

HISTORICAL ARCHAEOLOGICAL INVESTIGATIONS AT THE BENERA HOMESTEAD SITE & STATEMENT OF HERITAGE IMPACT

**LOT 34 DP2359
YARRUNGA STREET, PRESTONS NSW**
(EXCAVATION PERMIT 2015/S140/16)



Report prepared by Dan Tuck for the NSW OEH Heritage Division
on behalf of LOGOS Investment Management Pty Ltd

19 November 2015 (reissued 16 February 2016)



Table of Contents

Introduction	1
History	6
Heritage	16
Survey	16
Significance	16
Project	17
Implications	17
Investigation	19
Rationale	19
Approval	19
Methodology	19
Results	21
Significance	40
Impacts	44
Impact Assessment	44
Statement of Heritage Impact	44
Recommendations	45
References	47
Attachments	48
A1. Council Approval	49
A2. 2015/s140/16	50
A3. SEARs SD7155 P.6	54



Introduction

This Historical Archaeological Test Excavation report has been prepared by MDCA [Mary Dallas Consulting Archaeologists] for Logos Investment Management Pty Ltd. It has been prepared to inform a State Significant Development application for the industrial subdivision of Lot 20 DP1173483 and Lots 33, 34, 35 and 43 DP2359 at Yarrunga Street, Prestons as the Prestons Warehouse and Distribution Estate. Project planning proposes that the site be landscaped, partially levelled and supplied with warehousing and associated access, parking and service areas.

Study Area

The proposed development area comprises five combined lots at Prestons within the Liverpool LGA. The lots are 33, 34, 35 & 43 (DP2359) and 20 (DP1173483) and collectively account for approximately 21 hectares. They are bordered to the north, east and south by Yarrunga Street, Bernera Road and Kurrajong Road respectively. Neighbouring properties mark the western boundary approaching Kookaburra Road North.

The study area presents as mostly vacant, rural-residential farmland. It is dominated by the vestiges of development and use as a grazing property in the 1980s; including two modern brick homes (fronting Yarrunga Street), paddocks, horse and cattle yards, services and allied infrastructure.

The most notable landscape feature is an elevated knoll, largely set within Lot 34, which is a district highpoint. Set atop the knoll, in the southeastern quadrant of Lot 34, is the study area: the site of the historic **Bennera Homestead** (also Bernera), which was destroyed by fire in the 1980s. The homestead is listed as a heritage item (archaeological site) of local significance in the Liverpool LEP and NSW State Heritage Inventory (SHI).

Investigation

In advance of detailed planning and environmental assessment, the client engaged MDCA to address historic heritage issues related to Bennera prior to the commencement of the State Significant Development Application process. Specifically MDCA were asked to provide an initial determination appraisal/assessment of the site, obtain a s140 archaeological excavation permit and undertake historical archaeological testing of the former homestead site to determine the nature and extent of the site's archaeology (MDCA 2015a & b). The s140 application was approved by the Heritage Division on 23 July 2015 and the test excavation undertaken 5-6 August 2015.

Subsequent to the completion of the test excavations, on 11 September 2015, the NSW Department of Planning & Environment responded to a request by the proponent to have the proposal assessed as a State Significant Development under Part 4, Division 4.1 s89C of the *Environmental Planning and Assessment Act* 1979, by issuing of Secretary's Environmental Assessment Requirements



(SEARs) for the preparation of an Environmental Impact Statement. In relation to historic heritage, the SEARs require (see Attachment 3 for full text) the State Significant Development application to:

- Assess the potential impacts of the proposal on State and local heritage.
- Undertake an archaeological study including test excavations, to identify any archaeological impacts that may result from the proposal.
- Outline proposed mitigation and management measures.
- Include a statement of heritage impact for all heritage items.

This document has been prepared to meet the SEARs, as well as the reporting requirements for the test excavations carried out under Heritage Act s140 approval. It details the results of the testing program and presents recommendations to guide in the future management of the place. It was prepared by Dan Tuck and reviewed and formatted by Paul Irish and Tamika Goward (MDCA). MDCA has also undertaken Aboriginal archaeological investigations within the area of the heritage-listed Benera Homestead Site and more broadly across the project application area. These are fully documented in a separate report (MDCA 2015c), but are discussed where relevant in the current report.

Figures 1 - 4 show the study area in map and plan.

Figures 5 - 7 show select landscape characteristics and features of the study area.

Attachments 1 - 3 present the s140 approval; Council's permission for works; and the project SEARs requirements as they relate to historic heritage.



Historical Archaeological Test Excavation Report Benerra Homestead, Yarrunga St Prestons

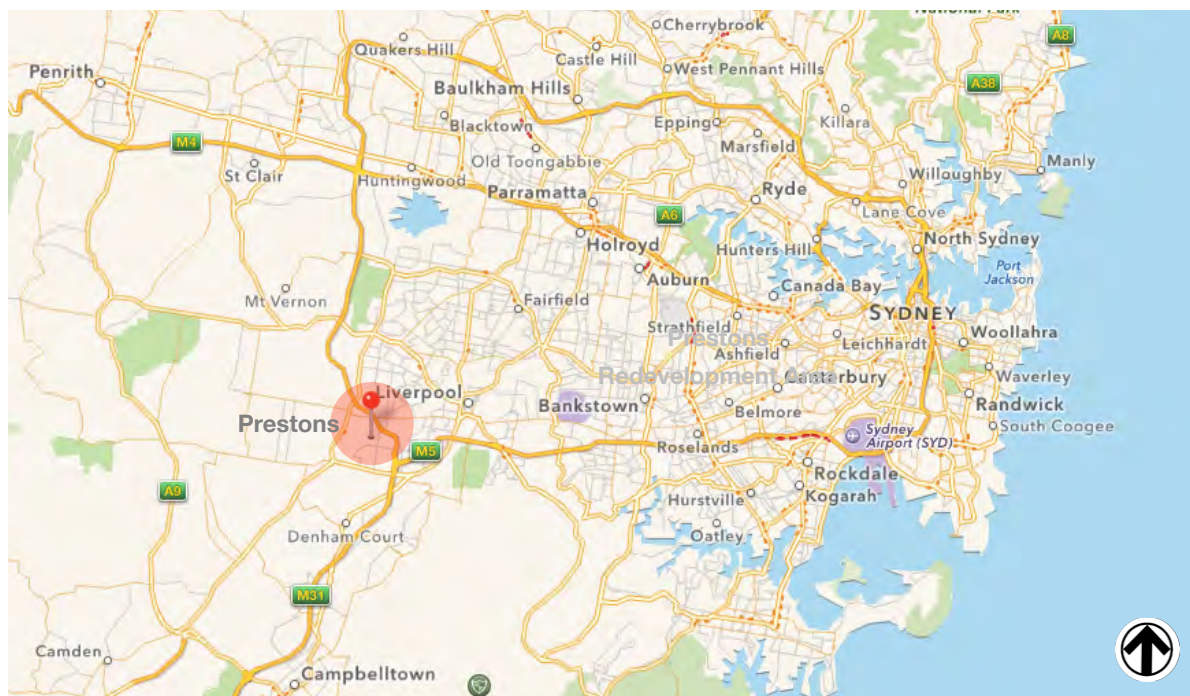


Figure 1: Sydney Region

NSW Land & Property Information SIX Viewer 2015 Maps 2015

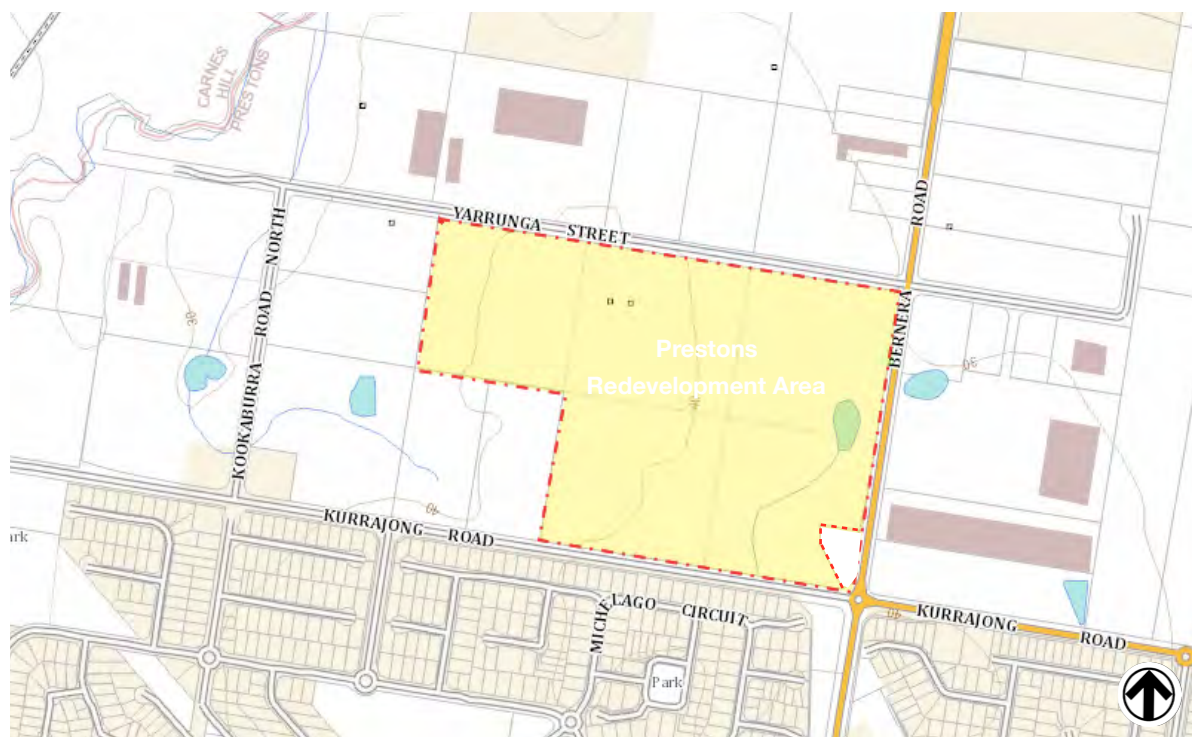


Figure 2: Prestons & Proposed Redevelopment Area (Map)

NSW Land & Property Information SIX Viewer 2015 Maps 2015



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Benera Homestead, Yarrunga St Prestons



Figure 3: Study Area (Lot 34) showing approximate location of Benera
NSW Land & Property Information SIX Viewer 2015



Figure 4: Prestons & Proposed Redevelopment Area (satellite)
NSW Land & Property Information SIX Viewer 2015



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Benera Homestead, Yarrunga St Prestons

Figure 5:
View towards the site of the
former Benera Homestead
View SW - Dan Tuck 2015



Figure 6:
View towards the site of
former Benera Homestead
View SW - Dan Tuck 2015



Figure 7:
Knoll top view across the
site of the former Benera
Homestead
View SE - Dan Tuck 2015





History

The study area (lot 34) was originally part of an early 19th century land grant to a Dr Donald Macleod (staff surgeon to Governor Brisbane). Macleod called his extensive holding of some 1000-acres 'Benera' after his family home in the Hebrides (an archipelago of islands off the West Coast of Scotland).

Later, the property was purchased by Alan McPherson, the son of William McPherson (the colony's first collector of internal revenue). It was he who had the Benera Homestead constructed in c. 1856/57, though his tenure appears to have been short and he is known to have been residing at Blairgowrie from the mid 1860s.

Benera

Benera was a mid-19th century timber homestead set on the crest of a knoll with views to both Sydney Town and the Blue Mountains. Oriented NNE-SSW, it was effectively U-shaped (a central residence framed by kitchen and nursery wings), strongly vernacular in character and constructed of pit-sawn ironbark reputed to have been felled on the property.

