



View southwest across the study area.

ABORIGINAL DUE DILIGENCE ASSESSMENT REPORT

RESIDENTIAL SUBDIVISION OF LOT 7025 DP1020631, LOT 7332 DP1166365, LOT 7317 DP1166614 AND WORKS WITHIN LOT 1 DP1077961

FORBES, NSW

JANUARY 2024

Report prepared by
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for NSW Land and Housing Corporation



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Acknowledgement

OzArk acknowledge the traditional custodians of the area on which this assessment took place and pay respect to their beliefs, cultural heritage, and continuing connection with the land. We also acknowledge and pay respect to the post-contact experiences of Aboriginal people with attachment to the area and to the Elders, past and present, as the next generation of role models and vessels for memories, traditions, culture and hopes of local Aboriginal people.

EXECUTIVE SUMMARY

OzArk Environment & Heritage (OzArk) has been engaged by ADW Johnson (the client), on behalf of NSW Land and Housing Corporation (LAHC) (the proponent) to complete an Aboriginal due diligence heritage assessment for a proposed residential subdivision of Lot 7025 DP1020631, Lot 7332 DP1166365, Lot 7317 DP1166614 and works within Lot 1 DP1077961 in Forbes, NSW (the proposal). The proposal is in the Forbes Shire Council Local Government Area.

The study area covers an area of approximately 12.3 hectares (ha) of land which will be subdivided into 100 new lots.

A search of the Aboriginal Heritage Information Management System (AHIMS) shows there are no previously recorded Aboriginal sites within or near the study area.

The visual inspection of the study area was undertaken by OzArk archaeologist, Brendan Fisher, on 7 June 2023. Lynne Bell from Peak Hill Local Aboriginal Land Council participated in the inspection.

No Aboriginal sites or potential archaeological deposits were recorded during the visual inspection of the study area.

The undertaking of the due diligence process resulted in the conclusion that the proposed works will have an impact on the ground surface, however, no Aboriginal objects or intact archaeological deposits will be harmed by the proposal. This moves the proposal to the following outcome:

Aboriginal Heritage Impact Permit application not necessary. Proceed with caution. If any Aboriginal objects are found, stop work, and notify Heritage NSW (02) 9873 8500 (heritagemailbox@environment.nsw.gov.au). If human remains are found, stop work, secure the site, and notify NSW Police and Heritage NSW.

To ensure the greatest possible protection to the area's Aboriginal cultural heritage values, the following recommendations are made:

- 1) The proposed work may proceed at the study area without further archaeological investigation under the following conditions:
 - a) All land and ground disturbance activities must be confined to within the study area. Should the parameters of the proposal extend beyond the assessed areas, then further archaeological assessment may be required.
 - b) All staff and contractors involved in the proposed work should be made aware of the legislative protection requirements for all Aboriginal sites and objects (**Appendix 2**).
- 2) This assessment has concluded that there is a low likelihood that the proposed work will adversely harm Aboriginal cultural heritage items or sites. If during works, however,

Aboriginal artefacts or skeletal material are noted, all work should cease and the procedures in the *Unanticipated Finds Protocol* (**Appendix 3**) should be followed.

- 3) Inductions for work crews should include a cultural heritage awareness procedure (**Appendix 2**) to ensure they recognise Aboriginal artefacts (**Appendix 4**) and are aware of the legislative protection of Aboriginal objects under the *National Parks & Wildlife Act 1974* and the contents of the *Unanticipated Finds Protocol*.
- 4) The information presented here meets the requirements of the *Due Diligence Code of Practice for the Protection of Aboriginal Objects in New South Wales*. It should be retained as shelf documentation for five years as it may be used to support a defence against prosecution in the event of unanticipated harm to Aboriginal objects.

CONTENTS

EXECUTIVE SUMMARY	III
1 INTRODUCTION	1
1.1 Brief description of the proposal.....	1
1.2 Study area	1
1.3 Assessment approach	4
2 ABORIGINAL DUE DILIGENCE ASSESSMENT	5
2.1 Introduction	5
2.2 Defences under the NPW Regulation 2019.....	5
2.2.1 Low impact activities	5
2.2.2 Disturbed lands.....	5
2.3 Application of the Due Diligence Code of Practice to the proposal	7
2.3.1 Step 1	7
2.3.2 Step 2a	9
2.3.3 Step 2b	11
2.3.4 Step 2c	13
2.3.5 Step 3	14
2.3.6 Step 4	15
2.4 Conclusion	17
3 MANAGEMENT RECOMMENDATIONS	18
REFERENCES	19
PLATES	20
APPENDIX 1: AHIMS SEARCH RESULTS	21
APPENDIX 2: ABORIGINAL CULTURAL HERITAGE AWARENESS PROCEDURE	22
APPENDIX 3: ABORIGINAL HERITAGE: UNANTICIPATED FINDS PROTOCOL	25
APPENDIX 4: ABORIGINAL HERITAGE: ARTEFACT IDENTIFICATION	26

FIGURES

Figure 1-1: Regional context of the study area for the proposal.	1
Figure 1-2: Aerial showing the study area.	2
Figure 1-3: Extent of works.	3
Figure 2-1: 2006 aerial showing historic ploughing within the study area.	6
Figure 2-2: 1965 aerial showing the study area.....	8

Figure 2-3: Previously recorded sites in relation to the study area.....	10
Figure 2-4: Survey coverage within the study area.....	16

TABLES

Table 2-1: Determination of whether Due Diligence Code of Practice applies.	7
Table 2-2: Site types and frequencies of AHIMS sites near the study area.	9
Table 2-3: Due Diligence Code of Practice application.....	17

PLATES

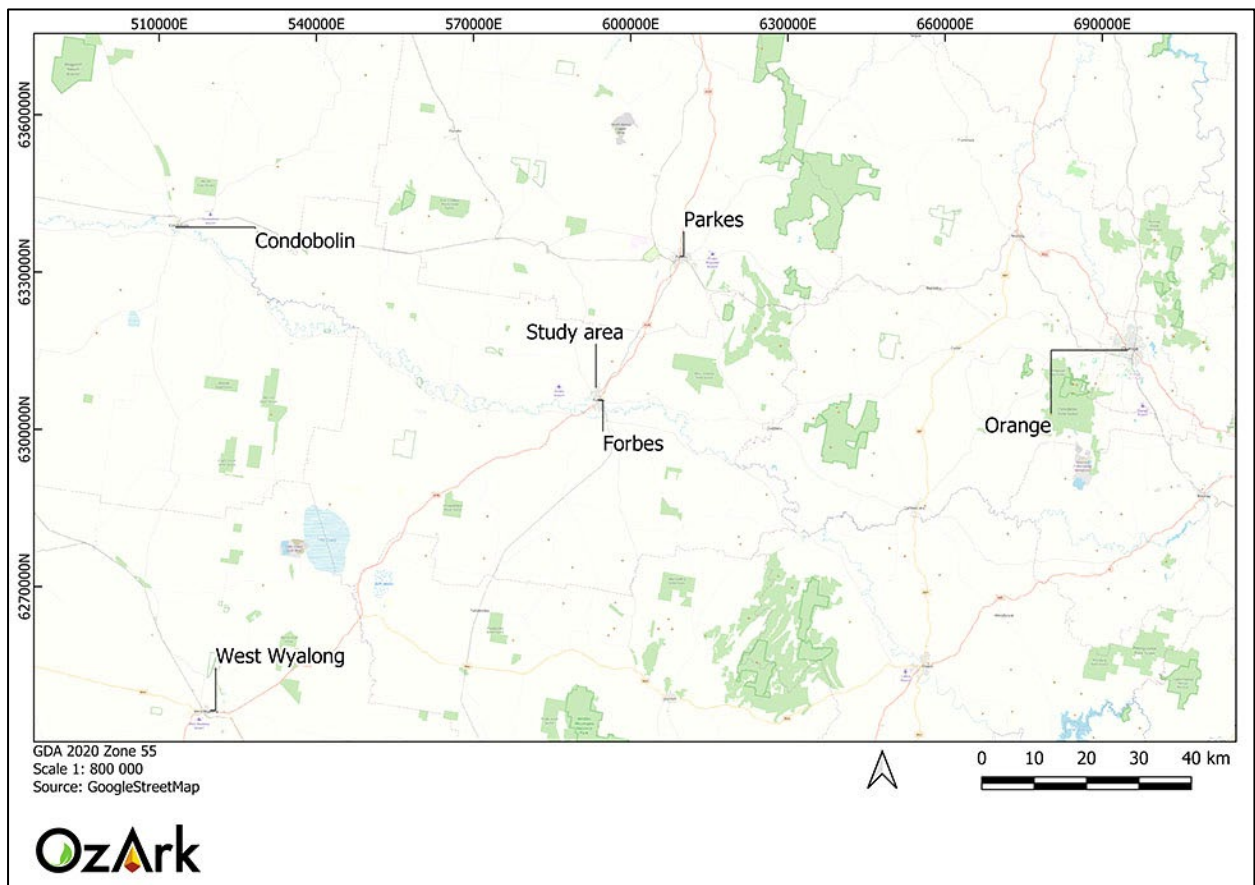
Plate 1: View west of existing study area disturbances.	20
Plate 2: View east of subsurface gas pipeline warning signs.....	20
Plate 3: View northeast of GSE on and off an unsealed track within the study area.	20
Plate 4: View north of increased GSV within an area of exposure.	20

