

# HERITAGE IMPACT ASSESSMENT OF THE PROPOSED ETHEKWENI INTEGRATED RAPID PUBLIC TRANSPORT NETWORK, CORRIDOR 1



## ACTIVE HERITAGE cc.

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**LIST OF ABBREVIATIONS AND ACRONYMS**

EIA	Early Iron Age
ESA	Early Stone Age
HISTORIC PERIOD	Since the arrival of the white settlers - c. AD 1820 in this part of the country
IRON AGE	Early Iron Age AD 200 - AD 1000 Late Iron Age AD 1000 - AD 1830
LIA	Late Iron Age
LSA	Late Stone Age
MSA	Middle Stone Age
NEMA	National Environmental Management Act, 1998 (Act No. 107 of 1998 and associated regulations (2006).
NHRA	National Heritage Resources Act, 1999 (Act No. 25 of 1999) and associated regulations (2000)
SAHRA	South African Heritage Resources Agency
STONE AGE	Early Stone Age 2 000 000 - 250 000 BP Middle Stone Age 250 000 - 25 000 BP Late Stone Age 30 000 - until c. AD 200

## EXECUTIVE SUMMARY

A heritage survey of the proposed eThekweni Integrated Rapid Public Transport Network, Corridor 1 identified one heritage site directly adjacent to the proposed corridor. A buffer zone of 20m must be maintained around this cemetery. Apart from this site there is no archaeological reason why the proposed corridor may not be constructed as planned. However, attention is drawn to the South African Heritage Resources Act, 1999 (Act No. 25 of 1999) and the KwaZulu-Natal Heritage Act (Act no 4 of 2008) which, requires that operations that expose archaeological or historical remains should cease immediately, pending evaluation by the provincial heritage agency.

## 1 BACKGROUND INFORMATION ON THE PROJECT

**Table 1. Background information**

Consultant:	Frans Prins (Active Heritage) cc for Sivest
Type of development:	The eThekweni Transport Authority (ETA) has just completed the wall to wall Integrated Rapid Public Transportation Network (IRPTN) Plan, in response to the National Public Transport Agenda which proposes a fully functional integrated public transport network plan which incorporates a range of models. The IRPTN is designed to replace the existing transport system with a high quality, high frequency, integrated, scheduled service. The IRPTN wall to wall plan has nine transport corridors of which eight are road based. Rail plays a significant role in the north-south corridor in terms of acting as the backbone of the system. Phase 1 of the Plan involves Corridors 1, 3 and 9; This notice refers to Trunk Route1. Bridge City to Durban CBD. The proposed Trunk Route 1 (C1) runs from KwaMashu via Mandela Road, Inanda Road and Umgeni Road to Durban CBD.
Rezoning or subdivision:	Rezoning
Terms of reference	To carry out a Heritage Impact Assessment
Legislative requirements:	The Heritage Impact Assessment was carried out in terms of the National Environmental Management Act, 1998 (Act No. 107 of 1998) (NEMA) and following the requirements of the National Heritage Resources Act, 1999 (Act No. 25 of 1999) (NHRA) and the KwaZulu-Natal Heritage Act, 1997 (Act No. 4 of 2008)

### 1.1. Details of the area surveyed:

The proposed trunk route (Corridor 1) links Bridge City to Durban CBD (Fig 1). Corridor 1 runs from KwaMashu via Mandela Road, Inanda Road and Umgeni Road to Durban CBD. The footprint includes peri-urban (Fig 3) as well as urban areas (Fig 4). The geographical coordinates of the proposed trunk route (Corridor 1) is given in Table 2.

**Table 2. GPS coordinates of Corridor 3**

Latitude /Longitude	Degrees	Minutes	Seconds
<b>Start</b>			
South	29	50	59.68
East	31	01	09.36
<b>End</b>			
South	29	44	05.16
East	31	00	11.26
<b>Connaught Bridge</b>			
South	29	48	36.75
East	31	00	56.62

## BACKGROUND TO ARCHAEOLOGICAL HISTORY OF AREA

The greater Durban, including the study area, has been relatively well surveyed for archaeological heritage sites by the KwaZulu-Natal Museum and subsequently by private heritage consultants in the last few years. Prior to 1950, the archaeological site distribution of the area was poorly known.

