

ARCHAEOLOGICAL IMPACT ASSESSMENT

PROPOSED HOUSING DEVELOPMENT OF SPLIT PORTION OF FARM PAAPEKUILFONTEIN 281- RE (SEAFRONT) STRUISBAAI CAPE AGULHAS MUNICIPALITY WESTERN CAPE

Assessment conducted under Section 38 (3) of the National Heritage Resource Act (No. 25 of 1999)

HWC CASE 23090406

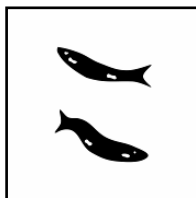
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**OCTOBER
2024**

Executive summary

1. Introduction

ACRM was appointed by Michael Wurbach to conduct a Phase 1 Archaeological Impact Assessment (or AIA) for a proposed housing development on the Farm Paapekuilfontein 281-Re (seafront) in Struisbaai, Cape Agulhas Municipality in the Overberg Region of the Western Cape.

Farm 281-Re (seafront) is located on the seaward side of Marine Drive, about midway between Struisbaai and L' Agulhas in the southern Cape. The property is small, measuring only 7095m² (or 0.71ha) in extent. The rocky shoreline in the area is a known sensitive archaeological landscape.

The AIA forms part of a Heritage Impact Assessment (HIA) that will be conducted by heritage practitioner Cindy Postlethwayt.

Lornay Consulting is the independent Environmental Assessment Practitioner (EAP) responsible for facilitating environmental authorization for the proposed development.

2. The development proposal

The proposal entails an application to rezone the split portion of Farm 281-Re (seafront), from Agriculture to Subdivisional Area in order to develop five single residential sites, one medium density residential site (for two units), internal streets and open space area. Engineering services (water, sewerage & electricity) will also be provided.

3. Aim of the study

The overall purpose of the study is to assess the sensitivity of archaeological heritage resources in the proposed development site, and to determine potential impacts (of the development) on such resources.

4. Constraints and limitations

There were no constraints or limitations associated with the study. Access to the proposed development alongside Marine Drive was unrestricted.

5. Results

A field assessment was conducted by ACRM on 07 September 2023, in which the observations were made:

- Traces of weathered marine shellfish (mostly *Turbo sarmaticus* / alikreukel) and a few chunks and broken (beach) cobbles were recorded in the coastal footpath that runs alongside the rocky shoreline, and in a few open patches of windblown sand on the vegetated slopes. No organic remains such as pottery, bone or ostrich eggshell were found.

5.1 Grading of the remains

The thin traces of shellfish, very few artefactual remains, and no visible cultural items such as pottery or ostrich eggshell, means that the archaeological remains have been graded as having Low (IIIC) local significance

6. Anticipated impacts

Buried shell middens, and unmarked Khoisan remains may be uncovered or intercepted during excavations for building foundations and services, but the probability of this occurring is rated as being Low.

7. Conclusion

A small housing development on Farm 281-Re (seafront) Struisbaai does not pose a significant threat to local archaeological heritage resources.

Excavations for building foundations and services may uncover buried archaeological deposits.

8. Recommendations

Regarding a proposed housing project on Farm 281-Re (seafront) in Struisbaai, the following recommendations are made

1. No archaeological mitigation is needed prior to construction excavations occurring.
2. Monitoring of excavations for building foundations and services (water, electricity, sewerage, stormwater), must be conducted by a professional archaeologist.
3. If any unmarked human remains are uncovered or exposed during excavations, work must stop, and the finds reported to the contracted archaeologist (Jonathan Kaplan 082 321 0172). Human remains must not be removed or disturbed until inspected by the archaeologist.