1 INTRODUCTION

1.1 BRIEF DESCRIPTION OF THE PROPOSAL

OzArk Environment & Heritage (OzArk) has been engaged by ADW Johnson (the client), on behalf of the Land and Housing Corporation (LAHC) within the Department of Planning and Environment (the proponent) to complete an Aboriginal due diligence heritage assessment for a proposed residential subdivision of Lot 7025 DP1020631, Lot 7332 DP1166365, Lot 7317 DP1166614 and works within Lot 1 DP1077961 in Forbes, NSW (the proposal). The proposal is in the Forbes Shire Council Local Government Area (LGA) (**Figure 1-1**).

Figure 1-1: Regional context of the study area for the proposal.



1.2 STUDY AREA

The study area includes approximately 12.0 hectares (ha) of land across Lot 7332 DP1166365, Lot 7025 DP1020631, Lot 7317 DP1166614 and works within Lot 1 DP1077961, on the northern outskirts of Forbes. The study area also includes adjoining parts of Watson Close, Upper Morton, Lower Morton, York, Dawson, Belah and Farnell Streets.

The study area is shown on **Figure 1-2** and extent of works is shown in **Figure 1-3**.

Figure 1-2: Aerial showing the study area.

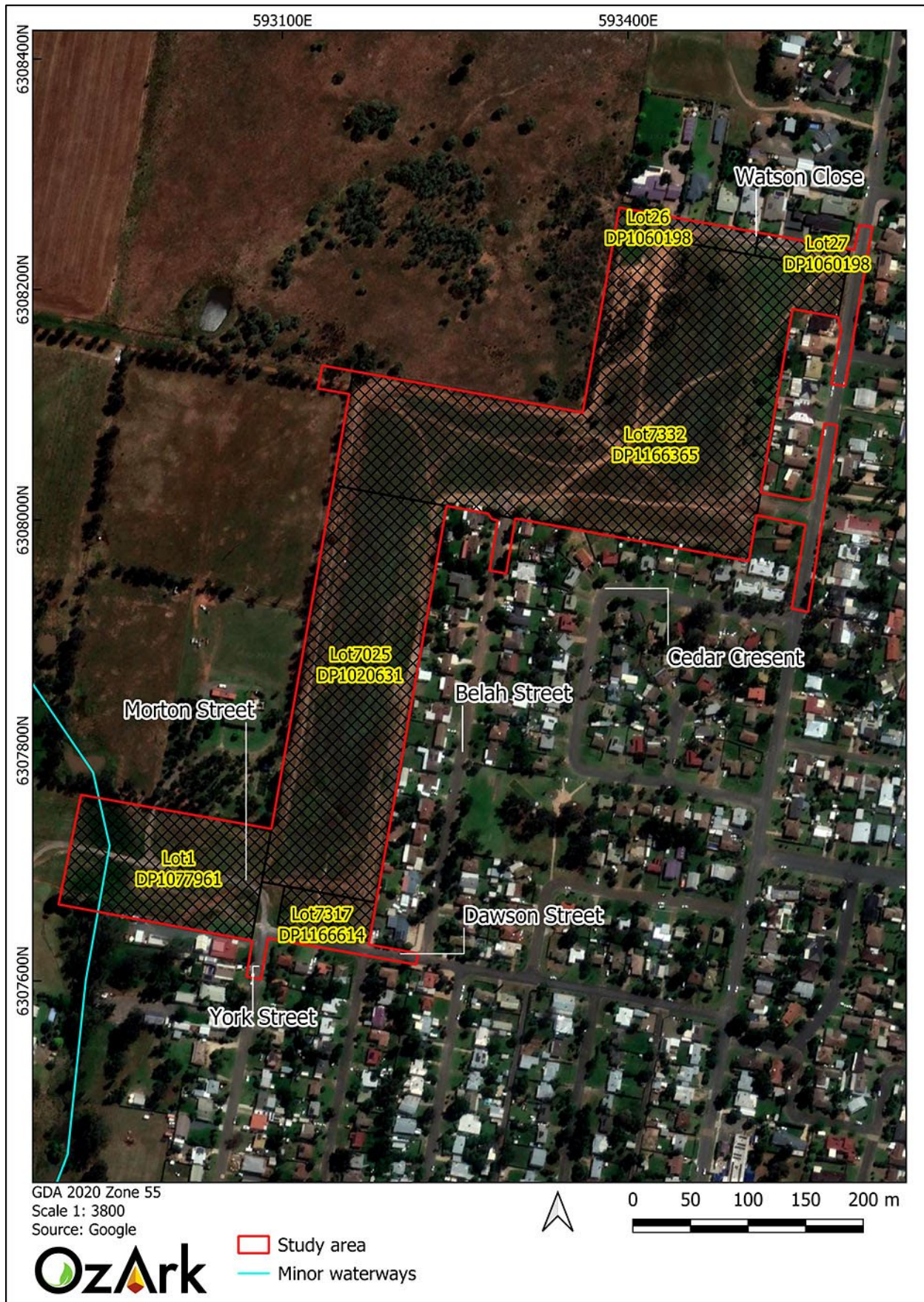
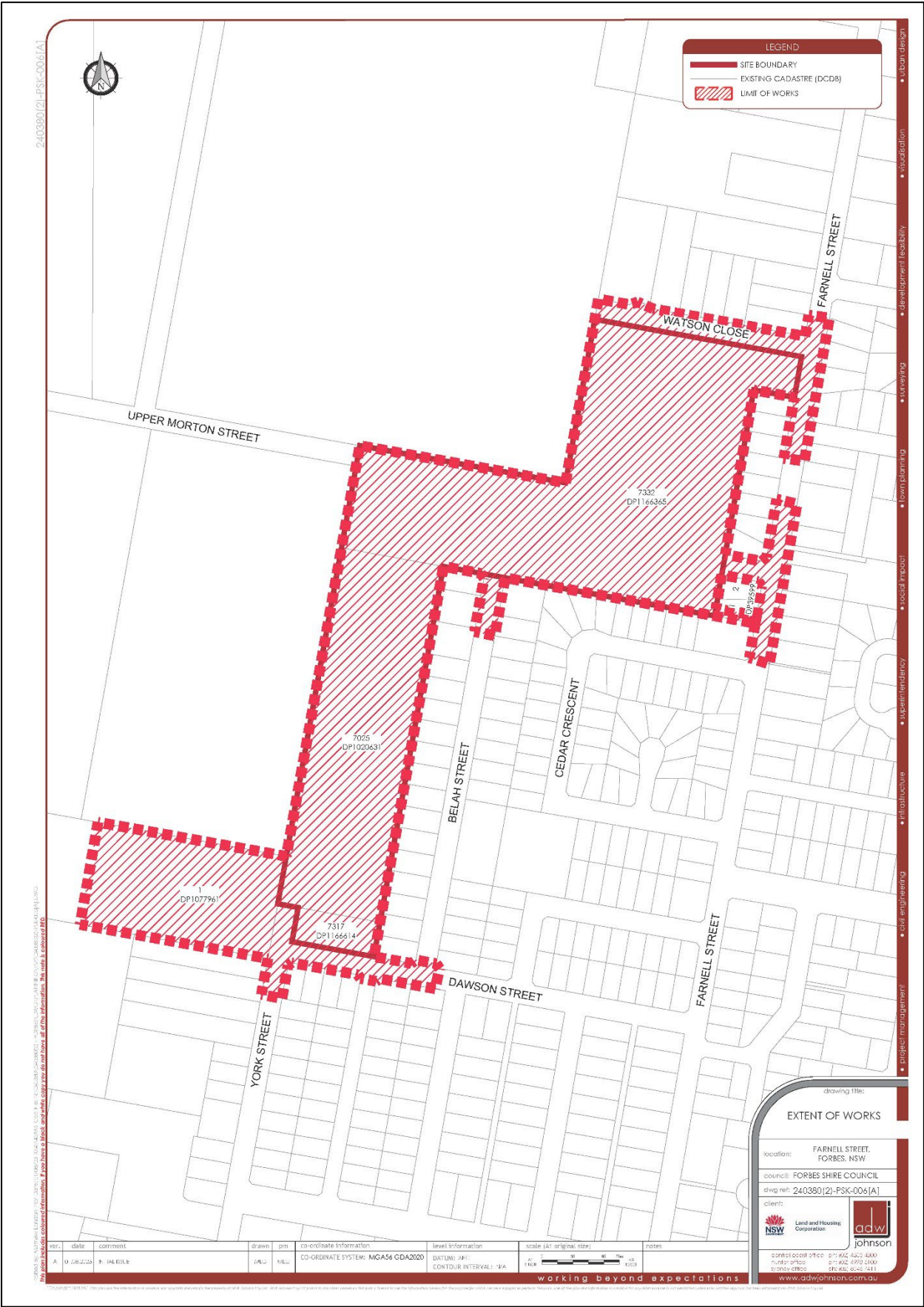


