*, *porfido verde egiziano*, and *porfido nero*. The reddish variety is nowadays known as the Imperial Porphyry, and was Mons Porphyrites' principal product. It was carved into small columns, statues, sarcophagi, bathtubs, and basins, and was exported to Rome, Constantinople, and many other parts of the Roman empire. Its subsequent widespread reuse from the Byzantine Period onwards has made it one of the best-known and most widely distributed Roman stones in the Mediterranean region.

Since its discovery in 1822 by western scholars, much has been written about Mons Porphyrites by its many visitors. The work reported in the volume under review is the latest and most thorough investigation undertaken to date. In contrast to D. P. S. Peacock and V. A. Maxfield's earlier study of the Mons Claudianus quarry,<sup>1</sup> the Mons Porphyrites project was much less ambitious, with a smaller research team, fewer excavations, and fewer and shorter field seasons. This, the first of two volumes to be published on Mons Porphyrites, is concerned primarily with the above-ground survey of the ruins and quarries. Besides Peacock and Maxfield, other authors contributing to this volume include N. Bradford, P. Copeland, J. Ford, S. Goddard, F. Handley, A. Macklin, J. Phillips, and W. Van Rengen (archaeology); R. Tomber (pottery); and M. C. Jones, P. J. Potts, I. J. Rigby, and O. Williams-Thorpe (geology). The second volume in the series will report on the results of excavations and include translations of ostraca and other inscriptions.

Chapter 1 (Introduction) of the present volume introduces the reader to the Mons Porphyrites project. However, the information on the archaeological and geological contexts of the quarry presented in the first paragraph of this review is inexplicably absent from this chapter and, indeed, much of it does not appear elsewhere in the volume. The authors seem unaware of the three porphyry varieties that were well-known to both the Romans and later Italian stonecutters, recognizing instead only the Imperial and black porphyries. Also surprising is their failure to mention three other Roman quarries on the flanks of Gebel Dokhan: one for quartz-syenite porphyry in Wadi Umm Sidri, one for trachyandesite porphyry in Wadi Umm Towat, and another for quartz diorite near Wadi Umm Balad.<sup>2</sup> One would expect that there would be at least a brief discussion of these sites because their operation was surely connected to that of Mons Porphyrites. Additionally absent from this chapter and the volume is any mention of the quarrying of Imperial Porphyry prior to the Roman Period. For example, it is well established that this stone was used for vessels during the First and Second Dynasties (thirtieth to twenty-seventh centuries BC)<sup>3</sup> and again sparingly for statuary and stelae during the Ptolemaic Period (third to first centuries BC).<sup>4</sup> Although the authors of the present volume found no evidence of pre-Roman quarrying at Mons Porphyrites, it clearly did occur and so should have been discussed.

Besides its quarry workings, Mons Porphyrites has several 'quarry villages', a central administrative complex, several outlying sites, a network of roads and footpaths, and other facilities. Relative to the 'central complex' in Wadi Abu Maamel, quarrying occurred in six distinct areas: the so-called 'North-West' and 'Foot' quarries, 3.5 and 2 km, respectively, to the west-north-west; the 'Lykabettus' and 'Rammius' quarries, 2.5 and 3 km, respectively, to the south-west; the 'Lepsius' quarry, 0.3–1 km to the east-south-east; and the 'Bradford' quarry, 2 km to the north. In subsequent chapters (2–5) the quarries, ruins, and other features are all thoroughly described and well illustrated by the authors. The topographic site maps, and quarry and building plans are especially well executed. The field photographs are generally quite good but many would have benefited from the inclusion of arrows pointing out stone-built features that are hard to see because they blend in with the rocky background.

<sup>1</sup> D. P. S. Peacock and V. A. Maxfield (eds), *Survey and Excavation—Mons Claudianus, 1987–1993*, I. *Topography and Quarries* (Cairo, 1997).

<sup>2</sup> V. M. Brown and J. A. Harrell, 'Topographical and Petrological Survey of Ancient Roman Quarries in the Eastern Desert of Egypt', in Y. Maniatis et al. (eds), *The Study of Marble and Other Stones Used in Antiquity—ASMOSIA III*, Athens (London, 1995), 221–34.

<sup>3</sup> B. G. Aston, *Ancient Egyptian Stone Vessels—Materials and Forms* (SAGA 5; Heidelberg, 1994), 21–3.

<sup>4</sup> R. Delbrueck, *Antike Porphyrwerke* (Berlin, 1932), 34–8; R. S. Bianchi, 'Porphyry', *L'Ä IV*, 1071–3.

Chapter 2 (The Central Complex) describes the administrative centre in Wadi Abu Maamel. This includes a fortified settlement or 'fort', three temples, a bathhouse, a workers' village, other buildings, two wells, and a cemetery. Chapter 3 (The Quarry Villages) provides detailed descriptions of the small settlements associated with the five quarrying areas furthest from the 'central complex' in Wadi Abu Maamel. Regrettably, a printing error abruptly truncates the text for the Lykabettus village on p. 129. Arguably the single most important new discovery made during the project was a stela in the so-called 'Bradford Village' beside the quarry of the same name. The stela, with its Greek inscription, dates to AD 18 and was dedicated to Pan-Min and Serapis by Caius Cominius Leugas, who claims to be the discoverer of Mons Porphyrites. Specifically mentioned in the text are the familiar *porphyrites* (Imperial Porphyry) and *melanos porphyrites* (black porphyry), and another still unidentified stone, *knekites*.

Chapter 4 (The Quarries) describes the six quarrying areas and discusses the Roman quarrying methods. Based on evidence found primarily in the associated villages, it appears that the northern quarries (North-West, Foot and Bradford) were the first areas worked at Mons Porphyrites, beginning in the early first century AD. Activity subsequently expanded southward, with perhaps only the Lykabettus quarry still active when Mons Porphyrites was abandoned in the early fifth century AD. It is evident that most of the porphyry blocks were removed by simple 'levering' (presumably with wooden poles), where use was made of the natural fractures within the rocks. 'Cleaving marks' are seen along the edges of some fractures and these are thought to result from either hammer blows or iron wedges being driven in to widen the breaks. Lines of 'wedge holes' (for hammered iron wedges) were cut into the bedrock where fractures were absent and also into already extracted blocks as part of the dressing process. Many blocks show additional evidence of dressing with a pointed iron chisel or 'point'. Unfortunately, no iron tools were recovered during the project. Although the dimensions of many wedge holes are given, their forms and spacings are not and so no wedge-hole typology can be constructed from the data presented. Another weakness of this chapter is that the type of stone extracted in each quarrying area is not well identified. The authors do not always make a clear distinction between what stone was sought and what other stone was removed in the process. This, for example, leaves the reader with the impression that the black and greenish-black porphyries were the objective of much of the activity in the Lepsius and Lykabettus quarries whereas, from this reviewer's fieldwork at Mons Porphyrites, it is evident that the Imperial Porphyry was overwhelmingly the material sought. Also, the authors are inconsistent in their recognition of the porphyry varieties and so the reader will sometimes be unsure of what each quarry provided. Never clearly stated is the fact that the black porphyry came mainly from the Bradford quarry, and the greenish-black porphyry came from the Foot quarry and northern edge of the Lepsius quarry. Most of the Lepsius, and the North-West, Lykabettus, and Rammius quarries produced almost exclusively the Imperial Porphyry, which accounted for the vast bulk of the stone removed from Mons Porphyrites.

Chapter 5 (Infrastructure) is concerned with the outlying structures and facilities, including support stations with wells and animal lines in Wadi Umm Sidri and Badia, and also quarry slipways, loading ramps, footpaths, signaling/lookout towers (*skopoloi*), and miscellaneous huts and other buildings. Especially noteworthy is the well-preserved fortified station at Badia, on the south side of Gebel Dokhan. Although mentioned, more could have been said about the controversies surrounding the use of the cairned slipways and the types of vehicles used to transport the porphyry blocks.

Chapter 6 (The Pottery) establishes a comprehensive ceramic chronology and catalogue for the Mons Porphyrites area over a four-century period. Particularly well described and illustrated, with their 'ceramic markers', are those pots useful for dating. This information will be of considerable interest to excavators of Roman sites elsewhere in Egypt.

Chapter 7 (Geology, Mineralogy and Characterization Studies of Imperial Porphyry) describes the use of two non-destructive field-portable techniques, magnetic susceptibility and x-ray fluorescence, to characterize the porphyry coming from different parts of Mons Porphyrites and also porphyry artifacts found in museums. The objective was to see if it is possible to recognize which area within the quarry supplied the stone for a given artifact, but it was found that this cannot be reliably done. Mineralogical and petrological descriptions of the quarry stones are also

provided in this chapter. The authors err in saying that Gebel Dokhan is the only known source of Imperial Porphyry. There are at least two others, both with modern quarries, 35 and 70 km north-west of Hurghada.

A comparison of the Mons Porphyrites and Mons Claudianus quarries, based on the information in the two volumes published by Peacock and Maxfield, shows that there are many more similarities than differences between the two sites. Among the few notable differences are the following. First, Mons Claudianus was founded a little later (mid-first century AD) and abandoned much earlier (late third century AD) than Mons Porphyrites. Only three other Eastern Desert quarries, all smaller but still of substantial size, were first worked by the Romans, as Mons Porphyrites was, during the reign of Tiberius in the early first century AD: Wadi Barud,<sup>5</sup> Wadi Umm Wikala,<sup>6</sup> and Wadi Hammamat.<sup>7</sup> Of these, the mountainous Wadi Umm Wikala quarry is especially similar to Mons Porphyrites in its sprawling layout and elaborate infrastructure. Second, Mons Claudianus produced primarily large monolithic columns (up to 18 m) whereas Mons Porphyrites, because of the smaller fracture spacing in the porphyry bedrock, supplied a variety of smaller items. Third, although the ruins of Mons Porphyrites were later reoccupied by Christian hermits in the early Byzantine Period, during the same time Mons Claudianus saw the construction of a large monastic community with hundreds of stone huts. Fourth, Mons Claudianus has only two distinct quarrying areas with separate facilities whereas Mons Porphyrites has six. This difference is attributable to the more rugged terrain at Mons Porphyrites and also to the erratic geological distribution of the porphyry.

The deficiencies noted above aside, this volume represents an invaluable and unrivalled reference on Mons Porphyrites. Together with the upcoming second volume, it will remain the definitive work on this site for a long time to come and, if the natural and man-induced destruction continues, may well become the last word on many of the site's features. This volume will be useful not only to those with an interest in Mons Porphyrites or its porphyry, but also to anyone with a general interest in Roman quarrying operations.

JAMES A. HARRELL

*Hieratische Papyri aus Tebtunis*, I. By JÜRGEN OSING. The Carlsberg Papyri 2. 2 volumes. Pp. 310, pls. 30. Copenhagen, Museum Tusculanum Press, 1998. ISBN 87 7289 280 3. Price £238.

*Papiri Geroglifici e Ieratici da Tebtynis*. By JÜRGEN OSING and GLORIA ROSATI. 2 volumes. Pp. 219, pls. 23. Florence, Istituto Papirologico 'G. Vitelli', 1998. No ISBN. Price not stated.

