A LETTER OF RECOMMENDATION (WITH CONDITIONS) FOR THE EXEMPTION OF A FULL PHASE 1 ARCHAEOLOGICAL IMPACT ASSESSMENT (AIA) FOR THE PROPOSED 132 KV POWERLINE, WALMER, PORT ELIZABETH, NELSON MANDELA BAY MUNICIPALITY, EASTERN CAPE PROVINCE.

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NOTE: An archaeological impact assessment was required as a requisite of the National Heritage Resources Act 25 of 1999, Section 38 (1)(c)(i):

38. (1) Subject to the provisions of subsections (7), (8) and (9), any person who intends to undertake a development categorized as –

(a) the construction of a road, wall, power line, pipeline, canal or other similar form of linear development or barrier exceeding 300 m in length;

This report follows the minimum standard guidelines required by the South African Heritage Resources Agency (SAHRA) and the Eastern Cape Provincial Heritage Resources Agency (ECPHRA) for compiling a Letter of Recommendation for the Exemption of a Full Phase 1 Archaeological Impact Assessment.

1. EXECUTIVE SUMMARY

1.1. The type of development:

The proposed development involves a double circuit 132 kV powerline from the existing Lorraine 132 kV substation to the existing 132 kV 17th Avenue substation.

The proposed infrastructure will provide for future load growth in this area. Many commercial and residential developments are envisaged by land owners requiring additional capacity to be installed.

The proposed route is approximately 2.8 km long and will cross private properties as well as NMBM owned land. The proposed powerline alignment, as well as a short alternative alignment. An overhead powerline is proposed up to point K on the plan from where an underground cable will be installed and under William Moffet Drive to the eastern side of the substation (see Figure 4, shows map from BID).

The following infrastructure specifications are relevant:

- All overhead lines will be constructed with dual circuit 132 kV monopole selfsupporting steel structures, with servitude width of 25 m;
- Maximum span lengths are limited by line alignment but could be between 140 m and 180 m;
- Should the 'Petechane' tower type be used the servitude may be reduced to 16 m;
- A servitude width of 1.5 m is required for underground cables;

- The powerline will be positioned not closer than 12.5 m from the railway line; and
- Where relevant, tower footing foundations will be specially designed for towers placed near or in a watercourse.

1.2. Applicant:

Nelson Mandela Bay Municipality

1.3. Consultant:

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1.4. Terms of reference

The purpose of the study was to conduct a phase 1 archaeological impact assessment (AIA) for the proposed 132 kV powerline, Walmer, Port Elizabeth, Nelson Mandela Bay Municipality, Eastern Cape Province.

The survey was conducted to:

- establish the range and importance of the exposed and *in situ* archaeological heritage materials remains, sites, and features;
- establish the potential impact of the development; and
- make recommendations to minimize possible damage to the archaeological heritage.

1.5. Brief Summary of Findings

No archaeological heritage remains, features, or sites were observed along the proposed powerline route and short alternative. It must be noted that the investigation was limited to the surface as well as the exposed and disturbed surface areas and in most areas archaeological visibility was obscured by varied dense vegetation cover. Exposed surface areas, for example, internal gravel roads, footpaths, diggings, and eroded areas were investigated for possible archaeological heritage remains.

2. DESCRIPTION OF THE PROPERTY

2.1. Location data

The proposed powerline will be situated in the already developed suburbs of Lorraine, Fairview and Overbaakens. The proposed route for the powerline extends from the Lorraine Substation along Macon Road, south of the railway line that runs along Dijon Road. The route then cuts across Circular Drive between residential areas along the superficial boundary of the suburbs of Fairview and Overbaakens. The route runs along a watercourse. The underground cabling extends from the William Moffet Substation underneath William Moffet Drive for approximately 460 m.

The area has been disturbed by construction and other human activities to the extent that it would be unlikely that *in situ* archaeological resources would still occur.

