

THE 69TH ANNUAL MEETING OF THE

**AMERICAN
RESEARCH CENTER
IN EGYPT**



April 20-22, 2018
Tucson, Arizona

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**PRESENTATION
ABSTRACT UPDATES**

*Abstracts printed exactly as they were
submitted to the American Research Center in Egypt.*

Christian Casey, Brown University

Tombs, Temples, and Blood – Assassin's Creed Origins as a Digital and Pedagogical Tool

Assassin's Creed Origins is the latest title in the long-running Assassin's Creed series of videogames. The story of the main character is fictional, but it takes place within the places and historical events of Ptolemaic and Roman Egypt. The French software company Ubisoft undoubtedly created the game to appeal to fans of the series, most of whom are experienced gamers, but the game's creators also went to great lengths to recreate the setting as accurately as possible. As a result, the game is a rich and delightful experience for any Egyptologist, even for those with little interest in videogames.

In this paper, I will consider the value of Assassin's Creed Origins to the field of Egyptology. What can Egyptologists learn by playing it? How will it influence future generations of students, for whom this game may be their first introduction to the field? And finally, how can educators utilize this game as a pedagogical tool in an academic setting? In order to answer these questions, I will evaluate the success of Ubisoft's attempt to build a playable game within a virtual recreation of Ancient Egypt.

This paper will compare Origins' reconstructions to the known facts of Egyptian architecture, landscape, and language. I will also use this opportunity to explore broader questions about the value of reconstruction and its shortcomings, with a particular view to the unique limitations faced by any attempt to reconstruct the Egyptian language. Finally, I will describe Ubisoft's latest project: The Hieroglyphics Initiative.

Nancy Arthur Hoskins, Independent Scholar

Goddesses' Gowns and Kings' Kilts in New Kingdom Tomb Paintings

Egyptian pharaohs and goddesses wear garments of extraordinary patterned fabrics in New Kingdom tomb paintings. Though the goddess gowns are traditionally considered 'bead-net' dresses, the ornate patterns could have been woven with the same method used by weavers to create the bands on the Tunic of Tutankhamun. To demonstrate that the patterns were neither nets of beads nor figments of the painter's imagination, recreations of different patterns found on goddess gowns and kings' kilts were woven in my 'experimental archaeology' project. The quest began with research on the patterned fabrics on costumes in Minoan frescoes, and included those found in Egyptian wall paintings from Eighteenth Dynasty tombs. The Tutankhamun woven, patterned textiles from his tomb were included in the study. A series of ten articles on the project have been published in an international textile journal, and fifty woven samples were exhibited in 2017 as Ephemeral Fabrics from Egypt and Aegean: Before and After Tutankhamun.

The fabulous patterned fabrics worn by Egyptian goddesses, pharaohs, Minoan maidens and men survive only in paintings, but the Tutankhamun textiles are testimony to the truth that the materials, methods, and skill to weave complex patterns was understood in the Mediterranean world during the Late Bronze Age when conquest and commerce flourished under powerful pharaohs.

Salima Ikram, American University in Cairo

Sharp Shrews & Slithery Serpents: Animal Remains from TT11-12

Projecto Djehuty, directed by Jose M. Galan has been excavating TT11-12 and environs in Dra Abu al-Naga. In addition to the 18th Dynasty tombs, burials of later periods have been found in these tombs and in their vicinity. In addition to human burials of the Third Intermediate and Late Periods, there are several animal burials as well, attesting to a change in exploitation of this space in Ptolemaic times. This paper provides an overview and update of the most recent discoveries and research carried out on the animal mummies.

James Lowdermilk, Egypt Exploration Society

Khufu's Deception: An Explanation for the Interior Design of the Great Pyramid

The Ascending Passage within the Great Pyramid was completely filled with plug-blocks that weighed around 10,000 lbs. each, presumably to deter access to the King's Chamber. However, this passage was circumvented by the so called Well Shaft and the King's Chamber was reportedly found completely empty. Why was such effort exerted to seal a bypassed passage that led to an empty chamber?

The Ascending Passage provided access to the Grand Gallery and King's and Queen's Chambers during construction and could not be sealed until after the pyramid was completed. The plug-blocks resided on the floor of the Grand Gallery until needed, and when the blocks were to be slid down the passage they had to be lubricated. The remnants of lubrication explain why early visitors to the pyramid described this floor as slippery and difficult to ascend.

The plug-blocks could have been lifted and lubricated just prior to sealing the Ascending Passage or lubricated when placed in the Grand Gallery and left restrained for years. The Grand Gallery and the antechamber granite doors appear designed to enable a long ago disassembled A-frame to lift the plug-blocks and apply a tallow lubricant to their underside, implying the first scenario.

Sealing a passage from within is like sawing the branch you are sitting upon. This presentation will discuss the components of the counterbalanced A-frame apparatus and why the builders of the Great Pyramid would put forth such effort to internally seal a passage that was necessarily bypassed.

Sarah M. Schellinger, San Antonio Museum of Art

Egyptian Animal Mummies: Science Explores Ancient Religion

During the Third Intermediate Period (ca. 1070 – 712 BC), the ancient Egyptians adopted the practice of mummifying animals to serve as an offering to the god or goddess to whom the animal was sacred. This custom continued through the Roman Period (ca. 30 BC – AD 395) when millions of animals were raised, sacrificed, and mummified for the purpose of being sold to pilgrims. After their dedication to the gods, these mummies were placed into elaborate catacombs throughout Egypt. The ancient Egyptians created four types of animal mummies: victual (food) offerings, beloved pets, sacred animals, and votive offerings. The fourth group, votive offerings, is the largest corpus of animal mummies discovered and the focus of this presentation.

The collection of animal mummies that will be discussed include crocodiles, falcons, ibises, and a cat. For this project, the mummies were examined through the use and analysis of X-radiograph (X-ray) images and Computed Tomography (CT) scans. X-ray imaging has been used to study ancient Egyptian mummies since the late 1800s, and has allowed researchers to examine the contents of the mummies without unwrapping and damaging them. Today, CT scanning allows for an enhanced imaging since it provides a three-dimensional rendering of the insides of the mummies. The results of the X-ray imaging, CT scans, and the conservation of the mummies will be presented.

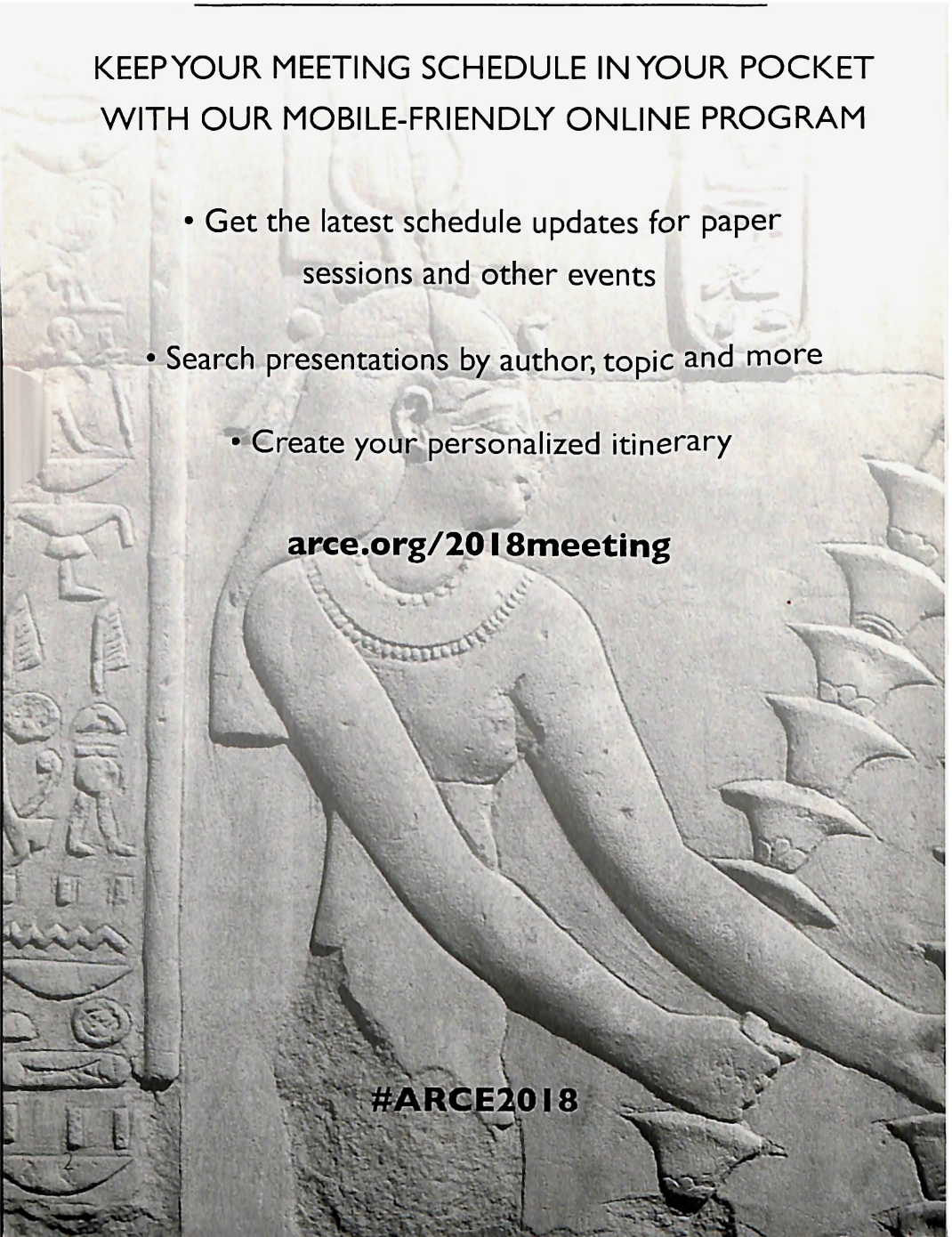
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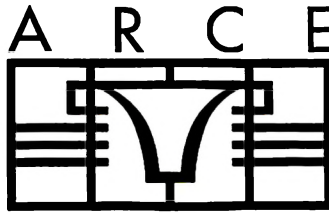
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ANNUAL MEETING OF THE AMERICAN RESEARCH CENTER IN EGYPT

April 20-22, 2018
Tucson, Arizona

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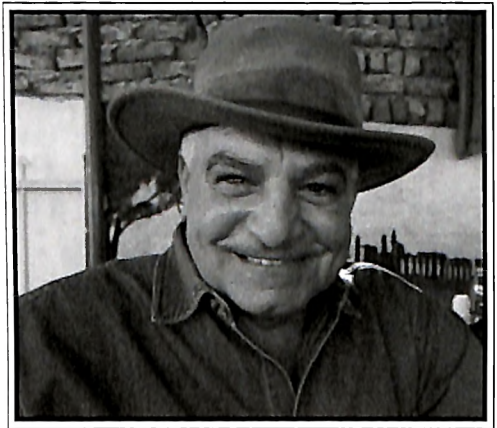
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10 MAY 2019

GIZA PYRAMIDS, VALLEY OF THE KINGS & VALLEY OF THE MONKEYS

LECTURE, RECEPTION & BOOK SIGNING
FRIDAY, APRIL 20, 6:00 P.M.



Renowned archaeologist **Dr. Zahi Hawass** will deliver a keynote lecture covering his recent excavations, the Egyptian Mummy project and new theories about the tomb of Nefertiti. Dr. Hawass will also take us back to the site that he loves and has spent most of his life excavating and conserving, the Giza Pyramids, with a discussion of his recently published book *Giza and the Pyramids*, co-authored by Mark Lehner.

The event includes dinner and one drink. Tickets are \$50 for meeting attendees and \$25 for students. Purchase tickets at arce.org/annualmeeting or visit the registration table.

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STAFF IN ATTENDANCE

Jane Zimmerman, Executive Director

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Michael Jones, Associate Director for Cairo

Michelle McMahon, Director of Marketing & Communications

Laura Rheintgen, Director of Development

Karim Seikaly, Director of Business & Finance

John Shearman, Associate Director for Luxor

Charles Van Siclen, Library Director

Mary Sadek, Deputy Director for Research & Government Affiliations

Megan Allday, Events & Meeting Consultant

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Elizabeth Hart, Board Relations Manager

Meg Martin, Communications & Outreach Manager

Michelle Fuentes, Membership & Development Intern

Madeline McLeod, Research & Archives Intern



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Museum of Fine Arts, Boston

Louise Bertini,
Director for Egypt (non-voting)
American Research Center in Egypt

Beverly Hamilton,
Director, OppenheimerFunds Inc.

FROM TROWELS TO DRONES:

The Continuing Evolution of
Archaeology and Life in the Field



CHAPTER COUNCIL FUNDRAISER

Saturday, April 21

12:15 – 1:00 p.m.

Room: Madera

A panel discussion including Dr. James P. Allen, Dr. Aiden Dodson and Dr. Salima Ikram and moderated by Dr. Kara Cooney will look at evolving technology in the field of archaeology.

Tickets are \$20 and support the best student paper and poster awards. Purchase tickets at arce.org/annualmeeting or visit the registration desk.

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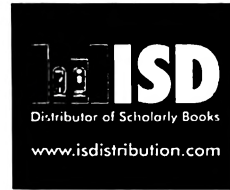
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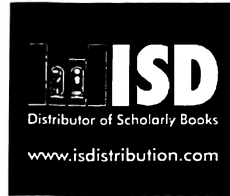
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**SIMPLY ELEGANT
GEMSTONES**

THANKS FROM THE EXECUTIVE DIRECTOR

The members and guests gathering in Tucson, Arizona, for the 69th Annual Meeting of the American Research Center in Egypt owe a debt of gratitude to ARCE's founders. Because of their vision 70 years ago, leading scholars from North America, Egypt and elsewhere are here to present and share new discoveries, research and knowledge of Egyptian history and cultural heritage. The meeting offers an important venue and engagement opportunity for anyone with a passion for Egypt.



Jane B. Zimmerman

Jane Zimmerman
Executive Director

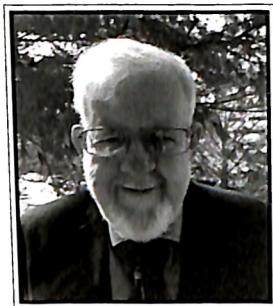
I am grateful to everyone who dedicated their time and expertise to make this Annual Meeting happen. Annual Meeting Committee Chair Pearce Paul Creasman ensured a double-blind scholarly review of abstract and poster submissions. With a 25 percent increase in the number of submissions this year, the committee's selections reflect the diversity of current scholarship on Egypt. I offer my profound thanks to committee members James Allen, Stephanie Denkowicz, Nadine Moeller, Rick Moran, Robert Ritner, Megan Allday, Melinda Hartwig and Betsy Bryan.

I also want to thank the ARCE Chapter Council and our 13 vibrant ARCE chapters. They continue to support rising scholars of Egyptian studies with the organization of the Best Student Paper Contest and the Graduate Student Poster Contest. The Theodore N. Romanoff Prize and the William P. McHugh Memorial Fund help current graduate students become future academic leaders. ARCE's public-private partnerships include the U.S. Department of State's Educational and Cultural Affairs Bureau, the Council of American Overseas Research Centers and the National Endowment for the Humanities, which provide funding for ARCE fellowships. ARCE's longstanding partnership with the U.S. Agency for International Development has helped build skills; generate jobs, income and opportunity in Egypt; and preserve Egypt's cultural heritage for generations to come.

Staff and volunteers have spent many hours in preparation and will work throughout this weekend's events to ensure a successful meeting. Finally, thank you to our members, sponsors and donors, whose generosity ensures our shared knowledge and love of Egypt will inspire others to join us.

Enjoy Tucson!

AWARD RECIPIENTS



Professional Achievement Award: David O'Connor

David O'Connor is emeritus Lila Acheson Wallace Professor of Egyptian Art at the New York University Institute of Fine Arts, emeritus professor of Egyptology at the University of Pennsylvania and emeritus curator-in-charge of the Egyptian section of the University of Pennsylvania Museum of Archaeology and Anthropology. He earned his Ph.D. from the University of Cambridge. O'Connor's earliest excavation experiences were in Egyptian and Sudanese Nubia during the great Nubian salvage campaign of the early 1960s. Over his career, he directed and co-directed excavations in Abydos and western Thebes and has authored, co-authored and edited numerous books. David O'Connor is a longtime member of ARCE and has served as president and dedicated member of the board of governors.



Distinguished Service Award: Janet H. Johnson

Janet H. (Jan) Johnson is the Morton D. Hull Distinguished Service Professor of Egyptology at the Oriental Institute of the University of Chicago where she has taught since 1971. She earned her Ph.D. from the University of Chicago. From 1983 to 1989, she was the director of the Oriental Institute. Widely published on diverse subjects, her main interests are Demotic studies and gender and women in ancient Egypt. She has participated in archaeological and epigraphic field work across Egypt. In over three decades on the ARCE board of governors, she served as president, vice president, co-chairman and member of numerous committees.



ARCE Staff Award: Mary Sadek

Mary Sadek received her bachelor's degree from the banking branch of the Sadat Academy for Management Sciences in 1989. She worked as an accountant at Pfizer before joining ARCE in 1990. She began her ARCE career as a secretary for the director, then served as a program coordinator and now is the deputy director for research and government affiliations. Some of her key duties include liaising with the Ministry of Antiquities on behalf of ARCE expeditions, and leading ARCE's public outreach and lectures in Cairo.

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MEETING ITINERARY

THURSDAY, APRIL 19, 2018

TIME	EVENT	LOCATION
8:00 a.m. – 10:00 a.m.	RSM Council Meeting	Ventana
1:00 p.m. – 9:00 p.m.	Bookseller Setup	Main Foyer
3:00 p.m. – 7:00 p.m.	Meeting Check-In and Information Desk	Atrium
4:00 p.m. – 6:00 p.m.	Speaker Audiovisual Check-In	Executive Boardroom

FRIDAY, APRIL 20, 2018

TIME	EVENT	LOCATION
7:00 a.m. – 5:00 p.m.	Meeting Check-In and Information Desk	Atrium
7:30 a.m. – 8:30 a.m.	MOA Breakfast, underwritten by ISM Strategies (Invitation Only)	Ventana
8:00 a.m. – 8:30 a.m.	Graduate Student Poster Setup	Atrium
8:00 a.m. – 6:00 p.m.	Speaker Audiovisual Check-In	Executive Boardroom
8:00 a.m. – 6:00 p.m.	Book Display	Main Foyer
8:30 a.m. – 5:00 p.m.	Graduate Student Poster Display	Main Foyer
8:30 a.m. – 12:15 p.m.	Concurrent Paper and Panel Sessions	All Rooms
10:30 a.m. – 10:45 a.m.	Coffee Break, underwritten by ISD	Main Foyer
12:15 p.m. – 2:00 p.m.	Lunch	On Your Own
12:15 p.m. – 1:15 p.m.	Student Networking Lunch, underwritten by the University of Arizona, Center for Middle Eastern Studies	Canyons
12:30 p.m. – 1:30 p.m.	Chapter Officers' Meeting	Ventana
2:00 p.m. – 4:30 p.m.	Concurrent Paper and Panel Sessions	All Rooms
4:15 p.m. – 5:00 p.m.	Graduate Student Poster Discussion	Main Foyer
6:00 p.m. – 7:00 p.m.	Dr. Zahi Hawass Keynote Address	Madera, Pima, Sabino
7:00 p.m. – 9:00 p.m.	Reception and Book Signing with Dr. Zahi Hawass	Madera, Pima, Sabino

SATURDAY, APRIL 21, 2018

TIME	EVENT	LOCATION
7:00 a.m. – 4:00 p.m.	Meeting Check-In and Information Desk	Atrium
7:30 a.m. – 8:30 a.m.	Expedition Leaders' Breakfast (Invitation only)	Ventana
8:00 a.m. – 5:00 p.m.	Speaker Audiovisual Check-In	Executive Boardroom
8:00 a.m. – 5:00 p.m.	Book Display	Main Foyer
8:30 a.m. – 4:00 p.m.	Graduate Student Poster Display	Main Foyer
8:30 a.m. – 12:15 p.m.	Concurrent Paper and Panel Sessions	All Rooms
10:30 a.m. – 10:45 a.m.	Coffee Break, underwritten by Brill	Main Foyer
12:15 p.m. – 1:00 p.m.	Chapter Council Fundraiser	Madera
12:15 p.m. – 1:45 p.m.	Lunch	On Your Own
1:00 p.m. – 1:45 p.m.	Fellowship Information Session	Canyons
1:45 p.m. – 4:00 p.m.	Concurrent Paper and Panel Sessions	All Rooms
4:15 p.m. – 5:15 p.m.	General Members' Meeting	Pima, Sabino
6:30 p.m. – 8:30 p.m.	ARCE Members' Dinner Reception	Madera, Pima, Sabino

SUNDAY, APRIL 22, 2018

TIME	EVENT	LOCATION
8:00 a.m. – 12:00 p.m.	Meeting Check-In and Information Desk	Atrium
8:00 a.m. – 12:00 p.m.	Speaker Audiovisual Check-In	Executive Boardroom
8:00 a.m. – 12:00 p.m.	Book Display	Main Foyer
9:00 a.m. – 12:45 p.m.	Graduate Student Poster Display	Main Foyer
9:00 a.m. – 12:15 p.m.	Concurrent Paper and Panel Sessions	All Rooms
10:30 a.m. – 10:45 a.m.	Coffee Break	Main Foyer

SESSION SCHEDULE

FRIDAY

Room	Madera	Pima	Sabino	Canyons
8:30 a.m. - 10:30 a.m.	Wood & Maritime World	Old Kingdom & First Intermediate Period	Technology & Archaeology	The Levant
10:45 a.m. - 12:15 p.m.	Language & Literature 1	Women in Ancient Egypt 1	The Digital World	Stone, Mines & Quarries
2:00 p.m. - 4:30 p.m.	Nubia 1, underwritten by AmSARC	Coffins & Mummies	Fieldwork 1	History of Egyptology

SATURDAY

Room	Madera	Pima	Sabino	Canyons
8:30 a.m. - 10:30 a.m.	Cults & Temples	Middle Kingdom	Scientific Methods	Greco-Roman
10:45 a.m. - 12:15 p.m.	Conservation	New Kingdom	Pain	Animals & Bioarchaeology
1:45 p.m. - 4:15 p.m.	Fieldwork 2	Women in Ancient Egypt 2	Nubia 2, underwritten by AmSARC	Language & Literature 2

SUNDAY

Room	Madera	Pima	Sabino	Canyons
8:30 a.m. - 10:30 a.m.	Amarna	Conservation & Graffito	Book of the Dead	Objects & Education
10:45 a.m. - 12:15 p.m.	From the Field	Ramesseid Art	Tombs	Status & Society



STUDENT EVENTS

STUDENT NETWORKING LUNCH

FRIDAY, APRIL 20, 12:15 – 1:15 P.M.