Figure 1-3: Extent of works.



1.3 ASSESSMENT APPROACH

The desktop and visual inspection component for the study area follows the *Due Diligence Code of Practice for the Protection of Aboriginal Objects in New South Wales* (due diligence; DECCW 2010). The field inspection followed the *Guide to Investigating, Assessing and Reporting on Aboriginal Cultural Heritage in New South Wales* (OEH 2011).

2 ABORIGINAL DUE DILIGENCE ASSESSMENT

2.1 INTRODUCTION

Section 57 of the National Parks and Wildlife Regulation 2019 (NPW Regulation) made under the *National Parks and Wildlife Act 1974* (NPW Act) advocates a due diligence process to determining likely impacts on Aboriginal objects. Carrying out due diligence provides a defence to the offence of harming Aboriginal objects and is an important step in satisfying Aboriginal heritage obligations in NSW.

2.2 DEFENCES UNDER THE NPW REGULATION 2019

2.2.1 Low impact activities

The first step before application of the due diligence process itself is to determine whether the proposed activity is a “low impact activity” for which there is a defence in the NPW Regulation. The exemptions are listed in Section 58 of the NPW Regulation (DECCW 2010: 6).

The proposed activities are not considered ‘low impact activities’ as earthworks associated with subsequent residential dwelling and associated infrastructure (i.e. roads, sewer and water lines) will impact the ground surface. Therefore, the due diligence process must be applied.

2.2.2 Disturbed lands

Relevant to this process is the assessed levels of previous land-use disturbance.

The NPW Regulation Section 58 (DECCW 2010: 18) define disturbed land as follows:

Land is disturbed if it has been the subject of a human activity that has changed the land’s surface, being changes that remain clear and observable.

Examples include ploughing, construction of rural infrastructure (such as dams and fences), construction of roads, trails and tracks (including fire trails and tracks and walking tracks), clearing vegetation, construction of buildings and the erection of other structures, construction or installation of utilities and other similar services (such as above or below ground electrical infrastructure, water or sewerage pipelines, stormwater drainage and other similar infrastructure) and construction of earthworks.

Aerial imagery of the study area dating to 2006 shows most of the study area within the lots has been subject to ploughing (**Figure 2-1**). Further, parts of the study area have been impacted by the construction of sealed roads and graded tracks. Therefore, it could be considered that most of the proposed work is occurring in ‘disturbed land’.

However, apart from these disturbances' sections of the proposed work, particularly in the northwest portion of Lot 7332 DP1166365, are not in an area where the land's surface has been changed in a clear and observable manner and the due diligence process must be applied.

Figure 2-1: 2006 aerial showing historic ploughing within the study area.



In summary, it is determined that the proposal must be assessed under the Due Diligence Code of Practice. The reasoning for this determination is set out in **Table 2-1**.

Table 2-1: Determination of whether Due Diligence Code of Practice applies.

Item	Reasoning	Answer
Is the activity to be assessed under Division 4.7 (state significant development) or Division 5.2 (state significant infrastructure) of the EP&A Act?	The proposal will be assessed under Part 5 of the EP&A Act.	No
Is the activity exempt from the NPW Act or NPW Regulation?	The proposal is not exempt under this Act or Regulation.	No
Do either or both apply: Is the activity in an Aboriginal place? Have previous investigations that meet the requirements of this Code identified Aboriginal objects?	The activity will not occur in an Aboriginal place. No previous investigations have been undertaken for this proposal.	No
Is the activity a low impact one for which there is a defence in the NPW Regulation?	The proposal is not a low impact activity for which there is a defence in the NPW Regulation.	No
Is the activity occurring entirely within areas that are assessed as 'disturbed lands'?	The proposal is not entirely within areas of high modification.	No
Due Diligence Code of Practice assessment is required		

2.3 APPLICATION OF THE DUE DILIGENCE CODE OF PRACTICE TO THE PROPOSAL

To follow the generic due diligence process, a series of steps in a question/answer flowchart format (DECCW 2010: 10) are applied to the proposed impacts and the study area, and the responses documented.