Benera was built on wooden stumps and log footings and featured weatherboard exterior walls; timber interior walls (covered with canvas and paper); canvas ceilings framed with wooden slats and a roof of Manchester iron.

External to the building were a forecourt; and access track; two in-ground tanks; gardens and a number large ornamental trees including Bunya pines, a Moreton Bay fig and a row of crepe myrtle.

In 1889, the Benera Estate was subdivided and the 52-acre house block bearing the Benera Homestead was purchased by William Retallack. In 1924 it was on-sold to the Harvard family who retained ownership until 1985, when the property was purchased by current owners the Camilleri family (who built the two brick houses fronting Yarrunga Street and the installed the bulk of the farm infrastructure present today). In the same year, the homestead was recorded as part of the Macarthur Region Heritage Study.

Refer **figures 8 - 18**.

In 1986, Benera (and much of the vegetation immediately surrounding) was destroyed by fire. When the site was again surveyed in 1992 as part of the Liverpool Heritage Study (Neustein & Associates) the homestead was evident as fire ruined surface remains including burnt timbers, roof iron and stone chimney bases and thresholds. These were however later removed, and in 2004 when a heritage study review of the site was undertaken (FORM architects), it was noted that the homestead site was largely indiscernible and that most of the remnant vegetation had gone.

Refer **figures 19 - 24**.



Historical Archaeological Test Excavation Report

Benera Homestead, Yarrunga St Prestons

At present, the homestead site presents as a grassed up knoll-top. While there are occasional surface undulations, the setting and arrangement of the home is not distinguishable. The only items marking the locale are a tree limb covered in-ground cistern and the burnt out and termite afflicted remnants of the Moreton Bay Fig that once stood to the immediate northeast of the homestead.

Refer figures 25 - 27.

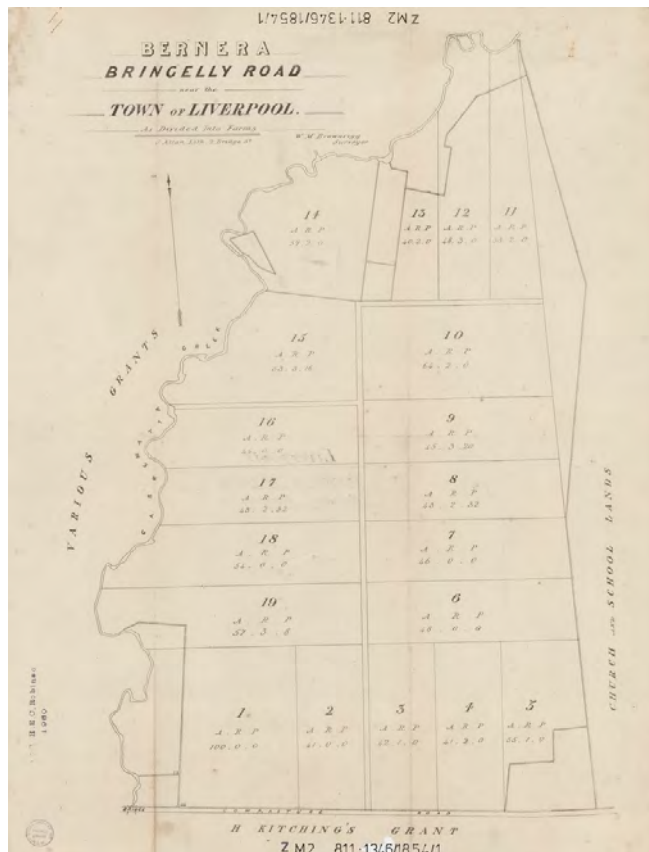


Figure 8: Benera Estate (1854
State Library of NSW - zM2 811.1346/1854/1



Figure 9: Benera Cottage (c. 1856/57)
From Mrs Allan Macpherson's
'Scenes in NSW 1856-57' SLNSW



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Benera Homestead, Yarrunga St Prestons

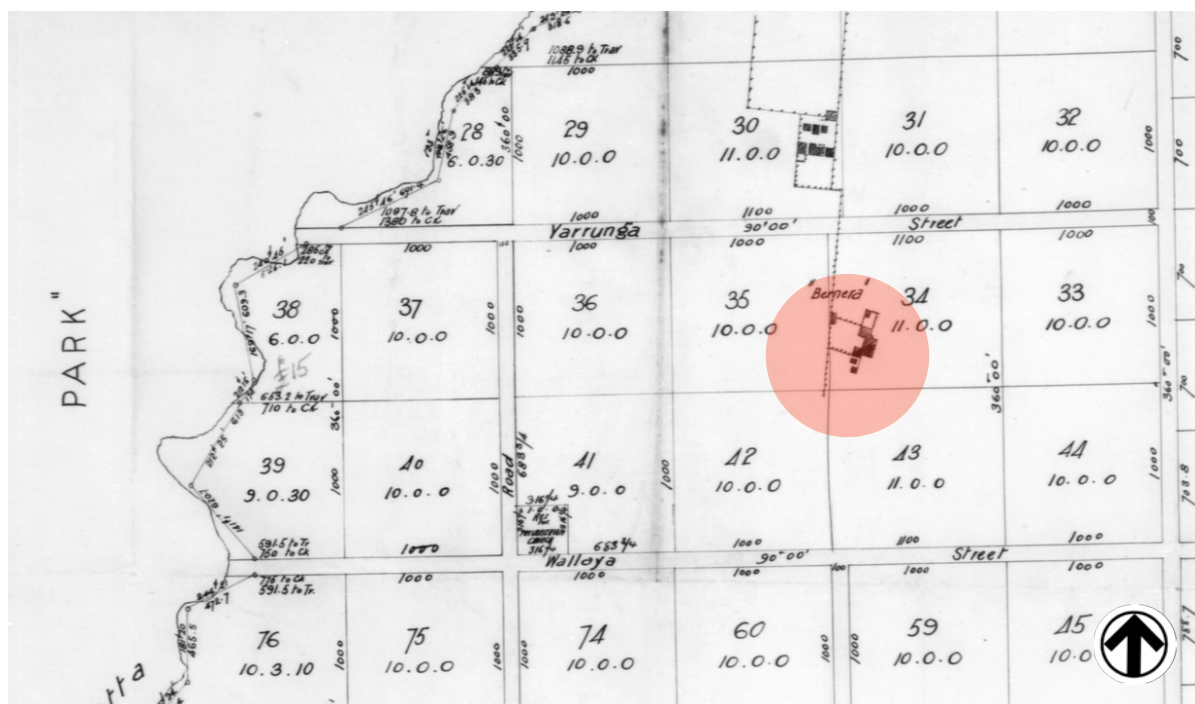


Figure 10: Benera Estate Subdivision Plan (Nd)
Hoxton Park/Benera Subdivision Plans SLNSW

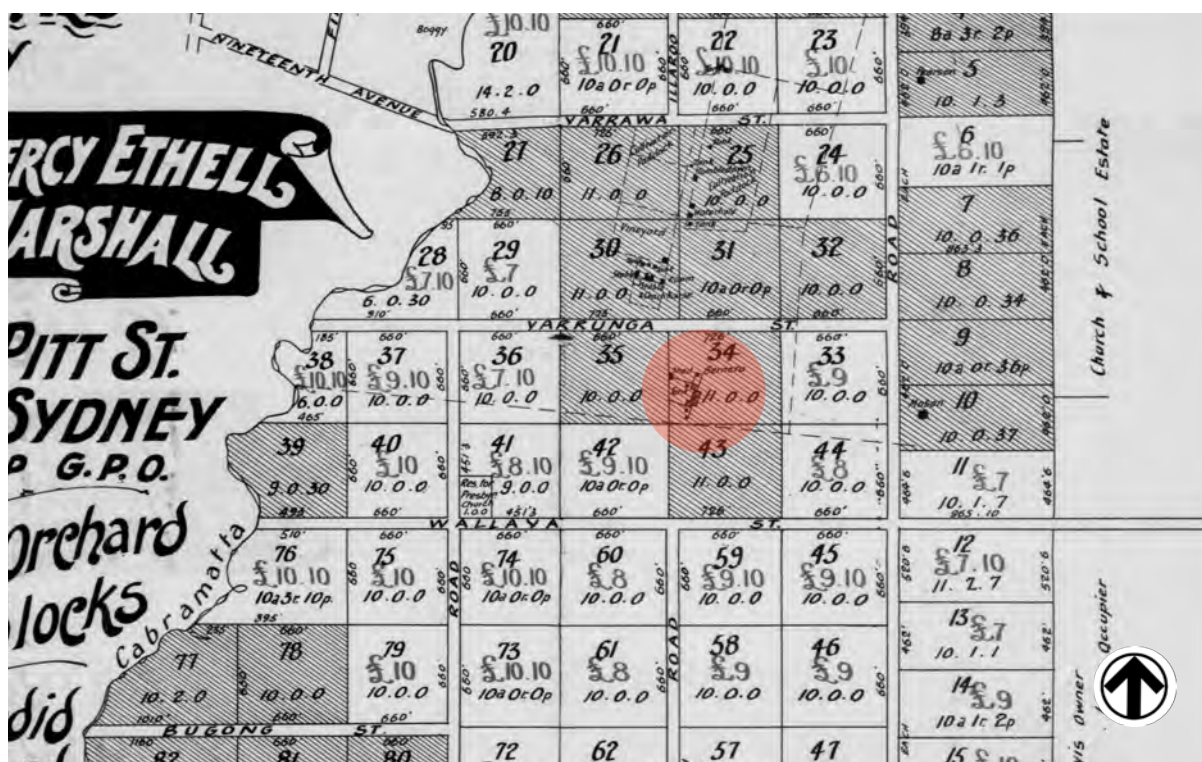


Figure 11: Benera Estate Subdivision Plan (Nd)
Hoxton Park/Benera Subdivision Plans SLNSW



Historical Archaeological Test Excavation Report
Benera Homestead, Yarrunga St Prestons



Figure 12: Benera Homestead (Nd)

View NNW - <http://trove.nla.gov.au/version/209234576>



Figure 13: Benera Homestead (1941)

View ESE - Trove HL2878



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Benera Homestead, Yarrunga St Prestons



**Figure 14: Benera Homestead -
Western Verandah (c.1962)**
View NE - Trove HL1653-2



**Figure 15: Benera Homestead -
Western Verandah (c.1962)**
View NE - Trove HL1653-1



Figure 16: Benera Homestead (c.1972)

View - SW from 'Demolished House in Liverpool' <http://trove.nla.gov.au/version/209234896>



Figure 17: Benera Homestead (c.1947)

Lands Department Air Photo, Liverpool Run, 24 January 1947



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Benera Homestead, Yarrunga St Prestons

