

**ARCE/EAP Subproject
Conservation of the Sarcophagus of Ramesses VI**

**Tomb of Ramesses VI (KV 9)
Valley of the Kings, Luxor**

Progress Report for July 2001

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List of Illustrations

Note - For reference purposes, the photographic illustrations in this report are taken from color print film. Roll numbers for this color print film are derived from the sheet numbers originally assigned for Large Format photographs which are not going to be used in this project. Therefore, Color Print Roll number 501 (CP 501) is taken over from Large Format Sheet number 501.

CP 501.1 Winch scaffolding on north platform of burial chamber (note flexible tubing with collector hood attached)

CP 501.2 View of flexible tubing installed along south edge of walkway in lower corridors of the tomb

CP 501.3 Flexible tubing passing through cut in lower left of gate at tomb entrance

CP 501.4 Flexible tubing running eastwards along south edge of entry ramp

CP 501.5 Location of fan south of entry ramp with temporary wood enclosure and exhaust tubing running up hillside.

CP 501.6 View of fan housing with connection of tubing for intake (lower) and exhaust (upper)

CP 501.7 Use of flexible tubing and hood to collect dust during sanding of limestone base

CP 501.8 Permanent wooden platform over north edge of pit with ramp in background

CP 501.9 Permanent and temporary platforms north and west of pit with sand table in background.

CP 501.10 Temporary wooden platform between south platform and outer granite sarcophagus box, holding groups of assembled upper edge fragments.

CP 501.11 Preliminary layout of limestone slabs for base for box assembly

CP 501.12 Conservator Lotfi Khaled demonstrating use of sand table

1. Abstract

The first three weeks of work on site during the period 8 to 31 July were quite productive. Several aspects of the first phase of the work plan were initialized, despite the month's delay in start-up due to the wait for security approval. The core team of project director and the two conservation specialists were able to begin work in the second week of the month and commenced with setting up the scaffolding for the winch and the installation of wooden platforms around the central floor pit. The air circulation system was installed and found to work satisfactorily. A base of limestone slabs was laid down on the surface of the northern platform as a level support for the sarcophagus box. The sides, head end and foot end of the floor of the box were assembled and joined together with epoxy adhesive and stainless steel dowels.

2. Field Report for the Period 7 July - 31 July 2001

2.1 Introduction

2.1a Commencement of Work

After a month's delay while waiting for the security approval for the Rameses 6 Sarcophagus Reconstruction Project's two conservators, Lotfi Khaled Hassan and Dany Roy it was possible to travel to Luxor on July 7, 2001, and begin work on Sunday July 9, 2001. On Saturday July 8 the director submitted to the Luxor Antiquities Inspectorate the documents from the SCA for a continuation of permission for the project to the end of the year, December 31, 2001 and security clearance for the project members to the end of July 2001.

On Monday July 10, a truck carrying project equipment arrived in the Valley of the Kings and this material was unloaded. The following day, Tuesday, July 11, Dany Roy arrived on site and supervised the disposition of the delivered equipment and supplies.

2.1b Work Schedule

Agreement was reached with the Qurna Antiquities Inspectorate representative Mr. Ahmed Ezz to work for a weekly period of 6 days, Saturday through Thursday, from 7 AM to 2 PM.

2.2 Activities

2.2a Installation of Scaffolding for Winch

The project has rented steel beam scaffolding and a winch from Dany Roy for maneuvering groups of assembled fragments into place on the platform. The scaffolding is rated for 8 tons and the winch for 3 tons which is greater than any of the fragment groups that will need to be lifted. It is constructed so that movement is possible on tracks in 2 directions (side to side and front to back) as well as raising and lowering by the winch mechanism



Ill.1.1 CP501.1

itself. The present scaffolding forms a frame 2 meters high by 3 meters wide by 4 meters long. The winch mechanism is raised and lowered by chains and is moved along its rails also by chain-operated drive mechanisms. Foam cushioning has been attached to the uprights closest to the north wall of the chamber, although there is no movement in the construction that brings the frame in close proximity to the wall. It will be possible in a later phase dealing with the assembly of the lid fragments to install the scaffolding over the wooden platform here the lid is to be placed.

2.2b Air Circulation System

The air circulation system recommended by ARCE/EAP was installed on Saturday July 21. Delay in installation was a result of difficulties in scheduling a driver to bring the equipment from Cairo to Luxor. Some adjustment of the fan assembly as delivered from the shop was necessary to eliminate friction between the fan and its housing, but once this was accomplished, the machine worked smoothly and quietly.

The tubing was installed along the south side of the wooden walkways leading from the entrance of the first corridor to the burial chamber. The tubing was attached at intervals by rope to the uprights of the railings accompanying the walkway with space



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Ill. 3 CP 501.3

left between the tubing and the walls. Two lower lengths of the steel bars in the gateway at the entrance to the first corridor were cut away to allow passage of the tubing. This was then run along the south edge of the entrance ramp to the east where the fan is located.



