

Looking for contexts: recent work on the Karnak Cachette Project

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STATUES IN CONTEXT

Production, meaning and (re)uses

edited by

Aurélia MASSON-BERGHOFF



PEETERS LEUVEN – PARIS – BRISTOL, CT 2019

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LOOKING FOR CONTEXTS: RECENT WORK ON THE KARNAK CACHETTE PROJECT

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Abstract

The Karnak Cachette, excavated by Georges Legrain between 1903 and 1907, is one of the most fascinating discoveries of Egyptian archaeology and an exceptional source for the study of Egyptian statuary (e.g. Bothmer 1960, 151-3; De Meulenaere 1998). However, the recontextualisation of the finds remains a desideratum, as the huge quantity of statues found in this favissa can hardly be used as pieces of evidence for reconstructing the history and archaeological evolution of the temples of Karnak when deprived of any precise connection with their context beyond the mere label 'found in Karnak'. Even this label should sometimes be considered with caution, as it may be a matter of discussion whether a statue belongs to the Cachette corpus. This contribution will present an overview of the different issues raised by the 'contexts' of statues, which have been addressed by the Karnak Cachette Project since its beginning in 2006.

The historiographical context and the limits of the corpus

As far as 'old' discoveries are concerned, a historiographical approach is a priority in order to understand the nature of the documentation which is available (and which is lacking) and to produce new data from it. As several historiographical surveys of the Cachette's discovery and its scientific exploitation have recently been published (Azim and Réveillac 2004; Jambon 2009; Coulon and Jambon 2016), we will restrict ourselves here to a few summary statements, with a special focus on the uncertainties surrounding the delimitation of the corpus.

An incomplete archaeological process

In October 1901, Legrain, following the instructions given by Gaston Maspero, began the systematic clearance of the courtyard between the southeast corner of the Great Hypostyle Hall and the seventh pylon. Legrain started by excavating the base of the walls of the courtyard and the feet of the seventh pylon itself. Within a few months, he found there two pillars of Senwosret I, two sphinxes of Amenhotep II, twelve statues and a stela which had originally adorned the north face of the seventh pylon, and many loose blocks, in particular those of a gate of Amenhotep I (Azim and Réveillac 2004, I, 254-73; II, 182-200). The depth reached by Legrain in this area is not clear but the level could be the same as that of the pillar of Senwosret I or the fragments of the gate of Amenhotep I, which is 72.34m (Legrain 1904a, 31). It is significant to note that this level seems to correspond approximately to the base of the foundation of the seventh pylon.

Thus, by the end of Legrain's seventh mission in Karnak, the southern third of the courtyard had been thoroughly excavated. During the next archaeological season (1902–3), Legrain devoted time to sorting out the blocks already discovered, especially those of the gate of Amenhotep I, which he thought he could rebuild in the courtyard (Azim and Réveillac 2004, I, 264–8; II, 189–94). However, some blocks were still missing, and Legrain obtained permission from Maspero to continue the excavation of the courtyard heading north in order to look for them. The work started there mid-December 1903, after the infiltration waters had receded. The discovery of the Cachette itself occurred on 26 December 1903, with the first group of finds including the stela of Sety I (see below, 'The context

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of burial'). In the subsequent months, Legrain continued to excavate around this location and 5m south of these first finds, he reached, in June 1904, the level of 67.15m.¹ The next season, the pit became a deep chasm: 'We are now reaching 15 or 16 metres (it's dizzying, when one is at the top!) and we are still making discoveries' (Legrain's letter to Maspero, 27 May 1905 [Ms. IdF 4027]). More than eight hundred statues, sixteen to seventeen thousand bronze statues and many other objects were found during four campaigns between 1903 and 1907 (Azim and Réveillac 2004, I, 275-335; II, 201-302; Jambon 2009). The excavations were brought to an end owing to the risks to which the workers were exposed and the low number of objects discovered during the 1907 season (Azim and Réveillac 2004, I, 283). The work was resumed in this area between 1955 and 1958 by S. Adam and F. el-Shaboury in order 'to clear the whole courtyard down to virgin soil', but it is unlikely that this goal was attained according to the poor documentation, mostly photographs, which is available to us (Biston-Moulin and Boraik 2017, 40, n. 9).

Although Legrain himself, like other Egyptologists of his time, immediately began to study and publish some of the objects discovered in the Cachette (Coulon and Jambon 2016, 95-100), the legacy of this extraordinary discovery was somewhat disrupted by a series of unfortunate circumstances, of which the First World War and the untimely death of Legrain in Luxor (in August 1917) were the most serious. After that, and for more than three decades, there would be only isolated progress. It is only from the 1950s onward that the work really resumed, with the patient inquiry conducted by Bernard V. Bothmer and Herman De Meulenaere (Coulon and Jambon 2016, 105-12). Later, substantial progress was made at the beginning of the 21st century, the year 2004 being particularly auspicious, with an exhibition presented in Grenoble (Goyon and Cardin 2004) and the publication of the seminal work of Michel Azim and Gérard Réveillac on Legrain's photographic archives (Azim and Réveillac 2004).

However, the valuable catalogue of finds published by Azim and Réveillac remained incomplete, as it was based only on the photographs available to the authors,² a situation which was not remedied by other resources, such as Porter and Moss, Topographical Bibliography. To overcome this limitation, a database project was launched in 2006 at the Institut français d'archéologie orientale (IFAO), enhanced in 2008 by the signature of a cooperation protocol with the Egyptian Ministry of State for Antiquities, then the Supreme Council of Antiquities (SCA) (Coulon and Jambon 2016, 114-7).³ The creation of a database was a response to the need for a flexible tool to deal with this massive and somewhat polymorphic material. Only a modifiable database could, on the one hand, offer updated information for each object and, on the other, provide an overview of all items from the Cachette, allowing users to search this corpus according to various criteria. The Karnak Cachette database was put online in November 2009, and has been regularly updated thereafter. In its second version, which was put online in January 2012, more than eight thousand photographs were included, those taken by Bothmer for the Corpus of Late Egyptian Sculpture and those taken by our team at the Egyptian Museum in Cairo between 2008 and 2010.

