

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: Natasha Higgitt

Date: Friday March 18, 2016

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Email: nhiggitt@sahra.org.za

CaseID: 8680

## Final Comment

**In terms of Section 38(8) of the National Heritage Resources Act (Act 25 of 1999)**

Attention: juwi Renewable Energies South Africa (Pty) Ltd

**juwi Renewable Energies (Pty) Ltd (juwi) wish to develop up to two ~12.8km, double circuit 132kV overhead transmission lines inside a 200m wide assessed corridor between the proposed Kronos Solar Park Central Substation (29°58'52.00"S by 22°25'1.65"E) and the Eskom's Cuprum substation (29°57'34.02"S by 22°18'1.20"E). The project would include the following: - Self-supporting or suspension pole pylons (?60 pylons @ 250m intervals) to support each 132 kV line; and - Access and maintenance tracks (gravel) along the transmission line route.**

Juwi Renewable Energies (Pty) Ltd appointed Aurecon South Africa (Pty) Ltd to undertake a Basic Assessment Process for the proposed 132kV Overhead Transmission Line Option 3 (Cuprum) for the Kronos Photovoltaic Development near Coppertone, Northern Cape Province.

The proposed project includes two 12.8 km double circuit 132kV overhead transmission lines inside a 200 m corridor between the proposed Kronos Solar Park central substation and Eskom's Cuprum substation. The transmission lines will include suspension pole pylons and access/maintenance tracks along the route. Kronos is in the process of applying for three solar parks associated with the transmission lines i.e. Kronos Solar Park PV1, PV2 and PV3. A Basic Assessment process is running concurrently for two transmission line alternatives i.e. Kronos and Cuprum.

ASHA Consulting (Pty) Ltd was appointed to conduct the Heritage Impact Assessment (HIA) and John Almond was appointed to conduct the Palaeontological Impact Assessment (PIA).

*Orton, 2015. Heritage Impact Assessment for three Proposed Solar Energy Facilities and three associated Transmission Lines near Copperton, Prieska Magisterial District, Northern Cape.*

**All three Solar Park Applications and the three Transmission Line alternatives were considered in the submitted report. Only results pertaining to the Transmission Line Alternative 3 (Cuprum) are discussed in this comment.**

The transmission line corridor was not physical surveyed as the line will run along an existing access road.

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Archaeological resources are expected to be of very low significance and the impact will be negligible.

Recommendations provided in the HIA include that if any archaeological material or human burials are uncovered during the course of development then work in the immediate area should be halted. The find would need to be reported to the heritage authorities and may require inspection by an archaeologist. Such heritage is the property of the state and may require excavation and curation in an approved institution.

*Almond, 2015. Specialist Palaeontological Assessment Report. Environmental Impact Assessment Process: Proposed 75 Megawatt Kronos Photovoltaic Facilities 1-3 and associated Transmission Lines 1-3 near Copperton, Northern Cape.*

**All three Solar Park Applications and the three Transmission Line alternatives were considered in the submitted report. Only results pertaining to the Transmission Line Alternative 3 (Cuprum) are discussed in this comment.**

The project area for Transmission Line Alternative 3 Cuprum is underlain at depth by unfossiliferous ancient Precambrian basement rocks of the Namaqua Metamorphic Province as well as Permo-Carboniferous glacial sediments of the Dwyka Group (Karoo Supergroup) that are, at most, sparsely fossiliferous and deeply-weathered near-surface. These older rocks are largely covered by superficial sediments such as Aeolian sands, calcrete and pan sediments. No sites or areas of high palaeontological sensitivity or no-go areas were identified within the Transmission Line Alternative 3 Cuprum.

Recommendations provided in the report include that no further palaeontological studies are required. Should substantial fossil remains such as vertebrate bones and teeth be exposed, the responsible Environmental Control Officer (ECO) should safeguard these, preferably *in-situ* and alert the SAHRA so that appropriate action can be taken by a professional palaeontologist, at the developer's expense.

## Final Comment

Regarding archaeological and palaeontological heritage resources, the SAHRA Archaeology, Palaeontology and Meteorites Unit accepts the submitted Heritage Impact Assessment and Palaeontological Impact Assessment and their respective recommendations.

If any evidence of archaeological sites or remains (e.g. remnants of stone-made structures, indigenous ceramics, bones, stone artefacts, ostrich eggshell fragments, charcoal and ash concentrations), fossils or other categories of heritage resources are found during the proposed development, SAHRA APM Unit (Natasha Higgitt/Phillip Hine 021 462 5402) must be alerted. If unmarked human burials are uncovered, the

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SAHRA Burial Grounds and Graves (BGG) Unit (Itumeleng Masiteng/Mimi Seetelo 012 320 8490), must be alerted immediately. A professional archaeologist or palaeontologist, depending on the nature of the finds, must be contracted as soon as possible to inspect the findings. If the newly discovered heritage resources prove to be of archaeological or palaeontological significance, a Phase 2 rescue operation may be required.

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

Yours faithfully

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Natasha Higgitt  
Heritage Officer  
South African Heritage Resources Agency

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Phillip Hine  
SAHRA Head Archaeologist (Acting)  
South African Heritage Resources Agency

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**ADMIN:**

Direct URL to case: <http://www.sahra.org.za/node/341740>  
(DEA, Ref: 14/12/16/3/3/1/1344)

**Terms & Conditions:**

1. This approval does not exonerate the applicant from obtaining local authority approval or any other necessary approval for proposed work.

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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.