Introduction

Heliopolis functioned as the treasury of Egypt's identity, occupying a central position in the suncult in Egyptian culture (ASSMANN 2005, 14–24). As such, it was replicated in the religious landscape of Egypt itself in the form of temples throughout the land. Starting in the middle of the 1st millennium BC it attracted European curiosity and scientific interest, initially from Greek authors, then spreading as its materials were used to construct monuments in Alexandria, Italy and then on to various provinces throughout the Roman Empire.

This accumulation of cultural practice has resulted in the longest continuity ever observed in a single cult location (QUIRKE 2001, 73–114; RAUE 1999, 8–12): a cultural memory that lasted until the Islamic medieval ages when scholars including Pythagoras are listed among the pilgrims to the temple of Heliopolis (HAAR-MANN 1991, 76-77). Much more than a city with a temple, it seems to be structurally and literally a Hierapolis, or sacred city (RAUE 2013, 83–90). For at least 2400 years, Heliopolis developed and safeguarded knowledge about the genesis and structure of the cosmos, obtained over centuries of careful observation of nature. The Heliopolitan cult of the cosmos is a nucleus for Egyptian natural science; its raison d'être is also to legitimise the political order of kingship in a unified country (RAUE 2016–2017, 93–96).

For generations of archaeologists, the temple seemed to have been lost. Only the obelisk of Senusret I (1950 BC) stood alone, at this place of creation (GABOLDE/LAISNEY 2017, 118-122). Heliopolis was the first large temple that was targeted as a quarry during the Roman era, with much of the pharaonic monuments removed and relocated to other locations. Other large temple complexes in Egypt may have been saved as they were still in use. The roman constructions of Alexandria, Kanopus and Herakleion-Thonis were mainly achieved through quarrying Heliopolitan materials and objects (YOYOTTE 1998, 203; Abd el-Fattah/Gallo 1998, 7-19). From this point, they were taken out of Egypt, to Rome (VERSLUYS 2016, 274-293; LECOCQ 2005), Vienna (RAUE 1999, 245; ROGGE 1990, 126-127) and other cities of the Roman Empire. Subsequent quarrying in the Ummayyad, Fatimide and Mameluke Periods turned the temple, now located in the modern suburb Matariya, into a place that is somehow known, but accessible only in terms of the mere memory of its former significance.

A series of unfortunate circumstances caused the absence of any systematic and scientific investigation. Just two excavations by the Egyptian Museum of Turin and the Egypt Exploration Society took place at the temple in the beginning of the 20th century (SBRIGLIO/ UGLIANO 2015; PETRIE 1915), before the current fieldwork began (ABD EL-GELIL ET AL. 2008; ASHMAWY/RAUE 2017). Important investigations concerned the administrative area at the northern perimeter of the precinct (SALEH 1981; ID. 1983) and were recently resumed by the Ain Shams University under the direction of Mamdouh Eldamaty; a small number of studies were conducted on textual sources from Matariya.¹

Generally, scholars have preferred to use betterpreserved contexts in Upper Egypt for the study of mythology, cosmology and political theology, especially in Thebes, known to the ancient Egyptians as the "Upper Egyptian Heliopolis".

Over the past eight years the Egyptian-German Archaeological Mission to the Temple of Matariya/Heliopolis has aimed to preserve as much as possible of this unique place. With evidence of sixteen salvage campaigns available (ASHMAWY/ RAUE 2017, 29–45), it can clearly be stated that the temple is not, as yet, entirely destroyed. The most effective way to make available and secure the knowledge about the site gained through the excavations is to publish following international open-access standards. All publication efforts are tightly bound to the Open Science concept, guaranteeing future scholarly work in order to continuously evaluate each edited report and the metatext of the reconstruction as well as the details on which all hypotheses are being built. The *Heliopolis Reports* aim to provide research data from Heliopolis that are open to re-evaluations and ready for continuously available updates.

¹ Contardi 2009; Raue 1999; Moursi 1972.

2001 – 2010:	Excavations of the Supreme Council of Antiquities 1st Season: Abd EL-GeLIL ET AL. 2008
2nd Season	

Spring 2012	February 26 – March 31	Area 200

Objectives, methods and results of the season:

Area 200: Continuation of excavations at the eastern fringe (mainly squares H24-I24-K24-L24-M24-N24) to gain additional insights to the stratigraphy of the area in front of the temple, leading to the discovery of fragments from a large falcon statue and reused talatât blocks from the Amarna Period.

Survey: Conduct geomagnetic survey of cultic topography in the central sector of the main temenos (Area 220).

A training course for archaeological and epigraphical methods and techniques was attended by members of the Inspectorate of Antiquities/ Matariya.

The Supreme Council of Antiquities (SCA) was represented by Eman Mohammed Kelany. We would like to express our sincere thanks for her kind support and cooperation along with the Director of Antiquities at Matariya, Mohammed Farid, as well as to the authorities of the storerooms at Tell el-Hisn, Hoda Ibrahim and Ashraf Abd el-Hafiz.

Participants in the mission: Dr. Aiman Ashmawy, Wagida Abd el-Aziz Mohammed, Hosni Badia Hosni, Tamer Ahmed Mohammed, Amani Samir Ibrahim, Amr Ismail Ibrahim, Mohammed el-Mizeyn, Dalia Ahmed Taha, Safaa Khairy Mohammed, Rais El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Pieter Collet, Tomasz Herbich, Jakub Ordutowski, Robert Ryndziewicz, Marie-Kristin Schröder and Michael Weißl.

3rd Season

Autumn 2012 September 29 – October 24

Objectives, methods and results of the season:

Area 200: Continuation of excavations at the eastern fringe (mainly squares H24-I24-K24-L24-M24-N24) to gain additional insights to the stratigraphy of the area in front of the temple in Area 200. The project uncovered limestone debris containing further relief fragments dating to the Amarna Period.

Conduct rescue excavation in the north-western part of squares G18/H18, leading to the discovery of a quartzite gateway of Ramesses II.

Survey: Reconstruction of the palaeo-land-scape of the later temple area by geomorpholo-

gical survey (drill cores) with the identification of an 8 m stratigraphy down to the prehistoric layers in the centre of the temenos (Areas 220/221). Continuation of geophysic survey of the cultic topography in the central sector of the main temenos (Area 220).