Table of Contents

	Page
Executive summary	
1. INTRODUCTION	4
2. DEVELOPMENT PROPOSAL	5
3. HERITAGE LEGISLATION	6
4. THE STUDY SITE	6
5. STUDY APPROACH	8
5.1 Method	8
5.2 Constraints and limitations	8
5.3 Identification of potential risk	8
6. ARCHAEOLOGICAL CONTEXT	9
7. RESULTS OF THE STUDY	9
7.1 Grading of archaeological resources	9
8. IMPACT STATEMENT	13
9. CONCLUSION	13
10. RECOMMENDATIONS	13
11. REFERENCES	14

1. INTRODUCTION

ACRM was appointed by Michael Wurbach on behalf of Helemika Number 1 (Pty) Ltd to conduct a Phase 1 Archaeological Impact Assessment (AIA) for a proposed housing development on the Farm Paapekuilfontein 281- Re (seafront) in Struisbaai, Cape Agulhas Municipality in the Overberg region of the Western Cape (Figures 1 & 2).

Farm 281-Re (seafront) is located on the seaward side of Marine Drive, about midway between Struisbaai and L' Agulhas in the southern Cape. The property is small, measuring only 7095m² (or 0.71ha) in extent. The rocky shoreline in the area is a known sensitive archaeological landscape (Kaplan 1993).

The AIA forms part of a Heritage Impact Assessment (HIA) that will be conducted by heritage practitioner Cindy Postlethwayt.

Lornay Consulting is the independent Environmental Assessment Practitioner (EAP) responsible for facilitating environmental authorization for the proposed development.



Figure 1. Locality Map (3420CA - CC Bredasdorp). Red polygon shows the location of the study site

2. THE DEVELOPMENT PROPOSAL

Legend

- low risk zone
- medium risk zone
- high risk zone
- 5m contour
- high water mark surveyed by land surveyor
- high water mark 1 in 10 years
- building lines

ERF	ZONING	SIZE	TOTAL
1	Medium Density Res	512m ²	
2	Medium Density Res	489m ²	
3	Medium Density Res	462m ²	
4	Medium Density Res	470m ²	
5	Medium Density Res	474m ²	
6	Medium Density Res	476m ²	2883m ²
7	Open Space	3270m ²	
8	Open Space	60m ²	3330m ²
9	Street: private road	900m ²	900m ²
TOTAL		7113m ²	7113m ²

conceptual form and placement of dwellings 250m² coverage including two garages/carports (variation between one or more levels, with max of 250m² floor space)

100m buffer line

1992

1993

1994

1995

ADELE AVENUE

MARINE DRIVE (MR 261)

middle of road

MR 261 road reserve

Street: Erf 9

Major Road (MR) 261 Diving line: 17.5m from middle of road

MR 261 road reserve

Access

refuse room

street building line

street phone box

Admiralty Zone

2m water rubble foobain

5

3. HERITAGE LEGISLATION

The National Heritage Resources Act (Act No. 25 of 1999) makes provision for a compulsory Heritage Impact Assessment (HIA) when an area exceeding 5000 m² is being developed. This is to determine if the area contains heritage sites and to take the necessary steps to ensure that they are not damaged or destroyed during development.

4. THE STUDY SITE

Farm 281 - Re (seafront) is located on the seaward side (south) of Marine Drive about midway between Struisbaai and L' Agulhas in the southern Cape (Figure 4). A small sandy beach occupies the western end of the proposed development site. A narrow coastal footpath runs alongside the length of the rocky shoreline, till an informal parking area at the eastern end. Several informal footpaths leading onto the site from Marine Drive have also been created. The rest of the site is quite densely vegetated (Figures 5 & 6), with some disturbance having also taken place. A stormwater outlet is, located in the northeastern corner alongside the main road, which has created visible erosion and a deep donga (Figure 7).



Figure 4. Google Earth satellite map of the proposed development site (red polygon) on the seaward side of Marine Drive in Struisbaai.



Figure 5. View of the site facing east. Note the small beach in the foreground of the plate.



Figure 6. View of the site facing west, with the stormwater outlet in the foreground, alongside Marine Drive



Figure 7. Deep donga in the foreground created by the stormwater outlet. View facing southwest.