The overwhelming majority of the corpus consists of statuary, of which private and royal statues of various kinds and different periods today form the lion's share.⁴ This results from the fact that most of the bronze statues, mainly statues of deities and especially of Osiris, mysteriously disappeared after the excavations (Jambon 2009, 271-5; for the few nowadays in Cairo Museum, see B-CK 858, 957, 1054). Beside statuary, the Cachette has also yielded many stelae (for example B-CK 32, 687, 813, 831, 950), but also pieces of sacred furniture from the temple, such as a series of five altars and one inscribed measure of capacity, all with the name of Thutmose III (respectively B-CK 234, 376, 1062–4 and 238). Damaged bronze hieroglyphic signs with cramps (B-CK 818-20, 857, 914-6) or small pieces of faience for inlay work (for example B-CK 855, 893 or 910) are also likely to be part of this same furniture, but it is, however, difficult to grasp the function in Karnak of a piece of jewellery such as the ring of Nefertiti (B-CK 721), or of a cosmetic jar in

¹ The measurements were calculated through the photogrammetric processing of Lythgoe's photographs, see below, 'The context of burial'.

² For instance, only a part of the photographs kept in the Kuentz's archives were included in this book. For the second part, see Coulon and Jambon 2016, 100, n. 46.

³ <http://www.ifao.egnet.net/bases/cachette/>. The objects in this database are quoted here by their "B-CK" [Base Cachette de Karnak] number.

⁴ See Legrain 1906a; Legrain 1909; Legrain 1914; Josephson and el-Damaty 1999; and the online database Cachette of Karnak: http://www.ifao.egnet.net/bases/cachette/>.

the shape of a hedgehog with a woman lying on it (B-CK 908).

The fuzzy boundaries of the corpus

Although the catalogue of Legrain's finds in the Cachette has been much enriched by recent research, it must be admitted that to encompass the totality of the content of the Cachette is still (and is doomed to remain) an unreachable aim. Firstly, as already mentioned, the excavations were left unfinished in 1907 and the work carried out between 1955 and 1958 did not prove sufficient to complete them. It is, therefore, most probable that all the elements initially belonging to the Cachette have not been unearthed yet. As for those which were found during the excavations, some of them disappeared soon after their discovery. We have already alluded to the mysterious fate of the thousands of bronze statuettes excavated there, for which, at least, there is still a hope that, one day, they will be rediscovered. There can be no such hope for the 'true shoal of wood furniture and statues' that Legrain 'fished' from the muddy waters of the Cachette in May-June 1905. He had no technical way to preserve these fragile items and despite his efforts, these 'ten cubic metres' of wooden objects, once put in contact with fresh air, left nothing but a 'thick brown mud on the fingers' and 'the regret of not having been able to save these fugitive wonders from the oblivion where they have instantly fallen' (Legrain 1906b, 145-6).

The absence of a precise register of the finds made by Legrain in the Cachette is also undoubtedly a major obstacle to its exact appreciation. For some objects, the provenance is doomed to be doubtful, as there is not sufficient evidence to assert that they were found in the Cachette. Thus, three stone statues of Osiris which were formerly part of the Fr. W. von Bissing collection and are now kept in Munich and Hanover (B-CK 1215–7) could have possibly been found in the Cachette, but a Medinet Habu provenance cannot be discounted (Coulon 2016b, 507–9). This absence of reliable inventory has been only partially filled through the recent rediscovery of some notebooks of the longlost (and still partially missing) Journal de fouilles of Legrain, which are now kept at the Louvre Museum.⁵ One of these diaries, entitled 'Cachette', which covers the period between 5 December 1903 and 3 April 1904, includes the list of the 162 first K numbers given by Legrain (Fig. 1). This list is essential to reconstruct the chronology of the finds and the assemblages of statues transferred from the temple to the Cachette. We had already, within the framework of the IFAO-SCA cooperation protocol, scrutinised the Cairo Museum registers, in particularly the Journal d'Entrée and the Temporary Register. Both contain valuable information on the history of the objects, especially regarding the 'K numbers' inventory, namely the list of the objects discovered by Legrain in Karnak mainly in the Cachette (Azim and Réveillac 2004, 293-5; Jambon 2009, 245–51, 256–64). This inventory can be completed, at least for the 162 first entries, by the list from Legrain's notebook 'Cachette' (Jambon forthcoming).

However, it should be kept in mind that the finds made by Legrain in the Cachette and in other places at Karnak and its immediate neighbourhood were registered by him in the same inventory, as exemplified by the first number of the list, 'K1', the group statue of Sn-nfr and Sn(t)-n(3)y (Cairo CG 42126), which was found to the north of the Great Hypostyle Hall. In some cases, the data collected from the recently found archival documents allowed us to dispel the doubts concerning the provenance of an object with a 'K' number. Thus, the group statue of P3-šrj-n-t3-jswy, 'š3-jht and Nfrt-jj.w (K5, Cairo JE 36576), whose exact provenance was until recently uncertain, is now securely attributed to the Cachette based on the information provided by Legrain's letters and diaries together with photographs and notes taken by Lady Cecil during her visit to him.⁶ In other cases, the attribution to the Cachette is an option, but remains hypothetical. Thus, the main fragment of a large statue of P3-dj-Jmn-jpt (Cairo T.R. 27/1/21/1) has been included in the Karnak Cachette database (B-CK 1197), like many fragments registered as 'Karnak Legrain's finds' in the Egyptian museum's registers, but its exact provenance is unknown (Coulon 2016c, 99). Moreover, a wooden box

⁵ Briefly discussed in Coulon and Jambon 2015; detailed studies of some of these papers will be published in a forthcoming volume of the *Cahiers 'Égypte Nilotique et Méditerranéenne'*.

⁶ See the commentary on B-CK 5: <http://www.ifao.egnet.net/ bases/cachette/?id=5> (last consulted 16 June 2018). For Lady Cecil's testimony, see Cecil Reid 2016, 188–9, fig. 13.

recently found in the basement of the Egyptian Museum in Cairo has yielded many stone fragments, most probably gathered by Legrain, which are possibly to be ascribed to the seventh pylon's favissa (Selim 2016, 249, with ref.). In one case, a join was even made between one of these fragments and the statue Cairo JE 37143 found in the Cachette (Selim 2010, 275, 282-3). Though, in this case, it is very probable that the two parts of the statues have the same provenance, it should be noted that different fragments belonging to one statue were sometimes found inside and outside the Cachette (Bothmer 2004 [1981], 352, n. 8).