ROOM: CANYONS

Meet fellow students in an informal environment and expand your professional network. Speak with professors specializing in diverse areas of Egyptology: archaeology, art history, philology, religion, museums and publications. This event is \$15 and includes lunch. Purchase tickets at arce.org/annualmeeting or visit the registration table.

GRADUATE STUDENT POSTER DISCUSSION

FRIDAY, APRIL 20, 4:15 – 5:00 P.M.

ROOM: FOYER

Poster presenters will be on hand to discuss their research and answer questions. Posters will remain on display throughout the Annual Meeting.

FELLOWSHIP INFORMATION SESSION

SATURDAY, APRIL 21, 1:00 – 1:45 P.M.

ROOM: CANYONS

Join ARCE's director for Egypt, the academic programs coordinator and former ARCE fellows to hear about opportunities for graduate, postdoctoral and faculty research in Egypt.



GRAD STUDENT PUB NIGHT!

SATURDAY, APRIL 21, 9:00 P.M.

NO ANCHOVIES ON UNIVERSITY BOULEVARD



PRESENTATION ABSTRACTS

*Abstracts are published exactly as they were
submitted to the American Research Center in Egypt.*



Mohamed Abdelaziz, Egyptian Ministry of Antiquities
*Photogrammetry and 3D Technology in Archaeology:
Applications on some Archaeological Sites in the City of
Alexandria, Egypt*

Photogrammetry is the art and science of deriving accurate 3D metric and descriptive object information from multiple analogue and digital images. Concerned with deriving measurements of the size, shape, position and texture of objects from measurements made on photographs, it can be used to create 3D models of buildings or objects by overlapping images using photogrammetric software and creating point clouds that are translated into a 3D mesh. Any camera can be used for photogrammetric purposes, from low-cost to high-end large format metric cameras. There is an increasing interest in utilizing this imagery in different fields such as archaeology, architecture and mechanical inspection.

The aim of this paper is to show the results of a project utilizing digital photogrammetry methodology at different sites in Alexandria, Egypt and its promising application in archaeology. The paper describes a study in which photogrammetry methods and digital modelling techniques were used to obtain a three-dimensional digital model based on maps and plans, either as elevations, facades and/or contours, and the relevance of this technology in the documentation, conservation and safeguarding of archaeological sites. The importance of using 3D scanning data sets to reveal otherwise invisible information at archaeological sites that are affected by decay processes, and which frequently endanger the last vestiges of some peoples and cultures will additionally be highlighted.

Matthew J. Adams, W.F. Albright Institute of Archaeological Research
*Egypt and the Levant in the 3rd Millennium: Implications of the
New Radiocarbon Chronology*

In a series of recent studies by Regev et al. (2012, 2014), new radiocarbon dates were offered in support of a revision to the traditional absolute chronology of the Early Bronze Age (EB) in the southern Levant. The more than 450 new dates from more than 60 sites demonstrate that the EB II period is notably shorter than previously thought and that the EB III ends ca. 2500 BCE,

ca. 200-300 years earlier than traditional chronologies have suggested. When correlated with recent radiocarbon dates for the Early Dynastic Period and Old Kingdom, the new dates force numerous revisions to the current understanding of the history of the periods and the synchronisms between particular Egyptian Dynasties and southern Levantine cultural phases. This paper discusses the implications of the new radiocarbon chronology of the southern Levant and provides a revised historical and archaeological outline of Egyptian-Levantine interactions in the 3rd Millennium BCE.

Mohamed Faroug Ali, American Sudanese Archaeological Research Center

A new archaeological research center in Sudan, AmSARC

AmSARC is the American Sudanese Archaeological Research Center, an independent not-for-profit founded in 2017. Our mission is to encourage American and Sudanese archeological research and collaboration in Sudan and provide the network and support for success. The center facilitates research and nurtures scholarly ties between institutions and individuals in both countries as well as conducting its own archaeological research in Sudan. AmSARC also organizes outreach on public archaeology throughout the two countries. AmSARC was incorporated as a non-profit corporation in California and has secured 501(c)3 status.

Victoria Almansa-Villatoro, Brown University

An Enigma Solved: the Hemusets

Appearing as a group of midwives goddesses, or almost abstract female companions of the Kas, the Hemusets are probably one of the most obscure aspects of Egyptian religion. This paper seeks to cast new light on their origin and their mysterious roles, which have never been explained before, by studying the historical development of the concept of Hemuset through textual, iconographic, and archaeological evidence, and examining them in their broader Mediterranean cultural context. The constant association of the Hemusets with the goddess Neith plays a major role in this research, as it will be showed that the Hemusets are none but a reminiscence of a Proto-Egyptian Mother-Goddess religion centered on Neith. This research aims to dismiss the biased assumption of the Egyptian principle of creation as

essentially masculine by demonstrating the active involvement of the Hemusets in creation of food and provision of fertility for both the lands and humans. This new understanding places the origins of Egyptian religion in the common Mediterranean Prehistoric background of mother-centered religions. The attributes and iconography of the Hemusets are cross-cultural, and intertwined with manifestations of creation, birth, nature, but also destruction and power. Finally, this research yields new insights into the Egyptian view of the world inasmuch as it highlights their logic of contrast between the negative and positive aspect of violence and chaos as an ultimate medium of creation. The Hemusets show that the epitomizing desire of the Nilotic people was prosperity, which in Egypt meant abundance of years, supplies and childbirth.

Debbie Anderson, UC Berkeley

Update on Hieroglyphs on Computers and Devices (via Unicode)

The paper gives an update to the presentation at the ARCE annual meeting in 2016 (“Hieroglyphs in Unicode: Progress towards a Universal Computing Standard”). It will bring Egyptologists and their students up to date on two new developments that may significantly affect their research and publication process in the future.

In late 2017 a revised proposal to get additional Egyptian hieroglyphs into the Unicode Standard was put forward. It will ultimately make over 4,000 characters available to Egyptologists in the future, enabling Egyptologists to be able to search documents and across the Web for other instances of a particular character. However, a careful review of the proposal by Egyptologists is sought. This proposal is based on work that cites references for each proposed character, including Hornung and Schenkel’s hieroglyph list, as well as other works, such as *Einführungen und Quellentexte zur Ägyptologie* (Gestermann and Leitz) and *Einführung ins Ptolemäische* (Kurth). The speaker will explain the proposal review process, and how Egyptologists can participate. The draft is available at: <http://www.unicode.org/L2/L2017/17415-n4924-hieroglyphs.pdf>. A spreadsheet showing the references for each character is available at: <http://www.unicode.org/L2/L2017/17415-n4924-database-info.pdf>.

In addition, a set of new characters have been approved to enable basic positioning of Unicode characters, so searching will be possible – and Egyptologists will not need to rely on image-based solutions that are not searchable. The new positioning characters are on track to be published in 2019. A brief demonstration showing how the new characters will work will be given.

Nicola Aravecchia, Washington University in St. Louis
'Ain el-Gedida: An epoikion in Late Roman Dakhla?

This paper will look at archaeological and documentary evidence from the Late Roman settlement of 'Ain el-Gedida (located in the Dakhla Oasis of Upper Egypt), with the goal of shedding new light on the origins and nature of the site. 'Ain el-Gedida was first excavated by an Egyptian mission in 1993-1995 and immediately raised interest among scholars working in the oasis, with the site being preliminarily identified either as a rural village or a monastic settlement. The latter interpretation was stimulated by the unusual topographical configuration of the excavated area, which was seen as reflecting a social structure based on communal living, rather than separate households. More recent excavations and study seasons, conducted (from 2006 to 2010) by a New York University mission directed by Roger Bagnall, has allowed investigators to gather a substantial amount of new data. This evidence, both archaeological and epigraphical, points to a likely identification of 'Ain el-Gedida as an epoikion, i.e., a small rural center associated with the management of a large agricultural estate. The existence of this type of settlements is testified to by considerable documentary evidence. Nevertheless, no epoikion has been excavated and/or securely identified thus far. The site of 'Ain el-Gedida may provide the first available archaeological evidence of a fourth-century epoikion, therefore offering new and useful data on the layout and organization of this type of settlements in Late Roman Egypt.

Caroline Joan Arbuckle, University of California, Los Angeles
The Religious Significance of Timber in Ancient Egypt

The Egyptians attributed religious significance to almost every material in their world. For decades, scholars have related stones, gems, metals, pigments, wax, and even clay to specific deities, beliefs, and rituals. The importance of timber, however, is still poorly understood. Despite the numerous references to

the magical properties of specific species, Egyptologists rarely acknowledge the value of woods, especially those that grew locally in Egypt. This paper presents the textual, pictorial, and archaeological evidence for the religious significance of the most frequently used timbers in ancient Egypt: cedar, sycamore fig, acacia, tamarisk, sidder, and palm. This analysis centers on a translation of an apparent variant of Book of the Dead spell 193, in which the speaker describes the magical properties of each species as it is used to create a wooden coffin. How the significance of these woods changed over time is also compared to the archaeological record, demonstrating the relationship between the practical function and availability of timber and its affect on religious beliefs. This study proves the importance of wood, and hopes to encourage more frequent and exact analyses of timber in its context as a construction material, particularly for funerary and ritual objects.

Mariam F. Ayad, The American University in Cairo
Some Remarks on Ancient Egyptian Women's Rhetoric & Literacy

The most notable studies on literacy in ancient Egypt have been written by Baines (collected in Baines 2007) and Baines and Eyre (1983 and 1989). To date, only one study (Bryan 1985) attempted to systematically present evidence of female literacy, as presented in iconographic scenes preserved on the walls of New Kingdom tombs. Expanding on Bryan's work, this paper will outline and synthesize the evidence for female literacy, including letters and biographical texts, dating to the Old Kingdom through the Third Intermediate Period and will argue that women were perhaps more literate than had hitherto been assumed.

Miroslav Barta, Charles University
Punctuated equilibria and Ancient Egyptian history

When looking at Ancient Egyptian history, there are two opposing ways how to approach it. One can understand this past as a single continuum which kept steadily changing over time. Or one can look for certain patterns in the progression of history and see it as a continuum punctuated by short-term events in which major changes in all possible spheres of the society took place. In this talk, it will be argued that most important changes in Ancient Egyptian society came into being as short, "punctuated"

events which can be connected with specific historical contexts and several kings that shaped the society of the day. This brief outline of the history of the third millennium BC in Egypt will reconsider the mechanism of social and state development and change in the Early Dynastic and Old Kingdom periods (2900 and 2120 BC) with a specific focus on the reign of Nyuserra. It will be shown that the punctuated equilibria theory may have significant bearing on how we see and interpret archaeological and historical records. At the same time, it will be shown that this specific approach may shed some new light on traditional issues in Egyptology.

D.J. Ian Begg, Trent University; **Giulia Deotto**, Università di Padova; **Alessia Fassone**, Museo Egizio di Torino; **Giorgia Cafici**, Scuola La Normale, Pisa; **Alessandra Menegazzi**, Museum of Archaeological Sciences and Arts, University of Padua; **Carlo Urbani**, Istituto Veneto di Scienze Lettere ed Arti; **Paola Zanovello**, Università di Padova
Tebtunis in Rome. New discoveries from research in archives in Italy and Canada.

Carlo Anti (Villafranca di Verona, 1889 - Padua 1961) - professor of archaeology and then Rector of the University of Padua - was director, since 1928, of the Italian Archaeological Mission in Egypt. He excavated at Tebtunis in the Fayyum together with the Italian-Canadian Gilbert Bagnani and the two scholars documented their discoveries in various papers, still mostly unpublished. The ongoing analysis of both Anti's and Bagnani's archives, currently preserved between Italy and Canada, is enabling us to pinpoint precise links between the artifacts coming from Tebtunis, the Tebtunis collection now held in the Museo Egizio in Turin, those currently held at the National Museum in Rome, and the city of Rome itself.

The statue of a priest from the vestibule of the temple of Sobek at Tebtunis was discovered in 1931 and sent to Rome but is now in the Turin Museum. A votive relief of Isis Thermouthis was discovered and sent from Tebtunis to Rome in 1935, but is still in the Terme Museum in Rome. Analysis combining the study of the archival sources and the objects themselves as case studies has enabled us to retrace not only their post-excavation history but also the previously unknown history of the artifacts from Tebtunis in general scattered in Egyptian collections in Italy.

Louise Bertini, American Research Center in Egypt
'Classic' critters in the food economy: Ptolemaic/Roman faunal assemblages at Kom al-Ahmer and Kom Wasit

With the start of Ptolemaic rule in Egypt and the construction of a new capital city at Alexandria, political and economic changes took place throughout the country, and especially in the western Delta region. One of the ways that we can look at these changes is through faunal analysis of archaeological remains of the domestic animals raised in the countryside as a result of the demand for new supporting markets. Two of these newly established cities are Kom al-Ahmer and Kom Wasit, with occupational evidence beginning in 315 BC up through the seventh-century AD. These sites provide a unique opportunity to look at the relative significance of different animals within the food economy of each site and how they compare to faunal assemblages of other sites of a similar time period in the western Delta. The preliminary results of analysis show different patterns of animal exploitation, accounting for part of the economic wealth of the individual site as well as that of the larger, regional economic structure.

Laurel Bestock, Brown University
Updates from Uronarti: life at the edge of the world

The Uronarti Regional Archaeological Project has been investigating the monumental fort of Uronarti, one of only two Middle Kingdom fortresses that survived the flooding of Lake Nasser, in northern Sudan since 2012. This talk will give updates on recent research, highlighting both archaeological findings and methodological undertakings. Particular focus in the last two seasons has been devoted to ways in which the original plan of the fortress was changed over time. Remodeling and reconfiguring of both the barracks and the monumental structures inside the fortress, even the blocking off of streets, demonstrates the degree to which the needs of the population living at Uronarti altered the original pharaonic stamp of the outpost over time. In conjunction with an extramural settlement, in which extensive excavation has begun, these reconfigurations show us that the fortress was a more complex setting for life and cultural interaction than would be suggested by the highly inaccurate published plan. A further aim of the project is to develop a tablet-based paperless recording system that integrates context descriptions, photographic records, and collected

materials analysis in a platform that allows for web-publication of results and initial interpretations; the ultimate goal is to make this product available to any interested archaeological project. The first stage of this system has now been field tested, and this talk will highlight the ways in which tablet recording enhances our ability to document and analyze the complex archaeology of this four-thousand-year-old colonial outpost.

Karen Maggie Bryson, Johns Hopkins University
Fashion Forward: Dress and Decoding the Queenly Images of the Early 19th Dynasty

The early 19th Dynasty was a time of change. Although it is usually considered an era of “restoration,” the influence of Amarna was still felt through its impact on the iconographic and stylistic vocabulary available to artists and patrons. One area in which the dialog between the return to orthodoxy and the persistence of Amarna influence is visible is in representations of the first Ramesside queens. Although the ideology and iconography of Ramesside queenship have been extensively explored, particularly at the programmatic level, the highly constructed nature of Egyptian imagery makes it possible to derive new perspectives from focused analysis of even well-known material. This paper presents the dress and personal ornaments of the wives and mothers of Seti I and Ramesses II as an independent locus for the communication of important and varied mythological ideas about queenship. In addition, when the dress of the first Ramesside queens is contextualized with regard to that of the royal women of the 18th Dynasty, an unexpectedly continuous development can be seen. This continuity not only reflects ongoing change in the ideology of queenship and standards of decorum, but may have dynastic-political implications as well.

Scott Bucking, DePaul University; **Hussein Mohamed Ali**, Minia University; **Heba Abd Elsalam**, Middle Tennessee State University
The 2018 Season at Beni Hassan and the Development of a New Heritage Preservation Initiative

This paper reports on the 2018 field season at Beni Hassan, which continues the efforts of the project team to examine the architectural and epigraphic evidence for Late Antique monastic

settlement in and around the Beni Hassan necropolis. The rich array of archaeology in the project concession area has inspired the development of a new heritage preservation initiative in partnership with Egyptian scholars and Egyptian institutions in the region. This initiative capitalizes on the Pharaonic, Greco-Roman, Christian, and Islamic archaeology in the concession area to offer a valuable multicultural perspective on regional heritage. The initiative also addresses the great risk that some of the archaeology is currently under due to illicit digging. The paper will highlight the urgent conservation needs of the project and discuss the education and outreach program designed to foster greater awareness among local communities of the value of preserving this fragile archaeological heritage.

Simone Burger, Independent Scholar
Grey granite royal statuary in the late Ramesside period

As the New Kingdom drew to an end, historical documents point to the notion of chaos. The Tomb Robbery papyri, the appearance of foreigners stopping work in the Kings' and Queens' valleys, famine and strikes speak of a moment of disorganization and lack of structure. However, during this period, royal sculptures continued to be produced for the late Ramesside line – albeit a modest amount. We do not often speak of these late Ramesside royal statues for their high technical achievement. Most often, late Ramesside royal statues are used as dating markers and criteria. Yet, when we look closely at some of the individual statues produced during this period, particularly during the reign of Ramesses VI, an anomaly emerges: there are four known examples of grey granite royal statuary that demonstrate affinities in production and iconography and strongly suggest that they originate from the same workshop or group of workmen. The origins of this workshop date to the reign of Ramesses III, when there are several examples of major royal grey granite statues that show highly inventive iconography. The identification of this workshop might first appear to be insignificant – speaking of style and manufacture in the late Dynasty 20. But, identifying this workshop shows us the work crews continued to be organized during this period; producing highly innovative images for Ramesses VI

Amy C Butner, Emory University
This-Side That-Side: Thebes, Amarna, and the diesseitige Jenseits

New Kingdom conceptions of the afterlife focused on the desire to join the god Osiris in the underworld (Duat). Royal tombs of the period were decorated with detailed depictions of the sun's nocturnal journey through the Duat, and images of Osiris appear regularly in non-royal tombs at Thebes. Non-royal tombs at Amarna, by contrast, with their emphasis on the royal family, ritual, and cityscape, seem to reflect a new conception of the afterlife. At Amarna the Duat appears to have vanished, and instead the afterlife is spent among the temples and gardens of the city. The space of the afterlife (Jenseits) has merged with the space of the living (Diesseits).

However, explicit depictions of the Duat are rare in non-royal Theban tombs of the early 18th dynasty. It is not until the post-Amarna period that maps of the Duat and images of its denizens regularly appear. The afterlife illustrated in 18th dynasty Theban tomb chapels also extends into the space of the living. Tomb owners at both Thebes and Amarna express their desire to leave their tombs as ba-spirits to watch the rising of the sun, and to take part in ritual offerings in the temple.

This paper will examine visual and textual references to the afterlife and the underworld in non-royal tomb chapels of Amarna and of early 18th dynasty Thebes in order to explore the nature of the merged world of the living and the dead and to lay the foundations for new interpretations of Amarna tomb decoration.

Patricia A Butz, Savannah College of Art and Design
The Oedipus Fresco from Touna el-Gebel: An Amalgamation of the Egyptian and Greek Funerary Narrative

This paper focuses on an important and recently conserved funerary fresco in the Egyptian Museum (Inv. 63609). It was discovered in 1934 in the necropolis of Touna el-Gebel and has been dated to the Roman Period. The fresco is tripartite in composition and its principal scenes, while Greek in narrative content, are very provocative for a funerary house on Egyptian soil. Framing the centerpiece, which depicts Boreas and Orithyia barely visible under heavy cloud cover, are two critical scenes from the Oedipus narrative. The right shows the encounter between Oedipus and his father Laius, when Oedipus unknowingly fulfills the oracle by killing his father on the road

between Delphi and Thebes. On the left is the subsequent encounter between Oedipus and the Sphinx, who lives outside of Thebes where Laius was king. Miniaturized Greek inscriptions act as labels for at least one element in each of the compositions.

The sophistication of this fresco, together with two others still under conservation, recalls the Alexandrine school and even major cycles such as the *Odyssey Landscapes* from Rome. The exquisite inscriptions affect the reception of the visual narrative and will be shown to act as ornament as well as textual markers. The paper argues how the choice of the Oedipus scenes, their unique treatment of the two events and their double position flanking the central myth carry strong Egyptian overtones, connecting the Egyptian topos, the city of Thebes in Egypt and the iconography of the Sphinx into hybrid concepts of the next world.

Kevin Cahail, Penn Museum

The Tomb of the Draftsman: Recent Excavations in the Temple Cemetery of South Abydos, 2017.

Recent Penn Museum excavations in the New Kingdom Temple Cemetery at South Abydos have uncovered a previously unexcavated tomb. The modest, single chambered mud-brick tomb (TC.14) lies at the southeast end of the currently known expanse of the Temple Cemetery. Brick stamps with the throne name of Seti I indicate that the tomb probably dates to the early Nineteenth Dynasty – a conclusion which is corroborated by the pottery and coffin fragments we recovered. Though robbed in antiquity, TC.14 produced a number of interesting, and at times, puzzling objects. The most notable of which was a group of gypsum plaster fragments which originally surrounded and encased a linen-wrapped mummy. The technique of encasing a mummy in wet plaster is rare, if not wholly unknown during the Nineteenth Dynasty, making this discovery both puzzling and potentially significant. No other burial in the Temple Cemetery exhibits this unique funerary treatment of the body.