2.2. Map

1:50 000 topographic map: 3325CD & DD and 3425BA PORT ELIZABETH, 2006 Edition (Figure 1)

TABLE 1: GPS CO-ORDINATES FOR PROPOSED 132 KV POWERLINE, WALMER, PORT ELIZABETH, NELSON MANDELA BAY MUNICIPALITY, EASTERN CAPE PROVINCE, NELSON MANDELA BAY MUNICIPALITY, EASTERN CAPE PROVINCE

Reference	Description	Coordinate	Heritage Grading
Lorraine Substation	Extent of proposed power line	33°58′36.34″S; 25°31′30.82″E	N/A
17 th Avenue Substation	Extent of proposed power line	33°58′32.82″S; 25°33′16.18″E	N/A
Stormwater pipes	Stormwater pipes have been lying in this area from February 2015	33°58′40.07″S; 25°31′46.22″E 33°58′41.64″S; 25°31′52.45″E	N/A
Erf with buildings demolished in 2010	Buildings on this erf have completely disappeared in 2010 and has since become overgrown and thoroughfare	33°58′40.30″S; 25°31′55.78″E	N/A

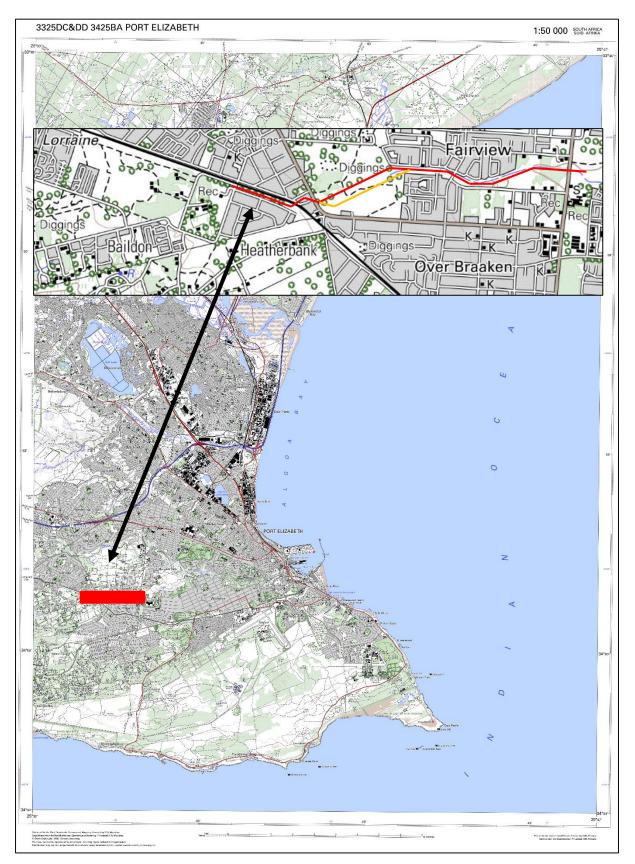


Figure 1. 1:50 000 topographic map 3325CD and 3425AB UITENHAGE showing the location of the proposed 132kV powerline and short alternative.



Figure 2. Aerial view showing the location of the proposed route for the 132 kV powerline and short alternative within the wider Nelson Mandela Metropolitan Municipality region (red block).



Figure 3. Aerial view of the location of the proposed route for the 132 kV powerline and short alternative extending from Lorraine through Fairview and Overbaakens.

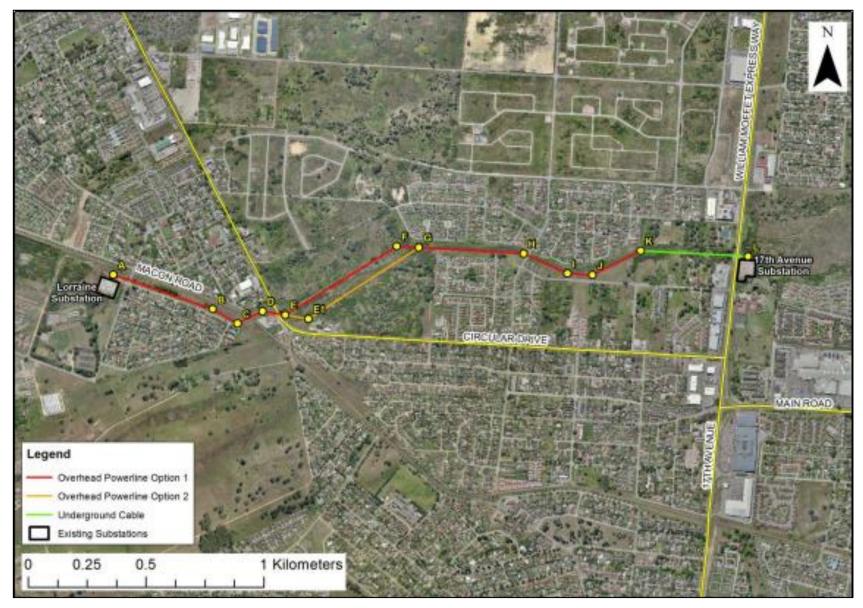


Figure 4. Close-up aerial view of the proposed route for the 132 kV powerline and short alternative (map from the project's BID, SRK Consulting).