The context of burial

Obviously, the first type of context which is to be taken into account concerning the statues found in the Cachette is the cache itself. Legrain's diaries have provided us with a precise evocation of the first days of the discovery, including some sketches of the disposition of the first objects during December 1903 and the beginning of January 1904. One of these sketches (**Fig. 2**) shows the position of the large stela of Sety I (B-CK 686), laid on a layer of sand containing some silt

covering a group of statues of various periods (Legrain 1904b, 272-3; the first three statues are B-CK 3, 17 and 18). However, our knowledge of the archaeological context of the rest of the objects found, that is their precise position inside the cache, and the contours of the pit itself, is limited. At the time of Legrain, stratigraphic methodology was not commonly used in excavations. Even if it had been, the very specific conditions of these digs, in the Nile Valley in the early 1900s (with not only the seasonally rising water table, but also the inundation itself still very active), would have made its use very uncertain. Suffice it to recall that, when Maspero wrote a vivid report to explain to the French educated public what was happening in the Cachette, he did it under the heading 'Fishing for statues in the Temple of Karnak' (Maspero 1910 [written in February 1905]; see Azim and Réveillac 2004, I,

Liste des statuts découvertes 1. Sonnofir se famille Copre Hor 12 Patoubart Copie d'artampe 3. amenmbal - Emeraule Harmbali 4. Pscheretasoni et Jamille 5 bele 2 Jusitase III 6 bete & Jusitase III Statue se Mentouhotes Ramses nakhton Cohie 10apmis - Saile Estampi 11-Petamenah. Envoyés an Musei Estampe 12. Roi du maye mapure an Khou. 13_ 14amenother II Copie 4-15. Ramouit , Cohre 16. Oumofre 1 Come 17. Khai Come 18. Come 19-Merenhtak Come 20amonmosou x Copie 21lot mout elanch he Je Betamon 22 -Nerpanh. 23 _ x Copie

Fig. 1: A page of Legrain's diaries with the beginning of the list of the statues discovered in 1903–4, mostly in the Cachette. Cahiers Legrain 1903–1904. © DAE, Musée du Louvre.

281–2; Coulon, Jambon and Sheikholeslami 2011, 27). Nonetheless, the somewhat blurred picture resulting from these circumstances can be improved, by using various archival material.

From archival photographs and plans to photogrammetry

As already mentioned, the spatial documentation concerning the excavations in the Cour de la Cachette is very poor. Though Legrain reported some measurements or some sketches in his diaries, these indications do not allow the stratigraphy of the Cachette to be reconstructed clearly. In this respect, the photographs taken during Legrain's clearances are a more significant source of information. They provide insights into the condition of the work — the number of workers,

24 6 Danvier 1904. Les caux baisent de plus en plus et aupurthie pai fait reprendre les rectoerches an point re couver par la stele de Seta 125 _ Nous avons découvert, intacte la statue de Hor, qui veait sous Padoubant L' nous faisons une coupe du torrain en al endrait nous aurans en croques stele se fele 129 2 3 4 Statue Minen Plature Se lika statue etail couchie du le das len tele au no. a cole d'elle à Statue de Hor "oued start un pagmene de stell Southoutment the bosand Who Its un peu sur l'aile gauche de la Statuelle de Maspasele herrique En 8 soul les pagments de la statue nº 9 page 19. puis una autre bloc thes ling the gros dant fe n'ai pu encore reconnactu mi la nature mi la forme car tout ceu comme la statue d'Hor nage encore plune back sourle milhetten

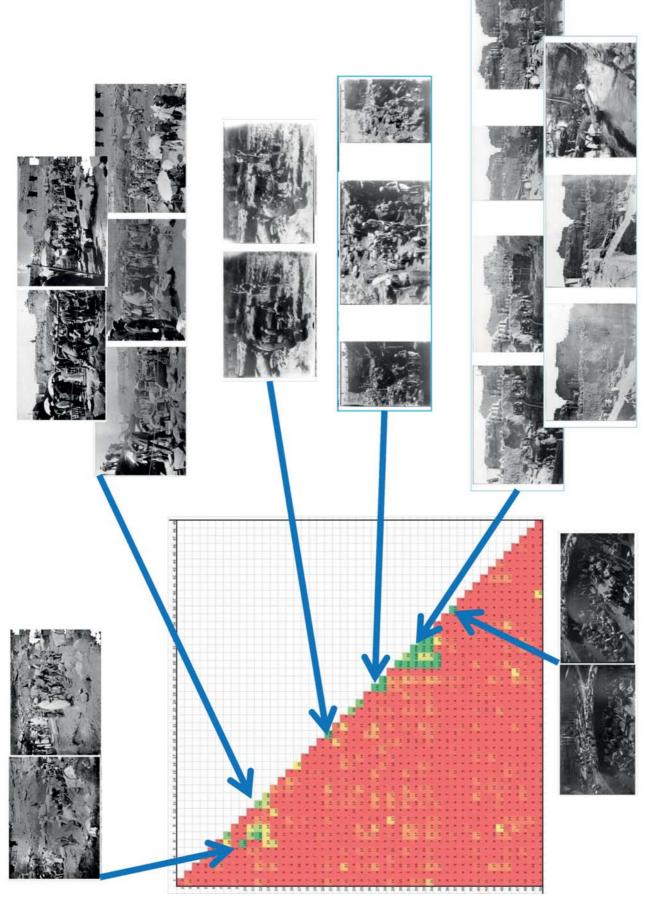
Fig. 2: Sketch showing the location of the first objects discovered in the Cachette. December 1903. Cahiers Legrain 1903–1904.© DAE, Musée du Louvre.

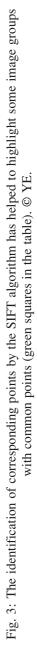
materials, positions of the ramps, berms and archaeological artefacts — and they are, moreover, a useful complement to the textual notes. At the present time, building on Azim and Réveillac's catalogue, our team has gathered fifty-two pictures related to the Cachette's excavations, taken by Legrain himself or, more often, by visitors and tourists. This corpus of photographs is, therefore, characterised by a great disparity of origin and quality. In regard to the site as shown in the pictures, it appeared to us that some of the photographs could be used as stereoscopic pairs. In other words, we assumed that it could be possible to retrieve 3D information through these sets of old pictures. While it could work in theory, this specific use of photos that were not originally intended for photogrammetry remains a challenging issue. To the best of our knowledge, it seems that such an exploitation of a photographic archive had never been tried before in archaeology. Concerns remain specifically in the lack of metadata relative to the pictures. Photogrammetry requires technical information such as the focal length and the size of the 'captor', which are now available in the EXIF (exchangeable image file format) files issued by digital cameras. Unfortunately, the exact nature of the photographic material used by Legrain and the other photographers who took pictures of the excavations is unknown (Azim and Réveillac 2004, I, 76). Moreover, the pictures which have been collected are of widely varying quality and mostly of poor resolution. In spite of these difficulties, the context of the Cachette courtyard was a perfect framework to undertake experimentation and to improve the technical process.