Historians of the ancient Greek world justifiably lament their losses in the great fires that consumed its most encyclopaedic libraries at Alexandria, but Egypt has also preserved much of that written heritage. The papyrologists of the late nineteenth and twentieth centuries proclaimed a renaissance in the discovery of Greek papyrus scroll segments in cartonnage mummy covers, and of Greek waste-paper mountains of papyrus at dry town sites around the Fayum and in Upper Egypt. The tale of loss and recovery has been dominated by the European script. However, an equally poignant and dramatic history looms behind and beyond the foundational civilization of the West—the tale of papyrus in the ancient Egyptian scripts. The royal libraries of ancient Egypt also perished in the Nile flood plain, but the innermost kernel of the pharaonic civilization is being

<sup>5</sup> D. P. S. Peacock, 'The Quarries and Settlement of Tiberiane (Wadi Barud)', in Peacock and Maxfield (eds), *Mons Claudianus* I, 274–83.

<sup>6</sup> S. E. Sidebotham et al., 'The Roman Quarry and Installations in Wadi Umm Wikala and Wadi Semna', *JEA* 87 (2001), 135–70.

<sup>7</sup> R. Klemm and D. D. Klemm, *Steine und Steinbrüche im Alten Ägypten* (Berlin, 1993), 355–76; J. A. Harrell et al., 'Breccia verde antica—Source, Petrology and Uses', in L. Lazzarini (ed.), *ASMOSIA VI, Interdisciplinary Studies on Ancient Stone—Proceedings of the Sixth International Conference of the Association for the Study of Marble and Other Stones in Antiquity, Venice, June 15–18, 2000* (Padua, in press 2002).

recovered, in the form it enjoyed during its latest great self-conscious flowering, the second century AD. The two volumes under review here must become part of every Egyptological library because they constitute no small part of that rediscovery, and the two authors are owed a special place in the discipline by their endeavours to make available this precious material.

The Tebtunis papyri, mainly of the second century AD, form one of the rare large masses of manuscripts to survive from an ancient Egyptian town: the parallels—Abusir accounts for the Old Kingdom, Middle Kingdom life at Lahun, Ramesside life at Deir el-Medina, the Twenty-first Dynasty letters and literary manuscripts from Hiba, the great quantities of perhaps mainly Roman Period fragments from Elephantine, and the carbonized papyri from Tanis, also of the Roman Period—are so extremely rare that it can be forgotten what an impact that loss has on our knowledge of the civilization. At Tebtunis, on the southern fringe of the Fayum, the Florentine Archaeological Mission led by Carlo Anti uncovered, in 1931, a room filled with papyri. These scrolls had apparently been discarded as too torn for further reading, and perhaps also considered no longer useful because they were in scripts that were no longer being read, or were documents that served no further legal purpose. Subsequently, large numbers of additional manuscripts undoubtedly from the same source were acquired by a range of academic collectors, not deterred by the condition of the fragments. The largest group was gathered by Ludwig Borchardt and conserved by Hugo Ibscher in Berlin for the Carlsberg Foundation in Copenhagen. As a result, the Copenhagen and Florence collections today preserve the bulk of the material, though the fragments are scattered around the globe, and it is fitting that the relevant institutions in those two cities each produced one volume publishing some of the most important Tebtunis manuscripts in 1998. In the Copenhagen volume (pp. 19–23), Jürgen Osing outlines the scale of the find, and the extent of the physical damage that has imposed decades of hard labour in sorting, conservation, identification, and reassembly. A certain difficulty in ‘naming’ each separate manuscript is one immediate practical consequence of the dispersal of the find and the painstaking progress in reassembly; for convenience, here the manuscripts published in the Copenhagen volume are identified by their number in the volume (HPT I, 1 to 5), and the manuscripts in the Florence volume are cited by the number of the largest fragment, using the sigla P Carlsberg for the Copenhagen fragments and PSI for the Papiri della Società Italiana at Florence (hence PSI I.2 rather than PSI inv.I 2 + pCarlsberg 54 + pTebt. Tait Add. 1 a–f + pBerlin 14412I). Accurate reference to the Tebtunis manuscripts in future Egyptological publications may present more serious problems; separate compositions can be given names, but that is not a ready solution in instances where there is more than one manuscript copy of the same composition. Papyrological reference systems have tended to encode and mystify for all outside the circle of full-time papyrological researchers; it would be a shame for the Tebtunis material to become obscured by similar means, just as it is emerging from oblivion.

It is estimated that the find comprised remnants of around five hundred manuscripts: three hundred demotic, mainly literary compositions and treatises; about one hundred in hieratic, mainly relating to cult and religious knowledge; about fifty hieroglyphic manuscripts, all in particularly fragmentary condition; and about fifty Greek papyri, principally private documents, with some temple accounts, and giving a date range from about 27 BC to AD 210. Recently, Joachim Quack provided a report on his editorial labour on a composition which he labels the ‘Book of the Temple’, an extraordinarily explicit treatise on the architecture of the ideal temple, and the titles and duties of its staff;<sup>1</sup> of the forty-odd copies from which he has found fragments, some seventeen are from Tebtunis, offering some idea of the proportional importance of this site and the treasury of information to be recovered. The edition of each composition requires familiarity with all the main collections, and a combination of endless patience and specialized knowledge in both script forms and technical content. This explains why, before 1998 and the appearance of the two volumes under review, only three of the hundred hieratic and one of the fifty hieroglyphic manuscripts from Tebtunis had been published; here we have in one year the edition of nine more hieratic, and three hieroglyphic papyri. A glance at the plates instantly reveals the work needed for each item.

<sup>1</sup> ‘Das Buch vom Tempel und verwandte Texte. Ein Vorbericht’, *Archiv für Religionsgeschichte* 2 (2001), 1–20.

In the Florence volume, Gloria Rosati publishes the hieroglyphic copy of an extraordinary tabulation of religious knowledge (PSI I.2). This composition has long been known as the 'Geographical Papyrus' from the 1889 publication by Griffith of another copy, excavated by Petrie at Tanis in 1883 (now British Museum EA 10673). The Tebtunis find contained two more copies of the same compendium, in hieratic, both published in the Copenhagen volume by Osing (HPT I, 2 and HPT I, 3); this was evidently a book in some demand, perhaps specifically preserving the principal sacred knowledge in which children of priests were instructed by the 'overseer of teaching', according to the phases of learning specified in the 'Book of the Temple'. It seems likely that the hieratic versions are secondary, copied from the hieroglyphic original, because the identification of each category comes at the end, as in a hieroglyphic tabulation, rather than at the beginning, as might be expected in a hieratic manuscript. Although all copies are incomplete, each helps to fill gaps left by the rest, and a synoptic edition could now be undertaken with the new information from the three Tebtunis manuscripts. A related collection of sacred knowledge in hieratic presents sets of words, dominated in its surviving condition by lists of deities; this too is published by Osing in the Copenhagen volume (HPT I, 4), along with two fragments from a papyrus (HPT I, 5) containing a parallel list, since identified from other fragments by Quack as part of a copy of the 'Book of the Temple'. The manuscript HPT I, 4 introduces an extraordinary feature found in some of the Tebtunis material: explanatory glosses added at a later date over the line in hieratic, demotic, and in one instance a Greek letter. Osing notes that the latter can be identified as from a gloss in 'Old Coptic' (defined as the early use of Greek letters to write the Egyptian language), from the principal manuscript with such glosses, the papyrus HPT I, 1, a survival of outstanding importance even in this exceptionally precious group. Although highly broken, the contents of papyrus HPT I, 1 offer a new variant on the genre of onomastica, expanding that type of wordlist to cover, separately, verbs as well as nouns, and combining it with the collection of sacred knowledge exemplified by the Tanis 'Geographical Papyrus'. The numerous glosses throughout this manuscript make it one of the most precious sources for the vocalization of Egyptian, and Osing has presented here an ideal and detailed first edition, following his earlier pioneering research and publications on that subject.

In the Florence volume, Rosati publishes the fragmentary two copies of another composition that must have been especially prominent in life at the Tebtunis temple, the daily cult of Sobek, Lord of Bedenu (PSI I.70 and Papyrus Carlsberg 307). In contrast to the extant and well-known sources for the daily clothing and offering rituals for Amun and Mut at Karnak temple, and for King Amenhotep I at Deir el-Medina, the Tebtunis manuscripts present a version in which all actions in the cult are recorded, including preparations before the start of the ritual. Extended hymns to the deity form a significant element, and raise the question of correct identification of smaller fragments within long ritual manuscripts; one of the fragments from the manuscript of Papyrus Carlsberg 307 containing only hymns in praise of Sobek was made available in the 1976 EES publication by John Tait, *Papyri from Tebtunis in Egyptian and Greek*, among items in a box preserved at Oxford and evidently acquired from the dispersal of fragments after the 1931 Italian excavation season at the site. Fragments from the same box, some not included in this publication, belong to two astonishing manuscripts published in the Florence volume by Osing, the hieroglyphic copies of inscriptions on the walls and façades of First Intermediate Period and Middle Kingdom tomb-chapels at Asyut (PSI I.3 and PSI I.4). Evidently the Djefahapy contracts were desirable examples of hieroglyphic inscription eighteen centuries before Sethe selected his *Lesestücke*. These two Tebtunis manuscripts allow a two-thousand-year-old check on the ingenious reconstructions by Elmar Edel for the now largely destroyed inscriptions of tomb-chapels III and IV, and tend to demonstrate the relative accuracy of the copies in the *Description de l'Égypte* (see comments, e.g., pp. 67–8). PSI I.3 seems most carefully executed, being either a copy direct from the tomb walls, or at least not separated from the originals by many links in the copying chain. The layout of the tomb-chapel walls is echoed rather than reproduced line for line, with combinations of horizontal and vertical lines; the copies are not facsimiles—the hieroglyphs have their Roman Period forms, rather than attempting exact reproduction of the outlines of First Intermediate Period or Middle Kingdom hieroglyphs. Since the original monuments have been so extensively destroyed since the time of the *Description*, even in their shattered third-century state,

the Roman Period manuscripts offer an invaluable and unexpected guide to the contents, working up from the lower terrace (tomb-chapel I) to the upper terrace, moving from south to north (chapels III, IV and V). Originally the manuscripts bore at least two hundred columns, an impressive quantity, though still selective. The material is so broken that it is not always easy to follow the path meticulously traced by Osing here, but there is a densely packed mass of information to be revealed for readers who persevere with the fragments of the two papyri (pls. 6–13). Historians working on the First Intermediate Period may concentrate on the coverage of tomb-chapel IV, of Khety son of Itetib, for which Osing reproduces the *Description* copies and Edel reconstructions on pp. 69 and 76, along with his own translations on pp. 70, 73–5 and 77, and comments on pp. 70–9. Ambitious historical conclusions had been drawn from the recent reconstructions in the case of the seven columns inscribed above the image of Khety to the right of the entrance (p. 69, lines 74' to 80'); the Tebtunis sources overturn these readings and the historical conclusions from them, as Osing illustrates with his translation and a transliteration of the key divergent passage (p. 74). This new edition arouses admiration for the 'blind' copyists whose pre-decipherment versions were published in the *Description*, for the readings by Edel, always inspired even if, inevitably, not always correct, and for the achievement of the present edition. If Edel erred, it was perhaps most through that universal Egyptological passion, privileging political history over the cultural history that our sources tend to be trying to teach us. Physically these two manuscripts stand out among the Tebtunis papyri in their height, each scroll being over 40 cm; the contents were evidently accorded high status in the temple 'house of books'. The reverence for the Asyut inscriptions reaches far earlier; Osing notes (p. 61) the use of one 'Appeal to the Living' in the tomb-chapel of Puyemra under Thutmes III (TT 39), and of an extended version of another religious composition in the tomb of Senenmut (TT 353). Closer to the Roman Period, autobiographies from the Twenty-fifth to Thirtieth Dynasties take up phrases from the four Asyut tombs (p. 60 n.11). It remains uncertain when the project of a full copy might have been born (see further below). There may be several reasons for an exceptional status of Asyut inscriptions over other material available from Middle Kingdom monuments; as well as being among the larger inscribed monuments of that period, the chapels may have been more immediately accessible from the local city than other tombs of Middle Kingdom governors, and their writings may have been recognized as among the earliest Middle Egyptian compositions. In addition, the tombs may have been especially sanctified by the installation of a Wepwawet cult in one of the tomb-chapels during the Ramesside Period. Assessment of such reasons requires research into the comparative history and accessibility of monuments in periods after their creation.