5. STUDY APPROACH

5.1 Method

A field assessment of the proposed housing development site was conducted by ACRM on 07 September 2023. Identified heritage resources were recorded using a hand-held GPS unit set on the map datum WGS 84. A desk top study was also undertaken to describe the heritage context of the surrounding area.

5.2 Constraints and limitations

There were no constraints associated with the study.

5.3 Identification of potential risks

Buried shell middens, and unmarked Khoisan remains may be uncovered or intercepted during excavations for building foundations and services but the probability of this occurring, is, considered to be Low.

6. ARCHAEOLOGICAL CONTEXT

Studies have shown that people have occupied the Agulhas region for well over a million years. Middle Stone Age (MSA) and Early Stone Age (ESA) tools occur locally, while large numbers of Later Stone Age (LSA) shell middens have been recorded in Cape Agulhas, Suiderstrand and Agulhas National Park (Hall 1984; Kaplan 1993, 1997a, b, 1998a, b, 1999a, b, 2001, 2003a, 2006, 2007; Nilssen 2004).

A search of SAHRIS¹ has shown that a handful of commercial CRM surveys have been conducted in Struisbaai. The rocky shoreline between Struisbaai and Cape Agulhas is rich in archaeological resources such as shell middens (Kaplan 2008, 1993), while few remains have been recorded north of the village, where the shoreline forms a long sandy beach. Traces of shellfish have been recorded in the back dune area near Die Plaat, and on some limestone bedrock north of the Langezand housing development (Hart & Halkett 1995; Kaplan 2003b). A few isolated flakes have also been recorded in Struisbaai North, and near the Caravan Park (Kaplan 2020, 2016a,b), while isolated stone flakes and some pottery was recorded inland of the coast at Andrews Air Field (Kaplan 2021). Colonial period middens associated with the historic settlement at Hotagterklip alongside as one enters Struisbaai have also been recorded (Hart & Halkett 1995).

Cape Agulhas is, probably best known for the large number of well-preserved tidal fish traps/visvuyers that occur in the intertidal zone, which are visible at low tide, and on Google Earth satellite imagery. For many years archaeologists have assumed that these stone walled 'dams' built in gullies or low energy bays originated among LSA hunter-gatherers who lived on the coast after 3000 years ago (Avery 1975; Goodwin 1946; Gribble 2005). But research conducted by the archaeologist Philip Hine (2008), has shown that most, if not all of these stone-built fish traps, were constructed by poor white families (bywoners) in the late 1800s and early 1900s, who rented properties from absent farmers at the time.

7. RESULTS

A few traces of archaeological heritage resources were recorded during the field study (Figure 8 & Table 1).

Fragments of weathered marine shellfish (mostly *Turbo sarmaticus* / alikreukel & some limpet / *Scutellastra longicosta*), a flaked quartz chunk, and a limestone flake (Sites 152-182) were recorded in the coastal footpath that runs alongside the rocky shoreline (Figures 9-11).

Traces of shellfish (*Turbo sarmaticus*) were also recorded in a few open patches of windblown sand on the vegetated slopes above the coastal track (Sites 192, 222 & 212) (Figures 12 & 13).

A few fragments of weathered shellfish and several broken beach cobbles were recorded on the elevated rocky shelf (Site 142) at the end of the small sandy beach (Figure 14).

A few isolated fragments of shellfish were noted in the side wall of the sandy donga (refer to Figure 7), but no anthropogenic remains were noted.

No organic remains such as pottery, bone or ostrich eggshell were found.