2.3.1 Step 1

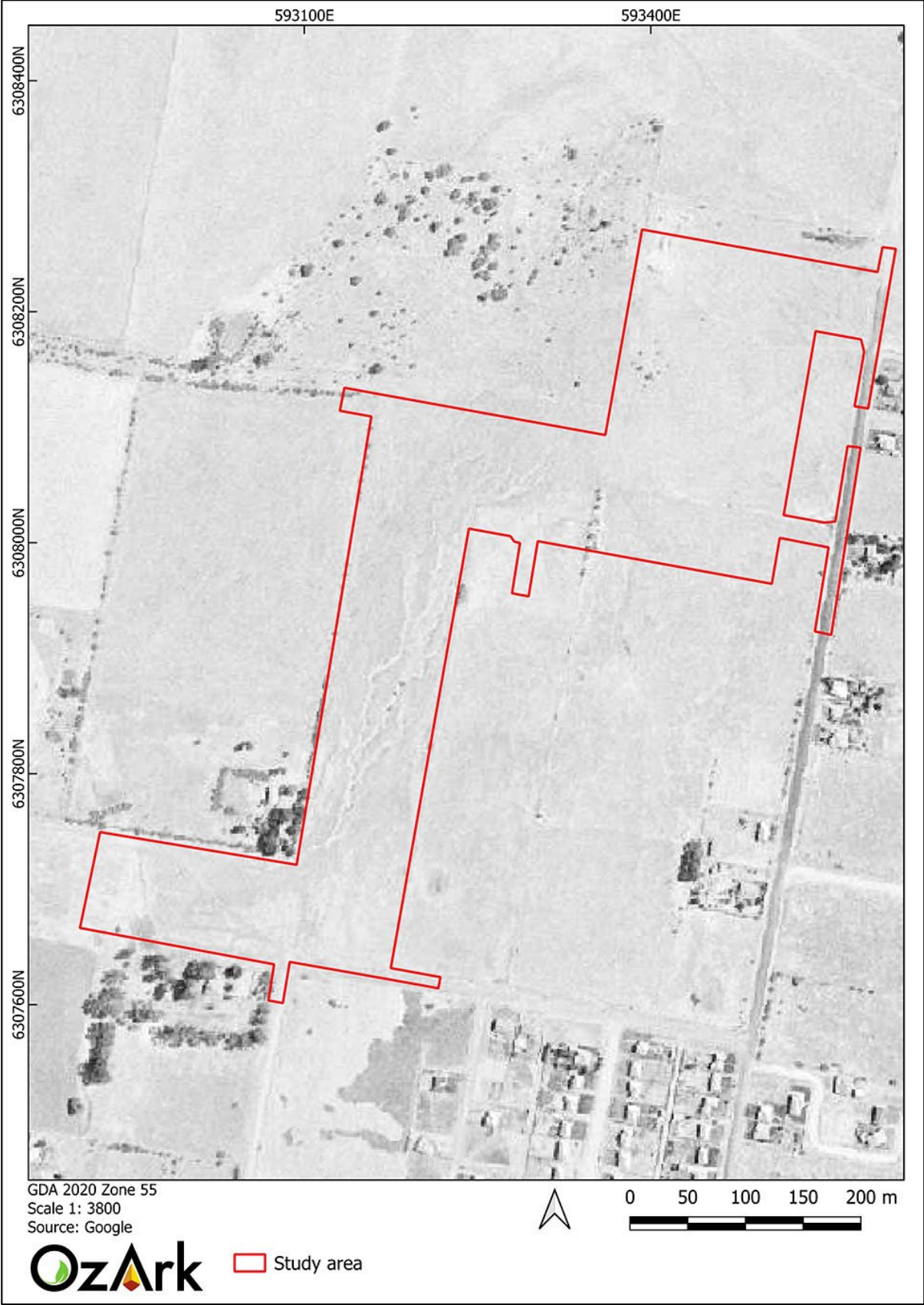
Will the activity disturb the ground surface or any culturally modified trees?

Yes, the proposal will impact the ground surface and may impact culturally modified trees, if present.

The proposed housing subdivision will create 100 new lots. Earthworks associated with the construction of foundations required for each individual dwelling will disturb the ground surface through excavation by earthmoving machinery. Additionally, construction and installation of services such as roads, sewer, water and power lines will require earthworks.

Aerial imagery of the study area from 1965 shows most of the study area has been historically cleared, excluding a north-south line of trees in the south of Lot 7332 DP1166365 and a small patch in the northwest of the lot (**Figure 2-2**). Current aerial imagery of the study area (**Figure 1-2**) shows the north-south line of trees is no longer present. Therefore, the potential for culturally modified trees is very low. The only area with potential for culturally modified trees is in the northwest portion of Lot 7332 DP1166365.

Figure 2-2: 1965 aerial showing the study area.



2.3.2 Step 2a

Are there any relevant confirmed site records or other associated landscape feature information on AHIMS?

No, there are no previously recorded sites within the study area.

A search of the Aboriginal Heritage Information Management System (AHIMS) on 5 June 2023 was undertaken over a 10 x 10 kilometre (km) search area (GDA Zone 55 Eastings: 588315–598315, Northings 6303037–6313037). The search returned 24 previously recorded Aboriginal sites within the search area however, none are within the study area (**Figure 2-3**).

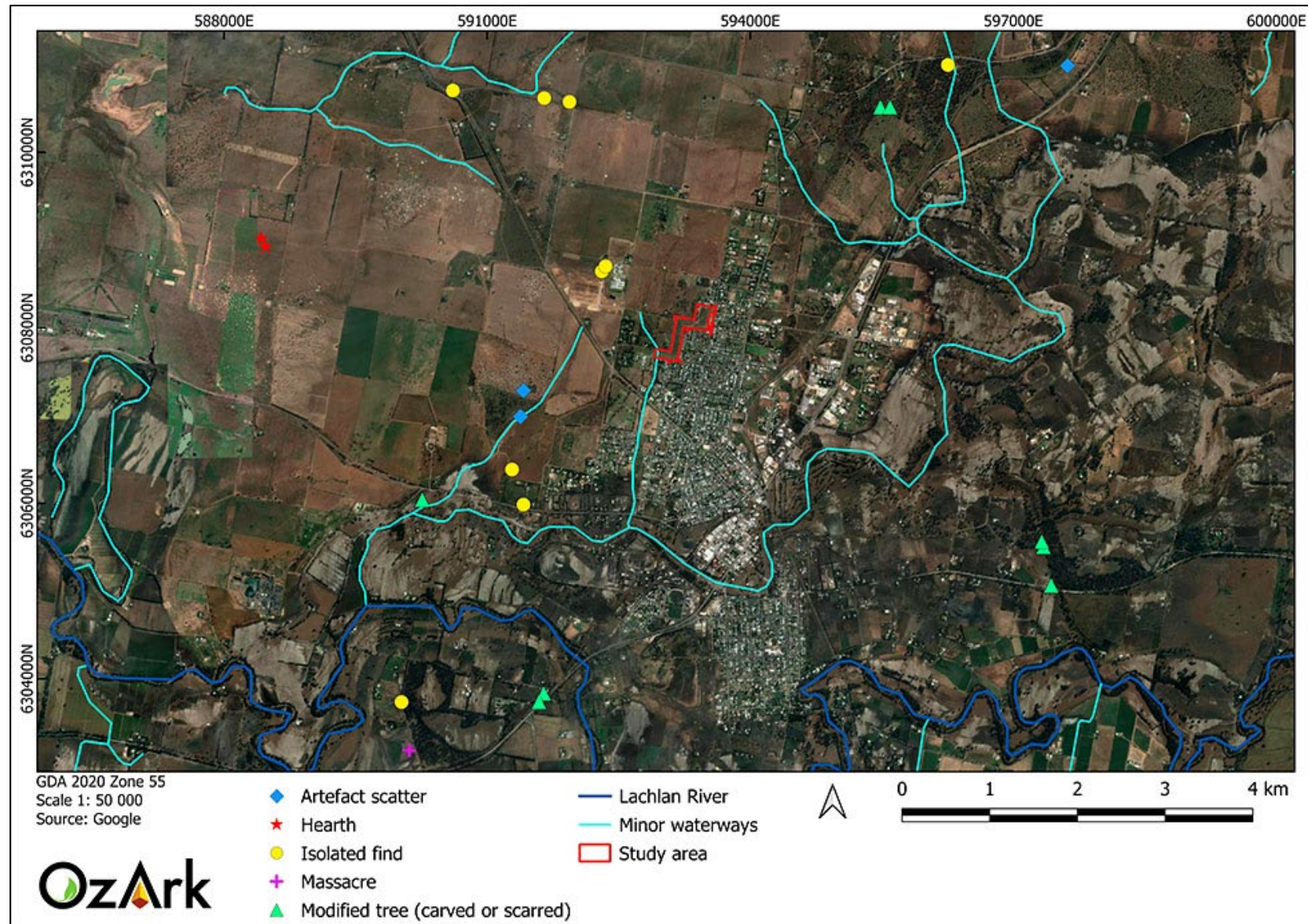
Results from the AHIMS search suggest modified trees (carved or scarred) and isolated finds are equally the most likely site type to be recorded in the region (n=9, 37.5%), followed by artefact scatters (n=3, 12.5%) (**Table 2-2**). Culturally modified trees have been recorded along road corridors where mature native vegetation remains, whereas open sites (i.e. artefact scatters and isolated finds) have been largely recorded in relation to ephemeral waterways throughout the region.