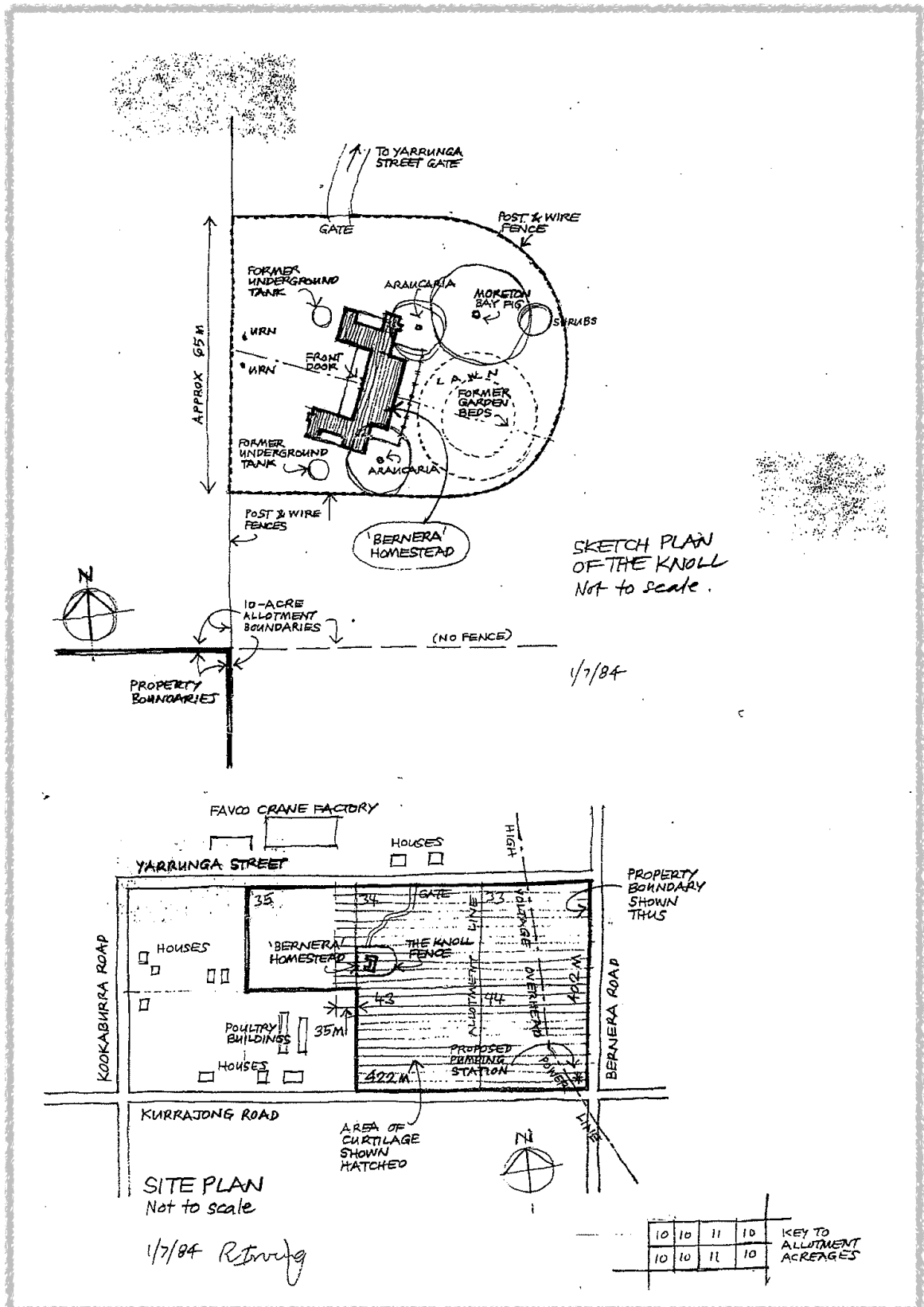


Figure 18: Benera Homestead Indicative Site Plan (1984)

Macarthur Region Heritage Study



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Benera Homestead, Yarrunga St Prestons



Figure 19: Benera Homestead site post-fire (1992)

Liverpool Heritage Study <http://trove.nla.gov.au/version/209235104>



Figure 20: Benera Homestead site post-fire (1992)

Liverpool Heritage Study <http://trove.nla.gov.au/version/209235104>

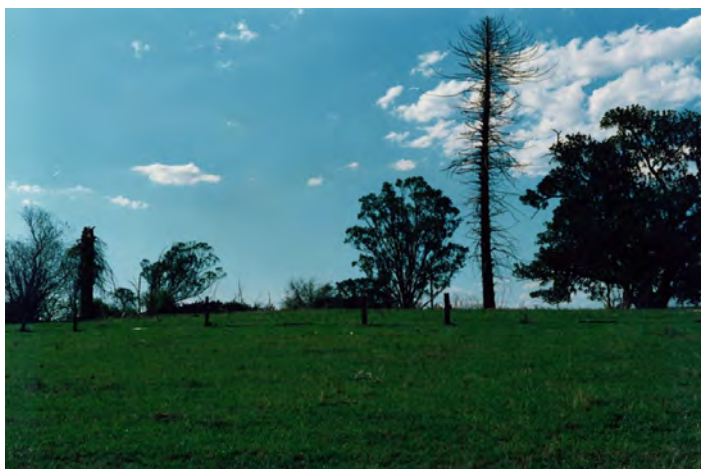


Figure 21: Benera Homestead site post-fire (1992)

Liverpool Heritage Study <http://trove.nla.gov.au/version/209235104>



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Benera Homestead, Yarrunga St Prestons



Figure 22: Study Area (1991)
Lands Department Air Photo, Liverpool Run 1991



Figure 23: Study Area (2009)
Google Earth Historical Imagery



Figure 24: Study Area (2014)
Google Earth Historical Imagery



Historical Archaeological Test Excavation Report
Benera Homestead, Yarrunga St Prestons



Figure 25: General view across former Benera Homestead site (2015)
View WSW - Dan Tuck



Figure 26: Former Benera Homestead site (infilled tank/cistern)
View SE - Dan Tuck



Figure 27: Former Benera Homestead site (collapsed mid-20th century shed)
View WSW - Dan Tuck



Heritage

Survey

The Lot 34/Benera study area was subject to initial site inspection on Wednesday 8 April 2015. Property owner Sam Camilleri kindly provided site access and information about the history of the locale and its more recent development.

The homestead site presents as a grassed up knoll top. While there are some surface undulations, and the remains of some of the vegetation that formerly dotted the site, there is no clear surface evidence of the homestead *per se*. Consequently, its location can only be inferred by the location of the remains of a termite riddled Moreton Bay Fig trunk (which was situated to the immediate northeast of the homestead) and an infilled depression that marks the location of a former concrete lined tank that stood just off the end of the northern (east-west) wing of the homestead.

Built elements at the site include a wooden telegraph pole (c. mid 20th century) and a small section of white-painted aluminium fencing supported by star pickets (part of a late 20th century calf feeding apparatus and unrelated to Benera).

In addition, there is a collapsed shed to the northwest of the homestead site: a mid 20th century construction. It is timber framed, set on a medium-coarse, blue metal aggregate, concrete slab and features an iron roof.

Significance

The Benera Homestead site was identified as an item of historical importance and cultural heritage significance when it was first assessed as part of the Macarthur Region Heritage Study in 1985. Destroyed by fire in 1986, much of the significance of the place has been eroded and the remaining levels of significance related principally to the historical archaeological potential of the locale. The NSW State Heritage Inventory Sheet for Benera states that the site is significant under assessment *Criterion (e): Research Potential*, and that it:

'... is no longer intact, but archaeological remains may exist'.

It further notes:

'There is the potential to gain more information on the site from further architectural, archaeological and documentary research'.

A revised assessment of the significance of the site is presented in the **results** section.



Project

The site is the subject of a State Significant Development Project (SSD) for a five building warehousing and distribution centre.

Summary details of the proposal based on information available to date are as follows:

- The land is zoned industrial and is required to be developed as such by Council.
- The land is to be developed for warehousing (as part of an industrial park) and its use is anticipated to create jobs within the local and greater communities.
- Warehouse establishment requires significant landscaping earthworks and large areas of flat land to be created for building footprints; office, working, storage and parking areas; and site access.
- The site plan for the proposal includes five warehouses and associated offices; business spaces; hard stand areas, parking and access roads.

Implications

The land is undulating and significant earthworks are required to accommodate the proposed warehousing. Core earthworks would include the levelling/removal of at least part of the top of the Lot 34 knoll, which retains the former Benara Homestead site. The removal of the knoll will remove any remaining vestiges of the site.

Axis Architectural November 2015



Investigation

In deference to the cultural heritage significance of the site, and as a means of determining the nature and extent of any in-ground relics associated with the former homestead, a program of targeted historical archaeological testing was undertaken on 4-6 August 2015.

Rationale

The archaeological assessment for the site (MDCA 2015a) determined that buried remains associated with the homestead could include:

- partial/truncated remains of building foundations (timber stumps, pads and posts holes)
- stone chimney base and entrance threshold elements (though most had likely been grubbed out)
- discrete rubbish pits and pit toilet holes
- garden elements (soils; post holes denoting garden fences)
- inground tanks.

However, it was further stated that such remains would be limited and ephemeral: a consequence of the nature of the former building (timber), its destruction by fire and the extensive cleanup that occurred thereafter.

Approval

Archaeological investigation of listed archaeological sites requires a permit issued by the OEH NSW Heritage Division. Given that the site is a listed archaeological site of local heritage significance, application was made for a s140 permit to facilitate the investigation. The application was supported by a historical archaeological assessment and included a statement of heritage impact, research design and excavation methodology to guide the testing program. Approval was provided 23 July 2015 (permit # 2015/s140/16).

Methodology

The test excavation was conducted according to accepted Australian historical archaeological best practice guidelines (as endorsed by the NSW Heritage Division) and include (but was not be limited to) the following:

Historical Test Excavation

Historical archaeological testing involved the excavation of three test trenches and discrete excavation over the collapsed cistern/tank in the northwest corner of the homestead site.

- Test trenches were machine excavated (using a medium-sized excavator with a batter/mud bucket) under direct archaeological supervision.



Historical Archaeological Test Excavation Report

Benera Homestead, Yarrunga St Prestons

- *Excavation ceased where archaeological remains were exposed or sterile subsoil was encountered. At this point the trenches were manually cleaned, recorded, mapped and photographed.*

- Trenches were between 13 and 15 metres long and 1.3 metres wide. They were located so as to identify any remains associated with the extreme northern and southern wings and central core of the homestead. The cistern/tank trench was excavated to expose it for recording.

On completion of the testing, all trenches were backfilled, made safe and the corners marked with wooden stakes.

Recording included:

- use of a field notebook to create a running record of the testing program
- preparation of annotated site plans that plotted the location of all archaeological features and deposits
- photography of all excavations using a high-end digital camera (& scale bar/mini-rod)
- plotting of the location of all trenches by a licensed surveyor using a robotic total station.



Figure 29: Indicative Location of Benera Test Excavations

NSW Land & Property Information SIX Viewer 2015



Results

The following section presents the results of the testing program by location.

Tank/Cistern

The site of the inground concrete tank presented as an infilled depression, covered with brush, to the immediate north-northwest of the homestead site. In the past, the collar of the tank is reported to have stood around 600 mm (2') proud of ground level. The collar was caved in and the tank infilled in the 1980s.

Machine removal of the brush and underlaying mixed fill (loam over redeposited clays and gravels) revealed the rim of the tank at a depth of 600 mm below ground level. The tank proved to be constructed of pale grey, medium pebble aggregate concrete. It was built in 12 adjoining sections (dodecahedron in shape): each 900 mm long x 130 mm thick; boxed in situ with corrugated iron and timber. The internal diameter of the structure measured 3.36 metres.

The fill of the tank comprised mixed grey-brown loam containing collapsed concrete fragments, black agricultural pipe, plastic bottles and very occasional fragments of glass and ceramic. A sondage was excavated through the fill in one location to a depth of 1.5 metres. The tank fabric is suggestive of an early to mid 20th century date and it is likely that the feature is a cistern rather than a lined well. The fill is recent, highly disturbed and reflects the infilling of the item in the 1980s. Refer **figures 30 - 35**.

Trench 1

Trench 1 (13 x 1.3 metres) was located to the east of the cistern and sited to locate structural remains associated with the northern wing of the homestead.