The fragments of gypsum plaster also preserved the impressions of a shabti and artist's palette, though the original objects had long since rotted away. Pigmented texts from the shabti were transferred to the wet plaster, allowing us to ascertain that the tomb belonged to an Outline Draftsman, perhaps one who was

employed in decorating the temples of Seti I and Ramesses II at Abydos. In this lecture, we will discuss this tomb, and contextualize it with other recent discoveries in the non-royal burial practices at South Abydos during the New Kingdom.

Amy Calvert, The Art of Counting

Constructed Kingship: The Role of Regalia in Royal Identity

Regalia played a central role in the construction of royal identity, and recent statistical analysis has shed more light on regalia's function and impact. The increasing density of royal symbolism over Egyptian history is a visual reflection of the increasing complexity of the king's role; as function evolved, so too did the accoutrements. This emphasizes the variety of roles inherent in the office of kingship; pharaoh could only present himself in these aspects if he symbolically appeared as such. Royal regalia distinguished the king, identified various royal forms, and visually transmitted that data. Regalia was emblematic, like hieroglyphs forming 'sentences' that could be read and altered by varying the elements.

The increasing complexity of regalia did not occur steadily, but with a noticeable wax and wane. In certain periods, the king was typically depicted in the most primal regalia. These were often uncertain times when it was likely particularly important to portray pharaoh as the legitimate descendant of ancient kings. As stability and power increased, regalia tended to elaborate.

Elements of regalia were combined in ways that related to the role the king was fulfilling. Some elements and combinations occur with great regularity while others are quite rare. Statistical research has identified specific patterns of regalia that almost never appear together being intentionally combined for certain types of scenes. These studies indicate an underlying complexity to regalia selection that has yet to be fully explored and, using these methods, a deeper understanding of the constructed royal image can be achieved.

Roselyn A. Campbell, University of California, Los Angeles

Hard Times: The Life, Death, and Afterlife of Three Individuals from Tell Edfu

In 2012, the skeletons of three individuals were unexpectedly

discovered in a grain silo at the site of Tell Edfu. Despite the importance of proper burial rites in ancient Egyptian society, the individuals lay sprawled in the silo with no evidence of proper mortuary treatment. A thick layer of fill was deposited over the skeletons, and ceramic analysis indicates that the bodies were almost certainly deposited around the middle of the twenty-first century B.C., towards the end of the First Intermediate Period.

This paper presents some of the conclusions drawn from my osteological analysis of these skeletons. All three appear to have been women, and show evidence of difficult and painful lives. The three individuals seem to have been deposited without wrapping of any kind, and the disarray of the bodies suggests that they were not carefully arranged before they were covered with several meters of fill. The presence of numerous pathologies and injuries, as well as the unique burial context, suggest that these individuals may have been viewed as outsiders or outcasts during life, perhaps ostracized in life as they were in death, and that their remains were disposed of or discarded rather than buried with respect. This paper explores the identity and lives of these individuals in an attempt to understand their social context in Edfu during the uncertain times of the First Intermediate Period.

Danielle Candelora, University of California, Los Angeles
The Eastern Delta as a “Middle Ground” for Hyksos Identity Negotiation

In the Second Intermediate Period, the cultural borderland of the eastern Delta is a liminal space in which identity is transient, flexible, and constantly negotiated by native Egyptians and their immigrant Levantine neighbors. The rich archaeological record has been investigated in terms of hybridity and cultural blending, yet few studies have addressed the more conceptual side of this interaction or the potential motivations behind it. Further, while many studies emphasize the ways in which the Hyksos seem to have Egyptianized, they fail to account for the numerous examples in which they actively maintain their foreign identities. Instead, using the theoretical framework outlined in Richard White’s *The Middle Ground*, I propose that the Hyksos consciously worked to create a new, mutually constructed and shared worldview with their Egyptian and Levantine subjects in an effort to rule the eastern Delta more effectively. This “middle ground” required both the intentional maintenance of their

foreign identities, as well as the adoption of particular aspects of Egyptian culture. For example, the Hyksos take on the traditional Egyptian titulary alongside Egyptian throne names, yet publicize their Semitic personal names accompanied by the title Heqa Khasut – the customary Egyptian term for foreign ruler. Additionally, while the Hyksos seem to have adopted an Egyptian style of administration, featuring scarab seals and hieroglyphic Egyptian rather than cuneiform Akkadian, administrative titles become restricted to those signaling kinship and thus reflecting that the Hyksos adapted this Egyptian administrative overlay to a more tribally-based system.

Michael Chen, University of California, Los Angeles
The Compositional Design of Djedhor Cairo JE 46341

The healing statue of Djedhor (Cairo JE 46341) is completely inscribed with magical spells that define its religious efficacy. Practitioners would pour water over the statue in order to charge the water with magical healing properties-this water would then be imbibed or applied to the body to alleviate snake or scorpion venom. By means of persuasive analogy, the content of the inscribed healing spells translates a private individual level need into a mythological precedent of when the god Horus was stung by a scorpion and was healed by the god Thoth.

In this study, I closely examine the layout of spells upon the statue surfaces of Djedhor to uncover the inherent planning behind the design of the statue. The strategic design of healing statues undeniably affects their ritual functionality. I will argue for the centrality of aesthetic spell layout in the compositional design and how it reveals both a balanced spell arrangement and the inscribing order of the statue's construction. The patterns observed in my analysis permit a greater intertextual study of magical healing spells and a better understanding of these spells' relationships with materiality. The design implications found in Djedhor broadens our knowledge of the larger corpus of Egyptian healing statues.

Sara E. Cole, Getty Villa
A Tale of Two Obelisks: The Benevento Obelisks' Modern History and Conservation

In AD 88/89, during the reign of emperor Domitian, two granite

obelisks were commissioned for a temple to Isis at Benevento, Italy. One of these obelisks currently stands in a nearly complete state in Benevento's Piazza Papiniano, while its fragmentary twin is in the collection of the Museo del Sannio. The two obelisks bear nearly identical Middle Egyptian inscriptions naming Rutilius Lupus, who dedicated the monuments to Isis. The Museo del Sannio obelisk is currently in the conservation labs of the Getty Villa in Malibu, undergoing treatment in preparation for the exhibition *Beyond the Nile: Egypt and the Classical World* (27 March – 9 September 2018).

The obelisks played a role in Europe's appropriation of Egyptian antiquity and the formation of the field of Egyptology. Aspects of their modern history are recorded piecemeal from the 16th century onward; archival records and published accounts provide only limited information about their discovery, assembly (both are broken into multiple fragments), and conservation campaigns. The obelisks illustrate the modern re-purposing of "pagan" artifacts in sacred and secular contexts and those artifacts' subsequent transformation into objects of scholarly interest. The decipherment of the obelisks' inscriptions, first studied by Champollion, and the discovery of additional fragments (there was originally thought to be only one obelisk) eventually led to a reassembly of the monuments, which had at first been incorrectly arranged. Physical evidence for this undocumented reassembly, and other aspects of the Museo del Sannio obelisk's biography, are coming to light through its conservation at the Getty.

Patricia Coletto, Gebel el Silsila Project; **Maria Nilsson & John Ward**, Lund University
Tales from Temple and Tombs: A field update from Gebel el-Silsila Season 10

Located in Upper Egypt, Gebel el-Silsila is an archaeologically rich site encompassing 30 km² (11.5 miles²) and preserving evidence of human activity from the Epipalaeolithic through the Roman period and beyond. Since current excavations began, two sites in particular, the Temple of Sobek and the New Kingdom necropolis, have slowly been revealing their secrets to the Silsila research team. Though known predominantly for the enormous sandstone quarries, 104 in total, Gebel el Silsila's rich archaeological material is poised to give us a greater insight into

the lives of the New Kingdom laborer beyond the quarries. The quarries necessitated a massive labor force and administration thereof, which needed to be fed, housed, ritually protected, and of course buried. These latter two needs of the ancient New Kingdom population were the archaeological focus of Season 10 at Gebel el-Silsila as excavations continued at both the Temple of Sobek and the Thutmosid necropolis. This paper will present an update from the field and discuss recent finds and revelations.

Julien Cooper, Oxford University

Desert Politics: New Insights on the Blemmyean state and its external relations

This paper investigates the macro-history and political formations created by nomadic groups who lived outside the Nile Valley. In the scholarship, nomadic desert groups (the Medjay, Libyans, Shasu, Blemmyes) are considered geographically peripheral and historically incidental to the Nile Valley and its urban states. But it is clear that there were periods of 'ascendency' in the desert, where nomads challenged the power of urban states. In these periods, nomadic groups formed differing political formations which some have termed 'chiefdoms', 'confederacies' or even 'states'. For the Eastern Desert and their nomads, their ascendency lasted from the Third Century CE until the early Arab period (800-900 CE).

The Blemmyes were a group of nomadic camel and goat pastoralists who lived in the Eastern Desert of Egypt and Nubia. While they have a long history, in Late Antiquity they began to assert their hegemony over a large area stretching from Ethiopia to the Coptos desert, linking the Nile Valley and the Red Sea and controlling desert trade routes. This 'kingdom' is well-known from inscriptions at the Mandulis temple at Kalabsha, as well as through Coptic and Greek documents from Gebelein and Qasr Ibrim. This paper will specifically evaluate the political formations exhibited by the Blemmyes through new analyses of Blemmyean archaeological and textual material housed in the British Museum and Sudan National Museum. This will produce a new model for how nomadic regimes formed states and how these states interacted with various urban regimes in Egypt and Kush.

Lorelei H Corcoran, University of Memphis; **Renée A. Stein**, Michael C. Carlos Museum Emory University
The Puzzling Case of "Sarapon": A Mummy Portrait in the Michael C. Carlos Museum (Inv. 2004.048.001)

The only mummy portrait in the collection of the Michael C. Carlos Museum, Emory University, Atlanta, GA, depicts a young man with luscious, curly, dark hair and wide eyes. It is a rare and significant example of its genre because just to the (viewer's) left of the youth's face is a tabula-ansata-shaped label with a Greek text that provides the deceased's name, his patronymic, and age at death. The presence of an inscription is noteworthy given that only 2% of the approximately 1,000 known portraits include names. What further piqued the curiosity of the researchers in this multidisciplinary study, however, is Montserrat's 1993 characterization of the portrait as being "of dubious authenticity" and Parlasca and Frenz's description of it as a heavily restored pastiche ("un pasticcio molto ritoccato") that is, on the whole, modern ("nell'insieme è modern.") Despite their reservations, however, Parlasca and Frenz did not list this portrait among the "fakes" in the section devoted to forgeries in the 2003 volume of the Repertorio based on their assessment that it incorporates original fragments ("utilizzati frammenti originali.")

Under scrutiny, the Carlos portrait resembles a jigsaw puzzle consisting of over fifty fragments. This paper provides the results of a collaborative investigation involving iconographic and paleographic analyses as well as technical imaging and materials identification to map the many fragments of the portrait and to clarify their associations. This study then critically reappraises the Carlos portrait in light of the subtle distinctions that affect the assignment of authenticity, underscoring the importance of unbiased and complementary analyses.

Alicia Cunningham-Bryant, Westminster College
Ancient Objects, Modern Power: W.K. Simpson, the Yale Peabody Museum, and the UNESCO Nubian Salvage

The current pervasive Western fascination with ancient Egypt has been something almost "50 years in the making." It is the result of a purposefully designed, marketed, and mythologized PR campaign begun in 1955 that sought to support the creation of an infrastructure for the newly liberated United Arab Republic.

While the instigating factor may have been the Aswan High Dam, the ultimate result of Egyptian, UNESCO, and foreign cooperation was an established and propagated international curiosity that continues to inspire imaginations around the globe.

In keeping with the Eisenhower doctrine and the concepts of economic and cultural suasion, from 1952 to 1975 the United States government sought to combat communism in the Middle East by fostering ties with the United Arab Republic via the UNESCO Nubian Salvage Campaign through the organization and funding of the first two Tutankhamun exhibits. While later descriptions, biographies, and books on American involvement in the UNESCO campaign focus on the centrality of ancient Egypt to the intellectual heritage of humankind and the friendship between Egypt and the United States, the addition of the William Kelly Simpson Archive at the Yale Peabody Museum fundamentally shifts the modern historical narrative. The picture provided through extensive correspondence between the U.S. Department of State, the U.S. Cultural Attaché to Cairo, the Egyptian Ministry of Cultural Affairs, numerous museums, and personal communications demonstrates a consciously subtle implementation of American foreign policy utilizing archaeology as a mechanism of diplomacy in order to forestall the encroachment of communism.

Katherine Davis, University of Michigan
Silent Signs: Determinatives and Scribal Practice

Many Egyptian texts display an overt concern with manipulating written language forms. New Kingdom cryptographic texts, Ptolemaic temple inscriptions, and multilingual Graeco-Roman handbooks reveal the complexity and flexibility of the native Egyptian scripts. Moreover, the Book of Thoth, with its metaphorical discussions of hieroglyphic signs, and lists, such as the Tanis Sign Papyrus, make it clear that the writing system itself eventually became a site for scribal investigation and knowledge production. As a case study for understanding scribal attitudes towards the writing system, this paper will look specifically at how Egyptian scribes consciously perceived, exploited, and described determinatives. To this end, I explore several phenomena across the hieroglyphic, hieratic, and demotic scripts: visually and orthographically distinct determinatives, determinatives in non-standard writing contexts, and the

exclusion of determinatives. These uses reveal how scribes conceived of the act of writing and negotiated the tension between written form and spoken pronunciation within a multigraphic environment.

Aaron de Souza, Macquarie University
A Thousand Years of Nubians at Tell Edfu

This paper presents an overview of the spectrum of Nubian evidence at Tell Edfu, one of the most extensive records of Nubian activity in Egypt with a sequence spanning a period of more than 1000 years. Ranging from exceptionally fine A-Group pottery through to the coarse utilitarian wares of later periods, the assemblage presents a significant opportunity to observe developments in Nubian culture in an Egyptian urban context from the late Old Kingdom through to the early 18th Dynasty. The evidence from Edfu will be placed into its wider cultural, chronological, and regional context, allowing new insights into the place and function of Nubians within Egyptian society over time, as well as various innovations and adaptations that arose as a result of intercultural contact.

Arkadiy Demidchik, Novosibirsk National Research State University; Novosibirsk State Pedagogical University
A 'Famine Stela' Episode under the Early XIth Dynasty

On the orders of the early XIth dynasty kings Wahankh Intef and Nakht-Nebtepnefer Intef, the chapels for the gods Satet and Khnum on Elephantine were constructed with stone doorjambs, lintels, columns, etc. This is the oldest example of pharaohs' monumental stone building for gods in provincial temples. What was the incentive for this grand and labor-intensive innovation in the troubled times when the young Theban monarchy controlled only a smaller part of Egypt?

Careful scrutiny of the inscriptions from the chapels shows that Khnum was invoked there first and foremost as the lord of the sources of the Upper Egyptian inundation, believed to be situated at the First Cataract. Together with a good number of other texts examined in the paper, this indicates that the Intefs' stone building project on Elephantine was undertaken in order to deliver their Theban kingdom from too low or unseasonable Nile floods which resulted in poor harvests. Almost two millennia

later, a fairly similar story would be told on the famous “Famine Stela” about the pharaoh Djoser’s making lavish donations to the temple of Khnum on Elephantine in order to terminate the seven years’ famine. The idea of Knum’s revelation to a king in a dream, which is said to have happened to Djoser, is also attested as early as in the XXth century BC.

Christina Di Cerbo, University of Chicago; **Richard Jasnow**, Johns Hopkins University
“From Giuseppe’s Kitchen”: Graffiti from the Small Temple of Medinet Habu

Under the aegis of the Oriental Institute Epigraphic Survey, Christina Di Cerbo, assisted by Richard Jasnow, has for some years been documenting the graffiti in the Great and Small Temples of Medinet Habu. In this talk we present the recent work on the Ptolemaic Northern Annex in the Small Temple. The best known decoration from this room is the Coptic painting of Saint Minas; the excellent copy of Donald Wilber was published in William Edgerton’s *Medinet Habu Graffiti Facsimiles* in 1937. However, with the help of digital imagery, Di Cerbo has been able to identify further painted details and recover more about the history of this now sadly deteriorated wall decoration. While the talk will focus on the painting, we will also offer an overview of other newly recorded Coptic, Demotic, and figurative graffiti from this room.

Tasha Dobbin-Bennett, Oxford College of Emory
Raglan Remembers: A Bes-Figurine in the Raglan and District Museum, NZ

Residing in the Raglan and District Museum, in the coastal town of Raglan, New Zealand, is a small ancient Egyptian figurine. While not formally labelled as such, the faience figurine, abraded and held together with twisted wire, is a representation of a Bes-type figure. The story of how this artifact came to be one of the earliest donations to this small, provincial museum is varied and fascinating. During this presentation we will discuss the history behind the acquisition of the Bes-figure, how it came to reside in New Zealand, and the impact that “war souvenirs” had on the shared local history. Having been graciously afforded permission to publish this artifact by the Raglan and District Museum Committee, this presentation will also consider material

pertinent to the Museum including updated identification of the figurine and its place within NZ military history.



Raghda El-Behaedi, University of Chicago
Safeguarding Cultural Heritage from Space: A Flood Risk Assessment of the Abu Simbel Temple Complex

The Abu Simbel temple complex, located on the western bank of the Lake Nasser Reservoir behind the Aswan High Dam, is increasingly vulnerable to natural and anthropogenic processes. Flooding by the rising waters of the reservoir is among the main factors that threaten this ancient structure. With the present construction of a series of large dams from the 2nd through 5th Nile River cataracts in Sudan as well as the building of Africa's largest hydroelectric dam, the Grand Ethiopian Renaissance Dam, there is a growing concern about the safety of the temple complex. Accordingly, there is a dire need for the development of a novel tool to enable detailed and systematic monitoring of potential hazards that the ancient temple compound may face in the future. To quantify the possible inundation of the temples and to locate potential segments at risk of flooding, stereo pair imagery from the Pleiades-1A satellite sensor were used to build a high-resolution 2-meter digital elevation model (DEM). Using the derived DEM, a number of reservoir water level rise scenarios were simulated. A Google Earth Engine tool, "Satellite Observations for Archaeological Preservation" (SOAP) was also developed in order to dynamically display the flooding simulation results. This study uses an innovative approach, which integrates remote sensing, GIS and computer programming with archeology, in order to assess the vulnerability of archaeological sites to reservoir flooding. The research presented here has real implications for the way archaeologists monitor, and therefore, safeguard archaeological sites from both natural and human-induced hazards.

Geoff Emberling, University of Michigan
Memories of the Kings of Kush: New Excavations around the Royal Cemetery at El Kurru

Political leaders situate themselves in imagined lineages that connect them with the past in varied ways—this is an essential part of legitimating rulership. This talk explores the politics of memory in the empire of Kush.

El Kurru, as the location of burials of kings and queens that would rule Egypt as its 25th Dynasty, has long been known as a site at which various forms of archaism and reference to Egyptian tradition were first introduced into Kushite royal burial practice.

A new archaeological project at El Kurru has uncovered evidence of a return of royal burials to the site that can now be dated to the 4th century BCE. This was a turbulent period in Kush, in which political struggles led ultimately to the site of royal burials being moved from the region of Napata to Meroe. The new excavations at El Kurru suggest an increased assertion of ties to the past—archaism, memorialization, and historical consciousness—during this period.

Virginia Emery, Carthage College
The Architecture of Ancient Egyptian Harems

While the word “harem” can conjure overly romanticized and Orientalized images of scantily clad odalisques lounging amongst decadent cushions in luxurious fabrics wiling away their time on frivolities until the eldest male of the house was present, practically, it simply signifies women’s quarters. Ancient Egyptian harems are textually attested and have been identified at palaces, such as the Palace of the King at Malqata and the Great Palace and the North Palace at Amarna. Some palace sites, such as Medinet Gurob and Deir el Ballas, have even been identified as “harem palaces” in toto. However, these various identifications depend on a patchwork of textual, architectural, archaeological, and artistic evidence, that ultimately, by the very nature of its diversity, proves a shaky foundation, not only for the identification of harem quarters, but also for the existence of harems in ancient Egypt. This paper considers how to reconcile the range of evidence traditionally used in identifying harems to offer a more secure and post-Orientalizing means of interpreting and approaching ancient Egyptian women’s quarters and those who occupied them.

Marina Escolano-Poveda, Johns Hopkins University
Zosimos in Dendera: an Egyptological approach to the dreams of Zosimos of Panopolis

Among the writings by Zosimos of Panopolis (from the end of the third to the beginning of the fourth century CE) the five dreams

or “visions” (Mém. auth. X–XII) are the most widely known among modern scholars. These five intriguing sections have been interpreted from different points of view. The general consensus among historians of alchemy since Berthelot and Ruelle is that the dreams are symbolic representations of chemical procedures, but a psychological interpretation derived from Jung’s analyses has understood them as a series of archetypal images. Despite the popularity of this approach in some circles, the origin of the dreams’ images should be viewed instead within the historical context of Zosimos. Recently, scholars such as Mertens have proposed interpretations based on the study of other contemporary Greek literary sources. Zosimos, however, was from Panopolis (modern Akhmim) in Middle Egypt, an area particularly known for the liveliness of traditional Egyptian religion during the Roman period. Thus, in this lecture I will connect the imagery of Zosimos’ dreams with specific scenes from the Egyptian priestly context of the Graeco-Roman period, including priestly treatises such as the Book of Thoth and representations from temple walls. Then I will propose a wider understanding of Zosimos’ cultural context and of early alchemy in its Egyptian milieu.

Shenouda Rizkalla Fahim and Albair Thabet Zaghloul,
Ministry of Antiquities

An unpublished coffin of Iuw / Herib in Cairo Museum

CG28003 the subject of this study was found at El-Hawawish, El-Hawawish is situated northeast of Akhmim and the site of a cemetery dating to the Old Kingdom to the Middle Kingdom serving Akhmim which was once the capital of the 9th upper Egyptian Nome. Kanawati has suggested that the owner of the coffin is the same owner as that of tomb Q13 in el-Hawawish. It is difficult to determine the date of discovery of the coffin at el-Hawawish, but it seems to have found its way to Giza Museum between 1885-1892, where it bore number 63025. In 1903 Lacau published the inscriptions on the four sides of the coffin, but without translation. Kanawati described the coffin in 1989 and added photographs of its four sides and a facsimile of the inscription 1992.

