



the dme

Department:
Minerals and Energy
REPUBLIC OF SOUTH AFRICA

DME 12

Private Bag X6076, Port Elizabeth 6000,
Tel: (041) 396 3900
Fax: (041) 396 3946
Cnr. Diaz and Mount Roads
Mount Croix
Port Elizabeth, 6001

Enquiries: D. Watkins
E-mail: deidre.watkins@dme.gov.za

Reference:
Date:

EC30/5/1/3/3/2/1/0416EM
11 February 2010

South African Heritage Resources Agency
P.O. Box 758
GRAHAMSTOWN
6140

Case no: 2412

ATTENTION: MR. T. LUNGILE

Sir

CONSULTATION IN TERMS OF SECTION 40 OF THE MPRDA OF 2002: ENVIRONMENTAL MANAGEMENT PLAN (EMP) RECEIVED FOR DEVELOPMENT OF A BORROW-PIT FOR QUMBU STREETS UPGRADE

1. Attached herewith, a copy of the Heritage survey of the proposed Qumbu Borrow Pit, Qumbu, Eastern Cape for your comments.
2. Please forward any written comments or requirements your department may have in this regard, to this office no later than **9 April 2010**. Failure to do so, will lead to the assumption that your department has no objection(s) or comments with regard to the said document.
3. Consultation in this regard has also been initiated with other relevant State Departments.
4. Kindly quote the relevant file reference number in all correspondence.

Sincerely,

REGIONAL MANAGER
EASTERN CAPE

**HERITAGE SURVEY OF THE PROPOSED QUMBU
BORROW PIT, QUMBU, EASTERN CAPE**

**FOR AFRICA GEO-ENVIRONMENTAL SERVICES
(PTY) LTD (AGES)**

DATE: 1 OCTOBER 2009

By Gavin Anderson
Umlando: Archaeological Tourism and Resource
Management
PO Box 102532, Meerensee, 3901
Phone/fax: 035-7531785 Fax: 0865445631
cell: 0836585362

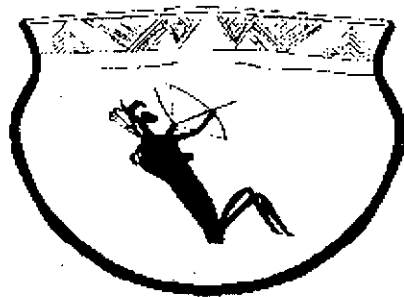


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INTRODUCTION

Umlando cc was contracted by Africa Geo-Environmental Services (Pty) Ltd (AGES) to undertake a heritage impact assessment of the proposed Qumbu Borrow Pit. The proposed borrow pit is located ~2.5km west of Qumbu, Eastern Cape (fig. 1). There is an existing borrow pit and it will be reused for the proposed borrow pit.

The geology of the area indicates an upper layer of dolerite boulders with a shale deposit below. There is a very thin layer of sand between these boulders (fig. 2). There are no caves, overhangs or shelters in this area.

The impacts on the area will be:

- Borrow pit - there is an existing dirt road that leads up to the borrow pit.
- Access roads

METHOD

The method for Heritage assessment consists of several steps.

The first step forms part of the desktop assessment. Here we would consult the databases. These databases contain most of the known heritage sites in KwaZulu-Natal, and the known memorials and other protected sites, battlefields and cemeteries in southern Africa. We also consult with an historical architect, palaeontologist, and an historian where necessary.

The initial archaeological survey (i.e. fieldwork) consists of a foot survey where the selected area was covered. The survey results will define the significance of each recorded site, as well as a management plan. The main problem with the survey was the poor archaeological visibility.

All sites are grouped according to low, medium and high significance for the purpose of this report. Sites of low significance have no diagnostic artefacts or features. Sites of medium significance have diagnostic artefacts or features and these sites tend to be sampled. Sampling includes the collection of artefacts for future analysis. All diagnostic pottery, such as rims, lips and decorated sherds are sampled, while bone, stone and shell are mostly noted. Sampling usually occurs on most sites. Sites of high significance are excavated and/or extensively sampled. Those sites that are extensively sampled have high research potential, yet poor preservation of features.

