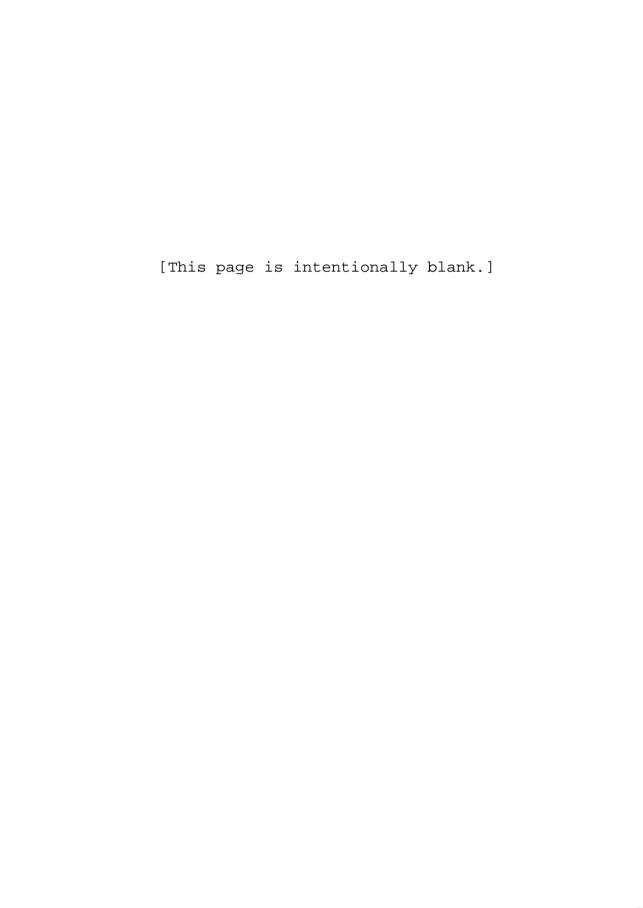
# Egyptology at the Dawn Tof the Twenty-first Century

Proceedings of the Eighth International Congress of Egyptologists Cairo, 2000

> Volume 2 History Religion

With a preface by Zahi Hawass

Egyptology
Dat the Dawn
Twenty-first
Century



## Egyptology Dat the Dawn Of the Twenty-first Century

Proceedings of the Eighth International Congress of Egyptologists Cairo, 2000

> Volume 2 History Religion



Edited by **Zahi Hawass** 

In collaboration with Lyla Pinch Brock

The American University in Cairo Press Cairo New York

Copyright © 2003 by The American University in Cairo Press 113 Sharia Kasr el Aini, Cairo, Egypt 420 Fifth Avenue, New York 10018 www.aucpress.com

All rights reserved. No part of this publication may be reproduced, stored in a retrieval system or transmitted in any form or by any means, electronic, mechanical, photocopying, recording or otherwise, without the prior written permission of the publisher.

Dar el Kutub No. 17340/01 ISBN 977 424 714 0

Designed by the AUC Press Design Center Printed in Egypt

### Contents

Preface	xi
Zahi Hawass	
List of Abbreviations	xiv
Millennium Debate	
D. B. Redford	
The Writing of the History of Ancient Egypt	1
N. Grimal, Response	12
N. GRIMAL, Response W. J. MURNANE, Response	15
D. Valbelle, Response	20
Millennium Debate	
E. R. Russmann	
The State of Egyptology at the End of the Millennium: Art	23
S. DONADONI, Response	27
M. Eaton-Krauss, Response	29
M. MÜLLER, Response	32
S. Seidlmayer, Response	35
W. K. SIMPSON, Response	38
H. Sourouzian, Response	39

Millennium Debate H. te Velde	
The History of the Study of Ancient Egyptian Religion and its Future	42
P. J. Frandsen, Response E. Winter, Response	48 50
M. EL-ABBADI, On the Transmittance of Egyptian Learning into Greek	53
E. ABDEL AZIZ, Die Statue des šn C-ib: "Der Kabinettsvorsteher des Wesirs"	59
A. Abdel-Fattah, The Question of the Presence of Pharaonic Antiquities in the City of Alexandria and its Neighboring Sites (Alexandria pre-Alexander the Great)	63
M. ABDEL GHANI, Antaiopolite Nome and its Administrative Changes under Roman Rule	72
F. ABOU BAKR, The Role of Public Doctors in Ptolemaic and Roman Egypt	80
N. ALEXANIAN, Social Dimensions of Old Kingdom Mastaba Architecture	88
S. Allam, The Tax Exemption of Horemheb	97
J. BECKER, Gangsysteme im Pyramidenbau des AR und ihre Funktion im Rahmen von Konstruktion und Bauausführung	103
G. A. BELOVA, The Eastern Borders of Egypt: New Data	113
E. Bernhauer, Untersuchungen zur Privatplastik der 18. Dynastie	123
N. Billing, Text and Tomb: Some Spatial Properties of Nut in the Pyramid Texts	129
A. S. von Bomhard, The Egyptian Calendar	137
J. Boor, World-Systems Theory and the Old Kingdom: A Test Case	146
M. CAMPAGNO, Another Reason for the Foundation of Memphis	154
J. das Candeias Sales, Les monnaies de l'époque ptolemaïque au Portugal	160
J. CERVELLÓ-AUTUORI, Narmer, Menes, and the Seals from Abydos	168
M. CHERMETTE. Un page d'histoire de la nécropole thébaine	176

