## **Anomodont osteohistology**

Our Ref:



an agency of the Department of Arts and Culture

T: +27 21 462 4502 | F: +27 21 462 4509 | E: info@sahra.org.za South African Heritage Resources Agency | 111 Harrington Street | Cape Town P.O. Box 4637 | Cape Town | 8001 www.sahra.org.za

Enquiries: Ragna Redelstorff, PhD

Tel: +27 (0)21 202 8651

Email: rredelstorff@sahra.org.za

CaseID: 16492

Date: Thursday May 25, 2023

Page No: 1

# Letter

## In terms of Section 35(4) of the National Heritage Resources Act (Act 25 of 1999)

Attention: Prof. Jennifer Botha

University of the Witwatersrand - Evolutionary Studies Institute

Evolutionary Studies Institute, University of the Witwatersrand,

Johannesburg, 2050

No study has investigated the bone microanatomy pattern of a large sample of Anomodontia. The present study seeks to elucidate the different bone microanatomies of various anomodont taxa spanning the entire clade. The aim of the study is to assess the lifestyle, phylogeny, and biomechanics of anomodont therapsids using bone microanatomy. The objectives of the study are to (1) quantitatively describe the patterns in the bone microanatomy of South African anomodonts and (2) investigate possible reasons for the differences and/or similarities in the microanatomy. This is an important study as recent research has suggested that the infilling of medullary cavities indicates an aquatic lifestyle and as most anomodonts have infilled medullary cavities, this would suggest that the anomodont clade was aquatic. As the historical literature indicates that anomodonts were terrestrial, it is important that we resolve this issue regarding anomodont palaeobiology.

Dear Prof J Botha.

Thank you for submitting the outstanding images in association with your permit report. The report and images were approved.

Should you have any further queries, please contact the designated official using the case number quoted above in the case header.

Yours faithfully

Ry Las

# **Anomodont osteohistology**

#### Our Ref:



an agency of the Department of Arts and Culture

T: +27 21 462 4502 | F: +27 21 462 4509 | E: info@sahra.org.za South African Heritage Resources Agency | 111 Harrington Street | Cape Town P.O. Box 4637 | Cape Town | 8001 www.sahra.org.za

Enquiries: Ragna Redelstorff, PhD

Tel: +27 (0)21 202 8651

Email: rredelstorff@sahra.org.za

CaseID: 16492

Date: Thursday May 25, 2023

Page No: 2

Ragna Redelstorff, PhD

Heritage Officer

South African Heritage Resources Agency

Phillip Hine

Manager: Archaeology, Palaeontology and Meteorites Unit

South African Heritage Resources Agency

### **ADMIN:**

Direct URL to case: https://sahris.sahra.org.za/node/574405

#### Terms & Conditions:

- 1. This approval does not exonerate the applicant from obtaining local authority approval or any other necessary approval for proposed work.
- 2. If any heritage resources, including graves or human remains, are encountered they must be reported to SAHRA immediately.
- 3. SAHRA reserves the right to request additional information as required.