

**PROPOSED DINGO'S ANIMAL KINGDOM PROJECT,
UMGUNGUNDLOVU DISTRICT MUNICIPALITY,
KWAZULU-NATAL**

Phase 1 Heritage Impact Assessment

September 2021

**FOR: KSEMS Environmental Consulting
Savannah Graham**

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EXECUTIVE SUMMARY

Dingo's Animal Kingdom (Pty) Ltd proposes to establish and operate an animal park and associated amenities, within Portion 75 (of 72) of the Farm Honig Krantz No. 945, situated within the uMgungundlovu Municipality, KwaZulu-Natal. The land uses associated with the proposed development include a visitor centre, farmyard animal barn, reptile centres, ponds, viewing deck, zipline and staff accommodation.

The size of the area to be developed is approximately 5 hectares (50000m²) which triggers section 41 (1) (c)(i) of the KwaZulu-Natal Amafa and Research Institute Act, 2018 (Act No 5 of 2018) which lists developments or activities that require an HIA. The relevant sub-section refers to any development or other activity which will change the character of a site- (i) exceeding 5000 m².

The location of the development is on Portion 75 (of 72) of the Farm Honig Kranz located south of Camperdown, Cato Ridge and the N3 highway. The centre point of the development is 29°45'15.50"S; 30°33'38.61"E.

An inspection of the site was undertaken on 9 September 2021. The western portion of the site near the stream had recently been cut; the eastern half of the site is in a largely natural state with a dense grass layer interspersed with pockets of bushes. Visibility was, in general, good.

The vegetation in the lower portion of the site closest to the stream which runs along the western boundary of the site had recently been cut making visibility good. The area was inspected including the stream where the invasive vegetation is being cut down and burnt. Previous cultivation is apparent in that some terracing of the area is visible. No heritage resources were found in this portion of the project site. The remaining portion of the property, which has a thick grass layer, was inspected on foot including the gully that bisects the area. No heritage resources were found during the inspection.

According to the South African fossil sensitivity map, the project falls into a zone of moderate fossil sensitivity which requires that a desktop palaeontological study be undertaken. The desktop study found that the proposed site lies entirely on the potentially fossiliferous Dwyka Group tillites and diamictites that could have fragments of invertebrates as well as leaves and woods of the *Glossopteris* flora. Such fossils are very sporadic in their occurrence so it is very unlikely that fossils occur on the site. Nonetheless, a Fossil Chance Find Protocol should be added to the Environmental Management Programme (EMPr) for the development. It was therefore recommended that no palaeontological site visit is required unless fossils are found once the excavations and/or drilling commences.

An inspection of the area proposed for the development of Dingo's Animal Kingdom revealed no heritage resources. A desktop palaeontological study of the area concluded that surface activities may impact upon the fossil heritage if preserved in the development footprint. The geological structures suggest that the rocks are either much too old or of the incorrect type to contain fossils so the expectation is that fossils will not be impacted by the development.

It is therefore recommended that from a heritage perspective, the development of Dingo's Animal Kingdom can proceed as long as the mitigation measures provided in this report and in the desktop palaeontological report area adhered to.

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I, Jean Beater, act as an independent specialist for this project and I do not have any vested interest either business, financial, personal or other, in the proposed activity other than remuneration for work performed in terms of the Environmental Impact Assessment Regulations, 2014.

SPECIALIST DETAILS

Name	Qualification	Professional Registration
Jean Beater	MA (Heritage Studies) MSc (Environmental Management)	Member of Association of South African Professional Archaeologists (No. 349) Member of IAIAasa (No. 1538)

1. INTRODUCTION

Dingo's Animal Kingdom (Pty) Ltd proposes to establish and operate an animal park or sanctuary and its associated amenities, within Portion 75 (of 72) of the Farm Honig Krantz No 945, situated within the uMgungundlovu Municipality, KwaZulu-Natal. The proposed develop is located just south of the town of Camperdown and will cover approximately 5 hectares (Ha) in extent. The land uses associated with the proposed development include a visitor centre, farmyard animal barn, reptile centres, ponds, viewing deck, zipline and staff accommodation (KSEMS 2021:1-2).

A Phase I HIA was undertaken to assess whether any heritage resources will be impacted by the proposed Animal Kingdom development.