The Department of Foreign Missions of the Ministry of State of Antiquities (MSA) was represented by Samhan Mohammed Abd el-Salam. We would like to express our sincere thanks for his kind support and cooperation along with the Director of Antiquities at Matariya, Mohammed Farid, as well as to the chief inspectors Samir Abd el-Raouf and Khaled Mohammed Abu al-Ela.

Participants in the mission: Dr. Aiman Ashmawy, Wagida Abd el-Aziz Mohammed, Hosni Badia Hosni, Amr Ismail Ibrahim, Mona Ahmed Hussein, Nadja Gouda Anany, Heba Ali Osman, Ezzat el-Maghuri Mohammed, Sabah Abd el-Halim Ahmed, Rais El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Mohammed Abd el-Wahab Othman, Christopher Breninek, Pieter Collet, Prof. Dr. Morgan De Dapper, Tomasz Herbich, Wassim Moussa, Asja Müller, Jakub Ordutowski and Marie-Kristin Schröder.

Restorers from the Inspectorate of Antiquities at Matariya: Heba Mohammed Ahmed, Noha Abd el-Rahman Mohammed, Ahmed Mohammed Ibrahim and Sahar Ramadan Mohammed.

Spring 2014 February 17 – March 31

Objectives, methods and results of the season:

Area 005: Conduct an architectural survey and recording of elevations and sections of the southern enclosure walls of the main temenos in order to understand the history of the southern enclosure of the main temenos.

Area 200: Continuation of excavations at the eastern fringe (mainly squares K24-L24) to gain additional insights to the stratigraphy of the area in front of the temple; the project uncovered evidence for a colossal granite sculpture.

Area 210: First excavations of the Egyptian-German joint mission at the so-called Misraa el-Segun. Area 210 was chosen to re-investigate W. M. F. Petrie's excavation plans and to date the double wall that separated the main temenos and the northern extension.

Survey: Continuation of geomorphological survey (drill cores in Areas 005, 210, 211 and 220) to reconstruct the palaeo-landscape of the later temple area, leading to the identification of

Areas 005, 200, 210 and 211

late-pleistocene Gezira structures. Continuation of geophysic survey (electric resistivity in Areas 210, 211 and 220) of the cultic topography in the central sector of the main temenos.

A training course for archaeological and epigraphical methods and techniques, directed by Asja Müller, and funded by the German Embassy Cairo, was attended by members of the Inspectorate of Antiquities/Matariya. The MSA was represented by Mariam Fekri Shawky Zaki (inspector for Area 005), Tamer Ahmed Mohammed Mahmud (inspector for Area 200) and Hend Abd el-Nabi Mohammed (inspector for Area 210). To them we would like to express our sincere thanks for their kind support and cooperation.

As in the past season, the mission was generously supported by the Fondation Schiff Giorgini, German University Cairo and the German Archaeological Institute. We are grateful to Prof. Dr. Ashraf Mansour, Prof. Dr. Stephan J. Seidlmayer and Amani Ghanem for their unwavering support. **Participants in the mission:** Dr. Aiman Ashmawy, Khaled Mohammed Abu al-Ela, Samir Abd el-Raouf Gharib, Hoda Kamal Ahmed Biyumi, Wagida Abd el-Aziz Mohammed, Amr Ismail Ibrahim, Hanaa el-Said Abd el-Fattah, Nermeen Mohammed Taha, Rehab Abd el-Sattar Ahmed, Bosy Mohammed Abd el-Aziz, Dina Ahmed Mohammed, Mohammed Gamal Kamel Hozayn, Eman Mohammed Salah, Naglaa Fathy El-Shazly, Nahla Refaat Mahmud Ali, Salah Mostafa Abd el-Aziz, Amira Farag Mohammed, Doaa Hosny Abd el-Tawab, Ghada Essam Hassan, Enas Mahmud Sabry, Mohammed Mahmud Hendy. Rais El-Amir Kamil Saddiq and the workers from Quft and Matariya. Dr. Dietrich Raue, Max Beiersdorf, Christopher Breninek, Pieter Collet, Prof. Dr. Morgan De Dapper, Klara Dietze, Dr. Luc Gabolde, Tomasz Herbich, Damien Laisney, Asja Müller, Dawid Swiech and Marion Wenzel.

Restorers from the Inspectorate of Antiquities at Matariya: Mohammed Ali Abdellah, Noha Abd el-Rahman Mohammed and Sahar Ramadan Mohammed.

5th Season

Spring 2015 February 16 – April 2

Areas 005, 210, 221, 231, 241–244

Objectives, methods and results of the season:

Area 005: Completion of the architectural survey and recording of elevations and sections of the southern enclosure walls of the main temenos.

Area 210: Final investigations and recording of the large double walls dating to the New Kingdom.

Area 221: First excavations in the centre of Misraa el-Segun, about 300 m west of the obelisk of Senusret I. This sector was chosen to document the western portion of the structure named "Hyksos Fort" by W. M. F. Petrie. Instead, remains of a sanctuary of Nectanebo I for the sun-god were discovered.

Area 231: A sondage was dug in the eastern portion of the so-called "Hyksos Fort" in preparation for a modern road to be constructed over the area.

Area 241–244: Rescue excavations were conducted in response to a second road extension at Sharia Moatassim at the western fringe of the Misraa el-Segun.

Survey: Continuation of geomorphological survey (drill cores in Areas 005, 009 – farm close to column of Merenptah, 200, 203, 221, 231 and 241/244) to reconstruct the palaeo-landscape.

The Department of Foreign Missions of the MSA was represented by Walaa Ali Mohammed

(inspector for Area 5), Ghada Samy Ibrahim (inspector of Area 210) and Hani Fekri Ishak (inspector of Area 221). The mission was kindly supported by Dr. Yussuf Hamid Khalifa from the MSA and by Mohga Abd el-Fattah Behnasy at the Tell Hisn storerooms.

Participants in the mission: Dr. Aiman Ashmawy, Khaled Mohammed Abu al-Ela, Hoda Kamal Ahmed Biyumi, Wagida Abd el-Aziz Mohammed, Dina Ahmed Mohammed, Nahla Refaat Mahmud Ali, Amira Farag Mohammed, Ghada Samy Ibrahim, Eshaq Halim Gaber, Amal Ahmed Mohammed, Marwa Ahmed Mohammed Ahmed, Fatma Hussein Hassan, Sahar Abd el-Rady Ibrahim, Shaimaa Mohammed Abd el-Hamid, Mahmud Tharwat Abu el-Fadl, Walaa Omar Mohammed, Rais El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Max Beiersdorf, Christopher Breninek, Pieter Collet, Prof. Dr. Morgan De Dapper, Klara Dietze and Asja Müller.