Much of the trench was devoid of features and presented as disturbed black-brown topsoil overlaying mottled, clayey brown loam and ultimately brown clays. The eastern side of the southern section of the trench did however retain a section of linear, sandstock brick footing base; two sandstone blocks and some sandstock brick edging.

Overlaying the trench on a 1970s air photo of the site and aligning all to the site grid suggest that these features related to the eastern side of the northern, east-west oriented wing of the house. The brickwork (unbonded, mottled red-orange sandstock brick) has been tentatively identified as mid 19th century and part of a verandah footing; the stonework likely associated with a threshold. Refer **figures 30; 36 - 40; 50 - 51**.



Trench 2

This trench (15 x 1.3 metres) was sited to document the central (north-south oriented) homestead building - notionally a timber structure built on timber stumps and log footings.

The eastern part of the trench was largely devoid of features and presented as disturbed loam overlaying loamy clays. One burnt out stump (300 mm in diameter) was observed midway along the trench. To the west of this, and extending across an area 4.5 metres wide and 1.2 metres deep, was a large infilled depression. This contained wet-muddy black loam with concrete, stone, dry-pressed brick rubble, two sections of ferris pipe and modern plastic fragments. To the immediate west was a white plastic PVC pipe.

Overlaying the trench on a 1970s air photo of the site and aligning all to the site grid suggests that while the stump may relate to homestead footing arrangements, the infilled depression is likely relatively recent (and probably relates to post-fire cleanup and site levelling). Refer **figures 30; 41 - 44; 50 - 51**.

Trench 3

Trench 3 (15 x 1.3 metres) was sited to locate structural remains associated with the southern portion of the homestead.

The southernmost part of the trench featured stone and concrete demolition rubble overlaying mottled loamy clay. Three metres north of the south end of the trench, a concrete sump/pit was encountered in association with what may be the remains of a stone wall footing. The interior of the sump was rectangular (640 x 240 x 360 mm) and was drained by a 100 mm diameter ceramic pipe set well above the floor of the sump. The remainder of the trench featured disturbed loam topsoil over mottled yellow clayey loam grading to loamy clay. At the extreme north end of the trench, 130 mm diameter vitrified ceramic drain pipe was recorded (running across the trench NNE-SSW).

Overlaying the trench on a 1970s air photo of the site and aligning all to the site grid suggests that the rubble at the south end of the trench likely relates to a free standing structure that stood proud of the southern wing of the homestead (possibly a laundry). The sump and stonework observed may also relate to the margins and drainage of this building. The VCP at the north end of the trench likely served to drain the homestead proper. Refer **figures 30; 45 - 49; 50 - 51**.

Aboriginal Test Excavation

In addition to the historical test excavation, a program of Aboriginal archaeological testing was undertaken by MDCA in conjunction with local Aboriginal representatives, following the Office of Environment & Heritage Code of Practice for Archaeological Investigation of Aboriginal Objects in New South Wales. The excavations targeted areas of identified Aboriginal archaeological sensitivity



within Lot 34 and adjacent allotments, including in the vicinity of the former homestead. The excavations consisted of a gridded series of manually excavated test squares (0.5 x 0.5 metres). Where these overlapped with the area of historical archaeological investigation, they were monitored and served as pseudo-test pits.¹

Generally, the test pits associated with the Aboriginal investigation within the Benera Homestead area demonstrated disturbed soils and fill deposits overlaying increasingly clayey subsoils. Some of the test pits contained isolated fragments of brick, ceramic, glass and metal. For the most part these were small, not diagnostic and indicative of a background scatter rather than a feature-related concentration. Square F50, immediately south of Trench 3 contained demolition material consistent with that seen in Trench 3. No significant in situ historic period features or deposits were observed within the Aboriginal test pits.

¹ MDCA 2015. *Aboriginal Cultural Heritage Assessment Report. Lot 20 DP1173483 and Lots 33, 34, 35 and 43 DP2359 Yarrunga Street, Prestons*. Report to DBL Property Pty Ltd on behalf of Logos Investment Management Pty Ltd.



Historical Archaeological Test Excavation Report

Benera Homestead, Yarrunga St Prestons

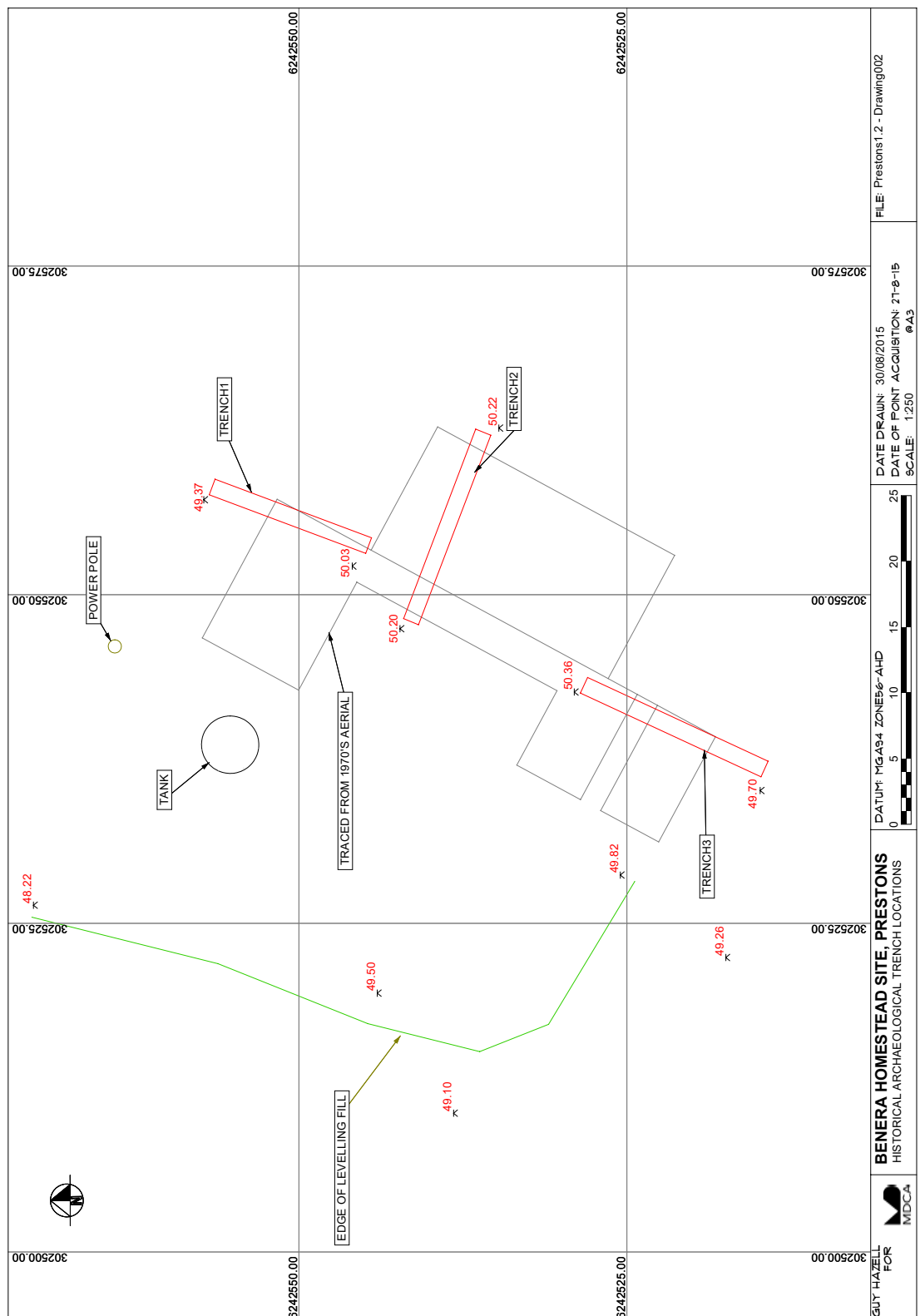


Figure 30: Test Trench Locations (in relation to location of homestead)

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Historical Archaeological Test Excavation Report

Benera Homestead, Yarrunga St Prestons



Figure 31: Tank/cistern - prior to excavation
View SW - Dan Tuck 2015



Figure 32: Tank/cistern - during excavation
View WSW - Dan Tuck 2015



Figure 33: Tank/cistern - exposing concrete rim
View SW - Dan Tuck 2015



Figure 34: Tank/cistern
View SE - Dan Tuck 2015



Figure 35: Tank/cistern - concrete wall detail
View SW- Dan Tuck 2015

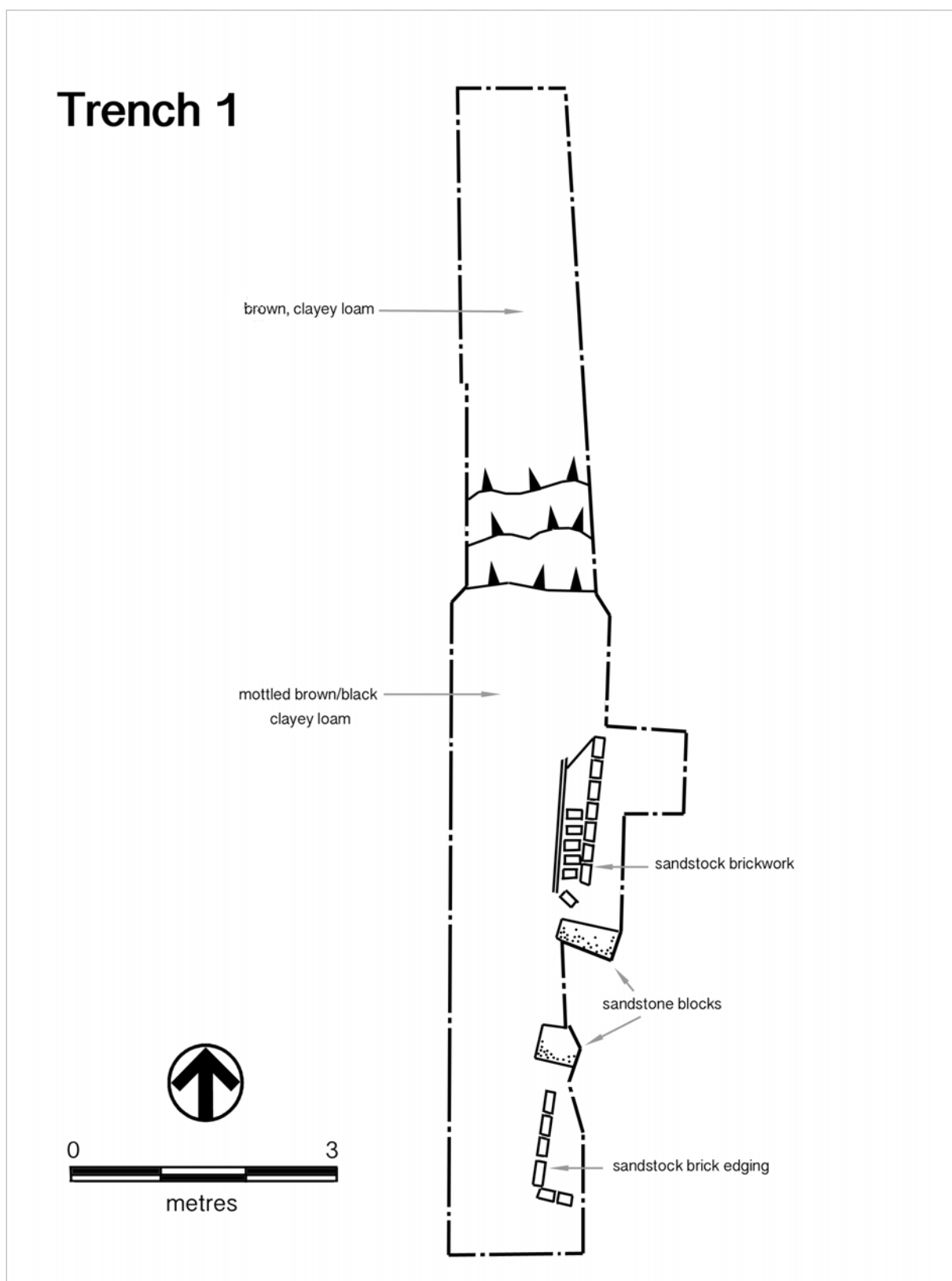


Figure 36: Plan of Trench 1

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Benera Homestead, Yarrunga St Prestons