MĖ. Colin, The Barque Sanctuary Project: Further Investigation of a Key Structure in the Egyptian Temple	181
A. Dodson, The Burial of Members of the Royal Family During the Eighteenth Dynasty	.187
M. EATON-KRAUSS, Restorations and Erasures in the Post-Amarna Period	194
F. EL-FAKHARANI, The Pharaonic Port on the Mediterranean: Its Shape, Development, and Importance	203
E. L. ERTMAN, The Identity of the King and Queen on Tutankhamun's Golden Throne	209
A. D. ESPINEL, The Boundary Stelae of Djoser's Funerary Complex at Saqqara An Interpretation through Artistic and Textual Evidence	: .215
J. M. GALÁN, Amenhotep Son of Hapu as Intermediary between the People and God	221
J. GEE, B3 Sending and Its Implications	230
K. Goebs, Niswt nhh—Kingship, Cosmos, and Time	238
G. W. GOUDCHAUX, Bronze Statuettes of a Prince of Armenia	254
JCl. Goyon, Le rituel du <i>shtp shmt</i> au changement de cycle annuel.  Sources et documents, un état des questions	261
L. Green, Beyond the Humors: Some Thoughts on Comparisons between Pharaonic and Greco-Roman Medicine	269
H. Győry, Interaction of Magic and Science in Ancient Egyptian Medicine	276
M. HAGGAG, Two Religious Buildings at Byzantine Marea	284
N. B. HANSEN, Leaping Lizards! Poison Geckos in Ancient and Modern Egypt	290
M. K. HARTWIG, Style and Visual Rhetoric in Theban Tomb Painting	298
D. HEIDEN, New Aspects on the Treatment of the Cult Statue in the Daily Temple Ritual	.308
P. Hubai, Religionswechsel in Ägypten der Römerzeit	316

F. H. HUSSIEN, S. SHABAAN, Z. HAWASS, A. M. SARRY EL DIN, Anthropological Differences Between Workers and High Officials from the Old Kingdom at Giza	324
S. IVANOV, The Aegis in Ancient Egyptian Art: Aspects of Interpretation	332
E. KADOUS, Coptic Sculpture: The Popular Vision in Egyptian Art	340
M. KALOS, M. NELSON, La « chapelle de la reine blanche » à Thèbes-ouest:  Nouvelles données sur l'histoire du site	346
S. EL-KHOLI, The Lost Colossus of the Mate of the Sphinx (Surriat Abu al-Haul)	352
P. I. Kousoulis, The Function of hk3 as a Mobilized Form in a Theological Environment: The Apotropaic "Ritual of Overthrowing Apophis"	362
R. KUPER, The Abu Ballas Trail: Pharaonic Advances into the Libyan Desert	372
JPh. Lauer, Sur les figurations de <i>heb-sed</i> dans le complexe funéraire de la pyramide à Degrés	377
J. LINSTÄDTER, Systems of Prehistoric Land Use in the Gilf Kebir	381
M. J. LÓPEZ GRANDE, Winged Reshep: Egyptian Iconographic Evidence	389
G. Menci, New Evidence for the Use of the Greek Reed Pen in the Hieratic Scripts of the Roman Period	397
S. EL-MENSHAWY, The Protocol of the Ancient Egyptian Royal Palace	400
D. Niedziólka, On the Obelisks Mentioned in the Northampton Stela of Djehuti, Director of the Treasury during Hatshepsut's Reign	407
A. NIWINSKI, The Twenty-first Dynasty on the Eve of the Twenty-first Century	416
R. A. Orehov, Earthly Hathor and Heavenly Hathor	423
CH. ORSENIGO, Khay, Vizier of Ramses II: An Unknown Statue in a Private Collection and New Perspectives on His Role	428
J. PHILLIPS, Egypt, Nubia, and Ethiopia	434
G. PINCH, Redefining Funerary Objects	443