The rectangular coffin was made of sycamore and its dimensions are length 2.12m, width 50 cm, and height 60 cm +10 cm for the lid. The coffin is decorated on the outside only, on all four sides, but not on the lid, with traditional formulae for Akhmim coffin.

On the foot end, head end and right side of the coffin there is one horizontal line of hieroglyphs. The left side has one horizontal line of hieroglyphs in the upper part and an offering list with wedjat-eye decoration below, the latter at the head end.

Rosa Erika Feleg, University of Memphis
Reused blocks in the Triple Shrine inside Ramesses II's Forecourt at Luxor Temple



The Triple Barque Shrine inside the Forecourt of Ramesses II at Luxor Temple has long been the object of theories among Egyptologists debating the shrine's original builder and placement before its "usurpation" by Ramesses II. These theories were sparked by the presence of reused Eighteenth Dynasty elements employed in the shrine's construction during the reign of Ramesses II. F. W. von Bissing and L. Habachi discussed some of the reused Eighteenth Dynasty blocks of the Triple Shrine, to which L. Bell provided new additions and some detailed descriptions, attributing the building to Hatshepsut and Thutmose III. However, to date no photographs or detailed discussions of these reused blocks has been made available to scholars.

Between January and March 2017, I was granted permission to undertake a preliminary epigraphic study of the wall reliefs and inscription of Ramesses II's Forecourt, as part of my dissertation research. During this field season, the Eighteenth Dynasty reused blocks from the Triple Shrine were systematically photographed and documented. The inscriptional material from the reused blocks indicates that they originally belonged to several Eighteenth Dynasty monuments, while their subsequent reuse within the walls of the Triple Shrine reveals new information concerning alterations the Triple Shrine underwent during the later years of Ramesses II's reign after its initial construction. This presentation will examine the reliefs and inscriptions found on the reused blocks and also offer a reconstruction of the chronology of the erection, decoration and alteration of the Triple Barque Shrine during the reign of Ramesses II.

Henning Franzmeier, Roemer- and Pelizaeus-Museum,
Hildesheim/Excellence Cluster TOPOI, Berlin
*From Magnetometry to Excavation: The Latest Results from
Qantir-Piramesse*

Qantir-Piramesse, capital of Ramesside Egypt, can be considered one of the largest archaeological sites of the New Kingdom in Egypt. In addition to previous archaeological work, between 1996 and 2012 large scale magnetic measurements were carried out at the site providing an impression of almost the complete layout of the capital of Ramesside Egypt of which nothing is visible on the surface today. As a result of the magnetic survey, an area was chosen for excavation based on the questions of threat (by encroachment and intensive agriculture) and research interest. In 2015 a large building complex, interpreted as a temple and/or palace, was chosen as it is located adjacent to the modern village and represents the first example of monumental architecture ever excavated at Qantir-Piramesse.

During two seasons of fieldwork in 2016 and 2017 excavations were carried out within this area and gave an insight into a building of a truly monumental scale at Piramesse, producing many unexpected features and finds such as colourfully painted plaster, burnt mudbricks and a mortar pit preserving the imprints of feet from 3,200 years ago.

This talk will present the recent results and some preliminary interpretations regarding the dating and function of this building which must have had an important role in Ramesside Piramesse.

Christina Geisen, Yale University
Investigating the assets of Ramesseum Collection's owner: The sketch on the verso of P. Ramesseum B

The 24 manuscripts of the 'Ramesseum Papyri' collection and the objects found alongside the texts in a late Middle Kingdom tomb in the Ramesseum necropolis have been part of the scholarly debate for a long time, as has the discussion on the possible occupation of the tomb owner. Yet, the sketch of a building preserved on the verso of one of the manuscripts, the so-called Ramesseum Dramatic Papyrus, has not attracted much attention. The drawing is possibly a secondary addition, as are other administrative notes on several other papyri of the find. The

sketch features not only different rooms, but also includes badly preserved lemmata that seem to identify the functions of the specific areas, which makes the plan of this building exceptional.

This paper will suggest readings and translations of those terms, and it will argue that the roughly drawn sketch possibly depicts a storage area and butchering place that is part of a larger estate and that is associated with the abovementioned annotations on other manuscripts, which refer to a storehouse and granary of a private estate, respectively. Furthermore, it will be proposed that the owner of the Ramesseum find was most likely connected to this estate as well. Therefore, apart from the identification of the building, the paper will give some indication on the secondary usage of some of the manuscripts of the Ramesseum find, but it will also shed new light on the last owner of the collection, in whose tomb the entire find was discovered.

Margaret Geoga, Brown University
Mysteries of Isis: "Sethos" and Egyptology in the Eighteenth Century

Jean Terrasson's 1731 novel "Sethos" follows an ancient Egyptian prince through his education, initiation into a secret society of priests of Isis, travels through Africa, and eventual return to Egypt. Today, the novel has been largely forgotten by Egyptologists and literary critics alike, drawing scholarly interest primarily for its role as a source for better-known works, such as "The Magic Flute." However, the novel's far-reaching influence and its implications for the history of Egyptology in the eighteenth and early nineteenth centuries suggest that "Sethos" merits more in-depth study, particularly by Egyptologists. This paper will examine how "Sethos" drew Egyptology into a major interdisciplinary debate among seventeenth- and eighteenth-century scholars, namely the Quarrel of the Ancients and Moderns, as well as how Terrasson used scholarly and non-scholarly sources to inform his vision of ancient Egyptian society and religion. Finally, I will discuss how the novel laid the foundations for nineteenth- and twentieth-century Egyptomania, particularly through its appropriation by Freemasonry. This paper will argue that "Sethos," although a work of fiction, is a valuable and understudied source on the development of Egyptology as a scholarly discipline.

Robyn Adams Gillam, York University
Calendar of the Animals: Animal Observation and Management as a marker of time in everyday life

The study of sources such as the reliefs depicting the seasons in the Neuserre sun temple or the Calendar of Luck and Unlucky Days (P. Cairo JE 88637; P. Sallier 4) suggest that the passage of time was marked by the observation of the natural world and, especially, animal behavior. For example several species of fish that appeared just before the inundation were accorded particular cultural and religious importance. The cool season was bracketed by the arrival and departure of migratory birds.

This presentation will argue that, for most people, such observations were a more reliable and practical method of keeping time than a calendar that was often completely uncoordinated with seasonal time. It will also be suggested that although elite concepts of time, like Dt and nHH might have been influenced such observations of nature, they had little relevance for everyday experience. Scholarly disagreement about the significance of these terms also diminishes their usefulness as a conceptual tool for understanding ancient concepts of time.

Katja Goebis, University of Toronto
Light metaphor in descriptions of 18th Dynasty kings, especially of the Amarna Period

At the latest from the 4th Dynasty onwards, the Egyptian king was perceived as descended from the sun-god, and texts of ensuing periods explicitly describe him in terms that reveal his relatedness with the god in both function and appearance. Light terminology was a particularly potent means by which these conceptions could be expressed and it was used both in the royal titulary and epithets as well as in manifold metaphorical expressions intended to paint a colorful mental image of the “radiant” and hence sun-like king. Use of such luminous visual language peaked in the later 18th Dynasty, which saw a number of intensifications and new creations in particular under Amenhotep IV - Akhenaten. The present paper outlines the use of light terminology in support of royal ideology in the 18th Dynasty, focusing on the changes brought about by Akhenaten’s new theology and kingship dogma.

Ogden Goelet, New York University
Insights into Ritual at the Abydos Temple of Ramesses II

The Abydos Temple of Ramesses II presents greater than usual interpretive challenges due to centuries of stone quarrying. Nevertheless, a close examination of its most important chapels on the portico facing the main festival court provide surprising insights about how these rooms interacted with other parts of the temple and how this temple interacted with religious establishments at Abydos and beyond. The most important Abydene institution at the time was the nearby memorial temple of his father, Seti I, that Ramesses had completed. Naturally enough, Ramesses wanted his monument to act as more than a well-appointed way station. Ramesses's temple has many links to the religious program of Seti's temple, going beyond participation in processional festivals. Considered together, both temples demonstrate the central role of multiple revitalization concepts, providing further evidence that the Opening of the Mouth ceremony and other afterlife texts were standard temple rituals and not necessarily associated with funerary religion, a situation surprisingly confirmed by parallels in the Hibis Temple. Chapels G and H in the Ramesses temple are particularly significant in these respects, both having connections with the concept of solar rejuvenation of the king and his statues. An inscription in the staircase off inner Court B reveals connections to these two portico chapels since an important means of revitalization was to expose statues to sun on the temple roof by means of the so-called Xnmt-jtn ritual.

Laurel Darcy Hackley, Brown University
The Great Green and the Great Sand Sea: Marine symbolism in the Egyptian desert.

This paper explores the possibility that the ancient Egyptian conception of the desert was analogous to the conception of the sea. Using archaeological, textual, and representational evidence, this idea is examined in order to nuance our understanding of the ancient Egyptian approach to and experience of desert environments.

A primary emphasis is placed on the relationship between desert and marine expeditions in ancient Egypt, which can be compared in their goals and social organization. Both the desert and the sea



are barriers, separating Egyptians from foreigners physically and culturally. Travel across both is difficult and requires specialist knowledge. This travel is rewarding, however, especially in terms of trade: both the desert and the sea were conduits for bringing valuable commodities into the Nile Valley. How did these commonalities affect lived experience of both environments, especially considering that many marine expeditions would have started with a trip across the desert, and many desert mining expeditions included a sailing voyage?

Additional attention is given to how these experiences shaped and were influenced by the cosmological associations of desert and sea. By examining ancient representations of and in the desert, religious texts that compare or conflate watery and desert environments, and considering the cults of deities that had dominion in both spheres, this paper explores evidence that the symbolically potent associations of water were sometimes applied to arid landscapes as well. This idea provides an alternate lens for viewing the ancient Egyptian attitude toward desert environments.



Brendan Hainline, University of Chicago
The Biographies of Weni and phonological variants of the Old Egyptian particle sk/sṯ

In 2012, excavations by the French Archaeological Mission at Saqqara uncovered several blocks bearing an inscription with remarkable parallels to the famous biography of Weni from Abydos. These parallels led Philippe Collombert to identify the owner of the Saqqara blocks, named Nefer-wen-Mery-Ra^c, with the aforementioned and well-known Weni.

Despite their strong parallels, the two versions of the same text show a slight but interesting difference: the subordinating particle is written sk in the Saqqara version but sṯ in the Abydos version. These two texts then can form the core of a case study to examine these particular phonological variants in Old Egyptian texts.

In this talk, I will open with a brief overview of the k > ṯ phonological change of Early Egyptian. Then I will discuss other attestations of the particle sk/sṯ to attempt to illuminate the linguistic context for this change in the texts of Weni. Finally,

I will suggest a possible explanation for this particular change, with the linguistic analysis informed by the historical and textual background of both texts - that of an official moving his tomb away from the capital zone. Likewise, this linguistic feature in the texts provides further depth to the personal history of Weni and his tombs. The investigation of this particular sound change illustrates some of the (not insurmountable) challenges of historical linguistic studies of Old Egyptian.

Aleksandra Hallmann, University of Chicago
Iconography of the God's Wives: The Association between Image and Idea

The office of God's Wife dates back to the 18th Dynasty, but gained special importance during the 23rd-26th Dynasties. During this time, these women began to exercise cultic prerogatives that once belonged to kings. Their position was politically crucial for the legitimacy of the king and territorial sovereignty of Egypt. This study examines the contextual settings of the God's Wives' representations in various media, including their chapels situated in two main temple complexes in Thebes – Karnak and Medinet Habu—allowing for a detailed examination of these women and their office. It traces the development of the office itself, as well as the specific iconography used by each woman, highlighting specific features that could reflect deliberate constructions of individual identity during a time of increasing cultural and ethnic complexity in Egypt. The current lecture will briefly report on the outcome of my 10 months stay in Egypt as an ARCE-NEH fellow, where I was able to conduct the extensive documentation work in Karnak, Medinet Habu and the Cairo Museum.

Tom Hardwick, Houston Museum of Natural Science; **Simon Connor**, Metropolitan Museum of Art
Rameside re-use and re-interpretation of statues: who, how, and why?

Nineteenth Dynasty rulers have long been known to have quarried earlier monuments to fulfil their ritual and architectural needs. This exploitation includes re-appropriation of statuary, sometimes with faces and bodies re-carved to reflect the changed physical canons of their new owners.

As well as kings, non-royals also appropriated and adapted statuary to suit their needs. This paper will present a group of ostensibly Nineteenth Dynasty non-kingly sculptures and demonstrate their earlier origins. We set out the ways in which they were physically changed to produce their new appearance, and discuss the differing reasons that may lie behind decisions to adapt existing statues rather than create new ones.

W. Benson Harer, California State University San Bernardino
Narcotic of the Nile: The Blue Lotus in Ancient Egyptian Religious Activities

The blue lotus, *Nymphaea caerulea*, figures prominently in Egyptian religion, art and architecture. While modern versions may bloom from dawn until mid-afternoon, authors a hundred years ago consistently describe it as closed by noon. The yellow ovum emerging in the blue field is the perfect metaphor for the Egyptian's description of rebirth daily like the sun. This suggests that funerary banquets depicted in New Kingdom tombs with participants holding full blooms were morning events. Furthermore, rather than just social drinking, it was the intent of the attendees to become inebriated as part of a religious experience.

Nymphaea contain four potent narcotic alkaloids. They are found in the blossom and rhizome (root equivalent), but not in stems and leaves. The alkaloids are soluble in alcohol, but not water. Wine and beer could be enhanced by addition of lotus blossom extract or simply soaking the blossoms in the alcoholic drink. The ancient Egyptians used only the blossom.

This talk will demonstrate that the ancient Egyptians understood the narcotic properties and utilized the lotus blossom to enhance wine and beer consumed in religious funerary settings and in Festivals of Drunkenness. The goal of the latter, which were held at night, was to eliminate all inhibitions and then indulge in gratuitous sex and ultimately pass out. The participant would hope to see the goddess Hathor/Sekhmet/Bastet in the process.

Elizabeth Hart, University of Vienna/ARCE
Intensive efforts for small stones: New research on Pharaonic mining expeditions at Wadi el-Sheikh

The statues, pyramids, and obelisks of ancient Egypt testify to the great stone working skill of Ancient Egyptians. But few realize the degree of effort that was spent on the production of much smaller and less renowned stone items: chert flaked stone tools. Such tools were used in many aspects of Ancient Egyptian life, including subsistence production, ritual practice, and status display. In the heart of Middle Egypt lies Wadi el-Sheikh, a vast and an almost untouched landscape of chert mining. New research by the University of Vienna is revealing the great efforts that Ancient Egyptians went to in obtaining chert and producing flaked-stone tools. Results to-date indicate that the archaeological remains spread over 120 sq kilometers, with a time depth extending from Middle Paleolithic to modern times. The most intensive use of the wadi was during the Pharaonic period. The number and scale of mining sites, types of mining strategies employed, organization of habitation remains, patterns in site layout, and details of the stone tool production technologies (prismatic blades, bifacial knives, and bifacial bangles), all constitute evidence that the Pharaonic mining expeditions were large-scale and organized. Fields of spoil heaps from underground mining have completely altered the landscape, and the surfaces are carpeted in lithic debitage, with stratified deposits reaching over 1m deep. The sheer scale of activities qualifies Wadi el-Sheikh among Ancient Egypt's great feats of stone working, and demonstrates that Pharaonic chert production was a far more intensive economic undertaking than has hitherto been understood.

Stephen P. Harvey, Ahmose and Tetisheri Project
"Neither Arrest Nor Movement: Workers' Songs and Conversations in the Tomb of Paheri at El Kab"

Since Egyptian hieroglyphs could first be read again in the modern era, it has been recognized that texts recorded on tomb walls include conversations, speeches, songs, and exclamations. The modern discovery of the tomb of Paheri at El Kab by the French expedition in 1799 was followed by the recognition by J.-F. Champollion as early as 1828 that a "Song of the Threshers" might be recognized amidst the other texts accompanying the agricultural scenes, an identification that was met at first with skepticism. A series of other songs, speeches and conversations are featured in the scenes illustrating the seasons of Planting and Harvest on the west wall of Paheri's burial chamber, and form

a revival in the earliest New Kingdom of an important aspect of Old and Middle Kingdom tomb decoration. With their relatively straightforward sequences of tilling, sowing, harvesting, and processing, agricultural scenes have often productively been used in analyses of sequence in Egyptian visual narrative, and the recognition that speech captions function together with these scenes has led comics scholars (e.g. Scott McCloud) and some Egyptologists (Babcock, Angenot) to claim that Egyptian visual narratives may be seen as some of the earliest precursors to modern comics. A fresh look at some of the scenes and texts in Paheri's tomb attempts to specifically address the aptness of the comparison between Egyptian visual strategies and comics, within the broader project of a re-examination of Egyptian narrative art at the dawn of the New Kingdom.

James Karl Hoffmeier, Trinity University

A Tent of Purification (ibw) Discovered at Tell el-Borg, North Sinai?

"The Possible Origins of the Tent of Purification" was the title of a paper I gave at ARCE in 1979; it was published in SAK (1981). It explored the role of the *ibw* – "the tent of purification" – in the funerary cult along with its possible mythic origin in the Pyramid Texts. The *ibw* appears to have been a reed mat that stood near tombs. The use of reeds was to emulate the "Field" or "Lake or Reeds" in the Pyramid Texts where the deceased king was purified.

Excavations in the eastern cemetery at Tell el-Borg laid bare a dozen mud brick tombs of varying size. In the midst of a cluster of tombs, the outline of a structure was discovered. This feature was marked by a series of narrow trenches 10-15 cm wide and 5-10 cm deep, forming a 6 x 7 m structure with a number of internal chambers. No superstructure survived. The excavators proposed the trenches were the foundations of a reed-walled building. Reed huts were uncovered in Field VI, thus making it likely that the 6 x 7 m structure was originally made of reeds.

This paper will examine the archaeological evidence for this structure relative to the surrounding tombs. It will be suggested that this unusual structure may have been a communal *ibw*, or some sort of funerary facility used in the preparation of the deceased for burial or some aspect of the funerary cult of this New Kingdom necropolis.

Kathryn Howley, University of Cambridge

The mysterious case of the baby's footprint: engaging with unique archaeological objects

Among the objects excavated at the Kushite royal cemetery of Nuri by Reisner in 1916 was a small lump of reddish fired clay that bears on one side the impression of an infant's foot (now MFA 16-11-46). The object has been carefully shaped, rounded and smoothed and the impression of the foot is clear, yielding an object that is pleasing to hold and, due to the obvious care in manufacture and the tiny size of the footprint, emotionally evocative.

Despite its appeal, the interpretation of this object presents significant challenges through traditional archaeological methodologies. Though found in the tomb of the Kushite King Anlamani, the excavator noted that the object had been washed into the tomb as a result of flooding. There is thus little in the way of archaeological context for the object, and as an object type it is moreover unique within the Nubian archaeological record. Children are furthermore poorly represented in Nubian archaeology, and otherwise unknown at the royal cemetery. The MFA's catalogue is able to classify the piece only as "function unknown".

This paper will instead engage with theories of the body and of touch drawn from art history and anthropology to extract meaning from an obscure but evocative object, and suggest that it held much of the same emotional power for its original owner as it does for a modern audience. More generally, it will offer ways of using art historical methodologies to engage productively with unique archaeological objects.

Leah Humphrey, University of Pennsylvania

A New Interpretation of the "Comparison Particle" js

The so-called "comparison particle" *js* appears in more than eighty Old Kingdom Pyramid Text spells. It can also be found in the Coffin Texts and Middle Kingdom copies of the Pyramid Texts, both of which retain elements of Old Egyptian. Many scholars have argued that this particle, when appearing after a noun or noun equivalent, is analogous to the preposition *mr/mj*. Some scholars have also compared *js* to the preposition *m*

used to express identity in sentences with an adverbial or verbal predicate. Therefore, *js* is often translated by “like” or “as” and cannot be distinguished from other comparative constructions.

The present study will argue against the comparison interpretation and will focus on the subordinating property of *js*. The construction “noun/noun equivalent + *js*” will be identified as a specific grammatical pattern, which produces a different meaning from clauses with *mr/mj* and *m*.

Salima Ikram, American University in Cairo
Down to Bedrock: The Final Clearance of KV10

This paper will present the results of the final excavation season of the Tomb of Amenmesse, KV10. The architecture, small finds, and ceramic corpus will be presented, together with new insights about how the tomb was carved, originally decorated, and then usurped.

Douglas Inglis, Texas A&M University; **Miroslav Barta**, Charles University
Implications of the Third Dynasty Boat-Burial from Abusir

In 2015, the Czech Institute of Egyptology discovered the remains of a boat-burial associated with a large Third Dynasty mastaba in Abusir South (Tomb AS54). The 17-meter long funerary barque is a social and technological missing link that ties Khufu’s royal ship to the Early Dynastic boat burials discovered at Abydos, Saqqara, Helwan and Abu Rawash. While at least 44 boat burials have been discovered from the Early Dynastic, the Abusir Boat is currently the only archaeologically documented boat from the Third Dynasty. The burial context has uniquely preserved both the shape of the hull and the details of intact internal lacing. The Abusir boat allows us to re-conceptualize how early Egyptian watercraft were built, and provides us an opportunity to reconsider evidence from prior discoveries. While its size and construction techniques demonstrate clear continuity with Early Dynastic boat-building traditions, its structural philosophy shares similarities to Khufu’s royal ship, bridging the immense technological gap between Early Dynastic and Fourth Dynasty watercraft. Given the technological features and the position of the boat in a non-royal environment, this artifact challenges several traditional opinions about Egyptian burial customs and

the modes of interaction between the royal and non-royal spheres of the period.