Figure 37: Trench 1 - during excavation
View S - Dan Tuck



Figure 38: Trench 1 (showing brick footing base and stonework)
View SSW - Dan Tuck 2015



Historical Archaeological Test Excavation Report
Benara Homestead, Yarrunga St Prestons



Figure 39: Trench 1 (showing brick footing base and stonework)
View SSW - Dan Tuck 2015



Figure 40: Trench 1 (showing brick edging and stonework)
View NNE - Dan Tuck 2015

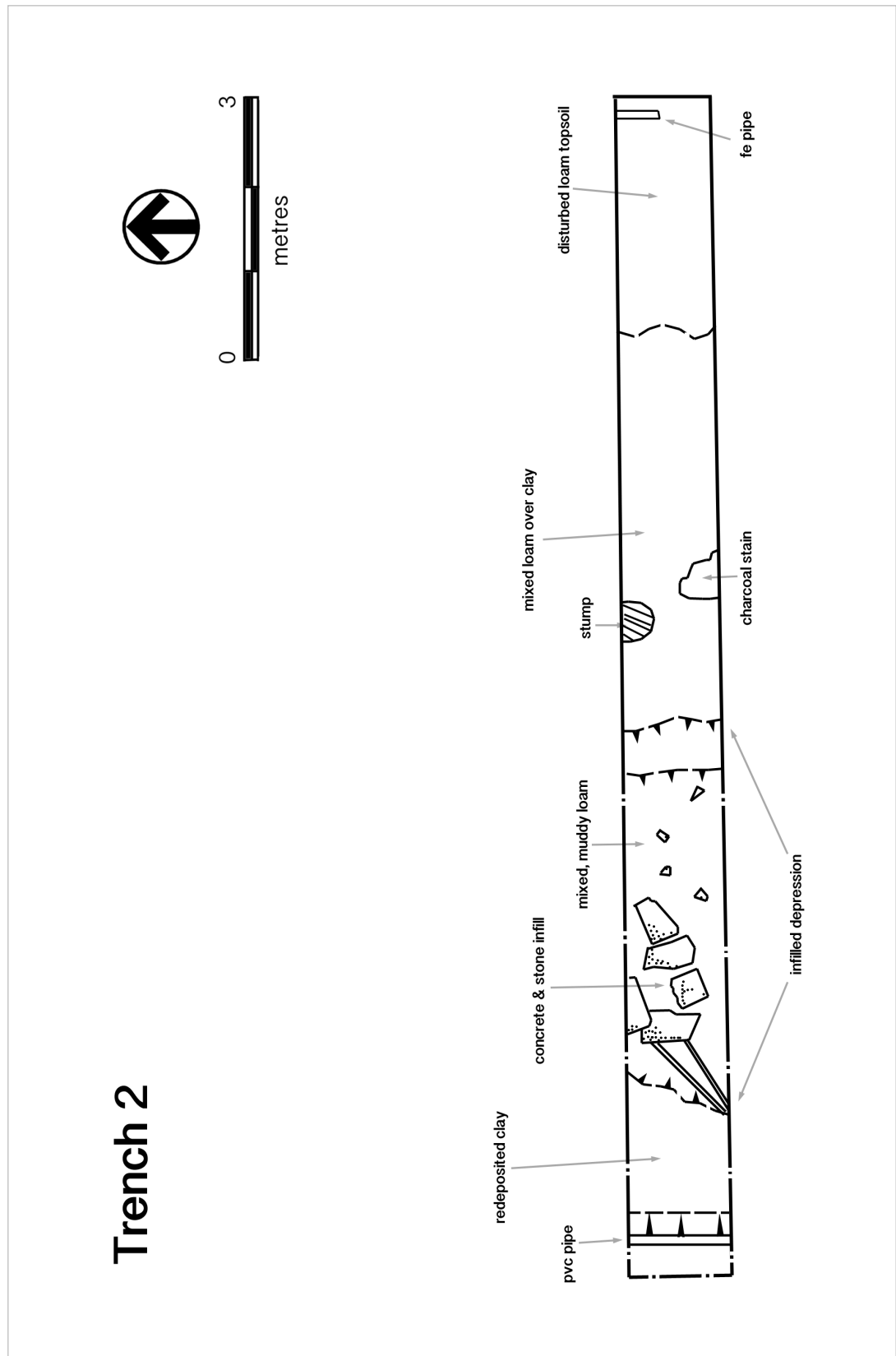


Figure 41: Plan of Trench 2

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Historical Archaeological Test Excavation Report

Benera Homestead, Yarrunga St Prestons



Figure 42: Trench 2
View W - Dan Tuck 2015



Figure 43: Trench 2 (infilled depression)
View SW - Dan Tuck 2015



Figure 44: Trench 2 (stump remnant)
View SW - Dan Tuck 2015

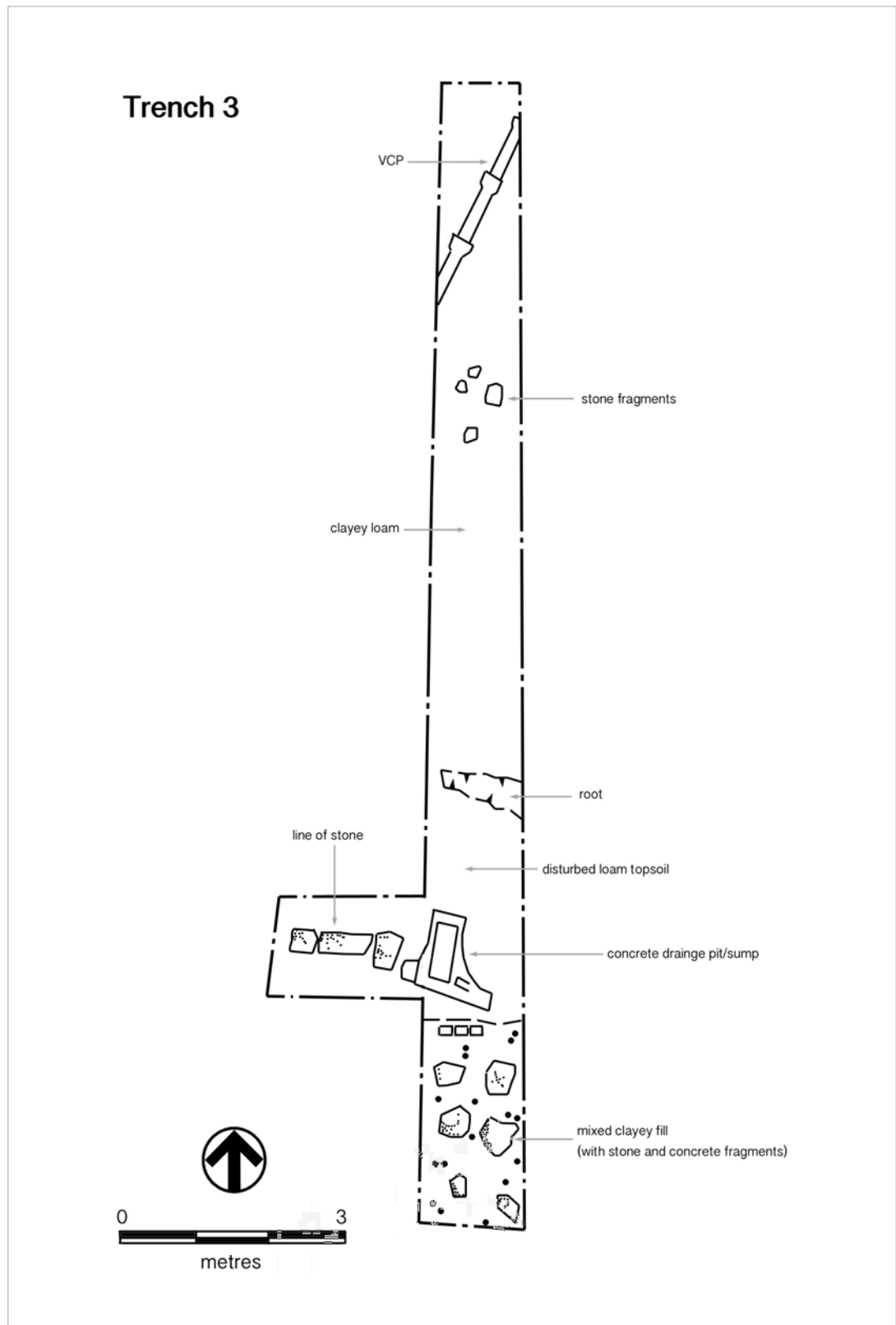


Figure 45: Plan of Trench 3

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Historical Archaeological Test Excavation Report
Benerra Homestead, Yarrunga St Prestons



