# Appendix

#### **ARCHAEOLOGICAL REPORT**

A PHASE 1 ARCHAEOLOGICAL IMPACT ASSESSMENTS OF THE PROPOSED, STORM WATER MANAGEMENT SYSTEM AND THE RESIDENTIAL EXTENSION FOR PORTION 62 OF THE FARM ONGEGUNDE VRYHEID NO. 746, ST FRANCIS BAY, KOUGA LOCAL MUNICIPALITY, EASTERN CAPE PROVINCE

Prepared for: CEN Integrated Environmental Management Unit

36 River Road

Walmer

Port Elizabeth

6070

Tel: 041 5812983/5817811

Fax: 041 5812983

Contact person: Ms Lucille Beherns

Cell.: 0829221645

Email: Lucille.beherns@gmail.com

Compiled by: Dr Johan Binneman

On behalf of: Eastern Cape Heritage Consultants

P.O. Box 689 Jeffreys Bay 6330

Tel: 042 2960399 Cell: 0728006322

Email: kobusreichert@yahoo.com jnfbinneman@gmail.com

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Compiled by: Dr Johan Binneman

On behalf of: Eastern Cape Heritage Consultants

P.O. Box 689, Jeffreys Bay, 6330

Tel: 042 2960399 Cell: 0728006322

email: kobusreichert@yahoo.com

**Note:** This report follows the minimum standard guidelines required by the South African Heritage Resources Agency for compiling Archaeological Heritage Phase 1 Impact Assessment (AHIA) reports.

#### **SUMMARY**

Eastern Cape Heritage Consultants was appointed by CEN Integrated Environmental Management Unit (independent consultant) on behalf of the Kouga Local Municipality and the Department of Public Works to conduct a Phase 1 Archaeological Impact Assessment (AIA) of the proposed developments on Portion 62 of the farm Ongegunde Vryheid No. 746, St Francis Bay, Kouga Local Municipality, Eastern Cape Province. The purpose of the AIA was to evaluate the importance of the archaeological sites, the potential impact of the development and to make recommendations to minimize possible damage to these sites.

The property for the proposed developments is situated a kilometre south of St Francis Bay, approximately 15 kilometres southeast of Humansdorp and next to (east) the R330 main road to Cape St Francis. The proposed developments include the construction of a storm water system and a residential extension on Portion 62 of Farm Ongegunde Vryheid No. 746. It is proposed to drain the large ponds which form near the St Francis Waste Water Treatment Works, towards St Francis Drive from where it will follow a natural drainage line to the coast.

The property, once a pristine shifting sand dune system, was stabilised with alien 'rooikrans' branches from the early 1980s. Recently most of the alien vegetation was cleared and currently large areas are covered by low, dense coastal dune vegetation. The area has been severely disturbed in the past by the establishment of a solid waste dump site, St Francis Waste Water Treatment Works and an informal settlement.

The dense vegetation and wetland/vlei areas made it difficult to observed archaeological sites/materials. This may create the impression that the property is of low cultural sensitivity, but sites and materials are buried by dune sand. Research and surveys in the wider vicinity indicated that the nearby Sand River/Goedgeloof dune field and Cape St Francis region are extremely rich in archaeological heritage sites and material. The adjacent Santereme coastal area (east of St Francis Drive) was one of the richest pre-colonial archaeological cultural landscapes in the south-eastern Cape before it was developed as residential, recreational and commercial area. A large number of archaeological sites/materials were also observed and removed from the nearby St Francis links golf course.

It is recommended that all construction activities related to the proposed developments must be monitored by an archaeologist or heritage practitioner, or alternatively a person must be specially trained, for example the ECO, to conduct the monitoring and to report to the foreman when archaeological sites are exposed/found.

If any concentrations of archaeological material (especially human remains) are exposed during construction, all work in that area must cease immediately (depending on the type of find) and it must be reported to the archaeologist at the Albany Museum in Grahamstown (046 6222312) or to the Eastern Cape Provincial Heritage Resources Authority (043 6422811), so that a systematic and professional investigation can be undertaken. Sufficient time should be allowed to investigate and to remove/collect such material after consultation with the Gamtkwa KhoiSan Council, the Albany Museum in Grahamstown and the applicant, who must finance all additional consultations and investigations, should it be required.

