

## ARCHAEOLOGICAL IMPACT ASSESSMENT

Prepared for

## EVERITE ASBESTOS DUMP DECOMMISSIONING

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Everite Dump Closure Archaeological Impact	Signed in capacity as
Assessment	

# Contents

1.	BACKGROUND 1	L
2.	PROJECT LOCATION (FIGURE 1)	2
3.	PURPOSE AND OBJECTIVES	ł
3. 3.	1 PROJECT OBJECTIVES	1 1
4.	HISTORICAL BACKGROUND	5
4. 4.	1 ARCHAEOLOGICAL BACKGROUND OF VEREENIGING, GAUTENG	; 3
5.	DEFINITIONS, ACRONYMS AND ABBREVIATIONS	5
6.	SURVEY METHODOLOGY AND HERITAGE LEGISLATION 1 $\epsilon$	5
7.	FINDINGS	1
7. 7.	1 DESCRIPTION OF SURROUNDING ENVIRONMENT	7 
8.	RECOMMENDATIONS	2
9.	MANAGEMENT OF THE ON SITE HERITAGE RESOURCES	2
10.	CONCLUSION	2
11.	REFERENCES	3
$\checkmark$	NATIONAL HERITAGE RESOURCES ACT (ACT NO. 25 OF 1999)	3
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Document No: Revision: Date:

Archaeological Impact Assessment: Everite Dump Closure

1

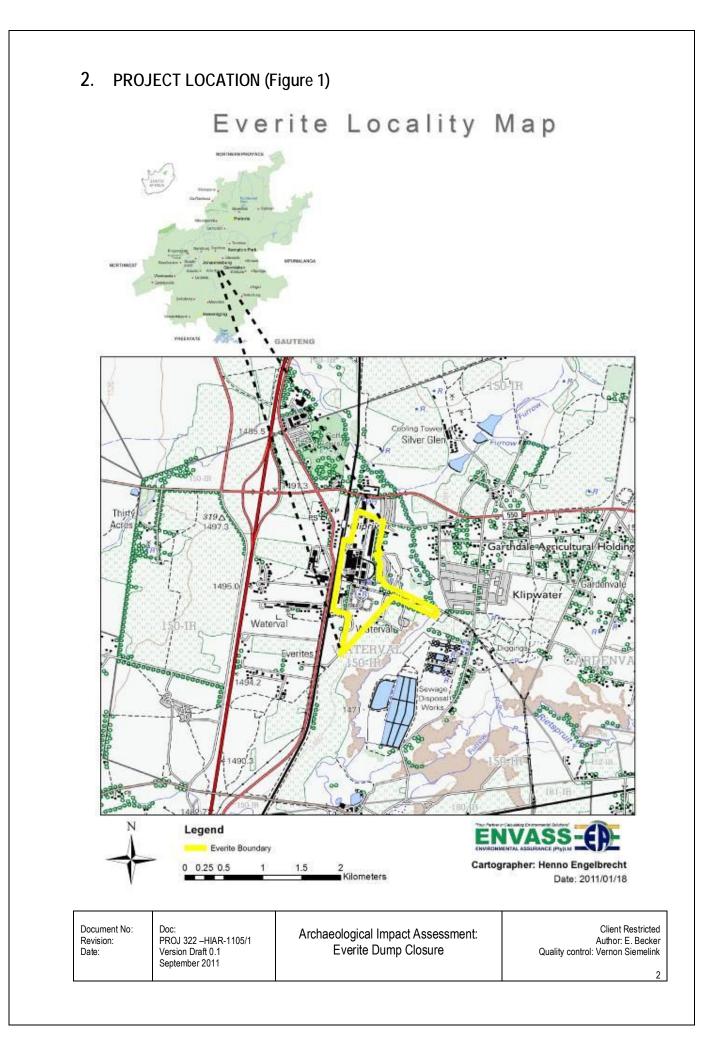
Document No: Revision: Date: Doc: PROJ 322 –HIAR-1105/1 Version Draft 0.1 September 2011

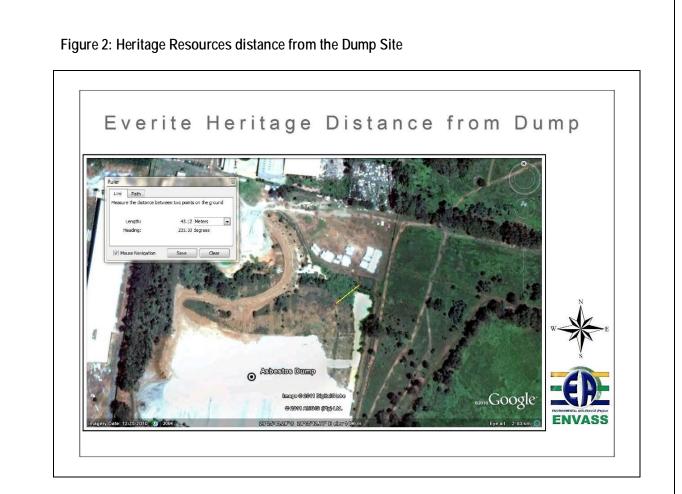
Archaeological Impact Assessment: Everite Dump Closure Client Restricted Author: E. Becker Quality control: Vernon Siemelink

