

# RESCUE EXCAVATIONS AT PRAMBERG, JACOBSDAL, SOUTH-WESTERN ORANGE FREE STATE\*

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## ABSTRACT

Rescue excavations of an eroded alluvial terrace between Pramberg and the Riet River yielded information about a long and narrow site with at least eleven cairns. Excavation of two cairns revealed human burials. Three excavated skeletons and other human material from the surface has been tentatively identified as Khoisan. Material from an *in situ* refuse midden as well as surface finds suggest that the site was not only a burial ground but also a living area. It is not clear whether the burials and the habitation remains are contemporary, but stone tools and pottery from the Pramberg site are similar to those found at other Riet River sites, most of which have been dated to the late Later Stone Age. Of particular interest is the faunal evidence from the midden which indicate that the hunting of blesbok and black wildebeest was of primary importance in the economy of the inhabitants, while domestic stock was less utilised. This provides independent support for early nineteenth century eye-witness accounts of Riet River San who practiced both hunting and pastoralism.

## INTRODUCTION

More than half (236 mm) of the average annual rainfall (420 mm) for the Jacobsdal area fell during the five days between 18 and 22 February 1988. During the same period excessive rains fell throughout the southern Orange Free State, including the catchment area of the Riet River. Not surprisingly the river rose to at least 10 m above its normal level causing unusual damage along its banks. Some 15 km south of Jacobsdal, water from the river flooded a donga on the south-eastern base of a conical hill called Pramberg (29.14.38 S, 24.45.15 E), exposing bones and artefacts.

Mr I.P. Maas, the concerned owner of the farm Doornhoek, invited us to inspect the site in August 1988. We found three exposed human skeletons and 25 surface concentrations containing animal bone, worked stone and a few potsherds. Two human skulls were also visible on the surface.

Although the area and the archaeological material fall outside the research interests and projects of the National Museum, we decided to conduct a rescue excavation of the site between 5 and 9 September 1988 to prevent any further damage to the exposed material. We also anticipated that excavations would reveal the stratigraphic relationship between the skeletons and surface finds. A fortunate by-product of our work was the recovery of faunal remains from an undisturbed refuse dump (Area T).

In this paper we describe the features and finds from Pramberg in general, and consider the significance

of the faunal remains in greater detail. Although no definite stratigraphic associations could be made between the burials, the surface material and the remains of a refuse midden, we conclude by showing that the material probably is not contemporary in the strict sense, but homogeneous enough to suggest a single cultural entity.

## THE SITE

The site is located on a terrace of relatively soft, alluvial sandy silt. It is directly north-west of the Riet River and has eroded into gullies and depressions (Fig. 1). Overgrazing and the recent floods have accelerated erosion, exposing bedrock shale (Ecca) in the deeper gullies, covered by approximately 2 m of alluvial deposit.

Judging by the distribution of stone-piles or cairns and surface scatters of bone and cultural material, the site appears to be long and narrow, stretching from south-west to north-east. It is difficult to establish its exact size since a donga runs down the centre. The south-eastern portion of the site occurs south of the donga and is heavily overgrown. Because of the dense vegetation and a time limit we managed to map only the portion to the north-east of the donga (Fig. 1).

We recorded eleven cairns on the site, eight north of the tributary and at least three to the south. Dolerite boulders from the adjacent hills have been used to stack the cairns. The cairns are badly preserved and only three appeared to be relatively intact, whereas stones from the others have become scattered. The biggest cairn occurs close to the northern edge of the site and is just



Burial 2 was too disturbed for such treatment. The burials were subsequently cleaned in the laboratory.

### Burial 1

The top of a sun-bleached human skull was exposed beneath a cluster of stones on the southern edge of a big depression (Figs. 2 & 3). Unlike the observations made by Humphreys & Maggs (1970), these stones were directly above the burial and no upper layer of stones were found. If the burials described by these authors can be taken as a norm, it follows that approximately one metre of deposit would have been washed away from the original land surface above Burial 1. About 100 mm below the bottom of the burial an older land surface could be followed to a limited extent. This surface provided limited faunal remains (Table 2). There was no association between these remains and the burial. Except for the occasional presence of some fine mudstone gravel which may have been accidentally included at the time of inhumation, it was not possible to distinguish between the infilling of the burial and the sediment in which the grave shaft was dug.

