

**PHASE 1 HERITAGE IMPACT ASSESSMENT (HIA) FOR THE PROPOSED
MINING PERMIT ON A PORTION OF PORTION 6 AND A PORTION OF
PORTION 8 OF RONDEVLY 208 IR**



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ACKNOWLEDGEMENTS

Australia ICOMOS. The Burra Charter.

Bergh, J.S. Geskiedenis Atlas van Suid-Afrika. Die vier Noordelike Provinsies. Van Schaik Uitgewers, 1998.

Beyers C.J. (Editor-in-Chief). Dictionary of South African Biography (Vol I – V). Pretoria, 1987.

Coertze, P.J. & Coertze, R.D. Verklarende vakwoordeboek vir Antropologie en Argeologie. Pretoria, 1996.

Hamman, Maike and Tunder, Vanessa. Introducing the Eastern Cape. A quick guide to its history, diversity and future challenges. Unpublished report dated February 2012.

Huffman, T.N. A Handbook to the Iron Age: The Archaeology of Pre- Colonial Farming Societies in Southern Africa. University of KwaZulu-Natal Press, 2007

Human Tissues Act, 1983 (Act No.65 of 1983 as amended)

Government Printers. 1: 50 000

National Heritage Resources Act, 1999 (Act No. 25 of 1999)

National Environmental Management Act, 1998 (Act No. 107 of 1998)

Ordinance on Exhumations, 1980 (Ordinance No. 12 of 1980)

Pistorius, J.C.C. A Phase 1 Heritage Impact Assessment (HIA) Study For The Proposed Landau Colliery Navigation Section Umlalazi South Block Extension Near Emahlaleni (Witbank) On The Eastern Highveld of the Mpumalanga Province, March 2014. (Unpublished).

Potgieter, D.J. (editor-in-chief) Standard Encyclopaedia of Southern Africa. London 1971.

Rosenthal E. (Editor) Encyclopaedia of Southern Africa, London and New York 1973

The National Archives of South Africa databases.

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ABOUT THIS REPORT

The heritage report must reflect that consideration has been given to the history and heritage significance of the study area and that the proposed activities is sensitive towards the heritage resources and does not significantly alter or destroy the heritage significance of the study area.

The heritage report must refer to the heritage resources currently in the study area.

The opinion of an independent heritage consultant is required to evaluate if the proposed work generally follows a good approach that will ensure the conservation of the heritage resources.

The National Heritage Resources Act, 1999 (Act No. 25 of 1999), the National Environmental Management Act, 1998 (Act No. 107 of 1998), Ordinance on Exhumations, 1980 (No. 12 of 1980) and the Human Tissues Act, 1983 (Act No. 65 of 1983 as amended) are the guideline documents for a report of this nature.

Leonie Marais was appointed by REC SERVICES (PTY) LTD (trading as Rock Environmental Consulting) to carry out a Phase 1 Heritage Impact Assessment (HIA) for the proposed mining right on a portion of Portion 6 and Portion 8 of the Farm Rondevly 208-IR, Mpumalanga Province. The site visit took place on 4 October 2018.

DEFINITION OF TERMS:

“alter” means any action affecting the structure, appearance or physical properties of a place or object, whether by way of structural or other works, by painting, plastering or other decoration or any other means.

“archaeological” means—

(a) material remains resulting from human activity which are in a state of disuse and are in or on land and which are older than 100 years, including artefacts, human and hominid remains and artificial features and structures;

(b) rock art, being any form of painting, engraving or other graphic representation on a fixed rock surface or loose rock or stone, which was executed by human agency and which is older than 100 years, including any area within 10m of such representation;

(c) wrecks, being any vessel or aircraft, or any part thereof, which was wrecked in South Africa, whether on land, in the internal waters, the territorial waters or in the maritime culture zone of the Republic, as defined respectively in sections 3, 4 and 6 of the Maritime Zones Act, 1994 (Act No. 15 of 1994), and any cargo, debris or artefacts found or associated therewith, which is older than 60 years or which SAHRA considers to be worthy of conservation; and

(d) features, structures and artefacts associated with military history which are older than 75 years and the sites on which they are found.