Figure 46: Trench 3 - during excavation

View NNW - Dan Tuck 2015



Figure 47: Trench 3 - features at south end

View NNW - Dan Tuck 2015



Figure 48: Trench 3 (south end) - concrete sump & possible stone footing

View W - Dan Tuck 2015



Figure 49: Trench 3 (north end) - CEW drain pipe

View NNW - Dan Tuck 2015



Historical Archaeological Test Excavation Report

Benera Homestead, Yarrunga St Prestons

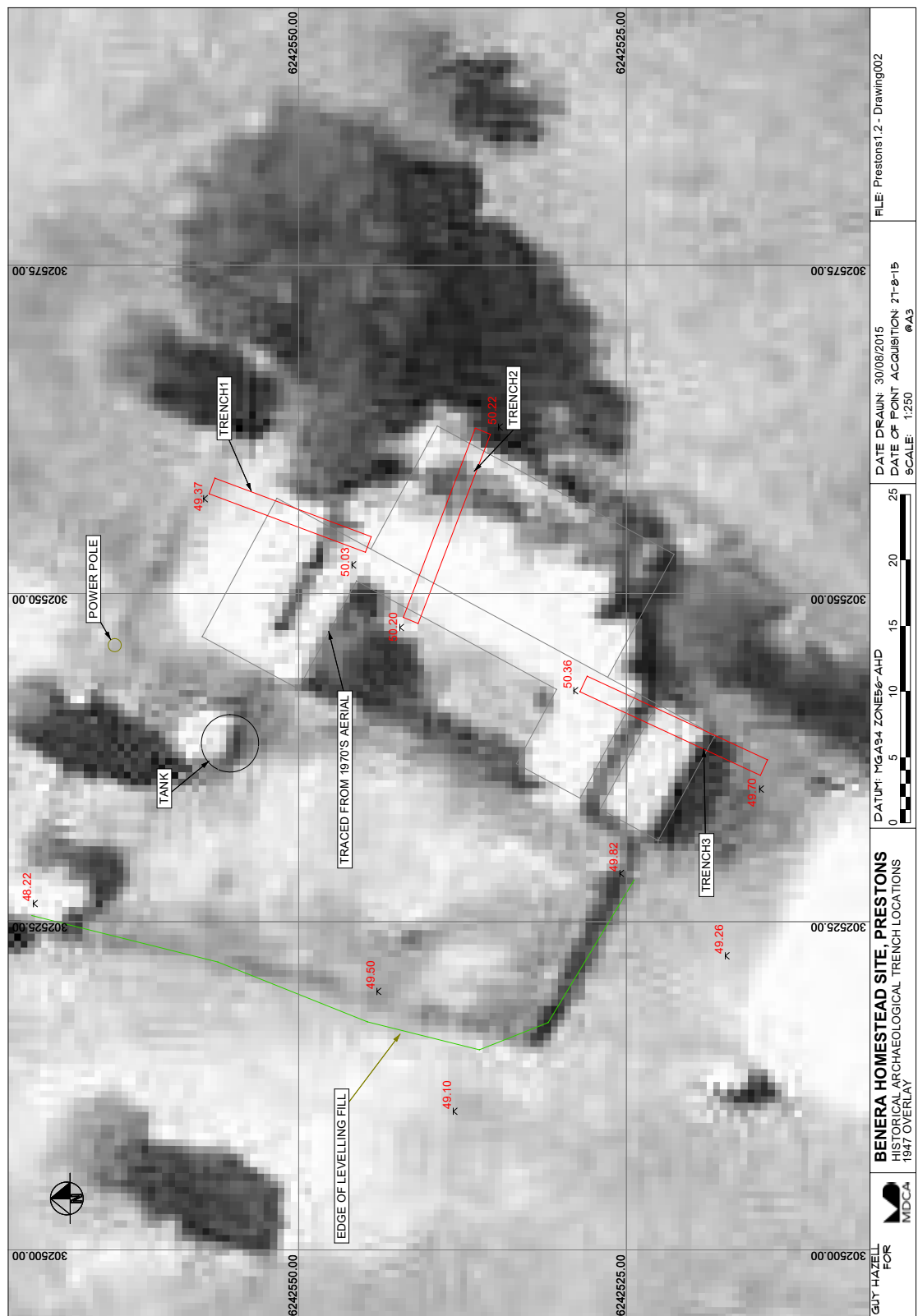


Figure 50: Test Trench Locations (superimposed over 1947 aerial image)

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Benera Homestead, Yarrunga St Prestons

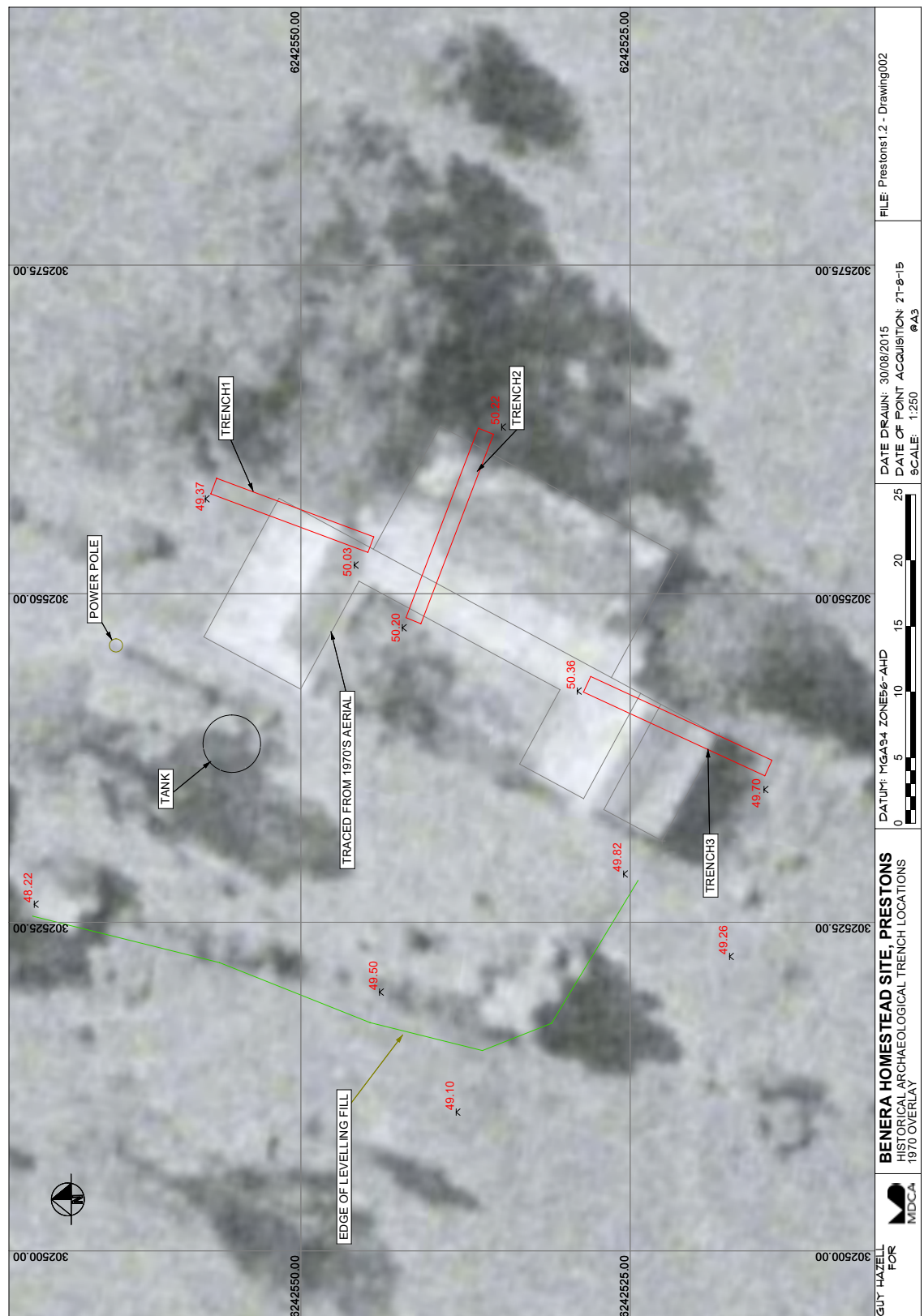


Figure 51: Test Trench Locations (superimposed over 1970s aerial image)

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Research Design

The following questions provided general and specific focus for the testing program. They are followed by a reappraisal of the site's significance that takes into account the recent testing program results.

- **What is the nature of the archaeological remains associated with Benera Homestead that exist within the study area?**

Remains associated with the homestead that were recorded during the testing included some disturbed footing/foundation materials (brick verandah footings and a partial stone threshold); the remains of a timber stump; an inground concrete tank; a sump and several ceramic drain pipes. The suite of features relate to foundations and onsite hydraulic management. There was no evidence of sub-floor occupation material or other significant artefact bearing features or deposits.

- **How extensive are the buried remnants of the homestead and what is the extent to which they have been impacted by site clearance activities after the fire of 1986?**

Remains associated with the homestead appear to be limited and all trenches show signs of disturbance consequent of site clearance and levelling after the fire of 1986. Some remains appear to have been removed and other demolition materials appear to have been smeared across the site to make good the land surface after the destruction of the homestead. There is some evidence of strategic infilling of depressions with redeposited clays, loam and building fabric (e.g. Trench 2). The concrete tank recorded has lost the top 1200 mm of its concrete collar and has been infilled with farm rubbish.

- **The main homestead building was constructed of timber on timber foundations. Were the flanking kitchen and nursery wings (to the north & south) constructed in a similar manner or were they notably different?**

The main homestead building does appear to have been built on timber foundations (stumps). It remains unclear how the north and south wings were constructed and supported. Trench 2 showed some evidence that the verandah fronting the north wing may have been had brick footings (at least on the exterior margin, which would have supported the verandah posts) as well as stone step edges. Trench 3 located to pick up the south wing did not present any features that were demonstrative of foundations, though a short line of stonework may relate to the foundations of an outbuilding that stood adjacent to it.

- **Is there archaeological data that can add to our understanding of the development of the homestead? Was it a phased construction with the main residence built first and the wings added later?**



At present, not enough physical evidence has been recorded to answer this question.

- **There are reputedly two in-ground tanks present within the study area, the location of only one of which is evident today. Do they remain identifiable? If so, what was their likely function and how did they operate?**

The northernmost of the inground tanks remains identifiable and was partially excavated. While the protruding top and collar had been removed, much of the tank below ground level appears to remain. It has been infilled with relatively modern farm waste in a matrix of clayey loam. The feature appears to have been a tank/cistern that harvested water, rather than a well dug down to access ground water. The fabric of which it is built suggests that it dates to the early to mid 20th century and is not an original homestead feature.

The southern tank (identified in a sketch plan in c.1984) was not targeted nor identified and long-time land owner Sam Camilleri cannot recall having seen it in the past.

- **The nature of hydraulic management on site during the period of the homestead is uncertain. Can the in-ground remains tell us anything about how water and waste were stored and/or managed during the historic period?**

A number of modern and historic pipes were observed during the testing including modern white PVC drain pipes and considerably older vitrified ceramic service pipes with hand attached collars (Trench 3). Trench 3 also featured a concrete sump that appears to have serviced a homestead outbuilding (possibly a laundry).

The homestead formerly occupied the top of a knoll and drainage appears to have been good in all directions away from the knoll crest. It is likely that the aforementioned tank(s) collected water harvested from the homestead roof. No toilet or other waste disposal features were recorded.

- **Is there any evidence of the gardens that formerly fringed the homestead (such as garden soil and landscaping) or has this been removed or otherwise obscured?**

There was no definitive evidence of garden related soils or infrastructure recorded during the testing program.

- **How has the natural soil profile within the study area been impacted by historic development and more recent site use?**

The local topsoil is modern/introduced, with natural topsoils either absent or considerably altered/disturbed - a consequence likely to have resulted from both pre-construction clearance and post-destruction cleanup and levelling. Intact soil profiles were generally below the level of the A2 horizon



and comprised mottled loamy clays grading into heavy clays (B-horizon) and ultimately into gravelly clays and shales (C-horizon).

- **Are there any incidental or undocumented features within the investigation area that may relate to the history of broader domestic, horticultural or agricultural use of the study area?**

There appear to be some features (a stone footing and a concrete sump) at the extreme south end of Trench 3 that may relate to an outbuilding that stood adjacent to the homestead's southern wing. This has been tentatively identified as a laundry, though it may have had other or additional functions. No other features or deposits observed appeared to relate to the broader history of domestic, horticultural or agricultural use of the study area?



Significance

“Heritage significance” and “cultural significance” are terms used to describe an item’s value or importance to our society. The Australian ICOMOS Burra Charter defines cultural significance as,

Aesthetic, historic, scientific or social value for past, present or future generations

This value may be contained in the fabric of the item, its setting and relationship to other items, the response that the item stimulates in those who value it now, or the meaning of that item to contemporary society.

Accurate assessment of the cultural significance of sites, places and items, is an essential component of the NSW heritage assessment and planning process. A clear determination of a site's significance allows informed planning decisions to be made, in addition to ensuring that heritage values are maintained, enhanced, or at least minimally affected by development.