The compilation and the detailed analysis of the pictures was the first step. All the pictures were documented by author and date, numbered, resized and sorted chronologically. For each scene, the position and the orientation of the camera have been roughly deter-

mined; the data were positioned on a map to highlight possible associations of pictures which could work as stereoscopic pairs. An automatic correlation system based on SIFT (scale-invariant feature transform) point matching has also been tested to match up the images. This second process was much more efficient than the first one by bringing into focus several groups of photos (**Fig. 3**). Among these results, a more precise analysis allows us to detect two batches of pictures. The most interesting one consists of seven photographs which were taken one after the other by the same photographer, A.M. Lythgoe, during the first campaign of excavations, between May and June 1904.⁷

⁷ The images are now kept at the Metropolitan Museum in New York. See Goyon and Cardin 2004, 16.





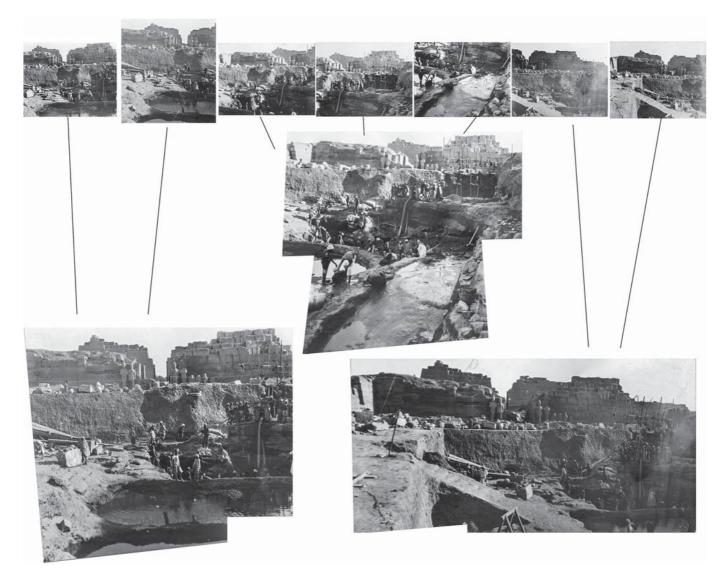


Fig. 4: Group of seven photos of the same scene. The identification of corresponding points by the SIFT algorithm has helped to bring out the fact that they could be arranged in three panoramic images. © A. M. Lythgoe, MMA New York.

Furthermore, the identification of corresponding points by the SIFT algorithm showed that this batch was in fact a set of overlapping photographs intended to create panoramas of the same scene, taken from three different positions (**Fig. 4**). The images were then stitched together to finally set up three panoramic views. The second group is made up of two photos taken on 21 January 1904 (**Fig. 5**).⁸ The two shots looking south were probably taken from the top of the northern wall of the Cour de la Cachette from two different positions. These two overhead views show a very

excellent overlap, the two images cannot be easily processed due to the lack of control points on both pictures. The walls of the Cour de la Cachette are visible at the top of one image only. This situation, therefore, makes the positioning of the model in the space impossible.

interesting group of scattered blocks. In spite of an

Once the potential assessment of our archives had been completed, a linkage between the pictures and the field was required, which involved taking measurements in the field of some details visible on the old

⁸ Published as figs 11 and 12 in Cecil Reid 2016, 187. We are indebted to the author for allowing us to include these photographs in this article.

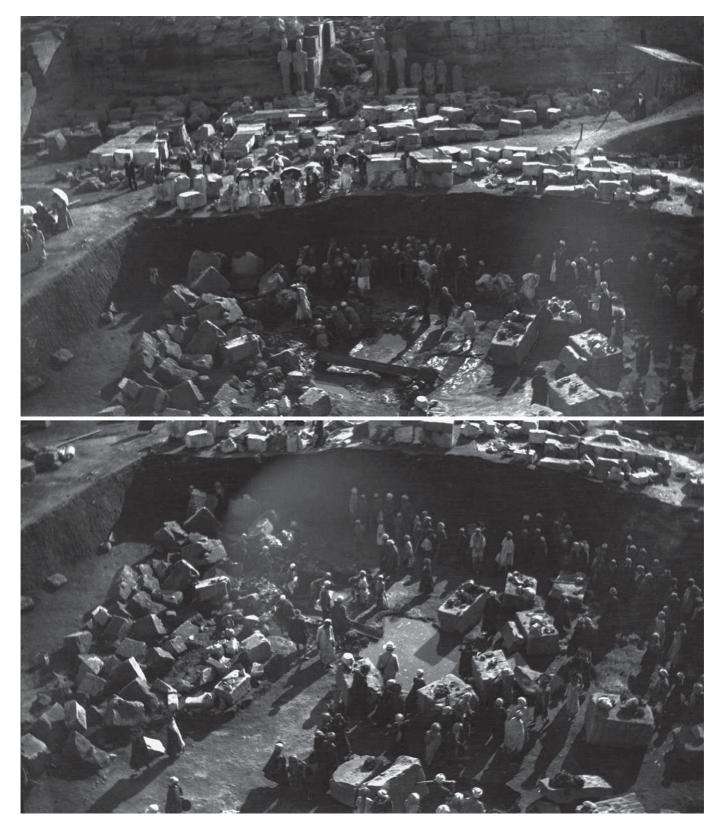


Fig. 5: Pair of images tested for photogrammetric process. The calculation of this set of pictures is problematic owing to the lack of control points on both images. The walls where these points can be measured are visible on only one of the shots. © Coll. A. Cecil Reid.

pictures. Fortunately, the context had not dramatically changed: the four large walls surrounding the courtyard have remained about the same over the past century. Basically, it was necessary to measure natural points previously spotted in the old pictures with a theodolite (total station). However, this task would have taken too long in the field and would have been restricted to a selection of pictures only. Therefore, it was thought preferable to make a complete textured 3D model of the context, as recent technological advances in photogrammetry allow topographic 3D models of any context to be produced quite easily.