“conservation”, in relation to heritage resources, includes protection, maintenance, preservation and sustainable use of places or objects so as to safeguard their cultural significance.

“cultural significance” means aesthetic, architectural, historical, scientific, social, spiritual, linguistic or technological value or significance.

“development” means any physical intervention, excavation, or action, other than those caused by natural forces, which may in the opinion of a heritage authority in any way result in a change to the nature, appearance or physical nature of a place, or influence its stability and future well-being, including—

(a) construction, alteration, demolition, removal or change of use of a place or a structure at a place;

(b) carrying out any works on or over or under a place;

(c) subdivision or consolidation of land comprising, a place, including the structures or airspace of a place;

(d) constructing or putting up for display signs or hoardings;

(e) any change to the natural or existing condition or topography of land; and

(f) any removal or destruction of trees, or removal of vegetation or topsoil; object that is specifically designated by that state as being of importance.

“grave” means a place of interment and includes the contents, headstone or other marker of such a place, and any other structure on or associated with such place.

“heritage resource” means any place or object of cultural significance.

“heritage resources authority” means the South African Heritage Resources Agency, or in respect of a province, a provincial heritage resources authority.

“heritage site” means a place declared to be a national heritage site by SAHRA or a place declared to be a provincial heritage site by a provincial heritage resources authority.

“improvement”, in relation to heritage resources, includes the repair, restoration and rehabilitation of a place protected in terms of Act 25 of 1999.

“living heritage” means the intangible aspects of inherited culture, and may include—

- (a) cultural tradition;
- (b) oral history;
- (c) performance;
- (d) ritual;
- (e) popular memory;
- (f) skills and techniques;
- (g) indigenous knowledge systems; and
- (h) the holistic approach to nature, society and social relationships.

“local authority” means a municipality as defined in section 10B of the Local Government Transition Act, 1993 (Act No. 209 of 1993).

“management”, in relation to heritage resources, includes the conservation, presentation and improvement of a place protected in terms of Act 25 of 1999.

“meteorite” means any naturally-occurring object of extraterrestrial origin.

“object” means any movable property of cultural significance which may be protected in terms of any provisions of Act 25 of 1999, including—

- (a) any archaeological artefact;

- (b) palaeontological and rare geological specimens;
- (c) meteorites; and
- (d) other objects.

“palaeontological” means any fossilised remains or fossil trace of animals or plants which lived in the geological past, other than fossil fuels or fossiliferous rock intended for industrial use, and any site which contains such fossilised remains or trances.

“place” includes—

- (a) a site, area or region;
- (b) a building or other structure which may include equipment, furniture, fittings and articles associated with or connected with such building or other structure;
- (c) a group of buildings or other structures which may include equipment, furniture, fittings and articles associated with or connected with such group of buildings or other structures;
- (d) an open space, including a public square, street or park; and
- (e) in relation to the management of a place, includes the immediate surroundings of a place.

“presentation” includes—

- (a) the exhibition or display of;
- (b) the provision of access and guidance to;
- (c) the provision, publication or display of information in relation to; and
- (d) performances or oral presentations related to, heritage resources protected in terms of Act 25 of 1999.

“public monuments and memorials” means all monuments and memorials—

- (a) erected on land belonging to any branch of central, provincial or local government, or on land belonging to any organisation funded by or established in terms of the legislation of such a branch of government; or
- (b) which were paid for by public subscription, government funds, or a public-spirited or military organisation, and are on land belonging to any private individual.

“site” means any area of land, including land covered by water, and including any structures or objects thereon.

“structure” means any building, works, device or other facility made by people and which is fixed to land, and includes any fixtures, fittings and equipment associated therewith.

“victims of conflict” means—

(a) certain persons who died in any area now included in the Republic as a direct result of any war or conflict as specified in the regulations, but excluding victims of conflict covered by the Commonwealth War Graves

Act, 1992 (Act No. 8 of 1992);

(b) members of the forces of Great Britain and the former British Empire who died in active service in any area now included in the Republic prior to 4 August 1914;

(c) persons who, during the Anglo-Boer War (1899-1902) were removed as prisoners of war from any place now included in the Republic to any place outside South Africa and who died there; and

(d) certain categories of persons who died in the "liberation struggle" as defined in the regulations, and in areas included in the Republic as well as outside the Republic.