2

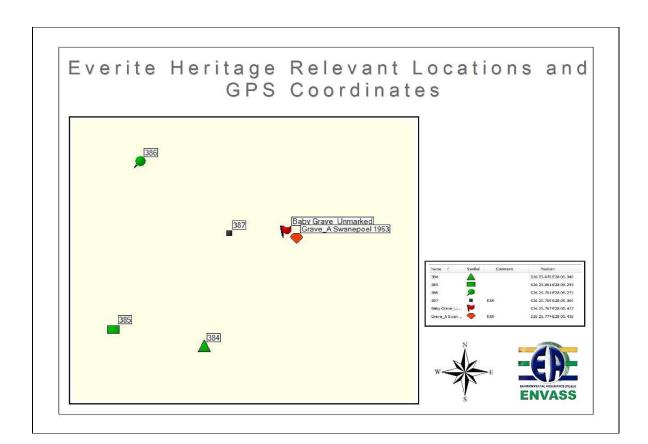
## 1. BACKGROUND

ENVASS requested that an Archaeological Impact Assessment is completed after the discovery of historical archaeological graves that are positioned close to the current dump site. The purpose of undertaking the above mentioned study is to determine the impact that the proposed dump rehabilitation may have on the graves and if the graves could be disturbed by the proposed activity. The graves are currently fenced off and no significant disturbances have been noticed. The main issue in this regard is to prevent any possible destruction of the grave sites and to provide the client with further recommendations in protecting the burial areas. The heritage specialist surveyed the areas that surround the grave sites to measure the current and potential threat.





Document No: Revision: Date:	Doc: PROJ 322 –HIAR-1105/1 Version Draft 0.1 September 2011	Archaeological Impact Assessment: Everite Dump Closure	Client Restricted Author: E. Becker Quality control: Vernon Siemelink
			3



## 3. PURPOSE AND OBJECTIVES

### **3.1 PROJECT OBJECTIVES**

The objective of this Archaeological Impact Assessment is to determine if any archaeological features are positioned on site that could be impacted upon during earthmoving activities. Archaeological Features refer to graves, stone walling, archaeological objects (pottery), rock art, structures older than sixty years and archaeological cultural landscape areas. The features that are positioned in the close vicinity of development activities require further mitigation and recommendation procedures. The objective of the study is to provide the Heritage Resources authority with a detailed report in terms of the type of development, if heritage resources are positioned within the impacted area and what the professional archaeologist's recommendations are.

### 3.2 EXPECTED PROJECT ACHIEVEMENTS

The project expectation is to achieve a clear understanding of the type of development, the exact location of the development and to determine the direct impacts it will have on the heritage resources environment.

Document No: Revision: Date:	Doc: PROJ 322 –HIAR-1105/1 Version Draft 0.1 September 2011	Archaeological Impact Assessment: Everite Dump Closure	Client Restricted Author: E. Becker Quality control: Vernon Siemelink
			4

# 4. HISTORICAL BACKGROUND

### 4.1 ARCHAEOLOGICAL BACKGROUND OF VEREENIGING, GAUTENG

### i) Stone Age Time Period

The Early Stone Age was evident from more than two million years ago to 250 000 years ago. The Middle Stone Age occurred from 250 000 years ago to an average of 25 000 years ago and the Late Stone Age from 25 000 years ago to an average of 200 years ago.

The archaeological history of the Vereeniging area can be described in terms of artefacts discovered in gravels situated at the Klip River. The Klip River is well known for the occurrence of handaxes, cleavers, flakes, polyhedrons and choppers. The gravel that came from a quarry site was examined and provided insight in to the Stone Age period of the surrounding areas investigated. The artefacts mentioned are typical Earlier Stone Age Industries from the Vereeniging region. The stone artefacts are examples of the Earlier Acheulian implements.

The Acheulian culture is named after the northern French town of St. Acheul and is a typical stone hand axe culture (Fagan B, 1994, In the Beginning, Introduction to Archaeology, p417). The prehistoric people used a specific method to develop the stone hand axes that involved the the direct fracturing of the stone with a hammerstone (Fagan, 1994). After a lengthy time the stone age people commenced with the development of tools that are flaked on both surfaces such as the Acheulian hand axes (Fagan B, 1994).