7.1 Grading of the archaeological remains

The thin traces of shellfish, very few artefactual remains, and no visible cultural items such as pottery means that the archaeological remains have been graded as having Low (IIIc) local significance

¹ South African Heritage Resource Agency Content Management System

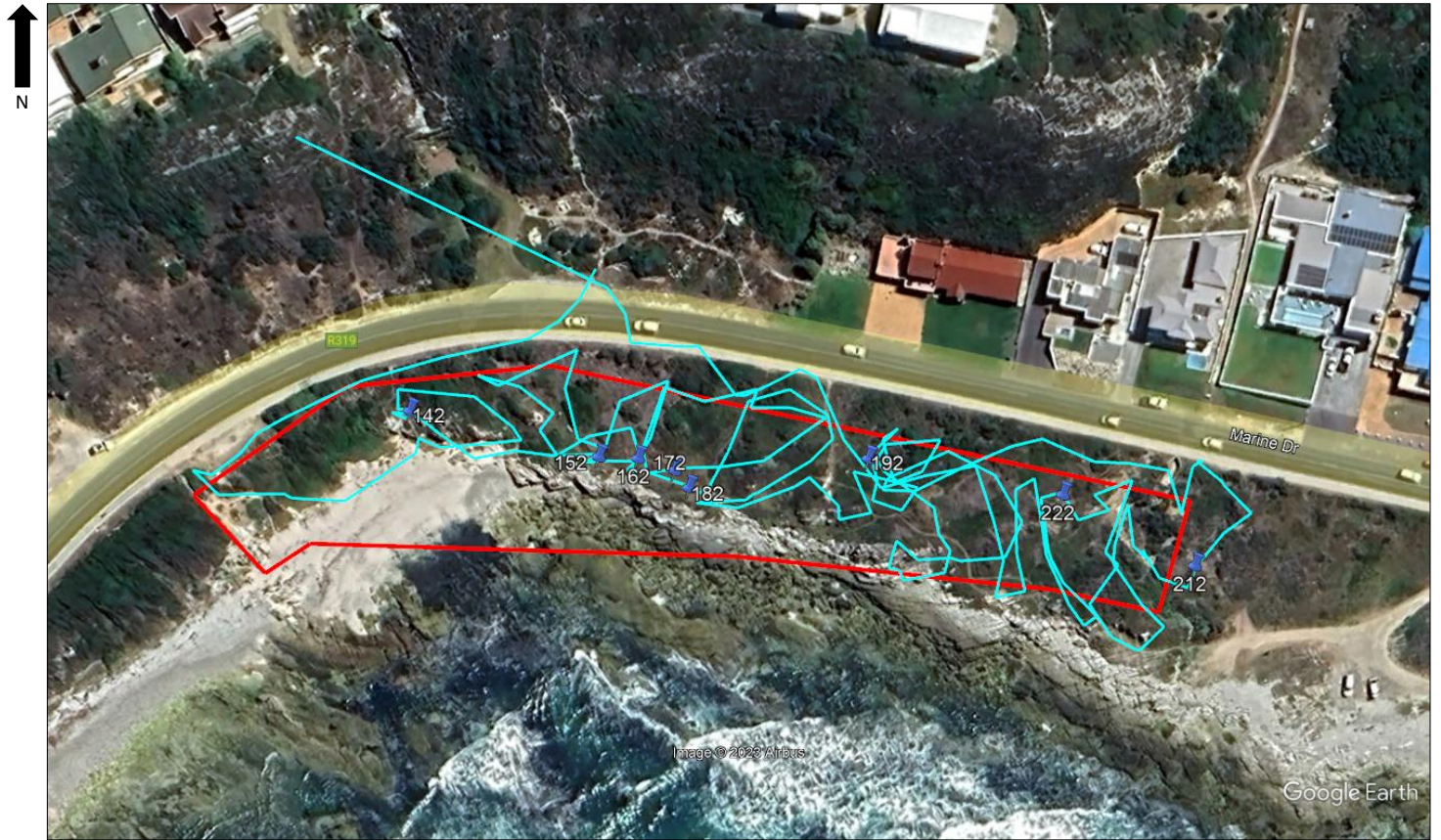


Figure 8. Waypoints of archaeological remains and Track paths in blue

GPS Point	Name of Farm	Lat/long	Description of finds	Grading	Mitigation
	Farm 281 – Re seafront				
142		S34° 48.819' E20° 01.841'	A few weathered fragments of shellfish & several broken cobbles and chunks on rock ledge	IIIC	None required
152		S34° 48.823' E20° 01.869'	Traces of weathered shellfish alongside coastal foot path	IIIC	None required
162		S34° 48.823' E20° 01.875'	Traces of weathered shellfish, + flaked quartz chunk alongside coastal footpath	IIIC	None required
172		S34° 48.824' E20° 01.881'	Traces of weathered shellfish on sandy slope	IIIC	None required
182		S34° 48.826' E20° 01.883'	A few fragments of shellfish + limestone flake alongside coastal footpath	IIIC	None required
192		S34° 48.820' E20° 01.909'	A few fragments of weathered shellfish on sandy slope	IIIC	None required
222		S34° 48.823' E20° 01.938'	A few fragments of weathered shellfish on eroded sandy slope	IIIC	None required
212		S34° 48.830' E20° 01.958'	Fragments of shellfish on patch of sand outside footprint area	IIIC	None required

Table 1. Spreadsheet of waypoints and description of archaeological resources



Figure 9. Site 152. View facing east