Sameh Iskander, New York University
The 2018 excavation season at the temple of Ramesses II in Abydos

There are indications that the temple of Ramesses II in Abydos was active until the Ptolemaic period and was later occupied by a Late-Antique settlement. This report will assess initial excavation findings obtained from the first court of the temple during this season. The presentation will discuss preliminary analysis of data, which will shed light on the activities within the temple from the time of Ramesses II to Late-Antique period.

The paper will also present the archeological field training program during this season co-sponsored by NYU-ISAW and the Ministry of Antiquity offered to Abydos inspectors in an area focused on the first court of the temple. The discussion will include briefly the structure of the field school, and its training courses, including surveying, excavation, illustration, conservation, ceramics, and osteology.

Janet Johnson, University of Chicago
A Sourcebook on Women in Ancient Egypt

I am compiling translations and short commentaries on texts involving non-royal women in ancient Egypt for a volume in SBL's WAW series. It will be aimed at students and non-Egyptologists. I have identified lots of texts to include, but I'd love to hear about people's favorites or more obscure texts I may have missed so I can be sure to include them, also.

Christine Leigh Johnston, Western Washington University
The Art of the Spiel: Provisioning, Legacy, and Propaganda in Ancient Egypt

Individual prosperity and wellbeing in the modern world are intrinsically dependent on the wealth and stability of both global and local economies. Accordingly, the state of the economy and its associated living conditions feature prominently in collective historical consciousness—be it the roaring 1920s or the Great Depression of the 1930s. The commemoration of prosperity

and the preservation of economic memory are not, however, exclusively modern phenomena. Propaganda and reports from ancient leaders often include bombastic statements alluding to their own economic acumen, as well as their essential role in securing sufficient—and often surplus—provisions for their subjects. Whether the result of the proper propitiation of the gods, subjugation of enemies, or shrewd economic management, kings of Egypt frequently assert their legitimacy and boast of their success in economic provisioning. The specific connection between economic prosperity and royal legacy in Ancient Egypt will be explored through detailed assessment of court records and chronographic inscriptions—particularly the Palermo Stone. As antecedents to the modern propensity to preserve economic conditions in historical memory, these documents may represent some of the earliest instances of economic historiography—records deliberately created to preserve economic conditions of the past. In proclaiming and commemorating successes in economic management—both real and exaggerated—Egyptian rulers thus ensured that their provisioned prosperity endured in perpetuity.

Michael Jones, American Research Center in Egypt
Changing Faces of Heritage Conservation in Egypt

ARCE's seventieth anniversary offers an opportunity to review a remarkable partnership sustained over the past 24 years. From 1994 to 2018, the United States Agency for International Development (USAID) has supported ARCE in a program of cultural heritage preservation, conservation and site management of which a remarkable component is the recovery, re-evaluation and publication of some of the foremost examples of Christian art and architecture in Egypt. These range in date from the Late Antique to the early modern period. They comprise the Red Sea monasteries of St. Anthony and St. Paul, paintings in the Coptic Museum in Cairo, the 'Red' Monastery at Sohag and a project to document, record and conserve portable icons in various locations throughout Egypt, conducted in collaboration with the Institute of Coptic Studies in Cairo. In addition, ARCE's Antiquities Endowment Fund financed work in the church of Abu Serga in Old Cairo, Deir el-Fakhuri near Esna and in the White Monastery at Sohag. The partnership has depended throughout on close collaboration with the Ministry of Antiquities, formerly the Supreme Council of Antiquities, and the Coptic

Orthodox Church. This paper is an appraisal of achievements and a reflection on changing agendas and uncomfortable dilemmas. These relate to practical arrangements, benefits and risks accompanying enhanced visibility, responsibilities of conservators, entitlement and agency, and a paradigm shift from a focus on old monuments to participation in heritage places.

Shelby Justl, University of Pennsylvania

A Real Gem: Evidence of Semi-Precious Stones in New Kingdom Royal Cities



The New Kingdom showed great advances in semi-precious stone workmanship, range of materials employed, and sheer quantity of semi-precious beads and amulets. The Pharaoh was responsible for dispatching mining expeditions to acquire semi-precious stones and distributing the raw materials to temple and palace workshops. The Pharaoh's strong administrative control over semi-precious stones may explain why an assortment of gemstones were found in New Kingdom royal cities like Tell el-Amarna and others, and the ceremonial royal palace of Merneptah and surrounding urban center in Mit Rahineh. For example, Penn's past excavations of the latter site revealed quartz, jasper, carnelian, and even lapis amulets and beads, some in various states of completion.

This paper will identify the semi-precious stones present in these New Kingdom royal cities, their proximity to probable mining sites, evidence of workshops and local crafting, and level of royal involvement in the administration of semi-precious stones within that particular city and its palace. This paper aims to ultimately answer important questions on Egyptian semi-precious stone administration. What happens to the raw materials after mining? And what can settlement archaeology reveal about this industry?

Nozomu Kawai, Kanazawa University

Exploring the New Kingdom Tombs at North Saqqara

Although North Saqqara has been known as a major cemetery dating to the Early Dynastic Period and the Old Kingdom and a major animal necropolis of the Late Period and Ptolemaic Period, the location of the New Kingdom tombs has not clearly been identified. For this reason, we began surveying New Kingdom archaeological remains at North Saqqara since 2016 by the

permission granted by the Ministry of Antiquities. So far, we have carried out three seasons to investigate the locations of the New Kingdom cemeteries at North Saqqara. Through the extensive survey collecting New Kingdom artifacts using GPS, we have identified some locations which might contain New Kingdom tombs. Notably, we identified an area of 100,000 m² containing New Kingdom cemetery to the north-west of the Teti Pyramid Cemetery. Then, we conducted 3D-mapping and geophysical prospection. In 2017, we focused on surveying the eastern escarpment of the North Saqqara plateau and subsequently made a sounding at the area to the north of the old Saqqara Inspectorate near the Teti Pyramid North cemetery. The sounding revealed more than 20 intact burials dating to the Ptolemaic Period and a number of the objects dating to the Eighteenth Dynasty. We also identified an artificial horizontal platform made of tafl in the lower level of the trench, which may have functioned as a pavement in ancient times.

This paper presents an overview of the result of the archaeological survey at North Saqqara undertaken from 2016 to 2017 and prospect for the future season.

Dimitri Laboury, Alexis Den Doncker, University of Liège, Belgium; **Hugues Tavier**, University of Liège, Belgium; **Gabriele Pieke**, Reiss-Engelhorn-Museen Mannheim
Recent research in the tomb of Sennefer (TT 96A)

The Belgian Archaeological Mission in the Theban Necropolis, a joint project of Brussels and Liège universities since 2010, investigates a sector in the southern part of the cemetery of Sheikh Abd el-Gurna, in a concession including three major tombs of the middle of the 18th dynasty: TT 29 and 96, respectively made for the vizier of Amenhotep II, Amenemope, and his cousin, the governor of Thebes, Sennefer, and the slightly earlier TT C3, in the name of the substitute of the chancellor Amenhotep, son-in-law of his superior, the chancellor Sennefer(i) (owner of TT 99), rediscovered by the mission.

The paper will present the recent research undertaken in the context of a project entitled “Painters and Painting in the Theban Necropolis during the 18th Dynasty” (initiated thanks to a Research Incentive Grant of the FNRS), in the unpublished tomb chapel of Sennefer (TT 96A), connected to his famous so-called

“vineyard tomb” (TT 96B). It will focus on the study of painterly practices attested in this exceptional tomb, the artistic strategies developed by Sennefer to negotiate and promote his identity for future generations, and the various elements that allow to reconstruct the “biography” of this commemorative monument.

Nikolaos Lazaridis, California State University Sacramento
“Hey, teachers! Leave them kids alone.” North Kharga rock graffiti’ deviations from standard writing conventions

Ancient travellers of the Darb Ain Amur, a westward offshoot of the famous Darb el-Arbain, connecting Kharga and Dakhla oases, were spending several days in the midst of the Western Desert’s hostile environment. While there, away from the scrutinous eyes of teachers, temple supervisors, and high administrators, some of the literate travelers, feeling little to no pressure to follow spelling norms and grammatical rules, chose to record their fleeting presence by carving textual rock graffiti that often deviated from the standard writing conventions. The study of such meaningful deviations provides us with a unique insight into the flexibility of ancient Egyptian language and its informal uses.

Mark Lehner, Ancient Egypt Research Associates
Looking for Khufu in Heit el-Ghurab

I report results of AERA’s excavations of the oldest phase of the 4th Dynasty settlement site, Heit el-Ghurab (“Wall of the Crow”), 400 meters south of the Great Sphinx. Most of what we have mapped of this so-called “Workers Town” dates to the reigns of Khafre and Menkaure, builders of the second and third Giza Pyramids. An older, different layout that lies below was dismantled when the royal house reorganized the site. We hypothesize the older layout was part of a much larger pyramid city and Nile port of Khufu. During field season 2018, AERA tested this hypothesis by excavating and analyzing broad exposures of the lower phase, and by re-examining “Kromer’s Dump,” a massive deposit of disarticulated settlement debris excavated by Karl Kromer in the early 1970s on the western slope of the Gebel el-Qibli (“Southern Mount”). Kromer found sealings of Khufu and Khafre, but none of Menkaure. Excavations in HeG have so far yielded sealings of Khafre and Menkaure, but none of Khufu. We hypothesize that “Kromer’s Dump” could derive from Khafre’s reorganization of the HeG.

Pierre Tallet's publication of Merer's Journal (Wadi el-Jarf Papyri A and B) in April 2017 opened a window onto daily use of Giza's 4th Dynasty waterways, which we reconstruct immediately north of the HeG. Our understanding from Tallet's recent communications is that Papyrus D, forthcoming in publication, names a settlement Ankh Khufu, with royal institutions. The HeG older phase may have been part of this larger Giza settlement of Khufu's time.

Adele Lewis, Arizona State University

"This opportunity once lost can never return," Patterns of Collecting and Placement

Some of the interesting and oft repeated stories of national rivalries in the early days of Egyptology concern the nearly fanatic quest for artefacts by the British and French. From the early days of the "Rediscovery of Egypt," the national and private European interest in taking pieces of ancient Egypt has been thoroughly documented. The conclusion of this avid collecting is less known. What apparently became typical of privately acquired collections is illustrated in the story of Dr. Henry Abbott. Neither a scholar nor a government official, he lived for 20 years in Egypt and during that time set about collecting a wide-ranging assortment of Egyptian antiquities. Though he is not presently well known, during the 19th century a frequent remark by European visitors to Egypt in their letters home was a reference of a visit to Dr. Abbott's "Egyptian Museum." From this beginning, to the acquisition of the collection by the New York Historical Society and its eventual home in the Brooklyn Museum, the popularity and eventual obscurity of this collector and the fate of his collection will be examined as an example of the patterns of collecting and placement in the 19th century vogue for Egyptian antiquities.

Jean Li, Ryerson University

Digital Archaeology and Interdisciplinary Collaboration at el-Hibeh 2017

The goal of archaeology is simple: to contribute to the knowledge of the past. The advancement of digital humanities has resulted in the burgeoning discipline of Digital Archaeology, which focuses on the use of computerized tools and systems to improve documentation, interpretation and publication of

material culture. Digital Archaeology is well suited towards interdisciplinary collaboration and reflections on contemporary issues such as the transformative power of technologies as it impacts cultural heritage preservation and knowledge production.

In 2016-2017, Ryerson University partnered with UC Berkeley in 2016-2017 to explore the uses and potential contributions of technology and digital media in the archaeology of el-Hibeh, Egypt. With the exploration of looted contexts and safety of archaeologists in mind, the Ryerson team developed tele-operated robots, one of which was deployed in the 2017 season. Another initiative was the creation of a virtual reality model of the small temple to Amen created by a Ryerson graduate student.

The use of robots, Virtual Reality and technology engage with issues of interdisciplinary collaboration, technological fetishization and sustainability. Does the application of technology constitute significantly new methods of knowledge production, new methodologies or just the creation of prettier images of the past? This talk will outline some of the activities and field results of the Ryerson-Berkeley collaboration and assess the potentials and limits of interdisciplinary collaboration and applications of “new and innovative” technology in archaeology.

Rita Lucarelli, University of California, Berkeley
The Book of the Dead “Vignettes” of the Greek Magical Papyri

In magical compositions of the Pharaonic period and in particular in the so-called Book of the Dead, the spells are very often accompanied by “vignettes”, namely depictions which function as magical complement of the texts, as a sort of visual summary of each spell’s topic and title or even represent a spell whose text is missing. These images, an expression of Bildzauber, enhanced the amuletic function of the magical papyri and the custom of adding visual elements to the texts continued in the magical books of the Greco and Roman Period and later. This paper will provide an overview of those magical images occurring in the PGM, which are of clear ancient Egyptian origin and show how the use of Bildzauber was still prominent within the socio-cultural context where these papyri were used.

Geirr Kristian Homme Lunden, Leiden University
Nasty Women: Depictions of foreign women as subjugated enemies in the late Eighteenth Dynasty

The image of foreign women as subjugated enemies, is only seen in the late Eighteenth Dynasty. The image is attested only six times, the earliest possible occasion being dated to the reign of Amenhotep III, and the latest to the reign of Tutankhamun. This new style of depicting foreign women brought with it a change to the artistic canon in depictions of women from the Levant. The dress and the shape of the body differs significantly from that of earlier depictions in Eighteenth Dynasty tombs. This might reflect the changing role of the queen, who is always shown as the subjugator of these foreign women. While the queen as a subjugator has been the object of earlier studies, no dedicated examination of the foreigners themselves has previously been undertaken. This paper is a study of these images as a result the changing dynamics of gender in the late Eighteenth Dynasty, and as a departure from the canon in order to express a new concept within ancient Egyptian thought - the female foreigner as a harmful agent of chaos.

Joseph Majer
The Eastern Desert Rock Art Survey Project 2017

The goal of the Eastern Desert Rock Art Survey Project is to locate and record rock art localities in the Southern Egyptian Eastern Desert, with an emphasis on predynastic petroglyphs. This is a survey project only; no excavation was undertaken and no pottery or lithics were collected. A hand-held GPS unit was used to record the location of Rock Art sites, and all were documented with conventional photographs. In addition, selected localities were recorded using a 360-degree camera to record video and still images for virtual reality display.

In 2017 work continued in the Wadi Barramiya with the objective of producing a complete catalog of rock art localities there. Sites described by previous researchers were revisited, and in some cases new petroglyphs recorded. In addition, approx. 27 new unpublished sites were located. Analysis is ongoing.

A preliminary reconnaissance was undertaken in the Wadis Midrik, Dunchash, and Bezeh in the Kom Ombo Basin. Twelve

new petroglyph localities were identified in the Wadi Midrik, twelve in the Wadi Dunaqash, and nine in Wadi Bezeh. In addition, three dynastic inscriptions, first described by Russell Rothe, were relocated.

Much of this rock art imagery has parallels in contemporary cultural expressions in the Nile Valley. For example, many of the animal species shown being hunted in the rock art were ritually buried in the high-status cemetery HK6 at Hierakonpolis. The search for parallels continues.

Peter Der Manuelian, Harvard University
Fabricating the Giza Dream Stela of Thutmose IV in both Physical and Augmented Reality

The famous Dream Stela of Thutmose IV is the subject of a small permanent installation at the Harvard Semitic Museum. The Lepsius Expedition originally created a mold of the stela, probably in 1842, that was later used for plaster casting by the Gipsformerei at the Ägyptisches Museum, Berlin. Using a home-grown technique for recreating new casts from the old casts, not in plaster but in resin, the Harvard Semitic Museum has teamed up with the KU Leuven to create two “new” versions of the stela, for research, teaching and display. The Harvard version used colored resins to recreate the pink granite of the original, and supplemented the installation with LIDAR data of the Sphinx area. This allowed us to create an Augmented Reality app that recontextualizes the stela between the front legs of the Sphinx at different periods in time. In the process, we learned about the current state of the inscription (particularly, the losses) compared to its condition as “frozen in time” by the original mold in the 1840s.

Heather Lee McCarthy, New York University
Ramesside Queens’ Tombs, the Book of the Dead, and the Deir el-Medina Iconographic Tradition

At the beginning of the 19th Dynasty, Ramesside royal women’s tombs, located in the Valley of the Queens, were dramatically enhanced in several ways, including the creation of new, innovative decorative programs tailored to the gender, status, and roles of the royal female tomb owners. The development of these programs also involved the creation of new Book of the

Dead vignettes and new arrangements of pre-existing vignettes. The Deir el-Medina artisans, who cut and decorated the royal tombs in western Thebes, were at the center of this creative activity, and they also developed a rich iconographic tradition of their own, which they applied to the decoration of their tombs and funerary papyri.

The purpose of this paper is to examine the crucial role played by Ramesside royal women's tombs in the development of Book of the Dead vignettes that were subsequently incorporated into the Deir el-Medina iconographic tradition. Though the link between the Ramesside queens' tombs and the Deir el-Medina iconographic tradition has been acknowledged, patterns of transmission from Ramesside queens' tombs to private tombs have not been thoroughly explored. To this end, I will focus upon a group of Book of the Dead spells that were employed in both Ramesside royal women's tombs in the Valley of the Queens and Ramesside private tombs at Deir el-Medina and discuss the objectives of my research, which involve systematically investigating the paths of transmission from queens' tombs to artisans' tombs.

Elizabeth Minor, Wellesley College

Piecing Together the Past: Reconstructing the Reisner Classic Kerma Collections in Boston and Khartoum

The artists of the Classic Kerma Kingdom (1700-1550 BCE) sculpted unique artwork to furnish the lavish royal graves. Fragments from the Reisner excavation (1913-1915) are now housed in collections in separate continents: the Museum of Fine Arts, Boston and the National Museum of Sudan, Khartoum. As related fragments of complex sculptures are separated between these institutions, they have not previously been reconstructed in any form. This paper presents digitally reunited fragments and reconstructs the creative corpus of Kerman art, such as sculptures of lions, hippopotami, scorpions, and boats. Using several types of 3D imaging (photogrammetry and laser scanning), models can be produced that adds this art to our understanding of religious and political developments in this formative Nubian culture. For example, Classic Kerman kings used suites of funerary furniture and sculptures as part of their programs of legitimization and demonstrations of high status.

Additionally, the results of this work can speak to the potentials and pitfalls of the use of digital reconstructions in archaeology. My recent study in collaboration with the Human Computer Interaction Lab found that students achieve the best learning outcomes with fully virtual interactions with objects, rather than fabricated replicas. Therefore the use of virtual digital models for the reconstruction of ancient Nubian artifacts holds much new potential to explore.

Mahmoud Amer Ahmed Mohamed, Ministry of Antiquities,
Egypt

Heritage Preservation Project for Seti I Temple at Abydos

Abydos: It is one of the oldest cities of Ancient Egypt, It is located about 11 kilometers (6.8 miles) west of the Nile, and the modern Egyptian towns of el'araba Madfuna and Al Balyna.

This project in Abydos is being implemented with the help of the U.S. Ambassadors Fund for Cultural Preservation

The project is divided into two parts:

1-Restoration for parts of the sety I temple

2-Raising awareness for the local community in the Abydos Area about the significance of Cultural heritage.

The temple is distinguished by its varied mural paintings.

However, these mural paintings were recently exposed to different sorts of degradation, which have negatively affected its condition and its material components.

The first part of the project includes conservation and restoration to one of the most important temples from Upper Egypt, Where the temple is suffering from some factors of deterioration, which vary in severity and the extent of its effect on the temple.

2nd part of the project is entitled:

Come with me to watch our glory...Abydos

a sustainable plan to benefit from Abydos cultural heritage

Heritage is our legacy from the past, what we enjoy today, and what we pass on to future generations. Egypt has a rich and diverse heritage resources and assets. However, this heritage cannot be conserved and marshaled for the benefit of Egyptians and humanity without an awareness of the spectrum of its values and meanings.

Teresa Moore, University of California Berkeley
Qenherkhopeshef's "Beautiful Stairway"

Theban Graffito 276, published by Spiegelberg in 1921, is one of the most distinctive productions of the Scribe of the Tomb Qenherkhopeshef, who, during his more than four decades in office, left well over two hundred signed inscriptions scattered over the valleys of the royal necropolis. Scratched on a rock face near the author's "reserved seat" above the tomb of Merenptah (KV 8), the text in question apparently commemorates the building of a "stairway" for the Western Goddess, using a noun generally associated with temples and palaces. The scribe also uses an extension of his title that occurs nowhere else among his known graffiti and employs the ir.n dedication formula—which, as Dorn has recently pointed out, appears in only two of his informal inscriptions. This paper investigates the terminology chosen by Qenherkhopeshef and examines the possible relationship of Graffito 276 to the scribe's activities as recorded in other documents.

Ellen Morris, Barnard College
Base Aspirations: An Exploration into the Purpose of Egypt's Military Headquarters in Canaan

Within the last decade or so information pertinent to the nature and purpose of Egypt's military bases in Canaan has skyrocketed due to the publication of older excavations (e.g., Beth Shean, Lachish), to the initiation of new excavations (e.g., Jaffa, Qubur el-Walaydah), and to the in-depth study of certain categories of material culture and organics (e.g., Egyptian style pottery, faunal remains, and botanical remains). This talk addresses the most important recent advances in our understanding of these nodes of imperial control in the context of a larger project. Namely, the paper argues that in the Nineteenth and Twentieth Dynasties Egypt's bases fulfilled eight of the mandates of modern military bases, as posited by Chalmers Johnson: (1) to project military power into areas of concern; (2) To eavesdrop on communication; (3) To ensure via policing that no part of the empire slips its leash; (4) To function as symbols of power; (5) To serve as tripwires that would allow the imperial power an excuse to attack should a base be harmed; (6) to control natural resources and industries; (7) To provide work and income for the military industrial complex; (8) To ensure that members of the

military and their families live comfortably while serving abroad. Evidence pertinent to each of these mandates is addressed as is the role that such bases played in exacerbating the tensions inherent in what Edward Said has termed the 'discrepant experiences' of empire.