Restorers from the Inspectorate of Antiquities at Matariya: Ghada Essam Hassan, Hassan Fawzy Amin, Heba Mohammed Ahmed, Islam Ibrahim Ahmed Shehata, Noha Abd el-Rahman Mohammed, Sahar Ramadan Mohammed. The geophysical and geomorphological survey was accompanied by Aschraf Abd el-Samir from the MSA.

6th Season		
Autumn 2015	September 1 – October 12	Areas 221 and 232, Study Season for Area 200

Objectives, methods and results of the season:

Area 221: Continuation of work at the temple of Nectanebo I in the centre of Misraa el-Segun, about 300 m west of the obelisk of Senusret I. Additional basalt blocks were found and a later 2nd millennium BC mud-brick workshop structure for processing calcite alabaster was uncovered.

Area 232: Rescue excavations commenced in the south-western sector inside the embankment of 18th Dynasty units (formerly named the "Hyksos Fort" by W. M. F. Petrie), after the Egyptian Armed Forces evacuated their accommodation during summer 2015. Late Period workshop structures of mud-brick were uncovered after a geophysical survey was carried out.

Survey: Continuation of geomorphological survey (drill cores) to reconstruct the palaeo-landscape (Area 232/233; north of Area 233; Area 211/214 west and south of the museum).

The Department of Foreign Missions of the Ministry of Antiquities was represented by Amr

Ismail Ibrahim, Sabah Abd el-Halim Ahmed (inspector for Area 200), (inspector for Area 221) and Mohammed Sayed Sayed (inspector for Area 232). rooms. The geophysical and geomorphological survey was accompanied by Ashraf Abd el-Samir from the MSA.

The mission was supported by Dr. Mahmud Afifi from the MSA, and by Mohga Abd el-Fattah Behnasy at the Tell Hisn MSA storeThe mission was visited by H. E. Minister of Antiquities Prof. Dr. Mamdouh Eldamaty on October 1, 2015, and further steps to protect the site were discussed.

Participants in the mission: Dr. Aiman Ashmawy, Khaled Mohammed Abu al-Ela, Hoda Kamal Ahmed Biyumi, Tamer Ahmed Mohammed, Amal Ahmed Mohammed, Amira Farag Mohammed, El-Amir Todrous Barakat, Ezzat El-Maghuri Mohammed, Walaa Omar Mohammed, Eshaq Halim Gaber, Rais El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Christopher Breninek, Susi Bergmann, Pieter Collet, Prof. Dr. Morgan De Dapper, Maximilian Georg, Klara Dietze, Jakub Ordutowski, Marie-Kristin Schröder and Stephanie Schulz (now Blaschta).

Restorers from the Inspectorate of Antiquities at Matariya: Hajam Asab Mohammed, Hassan Fawzy Amin, Mina Mahrouz Soreal and May Kamal Abd el-Qader.

7th Season		
Spring 2016	February 21 – April 13	Areas 202, 221, 232 and 245–247–248–249

Objectives, methods and results of the season:

Area 202: Rescue excavations were conducted in response to municipal construction work west of the main building of the shopping mall, leading to the recovery of scattered elements from administrative contexts within the temple.

Area 221: Continuation and intensive investigation of the temple of Nectanebo I, leading to

the discovery of quartzite pieces from the gate blocks of Ramesses II and Nectanebo I. More decorated basalt blocks of Nectanebo I were also found.

Area 232: Continuation of rescue excavations in the south-western sector inside the embankment uncovered well preserved features of Late Period workshop structures. **Area 245–249:** Additional fieldwork was carried out in the western periphery of the Misraa el-Segun in preparation for municipal construction work for the development of north-eastern Cairo. Various sondages were excavated south of the Youth Club Matariya (Markaz el-Shabab), leading to the discovery of scattered remains of a temple of Ramesses II in Area 248.

A training course for restorers was directed by Grit Karen Friedmann of the Graeco-Roman Museum of Leipzig University. It was attended by Hassan Fawzy Amin, Mina Mahrouz Soreal and Mohammed Ali Abdellah.

The Department of Foreign Missions of the MSA was represented by Walaa Omar Mohammed (inspector for Area 202 and 248), Mahmud

Tharwat Abu el-Fadl (inspector for Area 221) as well as Amr Ismail Ibrahim and Eshaq Halim Gaber (inspectors for Areas 232).

The mission was supported by Dr. Mahmud Afifi from the MSA, and Mohga Abd el-Fattah Behnasy at the Tell Hisn MSA storerooms.

The mission was visited by H. E. Minister of Antiquities Prof. Dr. Mamdouh Eldamaty, H. E. Minister of Urban Development Dr. Ahmed Badr Zaki and the Governor of Cairo Dr. Galal el-Said, on March 12, 2016. Further steps for clearing the site from debris were discussed.

Participants in the mission: Dr. Aiman Ashmawy, Khaled Mohammed Abu al-Ela, Hoda Kamal Ahmed Biyumi, Tamer Ahmed Mohammed Mahmud, Wagida Abd el-Aziz Mohammed, Amal Ahmed Mohammed, El-Amir Todrous Barakat, Eshaq Halim Gaber, Merwa Adel Sobhy, Mohammed Atef Mahmud, Rais El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Prof. Dr. Kai-Christian Bruhn, Christopher Breninek, Pieter Collet, Klara Dietze, Thomas Graichen, Grit Karen Friedmann, Mariana Jung, Virág Pabeschitz, Dr. Lutz Popko and Stephanie Schulz (now Blaschta).

Restorers from the Inspectorate of Antiquities at Matariya: Ragab Badry Swefy and Osama Shoukry Fakhory.

Autumn 2016 September 1 – October 12

Objectives, methods and results of the season:

Area 221: Continuation of fieldwork at the temple of Nectanebo I focused on the extraction of various heavy quartzite blocks belonging to the gate of Nectanebo I.

Area 232: Continuation of excavations in the south-western sector inside the embankment on Late Period workshop structures.