Figure 5. Close-up aerial view of the western half of the proposed powerline route. Image included for clarification of the Google Earth image showing the stormwater pipes north along Macon Road and reference to a currently empty Erf that contained buildings up to 2010.







Figures 6-8. Google Earth images of the currently empty Erf showing the deterioration / demolition of the buildings over time (2004, 2007 and 2010).

3. ARCHAEOLOGICAL INVESTIGATION

3.1. Methodology

The archaeological investigation was conducted on foot by following the proposed route for the 132 kV powerline and short alternative. The route was investigated for possible archaeological heritage remains, features, and sites. The general area is mostly covered in varied dense vegetation with few exposed surface areas that limited archaeological visibility. The few surface exposed and disturbed areas were investigated for the occurrence of possible archaeological heritage remains.

Photographs and the GPS co-ordinates were taken using a Garmin Oregon 650. The coordinates have been plotted on Google Earth and these images have been used in the report. The map from the project's background information document (BID) has been has also been included.

3.2. Results of the Archaeological Survey

The proposed route occurs in already developed residential areas and the general area has been heavily disturbed by past construction activities such as the construction of the railway line along Macon Road, residential areas, associated underground infrastructure and associated roads as well as the watercourse that the route follows from Lorraine Substation to 17th Avenue Substation.

It must be noted that the investigation was limited to the surface as well as the exposed and disturbed surface areas and in most areas archaeological visibility was obscured by varied dense vegetation cover over the general area (Figures 9-17). Therefore, exposed surface areas, for example, internal gravel roads, footpaths, diggings, and eroded areas were investigated for possible archaeological heritage remains, however, even these disturbed areas have been covered in vegetation (Figures 18-21).

The current Google Earth image shows a row of concrete "structures" situated north of Macon Road within the proposed route of the 132 kV powerline, these structures are however concrete stormwater pipes and not environment structure (see Figures 9 and 10).

The 2004 Google Earth image shows that buildings occurred on an Erf situated next to Circular Drive through which the proposed powerline route passes. The buildings have either deteriorated or were demolished over time and had completely disappeared by 2010.

No archaeological heritage remains, features, or sites were observed along the proposed alternative routes for the 132 kV power line



Figure 9. View from the Lorraine substation facing east showing Macon Road, the circular concrete structures, new/upgraded gravel road and the railway line.



Figure 10. View of the general landscape next to Macon Road facing west towards Lorraine substation.



Figure 11. View of the dense grass cover and new development situated north of Circular Drive.



Figure 12. View of the general landscape along the proposed route for the 132 kV powerline.



Figure 13. View of the watercourse north off Circular Drive.



Figure 14. View of the route of the short alternative line from Circular Drive.



Figure 15. View of the general landscape along the route for the proposed 132 kV powerline within the vicinity of Gustav Preller Street and Eugene Marais Crescent facing west.



Figure 16. View of the general landscape along the route for the proposed 132 kV powerline within the vicinity of Gustav Preller Street and Eugene Marais Crescent facing east.



Figure 17. View of the general landscape along the route of the proposed 132 kV powerline within the vicinity of Oak Road.



Figure 18. View of the general landscape along the proposed route for the 132 kV powerline facing west from the M12 road / William Moffet near the 17^{th} Avenue substation.



Figure 19. Example of residential infrastructure development located within the general area along the route for the proposed 132 kV powerline.



Figure 20. Example of residential infrastructure development located within the general area along the route for the proposed 132 kV powerline.



Figure 21. Example of residential infrastructure development located within the general area along the route for the proposed 132 kV powerline.



Figure 22. Example of exposed surface area (digging) investigated for possible archaeological, historical or other heritage remains.

4. RELEVANT ARCHAEOLOGICAL IMPACT ASSESSMENTS

Very little systematic archaeological research has been conducted within the immediate and surrounding areas proposed for the alternative routes for the 132kV power line, therefore, Cultural Resource Management (CRM) Reports, such as archaeological and heritage impact assessments, assist in attempting to predict the archaeological and heritage resources that may occur within the proposed development areas. The following reports occur within the surrounding area of the proposed area for the development.