EXECUTIVE SUMMARY

Leonie Marais Heritage Practitioner was requested by REC SERVICES (PTY) LTD (trading as Rock Environmental Consulting) to carry out a Phase 1 Heritage Impact Assessment (HIA) for the proposed mining permit on a portion of Portion 6 and a portion of Portion 8 of the Farm Rondevly 208-IR known as Block A, Mpumalanga Province.

A field survey was conducted after which a survey of literature was undertaken. Graves are situated in the greater study area within 100m from the proposed mining area. No graves will directly be impacted on by the proposed development.

It should be noted that the sub-surface archaeological and/or historical deposits and graves are always a possibility. Care should be taken during any work in the entire area and if any of the above is discovered, an archaeologist/heritage practitioner should be commissioned to investigate.

1. INTRODUCTION

Based on the results obtained from the prospecting right conducted on the same pieces of land, Vandasark Pty (Ltd) is proposing to upgrade the existing prospecting area to a mining right. The mining permit application to be applied for will be for the mining of coal using the box cut method in the area illustrated in Figure 1.



Figure 1: Mining Right area illustrated in red.

The box cut method aims to reach the coal seam, and entails an initial cut given for the development of a mine (the cut generally resembles a box having walls on all sides). After the box cut is made benches are developed that will widen or extend the initial cut. To form additional benches new cuts are made to reach the next bench's floor level. Infrastructure planned for the site will include and not be limited to waste rock dumps, Power lines, access roads, offices, parking and a truck loading area.

1.1 WHY A PHASE 1 HERITAGE IMPACT ASSESSMENT IS REQUIRED?

This project may potentially impact on any types and ranges of heritage resources that are outlined in Section 3 of the National Heritage Resources Act, 1999 (Act No. 25 of 1999). Subsequently a Phase 1 Heritage Impact Assessment (HIA) was commissioned by REC SERVICES (PTY) LTD (trading as Rock Environmental Consulting) and conducted by Leonie Marais.

1.1.1 METHOD

The objective of this Phase 1 Heritage Impact Assessment (HIA) was to gain an overall understanding of the heritage sensitivities of the area and indicate how they may be impacted on through development activities. The site survey took place on 4 October 2018.

In order to establish heritage significance the following method was followed:

- Investigation of primary resources (archival information)
- Investigation of secondary resources (literature and maps)
- Physical evidence (site investigation)
- Determining Heritage Significance.

1.2 BRIEF BACKGORUND HISTORY OF THE GREATER STUDY AREA

The Stone Age

Stone Age sites are marked by stone artefacts that are found scattered on the surface or as parts of deposits in caves and rock shelters. The Stone Age is divided into the Early Stone Age (ESA) (covers the period from approximately 2.5 million years ago to 250 000 years ago), the Middle Stone Age (MSA) (refers to the period approximately from 250 000 years ago to 22 000 years ago) and the Late Stone Age (LSA) (the period from approximately 22 000 years ago to 200 years ago).

Dongas and eroded areas at Maleoskop near Groblersdal is one of only a few places in Mpumalanga where ESA Olduwan and Acheulian artefacts have been found. Evidence for the MSA has been excavated at the Bushman Rock Shelter near Ohrigstad. This cave was repeatedly visited over a prolonged period. The oldest layers date back to 40 000 years BP and the youngest to 27 000 BP.

LSA occupation of the Mpumalanga Province also has been researched at Bushman Rock Shelter where it dates back 12 000 BP to 9 000 BP and at Höningnestkrans near Badfontein where a LSA site dates back to 4 870 BP to 200 BP.

The LSA is also associated with rock paintings and engravings which were done by San hunter-gatherers and Khoi Khoi herders. Rock paintings were also done by Early Iron Age (EIA) farmers. Approximately 400 rock art sites are distributed throughout Mpumalanga, notably in the northern and eastern regions at places such as Emalaheni (Witbank) (4), Lydenburg (2), White River and the southern Kruger National Park (76), Nelspruit and the Nsikazi District (250). The Ermelo area holds eight rock paintings.