The last two manuscripts published in this remarkable edition are equally extraordinary survivors, a mythological manual of nomes in hieratic, presented by Osing (PSI I.72), and the hieratic manual of a 'pure-priest of Sekhmet', presented by Rosati (PSI I.73). For the mythological manual, there were originally at least four copies in the Tebtunis collection; Osing cites the three parallels for Upper Egyptian nomes 10 to 16 and for myths for other nomes of Upper and Lower Egypt. PSI I.72 preserves the coverage of Upper Egyptian nomes 7 to 16, each section for a nome starting with a lengthy myth, followed by one to three shorter myths. In general the narratives combine local religious features with the central myth of Osiris. Such manuals are known from other places, notably Papyrus Jumilhac for Upper Egyptian nomes 17 to 18, and Papyrus Brooklyn 47.218.84 for Lower Egypt. The sections for Upper Egyptian nomes 15 and 16 are also preserved in hieroglyphic inscription at Edfu temple. The Edfu and Brooklyn sources help to take the date for such compilations back to the early Ptolemaic Period and, in the case of the Brooklyn papyrus, perhaps back beyond Alexandria to the fourth century BC. Again, the date of composition remains elusive in the Tebtunis copies, but they show the continuing vivacity of the tradition into the second century AD, and the way the tradition met its end in the third century AD. The manual for the 'pure-priest of Sekhmet' is the only example preserving an illustration among the twelve sources published in the two volumes; a man is shown with a calf twice, one scene inverse to the other, a feature which Rosati discusses without imposing an interpretation. The directions for the 'pure-priest of Sekhmet' are not always clear, as this papyrus has suffered as much as the rest, but involve inspection of areas or persons infected by contagious diseases. The 'year of Sekhmet' corresponds to, and is as vague as, 'plague' in modern languages; this historical scourge rarely emerges in the

surviving sources, especially for Egypt, where monumental inscription served the creation of an eternal perfect order, and so this is an especially precious survival. The 'Book of the Temple' again provides an invaluable setting for the 'priest of Sekhmet' within the religious institution; in addition to his responsibilities for hygiene within the temple, he watched for heavenly or earthly signs of plague among humans and livestock. He also collaborated with the scribe of books of the god in the periodic check on herds. This may offer a reason why the 'Lahun Veterinary Papyrus' of the late Middle Kingdom (UC 32036) was written in hieroglyphs: its diagnoses and prescriptions may belong within the sacralized world of the 'pure-priest of Sekhmet', in his effort to ensure that diseased animals were identified and removed. Two thousand years later his successors at Tebtunis were still involved in these activities, presumably with the same theory of plague and contagion.

This brings us back to the date of original inspiration for compositions represented among the Tebtunis papyri. A quest for origins can prove the most sterile academic ground, but in this case there is both a comparative cultural and a global historical dimension to the question, symbolized by the Alexandria libraries of Greek manuscripts. The Tebtunis treatises and above all, the great encyclopaedic wordlist HPT I demonstrate a scope entirely equal to the ambition of the Hellenistic institutions of Ptolemaic Egypt. Their date of composition is crucial to any assessment: are they reflections of a Greek philological and scientific project? Or does Greek science represent more a translation from other worlds, including the Egyptian? The internal criteria from the various manuscripts are ambiguous. Above, the parallel has been drawn between the manual of the pure-priest of Sekhmet and the late Middle Kingdom 'Veterinary Papyrus' from Lahun; Quack has noted that the regulations prescribed for each temple title in the 'Book of the Temple' have at least a kindred spirit in the *Duties of the Vizier*, known from New Kingdom copies but perhaps again a late Middle Kingdom composition. Astronomical lists in the compendia of sacred knowledge go back in part to the New Kingdom. The versions of the 'Geographical Papyrus' align measurements with nomes and their religious content, as found in votive cubits from the New Kingdom, and following a pattern first visible in the White Chapel of Senusret I in the early Middle Kingdom. Within the great wordlist HPT I, 1, the equation of the hierarchies of gods with titles of the pharaonic court finds more parallels in the Ramesside Period and Twenty-sixth Dynasty (Copenhagen volume, comments by Osing on pp. 181–2). The world of the gods is edited into visual list form in Twenty-sixth Dynasty monuments, a pictorial counterpart to the editorial labour in the wordlists of the Roman Period manuscripts. The Twenty-sixth Dynasty seems to be the date at which the funerary literature of the New Kingdom and Third Intermediate Period underwent systematic editing to produce the standard Late Period sequence of formulae sometimes called the Saite Recension of the Book of the Dead. The seventh century BC may, then, offer the most logical historical phase for the production of these lists of lists. This would set the achievements of Hellenism several centuries further back, at a time before Greece had begun to play its role in the development of the written word. There is a broader setting for the vast operation to systematize writings in the second quarter of the first millennium BC; the Twenty-sixth Dynasty world of writing should not be read in isolation from the histories of synthesis and assemblage in neo-Assyrian and neo-Babylonian libraries. In Egypt, the Late Period activities draw in part on earlier written materials of Middle Kingdom date that were already being copied in the New Kingdom, though perhaps not with the same encyclopaedic scope as is witnessed by the Tebtunis papyri. In sum, the main innovation represented by the library and museum at Alexandria might be their presence in the Greek world; in the local Egyptian context, they may be less radical, the *translatio graeca* of two institutions that any new royal city would have required—the House of Books and the House of Life, as already attested at Amarna in the fourteenth century BC, and conceivably present at Lisht in the twentieth. More comparative research into these questions is much needed, for without it the global history of writing and the library can scarcely begin. The Egyptological clarification of one part of this history involves in the first instance the publication of that shattered manuscript record from Tebtunis and eventually from Elephantine too. The primary editions by Osing and Rosati reviewed here are monuments on this road to a history of knowledge; it is not only Egyptological libraries that cannot afford to be without them.

*Columbia Papyri IX: The Vestis Militaris Codex.* By JENNIFER A. SHERIDAN. American Studies in Papyrology 39. Pp. ix + 174, pls. 12. Atlanta, Georgia, Scholars Press, 1998. ISBN 0 7885 0446 0. Price \$44.95.

*A Yale Papyrus (P. Yale III 137) in the Beinecke Rare Book and Manuscript Library III.* By PAUL SCHUBERT. American Studies in Papyrology 41. Pp. xii + 112, pls. 7. Oakville, Connecticut, American Society of Papyrologists, 2001. ISBN 0 9700591 1 6. Price \$34.95.

These two monographs each contain the publication of a single papyrus, in one case, P. Col. IX, written in an early fourth-century codex, and in the other, P. Yale 137, on an early third-century roll. Both editors not only present text, translation and notes, but also produce extensive discussions treating the important features of the documents.

P. Col. IX is important in three respects, as Sheridan clearly brings out: for the history of the development of the book form; for the light it casts on the organization of the *vestis militaris* in the fourth century; and for the administrative geography of the Hermopolite nome. Sheridan had already published a dissertation on the codex in 1990, entitled *Roman Military Requisitions in Egypt*. This included an edition of the longer of the two texts contained in the codex (= SB XX 14661), which is superseded by the present edition. This text occupies 20 pages of the codex, extending over more than 300 lines. It must date after the introduction of the *pagus* in AD 307/8 and Sheridan advances arguments for assigning it to 324/5 or 325/6. It is followed by a shorter text occupying two further pages, which is likely to have been written some thirty years later.

The make-up of the codex is given a careful and clear discussion (pp. 7–16). As it survives, it consists of 5 sheets and 1 leaf, but most probably originally consisted of 10 sheets (40 pages). As would be expected at this date, it was cut from a roll and was almost certainly a single-quire codex; it measures 15 × 25 cm and is very early for a documentary codex; indeed, it may be the earliest surviving example. It is interesting that, like the majority of these early codices, it comes from the Hermopolite nome. At one point the binding partially survives, which enables Sheridan to demonstrate that the string did not pass through the fold but only through the back half of the codex (see the diagram on p. 11).

Both texts in the codex are accounts. The longer, P. Col. 247, concerns the supply of garments for the Roman army, the so-called *vestis militaris*. It records items assessed or collected from each village, organized by *pagi*. What survives covers the sixth to the fifteenth *pagus* of the Hermopolite nome. The account is complete at the end but the first part has been lost, hence the deduction that the codex is likely to have consisted originally of ten sheets. The text is repetitive: for each *pagus* we are given first a list of the total number of items of clothing; then this is broken down into the amounts due for each village. The clothing is described as στιχάρια τέλεια, στιχάρια παρατέλεια, δελματικά τέλεια, δελματικά παρατέλεια and πάλλια. The word παρατέλειος is apparently attested in one other papyrus only (P. Haw. 208) and its meaning is unclear. Sheridan suggests that τέλειος means ‘full-sized’ and παρατέλειος ‘nearly full-sized’. Since several of the amounts are fractions of a garment, we must be dealing with cash equivalents, as Sheridan says. The restoration in line 196 is a slip: the individual amounts for δελματικά τέλεια in this *pagus* add up to 13, not 12, so that the scribe’s arithmetic is correct. There is another slip in respect of the amount of πάλλια in this same *pagus*: the total is recorded as 12 but the individual items as given in the edition add up to only 11½; clearly the missing ½ needs to be restored in line 218. The account has several marginal notes, which are hard to read and even harder to interpret. The second account, P. Col. 248, concerns miscellaneous items, probably of a household nature.

The edition of the texts is followed by three chapters on the *vestis militaris*, the first concerning the uniform of the Roman army, and the second and third the way in which its collection was organized and imposed on the inhabitants of Egypt. Chapter 2 deals with the second and third centuries, Chapter 3 with the much more abundant information for the fourth century. The evidence is listed in Appendix 1. This is an important and well documented topic, but one which has not hitherto been treated as a whole. Unfortunately Sheridan’s discussion is marred by a number of minor errors. For example, the dates quoted for the texts mentioned are sometimes



inconsistent or do not agree with the dates given in the Appendix. PSI IV 309 is several times quoted as such, but only once, so far as I can see, in its revised version, SB XVI 12543, with no indication that this is one and the same text. On p. 85 n. 29 Wilcken is said to have assigned BGU III 927 to the third century, but when he republished it as *W.Chr.* 178 he gave the date correctly as 'Etwa Diokletianisch-Konstantinische Zeit'. Of the ten texts cited in n. 123 on p. 103 as receipts 'which recognize repayment to the village for clothing provided' at least three (P. Ant. I 39, CPR V 6 and P. Oxy. XIV 1718) do not relate to villages. In discussing the deduction of 6.5% Sheridan does not point out that it is already to be found in BGU VII 1564, which dates from AD 138. If, as she argues, such a deduction is likely to be found only in documents dealing with the *vestis militaris*, P. Ryl. IV 660 should have been brought into the discussion. Such examples could be multiplied. More seriously she makes no real attempt to tackle the thorny question of the relationship between the town councils and government appointed officials at nome level, in particular the *strategos* (later *strategos/exactor*), and she appears to assume that the responsibility lay with the councillors. Thus she suggests on p. 90 that P. Columbia 247 was 'the record of a town councillor, perhaps the ἐπιμελητῆς ἐσθῆτος'. This is a reasonable suggestion (unlike her statement on p. 101 n.102 that it was 'certainly composed by the *epimeletai* for the Hermopolite nome', which goes well beyond the evidence); but it may equally well have been produced in the office of the *strategos/exactor*. On the question of soldiers having pay stopped for the purchase of clothing (p. 82), the evidence of P. Masada 722 should be cited. There are several places where Sheridan recounts developments in such a way as to suggest the picture she paints is certain. It is true that what she suggests is usually plausible and often may well be right, but it is misleading to present what is only a hypothetical reconstruction as though it were a report of facts. Our evidence is much too full of holes to permit such certainty. Nonetheless Sheridan's treatment of this complicated subject is important and will certainly form the basis of all future work. On these chapters and the one following, see also the important remarks in the review by Fritz Mitthof in *Tyche* 14 (1999), 357–62.