#### PROJECT INFORMATION

Two projects have been proposed for Portion 62 of the farm Ongegunde Vryheid No. 746 at St Francis Bay. The first proposal comprises the implementation of a storm water management plan for to minimise flood risks to the residential areas east of St Francis Drive (Maps 1-2). Large ponds build-up from time to time in the dune fields east of the St Francis Waste Water Treatment Works which is located in the southern corner of the study area. It is proposed to drain these ponds eastwards towards St Francis Drive where it will be channelled along an existing drainage line to the coast. The second proposal entails the establishment of a residential development by the Kouga Local Municipality stretching in a west-east direction mainly along the northern boundary of the property (Maps 1-2).

#### The applicants

Department of Public Works Kouga Local Municipality

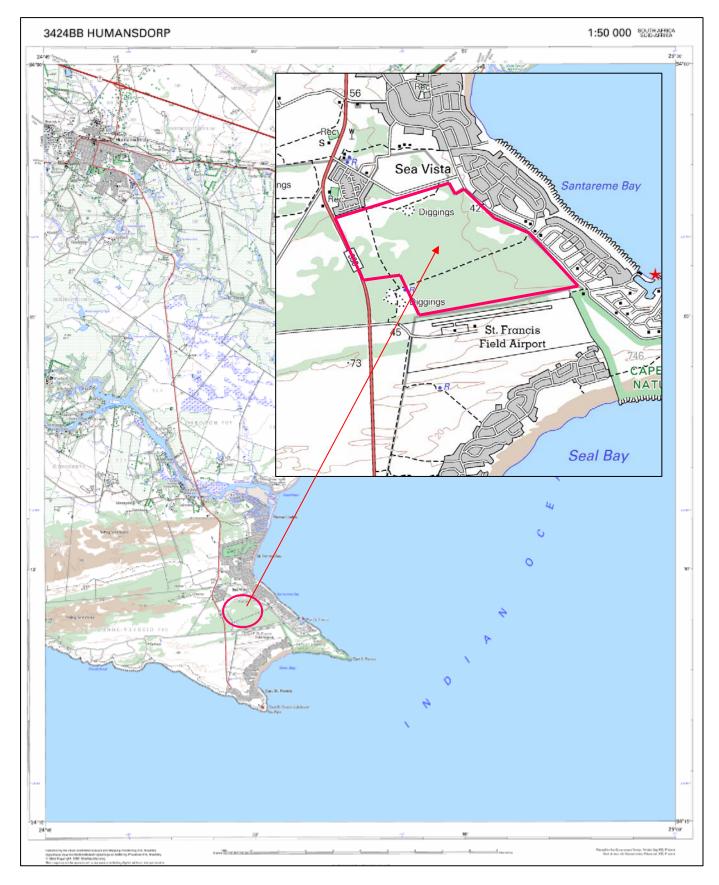
#### Purpose of the study

The original proposal was to conduct a Phase 1 Archaeological Impact Assessment of the proposed storm water management plan and the residential extension for Portion 62 of The Farm Ongegunde Vryheid No. 746, St Francis Bay, Kouga Local Municipality, Eastern Cape Province, to describe and evaluate;

- the importance of possible archaeological sites, features and materials,
- the potential impact of the development on these resources and,
- to propose recommendations to minimize possible damage to these resources.

#### Site and location

The site for the proposed storm water management system and the residential extension for Portion 62 of The Farm Ongegunde Vryheid No. 746 is located within the 1:50 000 topographic reference map 3424 BB Humansdorp. It is situated approximately 15 kilometres southeast of Humansdorp, one kilometre from the St Francis business centre and a few hundred metres from the Santareme coast. The site is located between the R330 main road (east) to Cape St Francis and St Francis Drive (west). This area, once a pristine shifting sand dune system rich in archaeological and palaeontological sites, was stabilised with alien 'rooikrans' branches during the 1980s and currently covered by dense coastal dune vegetation (Figures 1-7) (Maps 1-4). Large areas have been disturbed in the past by the establishment of a solid waste dump site, the St Francis Waste Water Treatment Works and an informal settlement mainly along the R330 main road to Cape St Francis. A general GPS reading was taken at 34.10.54S; 24.49.816E.



Map 1. 1:50 000 Topographic maps indicating the location of the proposed development. The pink lines mark the location of Portion 62 of the farm Ongegunde Vryheid No. 746.



Map 2. Aerial maps indicating the location and layout of the proposed developments on Portion 62 of the farm Ongegunde Vryheid No. 746. The green dots mark the archaeological material.