The closest recorded Aboriginal site to the study area is an isolated find located in a ploughed paddock approximately 1 km to the northwest (**Figure 2-3**). The context in which this isolated find was located demonstrates the ability for Aboriginal sites, specifically isolated finds, to remain in landforms which have undergone previous ground disturbance such as ploughing. Isolated finds and / or low-density artefact scatters are more likely to be present than other Aboriginal site types in the study area and will be in secondary contexts due to levels of disturbance. Scarred trees are considered very unlikely to be present due to past land clearance.

Table 2-2: Site types and frequencies of AHIMS sites near the study area.

Site Type	Number	% Frequency
Culturally modified tree (carved or scarred)	9	37.5
Isolated find	9	37.5
Artefact scatter	3	12.5
Hearth	2	8.3
Massacre site	1	4.2
Total	24	100

Figure 2-3: Previously recorded sites in relation to the study area.



2.3.3 Step 2b

Are there any other sources of information of which a person is already aware?

No, there are no other sources of information that would indicate the presence of Aboriginal objects in the study area.

2.3.3.1 *Ethnohistoric context*

The proposal is in the centre of Wiradjuri land. The Wiradjuri tribal area extends as far north as Gilgandra, as far east as Lithgow and as far west as Hay. It is the largest tribal and linguistic group in NSW by land size and incorporates a large portion of the central tablelands and central west regions of NSW (Horton 1996).

The ethnographic information recorded by colonial explorers in the region, such as Oxley and Cunningham in the early 1800s, indicates that Wiradjuri people near the Lachlan River lived in both small groups and some larger groups that comprised of up to 120 individuals. Wiradjuri people hunted local species of kangaroo, emu, and possum as a source of food. Fishing was also utilised to sustain the population with both mussels and freshwater fish being caught by women who used moveable dams made of grasses to direct fish, making them easier to catch (Kass 2003:6).

2.3.3.2 *Regional archaeological context*

Koettig 1985

Koettig focussed more heavily on Aboriginal occupation around the town of Dubbo, however the patterns and trends she recorded are still relevant to the Forbes study area. She concluded that artefact scatters, scarred trees and grinding grooves were the most frequently recorded site type in the region. The location and size of a particular site was determined to be dependent on both social and environmental factors including proximity to water, availability of food and geological formations. Koettig's predictive model concluded that all site types were more likely to be recorded along waterways except scarred trees and 'small' campsites, which could occur anywhere. Koettig also found that grinding grooves could only occur where appropriate rock outcropping was present.

OzArk 2016

A 2016 study analysing site distribution across the central west region of NSW concluded that most Aboriginal site recordings occur within Channel and Floodplain landscapes. Within these landscapes, modified trees are the most likely site type to be recorded. The report also found a strong correlation between site location and proximity to water.

As the study area is situated within the Calarie Plains landscape unit (Mitchell 2002), the results of OzArk 2016 suggest that there is a generally increased likelihood for scarred trees to be present within the landscape unit and therefore the study area. However, due to the near absence of trees in the study area are not expected.

OzArk 2021a

The cultural heritage study was conducted to identify places and items of Aboriginal cultural heritage throughout the Lachlan Shire LGA which is located directly west of the Forbes Shire LGA. The report focussed on an extensive area which consisted of 14,970 square kilometres and included the towns of Lake Cargelligo, Bucher, Condobolin, and Tottenham.

The report assessed a series of landscapes including channels, floodplains, slopes and ridges as well as previous land use on these landforms. When coupled with data found by an AHIMS search of the study area, the report was able to categorise the potential for Aboriginal objects to be present. Areas of high, moderate and low archaeological potential were established.

Zones of high archaeological potential included landforms within 200 m of natural water sources, 50 m of a previously recorded AHIMS site, within a channel or floodplain landform or conservation areas. However, areas which had undergone high impact land use were excluded from this category. Moderate archaeological potential areas included plains and downs landforms or within grazing native pastures category. Areas of low archaeological potential included all areas that did not satisfy either the requirements to meet the moderate or high archaeological potential zones.

Several conclusions can be drawn from the predictive model such as:

- 43.87% of all AHIMS sites in the Lachlan LGA are within 200 m of a natural waterway, however 24% are located over 1 km from any discernible water source
- Aboriginal sites are most likely to be recorded in river channels, floodplains and wetlands
- Most sites have been recorded where accumulated impacts on the ground surface have been categorised as low-moderate.
- Most sites are recorded in areas where the land use category is either production from relatively natural environments or conservation and natural environments. The less destructive nature of these previous land uses can aid in the preservation of sites considerably.

2.3.3.3 *Local archaeological context*

OzArk 2011

An Aboriginal heritage assessment was completed for a proposed Forbes to West Jemalong 66 kilovolt (kV) transmission line project in 2011. The transmission line study area extended from the township of Forbes approximately 1.4 km east of the current study area to an area south of Bedgerabong largely following the Lachlan Valley Way Road corridor.

The visual inspection identified four previously unrecorded scarred trees along the proposed transmission line (FJ-ST1, FJ-ST2, FJ-ST3, FJ-ST4). The scars present varied in physical dimensions, ranging from 35 centimetres (cm) to 2 m in length. Three scarred trees were identified as inland grey box as well as a single bumble box tree.

OzArk 2018

A due diligence assessment report was conducted for the proposed expansion of the Forbes Aerodrome located 5.8 km west of the current study area. The visual inspection located two previously unrecorded Aboriginal sites (Mickey's Plains Creek IF-1 and Mickey's Plain Creek OS-1). Both sites were recorded within 100 m of Mickey's Plain Creek.

Mickey's Plain Creek IF-1 consists of a single silcrete flaked piece, whereas Mickey's Plain Creek OS-1 consists of four stone artefacts including two silcrete flakes, one silcrete flaked piece and one chert core. Both sites were in areas of erosion which increased ground surface visibility.

OzArk 2021b

The due diligence assessment covered an area of 35 ha of land at Lot 5 DP1085767 located 660 m west of the current study area for the Goldridge Estate housing subdivision in 2021. The report produced a brief predictive modelling regarding the 2021 study area and wider Forbes region. It predicted that there is low to moderate potential for Aboriginal sites to be recorded due to the absence of mature native vegetation and landforms with identified archaeological sensitivity.

No previously unrecorded Aboriginal sites were identified; however two previously recorded sites (A-IF-1 and A-IF-2) were located. Both sites are located approximately 1 km west of the study area and constitute the closest Aboriginal sites to the current study area.

2.3.4 Step 2c

Are there any landscape features that are likely to indicate presence of Aboriginal objects?

No, the study area does not contain landforms with identified archaeological sensitivity.