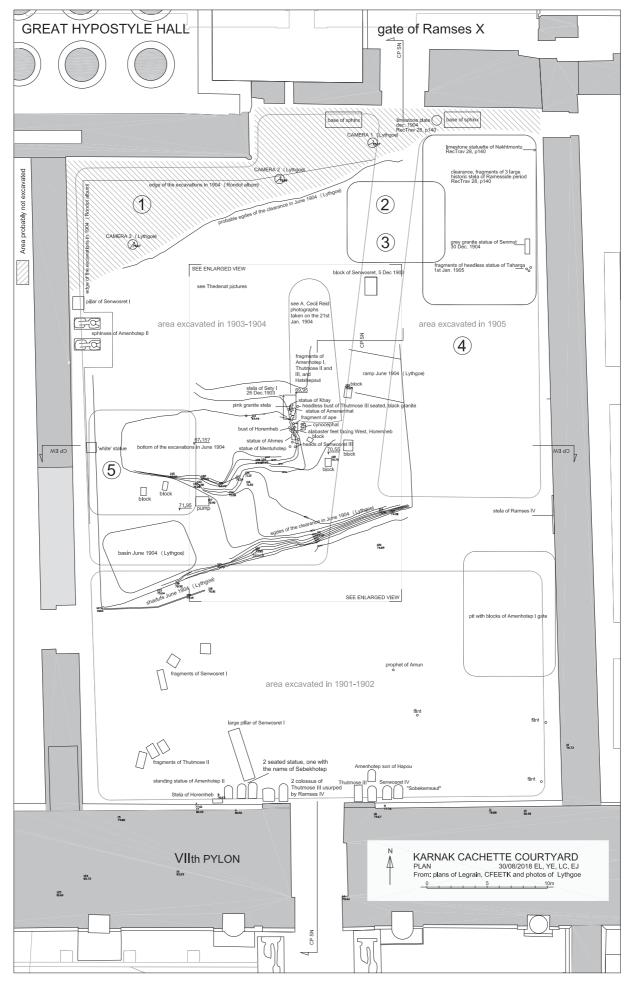
In September 2015, topographic data were collected during a short campaign carried out by the authors at Karnak. In the field, several hundred photographs were taken, not only in the Cour de la Cachette $(58 \times 48m)$ but also in other parts of the temple which are visible in the archive photographs, such as the standing obelisk or the first and eighth pylons. A topographic survey of the area was also completed and geo-referenced inside the Karnak temple system, which guarantees its permanent validity. The complete 3D model of the Cachette was computed with Photoscan software. The archival photographs were processed using a suitable photogrammetric method based on the Redresseur and Cumulus softwares developed by Yves Egels. The Redresseur software has been improved in order to deal with the underlying problem of the material used: the old cameras were equipped with decentered lenses, creating distortions that must be taken into account. Firstly, three parameters had to be determined for each image: the camera position, the orientation and the focal length. Secondly, automatic correlation was processed when the overlapping of the pictures was sufficient. For example, the berm facing north — clearly visible on one of Lythgoe's pictures - has been successfully restituted in volume with this method. Curves were also calculated. Nevertheless, the calculation of a 3D model has been restricted to this single case. The coordinates of points were indeed mostly determined manually. This operation undertaken on the Redresseur software consists in linking common details - the socalled 'tie points' - visible on at least two pictures. Control points already determined in xyz are also required to scale and orient the model. After

⁹ The unique plan of the Cachette courtyard drawn by Legrain is entitled 'plan des fouilles de 1901–1902 au VII^e pylône' (digital version: Cfeetk n°61940). calculation, the coordinates of the tie points were determined.

The spatial information gained with this photogrammetric method were put together on plans (**Figs 6–7**) and sections (**Figs 8–9**). These synthetic documents were also completed with other data such as a plan,⁹ as well as sketches and notes, recorded by Legrain. They allow our knowledge of the Cachette stratigraphy to be understood at a glance. It has been observed that the diagrams provided by Legrain, although on the surface very simple, are in fact very accurate. For example, the measurements on the one which illustrates the letter sent to Maspero (written 19 April 1904; see Azim and Réveillac 2004, 289) are fairly consistent with the data provided by the photogrammetric process using Lythgoe's pictures.

A burial made in a single process

Another important source for reconstructing the context of the cache is the aforementioned 'K numbers inventory', which made possible the partial reconstruction of the chronology of the excavations, and, conversely, the establishment of a rough 'chronostratigraphy'. The latter shows, for example, that royal monuments were mostly found together in the Cachette, from which it can reasonably be inferred that they were buried together. More surprisingly, this list shows too that the 'scribe statues' belonged to the same excavated areas (Jambon 2016, 141-7). In general, this study has led to the conclusions that, although there were New Kingdom statues from the top to the bottom of the Cachette, the number of the most recent statues, from the Late Period to the Ptolemaic era, increased progressively as the excavation became deeper. A very interesting example of this is provided by the statue of Plato son of Plato (B-CK 608; Coulon 2001), which can be securely dated to 98 BC and was found in May 1905, very deep in the Cachette. Thus, if recent objects were buried together with more ancient ones, from the top to the bottom of the Cachette, it is difficult to suppose that there were several successive trenches in the Cachette, and it is most likely that this repository was created at one time, as Legrain himself concluded (Legrain 1905, 66; Jambon 2016, 136–9).



The purpose and date of the Cachette

To conclude this section on the context of burial, it may be worthwhile to say a few words concerning the raison d'être of the Cachette of Karnak. From the very first discoveries, Legrain sought to establish the date on which the Cachette had been created as well as its purpose. To these ends, he paid close attention to the condition and the relative position of the objects he found and took a great interest in their dating, in particular for the latest ones. From these observations, he suggested that the burial must have taken place in the last decades of the 1st century BC, when the Theban region had experienced major politico-military troubles. Legrain supposed that the Theban priests wanted to protect the treasures of the Karnak temple from a future attack or a siege (Jambon 2016, 131-2; Jambon forthcoming). Although the dating suggested by Legrain seems to be correct, no real 'treasure' has ever been found there, and therefore this scenario has to be corrected.

The Cachette may rather be seen as a ritual deposit, a *favissa*, where objects that were damaged or had fulfilled their ritual purpose would have been discarded. As has been stressed elsewhere, the Karnak Cachette is perhaps exceptional in its wealth and its size, but is by no means a unique phenomenon (Valbelle 2016; Jambon 2016, 155–9; Charloux and Thiers in press). When comparing the Karnak Cachette with other deposits, for example the Luxor Cachette, some common characteristics are observed, such as the presence of a flat object sealing the top of the cache (that is, in the case of the Cachette, the stela of Sety I), the choice of an open area at a strategic place within the temple, and some specific arrangements of parts of the same statue in different locations.

In the light of this comparison, we came to the conclusion that, even if the constitution of the Cachette resulted obviously from removals related to concrete problems in the temple, and as such was probably part of a ritual purification, nevertheless it also has specific characteristics which connect it with prophylactic magic and funerary procedures (Jambon 2016, 159-63). This last possibility is supported not only by the presence of the aforementioned huge quantity of Osiris bronze figures in the Cachette, which would fit this ritual purpose, but also by the discovery in December 2014 of a small cache near the temple of Ptah of Karnak. This hiding-place, carefully excavated, revealed a lot about the conditions of its ritual implementation, the authors reaching the conclusion that 'the favissa of the temple of Ptah constitutes an exceptional example of the grave of a statue of a god situated close to its main place of worship' (Charloux et al. 2017, 1202; see also Charloux and Mahmoud in this volume).