The rock art of the Mpumalanga Province can be divided into San rock art which is the most widely spread, herder or KhoeKhoe paintings (thin scattering from the Limpopo Valley) through the Lydenburg district into the Nelspruit area) and localised late white farmer paintings. Farmer paintings can be divided into Sotho-Tswana finger paintings and Nguni engravings (Only 20 engravings occur at Boomplaats, north-west of Lydenburg). Farmer paintings are more localised than San or herder paintings and were mainly used by the painters for instructional purposes.

During the LSA and Historical Period, San people called the Batwa lived in sandstone caves and rock shelters near Lake Chrissie in the Ermelo area. The Batwa are descendants of the San, the majority of which intermarried with Bantu-Negroid people such as the Nhlapo from Swazi-descend and Sotho-Tswana clans such as the Pai and Pulana. Significant intermarriages and cultural exchanges occurred between these groups. The Batwa were hunter-gatherers who lived from food which they collected from the veldt as well as from the pans and swamps in the area. During times of unrest, such as the difaqane in the early nineteenth century, the San would converge on Lake Chrissie for food and sanctuary. The caves, lakes, water pans and swamps provided relative security and camouflage. Here, some of the San lived on the surfaces of the water bodies by establishing platforms with reeds. With the arrival of the first colonists in the nineteenth century many of the local Batwa family groups were employed as farm labourers.

Iron Age

The Iron Age is associated with the first agro-pastoralists or farming communities who lived in semi-permanent villages and who practised metal working during the last two millennia. The Iron Age is usually divided into the Early Iron Age (EIA) (covers the 1st millennium AD) and the Later Iron Age (LIA) (covers the first 880 years of the 2nd millennium AD).

Evidence for the first farming communities in the Mpumalanga Province is derived from a few EIA potsherds which occur in association with the LSA occupation of the Höningnest Shelter near Badfontein. The co-existence of EIA potsherds and LSA stone tools suggest some form of 'symbiotic relationship' between the Stone Age huntergatherers who lived in the cave and EIA farmers in the area (also note Batwa andSwazi/Sotho Tswana relationship). The Welgelegen Shelter on the banks of the Vaal River near Ermelo also reflects some relationship between EIA

farmers who lived in this shelter and hunter-gatherers who manufactured stone tools and who occupied a less favourable overhang nearby during AD1200. EIA sites were also investigated at Sterkspruit near Lydenburg (AD720) and in Nelspruit where the provincial governmental offices were constructed. The most infamous EIA site in South Africa is the Lydenburg head site which provided two occupation dates, namely during AD600 and from AD900 to AD1100. At this site the Lydenburg terracotta heads were brought to light. Doornkop, located south of Lydenburg, dates from AD740 and AD810 (Evers, 1981; Whitelaw, 1996). The Late Iron Age is well represented in Mpumalanga and stretches from AD1500 well into the nineteenth century and the Historical Period. Several spheres of influence, mostly associated with stone walled sites, can be distinguished in the region. Some of the historically well-known spheres of influence include the following:

- Early arrivals in the Mpumalanga Province such as Bakone clans who lived between Lydenburg, Badfontein and Machadodorp and Eastern Sotho clans such as the Pai, Pulana and Kutswe who established themselves in the eastern parts of the province.
- Swazi expansion into the Highveld and Lowveld of the Mpumalanga Province occurred during the reign of Sobhuza (AD1815 to 1836/39) and Mswati (AD1845 to 1868) while Shangaan clans entered the province across the Lembombo Mountains in the east during the second half of the nineteenth century.
- The Bakgatla (Pedi) chiefdom in the Steelpoort Valley rose to prominence under Thulare during the early 1800's and was later ruled by Sekwati and Sekhukune from the village of Tsjate in the Leolo Mountains. The Pedi maintained an extended sphere of influence across the Limpopo and Mpumalanga Provinces during the nineteenth century.
- The Ndzundza-Ndebele established settlements at the foot of the Bothasberge (KwaMaza and Esikhunjini) in the 1700's and lived at Erholweni from AD1839 to AD1883 where the Ndzundza-Ndebele's sphere of influence known as KoNomthjarhelo stretched across the Steenkampsberge.
- The Bakopa lived at Maleoskop (1840 to 1864) where they were massacred by the Swazi while the Bantwane live in the greater Groblersdal and Marble Hall areas.
- Corbelled stone huts which are associated with ancestors of the Sotho on Tafelkop near Davel which date from the AD 1700's into the nineteenth century.