The Due Diligence Code of Practice (DECCW 2010) refers to several landscape features which have higher potential to contain Aboriginal objects. These include:

- Within 200 m of waters
- Located within a sand dune system
- Located on a ridge top, ridge line or headland
- Located within 200 m below or above a cliff face
- Within 20 m of or in a cave, rock shelter, or a cave mouth

on land that is not disturbed land.

An ephemeral drainage line associated with the Lachlan River extends through the southwestern extent of the study area. However, all portions of the study area within 200 m of this drainage line are 'disturbed land' (**Section 2.2.2**) and therefore the study area does not contain landforms with identified archaeological sensitivity in accordance with the Due Diligence Code of Practice.

The study area is situated on a gentle slope within the Calarie Plains landscape unit (Mitchell 2002). Generally, the Calarie Plains are characterised by undulating low hills and rises with small areas of limestone outcrop. The elevation of the study area ranges from 262 m at its northern end and gradually decreases to 248 m in the southwest. Generally, vegetation within the landscape unit consists of open woodlands of red ironbark and grey box trees with a grassy understorey. However, previous vegetation clearance has removed most native vegetation, therefore significantly reducing the potential for culturally modified trees to be present within the study area.

The southwestern portion of the study area has an increased likelihood of recording open sites such as isolated finds and artefact scatters as it is situated closest to the nearby drainage line. Although this section of the study area has a marginally increased archaeological potential for the recording of Aboriginal sites, the overall potential of the study area is low due to the general absence of major waterways nearby. If present, archaeological material is likely to be in recorded in a secondary context due to the previous ground disturbing processes which have occurred at the study area.

A 'no' answer for Question 2 a-c, results in the following outcome (DECCW 2010: 10):

AHIP (Aboriginal Heritage Impact Permit) application not necessary. Proceed with caution. If any Aboriginal objects are found, stop work, and notify Heritage NSW (02) 9873 8500 (heritagemailbox@environment.nsw.gov.au). If human remains are found, stop work, secure the site, and notify NSW Police and Heritage NSW.

Although not required by the due diligence process, the proponent has elected to apply the precautionary principle and proceed to visual inspection of the study area (**Section 2.3.6**) in order to ground-truth the findings of the above desktop level assessment.

2.3.5 Step 3

Can harm to Aboriginal objects or disturbance of archaeologically sensitive landscape features be avoided?

Yes. Landforms with identified archaeological sensitivity will not be impacted by the proposal, nor will any known Aboriginal objects.

As no identified archaeological sensitive landforms or known Aboriginal objects are present within the study area, they will not be harmed by the proposal.

2.3.6 Step 4

Does a desktop assessment and visual inspection confirm that there are Aboriginal objects or that they are likely?

No, there are no Aboriginal objects within the study area.

The visual inspection of the study area was undertaken by OzArk archaeologist, Brendan Fisher, on 7 June 2023. Lynne Bell from Peak Hill Local Aboriginal Land Council participated in the inspection.

The study area was confirmed as being situated on a gently undulating landform which has undergone previous ground disturbances including sealed and unsealed road construction and grading, overhead electricity transmission lines and historic ploughing (**Plate 1**). Drainage culverts and subsurface gas pipelines are also present across the study area (**Plate 2**).

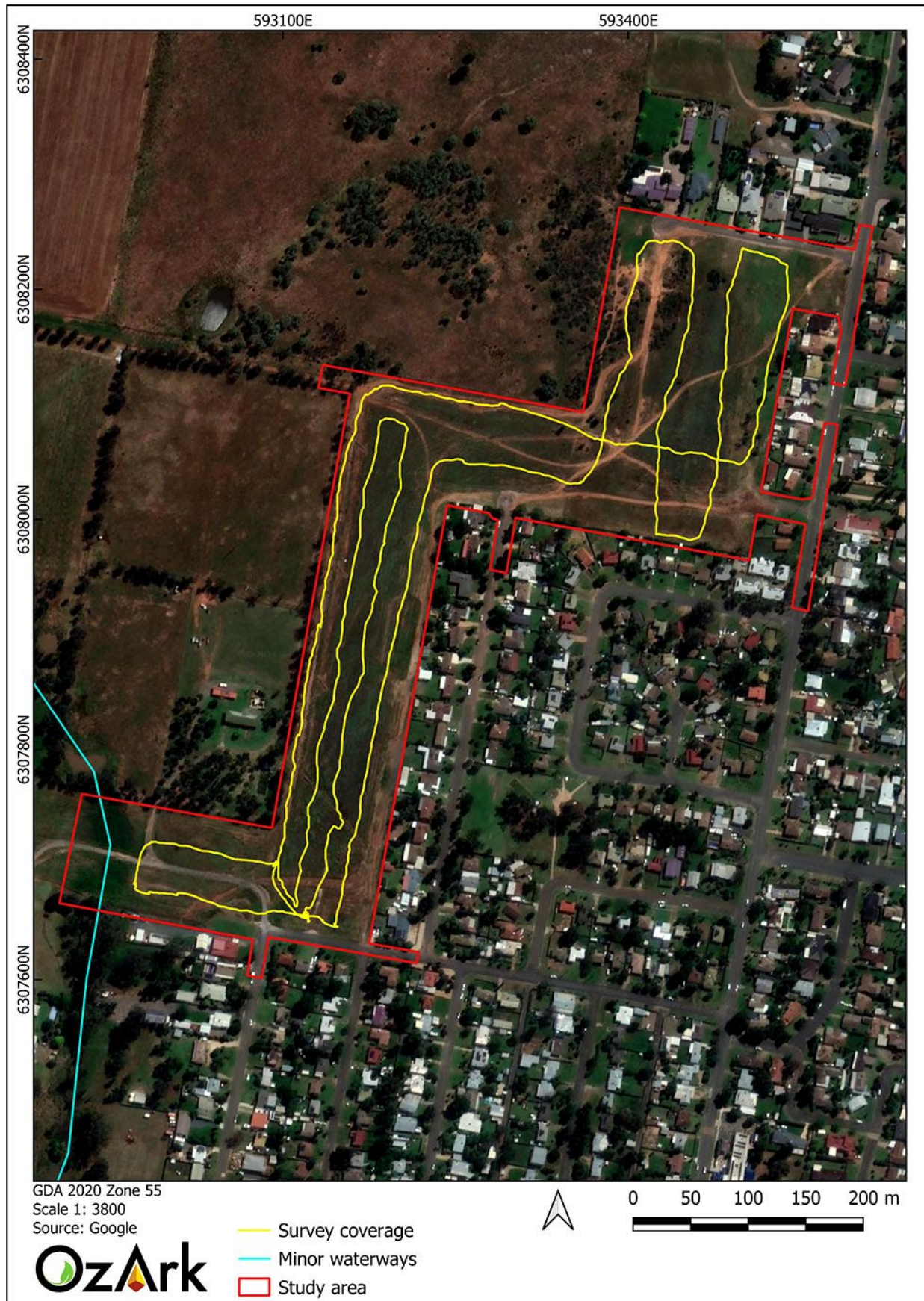
Vegetation largely consisted of thick ground cover in areas away from graded tracks with few immature trees and shrubs present. The inspection confirmed that there is no mature native vegetation extant within the study area.

The dense ground cover decreased the overall level of ground surface exposure (GSE) across the study area, averaging 10-20% (**Plate 3**). However, within larger areas of GSE such as along unsealed tracks, higher ground surface visibility (GSV) was observed, averaging 90-100% (**Plate 4**).

The entirety of the study area was adequately assessed, and no Aboriginal sites were identified. Further, the landforms present within the study area are considered to have low archaeological potential due to the lack of resources that would have attracted occupation (i.e. watercourses) and the previous levels of disturbance. As such, no landform with potential archaeological deposits were recorded.