Brian Muhs, University of Chicago
Papyri in Private Collections, Afterlife or Second Death? The Case of William Randolph Hearst

The market for illicit antiquities is a widely recognized as a threat to cultural heritage, because it encourages the looting of archaeological sites and thefts from museums. The market for 'legal' antiquities, however, is also a threat to cultural heritage, because it encourages their custodians to treat them as private investments and to try to maximize their revenues from them.

The story of William Randolph Hearst's collection of ancient Egyptian papyri provides an illuminating case study in the effects of the commoditization of cultural heritage. William Randolph Hearst (1863-1951) acquired a small but fine collection of Egyptian papyri, mostly purchased by his agents from sales of British collections in 1922 and 1924. Hearst then sold off the papyri and many other art objects and antiquities between 1939 and 1941, in an attempt to keep his overleveraged business empire solvent.

The histories of Hearst's papyri after their sale illustrate many of the dangers of private ownership of cultural heritage. Some papyri have ended up in public collections, but private hoarding and speculation have rendered others inaccessible to the public and to scholars. Knowledge of the histories of these papyri has been eroded, obscured and lost in the course of repeated transfers, and large papyri have even been dismembered to generate more and smaller papyri for a broader market.

Gregory Mumford, University of Alabama at Birmingham
Recent architectural findings in the Dynasty 12 Tomb of Intef at Lisht

The joint MoA and UAB/GlobalXplorer project at Lisht (co-directed by S. Parcak, M. Yousef, and A. Okasha) continued investigating the tomb of a Great Overseer of the Army, Intef in

the 2016-17 seasons. This project explored the rock-cut main hall, entryway, eastern mudbrick causeway and an affiliated structure (monumental façade?) fronting the terraced, bedrock plateau edge; we also investigated part of the mudbrick entry complex for a tomb to the immediate south of Intef's causeway. The debris layers and floor in Intef's hall and entryway revealed several phases in ancient to modern disturbance and looting, at least two separate periods in cutting rock-cut shafts for burial chambers in the hall and entryway, and numerous architectural fragments, artifacts, and human remains from the tomb and later periods of activity. The poor quality bedrock had necessitated the addition of stone wall slabs with inscriptions and scenes to embellish Intef's central offering chamber, a northern chamber (for a false door), and the bedrock face fronting these chambers, including an elaborate built-up entryway to the central chamber. The hall's southwest side contained traces of a tall niche, while a small, rock-cut niche lay above the floor in the hall's southeast corner. Some inset square pillar bases with incised guidelines indicated that the hall had originally held four pillars, while a rock-cut door pivot socket suggested a wooden door lay within a built-up stone door frame dividing the hall from the entryway. Part of the hall contained stone paving, while the entry had mudbrick paving.

Adela Oppenheim, Metropolitan Museum of Art
Sed-Festivals, Foreigners, Doors, and Columns: Renewed Excavations in the South Temple of Senwosret III, Dahshur

In fall 2017, The Metropolitan Museum of Art Egyptian Expedition at Dahshur renewed the excavation of Senwosret III's south temple, a large structure built later in the king's reign that seems to represent a new temple type. Earlier work revealed that the temple included unusual scenes depicting episodes of the sed-festival, and more fragments from this cycle were uncovered in 2017. Other newly discovered fragments originate from depictions of the domination of foreigners, including Asiatics paying homage to the king and perhaps a smiting scene. A door lintel of exceptional quality was found, decorated with the names of the king flanked by Nekhbet and Wadjet; during the destruction of the temple it was cut into smaller blocks. Other fragments show that offering scenes were included in the temple's decorative program. The significant find of several hundred fragments of papyrus-bundle columns indicates that the interior of the south temple contained large hypostyle halls and/or columned courts.

The new discoveries are essential for understanding the purpose of this enigmatic and badly ruined structure. Some fragments suggest iconography similar to that known from royal pyramid temples of the Old and Middle Kingdoms, while other scenes are more commonly found in different types of sacred structures, including the so-called sun temples. The recovered elements suggest that while the south temple had clear affinities with other sacred buildings, it must have had a different purpose, perhaps combining the functions of a variety of temple types.

Steven Ortiz, Tandy Institute for Archaeology
Gezer Subdued: Egyptian Conquests of Merneptah and Shoshenq I

The Tandy Excavations have just concluded 10 seasons of excavations. This project has excavated five major destructions from the LBIII to IA IIB (13th-8th century BCE). These destructions have been associated with military campaigns from outside (Egyptian, Aramean, and Assyrian). This paper will present an overview of two of the destructions attributed to Merneptah and Shoshenq I. The paper will discuss the nature of these destructions, the preservation of the archaeological record, and possible historical reconstructions.

Mary Ownby, University of Arizona
Imports and "In"ports: why ceramic petrography is important to Egyptology

The analysis of Egyptian pottery through thin section petrography is a significant tool to understanding a range of issues in Egyptian Archaeology. However, its use has remained undervalued, even though it has been available for many decades. On-site and laboratory petrography in Egypt have made its application much easier in recent years. This talk will discuss the results of such research that have shed light on Eastern Mediterranean trade over several millennia, the assimilation of non-Egyptian pottery trends in Egypt, and the specialized production of pottery beginning in the late Predynastic Period. Recent ceramic petrographic analysis has highlighted the movement of vessels throughout the Nile Valley from 3000 BC to the Medieval Period. Such information is significant to Egyptology for gaining a better understanding of technological choices, political stability, interregional connections, and the daily lives of Ancient Egyptians.

Sarah Parcak, The University of Alabama at Birmingham
Results from the 2016 and 2017 Lisht Seasons

The paper will discuss the results of the 2016 and 2017 excavation and survey seasons as part of the Joint Lisht Mission. In 2016, work continued at the tomb of Intef, with work in the causeway and entrance areas. The project discovered a mudbrick causeway leading from the tomb to the ancient edge of the floodplain. We also conducted a fieldschool, training 6 Egyptian inspectors. Goals of the 2017 season included: 1) An initial topographic map and survey of the Lisht site, 2) A comprehensive map of the looted tombs in southern Lisht, 3) Further excavation in the hallway and causeway of the tomb of Intef, 4) The exploration of several tomb shafts, 5) Continuation of the analysis of ceramics and bones. We will discuss the 800+ previously unknown tombs mapped during the survey of South Lisht, and the implications for our understanding of Middle Kingdom mortuary practices. We will also discuss the tomb of Intef, now fully excavated save several tomb shafts (contemporary and intrusive), our site conservation plans (including the reconstruction of its mudbrick causeway), the threat to Lisht from illegal quarrying, and future survey plans in North Lisht.

Diana Craig Patch & Janice Kamrin, The Metropolitan Museum of Art
The Gilded Coffin of the Priest of Heryshef, Nedjemankh

The Metropolitan Museum of Art has recently acquired a late Ptolemaic coffin of gilded cartonnage inscribed for a Priest of Heryshef of Nen-nisut named Nedjemankh. The coffin's excellent condition allows us to study and appreciate its complex and sophisticated decoration, carried out using the technique of gesso pastiglia. Adding to the importance of this artifact is the unique treatment of the lid -- fully gilded on the outside and partially enhanced with silver foil on the inside, which materializes the hymn to gold and "fine gold" (electrum/silver) inscribed above the foot. This paper will present our current understanding of the history of the coffin, and discuss its iconography and place in the development of coffins during the Ptolemaic era.

Katie A Paul, Antiquities Coalition
Digging Data Toward Solutions: Identifying Patterns and Cyclical Activity in Cultural Property Crimes in Egypt

Cultural property crimes have become one of the greatest threats to heritage in Egypt following the Arab Spring. From illegal excavation, to theft and trafficking, Egypt's heritage continues to be under a burgeoning threat. As authorities and experts work to combat these crimes they are often outnumbered by the sheer scale of looting taking place. Developing a comprehensive understanding of cycles and patterns of these crimes provides insights in to potentially predictable activity, which can aid authorities in nations facing a rise in trafficking crimes with a means of combating threats to cultural heritage.

This project is the culmination of a six-year case study identifying patterns of cultural property crimes in Egypt. This study examines Egypt from the beginning of the Arab Spring in 2011 through August 2017, using publicly sourced information to build a model of trafficking crimes and cyclical patterns that can be used as a roadmap to combating criminal activity that threatens cultural heritage on a national and regional scale. Publicly available reports and other open source information are key data sources as they are often accessible during periods of crisis -- and available for free, ensuring future scholars are not limited by finances to replicating this methodology. The study quantifies and identifies clear patterns of heritage crimes and predictable cycles of activity that can provide Egyptian authorities with information that can help them allocate their resources for antiquities crimes in the most efficient manner, ensuring the greatest possible impact on thwarting looting and protecting Egypt's heritage.

Nicholas Picardo, Harvard University

What Happens Between the Maps and the Models: Developing Referencing Standards for 3D Archaeological Visualizations

As technology expands options for documentation and communication of archaeological information to both academic and popular audiences, it is essential to preserve fundamental standards of intellectual transparency and citation. Whether intended as visualizations of selected data or as detailed visions of ancient milieus, 3D digital models – along with other media that incorporate them – often include significant components of reconstruction. Once released, however, these products become disassociated from the sources (e.g., primary documents, empirical data, excavated objects) and thought processes (e.g.,

design choices, applied theories, extrapolation from parallels, educated speculation, artistic license) that informed their creation. As born-digital works, often they lack the full spectrum of referencing standard to other formats. In practice, a thorough, step-by-step summary of every stage of model (re)construction is too cumbersome for creators and consumers alike, even if ideal in concept. Consequently, referencing practices have been slow to move beyond basic annotation/captioning, traditional bibliographies, and “movie credit” acknowledgements. Within a broader mission to comprehensively integrate archival data for the site of Giza, the Giza Project at Harvard University has applied over a century’s-worth of archival resources to produce 3D models of the Giza Plateau and its major monuments. The Project’s models and media will be used to introduce referencing protocols and documentation (developed as part of efforts funded by an NEH-HCRR Grant) that promote necessary, reasonable, and accessible standards of transparency and citation for 3D archaeological visualizations.

Luigi Prada, University of Oxford & University of Copenhagen
The Oxford Expedition to Elkab: Recording Late and Graeco-Roman Period Inscriptions through Photogrammetry

Since 2016, the Oxford Expedition to Elkab (formerly British Museum) has extended its work of epigraphic recording and publication to the Late and Graeco-Roman Period monuments and inscriptions in the necropolis and the adjacent Wadi Hillal. Under field-director Vivian Davies and through the support of Oxford’s Ashmolean Museum and Griffith Institute, earlier research on modern photographic documentation and nineteenth-century archival material has been taken to the field. Recording of the inscribed material, which mainly consists of unpublished graffiti and secondary inscriptions, is proceeding hand-in-hand with the re-documentation of the entirety of the monuments and architectural structures that host them (New Kingdom and later tomb chapels, the Ramesside/Ptolemaic hemispeos, and the temple of Amenhotep III), through digital techniques based on photogrammetry. This is in order to enable the study and presentation of both textual and architectural material in context, with a holistic approach that is intended to reflect the original situation on site. Samples of the epigraphic material collected so far (both textual and figural in nature) and the techniques employed in its recording will be discussed in the course of this lecture.

Tara Prakash, Johns Hopkins University
Everybody Hurts: Conceptions of Pain in Ancient Egypt

Throughout history, philosophers, scientists, and historians have struggled to interpret what pain is and how humans experience it. Some have understood pain to be a sensation rather than an emotion. Others have differentiated between physical pain and emotional pain. At the same time, scholars have recognized that a human being's experience of pain is shaped by multiple factors, and studies have shown that these factors also include one's culture.

This paper will begin to consider the ancient Egyptians' understanding of pain and examine the significance that pain might have had in Egyptian society and culture. Did the Egyptians differentiate between physical pain and emotional pain? How did they express pain? Could pain have different meanings for them, and if so, did these evolve throughout Egyptian history or vary according to status and gender? Part of a broader study on the depiction of pain in ancient Egypt, I will focus here on evidence from Old and Middle Kingdom reliefs and texts. Using select examples from this material, including scenes of mourning, battle, and triumph, this paper aims to critically and contextually examine the Egyptian data while also engaging methods and theories from fields outside of Egyptology in order to put forward possible answers to these questions.

Hassan Mohamed Ramadan, Egyptian Ministry of
Antiquities
The Tomb of Hetepet at Giza

This paper presents information gathered from the recent excavation of the tomb of Hetepet, located on the western edge of the Western Cemetery on the Giza Plateau. During the seven-month excavation, debris consisting of modern fill, fine sand and fragments of limestone and mud brick was removed by surface cleaning. After delineating the upper edges of the site along its four directions, and documenting and photographing the findings for further study, the excavation revealed an L-shaped chapel for a female official named Hetepet.

The interior tomb walls were constructed of sun dried mud brick with interior flooring of limestone paving stones; the exterior wall

surfaces were covered with limestone wall slabs and the interior mud brick walls (with a thickness equaling one brick width and length) and plastered to facilitate decorative and inscriptional components. The tomb was oriented on a north-south axis.

Inscriptions in the tomb reveal a significant and independent woman and her family members: sons, daughters, and an unidentified male figure sitting beside her. The wall scenes represent Hetepet catching fish and birds, butchering, with boat makers and on a pleasure cruise with most of the Old Kingdom desecration texts. Two unique scenes have been identified: a monkey gathering fruit from a tree carrying its child behind its shoulder, and a monkey dancing in front of musicians. These scenes are the only such example from the Old Kingdom. Some stone reliefs for a woman named Hetepet are located in Berlin, but they are not from the same tomb.

Laura Ranieri, *Ancient Egypt Alive*

Your Pharaoh's Moustache: A Brief Discussion of the Moustache in Old Kingdom Art

The ubiquitous appearance of small moustaches on some of the tomb reliefs and statuary of the Old Kingdom have long been noticed, but seldom a subject of scholarly study. Although clearly visible on representations of individuals of different classes, from kings to workers, this element of facial hair style - the moustache has not received any in-depth analysis or publication to date.

Why do we find the moustache exclusively in the art of the Old Kingdom, mainly from 3rd through 6th dynasties? Can the moustache and its different styles be categorized -- and what does its appearance and evolution tell us about the kings, nobles, workers and art styles during this era of Egyptian history? This brief discussion seeks to show how the presence of moustaches of the style we see in the Old Kingdom is unique to this period, and can serve as an important window into the artistic styles, socio-economic climate, personal care practices, beliefs, technologies, and virile character of the era.

This 20-minute presentation will be based on recent research conducted for a University of Toronto graduate paper submitted to Dr. Grzymski in April 2016. Citing the statuary itself and referencing scholarly works by Reisner, Tassie, Russman and

others, this paper takes a closer look at the moustache, where it appears, how its style changes, its usage by different classes of individuals, and what its appearance might say about the art, life and beliefs of Old Kingdom Egypt.

Barbara A. Richter, University of California, Berkeley
Gods, Priests, and Bald Men: A New Look at Book of the Dead 103

Spell 103, “Being beside Hathor,” one of the shortest in the Book of the Dead, is not well studied; scholars differ in their translations. My paper addresses this interpretative issue, with special attention to its Theban recension, a time of experimentation and creativity.

Using the Bonn Totenbuch database, I made a synoptic study from the New Kingdom through Ptolemaic era, which highlighted textual transmission and revealed paleographic anomalies. I found that the ambiguity stems from homonyms, alternate writings, and unusual determinatives—a scribal technique creating multiple layers of meaning. My analysis also considered the vignettes, titles and gender of the owner, frequency of use, and roles of priests and gods alluded in the text.

In this paper, I will show how allusions to three categories of priests help the deceased: wab-priests (“pure ones”), who carry the divine barque in procession, facilitate contact with Hathor; iAs-priests (“bald ones”), who relay the words of the goddess, recall intermediary statues of “bald ones of Hathor,” popular at this time; iHy-priests (sistrum-players—wearing ostrich feathers in the determinatives) pacify Hathor’s dangerous side with music and dance, thus restoring Ma’at. Hathor’s son Ihy (homonym of iHy-priest) adds protection and rejuvenation. I will also demonstrate how the spell’s popularity parallels Hathor and Ihy’s changing importance in royal ideology.

A close reading and analysis of the writing in this deceptively simple spell show how allusions to divine contact, communication, pacification, and restoration of Ma’at create a magically powerful statement to aid the deceased in “being beside Hathor.”

Joshua Aaron Roberson, University of Memphis
*Tête-à-tête : Some observations and counter-arguments
 regarding a contentious phonological value*

In 2004, D. Werning presented an argument against the phonological value *tp*, assigned traditionally to Gardiner signs D1 [head in profile] and T8 [archaic dagger], in favor of the value *dp*. In 2011, S. Schweitzer critiqued several aspects of this argument. In 2014, the value *dp* was added to the third edition of J. Allen's Middle Egyptian teaching grammar, potentially normalizing the contentious reading. The *dp* hypothesis rests upon two main premises: 1.) Phonetic spellings or ideographic spellings with full phonetic complementation, which might indicate unambiguously an initial consonant /t/ in the Egyptian word for "head" (et al.), do not occur prior to the Late Period. 2.) The consonants /t/ and /d/ do not interchange prior to the Late Period and that apparent interchanges, when they occur, might represent only a neutralization of graphemes (e.g. Hieratic confusion) but not necessarily the underlying sound values they encode. Werning marshals numerous pieces of evidence in support of these premises, for example, New Kingdom cryptographic texts that appear to encode the sequence /d-p/, one occurrence of the verb (w)d(j) in the Pyramid Texts, re-analyzed as a phonetic complement /d/ preceding the D1 ideogram, et al. This paper will examine the premises, supporting evidence, and logic employed in arguments for and against the sound value *dp*. In addition, it will introduce new evidence, ranging in date from the Middle Kingdom through the New Kingdom, which provides additional support for the traditional reading of the D1 and T8 ideograms as *tp*.

Catharine Hershey Roehrig, Diana Craig Patch, & Janice Kamrin, The Metropolitan Museum of Art
Report on the 2018 Season of the Joint Expedition to Malqata

This paper will present an update of the work to be carried out in February 2018 by the Joint Expedition to Malqata which is sponsored this year by The Metropolitan Museum of Art and by a grant from the Antiquities Endowment Fund. In the coming season, we plan to proceed with the conservation work at the King's Palace which will include adding signs to the site. We will also continue work at the nearby Industrial Site, located west of the Audience Pavilion, where debris from the glass/faience

industry has been found, and at the West Settlement, where we have been clearing the foundations of previously unexcavated structures for the past three seasons.

Irene Bald Romano, University of Arizona; **William John Tait**, University College, London; **Christina Bisulca**, Detroit Institute of Arts; **Pearce Paul Creasman**, **Gregory Hodgins**, & **Tomasz Wazny**, University of Arizona

A Multidisciplinary Approach to Interpreting a Senet Board in the Arizona State Museum

In this paper we present a fragment of a rare, wooden slab-style Egyptian senet board that was given to the Arizona State Museum, University of Arizona in 1922 by Lily S. Place, an American who lived in Cairo in the 1910s and 1920s and who purchased ancient objects from dealers and in the bazaars; it has no ancient provenience. Using a multi-disciplinary approach to glean as much information as possible from the fragment, the authors show how this object fits within a museum whose mission is largely focused on the cultures of the American Southwest; provide a reading and interpretation of the incised hieroglyphs; establish a radiocarbon date for the game board against which similar senet boards can be compared; identify the wood and demonstrate that the board was fashioned from a newly-felled tree; and identify the inlay substance. The combined philological, archaeological, scientific, and museological methodology allows conclusions that place this previously unknown fragmentary board in a position of importance within the corpus of senet boards.

Lisa Saladino Haney, University of Pennsylvania
Visualizing Coregency: The Early and Later Styles of Senwosret III

A close examination of the statuary of Senwosret III reveals two main stylistic groups: the Early Style and the Later Style. This division derives from an archaeological, functional, and formal evaluation of each object. Statues in the Early Style are attributable to the first half of the king's reign and continue the style of Senwosret II. These images have a wide, squat face with a relatively youthful, serene expression, a smooth forehead, and a thick torso.



Statues of the Later Style have exaggerated features and a longer face shape. Their bodies are slimmer, with a muscular torso and pronounced ribs, a style that continues under Amenemhet III. This style is more complex and includes a number of series that represent the king at a range of ages, including youthful, intermediary, and aged examples. In the most accentuated versions, the face appears long, gaunt, and weighed down, with exaggerated bags under the eyes, deep nasolabial folds, and a highly emphasized musculature around the mouth.

The visible contrast between these styles suggests two distinct phases of production. The early phase was more limited in terms of dissemination and variety; it presented the king in the style of his father and conveyed a message of dynastic continuity. The later phase, was considerably larger in scope and contained a wider array of types and sizes. This paper discusses the various explanations for this shift in royal self-representation, including the possible existence of a coregency between Senwosret III and Amenemhet III.

Patrick Salland, Independent Scholar

Everything in its Proper Place: New Kingdom Royal Domestic Objects and Palatial Visual Programs

Furniture and other domestic objects intended for use in the royal palaces of the New Kingdom are rare, and often heralded as some of the masterpieces of ancient Egyptian artistry. Royal furniture, jars, boxes and items of personal adornment regularly bear vivid figural and ornamental images. Yet for a culture that conferred such high value on the transformative and symbolic nature of words and images, can we classify the imagery found on these objects as simple decoration? I will begin by examining the relationship between the varied visual motifs found on these royal objects and the imagery painted and inlaid onto the architecture of the palaces. In fact, this paper argues that the two worked in tandem and should be considered as part of a unified whole. This study will focus on the four major palatial thematic groups: heraldic images, scenes of subjugation, naturalistic motifs, and representations of deities. It will demonstrate that not only do royal objects of daily life fall within these same thematic categories, but that they share much of the same imagery. Using this classification, I will suggest potential placement of these objects within the palace, and propose new

interpretations for their practical usage. This paper will conclude with an examination of the relationship between these items and royal ideology to understand how they functioned symbolically within the ritually charged palace.