Document No: Revision: Date:

Doc: PROJ 322 –HIAR-1105/1 Version Draft 0.1 September 2011

Archaeological Impact Assessment: Everite Dump Closure Client Restricted Author: E. Becker Quality control: Vernon Siemelink

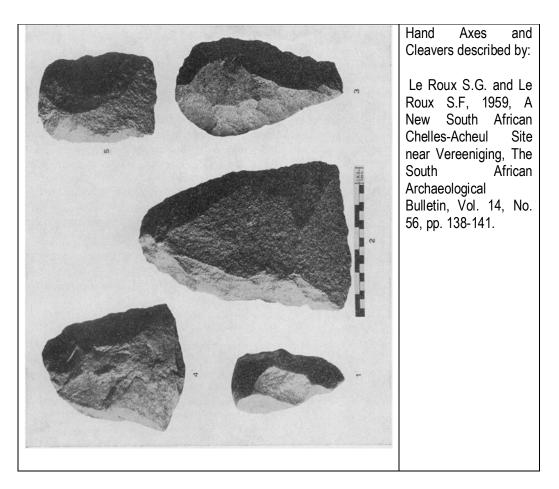


Plate 1 (Hand Axes and Cleavers)

The gravel that produced the mentioned stone tools is composed of quartzite, milky quartz, chert, chalcedony, banded jasper, agate, silicified wood, banded iron stone, fine – grained ligneuous rock and sandstone (Le Roux and Le Roux, 1959). Quartzite was normally used during the manufacturing of the above mentioned stone tools, but it is indicated that a fine – grained igneuous rock was also used (Le Roux and Le Roux, 1959).

The handaxes were made on river pebbles and or flakes struck from pebbles. The implements were shaped by secondary trimming.

Further discoveries were made related to the South African Chelles – Acheul Culture that were found alongside the Klip River. The material used was quartzite material and the stone tools were described as core and flake tools (Le Roux S.F, A New Earlier Acheulian Stone Age Site

Document No: Revision: Date: on the Vaal River, near Vereeniging, 1971, The South African Archaeological Bulletin, Vol. 26, No. 101 /102, pp 64-66).

ii) The Iron Age Time Period

The Early Iron Age Time Period commenced at AD 400 until AD 1025 and the Late Iron Age commenced at AD 1025 until AD 1830.

The Early Iron Age is mostly related to the existence of agricultural activities. The Late Iron Age settlements can be recognized *via* the identification of stone walling mostly situated on hilltop areas. The conflict years that are evident of the Difaqane or alternatively named Mfecane are some of the major events that played a role in the development of specific larger population layout patterns at the Vereeniging area.



Example of Iron Age Stone Walling

Document No: Revision: Date:

Doc: PROJ 322 –HIAR-1105/1 Version Draft 0.1 September 2011

Archaeological Impact Assessment: Everite Dump Closure Client Restricted Author: E. Becker Quality control: Vernon Siemelink

7

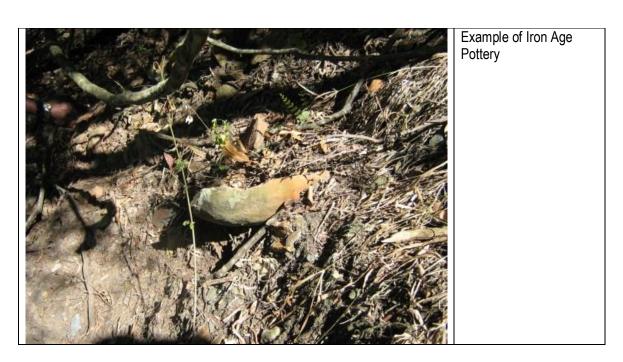


Plate 2: Examples of Iron Age Archaeology

### 4.2 HISTORICAL BACKGROUND OF VEREENIGING, GAUTENG

## i) Anglo Boer War

After continuous talks between Kruger, the Boers and so called "Uitlanders", no agreement could be reached and in 1899 the Anglo-Boer War commenced. The British retrieved troops from India, the Cape Colony and Natal to scare the Boer forces. An ultimatum was issued to Britian to clarify that the Republic will not allow interference from Britian at the Transvaal borders.

During 1902 during a significant meeting the Boers decided to sign the Treaty of Vereeniging after a substantial loss of people and land during the war.