- Aikman, H. 2010. Proposed Private Burial Portions 36, 37 and 38 of Farm No. 18 Goedemoedsfontein: Port Elizabeth.
- Bennie. J. 2008. Heritage Impact Assessment: Parson's Vlei, Port Elizabeth.
- Binneman, J. 2007. A Phase 1 Archaeological Heritage Impact Assessment of the proposed construction of the chicken broiler houses of the Farm Rooihoogte Erf 328, Portions 25 and 26, Uitenhage District, Nelson Mandela Bay Municipality, Eastern Cape. Albany Museum: Grahamstown.
- Binneman, J. 2008. A phase 1 archaeological heritage impact assessment of the proposed development of a sand quarry on Erf 429, Theescombe, Port Elizabeth, Nelson Mandela Bay Municipality, Extern Cape Province.
- Binneman, J. 2008a. A Letter of Recommendation (with conditions) for the Exemption of a Full Phase 1 Archaeological and Heritage Impact Assessment for the Proposed Residential Development on Erven 18 and 20 Parsons Vlei, Port Elizabeth, Nelson Mandela Bay Municipality, District of Port Elizabeth, Eastern Cape Province.
- Binneman, J. 2008b. A Phase 1 Archaeological Impact Assessment of the Proposed Amanzi Country Estate, Uitenhage, Nelson Mandela Bay Municipality, Eastern Cape.
- Binneman, J. 2009. A phase 1 archaeological heritage impact assessment for the proposed subdivision and rezoning of Portion 1070, 409, and the Remainder of Erf 385, Theescombe, Port Elizabeth, Eastern Cape for the establishing of a residential development.
- Binneman, J. 2010. A phase 1 archaeological heritage impact assessment for the proposed rezoning and subdivision of farm 36 and 37, Theescombe, Port Elizabeth, Nelson Mandela Bay Municipality, Eastern Cape province for the development of 2 residential nodes, lodge, and nature reserve.
- Binneman, J. 2010. A Phase 1 Archaeological Heritage Impact Assessment for the Proposed Rezoning and Subdivision of Portion 1 and 118 of the Farm Chelsea No.
 25 (Kragga Kamma Game Park), Port Elizabeth, Nelson Mandela Bay Municipality, Eastern Cape Province.
- Binneman, J. 2011. A Phase 1 Archaeological Impact Assessment of the proposed rezoning and possible subdivision of Portion 72 (Portion of Portion 1) of the Farm Stadens River No. 485 in the Division of Uitenhage, Eastern Cape Province, for residential purposes.

Binneman. J. 2012. A letter of recommendation (with conditions) for the exemption of a

full phase 1 archaeological impact assessment for the proposed phase 2 redevelopment and landscaping of the southern portion of the King's Beach node of the Nelson Mandela Bath Southern Beachfront (Erf 1031, Erf 576, and the Remainder of Erf 575, Humewood).