Although we do not have, up to now, any Egyptian text describing the performance of such a ritualised

Fig. 6: Plan view of the Cachette courtyard with the spatial information determined by photogrammetric process or retrieved from Legrain's diaries and reports. © E. Laroze, Y. Egels, L. Coulon and E. Jambon.

Additional legends referring to the numbers on the plans

- (1) 'The excavation has not been pursued as further north and west as would have been necessary to retrieve all the monuments which are still hidden there. By venturing further than I did, I would have risked the collapse of either the west wall, where the treaty of the Khetas is carved, or, on the northern side, of the corner of the hypostyle hall where is the Poem of Pentaour' (after Legrain 1906b, 144).
- (2) 'When, in May and June [1905], we reached a depth of nine and ten metres, we met, in the north part of the Cachette, a true shoal of wood furniture and statues, approximately ten cubic metres' (after Legrain 1906b, 145).
- (3) 'At a depth of eight and nine metres, we have found very brown bones (...). Among the most curious ones, I would mention the maxilla of a little child, the head of a carnivore and a great number of ovines' bones' (after Legrain 1906b, 146).
- (4) 'The ground consists of a natural occurring deposit, made of sand layer alternating with clay layer deposited according to [Legrain] by the flood' (after Azim and Réveillac 2004, 281).
- (5) 'I think, I would ask you to tear down a part of the west wall, north of the door and south of the Khetas, for we have fourteen metres there, nearly vertical, and still more antiquities' (from a letter from G. Legrain to G. Maspero, 27 May 1905, Ms. IdF 4027).
- (6) 'We are now reaching 15 or 16 metres (it's dizzying, when one is at the top!) and we are still making discoveries' (after a letter from G. Legrain to G. Maspero, 27 May 1905, Ms. IdF 4027).

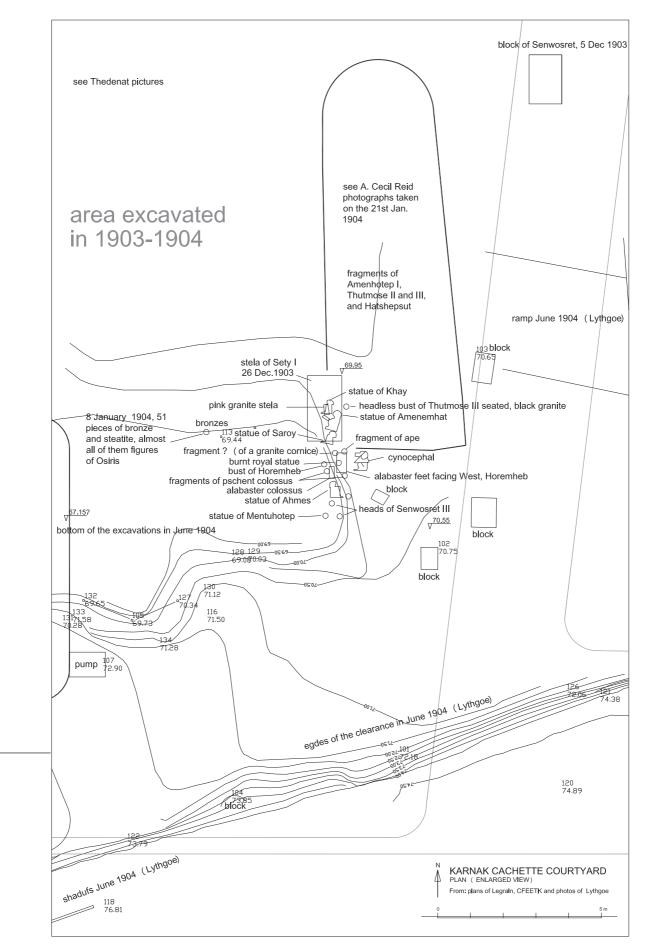
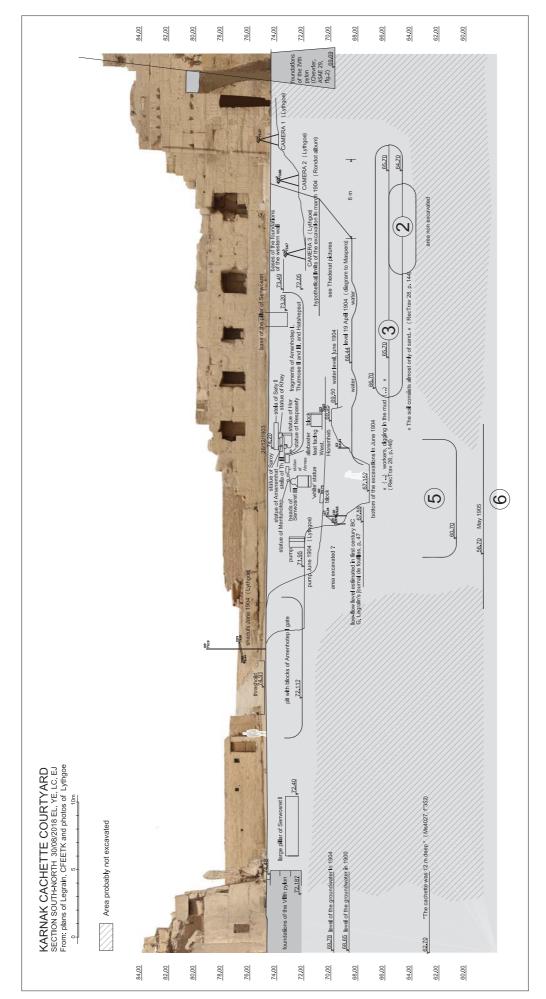


Fig. 7: The central part of the Cachette courtyard (enlarged view of Fig. 6). © E. Laroze, Y. Egels, L. Coulon, E. Jambon.