Chapter 4 deals with the administrative geography of the Hermopolite nome, as does Appendix 2, where Sheridan very properly makes extensive use of the data collected in the study by Marie Drew-Bear, *La nome Hermopolite* (Missoula, 1979) (though not, it seems, the data to be found in the *Dizionario* of Calderini and Daris). Sheridan builds on the evidence assembled by Drew-Bear and brings it up to date, as is clearly set out in the Appendix. The importance of P. Columbia 247 can be gauged from the fact that Drew-Bear was able to assign only 20 places to a particular *pagus*, while Sheridan can assign no fewer than 72. Indeed, she has sufficient data to attempt a schematized map of the Hermopolite nome (see p. 130). Note also the instructive discussion of the meaning of the words κώμη and ἐποίκιον on pp. 108 ff.

The volume, which is neatly produced (except for the ugly, and surely unnecessary, lunate sigmas), concludes with bibliography, indexes and plates of all the pages of the codex.

Schubert's monograph is devoted to a single document, P. Yale 137, which is written on one side of a roll in 7 columns containing 224 lines. The content is a report of the list of the holders of private land at Philadelphia in the Arsinoite nome, drawn up by the village scribe in the twenty-fifth year of Caracalla, AD 216/17. Some of the information it contains has already been made known in articles by John Oates, whose preliminary transcript was made available to the editor; see also P. Diogenes 44–5. The beginning and end of the report survive (unless a column has been lost at the start; see pp. 1–2), as do nearly all the individual entries. The text thus gives us unusually valuable information about landholding in this important village at this date.

The report is described (lines 2–4) as a list of τῶν παρασκευαζομένων εἰδῶν τε καὶ γενῶν τῶν πεμπομένων εἰς Συρίαν for the imperial army, i.e. for Caracalla's Syrian war. It is remarkable that the papyrus does not, in fact, give any such list (cf. Schubert's comments on p. 5), but instead records the amount of land held by the persons named in the succeeding lines. Perhaps this is intended as the list of data on which each individual's contribution would be assessed. Schubert has a long discussion in the note on the meaning of εἶδη in this context, arguing that it means contributions in cash as opposed to those in kind (γέννη). This seems to me to be questionable. In P. Col. 247 (reviewed above) εἶδη means 'clothing' and I suspect it may have a similar meaning here, with γέννη, in contrast, referring to produce of the land. The amounts of land are divided into σιτικὴ γῆ and δεινδρικὴ γῆ, and the list itself is divided into three sections: those who hold

or have held magistracies in Alexandria (five entries), those described as ἀρχόντων ἐντοπίων καὶ ἀρχοντικῶν (at least eleven entries), and the rest (the heading for this group has been lost).

Among just under 200 names in the last section, arranged alphabetically by first letter only, several entries are noteworthy, as is well brought out in the editor's introduction and notes. For example, there are some half-dozen serving soldiers, two instances of slaves apparently holding land in their own right (lines 103 and 142), and what seems to be a case of bigamy (lines 86–8: Heraklas, a veteran, apparently has one wife in Philadelphia and another in the nearby village of Nestou!). In the note to line 11, Apollonios is wrongly recorded as a πρεσβευτής (of Alexandria); the correct reading in P. Cornell 11 (see *Berichtigungsliste* II) is στρ(ατηγῶ). The restoration Αὐρηλῖα in line 24 is only one of several possibilities, Κλαυδῖα, Φλαυῖα, etc. In line 41 the plate suggests Ψάλλα, as in P. Hamb. III 225.16 may be possible.

It is unfortunate that the last few lines of the text are badly damaged, as they might have given us a better insight into the purpose of the list. Schubert is surely right to argue that lines 217–18 refer to something reported by the writer's predecessors: δεδήλωται ὑπὸ τῶ[ν π]ρὸ ἐμοῦ; for the unread word following I suggest πραγματικῶν; cf. the note to P. Oxy. VI 899.17.

In his introduction Schubert discusses the historical setting, lists contemporary texts concerning the population of Philadelphia, and analyses at length the information contained in the papyrus on landholding in the village. The text records the totals for grain land and orchard land in line 8, though, as Schubert stresses (p. 11), this refers to private land only, not to the total area of land in the village. Even with this proviso, it is possible to extract interesting statistical information from the papyrus, with which pp. 12–30 of the introduction are concerned. Amounts farmed by different categories of owners are considered and compared with data from other Arsinoite villages. Perhaps the most important conclusion is that there is no sign at this date of large landholding by any one person or family (p. 30). The discussion is clear and careful not to proceed beyond what the evidence will permit. On one point, however, I believe it is misleading. Schubert equates the second category above, ἀρχόντων ἐντοπίων καὶ ἀρχοντικῶν, with 'metropolitans' and the third category with 'villagers' (see especially the table on p. 22). ἀρχοντικοί, however, are surely members of a family which has provided magistrates but who are not themselves magistrates (e.g. because they are female), as suggested by Colin Roberts in his note to P. Oxy. XXII 2346.23 (quoted with approval by Schubert on p. 71). Many more persons will have been metropolitans who owned land in the village, but who did not belong to the higher social classes; their names will appear in the *third* category in this papyrus.

The volume concludes with an Appendix of owners of private land at Philadelphia and the amount of land each held, the normal indexes, and plates of all the columns of the papyrus.

J. DAVID THOMAS

*Les impondérables de l'hellénisation. Littérature d'hierogrammates.* By PHILIPPE DERCHAIN. Monographies Reine Elisabeth 7. Pp. 112. Turnhout, Brepols, 2000. ISBN 2 503 51025 6. Price Euros 40.

In four lectures, held at the Collège de France, Paris, in 1996, the author introduces his audience to the world of learned and cultivated Egyptian priests at the time they came into contact with Greek culture. He studies five Egyptian 'autobiographies', in which a person presents himself to the reader: these are found on the statues of an anonymous high official of Memphis (Vienna 20), of Horemheb son of Krates (?), a Greek living in Naukratis (Cairo CG 1230), and of Senoucheri of Koptos (British Museum EA 1668 and Cairo CG 70031), and in a funerary inscription in the famous tomb of Petosiris in Hermopolis.

The texts have been translated into fluent contemporary French in such a way that the ideas of the ancient author become immediately clear to a modern reader who is not acquainted with the Egyptian language. The translation does not render the Egyptian texts word by word, but aims at recreating in the target language the exact intentions of the ancient authors. The often novel

interpretations are justified by numerous parallels given in the footnotes. The texts are accompanied by hieroglyphic plates, but there is no transcription into Latin characters, because the visual aspect of the hieroglyphic script, with its use of determinatives and ideograms, must be taken into account at every stage: the texts are written in Middle Egyptian, which was by that time a learned language far removed from everyday speech and meant to be read with the eyes, not to be pronounced orally. Fortunately for those of us who are not fluent readers of the artificial language of Egyptian scribes in the Late Period, all problematic words and phrases are rendered in transcription in the notes. Though the work is meant to be read in one sitting, and destined to stimulate reflection, not to accumulate factual information, the notes (pp. 59–103) contain such a wealth of information that specialists will find much of their liking here too.

The ultimate aim of the book is to show how representatives of Egyptian culture came into lasting contact with the world of Hellenism in early Ptolemaic Egypt. This is often done by taking into account what an ancient text does not state explicitly. The points of contact are not marked by clear sign-posts, but can only be understood by an attentive reader, who is prepared to take into account that which is not said but constitutes the unspoken backdrop of the stories. Not everyone will follow the author here to the end of his subtle interpretation.

The statue Vienna 20 belongs to an anonymous high official and priest in Memphis, who 'at the time of the Greeks' (the term used is *ḥ3w-nbw.t*) was invited to the palace by the 'sovereign of Egypt' (*ḥq3 n T3-mry*). Translating *ḥ3w-nbw* as 'Greeks' and interpreting 'sovereign of Egypt' as the satrap Ptolemy I before he took the royal title, Derchain sees in the Memphite dignitary one of the Egyptian advisers of Ptolemy Soter, a colleague of the famous Manetho.

The 3.6 m large naophorous statue of Horemheb (Harmais) Cairo CG 1230 was found at Naukratis, the only Greek city in Egypt before Alexander. Horemheb, son of *Kr3ts* and Smithis, explicitly calls himself a 'Greek' (*ḥ3w-nbw.t* again). His mother is Egyptian, but the name of his father, followed by a foreigner determinative, is considered by Derchain a rendition of Greek Krates; this is not unlikely, though I would have liked to learn why *Kld*, the Egyptian name Kollouthos, does not come into consideration. One of Horemheb's deeds was the erection of bronze statues of his parents, and this too is considered a Greek rather than an Egyptian custom, though again the parents are presented honouring an Egyptian god. Everything seems to be Egyptian in this statue except for the ethnic, the patronymic and the bronze.

Two long inscriptions, one published here for the first time, illustrate the career of Senoucheri, son of *Jsnj* (Greek Jason?) and Ta-merout. They were found in Qous and Koptos respectively. Senoucheri had a successful career in a faraway place (Alexandria?), where he played a role in the 'secret council' and was trusted by the king; on his return home he was active in the building and restoring of local temples, the organization of processions and offerings to the gods and the erecting of statues for the king and for Queen Arsinoe. His role in the cult of Arsinoe shows that his career went on until after 270 BC.

Inscription 56 from the tomb of Petosiris honours Petosiris' son Thotrek, who died as a boy. The long description of the death of the child and the general sadness in the city are compared to the theme of premature death (*ἄωρος θάνατος*) in Greek Hellenistic poetry and a causal relation is suggested by the title 'the epigram of Petosiris'.

The hieroglyphic texts are found at the end, on pp. 106–11. The translations on pp. 41–55 are followed by the notes on pp. 58–103 (one has to look at the running titles at the top of the page to find out which text they deal with) and the texts have individual introductions on pp. 18–33. The reader has to flip back and forth all the time, which makes reading rather cumbersome. It would have been easier if each text had been presented separately, with introduction, text and translation (preferably one opposite the other), and notes. The general theme of the book, the interaction between Egyptians and Greeks, often all but disappears when one is struggling with the stereotyped formulas of late Egyptian self-glorification. Depending as it does upon the interpretation of one or two words or names, the whole issue remains rather hazy and uncertain.<sup>1</sup>

<sup>1</sup> A more elaborate survey of Egyptians at the Alexandrian court is now given by B. Legras, 'Les experts égyptiens à la cour des Ptolémées', *Revue historique* 307 (2002), 963–91, duly stressing the uncertainty of many of his fifteen test cases, which include Derchain's nos. 1, 3–4 and 5.