Ill. 4 CP 501.4



Ill. 5 CP 501.5



Ill. 6 CP 501.6



Ill. 7 CP 501.7

A wooden shelter was constructed for the fan mechanism to protect it from the sun, and operational tests proved that the motor did not become over-heated during sustained periods of operation (a full workday of seven hours). The exhaust tubing was installed running from the fan parallel to the south edge of the entryway

the smoothing of the surfaces of the limestone base. Two fans on stands have been installed in the work areas of the burial chamber for increased comfort, and in conjunction with the exhaust system are able to keep the air fresh. The plastic collector hood attached to the inner end of the flexible tubing serves to concentrate the suction. It has proven effective in the removal of dust and will also be used in the area of the assembled box fragments during cleaning activities (Ill. 7). Mr. Muhammed el-Bialy, the General Director of Antiquities for Thebes West Bank, Mr. Ibrahim Suliman, Chief Inspector of the Valley of the Kings and the assigned Antiquities Inspectorate representative, Mr Ahmed Ezz have all expressed approval of the air circulation system. They see it as a favorable prototype for an overall system of air circulation for installation in other tombs in the Valley of the Kings.

2.2c Installation of Permanent Wood Platform

A wooden platform was constructed to the north of the central pit in the floor to act as a permanent support for the assembly and display of the assembled fragments of the sarcophagus lid. These would include the replica of the face to be fashioned by the conservation department of the British Museum.

6 parallel 2 x 10 beams run from the north edge of the pit north to the base of the north stone platform and are supported by 6 vertical legs at their south ends and 6 slanting beams along the sloping face of the pit. The vertical supports are also 2 x 10 and the slanting support struts are 2 x 4. 8 beams (2 x 4) are laid across these beams and over this are placed sheets of plywood. Upon completion of the installation of the lid assembly the wood platform will be painted an off-white or beige color to blend in with the general appearance of the limestone surroundings and to protect the wood.

surroundings and to protect the wood.



Ill. 8 CP 501.8

2.2d Installation of Temporary Wood Platforms and Ramp

The presence of a large rough rectangular pit in the center of the floor of the burial chamber has always made movement difficult between the two platforms to the north and south. It was felt that a temporary wood platform at the west end of this pit, in conjunction with the permanent wood platform to the north would be necessary to make movement safe in this area as well as to provide a staging platform for fragments awaiting assembly. A wooden ramp was also seen necessary to reach the north platform from the central floor. Originally, a second wooden ramp was proposed to connect the southern platform with the central floor to the west of the upright head end half of the floor of the outer granite sarcophagus box. However, on-site reassessment of the situation made this space necessary for the storage of large fragments from the sides of the granite box. Instead a second temporary wooden platform was constructed between the edge of the south platform and the foot half of the granite box, now lying in



Ill. 9 CP 501.9

the central pit. This has proven helpful as an additional staging area for assembled fragment groups belonging to the sides of the inner sarcophagus box. In addition, it also serves as a convenient platform from which to photograph the different stages of construction of the limestone base for the inner sarcophagus box and the forthcoming assembly of the box itself.



Ill. 10 CP 501.10

2.2e Installation of Limestone Base for sarcophagus Box

A flat surface was recommended in the proposal as a necessary installation to support the assembled fragments of the sarcophagus box. The existing surface of the north platform, selected as the display site for the box, is uneven. A bedding layer of lime and sand mortar was first laid down to obtain a flat surface on which to set the limestone slabs. Locally obtained flakes of limestone were added to fill in surface cavities. Additional mortar of limes and sand mixture was the used to bed the slabs and to grout the cracks between slabs. The resulting base consists of 5 rows of 8 slabs, and is 200 cm x 320 cm (1600 square cm). It is located 150 cm from the east row of pillars and 153 cm from the west row of pilasters, 100 cm from the north wall and its upper surface is x cm above the platform. The outer edge is carved with a "half bull-nose" to give a curved transition from the horizontal to vertical faces of the platform and the vertical face of the mortar bedding is inset by 0.5 cm.



Ill. 11 CP 501.11

2.2f Assembly of sarcophagus Box Fragments

Several groups of fragments have been assembled and glued together using epoxy adhesive. Two large groups form the head and

foot ends of the floor of the box. In each of these assemblies holes have been drilled horizontally between the fragments for the insertion of 1 cm stainless steel dowels. These are fixed in place with epoxy adhesive to augment the strength of the epoxy adhesive serving to bond these large fragments together. Fragments forming the outer edges of the floor have also been joined together in order to give an idea of the overall dimensions of the floor of the box in relation to the base and to provide a foundation on which to build up the sides of the box. The cleaning of dirt from the break surfaces where fragments joined together has proven to be a time consuming task. This is a purely mechanical process using scalpels, picks and small stiff brushes, together with mild solvents (water and alcohol and diluted acetone) to remove as much of the dirt coating on the break surfaces as possible before joining them with epoxy adhesive. It has been seen necessary to hire on a second conservation assistant to help Lotfi Khaled with this work starting in the August. A sand table borrowed from E C Brock's work on the Merenptah sarcophagus fragments in KV 8 has been helpful for positioning smaller groups of fragments for gluing together. Heavy wooden tables have also been lent by Brock for laying out the fragments for examination.



Ill. 12 CP 501.12