Area 248: Rescue excavations were completed in response to municipal construction work on the western periphery of Misraa el-Segun, leading to the identification of the Ramesses II structure as a temple for "Amun of Ramesses" and "Mut-president of the horns of the gods". The Department of Foreign Missions of the MSA was represented by Asmaa Abd el-Aziz Ramadan (inspector for Area 221), Menal Mansour Ali and Shenouda Fawzy Labib (inspectors for Area 232) and Mahmud Tharwat Abu el-Fadl (inspector for Area 248).

The mission was kindly supported by Dr. Mahmud Afifi from the MSA and by Mohga Abd el-Fattah Behnasy at the Tell Hisn MSA storerooms.

The mission was visited by H. E. Minister of Antiquities Prof. Dr. Khalid el-Enany and the Ambassador of the Federal Republic of Germany, Dr. Julius Georg Luy. Further steps for opening the Museum of Matariya were discussed.

Participants in the mission: Dr. Aiman Ashmawy, Khaled Mohammed Abu al-Ela, Hoda Kamal Ahmed Biyumi, Tamer Ahmed Mohammed Mahmud, Hend Abd el-Nabi Mohammed, Eshaq Halim Gaber, Mohammed Gamal Hozayn, Rais El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Christopher Breninek, Pieter Collet, Klara Dietze and Stephanie Schulz (now Blaschta).

Restorers from the Inspectorate of Antiquities at Matariya: Omar Mohammed Ahmed and Ashraf Ibrahim Mohammed.

Spring 2017 February 27 – April 5

Areas 200, 211 and 232

Objectives, methods and results of the season:

Area 200: Documentation of two statue bases that were discovered by the SCA-Mission in 2006–2010, leading to the discovery of the colossal statue of Psamtik I.

Area 211: Excavations were carried out northwest of the Obelisk Museum, following results of the 2015 geophysical/geomorphological survey north of the main procession axis. For the first time, the lower zone of in situ limestone temple walls were located. Although this zone is yet to be dated, it does cover layers from the Predynastic Period.

Area 232: Continuation of excavations in the south-western sector inside the embankment on Late Period workshop structures.

Survey: Geomorphological survey continued in order to reconstruct the palaeo-landscape (Area 200).

A training course was held by Virág Pabeschitz for members of the Inspectorate of Antiquities at Matariya. The Department of Foreign Missions of the MSA was represented by Amr Ismail Ibrahim and Mahmud Tharwat Abu el-Fadl (inspectors for Area 200), Hend Abd el-Nabi Mohammed and Alaa Ahmed Hussein (inspectors for Area 211) as well as Khaled el-Assaal and Amr Maher Ahmed (inspectors for Area 232).

The mission was kindly supported by Dr. Mahmud Afifi, Dr. Basem Gihad, Eman Zeidan, Dr. Islam Ezzat, Dr. Mennat-Allah El-Dorry, Dr. Sherif Abd el-Moneim from the MSA, by Dr. Eissa Zeidan and the Restoration Centre at the Grand Egyptian Museum (GEM), Dr. Moamen Othman and the team of transport experts of the Egyptian Museum Cairo, and by Mohga Abd el-Fattah Bahnesy at the Tell Hisn MSA storerooms.

The mission was visited by H. E. Minister of Antiquities Prof. Dr. Khalid el-Enany and the Ambassador of the Federal Republic of Germany Dr. Julius Georg Luy on the occasion of the extractions of the fragments of the colossal statue. **Participants in the mission:** Dr. Aiman Ashmawy, Khaled Mohammed Abu al-Ela, Hoda Kamal Ahmed Biyumi, Tamer Ahmed Mohammed Mahmud, El-Amir Todrous Barakat, Merwa Adel Sobhy, Eshaq Halim Gaber, Rais Ashraf El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Christopher Breninek, Pieter Collet, Dr. Simon Connor, Prof. Dr. Morgan De Dapper, Klara Dietze, Dr. Luc Gabolde, Dr. Jana Helmbold-Doyé, Florence Langermann, Juliette Fayein, Virág Pabeschitz and Dr. Lutz Popko.

Restorers from the Inspectorate of Antiquities at Matariya: Hajam Asab Mohammed, Sara Ahmed, Hassan Fawzy Amin, Manar Mohammed Ibrahim, Mina Mahrouz Soreal, Shenouda Samir Sabry and Wahid Samir.

10th Season			
Autumn 2017	August 27 – October 4	Area 200	

Objectives, methods and results of the season:

Area 200: Excavation work returned to Area 200 and the recovery of the statue bases of Psamtik I along with the neighbouring structures in squares K23, K24 and K25. Further fragments of the colossal quartzite statue of Psamtik I were discovered.

The Department of Foreign Missions of the MSA was represented Nagwa Abd el-Aziz (inspector for Area 200). The Egyptian team worked in

this area from June to August 2017, preparing the ground for the upcoming autumn mission by excavating squares G22, G23 and G24. This work was carried out by the inspectors Amr Ismail Ibrahim and Mahmud Tharwat Abu el-Fadl.

The mission was supported by the restorers and transport experts of the GEM: Dr. Eissa Zeidan, Dr. Nassef Abd el-Wahed and their team. We are grateful to Dr. Tarek Tawfiq (Director of the GEM) and to Mohga Abd el-Fattah Bahnesy at the Tell Hisn MSA storerooms for their support.

Participants in the mission: Dr. Aiman Ashmawy, Khaled Mohammed Abu al-Ela, Hoda Kamal Ahmed Biyumi, Tamer Ahmed Mohammed Mahmud, Amal Ahmed Mohammed Ahmed, Rais Ashraf El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Christopher Breninek, Pieter Collet, Dr. Mennat-Allah El-Dorry, Florence Langermann, Kerstin Seidel and Marion Wenzel.

Restorers from the Inspectorate of Antiquities at Matariya: Hajam Asab Mohammed and Mina Mahrouz Soreal

Spring 2018 February

February 19 – April 14

Areas 200, 221 and 232

Objectives, methods and results of the season:

Area 200: Continuation of excavations to complete the archaeological investigations and recovery of all accessible fragments of colossal statuary from trenches associated with remains of later Roman stone quarrying around the statue base of Psamtik I.

Area 221: Resumption of excavation work in the centre of the main temenos (Misraa el-Segun). Results of the geophysical survey led to the discovery of architectural elements of Merenptah, abutting the sanctuary of Nectanebo I.

Area 232: Continuation of excavations in the south-western sector of the inner enclosure focused on the 18th Dynasty embankment and the archaeological setting at the gateway discovered in 2017.