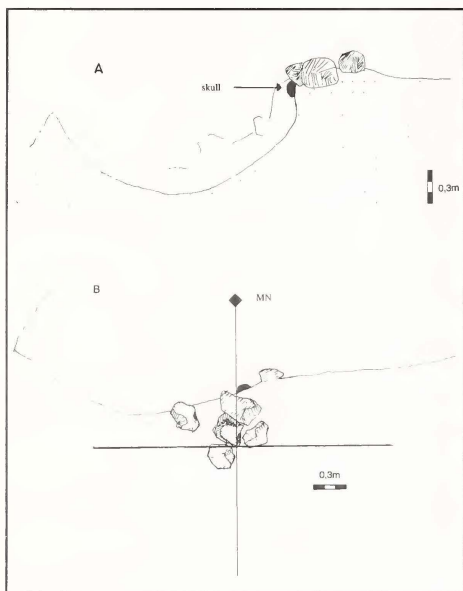


Fig. 2. An approximate north-south section of Burial 1(A) and plan (B), showing the position of the covering stones in relation to the exposed skull.

The human skeleton was complete and no evidence of bio-turbation was found, possibly due to the compactness of the soil. Only minor post-depositional sediment compaction occurred as evidenced by the slight distortion of the skull. The remains are those of a young adult female and some of the epiphyses of the long bones



Fig. 3. A photograph of the donga showing the skull and covering stones of Burial 1 in section.

and vertebrae are still unfused. The possible solution from plant roots on these young bones caused them to become friable.

A remarkable feature is the presence of an extra row of incisors in both the upper and lower jaws due to the non-replacement of the milk dentition. The skeleton was lying on its left side with the arms and legs pulled up tightly against the body. The direction of the length of the body was approximately north-east so that the head was facing east (Fig. 4). No grave goods were found.

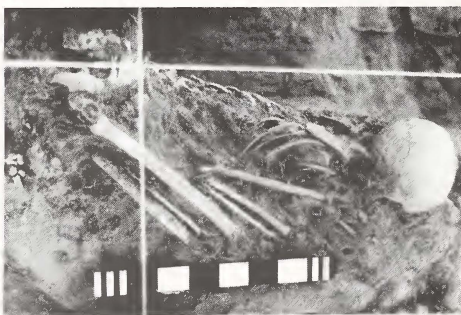


Fig. 4. The position of the skeleton of Burial 1 after partial exposure.

### Burial 2

The remains of another burial were found partly exposed below a stone cluster some 3.5 m north-east of Burial 1 and about 700 mm below it (Fig. 5), on the southern slope of the depression (Fig. 1). As in Burial 1, we could find no traces of an upper stone layer. The burial was displaced by erosion and slumping, but probably originated from the same level as Burial 1.

Very little remained of Burial 2. The skull was absent and only a few limb bones and some ribs were preserved. A small undecorated bowl with gritty temper was found with the skeleton (Fig. 6).





Fig. 5. The eroded and slumped remains of Burial 2.

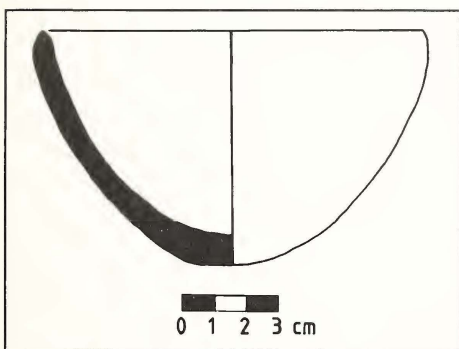


Fig. 6. A diagram of the bowl found with the skeleton of Burial 2.