- Binneman, J. 2014. A Letter of Recommendation for the Exemption of a Full Phase 1 Archaeological Heritage Impact Assessment for the Proposed Subdivision and Rezoning of Portions 25 and 45 of the Farm Cragga Kamma Nr 23 for Residential Development and Associated Services, Port Elizabeth, Eastern Cape Province.
- Binneman, J.N.F. & Booth, C. 2009. A Phase 1 Archaeological Impact Assessment (AIA) for the Proposed Installation of a 132kv Electricity Supply Line, Bloemendal to Tembani T-Off, Nelson Mandela Metropolitan Municipality, Port Elizabeth, Eastern Cape Province. Prepared for SRK Consulting.
- Binneman, J. & Booth, C. 2010. A phase 1 archaeological impact assessment for the proposed 20MW wind farm on three alternative sites: Erf 121, Driftsands (Site Alternative 1), Bushy Park Farm, Remainder of Erf 26, as well as Portions 5, 6, and 7 thereof (Site Alternative 2), and Rietfontein far, (Site Alternative 3), Nelson Mandela Metropolitan Municipality, Eastern Cape Province.
- Booth, C. 2013. A phase 1 archaeological impact assessment (AIA) for the proposed mining permit application on Erf 118, Schoenmakerskop, Port Elizabeth, Nelson Mandela Metropolitan Municipality, Eastern Cape Province.
- Booth, C. 2013. A Phase 1 Archaeological Impact Assessment for The Proposed Witteklip Waste Water Treatment Works and Connecting Sewer Line, Van Stadens, Nelson Mandela Bay Municipality, Eastern Cape Province. Prepared for SRK Consulting.
- Booth, C. 2014. A Letter of Recommendation (with conditions) for the Exemption of a Full Phase 1 Archaeological Impact Assessment for the Proposed Mining Permit Application on the Farm Altondale 408, Nelson Mandela Metropolitan Municipality (NMMM), Eastern Cape Province.
- Booth, C. 2014. A Phase 1 Archaeological Impact Assessment (AIA) For The Proposed Walmer Gqebera Low-Cost Housing Development on Erf 11305, Walmer, Port Elizabeth, Nelson Mandela Bay Municipality (NMBM), Eastern Cape Province.
- Booth, C. 2014. A Phase 1 Archaeological Impact Assessment (AIA) for the Proposed Walmer Gqebera Transitional Housing Development on a Portion of Erf 1948, Walmer, Port Elizabeth, Nelson Mandela Metropolitan Municipality, Eastern Cape Province.
- Booth, C. & Sanker, S. 2012. An Archaeological Ground-Truthing Survey for the Proposed Power Line Corridor for the Metrowind Wind Energy Facility (WEF), Van Staden's, Nelson Mandela Metropolitan Municipality, Eastern Cape Province. Prepared for SRK Consulting.
- Van Ryneveld, K. 2007. Phase 1 Archaeological Impact Assessment: The Hopewell Conservation Project, Greenbushes, Port Elizabeth, Eastern Cape, South Africa.
- Van Ryneveld, K. ... Phase 1 Archaeological Impact Assessment: Replacement of the Chatty Valley Collector Sewer and Construction of the Link Sewer, Bethelsdorp, Nelson Mandela Bay Municipality, Eastern Cape South Africa.

- Webley, L. 2009. Phase 1 heritage impact assessment: Caravan park development at Van Stadens River Mouth, Cacadu District, Eastern Cape.
- Webley, L. 2007. Phase 1 heritage impact assessment for the establishment of the Sardinia Bay Golf Estate (Erf 278 Theescombe), Port Elizabeth.
- Webley, L. 2005. Phase 1 heritage impact assessment of a proposed water reservoir site near Schoenmakerskop, Port Elizabeth.

5. REFERENCES

National Heritage Resources Act 25 of 1999 (NHRA 25 of 1999)

South African Heritage Resources Information System (SAHRIS) Database.

SRK Consulting. January 2016. Background Information Document: Basic Assessment Process for the Proposed 132 kV Powerline, Walmer, Port Elizabeth

6. LETTER OF RECOMMENDATION

It is recommended that the area for the proposed route for the 132 kV powerline and short alternative from Lorraine substation to 17th Avenue substation, Walmer, Port Elizabeth, Mandela Bay Municipality, Eastern Cape Province, is exempted from a full Phase 1 Archaeological Impact Assessment. The proposed area for development is of low archaeological cultural sensitivity. No archaeological heritage sites, features, or remains were documented during the survey, although it is possible that archaeological heritage material may occur below the surface. Taking into consideration the recommendation below, the development may proceed as planned.

There were no archaeological artefacts located during the phase 1 archaeological impact assessment carried out. If any archaeological or heritage material were to be discovered it is very unlikely that it would be *in situ*. However, there is always a possibility that human remains or other archaeological and historical material may be uncovered during the development. Such material must be reported to the Eastern Cape Provincial Heritage Resources Agency (ECPHRA) (043 745 0888) or the Albany Museum (046 622 2312) if exposed.

Note: This letter of recommendation **only** exempts the proposed development from a full Phase 1 Archaeological Heritage Impact Assessment, but **not** for other heritage impact assessments.

It must also be clear that this letter of recommendation for exemption of a full Phase 1 archaeological heritage impact assessment will be assessed by the relevant heritage resources authority. The final decision rests with the heritage resources authority, which should give a permit or a formal letter of permission for the destruction of any cultural sites.