3 per cent interest. No foreigner or rebel will be entitled to the benefit of this Clause. Signed at Pretoria this thirty first day of May in the Year of Our Lord One Thousand Nine Hundred and Two. 1:352 Retaun of Kuni 6 enu

Document No: Doc: **Client Restricted** Archaeological Impact Assessment: PROJ 322 –HIAR-1105/1 Version Draft 0.1 September 2011 Author: E. Becker Quality control: Vernon Siemelink Revision: Everite Dump Closure Date:

9

5. Peace Treaty of Vereeniging, 31 May 1902 THE FOLLOWING NOTICE is hereby published for general information. By order of His Excellency the High Commissioner and Administrator of the Transvaal. WE Davidson, Acting Secretary to the Transvaal Administration - 3rd June 1902. ARMY HEADQUARTERS, SOUTH AFRICA General Lord Kitchener of Khartoum, Command in Chief AND His Excellency Lord Milner, High Commissioner, on behalf of the BRITISH GOVERMENT, AND Messrs S. W Burger, F.W. Reitz, Louis Botha, J.H. de la Rey, L.J. Meyer, and J.C. Krogh, acting as the GOVERNMENT of SOUTH AFRICAN REPUBLIC, AND Messrs W.J.C. Brebner, C.R. de Wet, J.B.M. Hertzog, and C.H. Olivier, acting as the GOVERNMENT of the ORANGE FREE STATE, on behalf of their respective BURGHERS Desirous to terminate the present hostilities, agree on the following Articles. 1. The BURGHER Forces in the Field will forthwith lay down 'their Arms, handing over all Guns, Rifles, and Munitions of War, in their possession or under their control, and desist from any further resistance to the Authority of HIS MAJESTY KING EDWARD VII, whom they recognise as their lawful SOVEREIGN. The Manner and details of this surrender will be arranged between Lord Kitchener and Commandant General Botha, Assistant Commandant General de la Rey and Chief Commandant De Wet. 2. Burghers in the field outside the limits of the TRANSVAAL and ORANGE RIVER COLONY, and all Prisoners of War at present outside South Africa, who are burghers, will, on duly declaring their acceptance of the position of subjects of HIS MAJESTY KING EDWARD VII, be gradually brought back to their homes as soon as transport can be provided and their means of subsistence ensured. 3. The BURGHERS so surrendering or so returning will not be deprived of their personal liberty, or their property. 4. No proceedings CIVIL or CRIMINAL will be taken against any of the BURGHERS so surrendering or so returning for any Acts in connection with the prosecution of the War. The benefit of this Clause will not extend to certain Acts contrary to the usage of War which have

Document No: Revision: Date: been notified by the Commander in Chief to the Boer Generals, and which shall be tried by Court Martial immediately after the close of hostilities.

5. The DUTCH language will be taught in Public Schools in the TRANSVAAL and the ORANGE RIVER COLONY where the Parents of the Children desire it, and will be allowed in co U R T S of LA W when necessary for the better and more effectual Administration of Justice.

6. The Possession of Rifles will be allowed in the TRANSVAAL and ORANGE'RIYER COLONY to persons requiring them for their protection on taking out a licence according to Law.

7. MILITARY ADMINISTRATION in the TRANSVAAL and ORANGE RIVER COLONY will at the earliest possible date be succeeded by CIVIL GOVERNMENT, and, as soon as circumstances permit, Representative Institutions, leading up to self-Government, will be introduced.

8. The question of granting the Franchise to Natives will not be decided until after the introduction of Self-Government.

9. No Special Tax will be imposed on Landed Property in the TRANSVAAL and ORANGE RIVER COLONY to defray the Expenses of the War.

10. As soon as conditions permit, a Commission, on which the local inhabitants will be represented, will be appointed in each District of the TRANSVAAL and ORANGE RIVER COLONY, under the Presidency of a Magistrate or other official, for the purpose of assisting the restoration of the people to their homes and supplying those who, owing to-war losses, are unable to provide for themselves, with food, shelter, and the necessary amount of seed, stock, implements etc. indispensable to the resumption of their normal occupations.

His Majesty's Government will place at the disposal of these Commissions a sum of three million pounds sterling for the above purposes, and will allow all notes, issued under Law No.1 of 1900 of the Government of the SOUTH AFRICAN REPUBLIC, and all receipts, given by the officers in the field of the late Republics or under their orders, to be presented to a JUDICIAL COMMISSION, which will be appointed by the Government, and if such notes and receipts are found by this Commission to have been duly issued in return for valuable consideration they will be received by the first-named Commissions as evidence of War losses suffered by the persons to whom they were originally given. In addition to the above named free grant of three million pounds, His Majesty's Government will be prepared to make advances as loans for the

Document No: Revision: Date: same purpose, free of interest for two years, and afterwards repayable over a period of years with 3 per cent interest. No foreigner or rebel will be entitled to the benefit of this Clause. Signed at Pretoria this thirty first day of May in the Year of Our Lord One Thousand Nine Hundred and Two.

[Signed]

KITCHENER OF KHARTOUM, MILNER, S W BURGER, F W REITZ, LOUIS BOTHA, J H DE LA REY, LJ MEYER, J C KROGH, C R DE WET, J B M HERTZOG, W J C BREBNER, C H OLIVIER

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Plate 3: Treaty of Vereeniging

Document No: Revision: Date:	Doc: PROJ 322 –HIAR-1105/1 Version Draft 0.1 September 2011	Archaeological Impact Assessment: Everite Dump Closure	Client Restricted Author: E. Becker Quality control: Vernon Siemelink
			12

#### ii) Railway

Sammy Marks played an important role in the development of Vereenigin and one of his achievements is related to the railway development at Vereeniging. Marks persuaded Kruger to route the railway from the Cape into Transvaal via the use of Vereeniging. The place of the railway lines create a means for further development.