### Burial 3

The ribs and pelvis of a headless skeleton were exposed on the north-western edge of a smaller depression to the north of Burial 1 and approximately on the same level (Fig. 7). The skeletal remains are those of an adult female and was adorned with ostrich eggshell beads around the waist and neck. In contrast to Burial 1, the body was lying on its right side facing south. Apart from the missing skull, it appears from the *in situ* position of the beads that the skeleton was undisturbed, unlike Burial 2. Some of the exposed bones have become weathered by the elements. No covering stones were found.

### Area T

The intact remnant of a midden was situated on the eastern side of a small erosion channel which cuts through the Quaternary sediments into the underlying shales. The surface was partly covered by vegetation, but an aardvark mandible and some bone flakes were visible before excavation. Because of the lack of apparent stratigraphy, we excavated and sieved the deposit as a single unit. Although we recovered bone remains and



Fig. 7. The partly excavated skeleton of Burial 3 before removal.

stone artefacts, we did not recover any plant material.

### Surface scatters

We collected archaeological material from a number of surface scatters. These included a complete human skull (Skull 1) and a partial human skull and mandible (Skull 2) (Fig. 1). It is uncertain at present whether these skulls belong to Burials 2 and 3. Other human remains from the surface include the right and left pelvis and right femur of an adult male (probably associated with Skull 1). A proximal femur and a well worn upper molar from Area W presumably came from other burials which had been destroyed by the floods.

### FINDS

#### Human Remains

The burials and human remains from the surface were sent to A. Morris (Department of Anatomy, University of Cape Town) for further study. We tentatively identify these remains as Khoisan. This is in agreement with previous work on Riet River human remains by Morris (1984).

#### Stone Artefacts

In our analysis of the stone artefacts we used the scheme devised by Deacon (1984). The basic division of the material into categories of waste, utilised pieces and formal tools is sufficiently similar to the system used by Humphreys & Maggs (1970) to allow comparison.

Although Area T is probably less disturbed than the other surface scatters, it is clear from Table 1 that no great differences exist in terms of raw material and proportions of tool types between Area T and the surface scatters. A noteworthy feature is the total dominance of hornfels as raw material in Area T (96,6%) and in the surface scatters (88,5%) (Table 1). This is in agreement with the situation at OFD 1 (Humphreys & Maggs *op. cit.*) where hornfels became progressively more important through time (Humphreys 1972b).

The proportions of tool types from Area T and the surface scatters are also broadly comparable with

OFD 1. Of special interest is the high percentage of scrapers in both assemblages, 6,2% in OFD 1 and 8,6% in the Pramberg collections. We have not included the category 'notched scrapers' in the calculations from OFD 1, since we included this artefact type under 'miscellaneous retouch' in our classification. A grooved stone was found in Area T and is depicted in Figure 8 with examples of scrapers.

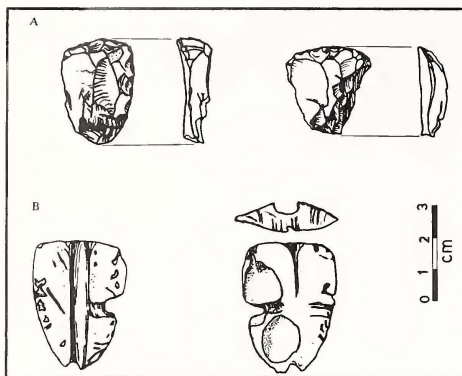


Fig. 8. A grooved stone and some scrapers from Area T.

A further point of interest is the low proportion of utilised pieces observed at Pramberg (6.1%) when compared with OFD 1 (10,3%). In the analysis we attempted to distinguish between trampling damage and utilisation. Artefacts from Area T were clearly less exposed to trampling and the edges of the artefacts are in good condition. In the case of the surface scatters, it was usually possible to distinguish between trampling and use-wear, as trampling damage often displays less patination than flake scars or damage to an artefact as a result of human action. This was, however, not always conclusive and some specimens remained doubtful. This measure of uncertainty seems to be reflected in the lower proportion of utilised pieces in the sealed Area T (3,5%) compared to the rest of the surface scatters at Pramberg (6,5%). In the light of this, we tentatively suggest that the high percentage of utilised pieces from OFD 1 may have been caused by post-depositional trampling.