- Stone walled settlements spread out along the eastern edge of the Groot Dwarsriver Valley served as the early abode for smaller clans such as the Choma and Phetla communities which date from the nineteenth century.

The Historical Period

Historical towns in the vicinity of the area earmarked for development include Emalahleni (Witbank) and Middelburg. Witbank came into being as the railway line between Pretoria and Lourenço Marques which was built in 1894 passed close to where Emalahleni (Witbank) is located today. The first Europeans who came to the area observed the abundance of coal, which was evident on the surface or in the beds of streams. A stage post for wagons close to a large outcrop of whitish stones (a 'white ridge') gave the town its name. Witbank was established in 1903 on a farm known as Swartbos which belonged to Jacob Taljaard.

Middelburg is one of the oldest towns that were established by the Voortrekkers in the previous Transvaal. The town was established on the farms of Klipfontein and Keerom on the banks of the Klein Olifants River in 1859. It is generally accepted that Middelburg's name is derived from the fact that the Transvaal Republic established the town midway between Pretoria and Lydenburg. The choice for Middelburg's location was not well accepted by the inhabitants and it was moved to the farm Sterkfontein. Here, a town was established and named Nasaret (Nazareth). However, the name did not appeal to the local community and its original name was reinstated. Middelburg temporarily served as the seat of the Transvaal Republic after the siege of Pretoria during the South African War (1899-1902).

Today Middelburg and Emalahleni (Witbank) are important centres where coal is mined and transported to Richards Bay from where it is exported all over the world. The 20th century also saw the introduction of large-scale irrigation and dry land farming on the Eastern Highveld. Today the economic activities of the area include diamond and coal mining, light and heavy industries as well as steel and vanadium operations¹.

1.3 LOCATION AND PHOTOGRAPHIC RECORD OF STUDY AREA

The mining area extends over a portion of Portion 6 and Portion 8 of Rondevly 208 IR. The mining right area is situated 4km northwest of Argent, 15km northeast of Delmas, 17km southwest of Kusile Power Station and around 50 km from Emalahleni. It is bordered by old mining works to the south and surrounded by agricultural land.

¹ J.C.C. Pistorius, A Phase 1 Heritage Impact Assessment (HIA) Study For The Proposed Landau Colliery Navigation Section Umlalazi South Block Extension Near Emalahleni (Witbank) On The Eastern Highveld of the Mpumalanga Province, March 2014. (Unpublished Report)



Figure 1: Locality Map



Figure 2: Photograph positions



Photograph 1: Site characteristics



Photograph 2: Site characteristics



Photograph 3: Site characteristics



Photograph 4: Graves situated in the greater study area



Photograph 5: Graves situated close to the mining area at E



Photograph 6: Graves situated close to the mining area at E



Photograph 7: Graves situated close to the mining area at E



Photograph 8: Graves situated close to the mining area at E

2. FINDINGS

2.1 PRE-COLONIAL HERITAGE SITES

Possibilities: Greater study area taken into account.

Stone Age

The Stone Age is the period in human history when stone material was mainly used to produce tools². In South Africa the Stone Age can be divided in three periods³;

- Early Stone Age 2 000 000 – 150 000 years ago
- Middle Stone Age 150 000 – 30 000 years ago
- Late Stone Age 40 000 years ago - +/- 1850 AD

Iron Age

The Iron Age is the period in human history when metal was mainly used to produce artefacts⁴. In South Africa the Iron Age can be divided in three periods;

- Early Iron Age 250-900 AD
- Middle Iron Age 900-1300 AD
- Late Iron Age 1300-1840 AD⁵

There are no pre-colonial heritage sites evident in the study area. This can be attributed to previous farming and mining activities in the study area.