Defining significance

Heritage sites vary according to significance and several different criteria relate to each type of site. However, there are several criteria that allow for a general significance rating of archaeological sites.

These criteria are:

1. State of preservation of:

- 1.1. Organic remains:
 - 1.1.1. Faunal
 - 1.1.2. Botanical
- 1.2. Rock art
- 1.3. Walling
- 1.4. Presence of a cultural deposit
- 1.5. Features:
 - 1.5.1. Ash Features
 - 1.5.2. Graves
 - 1.5.3. Middens
 - 1.5.4. Cattle byres
 - 1.5.5. Bedding and ash complexes

2. Spatial arrangements:

- 2.1. Internal housing arrangements
- 2.2. Intra-site settlement patterns
- 2.3. Inter-site settlement patterns

3. Features of the site:

- 3.1. Are there any unusual, unique or rare artefacts or images at the site?
- 3.2. Is it a type site?
- 3.3. Does the site have a very good example of a specific time period, feature, or artefact?

4. Research:

- 4.1. Providing information on current research projects
- 4.2. Salvaging information for potential future research projects

5. Inter- and intra-site variability

- 5.1. Can this particular site yield information regarding intra-site variability, i.e. spatial relationships between various features and artefacts?
- 5.2. Can this particular site yield information about a community's social relationships within itself, or between other communities?

6. Archaeological Experience:

- 6.1. The personal experience and expertise of the CRM practitioner should not be ignored. Experience can indicate sites that have potentially significant aspects, but need to be tested prior to any conclusions.

7. Educational:

- 7.1. Does the site have the potential to be used as an educational instrument?
- 7.2. Does the site have the potential to become a tourist attraction?
- 7.3. The educational value of a site can only be fully determined after initial test-pit excavations and/or full excavations.

8. Other Heritage Significance:

- 8.1. Palaeontological sites

- 8.2. Historical buildings
- 8.3. Battlefields
- 8.4. Graves and/or community cemeteries
- 8.5. Living Heritage Sites
- 8.6. Cultural Landscapes, that includes old trees, hills, mountains, rivers, etc related to cultural or historical experiences.

The more a site can fulfill the above criteria, the more significant it becomes. Test-pit excavations are used to test the full potential of an archaeological deposit. This occurs in Phase 2. These test-pit excavations may require further excavations if the site is of significance (Phase 3). Sites may also be mapped and/or have artefacts sampled as a form of mitigation. Sampling normally occurs when the artefacts may be good examples of their type, but are not in a primary archaeological context. Mapping records the spatial relationship between features and artefacts.

RESULTS

Desktop Survey

No known heritage sites have been recorded in the immediate surrounding area.

QUMBU BORROW PIT

I surveyed the original Qumbu Borrow Pit (fig. 3) and its surrounding area.

No archaeological sites or artefacts were observed in the vicinity of the borrow pit. The geology suggests that there may be a palaeontological layer within the shale, or mudstone, deposits.