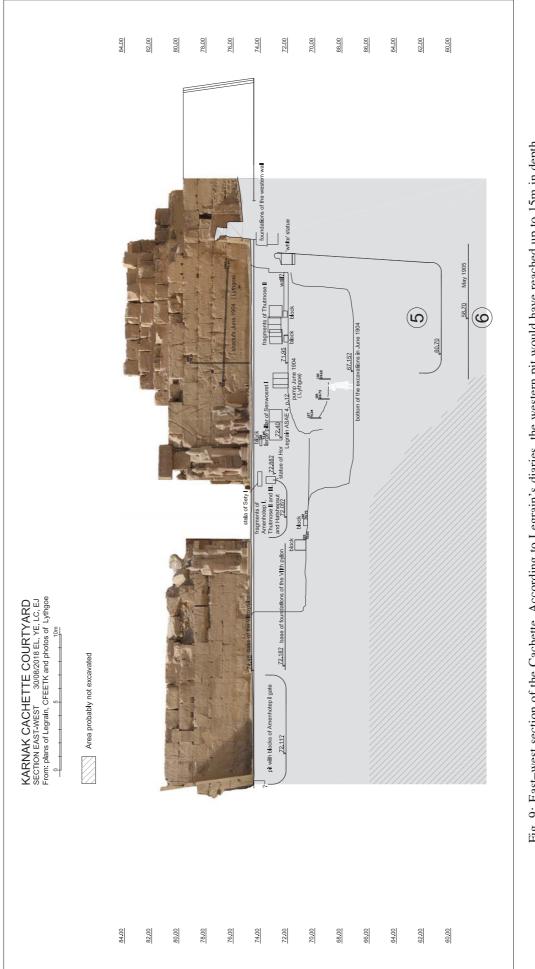


Fig. 9: East-west section of the Cachette. According to Legrain's diaries, the western pit would have reached up to 15m in depth. © E. Laroze, Y. Egels, L. Coulon, E. Jambon.

burial, the general meaning of the hidden cache itself is sufficiently documented. P. Vernus, who has examined this question in detail (Vernus 1989; 2009; 2016), has convinc+ingly demonstrated that the creation of a cache in a temple must be viewed, beyond its practical motives, from the perspective of a tradition in which one can find what he calls '*cachettes fabuleuses*'. Different kinds of objects were supposed to be hidden in such mysterious places, such as, for example, relics of the body of the dead god Osiris or sacred books written by the gods themselves. Some of these mythological caches were supposed to be forever unfindable; some others, on the contrary, were established by the demiurge for a revelation to come. Though the priests of Karnak probably intended the Cachette of Karnak to

be of the first category, Legrain, walking a path frequently followed by wise men in ancient Egypt, discovered this 'secret place in the temple' and offered back to his contemporaries a knowledge 'taken away from humanity since ancient times' (Vernus 2016, 17–9).

The initial context of the statues

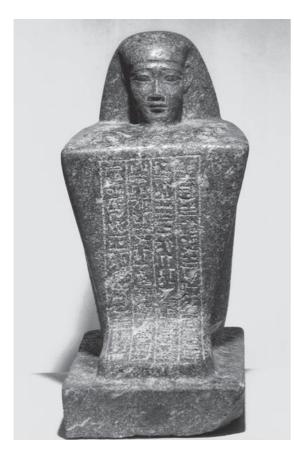
The limits of textual indications on the settings of statues

The question of the initial context of the statues found in the Cachette has been addressed in a recent thesis (Price 2011, 173–213), which allows us to limit ourselves to a brief account of the state of the art, before dealing with specific case studies. As a rule, ancient Egyptian sites have vielded a very large number of statues of all periods, but very few in their original context (e.g. Verbovsek 2007, 264-76), and Karnak is no exception. Of course, a few colossal representations of kings are still visible at the gates of temples, sometimes accompanied by the effigies of their courtiers, but smaller statues found in situ are in general not in their original setting. The texts inscribed on the statues frequently provide information concerning their initial location, as exemplified by one of the most common formulae: 'May my statue dwell in such or such temple or part of the temple'; but generally, the indications are very imprecise.¹⁰ Sometimes the *ousekhet* (Price 2011, 180-5) or the entrance of the temple (Price

¹⁰ See e.g. Cairo JE 37173 (Dynasty 30): *snn pn mn(w) m hwt-ntr nt Jmn r hh dt* ('May this statue remain in the temple of Amun forever eternally').

2011, 187-8; Klotz 2015, 67 and 71, n. [i]; Jansen-Winkeln 2016, 399) is mentioned as a desired place for the monument to be set up, but no precise indication is given which would allow us to determine its exact location. Nevertheless, in some very rare cases, the text is more explicit. Thus, on the back pillar of the statue Cairo JE 37452, found in the Cachette (B-CK 931), which belongs to a priestess called Takhybiat, the inscription reads: 'May it [*i.e.* my statue] remain, may it remain in the temple of Osiris of Coptos foremost in the house of Gold!' (Coulon 2008, 31). The 'temple' mentioned here is well-known. It is a chapel located in the northeastern part of the Temple of Karnak. In this particular case, it is possible to know from which part of the temenos of Karnak the statue was removed to be buried in the Cachette. This demonstrates that the objects were removed from different sectors of the temenos of Karnak, not only from the central part of the Amun temple. This removal was probably undertaken according to a systematic plan. Recently, by building on the results of the meticulously reconstructed chronology of the discoveries in the Cachette and by testing an old assumption of G. Maspero's, it has been argued that groups of statues found in a limited period of time by Legrain had probably been collected from the same area of the temple (Jambon 2016, 139-47).

Besides explicit mentions of the location of the statue, information concerning its setting in the temple can be deduced from the religious content of its inscriptions, as the ritual texts and the divinities inscribed on a statue were chosen according to the cultic context in which the monument was placed. This phenomenon can be exemplified by comparing different statues belonging to the same person but positioned (or at least supposed to have been positioned) in different locations inside the Theban temples. This is shown, for instance, by the monuments of a man called Ns-mnw son of P3-dj-Jmn-nb-nswt-t3wy: two statues of this priest were discovered by Legrain in the Karnak Cachette: Cairo JE 37178 (Fig. 10a) and Cairo JE 37191 (Fig. 10b). Another one is London, British Museum EA 41561 (Fig. 10c), an osirophorous statue which may be of Saite date and subsequently reused by our Ns-mnw; the British Museum acquired it in 1905



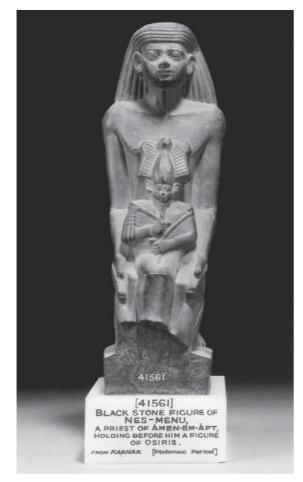






Fig. 10: a) Statue Cairo, JE 37178 (© CLES/IFAO); b) Statue Cairo, JE 37191 (© CLES/IFAO);
c) Statue London, British Museum, EA 41561 (© Trustees of the British Museum);
d) Statue Opet O. 168155-1 (© CFEETK).