2.2 HISTORICAL PERIOD HERITAGE SITES

Possibilities: Greater study area taken into account.

- Pioneer sites;
- Sites associated with early mining;
- Structures older than 60 years;
- Graves (Graves younger than 60 years, graves older than 60 years, but younger than 100 years, graves older than 100 years, graves of victims of conflict or of individuals of royal descent).

Graves are situated within 100m from the proposed mining area

² P. J. Coertze & R.D. Coertze, Verklarende vakwoordeboek vir Antropologie en Argeologie.

³ S.A. Korsman & A. Meyer, *Die Steentydperk en rotskuns* in J.S. Bergh (red) Geskiedenisatlas van Suid-Afrika. Die vier noordelike provinsies.

⁴ P.J. Coertze & R.D. Coertze, Verklarende vakwoordeboek vir Antropologie en Argeologie.

⁵ M.M. van der Ryst & A Meyer. *Die Ystertydperk* in J.S. Bergh (red) Geskiedenisatlas van Suid-Afrika. Die vier noordelike provinsies and T.N Huffman, A Handbook to the Iron Age: The Archaeology of Pre-Colonial Farming Societies in Southern Africa.

2.3 ORIGINAL LANDSCAPE

Previous farming and mining activities have altered the original landscape in the greater study area.

2.4 INTANGIBLE HERITAGE

The intangible heritage of the greater study area can be found in the stories of past and present inhabitants.

3 CATEGORIES OF HERITAGE VALUE (ACT 25 OF 1999)

The National Heritage Resources Act (Act 25 of 1999) identifies the following categories of value under section 3(1) and (2) of the Act under the heading "National Estate":

- "3 (1) For the purpose 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.
- (2) Without limiting the generality of subsection (1), the national estate may include-
- (a) places, buildings, structures and equipment of cultural significance;
 - (b) places 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 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) sites of significance relating to the history 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 interests; 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 I (xiv) of the National Archives of South Africa Act, 1996 (Act No. 43 of 1996).
- (3) Without limiting the generality of the subsections (1) and (2), a place or object is to be considered part of the national estate if it has cultural significance or other special 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 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 a particular community or cultural group for social, cultural or spiritual reasons;
 - (h) Its strong or special association with the life and 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."

3.1 HERITAGE VALUE OF WEIGHED AGAINST CULTURAL SIGNIFICANCE CATEGORIES

3.1.1 Spiritual value

During the site visit/field work no indication of any spiritual activity was observed on the proposed site. Thus no sites of spiritual value will be impacted on by the proposed project.

3.1.2 Scientific value

No sites of scientific value were observed on or near the site earmarked for development.

3.1.3 Historical value

No historical value associated with the site could be found in primary and secondary sources.

3.1.4 Aesthetic value

No heritage item with exceptional aesthetic (architectural) value was identified in the study area.

3.1.5 Social value

Social value is attributed to sites that are used by the community for recreation and formal and informal meetings regarding matters that are important to the community. These sites include parks, community halls, sport fields etc. None of the said evident in the study area.

3.2 SPECIFIC CATEGORIES INVESTIGATED AS PER SECTION 3 (1) AND (2) OF THE NATIONAL HERITAGE LEGISLATION (ACT 25 OF 1999)

3.2.1 Does the site/s provide the context for a wider number of places, buildings, structures and equipment of cultural significance?

The study area does not provide context for a wider number of places, buildings, structures and equipment of cultural significance. The reason being the low density of heritage items in the study area.

3.2.2 Does the site/s contain places to which oral traditions are attached or which are associated with living heritage?

Places to which oral traditions are attached or associated with living heritage are usually found in conjunction with traditional settlements and villages which still practise age old traditions. None of these are evident near or on the proposed site.

3.2.3 Does the site/s contain historical settlements?

No historical settlements are located on or near the proposed site.

3.2.4 Does the site/s contain landscapes and natural features of cultural significance?

Due to previous agricultural activities and infrastructure development the original character of the landscape has been altered significantly in the study area. There the site does not contain natural features of cultural significance.