Survey: Geophysical survey (electric resistivity) in the central sector of the main temenos (Areas 211, 221 and 251); Geomorphological survey continued in order to reconstruct the palaeo-landscape.

The Department of Foreign Missions of the MSA was represented by Amr Ismail Ibrahim (inspector for Area 200) and Mahmud Tharwat Abu el-Fadl (inspector for Area 221) and Mariam Fekri Shawky Zaki (inspector for Area 232).

The mission was supported by the restorers and transport experts of the GEM: Dr. Eissa Zeidan, Dr. Nassef Abd el-Wahed, Tamer el-Nawagy and their team. We are grateful to Mohga Abd el-Fattah Bahnesy and her team at the Tell Hisn MSA storerooms for their support.

Participants in the mission: Dr. Aiman Ashmawy, Khaled Mohammed Abu al-Ela, Hoda Kamal Ahmed Biyumi, Tamer Ahmed Mohammed Mahmud, Amira Farag Mohammed, Eshaq Halim Gaber, Rais El-Amir Kamil Saddiq, Rais Ashraf El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Dr. Louise Bertini, Stephanie Blaschta (former Schulz), Christopher Breninek, Pieter Collet, Dr. Simon Connor, Klara Dietze, Dr. Mennat-Allah El-Dorry, Juliette Fayein, Tomasz Herbich, Prof. Dr. Salima Ikram, Mariana Jung, Florence Langermann, Virág Pabeschitz, Dr. Lutz Popko, Dr. Gillian Pyke, Dr. Pamela Rose, Robert Ryndziewicz, Dr. Susanne Töpfer and Dr. Federica Ugliano. The Egyptian part of the team worked in Area 200 from December 2017 until January 2018, preparing the ground for the upcoming Spring mission by excavating squares M20 and M24 down to the subsoil water. This work was carried out by the inspectors Amr Ismail Ibrahim and Mahmud Tharwat Abu el-Fadl.

Restorers from the Inspectorate of Antiquities at Matariya: Islam Ibrahim Ahmed Shehata, Hajam Asab Mohammed, Hassan Fawzy Amin, Mina Mahrouz Soreal and Sara Ahmed.

12th Season

Autumn 2018 August 28 – October 15 Areas 213/232; construction of shelters in the museum

Objectives, methods and results of the season:

Area 213: Excavation of the sector 80 m east of the obelisk of Senusret I that had been partially investigated during the development project for the museum. A ritual complex was identified in 2008 by the SCA. Investigations recovered a Late Period installation, probably connected with the annual cult of the Nile flood.

Area 232: Continuation of excavations in the south-western sector of the inner enclosure focused on investigation of the Hellenistic bakery levels that superimposed the Late Period structures in the north-western squares.

Obelisk Museum: Two sheltering structures were built by the architect Dr. Nicholas Warner and the contractor Mahmud el-Tayeb in cooperation with the MSA-Project Sector and with the support of the Foreign Ministry of the Federal Republic of Germany. These shelters provide a safe display for the Nectanebo I basalt reliefs of and limestone blocks found in earlier seasons. The mission supported the inspectorate of Matariya by providing the facilities to transport Heliopolitan pharaonic temple blocks to the Obelisk Museum for display. These blocks had been reused during the Fatimid and Ayyubid periods and were stored by the MSA-Islamic Sector at Bab el-Nasr/Gamaliya.

The Department of Foreign Missions of the MSA was represented by Sarah Samy Fares (inspector for Area 213), Eshaq Halim Gaber (Inspector for Area 232) and Mahmud Tharwat Abu el-Fadl (Inspector for Area 251).

The mission was supported by the restorers and transport experts of the GEM: Dr. Eissa Zeidan, Dr. Nassef Abd el-Wahed, Tamer el-Nawagy and Osama Abd el-Shokour, and by Mohga Abd el-Fattah Bahnesy and her team at the Tell Hisn MSA storerooms.

The mission is very grateful to Prof. Dr. Fayza Heikal and Dr. Mennat-Allah El-Dorry for the translation and correction of Arabic texts for the panels and labels as part of the Museums Project, as well as to the engineers Waad-allah Abu al-Ela and Sayed Ibrahim for their valuable advice during the planning and building phase of the shelters. **Participants in the mission:** Dr. Aiman Ashmawy, Khaled Mohammed Abu al-Ela, Hoda Kamal Ahmed Biyumi, Merwa Adel Sobhy and Amira Farag Mohammed, Rais El-Amir Kamil Saddiq, Rais Ashraf El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Dr. Louise Bertini, Christopher Breninek, Pieter Collet, Dr. Simon Connor, Klara Dietze, Juliette Fayein, Dr. Mennat-Allah El-Dorry, Prof. Dr. Salima Ikram, Florence Langermann, Dr. Franziska Naether and Marion Wenzel.

Restorers from the Inspectorate of Antiquities at Matariya: Fatma el-Sayed Mohammed, Hajam Asab Mohammed, Hassan Fawzy Amin, Mina Mahrouz Soreal and Noha Mohammed Hamza.

13th Season			
Spring 2019	March 12 – April 25	Areas 221, 232–233 and 251	

Objectives, methods and results of the season:

Area 221: Continuation of excavations within the centre of the main temenos in order to locate basalt blocks of the northern (Lower Egyptian) geographical procession of Nectanebo I.

Area 232: Continuation of excavations focusing on stratigraphy details next to the 18th Dynasty embankment, including deposits of destroyed temple inventory. Continuation of investigation of the Hellenistic bakery levels superimposing the Late Period structures in the north-western squares of Area 232.

Area 233: The western extension of the Late Period workshops was traced from the northern face of the southern enclosure wall of the main temenos.

Survey: Continuation of geomorphological survey (drill cores in Areas 221 and 232) to recon-

struct the palaeo-landscape in the south-western sector of the Misraa el-Segun. Support of MSA excavation in Area 151 (necropolis of OK) by drill cores.

The training program in Spring 2019 was attended by Eman el-Sayed Mohammed el-Kishky, Amany Abd el-Menem Tantawy el-Naggar, Rosalin Eireen Nazier Sawerus and Michel Tawfik Sharubeem.

The Department of Foreign Missions of the MSA was represented by Hend Abd el-Nabi Mohammed (inspector for Area 221), Abd el-Halim Sayed Abd el-Halim (inspector for Area 232–233) and Mahmud Tharwat Abu el-Fadl (inspector for Area 251).