Due to the similarity between Pramberg and OFD 1 in terms of raw material and artefact composition, we suggest that the Pramberg site probably relates to the most recent phase of the Later Stone Age in the region (Humphreys & Maggs 1970).

### Pottery

We collected eight pieces of plain and unburnished potsherds from the site. Apart from the *in situ* bowl from Burial 2 (Fig. 6), the sherds at Pramberg are highly fragmented.

Five sherds are 7 mm thick and the rest are 10 mm thick. Six sherds, two of which were excavated from Area T, have grit temper mixed with the clay.

Negative impressions in two relatively thin sherds from the surface of Area R show that short sections of grass were used as temper. According to Maggs (1971:53), similar pots elsewhere in the southern Orange Free State date to final phase of the Late Stone Age. This supports the date ascribed to the stone tools from Pramberg.

### Faunal Remains

Table 2 provides a summary of the recovered faunal remains per collecting area. Area T, the sealed excavated sample, is again taken as a norm against which the surface scatters are evaluated.

### Area T

Analysis of the faunal remains shows that this assemblage is untransported and in primary context. Several bone flakes could be refitted, while the edges of fossil brakes were sharp. There is some plant root etching on the bones and limited evidence for solution due to possible higher river levels in the past. Breakage patterns typical of marrow extraction activities (Brink 1987) is illustrated by the refitted cattle first phalanx (Fig. 9). This pattern of maximal use of animal remains applies to both the wild and the domesticated component

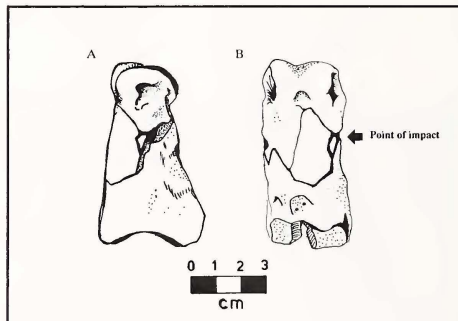


Fig. 9. The abaxial and dorsal view of a refitted cattle proximal phalanx, showing typical breakage due to marrow extraction.

of this assemblage. With the exception of some sieving damage and the evidence from the effects of marrow extraction, there is little evidence for other agencies of attrition. This supports the impression that the faunal material from Area T represents an uncontaminated sample of food remains.

From Table 2 it is evident that both wild and domesticated animals were utilised. About one fifth (20,7%) of the number of identified specimens (NISP) belong to domesticated animals with cattle and sheep/goat almost equally represented. An outstanding feature is the dominance of large-medium sized wild bovids (66,7% NISP) in the fauna and the relative paucity of springbok remains (6,7% NISP). These figures may, however, give a slightly skewed impression of the importance of the different animals in the diet of the inhabitants of the site.



It is known that archaeological bone mass (weight) gives a better approximation of meat value rather than number of specimens (Boessneck 1982). If bone mass (Fig. 10) is taken as a measure of meat value, then the sheep/goat category contributed 4,4%, springbok 1,2%, cattle 20,2% and large-medium sized bovids (wildebeest and blesbok) 72,3% of the meat to the diet of the people. This clearly points to a subsistence strategy with an emphasis on the hunting of large-medium sized bovids. Cattle were less important by comparison, but still utilised more frequently than sheep or goats.

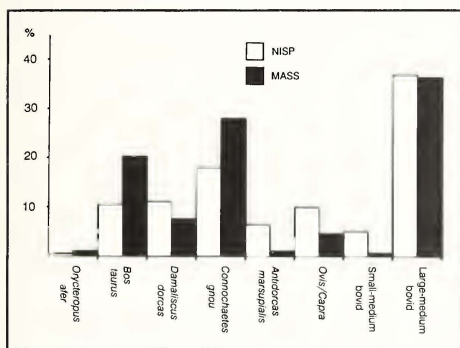


Fig. 10. Faunal remains from Area T: a comparison of the relative frequencies of bone mass and number of identified specimens per taxon.