M. Poo, Egyptology and Comparative Ancient History	448
A. Rodrigo, An Ancient Mendesian Industry	455
G. ROULIN, God and Man: Formulas and Maxims on Seal Amulets	460
S. RZEPKA, Methods of Optimising Sculptors' Work During the Old Kingdom	467
A. M. SAIED, Chontiamenti oder Anubis	474
F. SALAH EL-DIN MOUSSA, Quelques aspects de la vie quotidienne représentés à Marea Byzantine	478
G. Scandone Matthiae, Les rapports entre Ebla et l'Egypte a l'Ancien et au Moyen Empire	487
F. SHARKAWI, The Egyptians in Greek Tragedy	494
M. A. Shata, Damietta as a Gateway to Egypt in Ancient and Modern Times	501
T. A. Sherkova, Seven Baboons in One Boat: The Interpretation of Iconography in the Context of the Cult Belonging to the Temple at Tell Ibrahim Awad	504
M. EL-SHIMY, Preparation and Use of Perfumes and Perfumed Substances in Ancient Egypt	509
A. Sugi, The Iconographical Representation of the Sun God in New Kingdom Egypt	514
E. G. TOLMATCHEVA, A Reconsideration of the Benu-bird in Egyptian Cosmogony	522
Z. TOPOZADA, Amasis à Memphis: détails sur le culte memphite d'Osiris et d'Isis	527
J. Trello, Traces of the "Beautiful Feast of the Valley" in Western Christian Tradition	534
T. L. TUCKER, Z. HAWASS, Integrating History and Health for the Roman Period of Ancient Egypt	543
M <sup>a</sup> . R. VALDESOGO MARTIN, Les cheveux des pleureuses dans le rituel funéraire égyptien. Le geste <i>nwn</i>	548

### Contents

E. J. WALTERS, Women in the Cult of Isis at Hierakonopolis	558
L. Watrin, Lower-Upper Egyptian Interaction during the Pre-Naqada Period: From Initial Trade Contacts to the Ascendancy of Southern Chiefdoms	566
S. A. YOUNIS, Psamtik I and Gyges: A Secret Alliance	582
S. R. Zakrzewski, R. A. Foley, M. M. Lahr, Change and Continuity over the Predynastic and Early Dynastic Periods of Ancient Egypt	587
A. P. ZINGARELLI, Local Exchange in New Kingdom Egypt	580
A. ZIVIE, R. LICHTENBERG, Les chats du Bubasteion de Saqqâra: Etat de la question et perspectives	587
C. ZIVIE-COCHE, Tanis à l'époque ptolémaïque	594

### **Preface**

### Zahi Hawass

The Eighth International Congress of Egyptologists, held in Cairo in March 2000, marked the opening of the new millennium as an opportunity to evaluate and redefine the focus and goals of Egyptology in the twenty-first century. Through the Millennium Debates and the papers of other participants published here, we are made aware that now more than ever, Egyptology is facing a period of change and challenge and we must meet these challenges if our field is to remain relevant to the modern world. The Congress was attended by some 1,400 scholars, and of the 400 papers delivered, 248 were selected by our scientific review committee to be published in these volumes. It is notable that this Congress included a higher number of Egyptian Egyptologists than we have seen in many years. In fact, some 500 Egyptian Egyptologists attended the conference. Their inclusion with the more well-known names in Egyptology is an indication of one of the frequently mentioned themes in the Congress: the need for education and training of more Egyptian scholars and excavators to study and maintain their country's monuments as part of the world's heritage.

The enormous quantity of submissions to the Proceedings led to the decision to publish them in three volumes. Volume One contains all the archaeology papers; Volume Two, those dealing with history and religion; and Volume Three covers the topics of language, literature, museology, and conservation. Each volume of these Proceedings opens with the text of the corresponding Millennium Debates and their respondents, and the papers of the specific subjects follow in alphabetical order by the contributor's name.

The Millennium Debates formed a special focus for this Congress. Chaired and responded to by eminent experts in the field, the Debates covered archaeology, art, history, language, literature, museology, religion, site management, and conservation. In his paper (opening the Debates in Volume One) on "Egyptology in the Twenty-first Century," David O'Connor provides a cogent summary of the trends in field work in Egyptology in the last forty years and discusses three points crucial to the future of Egyptian archaeology: the changing attitudes of Egyptians toward

their archaeology, the need for comprehensive mapping (rather than excavation) of the national archaeological landscape, and theoretical issues and their impact on archaeology, epigraphy, and other scholarly disciplines.

Volume Two continues with keynote speakers addressing the Millennium Debate issues of history, art history, and religion. In his paper, "Writing the History of Ancient Egypt," Donald B. Redford challenges the appropriateness of new approaches to historiography such as retrospective economic theory, Egyptology as anthropology, deconstruction, and 'history from below,' as he characterizes the tendency to use anecdotal evidence to draw far-reaching conclusions about the 'common people' in Egyptian history. Edna R. Russmann, in her contribution to the Millennium Debate on the study of the art of ancient Egypt laments the failure of Egyptian art scholarship to coalesce into a recognized subdiscipline with an academic tradition of acknowledged interests and methods of its own. She goes on to give a summary of the most urgent needs facing the study of Egyptian art as well as possible solutions. In the last Millennium Debate paper in Volume Two, Herman te Velde writes on "The History of the Study of Ancient Egyptian Religion and its Future," which he considers one of the most urgent topics in Egyptology today, since the core of ancient Egyptian culture is its religion. He speculates that although Egyptologists with various special interests will contribute to the study of religion, the most progress should be expected from those willing to focus their research specifically on religion and its accompanying issues, such as polytheism versus monotheism, pharaonism versus local religions, and religion in life as well as death.