a b c d

from the famous antiquity dealer Mohamed Mohassib and it is not unlikely, as stated by PM II², 165, that this statue had also been found in the Cachette and stolen soon after its discovery. A fourth statue of the same man was recently discovered during Emmanuel Laroze and Guillaume Charloux's work on the Opet temple, in the southwestern part of Karnak. This is a block statue (Fig. 10d) whose upper part is preserved (see in this volume Charloux and Mahmoud, fig. 4). As was made clear by Guillaume Charloux in his excavation report, this statue was carefully placed in the foundation trench of the temple, when it was rebuilt during the Ptolemaic period. Other statues were also buried in the same way at different places next to the walls of the courtyard: another Late Period statue of a priest, a Ramesside statue of a priest, and a baboon, probably related to the neighbouring temple of Khonsu (Charloux et al. 2012, 277–80). The statue of *Ns-mnw* is still unpublished but we can make some basic observations from the preliminary description (Virenque, in Charloux et al. 2012,

210 and 226) and the photographs available. When compared to his two block statues from the Cachette, it appears that *Ns-mnw*'s Opet statue shares a common set of biographical formulations with them. For instance, on the three monuments, *Ns-mnw* insists on the length of his life: eighty-five years!¹¹ Other formulaic statements are common to the inscriptions of all three statues. However, the statue found in the Opet temple has some distinctive features, which clearly indicate its relation to this sanctuary. One of them is the representation of gods on the wig, with captions: two forms of Osiris which are specific to the Opet temple, namely '(the one of) Ipet-weret' and 'master of the provisions-k3w'.¹²

Another such feature is the identity of the gods mentioned in the proscynema: Osiris of Ipet-weret, Horus son of Isis son of Osiris and Ptah Nefer-her. By contrast, the proscynemas of the Cachette statues only mention the Theban triad and more generally the gods and goddesses of Ipet-sut.

Statues	Divinities invoked	Divinities depicted
Cairo JE 37178	 (in the <i>htp-dj-nsw</i> formula) Amun-Ra Lord of the Throne(s) of the Two Lands, foremost of Ipet-sut, Primeval of the Two Lands, Sacred of arm, Kamutef, king of the gods Mut, the Eye of Ra, mistress of the sky, mistress of the gods Khonsu-in-Thebes-Nefer-hotep Montu-Ra master of Thebes all the gods and goddesses who are in Ipet-sut 	
Cairo JE 37191	 (in the <i>htp-dj-nsw</i> formula) Amun-Ra Lord of the Throne(s) of the Two Lands, foremost of Ipet-sut, Primeval of the Two Lands, [Sacred of] arm, Kamutef, king of the gods Mut, the Eye of Ra, mistress of the sky Khonsu-in-Thebes-Nefer-hotep Montu-Ra master of Thebes Amunet who dwells in Ipet-sut 	
London BM EA 41561	(<i>hsy n</i>) Ptah-Sokar-Osiris	
Opet O. 168155-1	 (in the <i>htp-dj-nsw</i> formula) Osiris Ipet-weret Wennefer, king of the gods, master of the sky, the earth, the duat, the wat[er and the mountains]¹³ [Isis] Horus son of Isis-son-of-Osiris Ptah Nefer-her lord of Maat. 	 [Osiris] master of provisions (<i>nb k3w</i>) [Isis] the divine mother [Osiris] Ipet-weret [Ptah] Nefer-her

Table 1: The divinities on Ns-mnw's statues

¹¹ Statue Opet O. 168155-1, left side, x+2-x+3: *fq3.n.f.tw(.j) m rnpt* 85; statue Cairo JE 37178, back pillar: ^{*fhf f m nh rnpt* 85 *n 3b n šd jbd.f [...]* (cf. Jansen-Winkeln 2001, 93, n. 14); statue Cairo JE 37191, back pillar: [*fq3*].*n.f tw(.j) m rnpt* 85.}

¹² On this form of Osiris and its connection with the Opet temple, see Traunecker 2004, 59.

¹³ On this epithet *nb pt t3 dw3t mw dww*, see LGG III, 627a-628c; Tillier 2016, 364–5.

In this case, it is possible to observe that, even in a restricted geographical area, the decoration and the inscriptions of the different statues commissioned by a priest were conditioned by the context in which they were intended to be set up.

The perspectives offered by the digital processing of inscriptions

This kind of recontextualisation of the temple statues based on the content of their inscriptions has not been attempted on a large scale, mostly due to the lack of a tool which would allow us to study the corpus of statues without separating the inscriptions, the decoration of the statue and its layout, and the data we have concerning the prosopographical data, the context of its discovery, etc. This led to the idea of building a searchable electronic corpus of the texts inscribed on the objects from the Cachette, which would be an extension of the Karnak Cachette database. With the development of the digital humanities, a large set of possibilities is now open to create online corpuses which include both inscriptions and images and allow queries on both of them. The TEI (text encoding initiative), based on XML (extensible markup language), has offered us a very productive framework, as it had done already for Greek and Latin epigraphers, for instance, who created their own standard, Epidoc, now widely adopted. This project was developed in collaboration with Vincent Razanajao, who developed a user-friendly tool for the encoding of the transliterated hieroglyphic texts inscribed on the objects from the Karnak Cachette, Xefee; and Emmanuelle Morlock, who is currently working on the publication tool, the first part of the corpus, the Dynasty 26 statues, being currently prepared for publication by Sepideh Qahéri. In contrast to a database which breaks into pieces the content of an object, this marking up does not affect the continuity of the text. Every textual element remains embedded in its context, and each text is embedded in a header, providing metatextual data and references to bibliography and related images (Razanajao, Morlock and Coulon 2013). Eventually, it will become possible to systematically search for textual and metatextual data concerning the initial location of the statues. We have also worked on the implementation of TEI/Epidoc standards in ancient Egyptian epigraphy to serve as a basis for building bridges between text-edition projects within Egyptology and through the collaboration of other research teams involved in digital epigraphy in other fields.

Conclusion

As highlighted in the preceding lines, the recontextualisation of the statues discovered in the Karnak Cachette is a wide-ranging undertaking because of the complex history of these objects: in ancient times, they experienced at least one initial installation context, reflected in the epigraphic evidence, and a ritual burial in the Cachette; however, the later burial context may in some way reproduce the first, if one considers a grouped removal from certain spaces of the sanctuary. In modern times, the turbulent history of excavation and conservation of objects has made their recontextualisation a major historiographical issue, which cannot be dissociated from the Egyptological study of these monuments. In both cases, it appears that the use of new photogrammetric technologies and digital humanities offers powerful tools that can partly compensate for the loss of excavation information or the dispersion of objects.

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