The area covered during the visual inspection is shown on **Figure 2-4**.

Figure 2-4: Survey coverage within the study area.



2.4 CONCLUSION

The due diligence process has resulted in the outcome that an AHIP is not required. The reasoning behind this determination is set out in **Table 2-3**.

Table 2-3: Due Diligence Code of Practice application.

Step	Reasoning	Answer
Step 1 Will the activity disturb the ground surface or any culturally modified trees?	The proposed works will disturb the ground surface through earthworks required for the residential subdivision and associated services. The proposal may impact culturally modified trees, if present.	Yes
If the answer to Step 1 is 'yes', proceed to Step 2		
Step 2a Are there any relevant records of Aboriginal heritage on AHIMS to indicate presence of Aboriginal objects?	AHIMS indicated that there are no Aboriginal sites within the study area.	No
Step 2b Are there other sources of information to indicate presence of Aboriginal objects?	There are no other sources of information to indicate that Aboriginal objects are likely in the study area.	No
Step 2c Will the activity impact landforms with archaeological sensitivity as defined by the Due Diligence Code?	Landforms with identified archaeological sensitivity are not present within the study area, however the proponent has elected to apply the precautionary principle and proceed to visual inspection of the study area to ground truth the findings of the desktop level assessment.	No
If the answer to any stage of Step 2 is 'yes', proceed to Step 3		
Step 3 Can harm to Aboriginal objects listed on AHIMS or identified by other sources of information and/or can the carrying out of the activity at the relevant landscape features be avoided?	The proposal will not impact landforms with archaeological sensitivity or harm known Aboriginal objects. The proponent has elected to proceed to Step 4.	Yes
If the answer to Step 3 is 'no', a visual inspection is required. Proceed to Step 4.		
Step 4 Does the visual inspection confirm that there are Aboriginal objects or that they are likely?	The visual inspection recorded no Aboriginal objects in the study area. All landforms that were identified at a desktop level were confirmed to have low archaeological potential during the visual inspection.	No
Conclusion		
AHIP not necessary. Proceed with caution.		

3 MANAGEMENT RECOMMENDATIONS

The undertaking of the due diligence process resulted in the conclusion that the proposed works will have an impact on the ground surface, however, no Aboriginal objects or intact archaeological deposits will be harmed by the proposal. This moves the proposal to the following outcome:

Aboriginal Heritage Impact Permit application not necessary. Proceed with caution. If any Aboriginal objects are found, stop work, and notify Heritage NSW (02) 9873 8500 (heritagemailbox@environment.nsw.gov.au). If human remains are found, stop work, secure the site, and notify NSW Police and Heritage NSW.

To ensure the greatest possible protection to the area's Aboriginal cultural heritage values, the following recommendations are made:

- 1) The proposed work may proceed at the study area without further archaeological investigation under the following conditions:
 - a) All land and ground disturbance activities must be confined to within the study area. Should the parameters of the proposal extend beyond the assessed areas, then further archaeological assessment may be required.
 - b) All staff and contractors involved in the proposed work should be made aware of the legislative protection requirements for all Aboriginal sites and objects (**Appendix 2**).
- 2) This assessment has concluded that there is a low likelihood that the proposed work will adversely harm Aboriginal cultural heritage items or sites. If during works, however, Aboriginal artefacts or skeletal material are noted, all work should cease and the procedures in the *Unanticipated Finds Protocol* (**Appendix 3**) should be followed.
- 3) Inductions for work crews should include a cultural heritage awareness procedure (**Appendix 2**) to ensure they recognise Aboriginal artefacts (**Appendix 4**) and are aware of the legislative protection of Aboriginal objects under the *National Parks & Wildlife Act 1974* and the contents of the *Unanticipated Finds Protocol*.
- 4) The information presented here meets the requirements of the *Due Diligence Code of Practice for the Protection of Aboriginal Objects in New South Wales*. It should be retained as shelf documentation for five years as it may be used to support a defence against prosecution in the event of unanticipated harm to Aboriginal objects.

REFERENCES

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PLATES



Plate 1: View west of existing study area disturbances.



Plate 2: View east of subsurface gas pipeline warning signs.




Plate 3: View northeast of GSE on and off an unsealed track within the study area.



Plate 4: View north of increased GSV within an area of exposure.


APPENDIX 1: AHIMS SEARCH RESULTS

<div>  <div> AHIMS Web Services (AWS) Extensive search - Site list report </div> <div> Your Ref/PO Number : FACS Sub Client Service ID : 788389 </div> </div>										
SiteID	SiteName	Datum	Zone	Easting	Northing	Context	Site Status **	SiteFeatures	SiteTypes	Reports
43-2-0067	NIIVD-1F1	GDA	55	591940	6310576	Open site	Valid	Artefact : 1		
	Contact	Recorders						Permits		
43-2-0022	A-IF-2;	GDA	55	592308	6308644	Open site	Valid	Artefact : -	Isolated Find	3082
	Contact	Recorders						Permits		
43-3-0033	C-ST-3;	AGD	55	595370	6310330	Open site	Valid	Modified Tree (Carved or Scarred) :	Scarred Tree	
	Contact	Recorders						Permits		
43-3-0031	C-IF-1 (Forbes)	AGD	55	596140	6310810	Open site	Valid	Artefact : -	Isolated Find	3543
	Contact	Recorders						Permits		
43-2-0028	Toms Lagoon ST 2;	AGD	55	597230	6305320	Open site	Valid	Modified Tree (Carved or Scarred) :	Scarred Tree	
	Contact	Recorders						Permits		
43-2-0034	Cg-4(refer to site 39-2-0039)	AGD	55	588358	6308740	Open site	Deleted	Hearth : 1		
	Contact	Recorders						Permits		
43-2-0069	NHVV-1F3	GDA	55	590610	6310705	Open site	Valid	Artefact : 1		
	Contact	Recorders						Permits		
43-3-0064	GT scar tree 1	AGD	55	597318	6304878	Open site	Valid	Modified Tree (Carved or Scarred) :		
	Contact	Recorders						Permits		
43-3-0032	C-ST-1;	AGD	55	595370	6310330	Open site	Valid	Modified Tree (Carved or Scarred) :	Scarred Tree	
	Contact	Recorders						Permits		
43-3-0038	Bundaburrah Creek Massacre	AGD	55	590000	6303000	Open site	Valid	Conflict : -	Massacre	
	Contact	Recorders						Permits		
43-2-0063	Forbes-Jemalong Scarred Tree 1	GDA	55	590261	6306043	Open site	Valid	Modified Tree (Carved or Scarred) :		
	Contact	Recorders						Permits		
43-2-0023	A-IF-3;	AGD	55	591170	6306200	Open site	Valid	Artefact : -	Isolated Find	3082
	Contact	Recorders						Permits		
26-3-0015	A-US-2;Anglesey;	AGD	55	591300	6307100	Open site	Valid	Artefact : -	Open Camp Site	
	Contact	Recorders						Permits		
43-2-0024	A-IF-4;	AGD	55	591300	6305800	Open site	Valid	Artefact : -	Isolated Find	3082
	Contact	Recorders						Permits		
43-3-0186	DSF AS9	GDA	55	597619	6310986	Open site	Valid	Artefact : -		

Report generated by AHIMS Web Service on 05/06/2023 for Brendan Fisher for the following area at Datum :GDA, Zone : 55, Eastings : 588315.0 - 598315.0, Northings : 6303037.0 - 6313037.0 with a Buffer of 0 meters. Number of Aboriginal sites and Aboriginal objects found is 24

This information is not guaranteed to be free from error omission. Heritage NSW and its employees disclaim liability for any act done or omission made on the information and consequences of such acts or omission.