#### BRIEF ARCHAEOLOGICAL BACKGROUND

#### Literature review

The oldest evidence of the early inhabitants in the region are large stone tools, called hand axes and cleavers which can be found in the river gravels which capped the hill slopes in the region, and on the calcrete floors exposed in the dune systems along the coast towards Cape St Francis (Laidler 1947; Deacon & Geleijnse 1988; Binneman 2001, 2005). The time period is known as the Earlier Stone Age and the stone tools belong to the Acheulian Industry, dating between approximately 1,5 million and 250 000 years old.

The period between 250 000 and 30 000 years ago is called the Middle Stone Age and thousands of stone points and blades represent this time period in the wider region. This period also witnessed the emergence of the first modern humans (Homo sapiens sapiens) and of the world's oldest remains of anatomically modern humans (some 110 000 yeas old) comes from the Klasies River complex of caves about 35 kilometres west of St Francis Bay. The archaeological deposits at these caves date to 120 000 years old and also represent the oldest evidence for the exploitation of marine food resources by people in the region (Singer & Wymer 1982; Rightmire & Deacon 1991; Deacon 1992, 1993, 2001; Deacon, H. J & Shuurman, R. 1992). Although humans were already anatomically modern by 110 000 years ago, they were not yet exhibiting 'modern behaviour' and only developed into culturally modern behaving humans between 80 000 and 70 000 years ago. This occurred during cultural phases known as the Still Bay and Howieson's Poort time periods/stone tool traditions. The Howison's Poort is well represented at Klasies River Cave 2 and in the dunes near Oyster Bay (Deacon & Wurz 1996; Wurz 1999; Carrion et al. 2000).

Unfortunately, no caves and shelters in the region with deposits dating between 25 000 and 5 000 years ago have been researched yet. Nevertheless, from sites farther along the coast and adjacent Cape Mountains, we know that the past 20 000 years, called the Later Stone Age (LSA), introduced several 'new' technological innovations. Others became more common, such as rock art, burials associated with grave goods, painted stones, new microlitic stone tool types, some fixed to handles with mastic, bow and arrow, containers, such as tortoise shell bowls and ostrich eggshell flasks (sometimes decorated), decorative items, bone tools and many more (Deacon & Deacon 1999).

The period between 20 000 and 14 000 years ago experienced extremely cold climatic conditions world wide and had a great influence on the local environment. During the Last Glacial Maximum (the last ice age) vast areas were exposed along the coast which created favourable conditions for grassland and grazing animals. The remains from archaeological sites indicated that there were several large grazing animal species which are now extinct, for example the giant buffalo, the giant hartebeest and the Cape horse. After 14 000 years ago the climate started to warm up again and the sea level rose rapidly. By 12 000 years ago the sea was close to modern conditions and the previously exposed grassland also disappeared due to the rising sea level, causing the extinction of many grassland species including the giant buffalo, hartebeest and the Cape horse (Deacon & Deacon 1999).

Between 10 000 and 8 000 years ago the environment became bushier and gave rise to territorial smaller type browsing animals that lived in small groups or pairs. Most of the large Last Glacial grazing animals disappeared from the archaeological deposits during this time period. A characteristic of the past 8 000 years, also known as the Wilton time period, was the large number of small (microlithic) stone tools in the shelters and open-air middens of the region. However, by 4 500 years ago these stone tools were replaced at the Klasies River Caves by large quartzite stone tools, labelled the Kabeljous Industry (Binneman, 2007). The first change in the socio-economic landscape came some 2 000 years ago when Khoi pastoralists settled in the region. They were the first food producers and introduced domesticated animals (sheep, goats and cattle) and ceramic vessels to the region (Rudner, 1968; Binneman, 1996).

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#### Cultural sensitivity of the adjacent coastal and dune areas

The adjacent Santareme coast between St Francis Drive and the rocky shore was extremely rich in pre-colonial archaeological sites and material (Binneman 1996, 2001, 2005). During the author's first visit in 1981 the area comprised a large shifting sand dune field with many shell middens and other archaeological features, sites and material (see Maps 3-4). From the early 1980s the area was stabilised with branches and eventually developed for residential, recreational and commercial purposes, which also destroyed the rich archaeological cultural

landscape. Among the hundreds of archaeological sites/materials destroyed was the oldest KhoiKhoi (also KhoeKhoen) living site with pottery in the south-eastern Cape, radiocarbon dated to 1 800 years old. Several KhoiSan burials were also exposed during the construction of houses (Map 4).