The hieroglyphic monuments show us the Egyptian face of these people and if from time to time we catch a passing glimpse of their Greek side, this is due to a small crack in the mirror, and hardly intentional. Perhaps this is what Derchain means by the enigmatic title 'Les impondérables de l'hellénisation'.

WILLY CLARYSSE

*Women and Society in Greek and Roman Egypt: A Sourcebook*. Edited by JANE ROWLANDSON. Pp. xviii + 406, figs. 7, pls. 49, maps 3. Cambridge, Cambridge University Press, 1998. ISBN 0 521 58815 4 paperback. Price £16.95.

Scholarship on Hellenistic and Roman Egypt tends to divide along linguistic lines: Egyptologists who can read pharaonic Egyptian texts as well as Demotic and/or Coptic, and papyrologists whose knowledge of Greek and Latin equips them to deal with papyri, ostraca, and inscriptions in those languages (especially Greek). Although a handful of scholars are equally competent in both arenas, the realities of academic training and specialization mean that most focus on one language group and therefore must rely on translations for source material in the other. The book under review bridges the linguistic differences between the disciplines of Egyptology and papyrology and makes the rich textual sources for Greek and Roman Egypt available to a wider audience of scholars and students alike.

This valuable 'sourcebook' collects 289 documents, each of which is numbered and presented in English translation with a discussion of the text's context and significance. The book is edited by Jane Rowlandson, and the texts have been prepared by Rowlandson and a team of experts in papyrology and Egyptology: Roger Bagnall, Alan Bowman, Willy Clarysse, Ann Ellis Hanson, Deborah Hobson, James Keenan, Peter van Minnen, Dominic Rathbone, Dorothy J. Thompson, and Terry Wilfong, with further assistance from John Baines and W. John Tait for Egyptian sources.

Although no clear explanation for the book's focus on the lives of women is offered, it may in part have been suggested by the type of evidence that has survived, almost uniquely, from Egypt: personal letters, legal documents, and magical and medical texts, all of which provide a glimpse of individuals' private lives. Rowlandson points out that this evidence does not concern women alone, but women's interactions with others in an array of contexts, so that the texts 'throw light...on broader aspects of Egyptian society in this period, from demography to literacy, governmental structures to religious practices' (p. 2). The volume is not explicitly concerned with theories about the construction of gender in antiquity.

Convenient 'Notes for the reader' (pp. xiv-xvi) explain text editing conventions, the Egyptian calendar, and money, weights, and measures. This information, together with the glossary (pp. xvii-xviii), offers a concise, helpful overview of technicalities that more specialist works take for granted. The 'Introduction' (Chapter 1, pp. 1-23) provides a historical background to Hellenistic and Roman Egypt and surveys the types of textual and archaeological evidence that survive from these periods. The next five chapters are arranged around themes: 'Royalty and religion' (Chapter 2, pp. 24-83), 'Family matters' (Chapter 3, pp. 84-154), 'Status and law' (Chapter 4, pp. 155-217), 'Economic activities' (Chapter 5, pp. 218-79), and 'Being female' (Chapter 6, pp. 280-368). Each chapter has a concise introduction elaborating on the theme, and the chapters are further divided by subtopics. Maps, line drawings, and black-and-white photographs, of papyri, works of art, coins, and seals, and archaeological views and plans, complement the texts and are well chosen. A document list and concordance, a bibliography of cited works, and a useful index complete the book.

Throughout the volume, what stands out is the variety both of the sources included and of the experiences of the women involved. Chapter 2, on religion, covers a wide range of topics from Ptolemaic queens to the cult involvements of priestesses and other women, including a selection of texts (nos. 49-68) concerning Christian women and female martyrs and saints. Chapter 3 considers family and household matters, such as the registration of births, census declarations, and

communications between family members, a few of which are worthy of a soap opera with their allegations of desertion (no. 88), wife-beating (no. 89), and kidnapping (no. 91). This chapter is noteworthy for incorporating texts from ten household archives spanning a millennium, each giving a slightly different view of Ptolemaic and Roman Egypt due to the archives having come from diverse parts of the country, and because of the variance of the families' cultural and socioeconomic status.

Since individuals and offices were most likely to store documents like wills, contracts, and deeds for safekeeping, many surviving papyri deal with legal matters. Chapter 4 focuses on legal issues in the Egyptian and Greek systems, both of which operated in Ptolemaic Egypt, and on the changes instituted by the Roman administration. The texts highlight interactions between Greeks and Egyptians in the Ptolemaic Period and the privileges that were accorded to certain classes of people, such as Roman citizens, in the Roman Period. Greek and Roman law restricted the ability of women to represent themselves in transactions (see nos. 122, 140, and 142), but Egyptian law did not. The collected documents show women engaged in disputes over property and in settlements for marriage and divorce, and a sample of Coptic texts (nos. 157–61) addresses practices that differ somewhat from the Greek evidence.

Chapter 5, on women's economic activities, is divided between agricultural and non-agricultural work. Women could own land, equipment, and animals outright, and were active in the textile industry (see nos. 200–3, 205, and 206) and in other income-generating work, such as wet-nursing (nos. 213–14) and music and dance (nos. 215–16). Inevitably, women and girls also numbered among the slaves and prostitutes of Hellenistic and Roman Egypt, and with little education, most women had limited opportunities and always needed the protection of their husbands, families, or, for slaves, owners. The last chapter of the book, Chapter 6, looks at how education and events such as birth, marriage, and death affected women. It touches on health concerns, literacy, childcare, and weddings, and the funerary arrangements, monuments, and epitaphs made for women (nos. 271–9), who are well-represented in funerary art of the period (see figs. 42–3 and 45–8). Finally, the chapter considers 'the ambiguities of womanhood' (pp. 354–68), and is a fascinating look at how the female body and female sexuality were portrayed in medical, magical, and literary texts.

An obstetrical handbook from the Roman Period advised the midwife to receive a newborn baby after covering her hands with cloth or 'as those in Egypt do, with scraps of thin papyrus, so that the baby won't slip off and won't be squeezed, but may rest in quiet' (no. 222: Soranos, *Gynaecology* II 6). Fortunately, papyrus was put to many other productive uses as well, and as a result, documents like the ones collected in this sourcebook reveal social norms and private lives in a way that is unparalleled elsewhere in antiquity. Rowlandson and her collaborators are to be commended for this sound and readable volume, which will repay the reader who consults it for specific material, reads it straight through, or dips into it at will for a taste of Greek and Roman Egypt.

CHRISTINA RIGGS

*Nécropolis*, 1. Edited by J.-Y. EMPEREUR and M.-D. NENNA. Institut Français d'Archéologie Orientale 867 (*Études Alexandrines*, 5). Pp. vi + 527. Cairo, IFAO, 2001. ISBN 2 7247 0297 2. Price Euros 60.

When in 1997 a new major elevated highway cutting its way towards the western harbour of Alexandria broke through into a hitherto unexplored part of the ancient necropolis of Gabbari, the Centre d'Études Alexandrines (CEA), directed by Jean-Yves Empereur, was asked by the Egyptian Supreme Council for Antiquities (SCA) to follow up its initial examination of the site. The volume under review, produced with remarkable celerity, describes four hypogea, excavated into the limestone bedrock, in one comparatively small part of Area B of the cemetery, in which some 43 such tombs were located, in some cases at more than one level. These four are numbered

B1, B2, B3 and B8, and like the other tombs are all rock-cut; they normally consist of a large chamber with loculi quarried into two or three sides, and with entrances and stairs into similar chambers on the same level and lower levels; B1, for example, has three levels. The loculi are regularly placed in rows cut one above the other, often with 5 rows or even more: B1.2 has 5 rows of 6 cuttings in one wall, and the whole hypogeum has 251 loculi for inhumations and 5 niches for cinerary urns. The loculi were sealed by rectangular stone slabs mortared into place, sometimes with painted decoration and inscriptions. One loculus, chosen for full anthropological treatment, held the remains of at least nineteen individuals. The architecture of the tombs is very fully described by Olivier Callot and Marie-Dominique Nenna, with many photographs, and fine drawings of plans, elevations, details and axonometric reconstructions. This part of the cemetery was in use from the middle of the third century until the middle of the first century BC, at which time it fell out of use until about AD 100; a second phase of usage occurred in the second and third centuries AD and a further period commenced during late Roman times, continuing until about the middle of the seventh century.

After an introduction by Jean-Yves Empereur, with a brief history of the Gabbari cemetery and details of his excavations, the bulk of the volume is taken up with many discussions of the material found, in addition to the long chapter on the architecture mentioned earlier. Ahmed Abd el-Fattah describes the work of the SCA in 1996–7, when the site was discovered, and lists and illustrates a selection of the most important finds; the painted decoration of Tombs B1–B3 are discussed, with drawings, both black and white and in colour, and coloured photographs, by Anne-Marie Guimier-Sorbets, Nenna and Mervate Seif el-Din. Aspects of the conservation and restoration of tombs and contents are given by Marie-Laure Courboulès while Ioanna Kakoulli reports on the scientific examination of the plaster and paint used on three of the stone loculus slabs. The 26 inscriptions are transcribed and translated by Marie-Françoise Boussac and Jean-Yves Empereur: these consist of concessions granted to owners of wall-space where loculi are to be cut, epitaphs, both Pagan and Christian, and inscriptions on Hadra hydriae. Lastly, a selection of the human remains from the tombs is discussed by Patrice Georges.

The remainder of the volume concerns the grave goods recovered. Pascale Ballet, Marie-Françoise Boussac and Arnold Enklaar describe the Hadra hydriae, seven made in Crete and one in Alexandria, used as funerary urns, and Gilles Grévin and Paul Bailet discuss the incinerated bones found in such urns found in Tomb B1. The pottery found—local, imported from Aswan and from outside Egypt, ranging from Ptolemaic to late Roman times—is introduced in a preliminary report by Pascal Ballet and Cécile Harlaut; Ahmet Kaan Senol has a chapter on the amphorae found in the four tombs, each of which contained differing quantities and varieties of the Egyptian and imported jars with dates covering the chronological span of this part of the cemetery. Stamped amphora handles are collected together by Gonca Cankardes-Senol; most, as one might expect, are Rhodian, but a couple are from Knidos, one is Cypriote and one may be Parian.

The terracotta figures found in Tomb B1 are discussed by Dominique Kassab Tezgör: most are of Tanagra type, but locally made, though a seated Harpokrates and a couple of Aphrodite-Isis figures (I prefer to see in these the goddess Hathor) probably come from elsewhere in Egypt. Lamps from all four tombs are plentiful, some 480 being recovered, and a useful selection of these is illustrated and catalogued by Camélia Georges: they range in date from the end of the fourth century BC to late Roman times. Nenna provides information on the few objects of glass found, including two Hellenistic finger-rings, Roman unguentaria and other vessels, and late Roman lamps.

The final chapter is a summing up, by Empereur and Nenna, of the results obtained from the excavation of these four tombs. They contained 434 loculi, 8 niches and 3 sarcophagi. The number of people buried lies between 1500 and 2000, of which the vast majority were inhumed, only about 25 cremations being noted; a few traces of embalming were recognized, mostly of the Roman Period. The general dating of the tombs is deduced, and a comparison is made between Gabbari and other necropoleis of Alexandria. This part of the necropolis was not for the poor, but neither was it for the wealthy. The CEA, under Empereur's direction and employing many enthusiastic and mostly young archaeologists, has, with its urban excavations and underwater exploration,

given great impetus to the study of ancient Alexandria. Its publications, of outstanding quality and well illustrated, appear rapidly and are of considerable use to other workers in the field of Ptolemaic and Roman Egypt and, indeed, outside it, and the good news is that *Nécropolis 2* is now published.