2. LEGISLATIVE BACKGROUND

The size of the area to be developed is approximately 5 hectares (50000m²) which triggers section 41 (1) (c)(i) of the KwaZulu-Natal Amafa and Research Institute Act, 2018 (Act No 5 of 2018) which lists developments or activities that require an HIA. The relevant sub-section refers to: "*any development or other activity which will change the character of a site- (i) exceeding 5000 m²*".

The proposed development may also impact graves, structures, archaeological and palaeontological resources that are protected in terms of sections 37, 38, 39, and 40 of the KwaZulu-Natal Amafa and Research Institute Act, 2018.

In terms of section 3 of the National Heritage Resources Act, 1999 (No. 25 of 1999), heritage resources are:

- (a) places, buildings, structures and equipment of cultural significance;
- (b) places to which oral traditions are attached or which are associated with living heritage;
- (c) historical settlements and townscapes;
- (d) landscapes and natural features of cultural significance;
- (e) geological sites of scientific or cultural importance;
- (f) archaeological and paleontological sites;
- (g) graves and burial grounds, including—
 - (i) ancestral graves;
 - (ii) royal graves and graves of traditional leaders;
 - (iii) graves of victims of conflict;
 - (iv) graves of individuals designated by the Minister by notice in the *Gazette*;

- (v) historical graves and cemeteries; and
- (vi) other human remains which are not covered in terms of the Human Tissue Act, 1983 (Act No. 65 of 1983);
- (h) of significance relating to the history of slavery in South Africa;
- (i) movable objects, including:
 - (i) objects recovered from the soil or waters of South Africa, including archaeological and palaeontological objects and material, meteorites and rare geological specimens;
 - (ii) objects to which oral traditions are attached or which are associated with living heritage;
 - (iii) ethnographic art and objects;
 - (iv) military objects;
 - (v) objects of decorative or fine art;
 - (vi) objects of scientific or technological interest; and
 - (vii) books, records, documents, photographic positives and negatives, graphic, film or video material or sound recordings, excluding those that are public records as defined in section 1(xiv) of the National Archives of South Africa Act, 1996 (Act No. 43 of 1996).

3. LOCATION

The location of the proposed development is on Portion 75 (of 72) of the Farm Honig Kranz located south of Camperdown, Cato Ridge and the N3 highway. The centre point of the development is 29°45'15.50"S; 30°33'38.61"E.

Figure 1 shows the locality of the development within the wider surrounding area and **Figure 2** is a closer image of the site proposed for the development. **Figure 2** clearly shows the gully that bisects the site which is a geological fracture that acts as a surface water conduit into the adjacent stream (KSEMS 2021:3). The image also shows the cultivation of the lower western section of the project area.

Figure 3 shows the layout of the proposed development with the various components that will make up Dingo's Animal Kingdom.