### Surface scatters

The rest of the surface material resembles that of Area T in that wild game is better represented than domesticated stock. Of interest is the occurrence of hartebeest and hippopotamus in Area L, which seems to indicate that a wider spectrum of species was hunted than is evident from Area T.

Area N is clearly not contemporary with the rest of the faunal samples as it contains the extinct *Damalicus niro*, a relative of the blesbok. The presence of warthog also seems not to fit in with the other samples. In addition, the material from Area N appears to be somewhat more mineralised than the other samples. This is not entirely unexpected, as at least some of the surface materials are not in primary context. Humphreys & Maggs (1970) have also noted the presence of older material, including remains of *Pelorovis antiquus*, the extinct buffalo, on these river terraces. Nevertheless, when Area T is used as a control sample, it appears that most of the surface material recovered in this study is of a later date and probably more contemporary with the burials.

### DISCUSSION

Although the site between Pramberg and the Riet River has been badly disturbed, it is clear that people with

Khoisan features chose to bury their dead in this area. The site was also inhabited presumably by the same people, although we cannot be sure that the burials, the surface material and the midden are contemporaneous. The exact stratigraphic and chronological relationships of the recovered material has not been securely established. This is illustrated by the fact that Burial 1 post-dates an earlier horizon with faunal remains, which includes domestic stock (Table 2). It could be, therefore, that the burials are later than the rest of the material. However, the close spatial association between graves and middens may suggest that the San inhabited the site as well. The broad similarity between the artefact and faunal assemblages from Area T with that of the surface material, supports the idea that these remains represent a single cultural entity. However, we cannot be sure that this applies to the burials as well. The complex stratigraphic succession at Pramberg could be elucidated by further excavations of intact features, such as the stone tool concentration at Area L, the Area R midden and the stone cairns at Area 10.

The excavations of Fowler (Humphreys 1970), Humphreys (1970), Humphreys & Maggs (1970) and Mason (1954) showed that similar sites occur elsewhere along the Riet River. Morris (1984:221) identified human remains from these sites as representing "a single relatively homogeneous population" with Khoisan features. This agrees with our tentative identification of the Pramberg skeletons.

The Pramberg graves show certain similarities with published accounts. Maggs (1971:56) states that the evidence from the well-documented Riet River burials suggests a distinct tradition of internment. Humphreys (1972a:140) observed that in all cases the burials were marked by stone cairns. Usually below the first pile of stones another pile was placed in the shaft as part of the grave infill. The skeletons are flexed and in many cases grave goods or ornaments occurred either in the grave or on the body. The Pramberg burials were exposed by erosion and only Burial 1 and Burial 2 had covering stones. It is most likely that the upper layer of covering stones had been washed away in these cases and there is reason to believe that the Pramberg burials fall within the range of variation of burials along the Riet River. The presence of grave goods, in the form of a pot in Burial 2 and ostrich egg-shell adornment in Burial 3, supports this contention.

The Riet River sites seem to be limited to specific localities. Judging from Van Riet Lowe's 1926 map of the area (Goodwin & Van Riet Lowe 1929, Plate XXXVII), burial sites are located on terraces between hilly areas and the river. Furthermore, the number of stone cairns at Pramberg is not significantly different from the other burial grounds. Van Riet Lowe (1931) recorded twelve from a site near Koffiefontein and Humphreys & Maggs (1970) found fifteen at OFD 1. These considerations, together with the long narrow shape and south-west to north-east orientation of the sites at Pramberg and OFD 1 (Humphreys & Maggs 1970:117), suggest that the sites have a similar pattern.

The possibility of a recognisable site layout needs further investigation, which, in conjunction with the relevant ethnography, may provide clues about the world-view of the local San.