Perhaps the most challenging of Millennium Debate papers come in Volume Three. John Baines' comprehensive examination of the current and future possibilities for research on Egyptian literature is complemented by Antonio Loprieno's notes on the problems and priorities in Egyptian linguistics. Baines provides extensive analysis and definition of the Egyptian literary corpus, its relation to the wider stream of tradition and range of written forms, and the social and ideological situation and status of what was written. Loprieno concentrates on the achievements of Egyptian linguistics over the last fifteen years and considers the impact of recent developments in linguistic research on Egyptian phonology and lexicography. Regine Schulz's paper, "Museums and Marketing: A Contradiction" is a timely examination of the pressures facing museums around the world to provide "blockbuster entertainment" while maintaining their five basic mandates of collecting, preservation, research, presentation, and mediation. Finally, my own contribution to the Millennium Debates, "Site Management and Conservation," addresses some of the principal problems and threats to the conservation of Egyptian heritage sites and makes recommendations, some perhaps controversial, for improving site management methods and protection as well as giving suggestions for salvage and excavation over the next ten years.

In addition to being a forum for debate and report, the Congress honored several prominent Egyptologists for their outstanding contributions to the field, including Abdel-Aziz Saleh and Sayed Tawfik from Egypt; Harry Smith of England; William K. Simpson from the United States; Rainer Stadelmann from Germany; Jean Leclant of France; Sergio Donadoni from Italy; Kazimierz Michalowski of Poland; and the late Gamal Mokhtar, former Chairman of the Antiquities Organization of Egypt and Member of the Supreme Council of Culture.

I took great pride in the many complimentary comments I received regarding the organization and success of the Eighth International Congress of Egyptologists, but credit for this must be shared with the many people whose efforts made that success possible. I would like to thank the members of the different committees who planned and executed the many aspects involved in holding such a large conference. The Congress was held at the Mena House Oberoi Hotel in

the shadow of the Giza Pyramids and thanks to its General Manager, Rajiv Kaul, everything ran smoothly in the day-to-day operations. The Congress would also not have been possible without the financial support of many Egyptian business corporations. Another important contributor was the American University in Cairo Press. Its director, Mark Linz, and the Press's editorial staff were of great help in completing the Congress's mission by publishing the Abstracts, edited by Angela Jones, and of course these final three volumes of Proceedings edited in collaboration with Lyla Brock.

In conclusion, I would urge the International Association of Egyptologists to review and expand its activities in the future, with the aim of making itself better known to the general public and potential sponsors. This would enable it to raise the funds to undertake and complete valuable projects, many of which are discussed in these volumes. I would also urge that scientific studies and research programs should be geared less to the personal interests of the researcher, but should follow an overall action plan targeting those areas where monuments are especially endangered, such as the Delta and the great deserts of Egypt. I believe that all who participated in the Eighth International Congress of Egyptologists and all those who read these volumes of Proceedings will take wise and positive action in regard to these concerns.

## Methods of Optimizing Sculptor's Work during the Old Kingdom

### Slawomir Rzepka

Institute of Archaeology, Warsaw University

### Introduction

When we admire the pyramids at Giza we have the impression that their builders must have had unlimited resources of materials and manpower at their disposal. Of course this is not true—the resources of the kings were large, but not unlimited. We have various pieces of evidence that testify to a clear tendency to optimize time, work, and the use of materials. It is obvious that a private individual had only a small fraction of the royal reserves available to him. In private tombs we can find many examples of sparing materials and artisans work time. In this paper I would like to focus only on the statuary found in private tombs, and I will try to show that the aforementioned tendency is the reason for some interesting features of the Old Kingdom private (but sometimes also of royal) sculpture.

### Reasons for Optimizing Tendencies

An important role in the work of the ancient Egyptian sculptor must have been to analyze the character of the material (size of the block, its proportion, hardness, etc.) and calculate the amount of work needed to attain the finished work. For a tomb owner it was surely important to use the available material in the most efficient way. We can be quite sure that at the same time there was a tendency to keep the sculptor's work to a minimum. This tendency was a result of one of two factors:

- If a sculptor's reward depended on the amount of time he needed to finish his work, it was in the tomb owner's interest to reduce this time, so he would demand from the sculptor the use of the most efficient technique.
- If a sculptor was rewarded just for producing a statue, without taking into account the amount of work needed, it was in the sculptor's interest to reduce the work to a minimum.

Our knowledge about the system of rewarding sculptors is too scarce to tell which system of gratification was in use; what is important for us, however, is the fact that a tendency to optimize the sculptor's work must have been present.