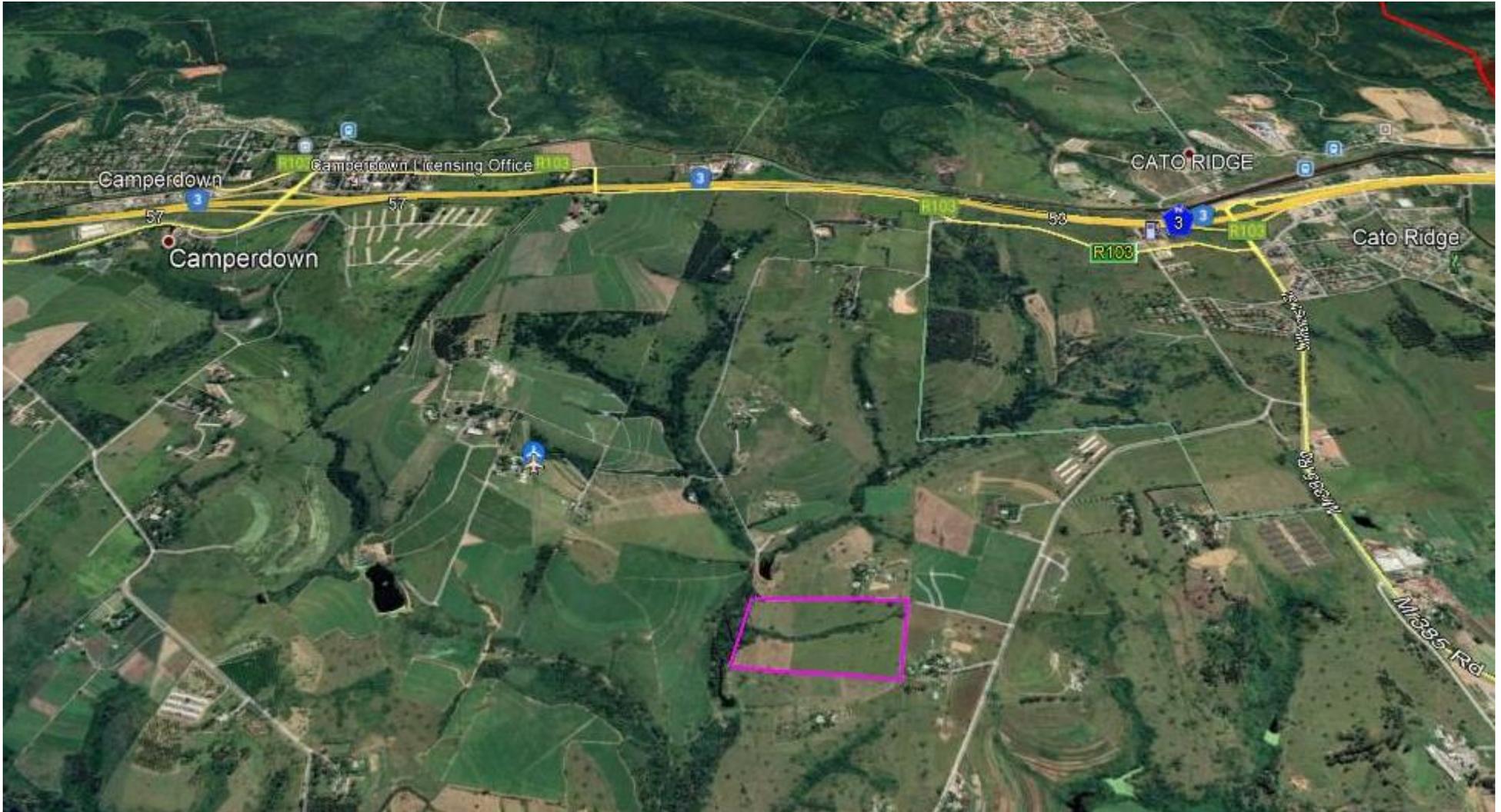


Figure 1: Project site indicated by pink outline within wider area



Figure 2: Site of proposed Animal Kingdom outlined in red

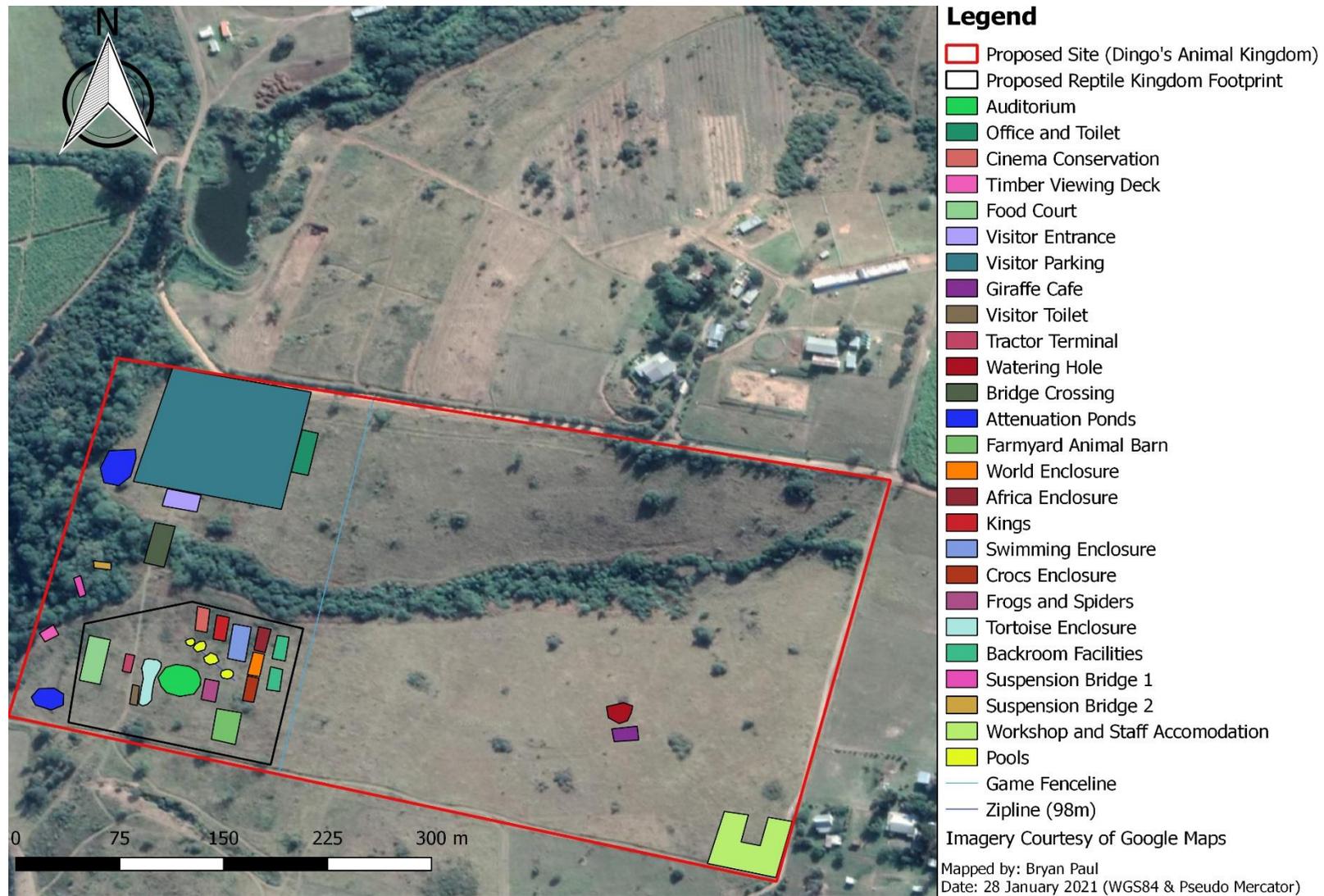


Figure 3: Layout of components of Dingo's Animal Kingdom

4. TERMS OF REFERENCE

Undertake a Phase 1 Heritage Impact Assessment in order to determine the possible existence of heritage resources, as listed above, that could be impacted by the construction of the project. Provide mitigation measures to limit or avoid the impact of the proposed project on heritage resources (if any).

Submit the HIA report to the provincial heritage resources authority, the KwaZulu-Natal Amafa and Research Institute (hereafter referred to as the Institute), for their comment.

5. METHODOLOGY AND CONSTRAINTS

A survey of literature, including other heritage impact assessment reports that have been completed for the immediate area and surrounds, was undertaken in order to ascertain the history of the area in which the development will be located and what type of heritage resources have or may be found in the area of development.

An inspection of the site was undertaken on 9 September 2021. The western portion of the site near the stream had recently been cut; the eastern half of the site is in a largely natural state with a dense grass layer interspersed with pockets of bushes. The gully is overgrown with vegetation. Visibility was, in general, good.

6. HISTORICAL BACKGROUND OF PROJECT AND SURROUNDING AREA