The mission was supported by Mohga Abd el-Fattah Bahnesy and their team at the Tell Hisn MSA storerooms. **Participants in the mission:** Dr. Aiman Ashmawy, Khaled Mohammed Abu al-Ela, Hoda Kamal Ahmed Biyumi, Afaf Wahba Ab del-Salam, Merwa Adel Sobhy, Amira Farag Mohammed, El-Amir Todrous Barakat, Rais El-Amir Kamil Saddiq, Rais Ashraf El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Dr. Louise Bertini, Stephanie Blaschta, Christopher Breninek, Pieter Collet, Dr. Simon Connor, Prof. Dr. Morgan De Dapper, Klara Dietze, Grit Karen Friedmann, Johannes Jüngling, Florence Langermann, Mattia Mancini, Giulia Pizzato, Dr. Lutz Popko, Camilla Saler and Dr. Federica Ugliano.

Restorers from the Inspectorate of Antiquities at Matariya: Omar Aziz ed-Din Abd el-Moneim, Hajam Asab Mohammed, Hassan Fawzy Amin, Mina Mahrouz Soreal and Moaaz Methad Ismail as well as Aid Mertah from the Egyptian Museum Cairo.

14th Season			
Autumn 2019	August 19 – October 3	Areas 234 and 251	

Objectives, methods and results of the season:

Area 234: Rescue excavation commenced in the south-western sector of the inner enclosure, yielding a stratigraphic sequence from the 1st millennium BC, including a Roman pit with fragments of temple statuary dating to the Ramesside Period.

Area 251: Excavation at the south-western sector of the Misraa el-Segun with documentation of the layers and workshops dating to the late 2nd millennium BCE and the underlaying prehistoric strata.

The Department of Foreign Missions of the MSA was represented by Abd el-Halim Sayed Abd

el-Halim (inspector for Area 234) and Eman Mohammed El-Sayed El-Kishky (inspector for Area 251).

The training program in autumn 2019 was directed by Florence Langermann. It was attended by Eman Zakariya Sayed, Randa Ali Ramadan, Rasha Sayed Shahat, Mohammed Mohammed Abd el-Rahman Tawfiq and Salah Mostafa Abd el-Aziz.

The mission was supported by Mohga Abd el-Fattah Bahnesy, Sabrine Habib and their team at the Tell Hisn MSA storeroom. Participants in the mission: Dr. Aiman Ashmawy, Khaled Mohammed Abu al-Ela, Hoda Kamal Ahmed Biyumi, Afaf Wahba Ab del-Salam, Amira Farag Mohammed, Michel Tawfiq Sharubeem, Rais El-Amir Kamil Saddiq, Rais Ashraf El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Dr. Louise Bertini, Pieter Collet, Dr. Simon Connor, Dr. Mennat-Allah El-Dorry, Prof. Dr. Salima Ikram, Florence Langermann, Giulia Pizzato and Dr. Pamela Rose.

Restorers from the Inspectorate of Antiquities at Matariya: Hajam Asab Mohammed, Mina Mahrouz Soreal and Moaaz Methad Ismail as well as Aid Mertah from the Egyptian Museum Cairo.

15th Season		
Spring 2020	March 15 – April 4	Study Season
Objectives, methods and results of the season:		The Department of Foreign Missions of the
		Ministry of Tourism and Antiquities (MoTA)
Area 251: Season was devoted to the study of		was represented by Abd el-Halim Sayed Abd
pottery finds from Area 251.		el-Halim.

The mission was carried out with reduced staff due to the pandemic situation.

Participants in the mission: Dr. Aiman Ashmawy, Khaled Mohammed Abu al-Ela, Hoda Kamal Ahmed Biyumi, Afaf Wahba Abdel-Salam, Rais Ashraf El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Dr. Louise Bertini, Pieter Collet, Dr. Simon Connor, Klara Dietze, Prof. Dr. Salima Ikram and Florence Langermann.

Restorers from the Inspectorate of Antiquities at Matariya: Hajam Asab Mohammed, Mina Mahrouz Soreal and Moaaz Methad Ismail.

Autumn 2020 August 31 – September 17

Objectives, methods and results of the season:

Area 232: Resumption of rescue excavation prior to the laying of municipal road construction. Documentation of the continuation of the embankment within the inner temple enclosure at the north-western extension of Area 232.

Area 251: Study of pottery finds from Area 251 was finalised.

The mission was carried out with reduced staff due to the pandemic situation.

The Department of Foreign Missions of the MoTA was represented by Amal Zakariya.

The mission was supported by Mohga Abd el-Fattah Bahnesy and her team at the Tell Hisn MoTA storeroom.

Participants in the mission: Dr. Aiman Ashmawy, Khalid Mohammed Abu'l-Ela, Hoda Kamal Ahmed Biyumi, Afaf Wahba Ab del-Salam, Michel Tawfiq Sharubeem, El-Amir Todrous Barakat, Rais Ashraf El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Klara Dietze, Prof. Dr. Salima Ikram and Florence Langermann.

Restorers from the Inspectorate of Antiquities at Matariya: Hajam Asab Mohammed, Moaaz Methad Ismail and Omar Aziz ed-Din Abd el-Moneim.

Spring 2021 February 28 – April 4

Areas 221 and 232

Objectives, methods and results of the season:

Area 221: Resumption of excavations in the central part of the Misraa el-Segun, in order to understand the relationship between the temple of Nectanebo I and the remains of Merenptah's sanctuary. The location of the main processional axis of the temple and its relationship to the Ramesside Era and Nectanebo I sanctuaries were the main focus of work.

Area 232: Rescue excavation was required in the inner temple enclosure, leading to the discovery of Third Intermediate Period and the Late Period workshop strata.

The mission was carried out with reduced staff due to the pandemic situation.

The Department of Foreign Missions of the MoTA was represented by Alaa Ahmed Hussein (inspector of Area 221) and Aml el-Qutb (inspector of Area 232).

The mission was supported by Mohga Abd el-Fattah Bahnesy and her team at the Tell Hisn MoTA storeroom.

Participants in the mission: Dr. Aiman Ashmawy, Khalid Mohammed Abu'l-Ela, Hoda Kamal Ahmed Biyumi, Amira Farag Mohammed, Rais Ashraf El-Amir Kamil Saddiq and the workers from Quft and Matariya; Dr. Dietrich Raue, Pieter Collet and Dr. Simon Connor.