Bonnie M. Sampsell, Wayne County Historical Museum
Recovering the History of an unusual Yellow Coffin

The objectives of this study were to thoroughly document the construction and painted design of this anthropoid wooden coffin according to an international standard and to attempt to reconstruct its history – both ancient and modern. The design on the upper half of the lid conforms to Niwinski's Dynasty 21, Type V, with a broad floral collar and mummy braces. This design, along with the remarks of the Cairo antiquities dealer in 1929, suggest a Theban origin. The lower half of the lid has a Dynasty 21 color scheme, but its layout is atypical, and it exhibits features that are characteristic of coffins in Dynasty 22 (such as a single central inscription and no hands). The question of whether this layout represents artistic innovation or imitation will be considered. The design on the case is also unusual for this period: it lacks vignettes and consists simply of 94 columns of short offering texts and funerary symbols. Similarities between the contents of these columns and motifs on other Yellow Coffin cases will be presented. The coffin shows signs of ancient repair that may indicate re-use. Carbon-dating of several boards of the lid and case did not provide evidence for distinguishing older and newer elements. All boards had ages consistent with that already deduced from the painted designs, namely early Dynasty 22. This unusual coffin may offer insights into a period in which Theban funerary equipment was undergoing a stylistic shift.

Gonzalo Moreno Sanchez, University of Arizona
Injuries in Egypt's Battle with The Sea Peoples - Medical and Strategic Considerations

Analysis of the injuries depicted on the Battle Reliefs of Ramses III with the coalition of Sea Peoples at the Temple of Medinet Habu produces data that conforms with the Pharaoh's overall strategy and Egypt's military capabilities. Focusing on injury data this study should bypass concerns about Medinet Habu Records' reliability.

Sea Peoples' casualties in The Land Battle resulted from a pincer maneuver executed by Egyptian heavy infantry and auxiliary forces attacking from the rear, while Ramses III with Egyptian heavy and light infantry and supporting chariotry attacked them head on. This action mostly produced close-combat type of injuries, comparable in their anatomical location, morbidity and mortality with those represented also in various "Camp" tableaux of Ramesses II's Battle of Kadesh.

The Sea Peoples' Naval Battle injuries were also the result of an entrapment movement by the Egyptian Navy and Marines aboard ships, with the Pharaoh and light and heavy Egyptian infantry forces on shore. Predictably, most injuries were produced here by arrows and are comparable in their anatomical location, morbidity and mortality with those also observed in Sety I's battle against the Hittites, and in similar major battles fought primarily with arrows, both in antiquity and in modern times.

These combined military actions of the Land and the Naval Battles likely occurred in close geographical proximity and fall within the categories of "Combined Arms" and "Sequential Operations" both of which are considered capabilities of Modern Operational Warfare.

Emilie Sarrazin, University of Chicago

The Women of Tell Edfu: An Archaeological Discussion on an Assemblage of Female Figurines

Between 1937 and 1939, more than 90 female figurines, dated to between the Middle and New Kingdoms, were excavated by the Franco-Polish mission at the necropolis of Tell Edfu. These clay figurines have been key references for early works on similar statuettes, particularly at a typological level. Some seventy years later, between 2007 and 2011, the archaeological team from the Oriental Institute of the University of Chicago excavated around 70 additional female figurines, but this time from the administrative area of the town. Published assemblages of female figurines found in good contexts by modern excavations, particularly from ancient settlement sites, are still quite rare. Using this new data set, this paper aims to contribute to the effort made by recent scholars to focus more on the provenience of such figurines, in order to strengthen our knowledge of both their chronology and contexts of disposal. The funerary and

settlement data will be combined to discuss the distribution and particularities of the Edfu assemblage, which presents clear concentrations with regards to style and location. This data will be compared and contrasted with other relevant assemblages from Egypt and Nubia, and special attention will be paid to the schematic plaque figurines, a category which has, until recently, been understudied.

Thomas Schneider, University of British Columbia
Hitler, Goebbels and the Frogs on the Nile: A 1931 Political Photomontage

Since the Napoleonic expedition, ancient Egyptian sceneries and artifacts have played an important role in political caricatures relating to events of Egypt's own modern history. By contrast, the satirical use of ancient Egypt with regard to non-Egyptian politics seems rather limited. The subject of this presentation is a little known political photomontage from the end of the Weimar Republic, featured on the back cover of the May 1931 issue of the radical left satirical magazine. It presents a striking artistic representation of Joseph Goebbels as an ancient Egyptian dignitary and the Great Sphinx of Giza with the physiognomy of Hitler, in a Nilotic landscape. Behind Goebbels, there is a line-up of 10 frogs, accompanied by the caption *Beschwörung der heiligen Knallfrösche am Nil durch den Nazi-Oberpriester Joseph Goebbels – beim nächsten Reklame-Attentat mit besserem Erfolg zu verpuffen* ("conjunction of the holy Knallfrösche ("bang frogs"; German for 'firecrackers') on the Nile by Nazi high priest Joseph Goebbels – to be fired off with more success at the next publicity assault". The paper will provide a historical contextualization of this unusual political caricature.

John Shearman, American Research Center in Egypt
ARCE Luxor Updates: APS Cultural Heritage Tourism Project–Year 3

The ARCE Luxor office undertaking of the APS Cultural Heritage Tourism Project, which started in January 2015, consists of job creation and site improvements at Dra Abu el Naga and Qurnet Muari and continuing the clearance work around Theban Tomb 110. The grant also includes conservation training on Theban Tomb 159 and 286 in Dra Abu el Naga and the Khonsu Temple side chapels in Karnak that began in October 2015.

The presentation will review and update the final phase of the project that will be completed in June 2018. The grant is financed by USAID and supported by the Egyptian Ministry of Antiquities. Highlights include the preparation of the Dra Abu El Naga site for the opening of the tombs TT 159 and TT 286 to visitors and the conservation field school in Khonsu Temple.

JJ Shirley, Journal of Egyptian History/University of Pennsylvania
21st Century Epigraphy: The TT110 Field School Experience

In Fall 2017, the TT110 ERFS returned to Luxor and brought together all the students from the first two field schools to finish their training. At this time, the students were taught both how to plan their own epigraphic program and also how to digitize drawings for publication, thus bookending the epigraphic drawing skills they had previously learned. Mr. Hassan Ramadan joined the team as the Digital Epigraphy instructor, ensuring that the students gained a command of digital epigraphy both as a publication tool and for the purposes of creating an original drawing from a photograph. In winter 2018, the field school returned to train a new group of students in epigraphy, archaeological illustration, and research methodology. This talk will present both the results of the digital training done in 2017, and discuss the realities of undertaking epigraphy generally, and digital epigraphy in particular, for our Egyptian colleagues.

Lamia M. Shuaib, Egyptian Ministry of Antiquities
Use of Nondestructive Examinations and Analyses in Treatments of Ivory Antiquities Cleaning: Study Applied to a Selected Model

This paper presents the results of a project to identify and clean dirt and stains on a large raw elephant tusk (No. 706) stored in Al-Manyal Palace Museum in Cairo, belonging to the era of the Mohamed Ali dynasty.

The aim of the project was to identify the dirt on tusk No.706 using nondestructive analyses and inspections to determine its cleaning treatments. Six powder samples of dirt were taken and, along with the following nondestructive examinations and analyses, were performed to identify the dirt samples: preliminary visual inspection, photographic illustration using a

digital camera, portable digital light microscope inspection with magnification power 10x, analysis of the dirt components using X-ray diffraction and an analysis of dirt components using the infrared rays FTIR.

The results concluded that the nature of the dirt on tusk No.706 were either single dust stains or mixed with salt deposits or colored dirt mixed with dust, dirt, sand, gypsum, lime mud and paraloid B72 stains mixed with other dirt. The paraloid had been applied during a previous, undocumented intervention. It was found that the code on the tusk was written in a dark color that consisted of hematite mixed with animal glue as the color medium applied on a layer of paraloid B72. Results showed that the tusk was frequently exposed to the identified pollutants. The analyses were used to direct the mechanical cleaning of the tusk with minimal intervention by local dry cleaning under magnification when necessary and the full documentation of the process. In conclusion, it was found that preventive conservation by means of correct storage is the best method for keeping ivory antiquities.

David P. Silverman, University of Pennsylvania
A Fragment of a Coffin of Harsiese, High Priest of Montu of Thebes

This study focuses on a section from the side of a painted coffin in the collection of the Penn Museum. Now conserved and restored, this roughly rectangular wooden panel still retains much of its original plaster coating and paint. Its texts and image show almost no areas of loss, and the inscription reveals that the owner's name was Harsiese, a mortuary priest of the god, Monthu, Lord of Thebes. A review of the archives provided only the information that the Museum received the item in May 1914, as a gift from a patron who collected similar material. Given the name and titles of the owner and the other information that the text and decoration provided, the panel likely came from a Theban coffin, probably from the area of Deir el Bahri, and that it dates to the time period from the end of Dynasty 25 into Dynasty 26. In the course of studying this artifact and searching for parallels, I came across what appears to be additional section of this same coffin in another collection. My further investigation of this material and comparisons to other coffins and funerary items from the same time period and provenance have now led to new

information about this individual named Harsiese, which family group he belonged to, and the coffins and other funerary items in his tomb group.

Stuart Tyson Smith, University of California, Santa Barbara
Recent Fieldwork at Tombos: New Kingdom imperialism in Nubia, cultural entanglements, and a new fortress.

Excavation at Tombos in Sudanese Nubia by a joint UCSB-Purdue University expedition has revealed evidence for the foundation of a New Kingdom colony around 1450 BC. Recent fieldwork in the cemetery has further refined our picture of the organization of the Egyptian New Kingdom empire and cultural entanglements between Egyptian colonists and Nubians that reflect the give and take of lived experience on the frontier. The lack of a fortification and temple have always been puzzling, since all of the other major New Kingdom colonies in Upper Nubia were supplied with these features. Starting in 2013, we uncovered evidence for structures beneath the modern village and from 2015-17 documented a defensive system consisting of a dry moat lined with mud brick walls enclosing an area of at least four hectares, making it the largest fortification in Nubia. Pottery indicates that it was in use from the founding of the colony through the reign of Amenhotep III. Reuse of sections of the ditch in the Ramesside Period and into the Third Intermediate Period indicates that the settlement continued to thrive after the fortifications were abandoned and filled with domestic refuse, sand and debris. The size of the fortification system and importance of officials buried in the cemetery point towards Tombos as the most likely location for the *menenu* (fortress) *Taroy*, mentioned by Amenhotep III's Viceroy Merymose.

Marissa Ashley Stevens, University of California, Los Angeles
Temple Rank and 21st Dynasty Funerary Papyri: Documenting Status in Theban Society

Decentralization characterized the 21st Dynasty, resulting from political division between the Tanite kings and the Theban High Priesthood of Amun. For the Theban priesthood, this decentralization created complications with regards to social identity, as stressing a relationship to the king was no longer a means to power. The temple was an obvious choice for this theocratic regime to physically and socially connect, resulting

in the maintenance of status and identity via the priesthood. The political and economic changes of the 21st Dynasty also resulted in funerary papyri becoming more common in burials, as reliance on extended burial caches and the distillation of the funerary assemblage warranted more compact methods of including religious and ritual content in the burial. With this limitation of space reduced to mainly the coffin set and one or two funerary papyri, choices were made regarding the content of the funerary iconography. By studying the corpus of 21st Dynasty funerary papyri and the specific choices made for their content – particularly regarding these choices as they reflect positions within the priesthood – one can better understand how the individual socially defined himself or herself during this time of decentralization. In addition, this established social status passed through the generations, illustrating the inheritance of these temple positions and the importance of hereditary positions in this religiously entrenched society.

Silvia Stubnova, Brown University

A decade of excavations at Tell el-Retaba: documenting life in a Wadi Tumilat settlement

Tell el-Retaba lies in the eastern Delta between the modern cities of Zagazig (ancient Bubastis) and Ismailia. Connected by some with the Biblical city of Pithom, the site was studied already in the 19th century by such early excavators as E. Naville and F. Petrie. However, systematic excavations at Tell el-Retaba did not start until 2007, when the site fell into the concession of Polish-Slovak archaeologists. This paper will present the most important findings from the decade of Polish-Slovak excavations at Tell el-Retaba, focusing on the 2017 season, which the author was part of. The current research investigates the Second Intermediate Period-early Dynasty 18 cemetery and settlement as well as the fortress and settlement of Ramesside kings.

In the ancient times, Tell el-Retaba was situated in Wadi Tumilat, an important water canal linking the Nile Delta with the Red Sea and the Sinai peninsula. The earliest archaeological evidence from the site dates to the Second Intermediate Period, although the site might have been occupied already in the Middle Kingdom, perhaps comprising part of the ancient fortification system called the Ruler's Walls. Due to its strategic geographical position and its potential for the elucidation of the Hyksos Period,

the problematic transition into the New Kingdom, as well as the activities of New Kingdom kings, Tell el-Retaba undoubtedly constitutes one of the most significant sites for research in the Nile Delta.

Isabel Stünkel, The Metropolitan Museum of Art
The north chapel of Senwosret III's mother at Dahshur

The subsidiary pyramids in the pyramid complex of Senwosret III at Dahshur featured small chapels for the mortuary cult of their owners. One such chapel belonged to Khenemetneferhedjet Weret I, the mother of Senwosret III. Excavation work undertaken by the Metropolitan Museum uncovered about 1,200 relief fragments from the wall decoration, making this the best-preserved chapel of a royal women from a Middle Kingdom pyramid complex. A recently concluded study of this material has resulted in a reconstruction of the chapel's decoration, which included offering table scenes, animal slaughtering, inventory lists, and a building dedication inscription. The talk will give an overview of the reconstruction and discuss details of the decoration.

Deborah Jane Sweeney, Tel Aviv University
Brothers in tomb decoration at Deir el Medina

The Egyptian term *sn* ('brother' and more broadly, 'male affine') has been investigated several times (e.g. Lopez 2003) but in Egyptological research the lived experience of brotherhood in Ancient Egypt has been relatively neglected.

The tomb-builders' village of Deir el-Medina is an ideal data set for investigating brotherhood in Ancient Egypt. Administrative and legal texts, private letters, tomb decoration and stelae allow us to trace families over several generations during the Ramesside Period and observe adult brothers interacting in ritual, legal, and everyday contexts. The invaluable Deir el-Medina Database, and existing genealogical research on the village (notably Davies 1999) facilitate this investigation.

This paper, part of a larger project on brotherhood at Deir el-Medina, investigates brothers in tomb decoration at the site – both the tomb owner's own brothers, and his sons – who would view themselves simultaneously as sons and as each other's brothers.

I will examine whether brothers are consistently named in a particular order, how their garments and the offerings they bring or receive differ, which brothers are named on architectural elements of the tomb, and who participates, and how, in the funeral. This data will be compared with information about these brothers from other contemporary documentation from the site to give a more rounded picture of brotherhood in these particular families.

This research will enable a more fine-grained analysis of the conventions of Ramesside tomb decoration, and to understand the lived experience of brotherhood at Deir el-Medīna better.

Laura Taronas, Harvard University

The Amarna Period and the Politics of Iconoclasm in Ancient Egypt

Several scholars of the Amarna Period have discussed Akhenaten's so-called iconoclasm against selected Egyptian deities. However, few Egyptological investigations seem to have carefully considered their use of the term "iconoclasm" to fit this episode. Our understanding of the Amarna Period and other "iconoclastic" incidents in Egyptian history could benefit from a deeper study of the history and theory imbued in this term. A better conception of this urge to destroy could lead to a deeper comprehension of the art, religion, and texts being defaced. In this paper I will explore whether the Atenist erasures can rightfully be deemed "iconoclasm." The definition of this term has long hinged on the contested meanings of "icon" and even "image." I will work from the more general to the specific by first defining an image, then an icon, and finally iconoclasm. I will use this exploration to consider how Akenaten's actions relate to other historic episodes (Egyptian and non-Egyptian), and if the Amarna evidence can be better analyzed by applying interdisciplinary methodologies. For example, media studies, philosophy, and anthropology have produced useful frameworks for discerning the underlying aims and reasoning behind instances of iconoclasm from a number of historical periods, and I hope to employ these concepts to better understand Akhenaten's actions.

Kristin Thompson, The Amarna Project*Techniques of Amarna Composite Statues Compared with Those of the Pre-Amarna Reigns*

Composite hard-stone statues are considered among the most innovative aspects of the art of the Amarna period. Fragments also survive, however, from such statues created in the reigns of Amenhotep III and perhaps Thutmose IV. The question remains as to how different the Amarna statues were from these earlier examples.

This paper compares the techniques for creating pieces of composite statuary and joining them into entire statues as used in the pre-Amarna and Amarna periods. Unfortunately no two pieces of composite statuary have yet been discovered still attached to each other, so direct comparison is impossible. Points of indirect comparison include the types of materials used and the methods of attachment that can be inferred from the forms of the surviving pieces.

At least four composite statues of the earlier reigns are represented by fragments in museums. Over fifty pieces of Amarna-era composite statues, representing nearly as many individual statues, are held in museums and the Amarna magazine. These are either firmly provenanced to Amarna or at least clearly made during Akhenaten's reign. This paper will compare attachment methods evidenced by heads, hands, and ears from pre-Amarna and Amarna pieces. The apparent methods of attaching composite pieces to other parts of the original statues differ distinctly between the two periods, thus supporting the claim that Amarna composite statuary was genuinely innovative.

Jen Thum, Brown University*More (!) Adventures in Living-Rock Stelae*

This paper is a report on the second season of fieldwork for my dissertation on royal "living-rock" stelae, and a follow-up to my paper at the 2017 Annual Meeting in Kansas City. These stelae were inscribed directly into rocky landscapes at sites of social significance, mainly in the borderlands of the Egyptian empire – they are present in Lebanon and Sudan as well as in peripheral areas of Egypt itself. Some primarily had a cultic or ideological function, while others ostensibly served more 'practical' aims.

This research, which was supported by a CAORC Fellowship and an ARCE ECA Fellowship, comprised non-invasive investigations of stelae at Tombos, Nauri, Gebel Barkal, Kurgus, Konosso, Aswan, and several sites in Middle Egypt. At the sites in Sudan, aerial photography was employed in order to better understand the settings of these monuments, supplementing previous studies of their texts. This second round of fieldwork further reinforces the idea that considering the materiality of the stelae and the manner in which they were sited in the landscape can offer new insights into the use of living rock as a medium.

Jessica Tomkins, Brown University
Constructing Legacies of Provincial Power in the Old Kingdom



The Old Kingdom provinces were not simply a monolithic institution grouped together in opposition to the Residence. As a result, the power held by the provincial elite was multifaceted and complex. Elite power was expressed through the ability to create, wield, and sustain significant control over resources of material, ideological, economic, and socio-cultural value. We most often associate the control of these resources with the active power of the elite held during their lifetime, deliberately utilized to gain and maintain their power over others. Contrasting this active power, this paper shows that elite power could also be passive and continue after death through the creation of legacies. Examining Upper Egyptian mortuary culture, I argue that elite tombs were not simply monuments commemorating the power once held by the deceased in their past lifetimes. Instead, deliberate textual and material choices were made which served to posthumously place the deceased elite into the collective memory of their local community. By retaining local cultural significance after death, the elite attempted to use death as a means to create a legacy and temporally extend the power they once held in life.

Martin Uildriks, Brown University
Forts, Cities, and Urbanization: A Comparative Space Syntax Analysis of State-Planned Domestic Space



The Middle Kingdom Egyptian fortresses in Lower Nubia have proven difficult to understand in longer sequences of ancient Egyptian state-planned settlements and urbanization. On the one hand these fortresses represent a form of colonial imperial militarized space, while on the other they contain elements that

place their inhabitants in an urban setting. The matter often rests on definitions of 'urban', while 'houses' (either by size, shape, or layout) commonly form the main analytical units in these discussions.

However, these studies have tended to overlook important spatial parameters that characterize social dimensions on a subconscious level both inside and outside houses, and isolate house plans from their associated material culture. Such discussions also struggle to identify whether state involvement causes urbanization, or urbanization causes state development. A likely yet understudied influence on house development and urbanization is distance to the center of political power.

In this paper, I present a systematic and comparative analysis of a number of spatial configurations in state-planned settlements, using theories and approaches from Space Syntax as well as anthropological theory. In particular, I will investigate patterning within and between a few house plans from the fortresses, as well as from settlements closer to the Middle Kingdom political center. An analysis of accessibility, visibility, and connectivity within and between house plans in relation to their archaeological contents and position within their wider settlement will allow the contextualization of fortresses within broader processes of colonial expansion and urbanization.

Elizabeth Warkentin, University of Memphis
Looking Beyond the Image: A Contextual Analysis of the Procession to the Cults of Hathor

The analysis of the scene on the western interior wall north side of the Great Hypostyle Hall centers on Hathor, who is depicted fifteen times within the scene. The purpose of examining this wall scene is to place this previously unanalyzed scene within the larger framework of the Great Hypostyle Hall, which has already been determined as a canvas for the Ramesside rulers to display their position as the rightful leaders of Egypt. This paper will focus on the three rows of "Hathors" and the significance of the geographic locations that are linked to the fifteen manifestations found on this wall. The cult places, when plotted on a map, are generally clustered regionally according to the row where they are named. These clusters suggest that movement between the centers could have been accomplished with relative ease. The

vignettes, therefore, could be seen as a portrayal of a procession taken by these kings, Ramesses I and Sety I, to the cult places. It is proposed that the Procession to the Cults of Hathor relief is either representative of an actual journey to these cult places or is merely a symbolic portrayal of Ramesses I and Sety I making offerings at these locations. This scene highlights the kings' connection to Hathor, her support of them, as well as implying Sety I's authority over the locations that are listed.