FIG. 1: GENERAL LOCATION OF THE PROPOSED QUMBU BORROW PIT

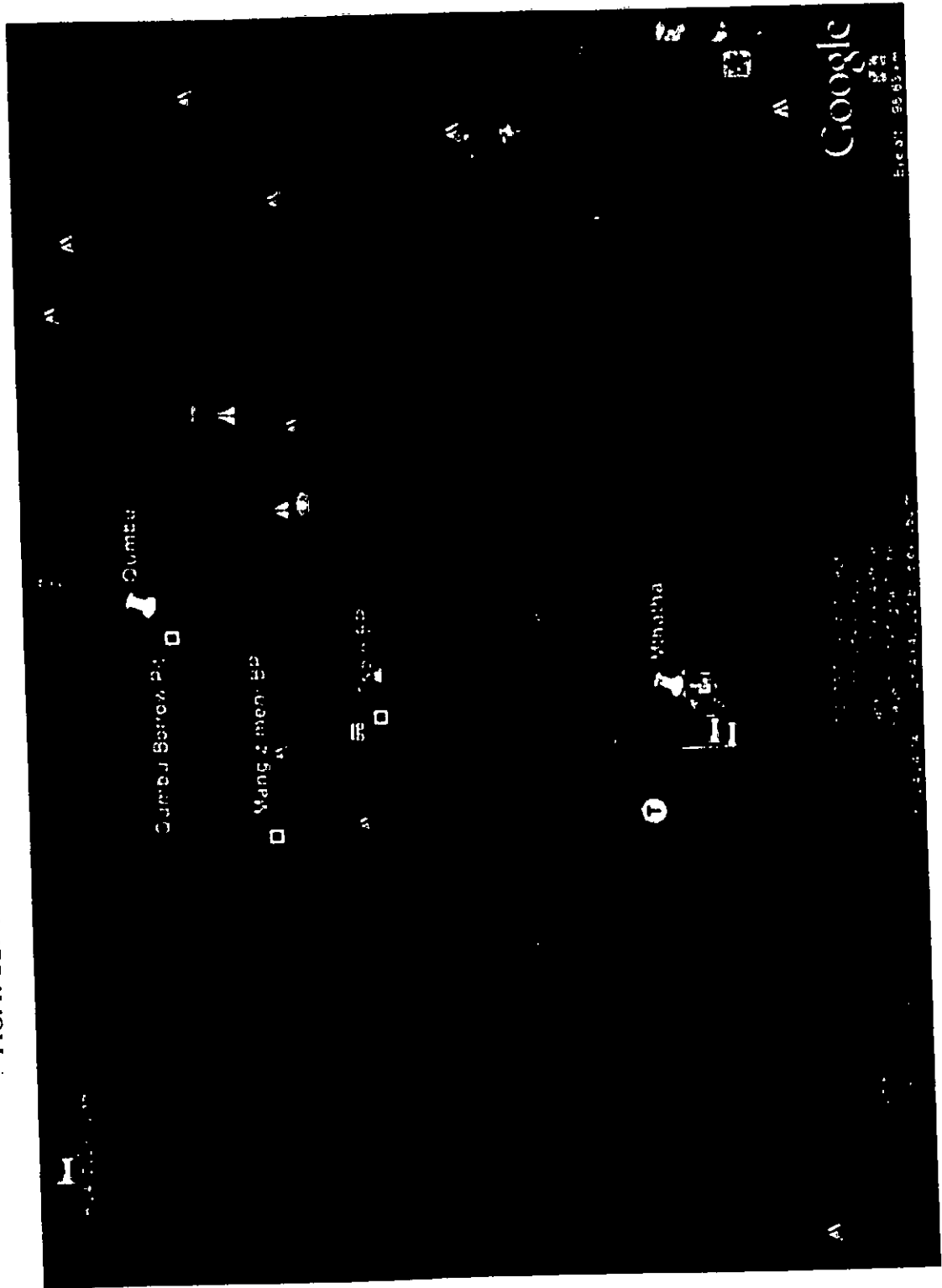


FIG. 2: VIEW OF THE EXISTING BORROW PIT

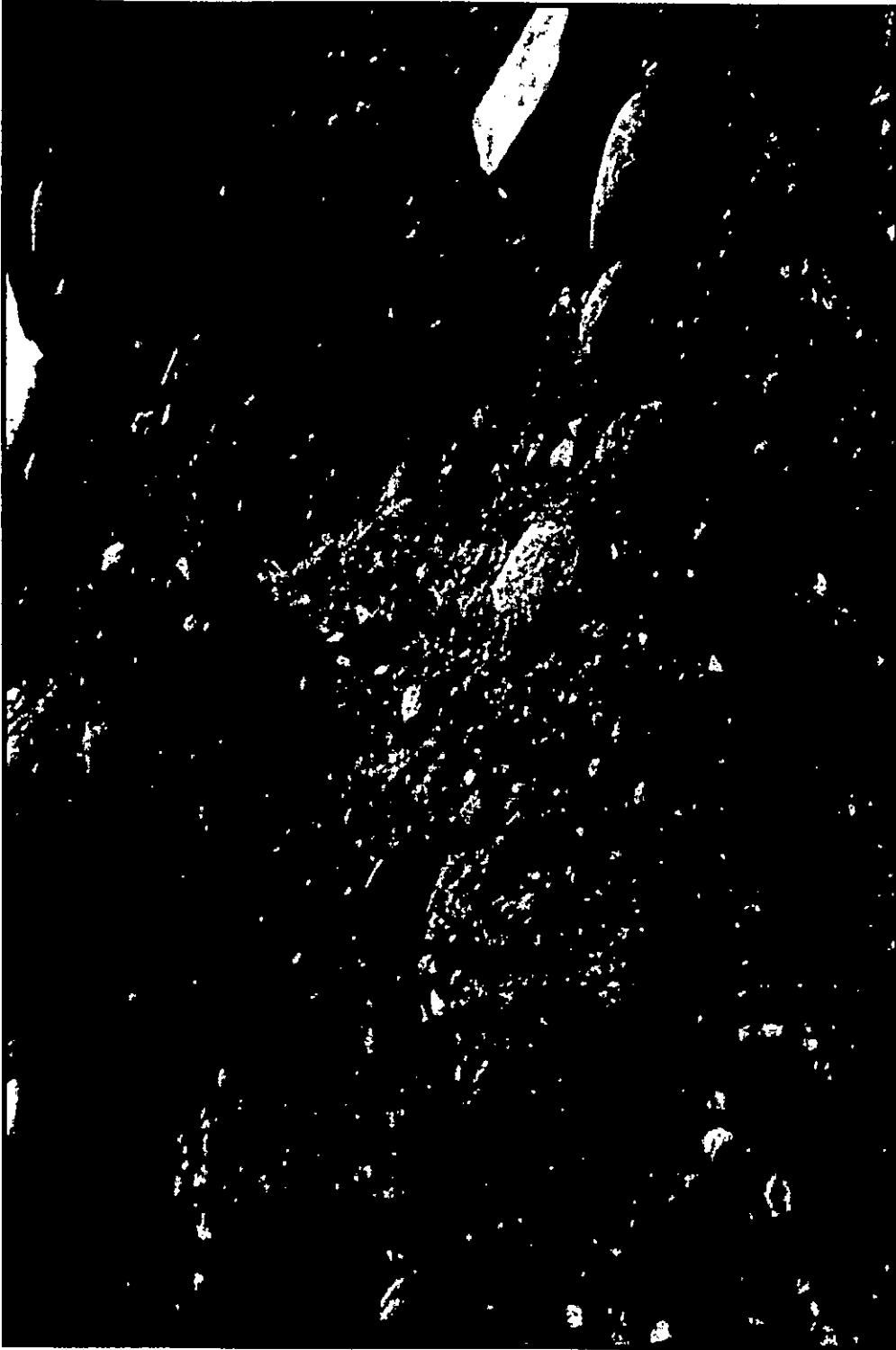
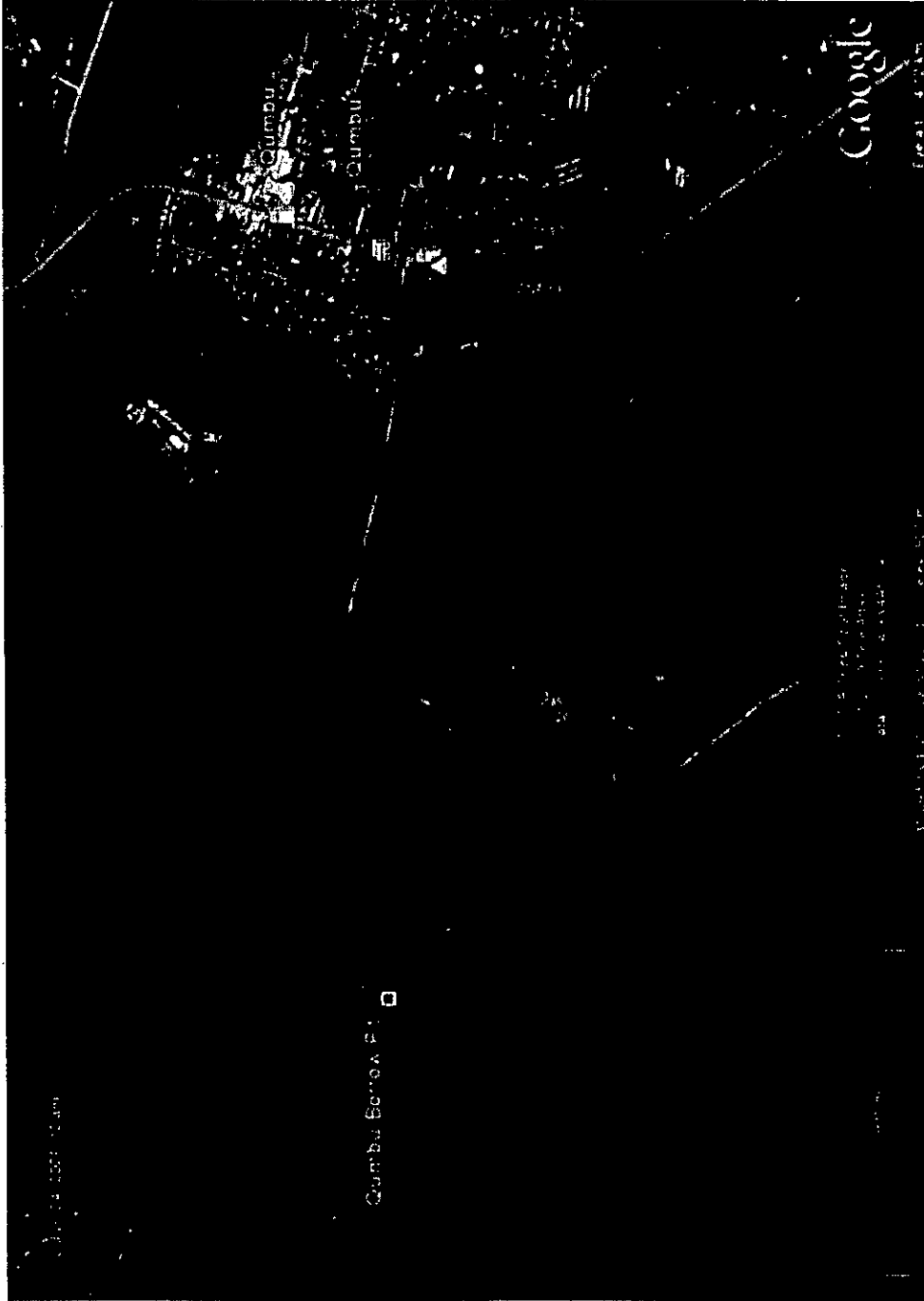


FIG. 3: LOCATION OF THE QUMBU BORROW PIT



MANAGEMENT PLAN

The proposed Qumbu Borrow Pit does not appear to be in an archaeologically sensitive area. However, the shale deposits are indicative of palaeontological remains. A palaeontologist will need to assess the site for a more detailed analysis.

CONCLUSION

The proposed extension of the Qumbu Borrow Pits was surveyed. I did not observe any historical or archaeological sites, nor any isolated artefacts in the vicinity of the borrow pit. Palaeontological remains may exist and these will need to be assessed by a qualified palaeontologist

Apart from the palaeontology, no further heritage management should be required for this borrow pit.