Vereeniging Railway station was also occupied by the British during the Anglo-Boer war.

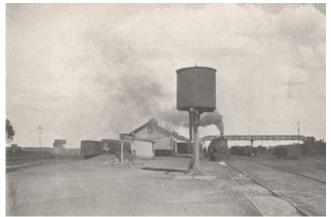


Plate 4: 1921 Vereeniging Railway Station

#### iii) Mineral Evolution

In 1913 USCO commenced with ten ton open hearth furnace in Vereeniging and in 1918 Mr. Delfos develops a blast furnace and produces 4000 tons of pig iron. Mr. Marks and Mr. Lewis convince the Transvaal Blast Furnace Company in 1917 to develop an experimental blast furnace at USCO Vereeniging.

In the early 1920's the production of steel commenced to increase and the existing small enterprises could not meet the demand. General Smuts initiated the investigation to confirm if foreign firms would be interested in the expansion of the industry. General Hertzog who was in power during those years decided to initiate a semistate steelworks in Pretoria. The Iscor production commenced in 1934.

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The significant steel work operations at the Vereeniging area was threatened after the implementation of the Iscor governmental operations. The main concern was that the private steel operations would not be able to compete with the above mentioned.

During the early 1900's South African businessmen realized that the production of iron and steel is of value. The Union Steel Corporation Sammy Marks founded in 1911, was one of the successful enterprises and was taken over by ISCOR later on.

Mr. Cornelis Delfos a Dutch engineer established the South African Iron and Steel Corporation and in 1922 the Smuts government passed an Act to encourage the steel industry.

The steel industry was also supported by foreign investors namely the Gutehoffnungshütte(GHH) at Oberhausen who sent a commissioner to South Africa in 1924. The GHH group completed a favourable report, but because of political situations and financial shortages they could not invest in the project themselves. Delfos decided to use the report and request support from steel producers positioned in England. The conditions stipulated by the possible English investors were unacceptable and Delfos decided to request assistance from the current South African government. Delfos requested the Minister of Mining, namely advocate Beyers to assist.

Beyers and Creswell started to convince their cabinet colleagues to support the idea of a state enterprise. Beyers instructed the Board of Trade to comment on the GHH report and a chemical engineer named Dr. F Meyer who were requested to investigate this matter. Meyer supported the German report and the final approval was expected from Mr. N.C. Havenga.

The Iron and Steel Industry Act was passed in 1928 and the South African Iron and Steel Industrial Corporation Limited was announced. Dr. H. J. van der Bijl was appointed as the first Iscor chairman and Delfos as the full time director. The engineer Dr. Meyer was appointed as a technical assistant on the board. Opposition to the governmental steel production proceeded during the 1930's.

The commencement of the second world war resulted in Iscor concentrating of developing steel for war production.

In 1947 large lscor expansions commenced and a flat products mill was established in Vanderbijlpark in 1953.

## 5. DEFINITIONS, ACRONYMS AND ABBREVIATIONS

Archaeological sites are places where people lived and left evidence of their presence in the form of artefacts, food remains and other traces such as rock paintings or engravings, burials, fireplaces and structures.

Amafa aKwaZulu-Natali: Amafa / Heritage KwaZulu Natali is the provincial heritage conservation agency for KwaZulu Natal. Amafa was established as a statutory body in terms of the KZN Heritage Act of 1997, replaced by the KZN Heritage Act of 2008.

Aim of Conservation: The aim of conservation is to preserve, retain or recover the cultural interest of a place, and must include provision for its maintenance and its future.

Context: Historically valuable places do not consist of buildings alone. Conservation of such places requires the maintenance of appropriate visual settings and contexts. New construction, demolition or modification adversely affecting the setting, and environmental intrusions which adversely affect enjoyment or appreciation of the place, should be excluded.

Cultural Significance is the aesthetic, historical, scientific and social value for past, present and future generations.

Determination of Cultural Significance: Cultural significance should be determined by analysis of the evidence gathered and as far as possible in consultation with a range of parties, including the public at large, local communities, cultural bodies and accredited experts on conservation and related issues.

Document No: Revision: Date: Graves, burial sites, war memorials and monuments are tangible and symbolic reminders of our turbulent history. Graves are architectural examples of space where we transcend the historical past.

Historic means significant in history.

Historical means belonging to the past.

SAHRA: South African Heritage Resources Agency.

Minimal Intervention: Conservation is based on respect for the existing fabric and should involve the least possible intervention. It should not distort the evidence revealed in the fabric.