DONALD M. BAILEY

*Alexandria in Late Antiquity. Topography and Social Conflict.* By CHRISTOPHER HAAS. Pp. xviii + 494. Baltimore and London, The Johns Hopkins University Press, 1997. ISBN 0 8018 5377 X. Price £37.

The invitation to review Christopher Haas's book in April 2002 came as something of a surprise, but offered, the welcome possibility of assessing the book some years after its publication when it provoked contrasting reactions. Haas attempts to reinterpret Alexandria's notoriously tumultuous political and religious history in 'late antiquity' in terms of competition 'for cultural hegemony' between the city's main 'ethno-religious groups' (i.e. Jews, pagans and Christians). His aim is to 'capture an essential element in the history of Alexandria: the constant interplay among the built environment, the socio-economic and political structures of the city, and the ongoing competition for cultural hegemony' (p. 14).

After a description of Alexandria's topography and of its 'economic and social structures', Haas proceeds to present its 'ethno-religious communities' one by one, giving special attention to their topographical location. The Christian community receives more attention than the other two, no doubt because of the great number of sources on focusing dissent within it during that period. The three chapters devoted to the Christians integrate the questions of topography and urban landscape within the general picture much more successfully than those on the other two communities. 'Intercommunal conflict' is addressed in a final chapter, through the analysis of three well-known episodes of popular violence: the Alexandrian riots of 356 and the lynching of the bishop George of Cappadocia, the murder of the pagan philosopher Hypatia within the broader context of Cyril's elevation to the patriarchate, and the troubles between Chalcedonians and anti-Chalcedonians in the 480s, leading up to the destruction of the pagan temples at Canopus and Menouthis. The appendix containing a table of fourth- and fifth-century 'emperors, prefects and patriarchs' might have been usefully supplemented by a list of the various events mentioned in the book. A complete, or even selective, bibliography would have been more than useful, and would have allowed Haas to keep his often too-long endnotes more to the point.

*Alexandria in Late Antiquity* has been praised for various reasons, not least for being as yet the only monograph on the city for the period concerned. It puts together much published material and presents an overall picture of the city's history that was badly needed. It reconsiders and puts into perspective several well known facts, offering new insights or at least asking new questions. It also has the merit—still quite rare—of trying to integrate archaeological evidence with papyri, inscriptions and other sources. It can thus serve as a bibliographical compendium for somebody who is looking for information on late antique Alexandria.

This is where the problems start. Haas obviously understands 'late antiquity' in its broad sense, going from the fourth to the seventh century, since he regularly refers to events of the sixth and seventh centuries. His opening line mentions Justinian. However, his book is really about the fourth and the fifth centuries, as the limits chosen for his chronological table show. This is probably because 'intercommunal conflict' was more prominent during this period. Had Haas limited his study to those two centuries, he would have avoided such anachronisms as describing the 'typical day' of an Alexandrian Christian in the early seventh century (pp. 190–1) as a background to fourth- or fifth-century popular violence. Ancient historians often seem to forget that three hundred years is a very long time.

Haas's thesis that 'social conflict' in Alexandria was essentially the result of the harsh competition between the city's 'ethno-religious groups' to control the urban landscape and to establish 'cultural hegemony' also suffers from problems of definition. The term 'ethno-religious' can only make sense in the case of the Jewish community. What was its meaning in the case of the other two? Was there no criterion other than religion that might have commanded group allegiance? A short passage on hippodrome factions in Chapter Two (pp. 64–5) is not integrated into the discussion about conflict and unrest. 'Cultural hegemony' is another expression that needs definition. How is 'culture' to be understood here? Only by religious adherence? Was the 'culture' of the Christians of Alexandria in the early fourth century the same as that of the late fifth? Was it homogeneous? Whatever 'culture' may mean in this study—and this remains unclear throughout—the answer is no.

The author's aim to capture the interplay between the 'built environment' and the events staged there is a most promising one, conceived originally by Edmund Bacon in his work on modern cities.<sup>1</sup> However, Bacon's analysis is based on cities and populations that are much easier to 'capture' than ancient Alexandria, about which we know almost nothing compared to our knowledge of the urban setting of modern cities. Insisting on the importance of the *Via Canopica* and imagining street networks or itineraries from approximately located churches to even more approximately located neighbourhoods somehow does not sound as convincing as Bacon. Topography generally remains quite external to the events throughout, and in his conclusion, Haas entirely omits the topographical approach, to give a summary of his vision of community relations during the two centuries he covers.

As has already been said, Haas's book is very informative on late antique Alexandria. Here too, however, one must be cautious. The unusual number of mistakes in his presentation of the topography and of political and ecclesiastical matters has been noted by previous reviewers,<sup>2</sup> and repetition is pointless here. There is, however, a more fundamental flaw to this study. Although Haas has read a huge amount of source material, he has not always surveyed the critical literature concerning these often extremely difficult and tricky texts. The task was immense, to be sure, but historical interpretation of the kind offered by Haas, that is, of a broadly sociological nature, requires the facts to be established correctly. Sociologists working on inner-city violence in the late twentieth century are extremely careful about the date, origins and ideological implications of their evidence. A very striking example of the author's treatment of sources can be found on p. 160:

A later Coptic tradition *informs us* [reviewer's italics] that Athanasius's secretary was sitting with him at table when the aged patriarch uttered his wish to close the Serapeum.

The secretary's name was Theophilus.

Haas's source here is the *History of the Patriarchs of Alexandria*, compiled in the tenth century, even though it incorporates earlier texts and traditions. It is a collection of hagio-biographies of the city's bishops, full of the most typical *topoi* of this kind of literature. It could not but present Theophilus, successor of Athanasius, as having been his closest collaborator and confidant. The very use of the term 'patriarch' is an anachronism for that period. This kind of text does not 'inform us' of anything, except perhaps the intentions of its author.

Similar treatment is given to texts and events much more central to Haas's thesis than the presence of Theophilus at Athanasius' table, such as the transformation of temples into churches. For instance, he seems to take for granted that Bishop Alexander (312–28) converted a temple of Kronos into a church dedicated to Saint Michael the Archangel (p. 209), a story told in the tenth-century *Annals of Eutychius* and reproduced in the even later Copto-Arabic *Synaxarium*. Pagan temples were still under state protection at the time, something Eutychius may not have known, but which should pose an obvious problem for an historian of the late twentieth century. The expression 'a late chronicle informs us' is used here too, showing that even though Haas noted the date of his source, he did not really consider the implications of the date.

<sup>1</sup> *The Design of Cities*<sup>2</sup>, London, (1974).

<sup>2</sup> See especially T. D. Barnes, *Journal of Theological Studies* 49 (1998), 363–5; J. Gascou, *Topoi* 8 (1998), 389–95; and P. Blaudeau, *Antiquité tardive* 7 (1999), 430–1.



Haas also overlooks the ideological implications and intertextual and rhetorical aspects of his sources, especially the role of literary *topoi*, which are so important in ancient sources, taking many texts at face value, and thus constructing what I would regard as a biased picture of late antique Alexandria. One of his contentions is that communal identities were more rigid and boundaries more sharply defined in Alexandria than in other late antique cities. He explains this by 'a particular set of local circumstances', such as 'long-standing hostility between Greeks and Jews', or the fact that 'the persecution of Christianity was particularly fierce in Alexandria' in the third and early fourth centuries (pp. 335–6). Most of his sources, contemporary or not, were strongly influenced by religion, and thus tend to present the communities as much more strictly defined, and in more competitive terms than was really the case. Ewa Wipszycka, whose work is strikingly little used here, has shown how accounts of hatred between Greeks and Copts were biased and late—in fact, a myth created in anti-Chalcedonian circles after the Arab conquest.

Haas's attempt to 'examine one of Alexandria's most important inhabitants—the Christian layman' (p. 190)—suffers from yet another defect: the tendency to 'imagine' what he does not know or cannot infer from his sources. The section in Chapter Six entitled 'The Christians of House D' starts with a quotation of the closing lines of the liturgy of St Mark. Haas then proceeds to describe how the crowd returned slowly to their homes, as an introduction to the description of a 'typical' house in the Kom el-Dikka neighbourhood. Passages such as the following (p. 191) are worth quoting:

[Our Christian] proceeds through the Agora and pauses to see if any new laws that might affect his family or his business are posted. He passes quickly by the imposing statues arrayed outside the Tychaion, and he recalls rumours he had heard recently that the statues (under the influence of evil demons) had spoken to terrified witnesses in the dead of night, announcing the sudden death of the emperor Maurice. After making the sign of the cross, he hurries on.

He soon strolls along two large blocks of the Via Canopica until he turns south into his own neighbourhood. As he does so, he utters a short prayer, repeating a portion of the Anaphora of the service he had just attended.

This sort of narration may have the advantage of making the topography and ordinary religious practice come to life, but it also includes a number of choices and interpretations. How much an 'ordinary Christian' would have heard of the rumours mentioned by Theophylact Simocatta (*Hist.* 8.13.7–14), whether he was literate, or whether 'a portion of the Anaphora' was the most typical prayer uttered by people to obtain divine protection for their neighbourhoods—in fact, whether they uttered such prayers at all—are questions that deserve at least a short discussion. As Haas concedes, the life of 'the rank-and-file members' of the city's communities is a 'particularly elusive subject', and this is not only true for Alexandria, as he seems to believe. There is a great amount of scholarly literature on the difficulty of access for historians to the realities of ordinary people, and one would have welcomed at this point a discussion of these problems rather than an elegant, narrative *tour de force* filling the void.

It is a pity that after collecting such an amount of evidence, for which one is naturally grateful, Haas did not manage to exploit it successfully, either on the 'erudite' side, or in the more conceptual aspects, which lack serious construction. His book will remain essential as a source of general information until a new monograph appears, but will not radically alter our vision of fourth- and fifth-century events, or of Alexandrian topography.

ARIETTA PAPACONSTANTINO

*The City in Roman and Byzantine Egypt.* By RICHARD ALSTON. Pp. xvi + 479. London and New York, Routledge, 2002. ISBN 0 415 23701 7. Price £65.

Long though it is ('a matter of some shame', p. 2), this book consists of just six chapters, and of these the first ('Introduction') is but three pages of historical sketch, approach, and boundary-

setting. The second ('Cities and space') is a breathless grand tour of theory, and the remainder move from smaller to larger spatial units: 'Houses' (ch. 3), 'Streets, districts and neighbourhoods' (ch. 4), 'The city' (ch. 5), and 'The city, region and world' (ch. 6). The length of the chapters (138 pages in ch. 5, the longest), coupled with their poorly-articulated internal structure (the sections are not listed in the Contents), at times gives the reader a sense of lacking location and direction. The publishers certainly deserve some of the blame for inflicting on the reader a book as poorly organized and undisciplined as this is. Nor can they escape some of the censure for the pandemic slovenliness in matters of Greek accentuation, in citation (Alston complains (p. 46) about the 'cabbalistic' nature of papyrological abbreviations, but his claim to help the situation by using those of the *Checklist* is false; P. Green. [sic] instead of P. Grenf. is only his most distinctive contribution), in geography (p. 110, Marina el-Alamein, just 100 km west of Alexandria, is placed 'on the border between Egypt and Libya'), and in everything else philological. My favorite is the theologically risqué Hagiou Theotokou omou (p. 387, duplicated), supposedly a *laura* in Arsinoe; *homou*, of course, just means 'altogether' in the account being cited, and at last report the Virgin Mary was female. The problem is not, as Alston suggests (pp. 2-3), that he has not re-read the papyri on photographs; it is that he does not give the impression of being able to read the printed editions. Bibliography is voluminous but rarely cited where someone has already made a point being argued here, and citations (in social science format) are far too often lazily lacking in page numbers, leading one to wonder where in a book of hundreds of pages a particular question has been treated. Once again, where was the copy-editor?

