

Knowing Country: Co-designing the scientific discovery of Marlinyu Ghoorlie Barna

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Introduction

The Marlinyu Ghoorlie Native Title Claim in Western Australia's Goldfields and Central Wheatbelt covers nearly 90,000 km², an area larger than the island of Ireland. Representing the Kapurn, Kalamaia, and Karlaku Traditional Owners, it is also a highly active part of Australia's resources sector, home to both Kalgoorlie's Super Pit and between a third and half of all of Australia's future acts at any one time.

Unlike similarly positioned regions such as the Pilbara, very little archaeological research has been conducted in the region. Radiocarbon dates are known to have been collected from a single location—a rockshelter on the southwest side of Lake Barlee. The four samples are spread across 3,780 – 412 years BP, demonstrating occupation of the area from the later middle Holocene (McClements, 2021). This scientific neglect hampers the ability to properly gauge the scientific significance of places of Aboriginal cultural heritage and generates more questions than answers in terms of chronology and occupation patterns in the claim area.

Senior Kapurn Elders have also long expressed a desire to greater understand the history of occupation on Kapurn Barna through the excavation and radiocarbon dating of sites on Country. The large amount of compliance-based heritage surveys needed by the mining industry presents the opportunity for the locating of suitable sites at which scientific, archaeological research can be conducted to answer the research questions held by the Elders. This allows for the Kapurn, Kalamaia, Karlaku Traditional Owners to turn compliance surveys into something more, instead allowing them to gather data that can then be turned into research projects carrying real cultural value with the assistance of Terra Rosa Consulting's archaeologists and anthropologists.

Progress & Next Steps

2025's work has focused on desktop research and non-invasive field survey. This has been comprised of working through the 200+ field surveys that Terra Rosa has conducted with Kapurn Traditional Owners since 2019 as well as the 810 sites on the Department of Planning, Lands, and Heritage's (DPLH) Aboriginal Cultural Heritage Information System (ACHIS), identifying sites that show signs of archaeological research potential (Rockshelters, Potential Archaeological Deposit (PADs), lunettes). In addition to this, sites containing worked glass as well as isolated artefacts were catalogued as evidence of the presence of Kapurn people in the Contact Era. This initial desktop research phase also confirmed the previous understanding that extraordinarily little academic research or compliance-based excavations had been undertaken in the Claim area. Besides the unpublished Honours thesis from 2021, only one other previous excavation has been identified as having taken place. Curragibbin Hill Rockshelter (DPLH ID 25821) was excavated for a s16 in 2008. Charcoal samples were taken during this excavation, although if radiocarbon dating tests were conducted the results are unknown.

Several sites have been selected due to the archaeological and ethnographic values present at each for further investigation, including excavation. The aims of such excavations are:

1. Identify, sample and test organic material for radiocarbon dates to secure dates for the occupation of the Kalgoorlie area;
2. Record and understand the depth of stratigraphy at open sites (such as lacustrine lunettes); and
3. Start building the wider occupation chronology of the Marlinyu Ghoorlie claim area.

Stage 1 Sites

As of October 2025, three sites have been identified as good candidates for research due to a combination of factors, including proximity to Kalgoorlie, visible archaeological material, and ethnographic associations for the sites. They are the following:

Lakewood Fringes Archaeological Landscape

Over a period of twelve months from December 2024 to September 2025, Terra Rosa Consulting, in partnership with Marlinyu Ghoorlie Aboriginal Corporation, investigated the archaeological surface context of an area of the Lakewood salt lake system. This investigation documented a significant collection of surface artefacts, concentrated around the lunette system of the lake. The quantity of artefacts found and their location within a lunette system suggests an area of potential archaeological deposits. This archaeological information combined with ethnographic information regarding the historic use of the area, provides an opportunity to archaeologically investigate an area that has robust pre and post contact deposits. With the further opportunity to test the viability of excavation in previously determined 'disturbed areas' as well as provide the Traditional Owners with a scientific investigation of the occupation of the area.

MG2464-01

MG2464-01 is a complex, multi-component site of high cultural significance to the Kapurn, Kalamaia, and Karlaku Traditional Owners. It comprises multiple rock shelters, two gnamma holes, an artefact scatter, and an ephemeral water source. Given the significant stone tool and flake scatter near these rock shelters and the relatively abundant adjacent water sources, both the Traditional Owners present on the survey and the Terra Rosa consultants agreed that this site may have hosted regular, long-term occupation by ancestral people. Additionally, several depth probes were conducted within some of the rock shelters, and deposit depths of between 15 to 38 cm were recorded. This site hosts the potential to provide robust stratigraphy and possible radiocarbon dating, both of which have not been archaeologically investigated with the Marlinyu Ghoorlie claim area, to the extent that is seen elsewhere in Western Australia.

Glass Cave, Snake Hill (DPLH ID 16970)

Glass Cave, Snake Hill is a rockshelter located approximately 20km east of Kalgoorlie. The location of the site is of high significance to the Kapurn, Kalamaia, and Karlaku Traditional Owners as it overlooks Kurara Rockhole, where traditional meeting ceremonies were held between the Kapurn and Desert groups from the east. With glass artefacts recorded on the floor of the rockshelter, and depth probes revealing up to 28.5cm of deposit, the rockshelter offers an opportunity to investigate time depth in an area of liminal space at the eastern margin of the claim area.

Marlinyu Ghoorlie Country - Location in Australia



Marlinyu Ghoorlie Knowledge Project - Stage 1 Sites for Proposed Excavation



Call for Information

Since the Native Title legislation came into effect in 1993, more than 10 Native Title Claims have existed over parts of what is now the Marlinyu Ghoorlie claim. As such numerous surveys have taken place in the last 32 years with claimants that no longer speak for the country Claimed by the Marlinyu Ghoorlie Native Title Claim. The authors call for any archaeologists who have conducted any excavations on what is now the Marlinyu Ghoorlie claim to get in contact to share any information they have so as to build the body of scientific knowledge for this region of Western Australia.

References

McClements, J., 2021, Boorie Yirriga Marra Thoogul Rockshelter: A study of desert adaptation. Unpublished Honours Thesis. University of Notre Dame Australia