Assessments of significance are made by applying standard evaluation criteria. These criteria can be used to assess both Aboriginal and European items and landscapes. These criteria are as follows:

- (a) An item is important in the course or pattern of NSW’s cultural or natural history (or the cultural or natural history of the local area)*
- (b) An item has strong or special associations with the life or works of a person, or group of persons, of importance in NSW’ cultural or natural history (or the cultural or natural history of the local area)*
- (c) An item is important in demonstrating aesthetic characteristics and/or a high degree of creative or technical achievement in NSW (or the local area)*
- (d) An item has strong or special associations with a particular community or cultural group in NSW (or the local area) for social, cultural or spiritual reasons*
- (e) An item has potential to yield information that will contribute to an understanding of NSW’s cultural or natural history (or the cultural or natural history of the local area)*
- (f) An item possesses uncommon, rare or endangered aspects of NSW’s cultural or natural history (or the cultural or natural history of the local area)*
- (g) An item is important in demonstrating the principal characteristics of a class of NSW’s cultural or natural places; or cultural and natural environments.*

The above criteria were established under Part 3A of the NSW Heritage Act 1977 for the listing of items of environmental heritage (defined as ‘buildings, works, relics, moveable objects and precincts’)



that are of state heritage significance. These criteria are commonly used to assess all items of heritage significance whether state or local.

A revised assessment of the significance of the site according to the above criteria is presented overleaf.

a). An item is important in the course or pattern of NSW's cultural or natural history (or the cultural or natural history of the local area)

Prior to its destruction, Benera was a rural residence built in the mid-19th century on what was then a 1000-acre semi-remote property. It was one of a number of such properties that dotted the largely undeveloped lands of Sydney's west in the 19th century and marked the holdings of wealthy and/or connected colonial families.

When extant, the homestead demonstrated the development and use of semi-rural estates beyond Sydney Town in the 19th century. The site's ability to demonstrate this significance has however been severely curtailed by the destruction of the homestead and grounds by fire in 1986.

The site of the former Benera Homestead is not significant under this criterion.

(b) An item has strong or special associations with the life or works of a person, or group of persons, of importance in NSW's cultural or natural history (or the cultural or natural history of the local area)

The original 1000-acre Benera Estate grant area is associated with Dr Donald Macleod (staff surgeon to Governor Brisbane) who named the holding after his homeland. The Benera homestead itself is associated with Alan McPherson (son of the colony's first collector of internal revenue) who had the actual homestead constructed in the mid 1850s (though he appears only to have lived on site for a short period). Thereafter the property containing the homestead was sold off as part of major subdivision in the 1880s and owned variously by William Retallack (1889), the Harvards (1924) and current owners the Camilleri family (1985).

As with the previous criterion assessment, it is acknowledged that site once possessed significance under this criterion but that the ability to demonstrate this was lost with the destruction of the homestead.

The site of the former Benera Homestead is not significant under this criterion.

(c) An item is important in demonstrating aesthetic characteristics and/or a high degree of creative or technical achievement in NSW (or the local area)



The homestead was completely destroyed by fire in the 1986 and cleared of all surface remains thereafter. Consequently, any aesthetic or technical qualities that it once possessed are not now demonstrable.

The site of the former Benera Homestead is not significant under this criterion.

(d) An item has strong or special associations with a particular community or cultural group in NSW (or the local area) for social, cultural or spiritual reasons

Benera appears always to have been a private residence and there is no indication or suggestion that it has any special association with a particular community or cultural group in this state.

The site of the former Benera Homestead is not significant under this criterion.

(e) An item has potential to yield information that will contribute to an understanding of NSW's cultural or natural history (or the cultural or natural history of the local area)

Previous significance assessments have stated that the site of the former homestead has research potential and archaeological significance. Research undertaken for the site assessment report acknowledged that the site has *some* historical archaeological potential, but that the level of this potential and associated significance was relatively low (MDCA 2015a & b). This appraisal remains current after the recent testing program.

The former homestead was principally a timber residence build on timber foundations (posts, stumps and piers) with only minor more solid elements (such as stone chimney bases and thresholds). The fire that destroyed the residence in the 1986, and the subsequent cleanup that followed, appears to have removed most of the archaeological remains associated with the building and those that do remain the basal elements of items such as posts and other foundational material. While these relics may mark the location of the homestead and be of some historic interest, their investigation can only contribute in a minor way to our greater understanding of the history and heritage of the homestead, or the broader locale.

The site of the former Benera Homestead has some (albeit limited) local significance under this criterion.

(f) An item possesses uncommon, rare or endangered aspects of NSW's cultural or natural history (or the cultural or natural history of the local area)

The site of the former Benera Homestead is not significant under this criterion.

(g) An item is important in demonstrating the principal characteristics of a class of NSW's cultural or natural places; or cultural and natural environments



The site of the former Benera Homestead is not significant under this criterion.

Summary Statement of Significance

The site of the former Benera Homestead retains some cultural heritage significance as an item of potential archaeological value. This significance is however tempered by the paucity, and ephemeral nature of, the in-ground relics that relate to it. While archaeological investigation can capture the remnants of the place and create a record of the remains, it is acknowledged herein that excavation can only contribute to the greater public understanding of the history and heritage of the site in a limited way.



Impacts

Impact Assessment

The ensuing questions are from the NSW Heritage Office guideline document *Statements of Heritage Impact* and are the established means of assessing the impact of development proposals on heritage items in NSW.

What aspects of the proposal respect or enhance the heritage significance of the site?

The proposal involves significant earthworks and subsequent construction that will ultimately remove all vestiges of the Benera homestead site. To counteract this, the recommendations of this report call for an interpretation plan and naming of elements of the development that reflect the history of the place (refer **recommendations 6 & 7**). At present, Benera is little known to anyone beyond those familiar with the historical development of the immediate area. An appropriate interpretive regime, and place naming that reflects the history of the site, has the potential to bring an understanding of the evolution and importance of the locale to a greater audience - including workers and visitors to the new industrial complex.

What aspects of the proposal could detrimentally affect the heritage significance of the site?

In order to make the project viable, works will include the levelling/removal of at least part of the top of the Lot 34 knoll, which retains the former Benera Homestead site. This will remove any remaining physical remains of the Benera homestead site.

Have more sympathetic development options been considered? If so, why were they discounted?

Yes, however, the zoning of the land as industrial, limits the ways the land area can be used effectively and economically. For the industrial park to be realised - given the undulating nature of the terrain - considerable earthworks need to be undertaken, as an industrial park requires large, flat footprints to accommodate warehouses. The knoll of Lot 34 is the highest point within the development area and therefore requires reduction to make all the other levelling requirements work.

Statement of Heritage Impact

The project proposal as presented will remove all vestiges of the Benera homestead site - which have been assessed as having some limited local heritage significance. While this will remove any archaeological value associated with the physical remains, the proposed interpretation of the site to industrial park workers, users and the broader public will ameliorate the loss to some degree and bring the history of the locale to a wider audience.



Recommendations

The following recommendations acknowledge the results of the recent test excavation; the history and heritage of the study area; NSW Heritage Council guidelines; local planning controls and the nature of the proposed site development.

Salvage Excavation

1. Historical archaeological testing has demonstrated that limited inground remains of Benera Homestead exist on site within Lot 34. While these remains are not evident at a level that would require conservation, a program of historical archaeological salvage excavation should be undertaken to capture archaeological information about the site in advance of the levelling of the knoll top as part of the site's redevelopment.
2. Salvage excavation should be a condition of approval for the development of the site.
3. Excavation should be in accordance with any additional approval conditions *and* the excavation methodology presented in the original s140 supporting document (MDCA 2015b).
4. The salvage excavations will take place within an area that retains no intact Aboriginal archaeological deposit, however it is possible that isolated stone artefacts may be incorporated into the historical archaeological deposit that is to be excavated. The Aboriginal Cultural Heritage Assessment Report for the current proposal (MDCA 2015c) has identified dispersed and largely disturbed Aboriginal stone artefacts across the development area, with the sole exception of a relatively intact concentration of artefacts known as the Prestons Creek Bank site located 300m to the south-east of the Benera Homestead site along a tributary of Maxwells Creek. The Prestons Creek Bank site has been recommended for preservation within a grassed recreational area within the proposed Prestons Industrial Estate, however all other areas of the property, including within and around the Benera Homestead site, have been recommended for development impact without further archaeological investigation. The recommended historical archaeological salvage excavations will therefore take place once approval of these Aboriginal heritage managements recommendations has been given as a condition of approval.
5. Results of the excavation program should be detailed in an archaeological report prepared within a reasonable time frame after the conclusion of site works.



Interpretation

It is further reiterated that:

6. A Heritage Interpretation Plan (IP) should be prepared in advance of development and its recommendations instigated during the development process. The interpretation plan should present a strategy for the effective interpretation of the site's history to the public and future users of the industrial estate.

At this stage, the client has proposed to include interpretive information in a grassed recreational area within the southeastern corner of the Prestons Industrial Estate that will be managed to preserve the Prestons Creek Bank Aboriginal site (detailed in MDCA 2015c Aboriginal Cultural Heritage Assessment Report: Section 7.1.2 & Recommendation 1).

7. Consideration should be given to remember the history of the site in the naming of the industrial estate and/or its elements (such as access driveways).



References

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- Cleere, H. (ed.). 2005. *Archaeological Heritage Management in the Modern World*. Routledge, United Kingdom.
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Attachments

A1. Council Approval



Our Ref: 150483.2015-005
Contact: Kate Higgins 9821 9306

Date 25 June 2015

Jeffrey Lord
DBL Property
Level 6
432 Kent Street
SYDNEY NSW 2000

Dear Sir

**Clause 5.10(3) Liverpool Local Environmental Plan 2008
Advice regarding historical archaeological test excavations at Lot 34 DP 2359 Yarrunga Street, Prestons (site of the former homestead "Benera").**

The proposed excavation in the area of the former Benera Homestead of trenches up to 10 metres long by 1.5 metres wide by 500mm deep, as described in your email dated 1 June 2015 and its attachment (the draft statement of heritage impact prepared by Mary Dallas Consulting Archaeologists), has been considered and it has been decided that the work is of a minor or maintenance nature and that the work will not have an adverse impact on the heritage values of the site, in accordance with Clause 5.10(3) of Liverpool Local Environmental Plan 2008 so long as the work is undertaken in accordance with any requirements of the Office of Environment and Heritage attached to the S140 Approval.

You are reminded that you need to ensure your proposed development does not trigger any other requirements for a development approval under the Environmental Planning and Assessment Act, State or Liverpool City Council regulations.

If you have any queries regarding this matter please contact Kate Higgins, Heritage Officer, on 9821 9306.

Yours sincerely



David Smith
Acting Coordinator
Development Assessment

Customer Service Centre Level 2, 33 Moore Street, Liverpool NSW 2170, DX 503106 Liverpool
All correspondence to The General Manager, Locked Bag 7064 Liverpool BC NSW 1871 Call Centre 1300 36 2170
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Heritage Council

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File: EF15/11407
Our ref: DOC15/199411

Mr Trent Iliffe
Logos Development Management Pty Ltd
Suite 2, Level 12
167 Macquarie Street
SYDNEY NSW 2000

Dear Mr Iliffe

Re: Excavation Permit – S140 for Archaeological Testing and Salvage of locally significant remains of the former homestead of ‘Benara’ – Yarrunga Street, Prestons, Liverpool LGA.

Reference is made to your application under Section 140 of the *Heritage Act* 1977 (the Act), to undertake archaeological work at the above property (Application number 2015/S140/16).

Under delegated authority approval is given for the S140 application for an archaeological excavation permit. Please note this permit is subject to the conditions attached. Acceptance of these statutory conditions by the Applicant and Excavation Director is a requirement of this permit. It should be noted that as the Applicant, this Approval (and the fulfilment of all subsequent conditions) rests with you and not the Land which is the subject of the works.

You are reminded that it is a condition of this permit that the Applicant is responsible for the safe keeping of artefacts recovered from this site. You are required to nominate a repository for archaeologically excavated material, as well as referencing the final location in the excavation report as per section 146(b) of the Act. This is to enable a record to be kept of the location of all archaeologically excavated material.

