



Desk Top Heritage Scoping Report

Proposed Cemetery Extension in Leratswana, Arlington Thabo Mofutsanyane DM, Nketoana Local Municipality, Free State

Project Area and Project description

The proposed cemetery extension is located in the Leratswana township of Arlington. (See Figure 1). Arlington displays a racially segregated geography due to the legacy policies of apartheid planning, but Leratswana is currently being greatly extended and serviced by local government structures.

Arlington owes its establishment and existence to its location as a railway junction and as an agricultural service centre. It lies at the junction of two railway lines, one stretching from Lindley to Senekal, and another connecting Bethlehem and Steynrus. Arlington lies on the R707, which spatially separates Arlington from Leratswana. The R707 connects the towns of Lindley and Senekal.

The proposed development involves the extension of the existing Leratswana cemetery, including access roads and ancillary infrastructure, providing an unspecified number of grave sites, covering an area of approximately 5.0 hectares on the property Farm Lot 69 of the Arlington Townlands.

The site is partially developed, with two grave yard clusters currently in use. An increasing demand for burial space within a formalised municipal cemetery is the key driver for the proposed extension.

The implementation of the proposed cemetery extension will be by the Nketoana LM.

Tom Hugo of Enviromatrix Environmental Management Services is the Environmental Assessment Practitioner appointed to assist with the environmental authorization process. A Basic Assessment Report is required in terms of NEMA.¹

¹ The National Environmental Management Act, Act 107 of 1998, as amended.



Figure 1 Location of cemetery extension in Leratswana within the townlands of Arlington (see kml. Loaded to SAHRIS Case File)

Observations

No field inspection was conducted by eThembeni.

Farm Lot 69 was previously under extensive maize cultivation as shown in Google Earth historical imagery, prior to its incorporation into municipal townlands.

No historical structures or visible foundations are reported by the EAP, and no primary context archaeological residues are anticipated due to previous ploughing activities.

The underlying lithology comprises the Tarkastad Subgroup of the Beaufort Group, which is of high palaeontological significance, comprising petrified wood and tetrapod faunas of the *Lystrosaurus* and *Cynognathus* Assemblage Zones. However, the Geotechnical Report conducted for the site (uploaded to SAHRIS Case File) indicates a pedogenic horizon and residual mudrock horizon extending to a depth of 2.50m. The mudrock bedrock is described as "completely to highly weathered, light brown, yellow very closely jointed, very soft to soft, very fine-grained rock extending up to 1.1m below the residual mudrock horizon.

For cemetery purposes the soil at a cemetery site must be excavatable to at least a depth of 1.8 m for single burials and 2.10 m for double burials. Consequently, grave excavation will not impact beyond the highly weathered mudrock bedrock and no impact on the fossil bearing lithology is anticipated.

No further palaeontological assessment is considered necessary.

Recommendations

In the absence of any heritage resources of significance, and that no further palaeontological mitigation is required, we accordingly request that SAHRA allow the cemetery development to proceed with no further heritage resource mitigation; suffice that the protocols in Appendix 1 are made binding to any Environmental Authorisations issued.

Please can you notify us timeously, via the loaded SAHRIS Case File, as to the decision of SAHRA in this regard.

Yours sincerely

A handwritten signature in black ink, appearing to read 'Len van Schalkwyk'.

Len van Schalkwyk
Principle Investigator.

Appendix 1

Protocol for the Identification, Protection and Recovery of Heritage Resources During Construction and Operation

It is possible that sub-surface heritage resources could be encountered during the construction phase of this project. The Environmental Control Officer and all other persons responsible for site management and excavation should be aware that indicators of sub-surface sites could include:

- Ash deposits (unnaturally grey appearance of soil compared to the surrounding substrate);
- Bone concentrations, either animal or human.
- Ceramic fragments, including potsherds.
- Stone concentrations that appear to be formally arranged (may indicate the presence of an underlying burial, or represent building/structural remains); and
- Fossilised remains of fauna and flora, including trees.

In the event that such indicator(s) of heritage resources are identified, the following actions should be taken immediately:

- All construction within a radius of at least 20m of the indicator should cease. This distance should be increased at the discretion of supervisory staff if heavy machinery or explosives could cause further disturbance to the suspected heritage resource.
- This area must be marked using clearly visible means, such as barrier tape, and all personnel should be informed that it is a no-go area.
- A guard should be appointed to enforce this no-go area if there is any possibility that it could be violated, whether intentionally or inadvertently, by construction staff or members of the public.
- No measures should be taken to cover up the suspected heritage resource with soil, or to collect any remains such as bone or stone.
- If a heritage practitioner has been appointed to monitor the project, s/he should be contacted, and a site inspection arranged as soon as possible.
- The South African Police Services should be notified by a SAHRA staff member or an independent heritage practitioner if human remains are identified. No SAPS official may disturb or exhume such remains, whether of recent origin or not.
- All parties concerned should respect the potentially sensitive and confidential nature of the heritage resources, particularly human remains, and refrain from making public statements until a mutually agreed time.
- Any extension of the project beyond its current footprint involving vegetation and/or earth clearance should be subject to prior assessment by a qualified heritage practitioner, considering all information gathered during the initial assessment.