The greater Umlaas Road is relatively well covered by archaeological surveys conducted in the 1960's and 1970's. Several large areas adjacent to the R603 road have also been surveyed in the last four years. The available evidence indicates that the area contains mostly Early Stone Age material with most of these sites situated close to water, such as the uMngeni River, in open air contexts. A large number of Early Iron Age sites have been located in the uMngeni Valley (Prins 2016:2).

Later Iron Age sites also occur in the area. These were made by Bantu-speaking agro-pastoralists who arrived in southern Africa after 1000 year ago via East Africa. Later Iron Age communities in KwaZulu-Natal were the direct ancestors of the Zulu people. The larger uMngeni Valley area was

inhabited by various Nguni-speaking groups such as the Dlanyawo, Nyavu and Njilo, in the beginning of the 19th century. With the exception of the Nyavu, who remained independent, most of these communities were incorporated into the Zulu Kingdom of Shaka in the 1820's (Prins 2016:2).

According to Bulpin (undated:170), Cato Ridge consisted, at first, of small, rented farms on the estate of GC Cato, the first mayor of Durban. Towards the end of 1912, these farms were offered for sale, with the original tenants having the first option. Cato Ridge thereby came into existence.

The original owner of Camperdown, situated not far from the project site, was John Vanderplank who settled on a farm calling it Camperdown where he planted seeds of the black wattle as a wind break that he had brought over from Australia (Bulpin 1986:474).

Figure 4 shows the relevant section of the 1968 topo-cadastral map (2930DC) of the project area which shows the project area partly under cultivation.