Figure 10. Site 162. View facing east.



Figure 11. Site 182. View facing east.



Figure 12. Site 222.



Figure 13. Site 212.

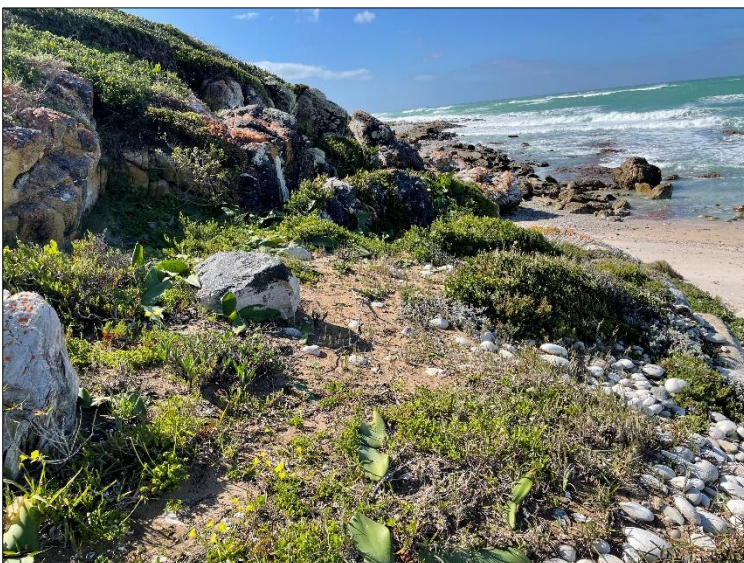


Figure 14. Site 212.

8. IMPACT STATEMENT

The results of the study indicate that, a small housing development on Farm - Re 281 (seafront) in Struisbaai, will likely not impact on important Stone Age archaeological heritage resources.

9. CONCLUSION

Indications are that a proposed housing development on re Farm 218 – Re (seafront) does not pose a significant threat to local Stone Age archaeological resources.

Therefore, there are no objections, on archaeological grounds, to the development proceeding.

10. RECOMMENDATIONS

Regarding a proposed housing project on Farm - Re 281 (seafront) Struisbaai, the following recommendations are made

1. No archaeological mitigation is needed prior to construction excavations commencing.
2. Archaeological monitoring of building foundations and services (e. g. water, electricity, sewerage, stormwater) must be conducted by a professional archaeologist
3. If any unmarked human remains are uncovered or exposed during excavations, work must stop, and the finds reported to the Environmental Control Officer and the contracted archaeologist (Jonathan Kaplan 082 321 0172). Human remains must not be removed or disturbed until inspected by the archaeologist.

The above recommendations must be incorporated into the Environmental Management Plan (EMP) for the proposed development.

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