3.2.5 Does the site/s contain geological sites of cultural importance?

Geological sites of cultural importance include meteorite sites (Tswaing Crater and Vredefort Dome), fossil sites (Karoo and Krugersdorp area), important mountain ranges or ridges (Magaliesburg, Drakensberg etc.). The proposed site is not located in an area known for sites of this importance.

3.2.6 Does the site/s contain a wide range of archaeological sites?

The proposed site does not contain any surface archaeological deposits, a possible reason is previous agricultural and mining activities in the greater study area.

The possibility of sub-surface findings always exists and should be taken into consideration in the Environmental Management Programme.

If sub-surface archaeological material is discovered work must stop and a heritage practitioner preferably an archaeologist contacted to assess the find and make recommendations.

3.2.7 Does the site/s contain any marked graves and burial grounds?

The specific site earmarked for development does not contain any marked graves or burial grounds, ***but graves are situated within 100m from the mining area, thus in the greater study area.***

The possibility of graves not visible to the human eye always exists and this should be taken into consideration in the Environmental Management Plan.

It is important to note that all graves and cemeteries are of high significance and are protected by various laws. Legislation with regard to graves includes the National Heritage Resources Act, 1999 (Act No. 25 of 1999) whenever graves are 60 years and older. Other legislation with regard to graves includes those when graves are exhumed and relocated, namely the Ordinance on Exhumations (no 12 of 1980) and the Human Tissues Act, 1983 (Act 65 No. of 1983 as amended).

If sub-surface graves are discovered work should stop and a professional preferably an archaeologist contacted to assess the age of the grave/graves and to advice on the way forward.

3.2.8 Does the site/s contain aspects that relate to the history of slavery?

This is not an area associated with the history of slavery like the Western Cape Province.

3.2.9 Can the place be considered as a place that is important to the community or in the pattern of South African history?

In primary and secondary source material the proposed site is not described as important to the community or in the pattern of South African history.⁶

3.2.10 Does the site/s embody the quality of a place possessing uncommon or rare endangered aspects of South Africa's natural and cultural heritage?

⁶ D.J. Potgieter (Editor-in-Chief), Standard Encyclopaedia of Southern Africa and the TAB database at the National Archives of South Africa.

The proposed site does not possess uncommon, rare or endangered aspects of South Africa's natural and cultural heritage. These sites are usually regarded as Grade 1 or World Heritage Sites.

3.2.11 Does the site/s demonstrate the principal characteristics of South Africa's natural or cultural places?

The proposed site does not demonstrate the principal characteristics of South Africa's natural or cultural places. These characteristics are usually associated with aesthetic significance.

3.2.12 Does the site/s exhibit particular aesthetic characteristics valued by the community or cultural groups?

This part of the greater study area does not exhibit particular aesthetic characteristics valued by the community or cultural groups. The reason being the low density of heritage buildings and structures located in the greater study area.

3.2.13 Does the site/s contain elements, which are important in demonstrating a high degree of creative technical achievement?

The site does not contain elements which are important in demonstrating a high degree of creative technical achievement. Reason being none of the above are evident on site.

3.2.14 Does the site/s have strong and special associations with particular communities and cultural groups for social, cultural and spiritual reasons?

The proposed site does not have a strong or special association with particular communities and cultural groups for social, cultural and spiritual reasons. No comment in this regard was received during the public participation period.

3.2.15 Does the site/s have a strong and special association with the life or work of a person, group or organisation?

No indication of the above could be found in primary and secondary research sources.⁷

⁷ C.J. Beyers (Editor-in-Chief), Dictionary of South African Biography (vol I-V) and the TAB database at the National Archives of South Africa

4. RECOMMENDATIONS

- Graves are situated within 100m from the proposed mining area and should preferably conserved *in situ*.
- A buffer of 100m will need to be implemented from the closest graves to the mining area. No mining is allowed within 100m from graves.
- Mining activities are not allowed to isolate the graves present as the said graves need to be accessible for family and relatives.
- Graves could be relocated if the mining activity will isolate graves and such relocations are subject to a formal relocation process by a suitable and qualified heritage specialist.
- Fencing of the existing graveyards.
- The discovery of subsurface archaeological and/or historical material as well as graves must be considered in the Environmental Management Programme. See 3.2.6 and 3.2.7.
- 100m buffer for graves are illustrated in Figure below:

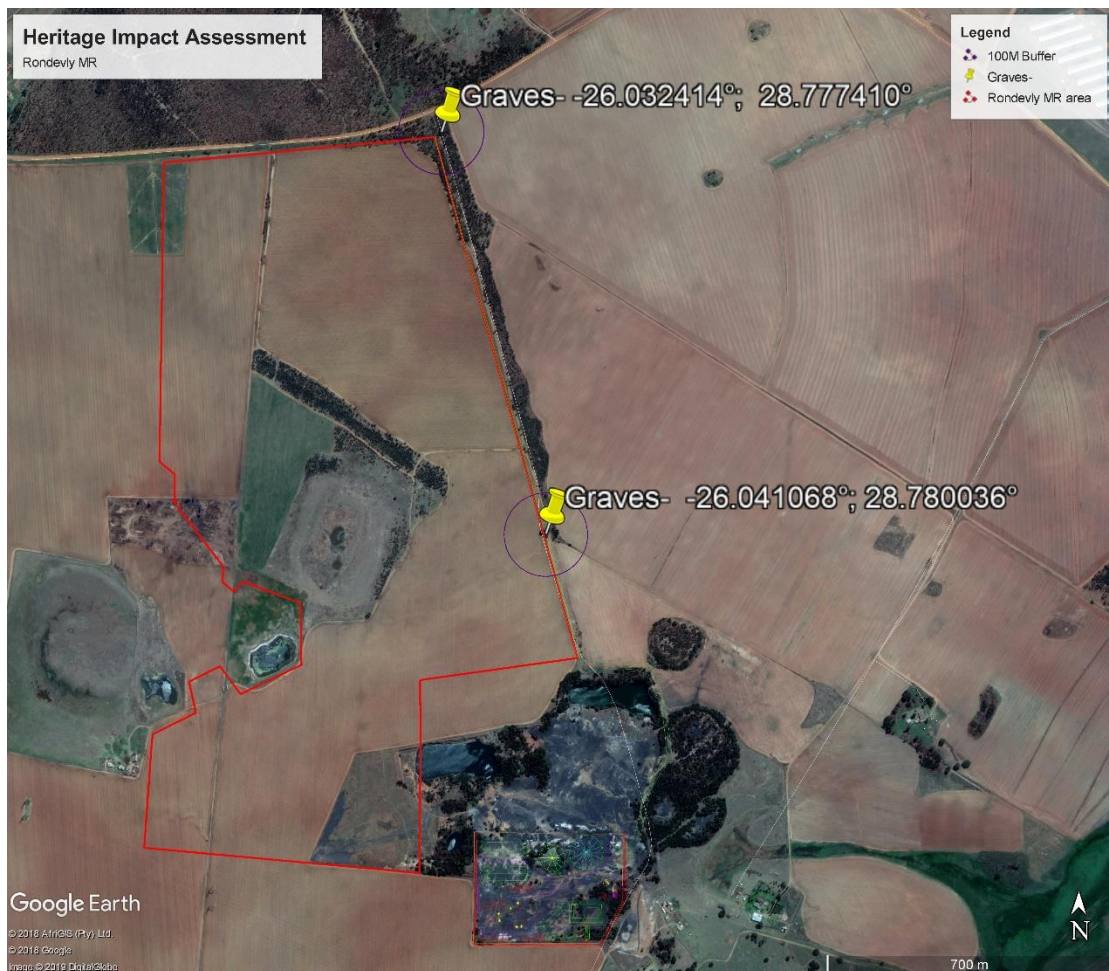


Figure 3: Heritage sensitivity map

5. WAY FORWARD

- Submit this report as a Section 38 Application in term of the National Heritage Resources Act, 1999 (Act No. 25 of 1999) to the Provincial Heritage Resources Authority of Mpumalanga for comment/approval. The basis of such an application would include the graves present within 100m from the site will be protected by a 100m buffer
- Indicate by means of the EIA process if graves will be relocated. This process will need to be undertaken by means of the correct processes and by a suitable qualified heritage practitioner.
- Fencing of the graveyards, still providing access.