The National Heritage Resources Act (Act No. 25 of 1999, section 35) requires a full Heritage Impact Assessment (HIA) in order that all heritage resources, that is, all places or objects of aesthetics, architectural, historic, scientific, social, spiritual linguistic or technological value or significance are protected. Thus any assessment should make provision for the protection of all these heritage components, including archaeology, shipwrecks, battlefields, graves, and structures older than 60 years, living heritage, historical settlements, landscapes, geological sites, palaeontological sites and objects.

7. RECOMMENDATIONS

Although no archaeological heritage remains, features, and sites were encountered during the survey, the following recommendations should be considered before development proceeds:

- 1. There is no preference as which alternative must be considered as both areas are of a low archaeological significance and it is unlikely that sites would be uncovered *in situ*. The developer may have the choice of the preferred and most feasible alternative option.
- 2. The environmental control officer (ECO) as well as the construction managers/foremen should be informed before construction starts on the possible types of heritage sites and cultural material they may encounter and the procedures to follow when they find sites.
- 3. If concentrations of archaeological and/or historical heritage material, marine shells, and / or human remains are uncovered during construction, all work must cease immediately and be reported to the Albany Museum (046 622 2312) and/or the Eastern Cape Provincial Heritage Resources Agency (ECPHRA) (043 745 0888) so that systematic and professional investigation/ excavation can be undertaken.

8. GENERAL REMARKS AND CONDITIONS

It must be emphasised that this letter of recommendation for exemption of a full Phase 1 archaeological heritage impact assessment is based on the visibility of archaeological sites/material and may not, therefore, reflect the true state of affairs. Sites and material may be covered by soil and vegetation and will only be located once this has been removed. In the unlikely event of such finds being uncovered, (during any phase of construction work), archaeologists must be informed immediately so that they can investigate the importance of the sites and excavate or collect material before it is destroyed (see attached list of possible archaeological sites and material). The *onus* is on the developer to ensure that this agreement is honoured in accordance with the National Heritage Act No. 25 of 1999.

APPENDIX A: HERITAGE LEGISLATIVE REQUIREMENTS

Parts of sections 3(1)(2)(3), 34(1), 35(4), 36(3) and 38(1)(8) of the National Heritage Resources Act 25 of 1999 apply:

S3. National estate

3. (1) For the purposes of this Act, those heritage resources of South Africa which are of cultural significance or other special value for the present community and for future generations must be considered part of the national estate and fall within the sphere of operations of heritage resources authorities.

3. (2) Without limiting the generality of subsection (1), the national estate may include –(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 palaeontological sites;
- (g) graves and burial grounds, including
 - (i) ancestral graves;
 - (ii) royal graves and graves of traditional leaders;
 - (iii) graves and 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) sites 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 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 (Act No. 43 of 1996).

3. (3) Without limiting the generality of subsections (1) and (2), a place or object is to be considered part of the national estate if it has cultural significance or other sper 19 value because of –

(a) its importance in the community, or pattern of South Africa's history;

(b) its possession of uncommon, rare or endangered aspects of South Africa's natural or cultural heritage;

(c) its potential to yield information that will contribute to an understanding of South Africa's natural or cultural heritage;

(d) its importance in demonstrating the principal characteristics of a particular class of South Africa's natural or cultural places or objects;

(e) its importance in exhibiting particular aesthetic characteristics valued by a community or cultural group;

(f) its importance in demonstrating a high degree of creative or technical achievement at a particular period;

(g) its strong or special association with the life or work of a person, group or organisation of importance in the history of South Africa; and

(i) sites of significance relating to the history of slavery in South Africa.

S34. Structures

34. (1) No person may alter or demolish any structure or part of a structure which is older than 60 years without a permit issued by the relevant provincial heritage resources authority.

S35. Archaeology, palaeontology and meteorites

35 (4) No person may, without a permit issued by the responsible heritage resources authority—

- (a) destroy, damage, excavate, alter, deface or otherwise disturb any archaeological or palaeontological site or any meteorite;
- (b) destroy, damage, excavate, remove from its original position, collect or own any archaeological or palaeontological material or object or any meteorite;
- (d) bring onto or use at an archaeological or palaeontological site any excavation equipment or any equipment which assist in the detection or recovery of metals or archaeological and palaeontological material or objects, or use such equipment for the recovery of meteorites.