Kent R. Weeks, Theban Mapping Project
The Egyptian Archaeological Database and the Future of Egypt's Ancient Sites

Egypt boasts thousands of archeological sites, every one of them threatened with damage or destruction. Their safety and preservation has become modern Egyptology's most pressing obligation. This is no simple task: there are thousands of sites in need of work, and no two show the same symptoms. To protect them, we Egyptologists and conservators must start with four things: an inventory of sites; surveys of their past and present condition; proposals for their future protection; and trained personnel to prepare these reports. In addition, we must actively encourage the support of young Egyptians, for it is they upon whom future site protection will depend.

Building upon its experience in the Valley of the Kings, the Theban Mapping Project has established an online Egyptian Archaeological Database (EAD) to address these needs. The EAD now includes over 2,000 sites and will soon have over 10,000. In this paper, we review the structure and contents of the EAD, the training of its contributors, and the plans for its long-term sustainability. Without such a database, Egypt's archaeological heritage and the essential contributions it makes to Egypt's economy remain in serious danger.

Lindsey Weglarz, University of Chicago
It's Complicated: The Value of a Cultural Entanglement Approach to Understanding Egyptianization in Lower Nubia

Questions of ethnic and cultural identity have been central to Nubian studies since the first proper archaeological campaigns in the region during the early 20th century. In particular, the domination of Egyptian material culture after the Egyptian

conquest at the start of the New Kingdom, i.e., “Egyptianization,” has been the subject of much debate. Models of Egyptianization, however, generally fail to consider the adoption of Egyptian material culture across all socioeconomic levels of society. They tend to regard culture as monolithic and unchangeable and leave little room for individual agency amongst the native population, resulting in analyses that rely on a strict “this or that” assignment of identity.

This paper argues for a more nuanced approach to investigating changes in material culture in Nubia through the use of cultural entanglement theory. Cultural entanglement provides a framework for identifying the archaeological remains of intersecting cultural identities through the careful consideration of the ways in which objects are created and used. As will be shown, this approach works particularly well in the context of colonial encounters, such as Lower Nubia during the 18th Dynasty, and demonstrates the value of a more inclusive, individual agency oriented approach.

Josef Wegner, University of Pennsylvania
The Biography of Idudjuiker, a Contemporary Account of the Conquest of Thinis under Wahankh Antef II

One of the pivotal events in the fifty-year reign of the 11th Dynasty Theban ruler Wahankh Antef II was the conquest of the Thinite nome from the Herakleopolitan 10th Dynasty. New evidence for the Theban conquest of Thinis and Abydos has recently emerged in the form of the biographical stela of Idudjuiker, “foremost-one of the chiefs of Wawat” excavated at South Abydos. Expanding on the initial discussion of the dating of the stela presented at the 2017 ARCE meeting, this paper examines the historical significance of Idudjuiker’s biography. The stela contains what appears to be a contemporary description of an extensive program of dedications and construction work undertaken on the temples of Thinis and Abydos, as well as celebration of the Osiris procession, that occurred in the aftermath of the Theban victory. The text discusses how Idudjuiker participated in these activities alongside the Theban king and other members of his court. This biographical stela appears likely to have been dedicated at the behest of the Theban king and may be one of a series of monuments set up at Abydos that commemorated key individuals involved in the 11th Dynasty

victory in Thinis. The stela of Idudjuiker demonstrates the crucial role of a Lower Nubian military alliance in the Theban conquest of the Thinite nome.

Federico Zangani, Brown University

From Warfare to Diplomacy: Tuthmosid Imperialism and the Origin of the Amarna Diplomatic System



This paper presents an innovative approach to the study of 18th-Dynasty Egyptian imperialism in the Levant by charting the evolution of the Egyptian political and economic engagement with the northern Levant from the first phase of territorial expansion, culminating with the reign of Tuthmosis III, to the diplomatic system of the Amarna archive under Amenhotep III. More specifically, it has never been questioned how the world of the Amarna letters originated in the first place, but it is clear that this world did not exist at the time of Tuthmosis III. In fact, the geopolitical situation in the Levant in the 15th century BC was radically different from a century later: while Tuthmosis III campaigned systematically between Canaan and the Middle Euphrates region, Amenhotep III no longer had this necessity, and military activity was limited to a few, targeted operations. The analysis of textual evidence including not only the Egyptian royal inscriptions and the Amarna letters, but also contemporary archives from the Egyptian provincial center in Lebanon at Kamid el-Loz and from the Syrian kingdom of Qatna, is expected to elucidate how 18th-Dynasty Egypt coerced and/or negotiated with the local realities in order to attain its own political and economic interests, and at the same time maintain regional stability. The working hypothesis is that the Amarna diplomatic system originated as a geo-political solution to the combination of the competing imperial forces of the time —mainly Egypt, Mittani, and Hatti— and the local, political and economic dynamics of the northern Levant.

Lingxin Zhang, Johns Hopkins University

An Astrological Manual from the Tebtunis Library concerning Women

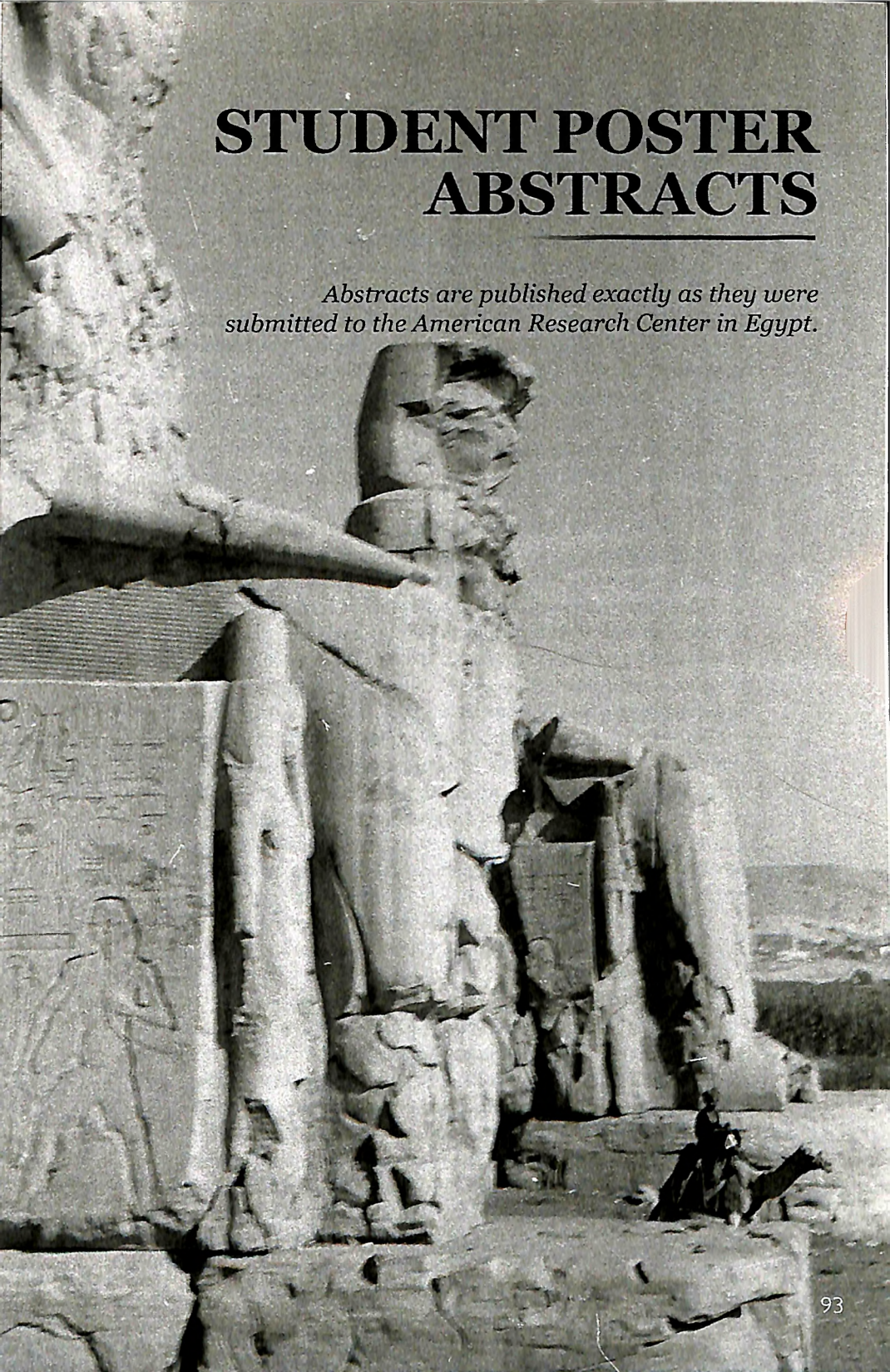


I will present my on-going work on several unpublished papyri from the Tebtunis library (1st or 2nd century C.E.). Most of the papyri from this library are now conserved in the Carlsberg Collection of the University of Copenhagen. The three texts of

concern here all belong to the realm of astrology. Particularly interesting is PSI inv. D 35, an astrological manual for women. The papyrus contains a formula resembling P. Cairo CG 31222 and P. Carlsberg 66 + P. Lille. However, PSI inv. D 35 is unique in dealing with enquiries of female patrons. It is noteworthy that this papyrus preserves a complete colophon. It attributes the text's authorship to Imhotep and sets the composition date all the way back to the reign of Djoser: an instance of pseudepigraphy. The two other papyri, P. Carlsberg 684 and P. Carlsberg 100, share the same rubric as PSI inv. D 35. The phrasing of the rubric offers more information on the incorporation of decans into Hellenistic astrological practices. Studying these texts deepens our understanding of astrology in the Graeco-Roman world. The texts' association with the Tebtunis library invites one to revisit to the question: "how much did Egyptian priests contribute to Hellenistic astrology?" These texts should also provide more insights on the lives of women and gender roles in Graeco-Roman Egypt.

STUDENT POSTER ABSTRACTS

Abstracts are published exactly as they were submitted to the American Research Center in Egypt.



Alexandra Breza Erichson, University of Chicago
Through the Grapevine: Settlements and Vine Cultivation in the Bahariya Oasis

At the end of a four-day caravan ride through the desert from the Nile Valley lies the Bahariya Oasis, an understudied location in the Western Desert that is typically construed as having little impact on the Nile Valley due to its remoteness. The Egyptians recognized the Bahariya Oasis for its strategic position in the desert and therefore, the Bahariya Oasis is usually understood as important in pharaonic Egypt for its military purposes during times of conflict. However, in addition to its strategic position, the Bahariya Oasis was significant to the Nile Valley as a producer and exporter of wine.

Vine cultivation and wine production in the Bahariya Oasis is attested through both textual sources dating as early as the Middle Kingdom and archaeological evidence from the Roman Period. Although there is no archaeological evidence of earlier vineyards in the oasis, the Bahariya Oasis offered suitable environmental conditions for growing grapes and had a sedentary population to support long-term agriculture and wine production. This research applies GIS technology to evaluate settlement distribution in this oasis in relation to shifting environmental conditions and available agricultural land. Furthermore, wine was a feasible export product that could be transported in large vessels via desert routes to the Nile. The effort to transport wine overland and its specific mention in texts suggests that wine from the Bahariya Oasis was unique and desired. Consequently, this analysis provides a more complex interpretation of the impact of the Bahariya Oasis on the Nile Valley.

Thomas Anthony Chiodini, The University of Chicago
Cementing Sementiou: The Activity of Prospectors (sementiou) in the Eastern Desert During Old Kingdom Egypt

The Eastern Desert has recently seen a resurgence of scholarly attention due to the ease of access through GIS technology and growing concerns for historical preservation due to modern mining activities. In an attempt to create precise

archaeological documentation of this region, researchers have started to assemble accurate maps of this region, marking archaeological and geological features. This increase in data has expanded our understanding of Egypt and its interaction with the Eastern Desert with regard to mineral exploitation and the logistics of mining expeditions. One such example in this administrative structure is the title of sementiou, which designates a special group of prospectors that are part of expeditions into the Eastern Desert with the aim to exploit raw materials, in particular gold, copper, and precious stones. The recent discovery of sealings referring to the sementiou in a late 5th Dynasty context at Tell Edfu, and the distribution of this particular and rather rare title deserve further examination.

This poster will review the recorded instances of sementiou in connection with the recent geographic survey data pertaining to Old Kingdom precious metal mining and processing in the Eastern Desert and Nubia. The poster will compare the occurrence of the title mostly in graffiti and rock inscriptions with their distance to mining installations and quarry sites. It will also compare these locations to the possible starting points of expeditions at provincial administrative centers such as Edfu as to show a link, or lack thereof, between the title's presence and precious metal processing.

Amber Hutchinson, University of Toronto
Mapping Ritual Landscapes: Royal and Non-Royal Religious Activity in the Eighteenth Dynasty

The built environment of New Kingdom provincial towns consists of a network of religious monuments and artifacts that shaped their ritual landscapes. At the onset of the Eighteenth Dynasty, pharaohs inaugurated an extensive building program that aimed to renew and refurbish established provincial cults. The most notable expression of royal investment in provincial cults was the construction of provincial cult temples and peripteral temples, which established physical places and demarcated boundaries for religious activity. The location of Eighteenth Dynasty royal monuments was often influenced by the position of previous royal structures, as well as the setting of local cult activity, combining tradition with innovation.

Non-royal religious activity during the Eighteenth Dynasty was influenced by increasing state initiatives and had a significant impact in shaping the ritual landscape of provincial towns. Represented in the material record by votive stelae and statue fragments, figurines, votive pottery, private chapels, and rock inscriptions, non-royal religious activity was often linked to festival processional routes in areas of public display to promote social status. By identifying and mapping monuments and locations associated with royal and non-royal religious activity, the intricacies of the nexus between the built environment and natural landscape, as well as between royal patronage and non-royal initiatives can be visualized and better understood. This poster will showcase the results of mapping ritual landscapes at three provincial sites: Abydos, Elephantine, and Elkab. The significance of this research is to demonstrate the dialectical relationship between state investment and local endeavours.

Nisha Kumar, The University of Chicago
(Re-)Constructing the Hyksos: Architectural Comparisons with Syro-Palestine

The Hyksos period is one of the most enigmatic moments in Egyptian history. Although referred to as the ḥꜥꜥ ḥꜥsw.t (“ruler(s) of the foreign lands/deserts) in Egyptian texts, little is actually known or understood regarding the identity of these foreign rulers. Studies so far have suggested their Asiatic origins on the basis of linguistic parallels as recognized through personal names. However, a stronger approach in identifying Hyksos origins might also be possible through the study of architectural characteristics, in particular the appearance of platform and casemate constructions that mark several important building complexes at Tell el-Dab’a. Palatial structures and related buildings found at the site, such as the “Palace of Khayan” in area F/II seem to share similar architectural features with other constructions in the Near East. Manfred Bietak already recognized particular architectural elements at the palace of the Hyksos Period and traced several similarities with the palaces of Ebla and Mari in Syria.

This poster considers other sites in Syro-Palestine that illustrate comparable construction practices and attempts

to illustrate how a larger network of powers using similar constructive approaches must have existed. The spread of such technological knowledge demonstrates the intimate relationship that existed between the Hyksos and these other seats of power during the Middle Bronze Age. Understanding this connection might help to contextualize the cultural transformations sweeping across the region during this time and explain how the shared use of certain architecture features might relate the Hyksos rulers to these other polities.

Amr Khalaf Shahat, University of California Los Angeles
*The social Archaeology of Food in Ancient Egypt:
Multidisciplinary lenses to Paleoethnobotany of cereal-based
diet*

Wheat and barley were used to making bread and beer, the main staple in Egyptian diet. This typical interpretation of cereal based diet in Egypt implicitly homogenizes the culture. Variation within the culture are often interpreted as a temporal difference, ignoring the inter-regional cultural variation. Different names of bread encountered in ancient texts are often interpreted by using approximate Western terms (e.g., biscuits, cake) which distances us more from the indigenous concepts of a meal. This presentation introduces a multidisciplinary paleoethnobotanical approach of the Egyptian cereal based diet including molecular and nano-archaeological methods and imaging applied to archaeobotanical and ethnographic remains of wheat and barley from Egypt, with the goal of understanding the contribution of cereals on the chaîne opératoire of producing a meal. These methods provide a lens onto the regional cultural variation in the ways that cereals have intersected with other food items such as fruits and dairy when integrated into what constitutes the concept of a meal at a regional level. Ethnoarchaeological data enrich the understanding of the textual and archaeological materials by revealing the diversity of ways by which a cereal based meal has served as a social agent in the formation of society, economy, culture and identity in a regionally distinct ways (Hastorf 2016). A key conclusion is that the use of interdisciplinary methods and technology is not only a source for expanding data, but also poses ontological questions to rethink the theoretical paradigm in Egyptology that has produced homogenizing terms for describing Egyptian society.

Ariel Singer, University of Chicago

A Case of Anatomical Terminology: the use of objects to define anatomy

The terminology used to describe the human body in ancient Egypt has long been a topic of interest and frustration for scholars. The ambiguity of the individual contexts combined with the rarity of the occurrences has rendered a number of these terms nearly or completely indecipherable. This paper will specifically examine those phrases that use objects to define particular anatomical elements (typically by employing an indirect genitive; ex. *iwn n fnd*, lit. the column of the nose, i.e. the nasal spine). Such constructions are relatively uncommon within the large corpus of anatomical expressions, thus they will first be identified, examined for their literal meaning, and contextualized for their broader anatomical sense. A selection of these phrases will then be compared and contrasted, and any patterns that appear will be examined more thoroughly. The data compiled through this work will allow suggestions to be made about diachronic change in Egyptian medical texts, and more broadly, about how the ancient Egyptians understood and interacted with the human body.

Daniel Edwin Smith, University of Memphis

A Novel Etymology for Egyptian Hm.t “Woman, Wife”

This poster provides a refined etymology for the Earlier Egyptian word Hm.t “woman, wife” by applying a broad range of recent data and methods to the question. While etymologies have previously been proposed for Hm.t, none have taken into account broader Afro-Asiatic cognates outside of the immediate Boreafasian subgroup (Egyptian, Berber and Semitic) or the vowel history which can be reconstructed from Coptic. Using data from other Afro-Asiatic subgroups allows a more accurate and detailed etymology for Hm.t, which does not rely on exceptional sound changes, but instead fits within the highly regularized sound correspondences that have been previously observed within Afro-Asiatic, especially by Ehret (1995). A brief history of the word and cognates in each Afro-Asiatic sub-phylum are presented.

Rebekah Vogel, University of Memphis
*Classifying Otherness: Determinatives in Ramesside
Topographical Lists*

Topographical lists are familiar to most Egyptologists, and have often been discussed alongside the ideology of kingship and the historicity of military campaigns. However, features of these lists can also provide period-specific information about Egyptian interaction with and understanding of foreign peoples and places. This poster addresses the use of determinatives as a feature of Ramesside topographical lists, and their wider implications for our understanding of the lists as reflections of cultural ideology and worldview. Most place-names in topographical lists of the Ramesside Period were determined with the xAst sign (Gardiner N 25), signifying “foreign land” or “hill country.” However, other determinatives were also used, and many toponyms were not determined at all. Because determinatives function as a semantic classifier, the use of determinatives other than the normal xAst sign for a given toponym suggests some, more specific nuance to the Egyptians’ understanding of that geographical location and, by extension, the people who inhabited it. My research seeks to explore those classificatory nuances and their implications for Ramesside worldview through a combination of statistical analysis and philological and iconographic study. The overall frequency of each determinative is analyzed in conjunction with the frequency that each determinative occurs with particular toponyms or iconographic elements. This distribution, when compared against the semantic nuance of each determinative and the ideological function of specific iconographic elements, provides the basis for interpretation.

Catherine L. Witt, The University of Chicago
Headrest Amulets and Their Iron-rific Transposition

Headrests have long sparked the curiosity of scholars and Egyptophiles alike. So far removed from current Western preference for plush pillows to cradle one’s dozing head, headrests have become a novelty of sorts when introducing the public to ancient Egyptian ways of life, with an awe-factor leading visitors to conclude for themselves that “those could not have possibly been comfortable.” However, for the

ancient Egyptians there was a secondary and arguably more important symbolic significance behind headrests. Headrests were often inscribed with the names of the owners as well as protective spells and imagery to help and protect the sleeper in life and death. Headrest imagery adorned tomb walls and coffins so that the magical powers of the headrests could be transferred into the afterlife for the purpose of rebirth, in association with the rebirth of Osiris.

By the 18th Dynasty we see the emergence of a highly specialized amuletic form in the headrest or wrs amulet. These amulets are overwhelmingly found made of hematite, a black or brown colored iron ore. It has been assumed that the dark color of hematite was the attractive quality, with black symbolizing rebirth and regeneration. In this poster, I will be discussing the raw material preferences for these headrest amulets and a new interpretation for the significance of hematite and other iron ores and accessory minerals chosen for their manufacture.

Seria Yamazaki, Waseda University

Beyond Adornment: Ideal and Actual Use of Funerary Broad Collars in Middle Kingdom Egypt

In Ancient Egypt, the significance of personal adornments extended far beyond ornamentation. Among personal adornments, broad collars were often painted on funerary objects such as coffins and mummy masks. Thus, they are assumed to have played an important role in protecting the deceased. Especially in the Middle Kingdom, they were depicted in the object friezes, which are part of the decoration on coffin interiors displaying different types of objects as iconography with captions. The object friezes are considered an inventory of grave goods, and additionally, they represent the funerary ritual. Besides iconography, a number of actual broad collars have been discovered in tombs; however, these have not been studied quantitatively. Through analysis of iconography and archaeological materials, this paper aims to clarify the ideal funerary ritual related to broad collars and to determine their actual usage in the Middle Kingdom. The results indicate that the ideal for the deceased was not just owning but wearing diverse broad collars, including those made of various materials, colors, and shapes. A quantitative analysis of archaeological artifacts demonstrates that broad

collars were used almost exclusively in the Memphis-Faiyum Region, and all sorts of them were buried particularly with royal or high-status individuals. It can be concluded, therefore, that the funerary ritual relating to broad collars was not performed equally but differed by region and social class. Although personal adornments have often been regarded as mere art-objects, this work shows that studying them leads to a revelation of ancient Egyptian burial customs more specifically.

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