### **Different Optimizing Techniques**

The two factors, the optimization of the use of material and the optimization of the sculptor's work, were combined in different ways and were a source of various peculiarities in private sculpture. Some of them have been noticed many times by different scholars. I will review them briefly and then present one very interesting feature, which—as far as I know—has not been interpreted in a convincing way.

The following are some examples:

- 1. Some statues were finished only on the front while the back was worked only schematically. This is especially visible on wigs, which on the front are rendered in detail, while their back parts are executed much more schematically. <sup>1</sup>
- 2. Another way of saving sculptor's work and time was rendering details of a statue only in paint. This is quite frequent in the case of a different parts of kilts, <sup>2</sup> nipples, <sup>3</sup> and inscriptions. <sup>4</sup> In some cases the details were not carved in the wood or stone of which the statue was made, but modeled in a layer of stucco. <sup>5</sup>
- 3. We find an extreme example of reducing work to a minimum among small statuettes dated to the late Old Kingdom, called by Hermann Junker "Scheinstatuen," and they look indeed more like imitations than real statues. However their function was apparently the same as bigger and better-modeled sculpture. While they appear to be unfinished, since they were painted we can be sure that what we see is a final product. Sometimes such "Scheinstatue" is just a natural stone, resembling in its shape a human figure, with some small carvings marking the most important parts of the human body (head, hands, legs). All the other details—eyes, wigs, dress etc.— were painted.
- 4. Another technique to optimize available material was to compose a statue in separate pieces. This is typical for wooden statues, which usually have their arms, the front of the feet and bases carved separately. The bases are often made of wood of lesser quality. The technique was used sometimes for stone statues; we know of statues with separate bases, with separate heads, and group statues with separate figures (e.g. a family group with figures of children carved from separate blocks of stone).
- 5. Carving a group statue instead of a few single figures could also result in saving material, as well as the amount of time invested in the work. In group statues, figures are usually very close together, they often touch each other with their arms, <sup>13</sup> or one figure embrace the other. <sup>14</sup> As a result, the adjacent sides of the figures needed much less work than single statues. Here we can see the tendency for saving the sculptor work, but in some examples the tendency for optimal use of material is also quite clear. Pair statues are sometimes arranged so that one figure embraces the other and stands not directly at its side, but partially hidden behind it, thus it would not be possible to make two single statues of the same size from an original block. <sup>15</sup>

Of course I am not trying to suggest that production of group statues was only a result of the tendency to optimize the use of material and of the sculptor's time; this kind of sculpture, however, created some new opportunities for the artist who tried to use the block of material at his disposal in a most efficient way, without more work than was necessary.

### Seated statues with rear surface of the seat leaning backwards

I would like to direct some attention to one quite common feature of seated statues, which in my opinion is the result of the same aforementioned tendencies. In many seated statues we can observe that the rear surface of the seat is not vertical, but leans backwards (sometimes quite considerably). Here are some examples dated to the Fourth, Fifth, and Sixth Dynasties. <sup>16</sup>