The nearby Goedgeloof dune field is also very rich in archaeological heritage sites dating from the Earlier Stone Age period to historical times (Binneman 2001, 2005) (Map 4). Of special interest is the Middle Stone Age stone tool manufacturing sites and associated fossil bone accumulations. There are also many hunter-gatherer shell middens in the dunes dating from some 5 000 years old and a few KhoiKhoi pastoralists shell middens which date to 1 300 years old. These pastoralist middens are very important and rate among the richest in South Africa regarding the numbers of sheep, goat and cattle remains collected from the middens.. During the development of the nearby links golf course many shell middens and other archaeological materials were also found. Unfortunately, the study area (Portion 62 of Farm Ongegunde Vryheid No. 746), which is proposed for the development of a residential extension and storm water management system, has never been investigated in detail before the site was completely stabilised with branches.

#### Museum/University databases and collections

The Albany Museum in Grahamstown houses collections and information from the region. Other institutions also having collections and information from the region include the University of Cape Town and Iziko Museums.

#### Relevant impact assessments

- Binneman, J. 2014. A letter of recommendation (with conditions) for the exemption of a full Phase 1 Archaeological Impact Assessment for the proposed upgrade and expansion of the St Francis Bay Waste Water Treatment Works, St Francis Bay, Kouga Local Municipality, Eastern Cape Province. Prepared for CEN Integrated Environmental Management Unit, Port Elizabeth. Eastern Cape Heritage Consultants. Jeffreys Bay.
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#### ARCHAEOLOGICAL INVESTIGATION

#### Methodology

The investigation of the property was conducted on foot by two people. GPS readings were taken with a Garmin and all important features were digitally recorded (for images of the study area investigated see Appendix's C and D, Figures 1-8). An extensive Google aerial investigation was conducted of the area prior to the survey to familiarize oneself with the area and to identify areas of possible heritage sensitivity. Consultation was also conducted with the local Gamtkwa KhoiSan Council regarding the archaeological heritage of the area as required by the National Heritage Resources Act No. 25 of 1999, Section 38(3e).

#### **Limitations and assumptions**

Unfortunately, due to the rapid stabilisation of the dunes during the early 1980s, the author never had the opportunity to record archaeological and palaeontological sites/materials in any detail on Portion 62 of Farm Ongegunde Vryheid No. 746. The distribution/locations and number of sites/materials are therefore unknown. Although the terrain was relatively easy to access, the archaeological visibility in general was poor due to the dense coastal dune vegetation and wetland/vlei areas which covered the former dunes. The alien vegetation which was cleared in recent years was left in large piles which also restricted the visibility. Over the years several developments such as the construction of an airfield, roads, pipelines, trenching, the solid waste dump site, St Francis WWTW and the informal settlement severely disturbed the area. All these activities must have had an impact on visible and buried archaeological sites/materials in the past.

On the other hand, the stabilisation of the dunes also covered the archaeological and palaentological sites with dune sand and vegetation which prevented the exposure of these sites by wind action. The locations of these sites are unknown and may be exposed during the proposed developments. However, regardless of the restrictions imposed by the dense vegetation, the experiences and knowledge gained from research and several other investigations in the adjacent region, provided background information to make assumptions and predictions on the incidences and the significance of possible pre-colonial archaeological sites/material

#### **Results and finds**

The dune sand, dense vegetation and wetland/vlei areas made it difficult to observed archaeological sites/materials. Before the dunes were stabilised archaeological and palaeontological sites/materials were observed mainly on the hard calcrete floors and on the old grey vlei surfaces which were exposed between the dunes (Figures 1, 2 and 8). These sites/materials were only visible for short periods of time before they were covered again while others were exposed as the dunes moved from west to east.

During the investigation only three occurrences of archaeological material were observed which suggested the presence of disturbed/buried sites (Map 2) (Figures 3 and 8). Both S1 (34.10.918S; 24.50.160E) and S2 (34.10.677S; 24.49.566E) displayed only a few complete marine shells, shell fragments and occasional stone tools. The shell included *Turbo sarmaticus*, *Scutellastra cochlear*, *S. tabularis/Barbara*, *S. argenvillei* and *Burnupena* spp. S1, like S3 (34.10.706E; 24.49.955S) also included fire cracked stone cobble fragments which suggest disturbed stone features used as cooking platforms. These circular stone platforms are found throughout the region and are usually associated with KhoiKhoi living sites.