If we leave these irritations to the side, what do we find? Chapter 2 leads us to the conclusion that this chapter has been 'a search for theory, a way of seeing the world, of which the rest of the book is merely a worked example' (p. 43). Alston disclaims either truth or objectivity, settling for an 'informed reading'. Although this book does not derive from a thesis, the chapter reads like nothing so much as an introductory thesis chapter, full of unnecessarily schematic descriptions of critical stances that in reality are more nuanced. It could have been cut to a fraction of its size. There is not really much new in learning that historians are not omniscient or free of context, interests, and bias. Fortunately, the common sense that is regretfully dismissed as inadequate as a theoretical stance rescues Alston from either grand deterministic theories or postmodern tendencies to see individual acts as atomistic and unconstrained (p. 38). For better or worse, in any case, the claim that this book is heavily theoretical is untrue. Most of it is unvarnished recounting of data and evidence, with thin slices of theory at the ends of chapters.

With chapter 3 the journey from house to world begins. Here, as later, evidence from villages is used alongside that from cities. The question of what 'city' means is not, in fact, engaged until chapter 6, and then only to the point (p. 410 n.1) of saying, unhelpfully, that 'a city should be a densely occupied centre of population'. This is not a minor point, because one of the most important issues about the cities of Roman Egypt is precisely their relationship to the villages, from which they were differentiated with increasing sharpness. Here we get no clear distinction between village and urban houses, either in archaeology or in texts, and the Fayyum villages dominate the discussion of the Roman Period, particularly on key issues like the sharing of houses by multiple families. The persistent use of English houses as the main comparand is not enlightening. There is no discussion of Ptolemaic evidence to provide a benchmark for the changes in the Roman Period, on which some stress is placed. What we do get is a compendium of information, both papyrological and archaeological, which will be very useful to anyone wanting to study the subject, and a stress on the great diversity visible in the record.

Much emphasis is placed on the ability of houses both to reflect and to create social and cultural values and structures, but in the end any such connection of the houses we see with social and ideological change remains entirely speculative. Alston asks particularly how far one can discern the extent to which houses were intended to be open to the outside world or to provide a closed refuge for the family. The evidence is mixed, and he sensibly avoids trying to force it into a single mould or to describe any single pattern in women's relationship to domestic space, but he does argue that houses embodied heavy emotional investments. The lack of focus and structure, however, leads us through by-ways like brother-sister marriage and the economic role of women, interesting subjects on which nothing both new and true is said here and which are not very tightly

linked to any overall direction in the argument. The chapter concludes with the view that new forms were the product of new ideologies ('such as Graeco-Roman culture or Christianity') and reflect deep cultural change. Unfortunately, the lack of long data series in any one environment leaves it unclear how much we are looking at regional variation, differences between economic levels, urban-village divisions, or diachronic change.

From the house we move, in chapter 4, to larger units, streets, and districts. We are warned at the start that 'the results of these investigations are, frankly, confusing' and that comparative evidence will be called on to compensate. Much of the chapter is devoted to listing and discussing the administrative districts of the cities (especially Hermopolis, Thebes, Oxyrhynchos, and Ptolemais Euergetis) in an attempt to see how far these corresponded to neighbourhoods with some social coherence. The organization looks fairly stable until the fourth century. Administrative units varied greatly in size and nature from city to city, for reasons we do not know; Alston argues that the system of *amphoda* is essentially an early Roman innovation, even though many of the landmarks after which they were named were Ptolemaic in origin. On the whole, he believes that the administrative divisions were not entirely artificial and did reflect something of the social organization of cities, but the nature of the documentation makes it hard to have any confidence, and there is no sign that neighbourhoods were in any way closed units. The late antique divisions begin, in Alston's view, to look somewhat like parishes. Among the strengths of the chapter is the demonstration that despite occasional *amphodon* names suggesting the contrary, practitioners of occupations were not geographically clustered. What I find importantly lacking is any thought about the complex interplay between the Egyptian residential quarters and the axial armature overlaid on it by the Romans, so compellingly analyzed in William L. MacDonald, *The Architecture of the Roman Empire, II. An Urban Appraisal* (New Haven, 1986).

The kernel of the book is the long chapter on the city. Alston's first concern is to demonstrate that the Egyptian temples were still vital parts of the city and important economic engines in the period down to Trajan, although they were brought into the Roman administrative framework and lost much independence. Once again, much of the evidence is from villages, thus obscuring any possible differences in the evolution of these settlements. But it is hardly news that the temples were still strongly in business in the first century, or for that matter, the second. One has only to consider how many new temples were built in the western oases, where settlement was expanding rapidly in this period.

After a digression into the Jewish community in Alexandria and its conflict with other elements in the city, we turn to the city in the second century. Here Alston sees much more change, including the first real signs of Romanization of civic space; he draws particularly on Hermopolis, Antinoopolis, and Athribis. Ritual life was increasingly reoriented toward the spaces and institutions of classical cities, as the elite participated in the imperial cultural system. This transformation was well developed by the early third century, when the nome metropoleis got their city councils. The process of formation of the civic elites, regrettably, gets almost no attention, crucial though it is for understanding how the Romans transformed the Ptolemaic nome capitals into cities.

The discussion of the third century steers away from talk of crisis, seeing neither long-lasting effects of the Antonine plague nor any sign that the urban elites were pulling back from the expansionistic ambitions that formed the Roman cities. This view seems to me largely right. Alston does see some growing reluctance to serve in liturgies (a subject upon which his bibliography is weak, with almost no sign of the works of Naphtali Lewis), but his observations on the attestations of public offices result in a classic display of 'chartjunk' (cf. E. R. Tufte, *The Visual Display of Quantitative Information* Cheshire, Conn., 1983), 107-21). We turn to the fourth century, with an extended topographic snapshot. There is much vacillation about the condition of the temples, mostly with no good evidence. The urban economy, Alston argues, was 'managed', and the unseen economy small. It is not obvious that the hidden economy is a meaningful concept for late antiquity. The modern equivalent comes into being because of taxes that did not exist in the ancient world, like value-added tax and income taxes. The important changes in civic government are discussed, with more 'chart junk' (and no attempt to normalize the data for variation in documentation). Like others, Alston sees an increasing concentration of

power in the hands of a smaller subset of the curial elite. The discussion of Christianization has nothing to add; the discussion (p. 283) of Egypt's literary stars misses the fact that most of them were Christians.

In the 'Byzantine' city Christian institutions were ubiquitous, and much space is devoted to enumerating them and to recounting the activities of bishops and monks. Alston emphasizes the limits of bishops' powers but sees Christianity as a powerful force, integrating the city as a community to a greater degree than was true in earlier periods. The period of Christianization thus marks the second major transformation of the period covered, the first being the adoption of Roman institutions and spatial patterns.

The final chapter looks at the city in the context of the nome (or civic territory, as it effectively becomes) and the larger world. The Roman city, it is argued, was significantly connected to the villages through the relationships of temples to one another and of the rural population to the city's temples. The evidence is not strong, but the historical function of the nome towns certainly included a strong religious component, and there is no reason that the central role of the city temples should not have continued in the early Roman Period. By contrast, Alston thinks that the other institutions of the Roman city had little impact on the rest of the nome. Once again, this argument ignores the problem of the constitution of the urban elite and its relationship to its rural properties.

Moving on to the fourth century and later, the loss of the temples' function is not, in Alston's view, compensated by the development of the structures of the church. It is not clear why this should be so, and we are offered neither evidence nor argument to support the view. The hierarchical connection of the cities with their bishops to the villages with their presbyters was far more immediate than the corresponding links of temples, and one might suppose that the bishop's power, whatever its limitations, ran much further than that of the urban priesthoods.

The economic integration of the cities is discussed without any serious consideration of diachronic change. The broad endorsement (p. 345) of the consumer city model is not argued. Instead, we are offered a long rant on modern economic development, ending in the view that Roman changes strengthening the urban elites may have reinforced urban markets at the expense of village economies. But Alston pulls back from the notion that the underdevelopment of rural areas was an intentional means of supporting the cities. Instead, he thinks, the profits from supplying the cities spurred rural investment. He sees a rise in the number of villages in late antiquity (best documented in the Oxyrhynchite nome) and compares the late antique efflorescence of the limestone massif in north Syria. It is not obvious that these views are irreconcilable. As I argued in *Egypt in Late Antiquity* (Princeton, 1993), rural integration into the urban economy could simultaneously bring both increased investment in productive facilities and a loss of economic diversity at the local level. This is indeed a recurring pattern, visible in developed countries today, where the mobility offered by motor transportation has led to the disappearance of retail business in smaller settlements.

As will be obvious, I have found this a frustrating book. It assembles a large amount of material and sometimes subjects it to interesting analysis. Generalizations and conclusions are rarely extreme and usually rooted in common sense; they are also for the most part unoriginal. There is no strong thematic or argumentative thread running through these many pages, and the information is only rarely connected to the theoretical concerns. It looks as if nothing once read or investigated was ever jettisoned as insufficiently germane to the overall purpose, and that purpose is often obscure. In short, this is the material for a book rather than the book itself. Readers tempted to use it simply as a quarry, however, must bear in mind that the sloppiness and lack of philological competence mentioned earlier leave the tables and notes full of booby-traps.

ROGER S. BAGNALL

*Qasr Ibrim. The Hinterland Survey.* By PAMELA ROSE, with a contribution by PENELOPE WILSON. Excavation Memoir 62. Pp. 162, pls. 136. London, Egypt Exploration Society, 1996. ISBN 0 85698 133 8. Price £50.

Die vorliegende Studie präsentiert die Ergebnisse des Survey, der in vier Saisonen zwischen 1986 und 1992 von der Egypt Exploration Society im Hinterland von Qasr Ibrim durchgeführt wurde, um die gut dokumentierte Festung erstmalig in den lokalen archäologischen Kontext einzubetten. Ausgespart bleiben die Relikte der christlich-nubischen Zeit, die einer späteren Untersuchung vorbehalten sind.

In einem einleitenden Überblick skizziert die Verfasserin die herausragende Stellung Qasr Ibrims vom Neuen Reich bis zur osmanischen Periode am Schnittpunkt der Routen, die Ägypten mit dem Sudan und der eritreischen Rotmeerküste verbanden. Gleichzeitig hält sie fest, daß im Verlauf des Survey mit einer einzigen Ausnahme keine Grabung vorgenommen wurde und daher die Dokumentation ausschließlich auf dem Oberflächenbefund beruht, da das durch Winderosion betroffene Gebiet kaum die Erstellung einer brauchbaren Stratigraphie ermöglicht hätte.