- 1. Louvre N 118 [A107], statue of Pehernefer; <sup>17</sup> limestone, h.: 88.5 cm; date: early Fourth to Fifth Dynasties, Saqqara.
- 2. Cairo CG 35, statue of a man; <sup>18</sup> limestone, h.: 61 cm; date: Fourth-early Fifth Dynasty, Saqqara.
- 3. Louvre E 25368, statue of Anchwedjes and wife Tepemneferet; <sup>19</sup> limestone, h.: 45 cm; date: Fourth–Fifth Dynasty (Mycerinus–Neuserre), Giza.
- 4. Cairo CG 197, statue of Rawer;<sup>20</sup> limestone, h.: 130 cm; date: Fifth Dynasty (temp. Neferirkare), Giza.
- 5. Cairo CG 21, statue of Neferirtenef with wife Wetjesetkau and small son Werkauptah;<sup>21</sup> limestone, h.: 83 cm; date: Fifth Dynasty (temp. Neferirkare or later), Saggara.
- 6. Cairo CG 85, statue of a man;<sup>22</sup> granite, h.: 68 cm; date: Fifth Dynasty, Saggara.
- 7. Cairo CG 169, statue of a man;<sup>23</sup> granite, h.: 41 cm; date: Fifth Dynasty, Saggara.
- 8. Hildesheim 419, statue of Sebehenef;<sup>24</sup> limestone, h.: 60.7 cm; date: Fifth Dynasty, Giza.
- 9. Louvre N 41 (A 40), statue of a man;<sup>25</sup> diorite, h.: 60 cm; date: Fifth Dynasty, provenance unknown.
- 10. Louvre N 110 [A 104, E 3021], statue of Sekhemka;<sup>26</sup> diorite, h.: 46 cm; date: Fifth Dynasty (temp. Neuserre or later), Saqqara.
- 11. Louvre N 111 [A 105, E 3022], statue of Sekhemka;<sup>27</sup> granite, h.: 55 cm; date: Fifth Dynasty (temp. Neuserre or later), Saqqara.
- 12. Louvre N 46 (A 45), statue of a man seated and a woman standing;<sup>28</sup> limestone, h.: 87 cm; date: Fifth Dynasty (temp. Neuserre or later), Memphite necropolis.
- 13. Cairo JE 67571, statue of Kaemset;<sup>29</sup> limestone, h.: 34.5 cm; date: late Fifth Dynasty, Giza.
- 14. Cairo JE 87812, statue of Imhotep;<sup>30</sup> limestone, h.: 10.7 cm; date: Fifth-Sixth Dynasty, Giza
- 15. Hildesheim 12, statue of a man;<sup>31</sup> limestone, h.: 45.8 cm; date: Fifth-Sixth Dynasty, Giza
- 16. Hildesheim 13, statue of Neferihy; 32 granite, h.: 49.5 cm; date: Fifth-Sixth Dynasty, Giza
- 17. Hildesheim 1572, statuette of Hetepi;<sup>33</sup> wood, h.: 28.2 cm; date: Sixth Dynasty, Giza.
- 18. Cairo CG 196, statue of Seankhuptah with wife Nebuibnebti kneeling by his right leg;<sup>34</sup> limestone, h.: 105 cm; date: early Sixth Dynasty, Saqqara.
- 19. Cairo CG 201, statue of Seankhuptah with sons by his legs;<sup>35</sup> limestone, h.: 96 cm; date: early Sixth Dynasty, Saggara.
- 20. Cairo JE 35566, statue of Ibnedjem;<sup>36</sup> limestone, h.: ?; date: Sixth Dynasty, Giza.
- 21. Wien ÄS 8410, statue probably of Itjef and wife, with 2 small children standing;<sup>37</sup> limestone, h.: 88.8 cm; date: Sixth Dynasty, Giza.
- 22. Louvre N 113 [A 108], Seated statue of Ptahschepses-Impy;<sup>38</sup> limestone, h.: 46 cm; second half of Sixth Dynasty, Saqqara.
- 23. Cairo JE 98644, statue of Ipi;<sup>39</sup> limestone, h.: ca. 10 cm; late Sixth Dynasty, Saggara.
- 24. Louvre E 27492, statue of Heny;<sup>40</sup> limestone, h.: 27 cm; Sixth Dynasty or First Intermediate Period, provenance unknown.

At this point we have to remember that the so-called "cuboid seat" of Old Kingdom statues usually is rather distant from a regular geometric figure called "cube" (fig. 1a). As it has already been stated, the back surface of the seat often leans backwards (fig. 1b). The same tendency is quite common on the front surface (fig. 1c).<sup>41</sup> The top of the seat very often is not parallel to the base, but slopes towards the front (fig. 1d).<sup>42</sup> Sometimes all four sides of the seat are inclined inwards, so that the seat resembles a truncated pyramid (fig. 1e).<sup>43</sup> These features, which can be combined in different ways (e.g. fig. 1f), can be explained (in a more or less convincing way) as

follows: the front surface of the seat follows the shape of the calves of the seated person; the sloping top of the seat was interpreted by some scholars as a symbol of the resurrection of the represented person;<sup>44</sup> the "truncated pyramid"-shaped seat symbolized a mound (pyramid) or was just invented to improve the stability of the statue.<sup>45</sup> The leaning rear surface of the seat must be, however, explained in a quite different way:

- contrary to the front surface, its position was not limited by the position of the human figure;
- contrary to the top of the seat, the rear surface was not visible (Egyptian sculpture was strictly frontal) and it is difficult to find any symbolic explanation for its position;
- such statues were less stable than statues with a vertical (or forward-leaning) back surface
  of the seat.

The frontality of Egyptian sculpture makes us reject compositional or artistic reasons to explain the position of the rear surface of the seat. I think that the only possible reason was purely technical: the rear face of the seat is the remains of the surface of the original cube of stone from which the statue was made. That means that in this kind of statue, the remains of three surfaces of the original block were preserved: two side surfaces and the rear one, while the bottom of the base is not the original surface of the block (on the statues with a ver-

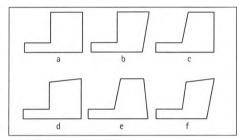


Figure 1

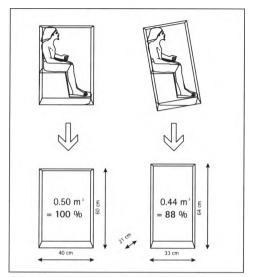
tical rear face, four surfaces of original block were preserved: two sides, the rear, and the bottom).