Place means site, area, building of other work, group of buildings or other works, together with pertinent contents, surroundings and historical and archaeological deposits.

Social Value embraces the qualities, for which a place has become a focus of spiritual, political, national, or other cultural sentiments to a majority or minority group.

## 6. SURVEY METHODOLOGY AND HERITAGE LEGISLATION

A site survey was undertaken on foot by Ms. Elize Becker (Heritage Resources Practitioner) on the 9th of September 2011. The survey provided insight into the type of environment, position of the site, the surrounding activities and the possible living heritage resource problems that may occur if the proposed development is to proceed. The following steps were taken to obtain a better understanding of the cultural heritage of the area and the receiving environment.

- a) A project orientation process was undertaken at a desktop level to obtain a better understanding of the nature of the activity and the extent of the development proposal;
- A review of the technical proposal was undertaken. Everite provided information with regard to the extent of the site and information regarding the position of the development in terms of the impact it may have on the undisturbed area;

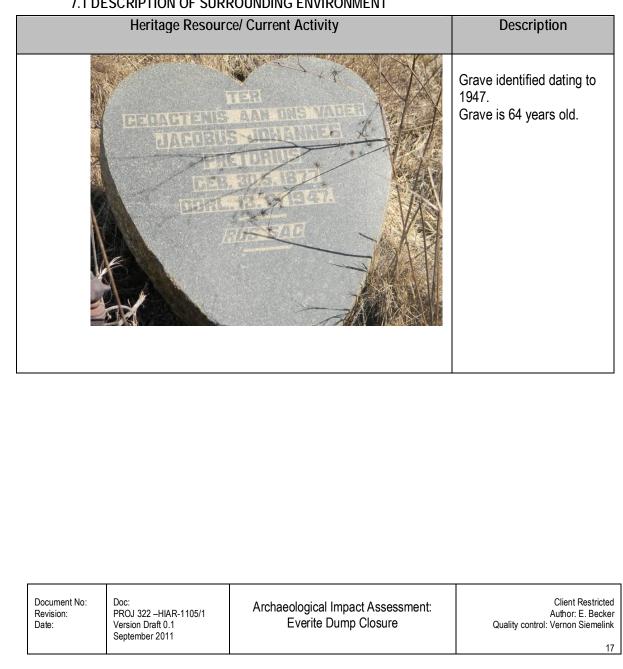
Document No: Revision: Date:	Doc: PROJ 322 –HIAR-1105/1 Version Draft 0.1 September 2011	Archaeological Impact Assessment: Everite Dump Closure	Client F Author: I Quality control: Vernon S
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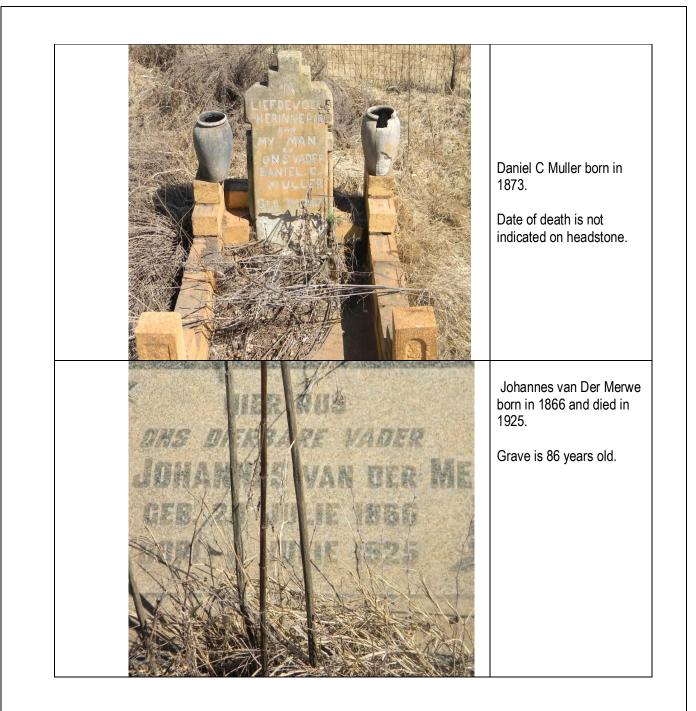
- c) A desktop investigation into the history of the area was undertaken including a literature review, internet search and consultation with relevant authorities; and
- The compilation of the report and the determination of a way forward. d)

