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3D model related to the publication: Filling a gap in the proboscidean fossil record: a new genus from the Lutetian of Senegal

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Abstract

The present 3D Dataset contains the 3D surface model and the μ CT scan analyzed in the following publication: R. Tabuce, R. Sarr, S. Adnet, R. Lebrun, F. Lihoreau, J. E. Martin, B. Sambou, M. Thiam, and L. Hautier: Filling a gap in the proboscidean fossil record: a new genus from the Lutetian of Senegal. Journal of Paleontology, in press, <https://doi.org/10.1017/jpa.2019.98>.

Keywords: Africa, Eocene, Proboscidea, Senegal

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Model IDs	Description
M3#500_MNHN.F.MCA1	right upper molar 3D model
M3#501_MNHN.F.MCA1	μ CT scan (resolution: 36 μ m)

Table 1. 3D data of the right upper molar of *Saloumia gorodiskii*. Collection: Muséum National d'Histoire Naturelle (MNHN), Paris, France.

INTRODUCTION

In the paper entitled “Filling a gap in the proboscidean fossil record: a new genus from the Lutetian of Senegal”, we described the species *Saloumia gorodiskii* based on the holotype MNHN.F.MCA 1 (Fig. 1 and Table 1). We proposed two hypotheses for *Saloumia* affinities: 1) *Saloumia* has affinity with either *Moeritherium* or basal elephantiforms; and 2) *Saloumia* documents an early experiment in dental diversity among Paleocene–Eocene proboscideans, without direct relationships with later proboscideans.

METHODS

3D data acquisition was performed using the μ CT facilities of the MRI platform of the Institut des Sciences de l'Évolution de Montpellier (ISE-M). The 3D surface was extracted semi-automatically within AVIZO 9.2 (FEI) using the segmentation threshold selection tool. 3D surface was labelled using MorphoDig software (Lebrun 2018). The 3D surface model is provided in .ply format, and can therefore be opened with a wide range of freeware.

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change Scheme of the Royal Society, and the National Geographic Society's Global Exploration Fund (Northern Europe).

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Figure 1. 3D reconstruction of *Saloumia gorodiskii*, MNHN.F.MCA 1, right upper molar, in occlusal view.