Das Folgekapitel umfaßt einen detaillierten Katalog jener 517 Fundstätten, die nicht der christlichen Periode zuzurechnen sind (allerdings fehlen die Nummern 9001–9003, da es sich bei ihnen um bedeutende Komplexe aus der direkten Umgebung der Zitadelle handelt, die gleichfalls in einer gesonderten Studie behandelt werden sollen). Sie datieren an das Ende des ersten vorchristlichen Jahrtausends und implizieren, daß der größte Teil des Hinterlandes nur kurzzeitig besiedelt war. Die Strukturen selbst gestatten entsprechend ihres jeweils rekonstruierten Verwendungszwecks eine Unterteilung in mehrere Gruppen, wobei sich lediglich die Bedeutung der mit einer Steinmauer eingefriedeten Felsüberhänge aufgrund ihrer Assoziierung mit menschlichen Knochen und der geringen Dimensionen als Grabstätten erschließen läßt. Allgemein gültige Erkenntnisse zu den Begräbnispraktiken lassen sich daraus jedoch nicht ableiten, obwohl Tore in den Einfriedungen Zugang zu den Gräbern ermöglichten, um offensichtlich Opfer darzubringen. In diesen Kontext dürften gleichfalls *in situ* aufgefundene Gefäße einzuordnen sein sowie auf den Felsüberhängen befindliche künstliche Vertiefungen und Gebäude, die mit Ausnahme eines Vorhofes keine Standardisierung erkennen lassen. Den Bestattungen benachbarte freistehende Gebäude bestehen aus einem langgestreckten Raum mit separaten Kammern an einem oder beiden Enden und scheinen als Grabkapellen gedient zu haben, die über eine längere Periode hinweg genutzt wurden.

Auf dem Plateau fanden sich zwei weitere Gruppen von Strukturen mit L-förmigem oder rechteckigem Grundriß, die in identischer Orientierung ihre jeweiligen Eingänge an der Südost-Seite besaßen. Bei ihnen dürfte es sich um Wohnhäuser gehandelt haben, die aufgrund der Mauerhöhe und -stärke ihren Bewohnern Schutz zu bieten vermochten. Sie formten offensichtlich eine Siedlung, die die Straße nach Qasr Ibrim kontrollierte, obwohl der unregelmäßige Plan und die Zerstörung einiger Gebäude Fragen aufwerfen. Auch der große Komplex 9036, der aus einer genau definierten Ansammlung getrennter Räume mit Vorhöfen besteht, scheint als Siedlungsplatz gedient zu haben, wie die Vielzahl von vergesellschafteten Mahlsteinen nahelegt. Bemerkenswert sind die Zerstörungen im zentralen Teil des Plateaus, wo sich aufgrund der Funde spät- und postmeroitische Aktivitäten lokalisieren lassen. Ihr Ausmaß legt nahe, daß sich hier einige sehr bedeutende Strukturen befanden, deren Natur bislang unklar ist.

Als letzte Gruppe werden Steinhaufen unterschiedlicher Größe analysiert und als Ausdruck persönlicher Frömmigkeit (z.B. 9414 mit einer in eine Steinplatte eingeritzten geflügelten Sonnenscheibe) bzw. als Grenzmarkierungen gedeutet.

Insgesamt lassen sich für die meisten Strukturen mögliche Parallelen ausschließlich in der Ostwüste bis hin zur Küste des Roten Meeres feststellen, die im Zuge rezenter Surveys entdeckt wurden. Hier standen sie jedoch in Verbindung mit Bergbauaktivitäten, die allerdings für Qasr Ibrim nicht belegt sind.

Kapitel 3 ist den Inschriften an den Felswänden gewidmet, die die Straße zwischen der Siedlung und der Festung flankieren. Dabei handelt es sich um 130 Fußabdrücke mit meroitischen oder griechischen Texten, sieben Graffiti aus der christlich-nubischen Zeit sowie einige moderne arabische Inschriften. Fünfzehn der Texte sind mit Symbolen wie Opfertafeln, Hörneraltären,

Palmwedeln, Vögeln oder Kreuzen kombiniert, die gesondert analysiert werden. Bedauerlicherweise weist die Untersuchung von P. Wilson jedoch erhebliche Defizite auf, scheint die Autorin doch des Meroitischen weitgehend unkundig, da sie im Katalogteil falsche Lesungen der erhaltenen meroitischen Graffiti präsentiert. So vermischt sie *q* und *k*, *a* und *e*, *n* und *ne* sowie *e* und *o*; obsolet ist die Wiedergabe von *s* als *š*. Demzufolge sind Inscr. 23 als *ik en r s o* (statt *iq an r h o*), 56 als *s . . . l i s o* (statt *š . . . m . . . l i h o*) und 90 als *l h n e l o* (statt *l m / h n l e*) aufzufassen. Die Lesung von Inscr. 38 als *l h š : m i n i : b o l . . .* läßt sich anhand des Fotos nicht verifizieren, auf dem lediglich *. . . i : b o l . . .* eindeutig erkennbar ist. Ihre aufgrund des Schriftdukts vorgenommene Zuweisung in die Endphase des meroitischen Reiches basiert unter Ignoranz rezenterer Studien ausschließlich auf der ersten Untersuchung von F. Ll. Griffith aus dem Jahr 1911 (!), die heute in so manchen Punkten überholt ist. Im Gegensatz dazu sind die Kommentare zu den griechischen und koptischen Graffiti fundiert, die—soweit erkennbar—alle die Namen des jeweiligen Anfertigers beinhalten. Befremdlich erscheint dem Rezensenten allerdings die Schlußfolgerung, daß es sich bei den an der Verbindungsstraße angebrachten Inschriften lediglich um Äußerungen menschlicher Eitelkeit nach dem Schema 'Kilroy was here' (so S. 114) handle.

Das anschließende Kapitel umfaßt die Keramik, die sich in vier Hauptgruppen unterteilen läßt, wobei die zugrunde gelegten Klassifikationen von W. Y. Adams gelegentlich Modifikationen erfuhren. Grundsätzlich werden die Erkenntnisse durch den weitgehend fragmentarischen Zustand der Gefäße erschwert, deren Scherben über große Distanzen hinweg verteilt waren. Dies mag als Folge von Plünderungen, aber auch des rituellen Zerschlagens im Zuge von Bestattungszeremonien zu werten sein. Der Corpus belegt eine einzigartige Kombination oberägyptischer und meroitischer Waren, wobei Qasr Ibrim offensichtlich eine Grenze bildete, über die diese nicht in das jeweils gegenüberliegende Gebiet Verbreitung finden konnten. Ungeklärt bleibt, in welchem Umfang die Keramik lokale Produktion oder Handel reflektiert. Ergänzt wird der Komplex mit Untersuchungen zu den Graffiti und Dipinti ('potmarks'), die ausschließlich auf meroitische Waren beschränkt sind, sowie den sekundären lokalen Adaptionen. Letztere betreffen Bohrungen zur Reparatur oder Anbringung von Henkeln bei offenen Gefäßen sowie die Entfernung des Halses bei mehreren aus Aswan importierten Amphoren, deren Zweck nicht konkretisiert wird.

Es folgt die Präsentation der Objekte aus Stein, Glas, Fayence und Ton sowie eine kurze Diskussion der Knochenfunde. Herausragend sind insgesamt ein an Ba-Statuen erinnernder Menschenkopf auf einer dreieckigen Steinplatte, eine äußerst einfach gefertigte Stele mit dem Motiv einer stehenden vor einer thronenden Gestalt sowie ein Block mit konkaver Oberfläche und seitlichen Gravuren, der als Kopfstütze gedeutet wird. Dies wäre allerdings aufgrund des Materials und der Tatsache, daß bei dieser Verwendung die eingeritzten Motive auf dem Kopf stünden, zu hinterfragen. Gleichfalls wurde das Fragment einer meroitischen Inschrift entdeckt, die wiederum von P. Wilson (erneut mit erheblichen Mängeln) untersucht wird. So lautet der vierzeilig erhaltene Text Z. 1 . . . *q o : q e s . . . s e h . . .* (statt . . . *q e : q a š : s h . . .*), Z. 2 . . . *t e l h : a b e t . . .* (statt . . . *t e l [?] h : a b e l . . .*), Z. 3 . . . *r e t o : a . r . . .* (statt . . . *r i t : w e . . . r . . .*) und Z. 4 . . . *t e r . . . h . . .* (statt . . . *t e r . . . [l] d l . . .*). Meine obige Kritik wäre an dieser Stelle insofern zu erweitern, daß es im Meroitischen kein *d* sondern nur ein *d* gibt und das Graphem für *to* fälschlicherweise mit *t* transliteriert wird. Damit sind auch die auf S. 140 angeschlossenen Kommentare weitgehend hinfällig, wie etwa die Identifikation von *a b e l* als Titel oder Name. Ein solches Morphem existiert nicht, wohl aber das korrekte *a b e t*, das auch als *b e t* (ohne Anlautvokal) in den Inschriften REM 0555, 0292, 0321, 0356, 1057, 1090, 1091, 1116, GA 28 A und B sowie STMS 17 als Titel belegt ist. Schmerzlich wird in diesem Zusammenhang die Konsultation des REM (Répertoire d'Épigraphie Méroïtique) vermißt, das die unabdingbare Grundlage jeglicher Auseinandersetzung mit meroitischen Texten darstellt.

In einer Synthese der zu den einzelnen Teilbereichen gewonnenen Erkenntnisse diskutiert die Verfasserin zusammenfassend Chronologie und Besiedlungsgeschichte des Hinterlandes sowie dessen Stellung im regionalen und überregionalen Kontext. Die hierfür einzige verwertbare Grundlage bilden allerdings ausschließlich keramische Vergleiche, da Grab- und Gebäudetypen keine eindeutigen externen Parallelen besitzen. Daraus ergibt sich, daß die Hauptnutzungsphase in das späte zweite und das gesamte erste vorchristliche Jahrhundert datiert, wiewohl sich in einigen wenigen Arealen Zeugnisse aus der spät- und postmeroitischen Periode fanden. Außerhalb des

Plateaus existieren keine Belege für eine Besiedlung nach der Zeitenwende mit möglicher Ausnahme spärlich gefundener Aswan-Waren des ersten nachchristlichen Jahrhunderts, für die jedoch zu wenig Vergleichsmaterial zwecks sicherer Datierung vorhanden ist. Allerdings wirft die Positionierung des Survey-Gebietes in einen größeren historischen und archäologischen Kontext sowie die Erschließung seiner Verbindung zu der Festung von Qasr Ibrim neue Fragen auf, deren Beantwortung—wie die Verfasserin (S. 153) eingesteht—in Anbetracht des beschränkten gegenwärtigen Kenntnisstandes nicht über mehr oder weniger begründbare Spekulationen hinausgehen kann.

In der angeschlossenen Literaturliste macht sich das bereits angesprochene Fehlen grundsätzlicher Publikationen zum Meroitischen bemerkbar, während deutschsprachige Titel unnötigerweise eine Anzahl von Druckfehlern aufweisen. Sehr wertvoll erweist sich der Abbildungsteil, der auf insgesamt 136 Seiten qualitativ hochwertige Pläne, Zeichnungen und Fotos umfaßt, die zum Weiterarbeiten einladen.

Dies charakterisiert auch letztlich die Bedeutung des vorliegenden Werkes. Es wird hier eine kommentierte Ist-Stand-Analyse des im Hinterland von Qasr Ibrim durchgeführten Survey präsentiert, die in vielerlei Hinsicht Anregungen für vertiefende Forschungen bietet und offen bleibende Fragen nicht verschweigt, anstatt unbeweisbare Hypothesen anzubieten. Enttäuschend sind allerdings die Sequenzen zu den meroitischen Texten, die dringlich eine kompetente Nachbearbeitung erfordern. Insgesamt erschließt die Studie ein bislang kaum bekanntes Segment abseits der offiziellen Kultur Nubiens und gewährt damit Einblicke in die Lebensumstände einer lokalen Gesellschaft, die anhand weiterer Feldforschungsaktivitäten in einen größeren Kontext gestellt werden sollten.

MICHAEL H. ZACH

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