It should be noted that an approval for an archaeological permit under the Act covers only those archaeological works described in the application. Any additional archaeological investigations will require a further approval. It should also be noted that an approval for an archaeological permit under the Act is additional to those which may be required from other local, State or Commonwealth Government authorities. Inquiries about any other approvals needed should, in the first instance, be directed to the local council, State and Commonwealth Government where appropriate.

You are also requested to provide the following information:

- (1) The estimated total cost of the archaeological investigations (both in the field and laboratory), including GST;
- (2) The estimated total cost of the development/redevelopment, including GST;
- (3) Whether this project creates new long term jobs (for example through providing a new service or facility);
- (4) If this project creates new long term jobs, how many? and
- (5) How many construction and professional workers will be engaged on this project during the life of the project?

This information will help the Heritage Council of NSW determine the economic role of heritage in development in NSW and should be submitted to the Director of the Heritage Division within one (1) month of the completion of the field excavation programme. This information should be updated at the end of the project and updated figures should be submitted with the Final Excavation Report to

the Heritage Council for approval within one (1) year of the completion of the field excavation programme.

This permit, issued by the Heritage Council of NSW, does not give approval to harm Aboriginal objects. Aboriginal objects and Aboriginal places in NSW are protected under the *National Parks and Wildlife Act 1974* (NPW Act). It is an offence to do any of the following without an exemption or defence (penalties apply):

- knowingly harm or desecrate an Aboriginal object (the 'knowing' offence)
- harm or desecrate an Aboriginal object or Aboriginal place (the 'strict liability' offence)

The NPW Act provides a number of exemptions and defences to these offences and also excludes certain acts and omissions from the definition of harm. For more information about the regulation of Aboriginal cultural heritage, go to the OEHS website: <http://www.environment.nsw.gov.au/licences/achregulation.htm>

This permit is issued to the applicant on the condition that the nominated Excavation Director is present at the site supervising all archaeological fieldwork activity likely to expose significant relics. Permits are not transferable without the written consent of the Heritage Council of New South Wales. Your attention is drawn to the right of appeal against these conditions in accordance with section 142 of the *Heritage Act, 1977*.

Inquiries on this matter may be directed to A/Senior Team Leader, Archaeology, Katrina Stankowski on 9873 8569 or via email at Katrina.Stankowski@environment.nsw.gov.au.

Yours sincerely



Rochelle Johnston
Manager, Conservation
Heritage Division
Office of Environment and Heritage
As Delegate of the Heritage Council of NSW

23 July 2015

Enclosure: Approval Conditions for S140 Permit

CC: The General Manager, Liverpool City Council, DX 5030 Liverpool.
Mr Dan Tuck, Mary Dallas Consulting, PO Box A281, Arncliffe, NSW, 2205.

Approved Archaeological Works

01. All works shall be in accordance with the approved research design and methodology outlined in 'Statement of Heritage Impact & S140 Supporting Document, Lot 34 DP2359 Yarrunga Street, Prestons – Proposed Archaeological Investigations at the Benera Homestead Site' by Mary Dallas Consulting Archaeologists dated 1 June 2015,

except as amended by the following conditions:

02. This permit covers the removal of locally significant relics, only.
03. This archaeological approval is valid for five (5) years from the date of approval. Requests for extensions beyond this time must be made in writing prior to expiry of the permit.

Fieldwork

04. The Heritage Council of NSW or its delegate must be informed of the commencement and completion of the archaeological program at least 5 days prior to the commencement and within 5 days of the completion of work on site. The Heritage Council and staff of the Heritage Division, Office of Environment & Heritage authorised under section 148(1) of the 'Heritage Act, 1977', reserve the right to inspect the site and records at all times and to access any relics recovered from the site.
05. The Applicant must ensure that if substantial intact archaeological deposits and/or State significant relics not identified in "Statement of Heritage Impact & S140 Supporting Document, Lot 34 DP2359 Yarrunga Street, Prestons – Proposed Archaeological Investigations at the Benera Homestead Site" by Mary Dallas Consulting Archaeologists dated 1 June 2015, are discovered, work must cease in the affected area(s) and the Heritage Council of NSW must be notified. Additional assessment and approval may be required prior to works continuing in the affected area(s) based on the nature of the discovery.
06. Should any Aboriginal objects be uncovered by the work, excavation or disturbance of the area is to stop immediately and the Office of Environment & Heritage (Enviroline 131 555) is to be notified in accordance with Section 89A of the *National Parks and Wildlife Act, 1974* (NPW Act). Aboriginal objects in NSW are protected under the NPW Act. Unless the objects are subject to a valid Aboriginal Heritage Impact Permit, work must not recommence until approval to do so has been provided by the Office of Environment & Heritage.
07. The Heritage Council of NSW must approve any substantial deviations from the approved research design outlined in 'Statement of Heritage Impact & S140 Supporting Document, Lot 34 DP2359 Yarrunga Street, Prestons – Proposed Archaeological Investigations at the Benera Homestead Site' by Mary Dallas Consulting Archaeologists dated 1 June 2015, including extent and techniques of excavations, as an application for the variation or revocation of a permit under section 144 of the 'Heritage Act, 1977'.
08. The Applicant must ensure that the approved Primary Excavation Director nominated in the section 140 application 2015/S140/16, Dan Tuck, is present at the site supervising all archaeological fieldwork activity likely to expose significant relics. If the approved Primary Excavation Director, Dan Tuck, will be absent from the site for more than 50% of the duration of the archaeological activity, the Applicant must forward for the written approval of the Heritage Council or its delegate the details of a Secondary Excavation Director, Joint Director or Site Director in charge for this period.
09. The Applicant must ensure that the approved Primary Excavation Director nominated in the section 140 application 2015/S140/16, Dan Tuck, takes adequate steps to record in detail relics, structures and features discovered on the site during the archaeological works in accordance with current best practice. This work must be undertaken in accordance with relevant Heritage Council guidelines.
10. The Applicant must ensure that the nominated Excavation Director briefs all personnel involved in the project about the requirements of the NSW 'Heritage Act 1977' in relation to the proposed archaeological program. This briefing should be undertaken prior to the commencement of on-site excavation works.

11. The Applicant must ensure that the nominated Excavation Director and the excavation team is given adequate resources to allow full and detailed recording to be undertaken to the satisfaction of the Heritage Council.
12. The Applicant must ensure that the site under archaeological investigation is made secure and that the unexcavated artefacts, structures and features are not subject to deterioration, damage, destruction or theft during fieldwork.
13. The Applicant is responsible for the safe-keeping of all relics recovered from the site.

Analysis and Reporting

14. The Applicant must ensure that the approved Primary Excavation Director or an appropriate specialist, cleans, stabilises, labels, analyses, catalogues and stores any artefacts recovered from the site in a way that allows them to be retrieved according to both type and provenance.
15. The Applicant must ensure that a summary of the results of the field work, up to 500 words in length, prepared by the approved Primary Excavation Director nominated in the section 140 application 2015/S140/16, Dan Tuck, is submitted to the Heritage Council of NSW for approval within one (1) month of completion of archaeological field work. This information is required in accordance with section 146(b) of the 'Heritage Act, 1977'.
16. The Applicant must ensure that a final excavation report is written by the approved Primary Excavation Director nominated in the section 140 application 2015/S140/16, Dan Tuck, to publication standard, within one (1) year of the completion of the field based archaeological activity unless an extension of time or other variation is approved by the Heritage Council of NSW in accordance with section 144 of the 'Heritage Act, 1977'.
17. The Applicant must ensure that one (1) electronic copy of the final excavation report is submitted on CD to the Heritage Council of NSW together with two (2) printed copies of the final excavation report. These reports are required in accordance with section 146(b) of the 'Heritage Act, 1977'. The Applicant must also ensure that further copies are lodged with the local library and/or another appropriate local repository in the area in which the site is located. It is also required that all digital resources (including reports, context and artefact data, scanned field notes, other datasets and documentation) should be lodged with a sustainable, online and open-access repository.
18. The Applicant must ensure that the information presented in a final excavation report includes the following:
 - a/. An executive summary of the archaeological programme;
 - b/. Due credit to the client paying for the excavation, on the title page;
 - c/. An accurate site location and site plan (with scale and north arrow) and including geo-reference data;
 - d/. Historical research, references, and bibliography;
 - e/. Detailed information on the excavation including the aim, the context for the excavation, procedures, treatment of artefacts (cleaning, conserving, sorting, cataloguing, labelling, scale photographs and/or drawings, location of repository) and analysis of the information retrieved;
 - f/. Nominated repository for the items;
 - g/. Detailed response to research questions (at minimum those stated in the Heritage Council approved Research Design);
 - h/. Conclusions from the archaeological programme. This information must include a reassessment of the site's heritage significance; statement(s) on how archaeological investigations at this site have contributed to the community's understanding of the sites; recommendations for the future management of the site and how much of the site remains undisturbed;
 - i/. Details of how this information about this excavation has been publicly disseminated (for example, provide details about Public Open Days and include copies of press releases, public brochures and information signs produced to explain the archaeological significance of the site).

This information is required in accordance with section 146(b) of the 'Heritage Act, 1977'.

	<p>affected by the proposed development and document these in the EIS. This may include the need for surface survey and test excavation. The identification of cultural heritage values should be guided by the <i>Guide to Assessing and Reporting on Aboriginal Cultural Heritage in NSW</i> (DECCW 2011) and consultation with OEH regional officers;</p> <ul style="list-style-type: none"> - where Aboriginal cultural heritage values are identified, consultation with Aboriginal people must be undertaken and documented in accordance with the <i>Aboriginal Cultural Heritage Consultation Requirements for Proponents 2010</i> (DECCW). The significance of cultural heritage values for Aboriginal people who have a cultural association with the land must be documented in the EIS; and - impacts on Aboriginal cultural heritage values are to be assessed and documented in the EIS. The EIS must demonstrate attempts to avoid impacts on cultural heritage values and identify any conservation outcomes. Where impacts are unavoidable, the EIS must outline measures proposed to mitigate impacts. Any objects recorded as part of the assessment must be documented and notified to OEH. <ul style="list-style-type: none"> • Historic Heritage – including: <ul style="list-style-type: none"> - the EIS must provide a Heritage Impact Assessment including, but not limited to, a statement of significance and assessment of impacts to State and local heritage including conservation areas, natural heritage areas, buildings, works, relics, gardens, landscapes, views and trees; - an archaeological study, including test excavations in is to be carried out on the site to identify any archaeological impacts associated with the proposal; and - where impacts to State or locally significant heritage items are identified, the assessment shall: <ul style="list-style-type: none"> ▪ outline the proposed mitigation and management measures (including measures to avoid significant impacts and an evaluation of the effectiveness of the mitigation measures) generally consistent with the <i>NSW Heritage Manual</i> (1996); ▪ be undertaken by a suitably qualified heritage consultant; ▪ include a statement of heritage impact for all heritage items (including significance assessment); ▪ consider impacts including, but not limited to, vibration , demolition, archaeological disturbance, altered historical arrangements and access, landscape and vistas and archaeological noise treatment (as relevant); ▪ where potential archaeological impacts have been identified, develop an appropriate archaeological assessment methodology, including research design, to guide physical archaeological test excavations and include the results of these test excavations; and ▪ address the recommendations in any archaeological zoning plan or archaeological management plan held by Liverpool City Council. • Bushfire– including: <ul style="list-style-type: none"> - assess the level of hazard posed to future development by the land or adjacent land and how the hazards may change as a result of development; and - address the requirements of <i>Planning for Bush Fire Protection 2006</i> (RFS) and in particular the provision of
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