Restorers from the Inspectorate of Antiquities at Matariya: Noha Mohammed Hamza, Hajam Asab Mohammed and Osama Shoukry Fakhory

Acknowledgements

The Egyptian-German mission is most grateful to the following persons and institutions:

The Ministry of Tourism and Antiquities of the Arab Republic of Egypt: H. E. Prof. Dr. Khaled el-Enany, H. E. Prof. Dr. Mamdouh Eldamaty, Dr. Mostafa Waziry, Dr. Ali al-Asfar, Dr. Hani Abu Al-Azem, Magdi Ghandour, Dr. Mahmud Afifi, Dr. Mohammed Ismail, Dr. Nashwa Gaber, Dr. Sabri Abd el-Aziz, Dr. Yussuf Hamid Khalifa, and the General Assembly of the Supreme Council of Antiquities.

Inspectorate of Antiquities of Matariya/Ain Shams: Khaled Mohammed Abu al-Ela, Adel Saadani, Mohammed Farid, Mohammed Abd el-Gelil; Atef Tawfiq, Gamal Faris, Mohammed Shaker, Samir Abd el-Rauf, Wagida Abd el-Aziz Mohammed, Abd el-Halim Sayed, Amal Ahmed Mohammed, Alaa Ahmed Hussein, Aml el-Qutb, Amal Zakariya, Amani el-Naggar, Amani Mahmud, Amani Samir, Amira Farag Mohammed, Amr Ismail Ahmed, Amr Maher Ahmed, Asmaa Abd el-Aziz Ramadan, Bosy Mohammed Abd el-Aziz, Dalia Ahmed Taha, Dina Abd el-Ghani, Dina Ahmed Mohammed, Dina Salah, Doaa Hosny Abd el-Tawab, El-Amir Toudrous, Ehab Refai, Eman el-Sayed Mohammed el-Kishky, Eman Mohammed Kelany, Eman Mohammed Salah, Eman Zakariya Sayed, Enas Mahmud Sabry, Eshaq Halim Gaber, Ezzat El-Maghuri Mohammed, Fatma Ali, Fatma Hussein Hassan, Ghada Essam Hassan, Ghada Samy Ibrahim, Hanaa el-Said Abd el-Fattah, Hani Fekry Ishak, Heba Ali Osman, Hend Abd el-Nabi Mohammed, Hosni Badia Hosni, Khairy Melek, Khaled el-Assaal, Mahmud Tharwat Abu el-Fadl, Mansour Ramadan, Mariam Fekri Shawky Zaki, Menal Mansour Ali, May Kamal Abd el-Qader, Merwa Adel, Merwa Ahmed Mohammed, Michel Tawfiq Sharubeem, Mohammed Abd el-Rahman Tawfiq, Mohammed Atef, Mohammed el-Mizeiyen, Mohammed Hozayn, Mohammed Mahmud Hendy Mohammed Saved, Mohga Abd el-Fattah Bahnesy, Mona Ahmed Hussein, Nadir Ramadan, Nadja Gouda Anany, Naglaa Fathy El-Shazly, Nagwa Abd el-Aziz, Nahla Refaat Mahmud Ali, Nermeen Mohammed Taha, Randa Ali, Rasha Sayed Shahat, Rehab Abd el-Sattar Ahmed, Rosalin Eireen Nazier Sawerus, Sabah Abd el-Halim Ahmed, Sabrine Habib, Safaa Khairy Mohammed, Sahar Abd el-Rady Ibrahim, Salah Mostafa Abd el-Aziz, Samhan Mohammed Abd el-Salam, Sarah Samy Fares, Sara Zakariya, Shaimaa Mohammed Abd el-Hamid, Shenouda Fawzy Labib, Tamer Ahmed Mohammed Mahmud, Tarek Abbas, Umeima Ahmed, Wahid Samir, Walaa Ali Mohammed and Walaa Omar Mohammed.

Department for Restoration at Matariya: Eman Riad, Fawqiya Fuad, Hajam Asab Mohammed, Karima Galal, Nagwa Es-Sayed, Ahmed Mohammed Ibrahim, Ashraf Ibrahim Mohammed, Hala Ismail Sedqi, Hassan Fawzy Amin, Heba Mohammed Ahmed, Ibrahim Khalil Abd el-Radi, Islam Ibrahim Ahmed Shehata, Manar Mohammed Ibrahim, Mina Mahrouz Soreal, Moaaz Methad Ismail, Mohammed Ali Abdellah, Noha Abd el-Rahman Mohammed, Omar Aziz ed-Din Abd el-Moneim, Omar Mohammed Ahmed, Omar Kardosi, Osama Shoukry Fakhory, Ragab Badry Swefy, Sara Ahmed, Sahar Ramadan Mohammed and Shenouda Samir Sabry. Museum of Matariya: Hoda Kamal Ahmed Biyumi and Engineer Sayed Ibrahim.

Grand Egyptian Museum: Dr. Eissa Zeidan, Dr. Nassef Abd el-Wahed, Dr. Osama Abd el-Shokour, Tamer al-Nawagy and their team.

Egyptian Museum Cairo: Dr. Moamen Othman and his teams as well as Aid Mertah.

Ministry of Tourism and Antiquities: Afaf Wahba Abd el-Salam, Ashraf Abd el-Samir, Dr. Bassem Gehad, Dr. Mennat-Allah El-Dorry, Waad-allah Abu al-Ela.

American University Cairo: Prof. Fayza Heikal.

German University Cairo: Prof. Ashraf Mansour, Dr. Essam Hamouda.

The workmen from Quft with Rais El-Amir Kamil Saddiq and Rais Ashraf El-Amir Kamil Saddiq, Mahmud al-Tayeb, Ezzat Ezz, the workmen from Matariya/Arab el-Hisn as well as Amr Mohammed and Amer Said.