#### **DISCUSSION**

The dense coastal dune vegetation made it difficult to find archaeological sites. The stabilisation of the dunes during the 1980s also covered the archaeological and palaeontological sites with dune sand and vegetation which prevented the exposure of these sites. The property is situated only a few hundred metres from the coast and falls inside the archaeological coastal sensitivity zone where shell middens and other archaeological sites/materials are expected to be found. Furthermore, research and surveys along the adjacent coastal and inland areas yielded large numbers of shell middens and other archaeological and palaeontological sites/materials. It is therefore possible that archaeological sites/materials (including human remains) may be found when the property is developed. Such material must be reported to the archaeologist at the Albany Museum in Grahamstown or to the Eastern Cape Provincial Heritage Resources Authority, so that a systematic and professional investigation can be undertaken.

#### RECOMMENDATIONS

- 1. All construction activities must be monitored by an archaeologist/heritage practitioner or alternatively a person must be specially trained, for example the ECO, to conduct the monitoring. This must include the clearing of the dense vegetation (which constrained the visibility of heritage resources during the investigation), levelling, excavations for pipelines and other underground/buried infrastructure and all above ground construction activities such as roads and buildings.
  - If any construction/alterations are conducted along the drainage line from St Francis Drive to the coast, then the recommendations as above must also be followed.
- 2. 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. Alternatively the recommendation above may be followed and the ECO must be trained as a site monitor to report to the foreman when archaeological sites are exposed/found.
- 3. If any concentrations of archaeological material (especially human remains) are exposed during construction, all work in that area must cease immediately (depending on the type of find) and it must be reported to the archaeologist at the Albany Museum in Grahamstown (046 6222312) or to the Eastern Cape Provincial Heritage Resources Authority (043 6422811), so that a systematic and professional investigation can be undertaken. Sufficient time should be allowed to investigate and to remove/collect such material. Recommendations will follow from the investigation (See appendix B for a list of possible archaeological sites that may be found in the area). If any archaeological sites/materials are exposed, recommendations will follow after the investigation and may include:
  - Consultation with the Gamtkwa KhoiSan Council regarding the conditions for the possible removal, storage and reburial (in the case of human remains) of heritage material.
  - Consultation with the Albany Museum (repository for archaeological material in the Eastern Cape) regarding permits to remove the heritage material, the storing, curating and costs involved.
  - A Phase 2 Mitigation process to systematically excavate and to remove the archaeological deposits before construction of the development continues.

Note: All costs must be financed by the applicants. This may include:

• All monitoring and mitigation expenses regarding the excavations/collecting of material, travel, accommodation and subsistence, analysis of the material, radiocarbon date(s) of the site(s) and a one-off curation/storage fee payable to the Department of Archaeology at the Albany Museum in Grahamstown (Eastern Cape Repository for Archaeological material).

#### GENERAL REMARKS AND CONDITION

**Note:** This report is a phase 1 archaeological impact assessment/investigation only and does not include or exempt other required heritage impact assessments (see below).

The National Heritage Resources Act (Act No. 25 of 1999, section 35) (see Appendix A) 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.

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 developer must finance the costs should additional studies be required as outlined above. The *onus* is also on the developer to ensure that this agreement is honoured in accordance with the National Heritage Act No. 25 of 1999. The consultant is responsible to forwarding this report to the relevant Heritage Authority for assessment, unless alternative arrangements have been made with the specialist to submit the report.

It must also be clear that Archaeological Specialist Reports (AIA's) will be assessed by the relevant heritage resources authority. The final decision rests with the heritage resources authority, which should grant a permit or a formal letter of permission for the destruction of any cultural sites.

#### **APPENDIX A: brief legislative requirements**

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

#### 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.

#### 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.

#### 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, powerline, pipeline, canal or other similar form of linear development or barrier exceeding 300m in length;
- (b) the construction of a bridge or similar structure exceeding 50m in length;
- (c) any development or other activity which will change the character of the site
  - (i) exceeding  $5000m^2$  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 000m<sup>2</sup> 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: IDENTIFICATION OF ARCHAEOLOGICAL FEATURES AND MATERIAL FROM COASTAL AREAS: guidelines and procedures for developers

#### **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 m<sup>2</sup> in extent, should be reported to an archaeologist.