## 7. FINDINGS

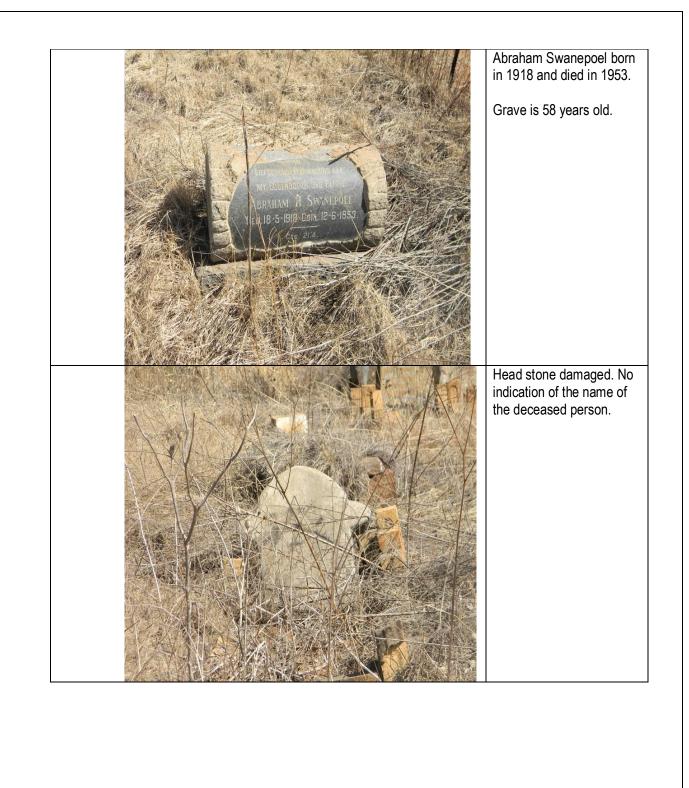
Two baby graves were discovered, the 1st row of the grave yard consists of four graves, the second row has one grave, the third row two graves, fourth row is evident of three graves and the fifth row is contains of four graves.



## 7.1 DESCRIPTION OF SURROUNDING ENVIRONMENT



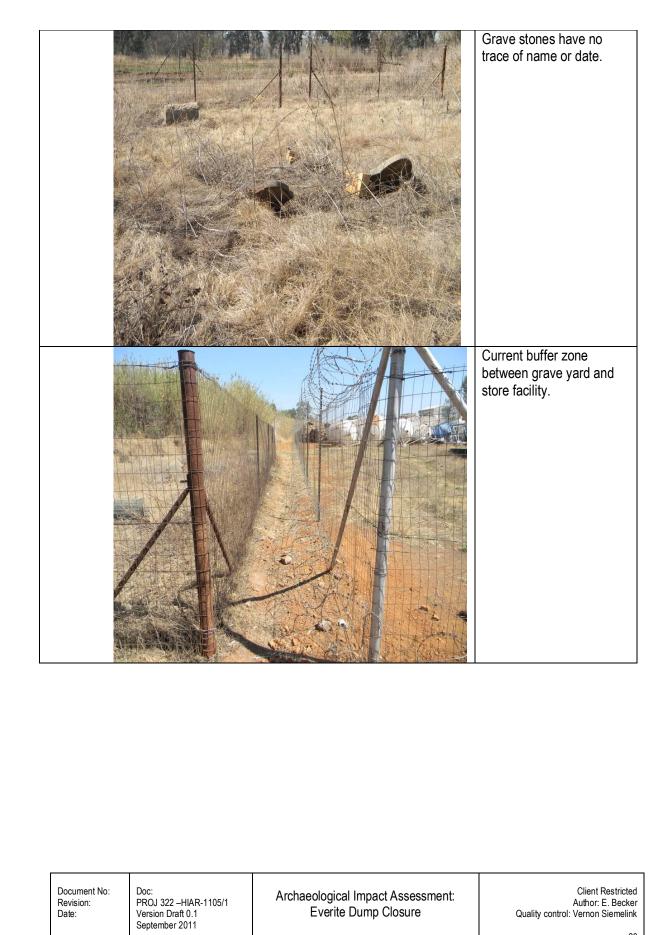
Document No: Revision: Date:	Doc: PROJ 322 –HIAR-1105/1 Version Draft 0.1 September 2011	Archaeological Impact Assessment: Everite Dump Closure	Client Restricted Author: E. Becker Quality control: Vernon Siemelink
			18