Amani Ghanem, Dr. Max Beiersdorf, Susi Bergmann, Dr. Louise Bertini, Stephanie Schulz (verh. Blaschta), Prof. Dr. Kai-Christian Bruhn, Christopher Breninek, Emily Cocke, Pieter Collet, Dr. Simon Connor, Prof. Dr. Morgan De Dapper, Klara Dietze, Juliette Fayein, Grit Friedmann, Dr. Luc Gabolde, Thomas Graichen, Dr. Jana Helmbold-Doyé, Tomasz Herbich, Prof. Salima Ikram, Johannes Jüngling, Dr. Mariana Jung, Elisabeth Koch, Damien Laisney, Florence Langermann, Mattia Mancini, Dr. Mennat-Allah El-Dorry, Simon Metzger, Wassim Moussa, Dr. Asja Müller, Dr. Franziska Naether, Dr. Hans-Christoph Noeske, Jakub Ordutowski, Virág Pabeschitz, Giulia Pizzato, Dr. Lutz Popko, Dr. Gilian Pyke, Dr. Cornelia Römer, Dr. Pamela Rose, Robert Ryndziewicz, Camilla Saler, Dr. Robert Schiestl, Kerstin Seidel, Michael Schleier, Marie-Kristin Schröder, Juliane Stein, Dawid Swiech, Evgenia Tachatou, Dr. Susanne Töpfer, Dr. Federica Ugliano, Dr. Nicholas Warner, Michael Weißl, Marion Wenzel and Peter Windszus.

Deutsche Forschungsgemeinschaft (DFG); Gerda Henkel Stiftung; Fondation Michela Schiff Giorgini, Lausanne; Fond Khéops pour l'Archéologie, Paris; Académie des Inscriptions et Belles-Lettres, Paris; Berthold Leibinger Stiftung, Ditzingen; Kulturerhaltprogramm des Auswärtigen Amts der Bundesrepublik Deutschland; Forum Ägyptologie Zürich; Embassy of the Federal Republic of Germany Cairo; American University Cairo; American Research Center in Egypt; Bernard Selz Foundation New York; Freundeskreis des Ägyptischen Museums der Universität Leipzig; Sameh Sawiris / Orascom Cairo; European Foundation for Education and Culture of the Rahn-Dittrich Group; Greiss-Stiftung, Köln; Mehen Foundation Leiden; as well as Charlotte Abicht, Robert Bigler, Ibrahim Al-Hadary, Tarek Haridi, Dr. Ahmed Hegazy, Hany Nokrashy, Diethild and Dr. Roderich Raue, Vera und Eckhard Sambach, Dr. Wiltrud and Hartmut Spring.

The editors and authors owe their gratitude to Dr. Tom Hardwick, Dr. Karl Jansen-Winkeln and Dr. Ray Johnson and Richard Parkinson, who improved the contributions by their reviews; the language of all contribution was improved by David Birkhead, Justine Gesell, Dr. Andrea Sinclair and Jane Smythe. Editorial assistance was owed to Josephine Hensel. All remaining mistakes are in the responsibility of the editors.

Aiman Ashmawy - Dietrich Raue

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Notes on Monumentality and Stones Simon Connor

"Monumentality"

In chapter 6 of the superb exhibition catalogue Egypt's Dazzling Sun: Amenhotep III and His World, Betsy M. Bryan indicates that by convention she uses the adjective "monumental" for statuary exceeding 45 cm (for standing figures) and 35 cm (for seated figures; BRYAN/ KOZLOFF 1992, 194, 197 note 1). In the Egyptological literature, there is a certain disparity in the use of terms defining an order of size: When do we speak of "statues" rather than "statuettes"? This usage varies from one study to the other, from one author to the other, and, similarly, the perception of the order of magnitude also depended on each individual in Antiquity. We will use the term "monumental" here for any statue large enough not to be easily transportable (although we are aware this criterion is itself not the most objective, for even colossal figures several metres tall could be moved, as the examples of Tanis or of the Theban Ramesside temples teach us). The falcon from Area 200¹ is unusually large (compared to the statuary repertoire which has yielded us), must have weighed over a ton and was probably not meant to be moved regularly. We will therefore consider it "monumental".

Terms for Materials

A remark concerning the use of terms for materials, in particular granite, granodiorite, greywacke and basalt. We adopt here the terminology of Thierry De Putter and Christina Karlshausen (DE PUTTER/KARLSHAUSEN 1992; see also KLEMM/KLEMM 2008).

Summarising it, when using the terms of "granitic rocks" or "granitoids", we mean in this book all the rocks related to granites, of any colour (commonly called red granite, pink granite, grey granite, black granite). We use this term only when we speak of all these rocks as a group, or if a stone could not be identified.

When the term "granite" appears alone in the text, it always indicates red/pink granite. Following this terminology, "red granite" would be a pleonasm since an Egyptian "granite" is red by definition. We never use the terms "grey granite" or "black granite".

When, on the other hand, the matrix of the material is greyish or blackish, the term used is "granodiorite", a term that includes all the varieties of diorite, gabbro and tonalite ... which

¹ *Egypt's dazzling sun: Amenhotep III and his world.* With Lawrence M. Berman and an essay by Elisabeth Delange. Cleveland, OH: Cleveland Museum of Art.

are "cousins", and may differ from one vein to another in the same quarry but are difficult to distinguish for non-geologists (and sometimes even for geologists with the naked eye). As an example, the granodiorite Sekhmet statues from the reign of Amenhotep III, today scattered in dozens of sites and museums around the world, are found described, from one study to another, as "diorite", "black granite", "grey granite", "gabbro", "serpentinised gabbron", ... or even "basalt" (which is however a totally different stone, of different geological origin; not found in Aswan and rarely attested in Egyptian statuary). It is not always clear how the various authors chose these terms and if it was with the help of a geologist. However, even if these identifications are correct, it is also not known whether these geological differences were visible or important to the sculptors since they are of the same appearance and hardness and are found in the same quarries. This is why we have chosen

here to group all dark granitoids under the term "granodiorite".

Greywacke is often confused with basalt in Egyptological literature. Even when it is correctly identified as the stone extracted from Wadi Hammamat, bekhen-stone, it is also often referred to as "schist". In dealing with this material, we adopt here the English adaptation of the German term: "grauwacke" (see De PUTTER/KARLSHAUSEN 1992, 87–90; KLEMM/ KLEMM 2008, 297–311; American English: "graywacke").

Concerning "basalt", although much rarer in the Egyptian repertoire than it would appear from the publications, it is found in Egypt (see DE PUTTER/KARLSHAUSEN 1992, 51–54; KLEMM/ KLEMM 2008, 315–321) and is sometimes utilized for architectural elements. In the case of Matariya, it is indeed the material used for Nectanebo reliefs.

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