#### **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.

#### Fossil bone

Fossil bones or any other concentrations of bones, whether fossilized or not, should be reported.

#### 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.

#### **Stone features and platforms**

These occur in different forms and sizes, but easily identifiable. The most common are an accumulation of roughly circular fire cracked stones tightly spaced and filled in with charcoal and marine shell. They are usually 1-2 metres in diameter and may represent cooking platforms for shell fish. Others may resemble circular single row cobble stone markers. These occur in different sizes and may be the remains of wind breaks or cooking shelters.

#### Historical artefacts or features

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

#### APPENDIX C

MAPS, DIGITAL IMAGES AND AERIAL VIEWS
OF THE LANDSCAPE AND HERITAGE SITES

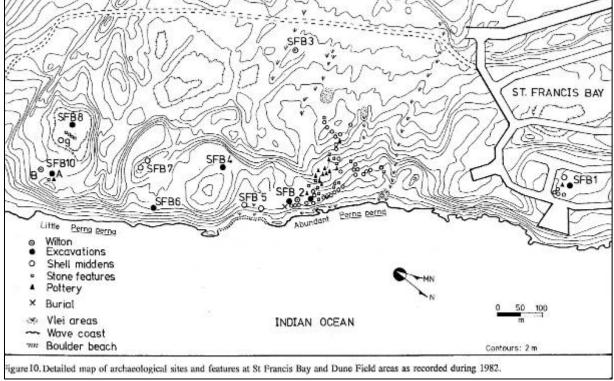




Map 3. A 1:50 000 topographical map (top) and an aerial photograph (middle) showing the extent of the shifting dune system at the study site in 1975 and an aerial photograph (bottom) displaying a much reduced system in 1986.







Map 4. A few important archaeological sites indicated on an aerial image of the wider region (top), along the Santareme coast (middle) and a map of sites surveyed during 1982.

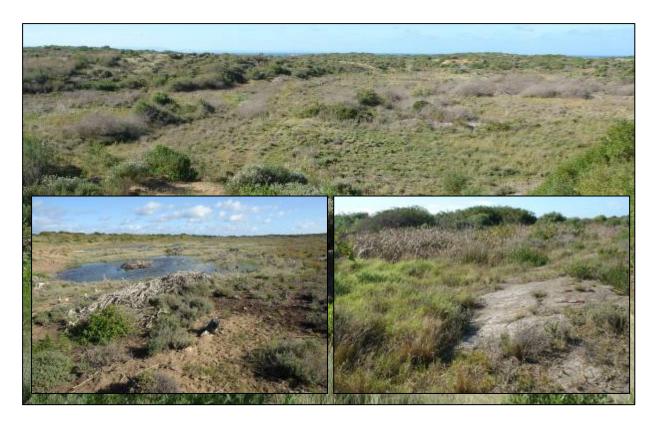


Figure 1. General views from the proposed overflow area towards the proposed culvert expansion at St Francis Drive (Map 2). A large waterlogged area and an old vlei area represented by the grey soil floor next to an existing vlei area are visible along the route (inserts).

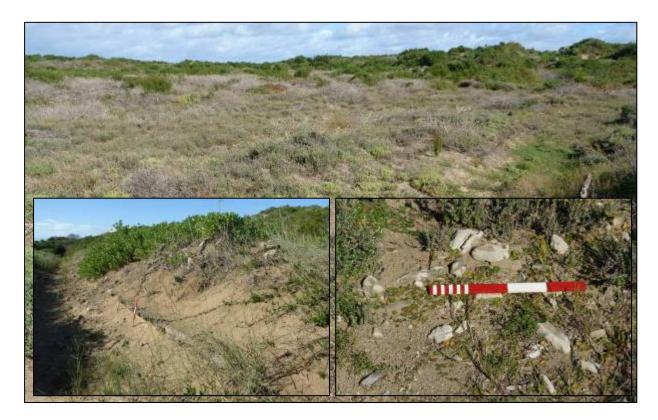


Figure 2. General views of the dune landscape and an old vlei land floor (left insert) and remains of a disturbed fossil dune surface (right insert)



Figure 3. Images of site S1showing the few marine shells and fire cracked stones from a disturbed cooking platform.



Figure 4. View from the dune area (main image) towards the area for the proposed culvert expansion at St Francis Drive (left insert) and the drainage line towards the Santareme coast (right insert).