The question of the association of Type R stone-walled sites in the area with sites on the banks of the Riet River, such as Pramberg and OFD 1 (Humphreys & Maggs 1970), can be addressed by the information derived from the faunal remains of the Area T midden. At present only two faunal collections have been published. Faunal lists for OFD 1 (Maggs 1971) and Khartoum 1 (Voigt in Humphreys 1972a) show a very limited taxonomic range and probably give a distorted picture of the subsistence strategy adopted by San in the area (Humphreys 1972a:153). Although the sample from Area T is small, with only 150 identifiable pieces, the patterns are quite clear-cut. Hunting was of great importance as wild species comprise three-quarters of the identifiable bone remains (mass). Most of this category consists of large medium-sized bovid remains (wildebeest and blesbok). In general, the Pramberg faunal remains suggest an essentially hunting economy, supplemented largely by cattle and to a lesser extent by sheep/goat. This is in contrast to the findings of Maggs (1971) at OFD 1 where he suggested that cattle and small stock supplied the majority of the protein food. The Pramberg sample indicates that wild game was not supplementary to the diet of the Riet River people but indeed an important, if not the dominant, source of meat. This conclusion agrees with the descriptions of early travellers in the Riet River area. Of particular note is the observation by W. Burchell, quoted by Humphreys (1988: 8), that "Bushmen" were living in orderly villages with cattle, sheep and goats, but that they were still hunting and foraging. A similar observation was made by T.L. Hodgson who saw a party of Bushmen returning with game to their village, where sheep and cattle were kept (*Op. cit.*). These observations can be regarded as further circumstantial evidence for the association of the Type R structures with the habitation and burial sites. However, this cannot be seen as final proof. It remains uncertain whether the people referred to by the early travellers were living in association with Type R structures. Also the spatial separation between the stone structures and the habitation areas, which is more than 100 metres at Pramberg (Fig. 1), raises doubt about this issue. A further cause for doubt is the clear indication that Burial 1 postdates an *in situ* occupation horizon. Even though the river bank settlements and Type R stone-walled sites show certain similarities in time and space (e.g. Maggs 1971:56), the river bank sites could be slightly earlier. We feel that sites on the banks of the Riet River, such as Pramberg and OFD 1, are still insufficiently understood to allow definitive comparisons with Type R stone-walled sites in the area.

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## REFERENCES

- Boessneck, J. 1982. Neolithische Tierknochenfunde von Kraichtal-Gochsheim, Kreis Karlsruhe. Fundberichte aus Baden-Württemberg 7:13-30.
- Brink, J.S. 1987. The archaeozoology of Florisbad, Orange Free State. Memoirs van die Nasionale Museum, Bloemfontein 24.
- Deacon, J. 1984. The Later Stone Age of southernmost Africa. Oxford: British Archaeological Reports. International Series 213.
- Goodwin, A.J.H. & Van Riet Lowe, C. 1929. The Stone Age Cultures of South Africa. Annals of the South African Museum 27.
- Humphreys, A.J.B. 1970. The remains from Koffiefontein Burials excavated by W. Fowler and preserved in the McGregor Museum, Kimberley. South African Archaeological Bulletin 25:104-115.
- Humphreys, A.J.B. 1972a. The Type R Settlements in the Context of the Later Prehistory and Early History of the Riet River Valley. Unpublished M.A. thesis: University of Cape Town.
- Humphreys, A.J.B. 1972b. Comments on aspects of raw material usage in the Later Stone Age of the middle Orange River area. South African Archaeological Society Goodwin Series 1:46-53.
- Humphreys, A.J.B. 1988. A prehistoric frontier in the Northern Cape and western Orange Free State: archaeological evidence in the interaction and ideological change *Kronos* 13:3-14.
- Humphreys, A.J.B. & Maggs, T.M.O'C. 1970. Further graves and cultural material from the banks of the Riet River. South African Archaeological Bulletin 25:116-126.
- Maggs, T.M.O'C. 1971. Pastoral settlements along the Riet River. South African Archaeological Bulletin 26:37-63.
- Mason, R.J. 1954. A burial site at Driekopseiland. South African Archaeological Bulletin 9:134-137.
- Morris, A. 1984. An osteological analysis of the protohistorical populations of the Northern Cape and the western Orange Free State, South Africa. Unpublished Ph.D thesis: University of the Witwatersrand.
- Van Riet Lowe, C. 1931. Early graves in the Riet River valley. South African Journal of Science 28:430-434.