The available evidence, as captured in the Amafa and KwaZulu-Natal Museum heritage site inventories, indicates that the greater Durban area contains a wide spectrum of archaeological sites covering different time-periods and cultural traditions. These range from Early Stone Age, Middle Stone Age, and Later Stone Age to Early Iron Age, Middle Iron Age, and Later Iron Age sites. Two notable Middle Stone Age sites, i.e. Umlatuzana near Marianhill and Segubudu near Stanger have been excavated in the last two decades and yielded impressive archaeological stratigraphies relating to the period associated with the origins of anatomically modern people. The Umhlatuzana shelter is situated approximately 15km to the south west of the study area. Apart from an impressive stone tool assemblage covering both Later and Middle Stone Age periods it has also yielded faunal remains of large mammals that became extinct during the early Holocene such as the giant buffalo (*Pelarovis* sp). Also notable is the Shongweni Later Stone Age shelter which was excavated in the 1970's. Shongweni is situated approximately 12km to the south of the footprint. This shelter yielded some of the earliest remains of domesticated cereals in South Africa. The

same site also yielded some of the only San rock art in the greater Durban area (Mazel 1989; Mitchell 2002).

Around 1 700 years ago an initial wave of Early Iron Age People settled along the inland foot of the sand dunes on sandy but humus rich soils which would have ensured good crops for the first year or two after they had been cleared. These early agropastoralists produced a characteristic pottery style known as Matola. The Matola people also exploited the wild plant and animal resources of the forest and adjacent sea-shore. The communities seems to been small groups of perhaps a few dozen slash-and burn cultivators, moving into a landscape sparsely inhabited by Later Stone Age San hunter-gatherers.

By 1500 years ago another wave of Iron Age migrants entered the area. Their distinct ceramic pottery is classified to styles known as “Msuluzi” (AD 500-700), Ndongondwane (AD 700-800) and Ntshekane (AD 800-900). The majority of these sites occur inland along the major river valleys of KwaZulu-Natal below the 1000m contour (Maggs 1989:31; Huffman 2007:325-462). Various sites of this period have been recorded along the Umgeni River in the near vicinity of the study area, especially in the area close to Inanda Dam.

Some of the shell middens recorded along the coastline of KwaZulu-Natal belongs to the very first Nguni-speaking agropastoralists who settled in the province. These sites have been dated to approximately 1200 years ago. In addition, sites belonging to the immediate ancestors of the present Zulu-speaking communities in the area have been located in various locations in the greater Durban area. A large percentage of more recently recorded sites occur along the dune cordon and slightly inland in the form of shell middens which were mostly created by Iron Age shellfish gatherers although some of the stratigraphic layers may extend back to Later Stone Age periods (Anderson *pers.com*). Perhaps the most notable Later Iron Age shell midden, in the near vicinity of the northern section of the study area, occurs at the mouth of the Umhlanga lagoon (Huffman 2007).

Various colonial era and historical period sites occur in the greater Durban area. These date from about 1840 and are usually associated with the first European settlers in the area. These are older than 60 years and are therefore also protected by heritage legislation (Derwent 2006).

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## **2 BACKGROUND INFORMATION OF THE SURVEY**

### **2.1 Methodology**

A desktop study was conducted of the archaeological databases housed in the KwaZulu-Natal Museum. In addition, the available archaeological literature covering the greater Durban area was also consulted.

A ground survey, following standard and accepted archaeological procedures, was conducted. A cordon of 50m on either side of the proposed trunk road was surveyed for heritage sites and features.

## **2.2 Restrictions encountered during the survey**

### **2.2.1 Visibility**

The visibility along the proposed trunk road was good.

### **2.2.2 Disturbance**

No disturbance of any potential heritage features was noted.

## **2.3 Details of equipment used in the survey**

GPS: Garmin Etrek

Digital cameras: Canon Powershot A460

All readings were taken using the GPS. Accuracy was to a level of 5 m.

## **3 DESCRIPTION OF SITES AND MATERIAL OBSERVED**

### **3.1 Locational data**

Province: KwaZulu-Natal

Municipality: eThekweni Municipality

Town/city: Durban

### **3.2 Description of the general area surveyed**

The proposed trunk road cuts through typical urban and peri-urban residential housing areas in the vicinity of Mandela and Inanda Roads in KwaMashu (Fig 3). Although the famous Inanda Heritage Route area contains historical buildings and areas of historical interest none of these are situated adjacent to the proposed corridor. Where the proposed corridor runs into Umgeni Road the area becomes more urban, with various small business developments adjacent to the road until it ends in the Durban CBD (Fig 4). Only one significant heritage site, a cemetery, occurs directly adjacent to the proposed corridor (see below).

### 3.3 Heritage sites identified

One large cemetery occurs adjacent to Umgeni Road. Its context and significance is presented in Table 3.