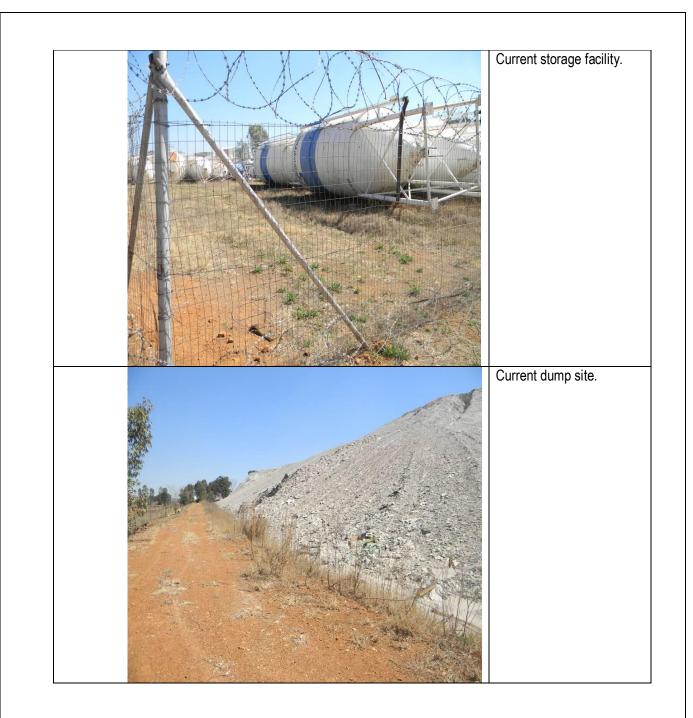


Document No:	
Revision:	
Date:	

Doc: PROJ 322 –HIAR-1105/1 Version Draft 0.1 September 2011

Archaeological Impact Assessment: Everite Dump Closure Client Restricted Author: E. Becker Quality control: Vernon Siemelink





### 7.2 SIGNIFICANCE RATING

The site can be described as industrial and as a result already disturbed. Archaeological objects are out of context and the existing development activities have changed the cultural landscape in such a way that the significance rating is difficult to identify. The main focus is on the grave yard that is positioned in the close vicinity of the dump to be rehabilitated. Graves are of high significance and protected by the

Document No: Revision: Date:

Doc: PROJ 322 –HIAR-1105/1 Version Draft 0.1 September 2011 Archaeological Impact Assessment: Everite Dump Closure Client Restricted Author: E. Becker Quality control: Vernon Siemelink National Heritage Act (No. 25 of 1999). The following recommendations are aiming at providing the client with an opportunity to adhere to the national heritage legislation within a diligent manner.

## 8. RECOMMENDATIONS

- a) The current fence should be upgraded and the historical grave yard must be cleaned;
- A signage must be placed close to the entrance indicating that the site is of signfiance and no entry is allowed;
- c) A gate that can close suitably must be placed at the entrance;
- d) It is recommended that a notice is placed in a local newspaper indicating that the graves occur on the property and allow interested parties or descendents to provide the heritage practitioner with any information related to the background of the grave sites; and
- e) It is recommended that the current storage yard is totally removed or that an extended buffer zone is placed between the graves and the fencing of the storage facility.

# 9. MANAGEMENT OF THE ON SITE HERITAGE RESOURCES

- a) The graveyard must be fenced properly;
- b) A site notice must be placed in front of the gate at all times indicating that the site is of high sensitivity;
- c) The inside section of the grave yard must be clean and the grass must be cut at all times;
- d) No garbage is allowed within the fenced grave yard area;
- e) No bottles are allowed within the fenced area;
- f) No smoking or drinking are allowed within the graveyard site;
- g) No unauthorized entry is allowed within the fenced area; and
- h) No further developments are required within 20 metre from the grave site except with the approval from the Heritage Agency.

# 10. CONCLUSION

The cultural landscape of where the property is positioned is of high value in terms of the historicalarchaeological events that occurred in the past. It is evident that the dates of the grave sites are an

Document No: Revision: Date:	Doc: PROJ 322 –HIAR-1105/1 Version Draft 0.1 September 2011	Archaeological Impact Assessment: Everite Dump Closure	Client Restricted Author: E. Becker Quality control: Vernon Siemelink
			22

indication of people that lived at the site during various time periods that is inclusive of the Anglo-Boer War, industrialization, epidemics and sicknesses, railway historical developments and political conflict. It is noticeable that the grave sites consists of different surnames and it could possibly indicate that the graveyard might have been a local community grave yard. The historical industrial development could have disturbed a main section of the historical – archaeological evidence. Further research is required to be able to determine the exact origins of the graveyard.

## **11. REFERENCES**

- ✓ Le Roux S.G. and Le Roux S.F, 1959, A New South African Chelles-Acheul Site near Vereeniging, The South African Archaeological Bulletin, Vol. 14, No. 56, pp. 138-141.
- ✓ National Heritage Resources Act (Act no. 25 of 1999)
- ✓ <u>http://www.historyworld.net</u>
- <u>http://www.knra.co.za/history.htm</u>
- <u>http://www.nelsonmandela.org/omalley/index.php/site/q/03lv01538/04lv01600/05lv01601/06lv01</u> 602.htm
- ✓ <u>http://chessaleeinlondon.files.wordpress.com/2007/07/vereeniging4.jpg</u>
- http://www.vaaltriangleinfo.co.za/history/vereeniging/chapter\_8/33.htm

Document No: Revision: Date:	Doc: PROJ 322 –HIAR-1105/1 Version Draft 0.1 September 2011	Archaeological Impact Assessment: Everite Dump Closure	Client Restricted Author: E. Becker Quality control: Vernon Siemelink
			23