If this explanation is the right one, we could expect to find that—at least in some cases—the front surface of the base of the statue should also lean backwards, i.e. it should be parallel to the rear surface. And indeed such examples are known. That the sloping front surface of the base is really the remains of the original surface of the block may provoke skepticism, but in the case of at least two statues we have clear proof: on the sloping front surface of the base, fragments of a line marking the axis of the statue are preserved. We know that during the Old Kingdom the regular grid of proportions was not yet in use, but the sculptor drew the central axis of the figure and marked on it the most important points of the representation which he was going to execute. This axis was drawn at the beginning of the work and disappeared later, together with the original surface of the block of stone. Sometimes parts of it could be preserved on the front surface of the base of the statue—of course only if the front surface of the base is the remains of the original front surface of the block.

### Benefits of the technique

This technique could provide the sculptor with two benefits:

1. The block of stone needed for a statue with leaning rear face of the seat was smaller (about 10–15 percent of its volume) than the block for a "normal" statue, with vertical back face of the seat. On fig. 2 we can see an example: on the left side is a "normal" statue, with the perpendicular back face of the seat. Its dimensions are quite usual for a private sculpture of this period: it is 60 cm high, 40 cm long and 21 cm wide. Such a statue was sculpted from a block with a volume of 0.50 m3. On the right side is a statue of the same size, but with the back face of the seat leaning backwards. For this statue a smaller block was nec essary—its volume was about 0.44 m³, i.e. this block was about 12 percent smaller than the former one.



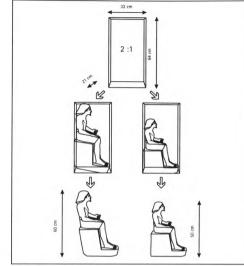


Figure 2

Figure 3

On the other hand, when the sculptor had at his disposal such a block—the height of which is approximately two times greater than its width—he could work with it using the technique in question, or he could use the "normal" technique (fig. 3). In the latter case, however, the final statue was considerably smaller—about 20 percent.

2. This technique must have been used for the production of seated statues from blocks, which by their proportions seemed to be predestined for standing statues (fig. 4). In blocks for

standing statues the proportion of the height (H) to length (L) of the block (H:L) was approximately 2.5:1. In blocks for "normal" seated statues this proportion H:L was about 1.5:1. The proportions of the blocks for statues sculpted in the technique in question were about 2:1. So this technique made possible "universal" blocks, which were equally suitable for standing as well as for seated statues.

Finally, we have to mention that some standing statues have back-pillars leaning backwards;<sup>47</sup> a similar feature can sometimes be observed on scribe statues.<sup>48</sup> The explanation must be similar, as in the case of seated statues: the sculptor wanted to use the block of material at his disposal in the most efficient way.