**Table 3. Heritage sites located during the ground survey.**

	Heritage site category	Brief description	Significance (Table 3) and "living heritage" values	Mitigation	GPS Latitude and Longitude
1	Urban Cemetery (Figs 2, 5 & 6)	Large formal cemetery situated on southern side of the Umgeni Road. It covers an area of approximately 60m x 45m. A large number of the graves are older than 60 years. Mostly European names and surnames are associated with the various graves.	This cemetery contains many graves older than 60 years. It is part of the urban landscape and history of Durban. It is rated as high significance locally (Local Grade 111B) (Table 4)	Maintain a 20m buffer zone around the grave yard. Alternatively motivate for a second phase heritage impact assessment, by a grave relocation expert. A comprehensive community consultation process will have to be initiated to arrange for potential grave exhumation and reburial (Appendix 1).	S 29° 48' 39.40" E 31° 01' 47.39"

## 4 STATEMENT OF SIGNIFICANCE (HERITAGE VALUE)

### 4.1 Field Rating

The cemetery has been rated as Local Grade 111B i.e. it is considered to be of high significance locally (Table 4). The implication is that the cemetery may not be disturbed or altered under any circumstance. It is important to maintain a buffer zone of at least 20m around the cemetery. However, should there be a need to relocate some graves then a second phase heritage impact assessment by a grave relocation expert needs to be implemented. Amafa, the provincial heritage agency, could provide



a list of registered grave relocation consultants. The processes outlining the conditions for a grave relocation exercise is provided in Appendix 1.

**Table 4. Field rating and recommended grading of sites (SAHRA 2005)**

Level	Details	Action
National (Grade I)	The site is considered to be of National Significance	Nominated to be declared by SAHRA
Provincial (Grade II)	This site is considered to be of Provincial significance	Nominated to be declared by Provincial Heritage Authority
Local Grade IIIA	This site is considered to be of HIGH significance locally	The site should be retained as a heritage site
Local Grade IIIB	This site is considered to be of HIGH significance locally	The site should be mitigated, and part retained as a heritage site
Generally Protected A	High to medium significance	Mitigation necessary before destruction
Generally Protected B	Medium significance	The site needs to be recorded before destruction
Generally Protected C	Low significance	No further recording is required before destruction

## 5 RECOMMENDATIONS

A formal cemetery has been located directly adjacent to Umgeni Road during this survey. This heritage site has local significance and therefore need protection. It is proposed that the developer maintain a buffer zone of 20m around the cemetery where no development may occur. No removal of artefacts or alterations of any heritage structure will be allowed within this zone. Alternatively, should the developer wish to develop in the immediate vicinity of each gave site (within the 20m buffer zone) then a phase two heritage impact assessment should take place in order to assist with the mitigation process. Depending on the recommendations of this second phase assessment a grave exhumation and relocation process may be called for. Such an excavation can only take place once the local heritage agency Amafa issued a permit to such effect.

However, there is no archaeological reason why the proposed development may not take place on the remainder of the proposed corridor as planned. It should, however, be pointed out that the KwaZulu-Natal Heritage Act requires that operations exposing archaeological and historical residues should cease immediately pending an evaluation by the heritage authorities.