S36. Burial grounds and graves

36. (3) (a) No person may, without a permit issued by SAHRA or a provincial heritage resources authority—

(a) destroy, damage, alter, exhume or remove from its original position or otherwise

disturb the grave of a victim of conflict, or any burial ground or part thereof which contains such graves;

- (b) destroy, damage, alter, exhume, remove from its original position or otherwise
 disturb any grave or burial ground older than 60 years which is situated outside a
 formal cemetery administered by a local authority; or
- (c) bring onto or use at a burial ground or grave referred to in paragraph (a) or (b) any excavation equipment, or any equipment which assists in the detection or recovery of metals.

S38. Heritage resources management

38. (1) Subject to the provisions of subsections (7), (8) and (9), any person who intends to undertake a development categorized as –

- (a) the construction of a road, wall, power line, pipeline, canal or other similar form of linear development or barrier exceeding 300 m in length;
- (b) the construction of a bridge or similar structure exceeding 50 m in length;
- (c) any development or other activity which will change the character of the site -
 - (i) exceeding 5000 m^2 in extent, or
 - (ii) involving three or more erven or subdivisions thereof; or
 - (iii) involving three or more erven or divisions thereof which have been consolidated within the past five years; or
- (iv) the costs of which will exceed a sum set in terms of regulations by SAHRA, or a provincial resources authority;
- (d) the re-zoning of a site exceeding 10 000 m^2 in extent; or
- (e) any other category of development provided for in regulations by SAHRA or a provincial heritage resources authority, must as the very earliest stages of initiating such a development, notify the responsible heritage resources authority and furnish it with details regarding the location, nature and extent of the proposed development.

APPENDIX B: GRADING SYSTEM

The NHRA stipulates the assessment criteria and grading of archaeological sites. The following categories are distinguished in Section 7 of the Act and the South African Heritage Resources Agency:

- National: This site is suggested to be considered of Grade 1 significance and should be nominated as such. Heritage resources with qualities so exceptional that they are of special national significance.
- Provincial: This site is suggested to be considered of Grade II significance and should be nominated as such. Heritage resources which, although forming part of the national estate, can be considered to have special qualities which make them significant within the context of a province or a region
- Local: This site is suggested to be Grade IIIA significance. This site should be retained as a heritage register site (High significance) and so mitigation as part of the development process is not advised.
- Local: This site is suggested to be Grade IIIB significance. It could be mitigated and (part) retained as a heritage register site (High significance).
- 'General' Protection A (Field Rating IV A): This site should be mitigated before destruction (usually High/Medium significance).
- 'General' Protection B (Field Rating IV B): This site should be recorded before destruction (usually Medium significance).
- 'General Protection C (Field Rating IV C): This site has been sufficiently recorded (in the Phase 1). It requires no further recording before destruction (usually Low significance).

APPENDIX C: IDENTIFICATION OF ARCHAEOLOGICAL FEATURES AND MATERIAL FROM COASTAL AREAS: guidelines and procedures for developers

1. Human Skeletal material

Human remains, whether the complete remains of an individual buried during the past, or scattered human remains resulting from disturbance of the grave, should be reported. In general the remains are buried in a flexed position on their sides, but are also found buried in a sitting position with a flat stone capping and developers are requested to be on the alert for this.

2. Shell middens

Shell middens can be defined as an accumulation of marine shell deposited by human agents rather than the result of marine activity. The shells are concentrated in a specific locality above the high-water mark and frequently contain stone tools, pottery, bone and occasionally also human remains. Shell middens may be of various sizes and depths, but an accumulation which exceeds 1 m² in extent, should be reported to an archaeologist.

3. Stone artefacts

These are difficult for the layman to identify. However, large accumulations of flaked stones which do not appear to have been distributed naturally should be reported. If the stone tools are associated with bone remains, development should be halted immediately and archaeologists notified

4. Fossil bone

Fossil bones may be found embedded in geological deposits. Any concentrations of bones, whether fossilized or not, should be reported.

5. Large stone features

They come in different forms and sizes, but are easy to identify. The most common are roughly circular stone walls (mostly collapsed) and may represent stock enclosures, remains of wind breaks or cooking shelters. Others consist of large piles of stones of different sizes and heights and are known as *isisivane*. They are usually near river and mountain crossings. Their purpose and meaning is not fully understood, however, some are thought to represent burial cairns while others may have symbolic value.

6. Historical artefacts or features

These are easy to identified and include foundations of buildings or other construction features and items from domestic and military activities.