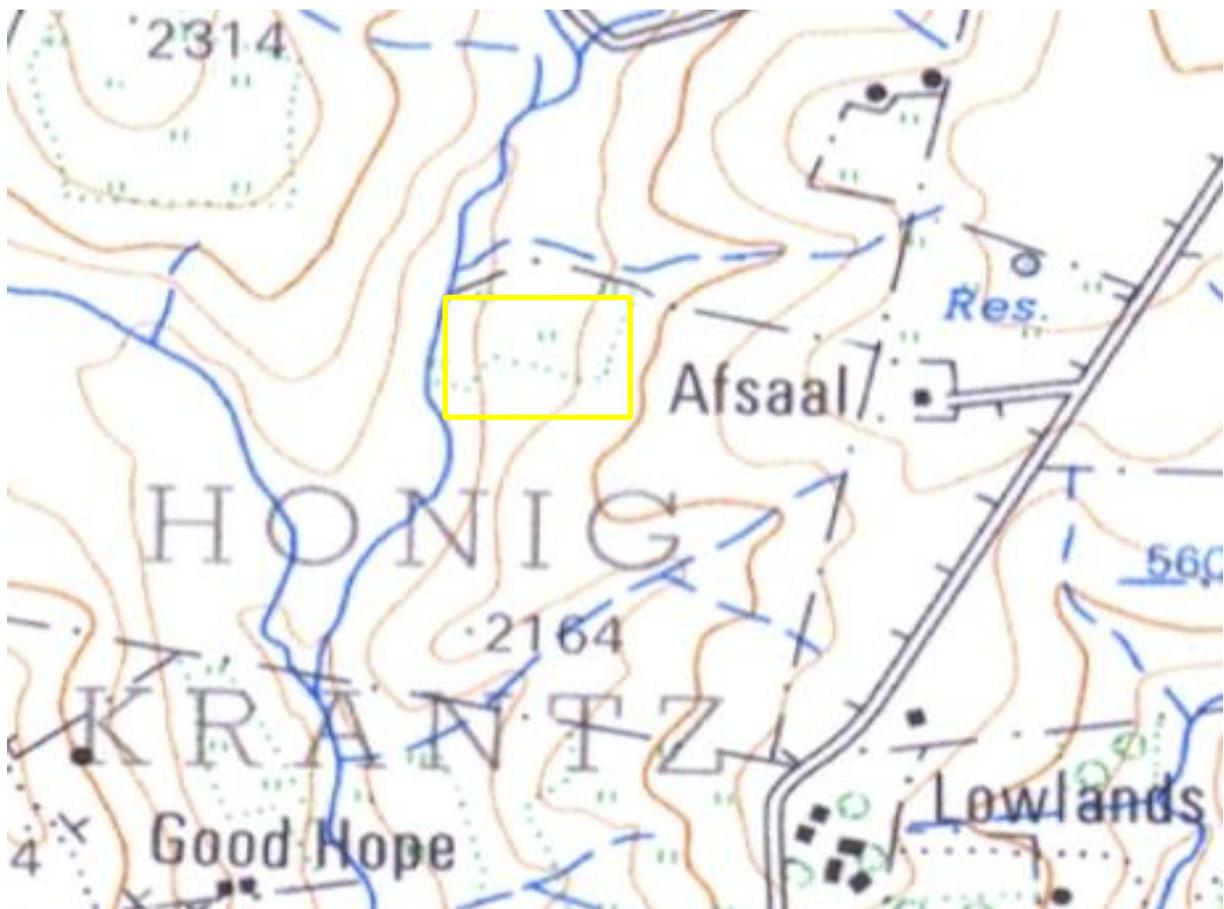


Figure 4: 1968 topo-cadastral map of project site

7. RESULT OF SITE INSPECTION

The vegetation in the lower portion of the site closest to the stream which runs along the western boundary of the site had recently been cut making visibility good. The area was inspected on foot including the stream where the invasive vegetation is being cut down and burnt. Previous cultivation is apparent in that some terracing of the area is visible. No heritage resources were found in this portion of the project site.



Figure 5: View across proposed site looking east



Figure 6: View across project site



Figure 7: Western boundary of project site near stream



Figure 8: Western boundary with removal of invasive trees

The remaining portion of the property, which has a thick grass layer, was inspected on foot including the gully that bisects the area. No heritage resources were found during the inspection.