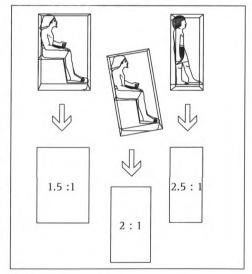


Figure 4

### Notes:

- 1 Eg. Cairo CG 57, L. Borchardt, Statuen und Statuetten von Königen und Privatleuten CG 1-1294 I (Berlin, 1911), 51, Pl. 15.
- 2 Eg. Cairo CG 58, Borchardt, Statuen, 51-2, Pl. 15.
- 3 Eg. Cairo JE 98946, Z. Hawass, "A Group of Unique Statues Discovered at Giza. III. The Statues of *Jnty-šdw* from Tomb GSE 1915," in N. Grimal (ed.), *Les Critères de datation stylistiques à l'Ancien Empire* (*BdE* 120; Le Caire, 1998), 204, figs. 13–16.
- 4 Eg. Cairo CG 150, Borchardt, Statuen, 109, Pl. 33.
- 5 Eg. the famous bust of Ankh-haf, Boston MFA 27.442, PM III<sup>2</sup>, 196.
- 6 H. Junker, Giza IX (Wien, 1950), 181.
- 7 See E. Martin-Pardey, Plastik des Alten Reiches 2, CAA Hildesheim 4 (Mainz, 1978), 83-88.
- 8 Eg. statue of Meryrehashetef, Copenhagen, Ny Carlsberg Glyptotek ÆIN 1560, M. Jorgensen, Catalogue Egypt I (3000–1550 B.C.), Ny Carlsberg Glyptotek, (Copenhagen, 1996), 94–95, n. 34.
- 9 Eg. statues of Metjetji: Boston MFA 47.1455, Brooklyn 50.77, Brooklyn 51.1, Brooklyn 53.222; Kansas City, William Rockhill Nelson Gallery 51–1; P. Kaplony, Studien zum Grab des Metheti (Bern, 1976), 55–70.
- 10 Eg. granite scribe statue placed on wooden and limestone bases, Louvre E 12629, 12631, Ch. Ziegler, Les statues égyptiennes de l'Ancienne Empire. Catalogue Louvre (Paris, 1997), 64–68); granite scribe statue installed in wooden bases, Cairo JE 65907, PM III<sup>2</sup>, 724; diorite seated statue on limestone base Brooklyn 37.23E, T.G.H. James, "The Northampton Statue of Sekhemka," JEA 49 (1963), 9–12, Pl. iii.
- 11 Eg. Cairo CG 95, Borchardt, Statuen, 75, Pl. 21.
- 12 Eg. Hildesheim 16, E. Martin-Pardey, Plastik des Alten Reiches 1, CAA Hildesheim 1 (Mainz, 1977), 30-38.
- 13 Eg. Hildesheim 2144, CAA Hildesheim 1, 126-132; Leipzig 3155, R. Krauspe, Katalog Ägyptischer Sammlungen in Leipzig. Band 1. Statuen und Statuetten (Mainz, 1997), 56-57, [cat. 105], Pl. 46.
- 14 Eg. Hildesheim 17, CAA Hildesheim 1, 39-46; Boston 12.1488, PM III<sup>2</sup>, 65.
- 15 Eg. Leipzig 3684, Krauspe, *Katalog Leipzig*, 47–48, [cat. 97], Pl. 36; Hildesheim 2972, *CAA Hildesheim* 4, 58–64; Louvre N 2293, Ziegler, *Les statues égyptiennes*, 164–67 [cat. 45].
- 16 There is also at least one royal statue with the back surface of the throne clearly leaning backward. It is an alabaster life-sized statue of Mycerinus, Cairo JE 40703, PM III<sup>2</sup>, 29.
- 17 PM III<sup>2</sup>, 466; Ziegler, Les statues égyptiennes, 116-119, [cat 32].
- 18 PM III<sup>2</sup>, 499-500.
- 19 PM III<sup>2</sup>, 298; Ziegler, Les statues égyptiennes, 82-86, [cat. 23].
- 20 PM III<sup>2</sup>, 269.
- 21 PM III<sup>2</sup>, 584.
- 22 PM III<sup>2</sup>, 505.
- 23 PM III<sup>2</sup>, 724.
- 24 PM III<sup>2</sup>, 113; CAA Hildesheim 1, 91-98.
- 25 Ziegler, Les statues égyptiennes, 174-76, [cat. 48].
- 26 PM III<sup>2</sup>, 465; Ziegler, Les statues égyptiennes, 128-30, [cat. 35].
- 27 PM III<sup>2</sup>, 465; Ziegler, Les statues égyptiennes, 131-34, [cat. 36].
- 28 Ziegler, Les statues égyptiennes, 155-59, [cat. 43].
- 29 PM III<sup>2</sup>, 93.
- 30 PM III<sup>2</sup>, 275.
- 31 PM III<sup>2</sup>, 110; CAA Hildesheim 1, 16-22.
- 32 PM III<sup>2</sup>, 116; CAA Hildesheim 1, 23-29.
- 33 PM III<sup>2</sup>, 117; CAA Hildesheim 4, 11-18.

- 34 PM III<sup>2</sup>, 723.
- 35 PM III<sup>2</sup>, 723.
- 36 PM III<sup>2</sup>, 120.
- 37 PM III<sup>2</sup>, 217; B. Jaroš-Dekert, E. Rogge, Statuen des Alten Reiches, CAA Wien 15 (Mainz, 1993), 144-49.
- 38 PM III<sup>2</sup>, 730; Ziegler, Les statues égyptiennes, 120–22, [cat. 33].
- 39 Unpublished, excavations of P. Munro.
- 40 Ziegler, Les statues égyptiennes, 87-89, [cat. 24].
- 41 Eg. Leipzig 2560, Krauspe, *Katalog Leipzig*, 51–53, [cat. 101], Pl. 40,3–41,4; Hildesheim 1, *CAA Hildesheim* 1, 1–8.
- 42 Eg. Louvre N 114 (A 109), Ziegler, Les statues égyptiennes, 171-73 [cat. 47]; Wien ÄS 74, CAA Wien 15, 1-5.
- 43 Eg. Cairo CG 219, PM V, 73; four statues of Ni-ankh-Pepi, S. Hassan, Mastabas of Ny-ankh-Pepy and Others, Excavations at Saqqara, 1937–1938 II (Cairo, 1975), Pls. 6–11.
- 44 W. Westendorf, Altägyptische Darstellungen des Sonnenlaufes auf der abschüssigen Himmelsbahn MÄS 10 (Berlin, 1966), 57.
- 45 R. Schulz, Die Entwicklung und Bedeutung des kuboiden Statuentypus II (Hildesheim, 1992), 751.
- 46 Statue Cairo CG 35 (see note 18 above) and alabaster statue of Mycerinus, Cairo JE 40703 (see note 16 above).
- 47 Eg. Leipzig 2559, Krauspe, *Katalog Leipzig*, 53–54, [cat. 102], Pl. 42; Wien ÄS 7785, *CAA Wien* 15, 72–76.
- 48 Eg. Cairo JE 60547, PM III<sup>2</sup>, 65.