6 MAPS AND FIGURES

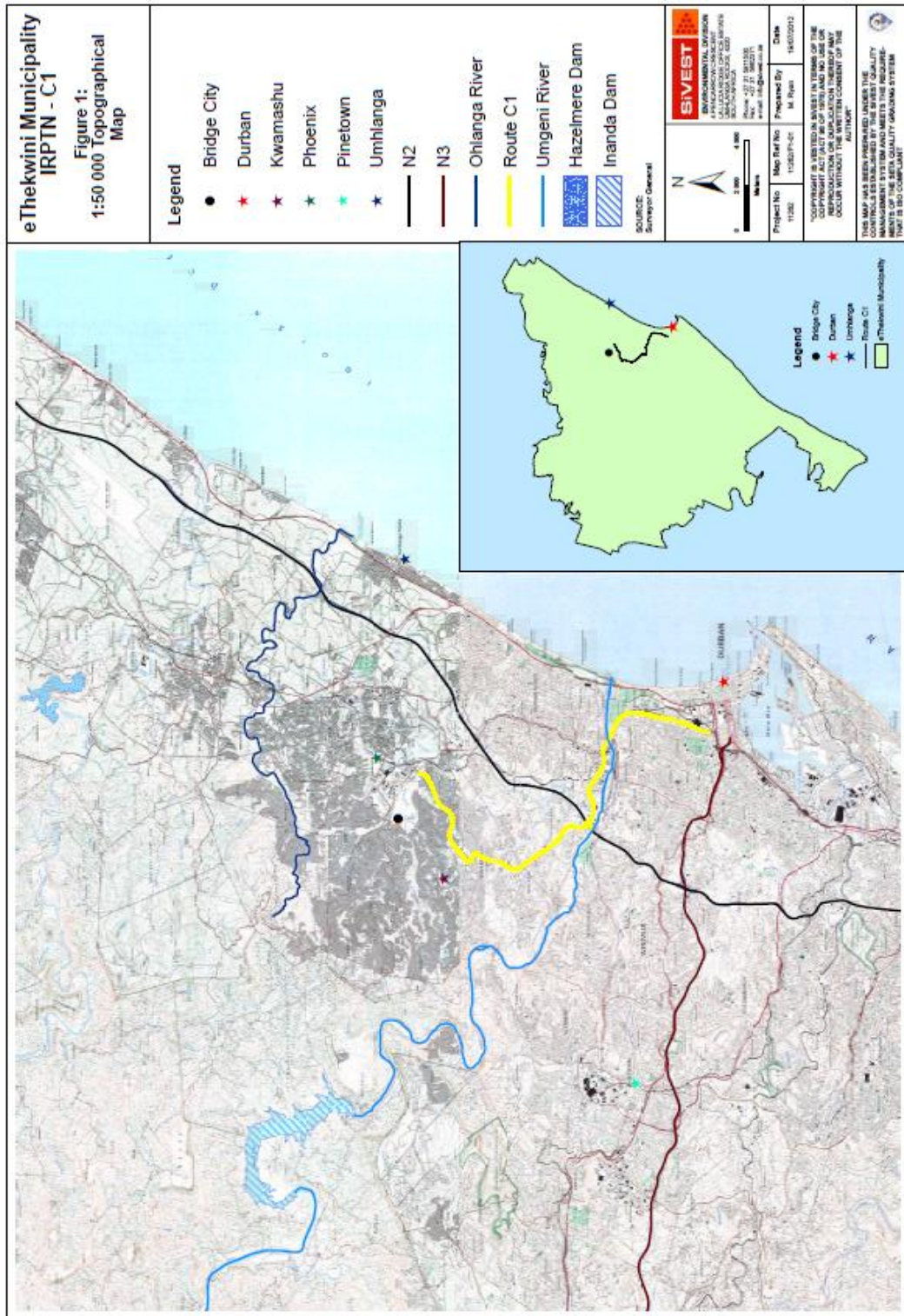


Figure 1. Map showing the location of the proposed Trunk Route or Corridor 1.





**Figure 2. Google aerial photograph showing the location of the cemetery adjacent to Umgeni Road.**



**Figure 3. Peri-urban residential buildings adjacent to the Inanda Road.**



**Figure 4. Umgeni Road near its starting point.**



**Figure 5. Entrance to cemetery from Umgeni Road. The cemetery is located approximately 25m from the proposed corridor development.**





**Figure 6. Cemetery with various graves older than 60 years.**

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## APPENDIX 1

### RELOCATION OF GRAVES

Burial grounds and graves are dealt with in Article 36 of the NHR Act, no 25 of 1999. Below follows a broad summary of how to deal with grave in the event of proposed development.

- If the graves are younger than 60 years, an undertaker can be contracted to deal with the exhumation and reburial. This will include public participation, organising cemeteries, coffins, etc. They need permits and have their own requirements that must be adhered to.
- If the graves are older than 60 years old or of undetermined age, an archaeologist must be in attendance to assist with the exhumation and documentation of the graves. This is a requirement by law.

Once it has been decided to relocate particular graves, the following steps should be taken:

- Notices of the intention to relocate the graves need to be put up at the burial site for a period of 60 days. This should contain information where communities and family members can contact the developer/archaeologist/public-relations officer/undertaker. All information pertaining to the identification of the graves needs to be documented for the application of a SAHRA permit. The notices need to be in at least 3 languages, English, and two other languages. This is a requirement by law.
- Notices of the intention needs to be placed in at least two local newspapers and have the same information as the above point. This is a requirement by law.
- Local radio stations can also be used to try contact family members. This is not required by law, but is helpful in trying to contact family members.
- During this time (60 days) a suitable cemetery need to be identified close to the development area or otherwise one specified by the family of the deceased.
- An open day for family members should be arranged after the period of 60 days so that they can gather to discuss the way forward, and to sort out any problems. The developer needs to take the families requirements into account. This is a requirement by law.
- Once the 60 days has passed and all the information from the family members have been received, a permit can be requested from SAHRA. This is a requirement by law.

- Once the permit has been received, the graves may be exhumed and relocated.
- All headstones must be relocated with the graves as well as any items found in the grave