Figure 9: Contrast between cut & uncut portions of project area looking west



Figure 10: View across project area looking southwards



Figure 11: Eastern boundary of project area showing grassland & stands of shrubs



Figure 12: View of gully



Figure 13: View inside gully

According to the South African fossil sensitivity map, the project falls into a zone of moderate fossil sensitivity which requires that a desktop palaeontological study be undertaken. The desktop study (see **Appendix 1**) found that the proposed site lies entirely on the potentially fossiliferous Dwyka Group tillites and diamictites that could have fragments of invertebrates as well as leaves and woods of the *Glossopteris* flora. Such fossils are very sporadic in their occurrence so it is very unlikely that fossils occur on the site. Nonetheless, a Fossil Chance Find Protocol should be added to the Environmental Management Programme (EMPr) for the development. The Fossil Chance Find Protocol can be found in Chapter 8 of the desktop report. Based on this information, it is recommended that no palaeontological site visit is required unless fossils are found once the excavations and/or drilling commences.

During the inspection the specialist, and author of this report, spoke to Neliswa Zweni and her daughter regarding the presence of graves or other important sites on the project area. They were walking along the road which forms the northern boundary of the proposed animal park. They said that to their knowledge there were no graves on the site and that they were unaware of any sites of local importance in and around the project area.

The socio-economic impacts of the development are:

- The proposed development is a first of its kind in South Africa with the focus of the park on the conservation of nature (natural fauna and flora). Environmental education is the foundation of the project, and will be at the centre of its design.
- The Mkhambathini area is regarded as being suitable for the establishment of game parks because of the natural veld.
- The Mkhambathini area is situated between two major urban centres, namely, Durban and Pietermaritzburg and near the N3 National road which is the primary transport route for tourists. The site is easily accessible to schools in the main urban centres.
- Many of the people who will come to the animal park will never have been to a larger game reserve and will never have seen African wildlife. It is essential that conservation be broadened up to include more people and have facilities that can educate on the necessity for conservation.
- There are a number of people, particularly from overseas who want the opportunity to study wildlife such as giraffe under controlled circumstances. The wildlife park will provide this opportunity and also the opportunity for the researches to stay on the property to undertake their research.
- There may be employment opportunities associated with the development during both the construction and operational phase which could benefit the community.
- There is likely to be a positive impact within the Cato Ridge and Camperdown areas.

- Dust and noise generated during the construction phase that will impact surrounding neighbours and landowners must be mitigated by ongoing measures to reduce the impact as much as possible.

8. CONCLUSIONS

An inspection of the area of the area proposed for the development of Dingo's Animal Kingdom revealed no heritage resources. The lower western section of the project area has been cultivated in the past. A gully bisects the project area into a northern half and a southern half.

A desktop palaeontological study of the project concluded that surface activities may impact upon the fossil heritage if preserved in the development footprint. The geological structures suggest that the rocks are either much too old or of the incorrect type to contain fossils so the expectation is that fossils will not be impacted by the development.

It is therefore recommended that from a heritage perspective, the development of Dingo's Animal Kingdom can proceed as long as the mitigation measures provided in this report and in the desktop palaeontological report area adhered to.

9. MITIGATION MEASURES

- For any chance heritage finds (graves, etc.), all work must cease in the area affected and the Contractor must immediately inform the Project Manager. A registered heritage specialist must be called to site to inspect the finding/s. The relevant heritage resource agency (the Institute) must be informed about the finding/s.
- The heritage specialist will assess the significance of the resource and provide guidance on the way forward.
- Permits must be obtained from the Institute if heritage resources are to be removed, destroyed or altered.
- Under no circumstances may any heritage material be destroyed or removed from site unless under direction of a heritage specialist.
- Should any recent remains be found on site that could potentially be human remains, the South African Police Service as well as the Institute must be contacted. No SAPS official may remove remains (recent or not) until the correct permit/s have been obtained.
- The Fossil Chance Find Protocol must be included in the EMPr for the construction of the Animal Kingdom.

10. REFERENCES

Bulpin, T.V. Undated. *To the shores of Natal*. Cape Town: Citadel Press

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Department of Rural Development and Land Reform's CDNGI Geospatial Portal (www.cdngiportal.co.za)

KSEMS Environmental Consulting. 2021. *Background Information Document. Proposed Dingo's Animal Kingdom Project, uMgungundlovu District Municipality, KwaZulu-Natal*

Prins, F. 2016. *Cultural Heritage Impact Assessment of the proposed Anniedale Quarry site adjacent to the R603, Camperdown*