#### APPENDIX D

DIGITAL IMAGES AND AERIAL VIEWS
OF THE LANDSCAPE AND HERITAGE SITES



Figure 5. Views of the disturbances and general landscape near the informal settlement.

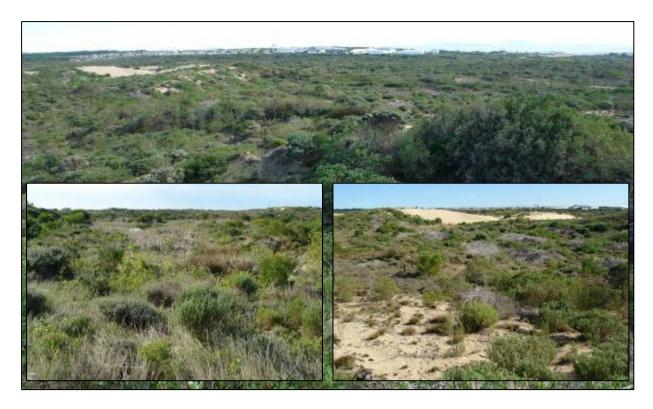


Figure 6. General views of the dune area earmarked for the proposed residential development.



Figure 7. More views of the dune area earmarked for the proposed residential development.



Figure 8. A large elevated block of grey soil of an old vlei area (main image) and a few marine shells at the disturbed/ destroyed archaeological site S2 at a calcrete outcrop.

#### **ARCHAEOLOGICAL**

# SPECIALIST DECLARATION OF INDEPENDENCE



## PROVINCE OF THE EASTERN CAPE DEPARTMENT OF ECONOMIC DEVELOPMENT ENVIRONMENTAL AFFAIRS AND TOURISM

#### DETAILS OF SPECIALIST AND DECLARATION OF INTEREST

File Reference Number: NEAS Reference Number: Date Received:

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12/12/20/	
DEAT/EIA/	

Application for authorisation in terms of the National Environmental Management Act, 1998 (Act No. 107 of 1998), as amended and the Environmental Impact Assessment Regulations, 2010

#### PROJECT TITLE

PROPOSED STORMWATER MANAGEMENT AT SANTAREME, ST FRANCIS BAY WITHIN KOUGA LOCAL MUNICIPALITY; DEDEAT REF. NO.: EC08/C/LN1&3/M/28-2014

Specialist: Eastern Cape Heritage Consultants Contact person: Dr J Binneman Postal address: P.O. Box 689, Jeffreys Bay Postal code: 6330 Cell: 072 800 6322 Telephone: Fax: 042 296 0399 N/A E-mail: jnfbinneman@gmail.com Professional Association of South African Professional Archaeologists affiliation(s) (if any)

Project Consultant: Contact person: Postal address: Postal code: Telephone: E-mail:

<b>CEN Integrated Environme</b>	ental Mana	gement Unit
Dr M Cohen		
36 River Road, Walmer		18
6070	Cell:	082 320 3111
041 581 2983 / 581 7811	Fax:	086 504 2549
steenbok@aerosat.co.za		

4.2 The specialist appointed in terms of the Regulations

#### J.N.F. Binneman

. declare that --

#### General declaration:

- I act as the independent specialist in this application
- I will perform the work relating to the application in an objective manner, even if this results in views and findings that are not favourable to the applicant
- I declare that there are no circumstances that may compromise my objectivity in performing such
- I have expertise in conducting the specialist report relevant to this application, including knowledge of the Act, regulations and any guidelines that have relevance to the proposed activity;
- I will comply with the Act, regulations and all other applicable legislation;
- I have no, and will not engage in, conflicting interests in the undertaking of the activity;
- I undertake to disclose to the applicant and the competent authority all material information in my possession that reasonably has or may have the potential of influencing - any decision to be taken with respect to the application by the competent authority; and - the objectivity of any report, plan or document to be prepared by myself for submission to the competent authority;
- all the particulars furnished by me in this form are true and correct; and
- I realise that a false declaration is an offence in terms of Regulation 71 and is punishable in terms of section 24F of the Act.

Dinner	
Signature of the specialist:	7
Eastern Cape Heritage Co	onsultants
Name of company (if applic	able):

1.1

Date:

Signature of the Commissioner of Oaths LINCETURE

Date:

SERGOANTU

Designation:

Official stamp (below)