Page 1 of 2

<div>  <div> AHIMS Web Services (AWS) Extensive search - Site list report </div> <div> Your Ref/PO Number : FACS Sub Client Service ID : 788389 </div> </div>										
SiteID	SiteName	Datum	Zone	Easting	Northing	Context	Site Status **	SiteFeatures	SiteTypes	Reports
43-2-0031	GS-1F-1	AGD	55	589910	6303550	Open site	Valid	Artefact : -	Isolated Find	97833
	Contact	Recorders						Permits		
43-2-0068	NIIVD-1F2	GDA	55	591652	6310618	Open site	Valid	Artefact : 1		
	Contact	Recorders						Permits		
43-2-0025	A-US-1;	GDA	55	591381	6306991	Open site	Valid	Artefact : -	Open Camp Site	3082
	Contact	Recorders						Permits		
43-2-0032	GS-ST-1	AGD	55	591530	6303650	Open site	Valid	Modified Tree (Carved or Scarred) :	Scarred Tree	97833
	Contact	Recorders						Permits		
43-2-0026	A-IF-1;	GDA	55	592351	6308702	Open site	Valid	Artefact : -	Isolated Find	3082
	Contact	Recorders						Permits		
43-3-0034	C-ST-2;	AGD	55	595480	6310330	Open site	Valid	Modified Tree (Carved or Scarred) :	Scarred Tree	
	Contact	Recorders						Permits		
43-2-0033	Cg-5(refer to 39-2-0038)	AGD	55	588309	6308831	Open site	Deleted	Hearth : 1		
	Contact	Recorders						Permits		
43-2-0059	Forbes scar tree	GDA	55	591592	6303739	Open site	Valid	Modified Tree (Carved or Scarred) :		
	Contact	Recorders						Permits		
43-3-0035	Toms Lagoon;	AGD	55	597210	6305380	Open site	Valid	Modified Tree (Carved or Scarred) :	Scarred Tree	
	Contact	Recorders						Permits		

**** Site Status**

Valid - The site has been recorded and accepted onto the system as valid

Destroyed - The site has been completely impacted or harmed usually as consequence of permit activity but sometimes also after natural events. There is nothing left of the site on the ground but proponents should proceed with caution.

Partially Destroyed - The site has been only partially impacted or harmed usually as consequence of permit activity but sometimes also after natural events. There might be parts or sections of the original site still present on the ground

Not a site - The site has been originally entered and accepted onto AHIMS as a valid site but after further investigations it was decided it is NOT an aboriginal site. Impact of this type of site does not require permit but Heritage NSW should be notified

Report generated by AHIMS Web Service on 05/06/2023 for Brendan Fisher for the following area at Datum :GDA, Zone : 55, Eastings : 588315.0 - 598315.0, Northings : 6303037.0 - 6313037.0 with a Buffer of 0 meters. Number of Aboriginal sites and Aboriginal objects found is 24

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Page 2 of 2

APPENDIX 2: ABORIGINAL CULTURAL HERITAGE AWARENESS PROCEDURE

As per **Section 3**, the information contained below should be communicated to all works crews prior to undertaking work within the study area. This will ensure all work crews are:

- Aware of the legislative protection of Aboriginal objects under the *National Parks & Wildlife Act 1974* (the NPW Act)
- Aware of the legislative protection requirements for all Aboriginal sites and objects.
- Aware of the contents of the *Unanticipated Finds Protocol* (**Appendix 3**)
- Can recognise Aboriginal artefacts (**Appendix 4**).

Cultural heritage awareness procedure

- What is the NPW Act?
 - The NPW Act is the principal legislation for the protection, conservation and management of Aboriginal objects and places in NSW. An objective of the NPW Act is to conserve Aboriginal objects, places or features of cultural value, including, but not limited to places, objects and features of significance to Aboriginal people; places of social value to the people of NSW; and places of historic, architectural or scientific significance.
- What is an 'Aboriginal object'?
 - An 'Aboriginal object' is any deposit, object or material evidence (not being a handicraft made for sale), including Aboriginal remains, relating to the Aboriginal habitation of NSW, before or concurrent with occupation by non-Aboriginal people.
 - Note: there are no recorded Aboriginal sites or objects within the study area, however, there is low potential that objects may be encountered during ground disturbing works.
- What are offences under the NPW Act?
 - It is an offence under Section 86 of the NPW Act to 'harm or desecrate an object the person knows is an Aboriginal object'. It is also a strict liability offence to 'harm an Aboriginal object' or to 'harm or desecrate an Aboriginal place', whether knowingly or unknowingly. Section 87 of the Act provides a series of defences against the offences listed in Section 86, such as:
 - The harm was authorised by and conducted in accordance with the requirements of an Aboriginal Heritage Impact Permit (AHIP) under Section 90 of the Act
 - The defendant exercised 'due diligence' to determine whether the action would harm an Aboriginal object
 - The harm to the Aboriginal object occurred during the undertaking of a 'low impact activity' (as defined in the regulations).

- What is the *Due Diligence Code of Practice for the Protection of Aboriginal Objects in New South Wales*?
 - The (NPW Act) advocates applying Due Diligence to determine likely impacts on Aboriginal objects. Carrying out Due Diligence provides a defence to the offence of harming Aboriginal objects and is an important step in satisfying Aboriginal heritage obligations in NSW. It is a defence to the strict liability offence of harming an Aboriginal object if it can be shown that the defendant exercised due diligence in determining whether their actions would cause harm and it was reasonably determined that no Aboriginal object would be harmed (Section 87(2)).
 - Note that the due diligence defence does not apply to knowingly harming or desecrating an Aboriginal object.
 - This report demonstrates that Due Diligence has been applied for the proposed works.
- What should you do if you suspect you have encountered an 'Aboriginal object' or skeletal remains?
 - Any person who believes they have uncovered an Aboriginal site, object or skeletal remains must stop work immediately and follow the steps outlined in **Appendix 3** (*Unanticipated Finds Protocol*). Note: the contents of the *Unanticipated Finds Protocol* should be run through during the Aboriginal cultural heritage awareness training and a copy should be made available on site.
 - Work crews may also obtain a qualified opinion as to the find being Aboriginal in origin (more relevant to objects not potential human remains).
- How to recognise an 'Aboriginal object'?
 - Included in **Appendix 4** is a visual guide for identifying Aboriginal artefacts. Artefacts are considered the most likely site type to be encountered as they can be concealed under the ground cover and in subsurface deposits. Note: a copy of the artefact identification form should be made available on site.
- How to record an unanticipated find?
 - The below form includes information to be recorded should an unanticipated find be encountered during works within the study area.

*This form is intended for the use of work crews to document and assist in reporting to Heritage NSW a possible Aboriginal heritage site or place encountered during works. PLEASE NOTE artefacts and other material **should not be removed** from a site or place for reporting purposes.*

1) Date of the find: / / 20.....

2) Person making this report:

Name:

Company:

Supervisor:

Phone:

Email:

3) Supporting documentation

List and attach any photographs or other items supplied with this report (i.e. mud map of location)

4) Site Location (list the address or parcel of land (if known) and a co-ordinate (easting / northing)

5) Site type:

Additional information (if required):

APPENDIX 3: ABORIGINAL HERITAGE: UNANTICIPATED FINDS PROTOCOL

An Aboriginal artefact is anything which is the result of past Aboriginal activity. This includes stone (artefacts, rock engravings etc.), plant (culturally scarred trees) and animal (if showing signs of modification; i.e. smoothing, use). Human bone (skeletal) remains may also be uncovered while onsite.

Cultural heritage significance is assessed by the Aboriginal community and is typically based on traditional and contemporary lore, spiritual values, and oral history, and may also consider scientific and educational value.

Protocol to be followed if previously unrecorded or unanticipated Aboriginal object(s) are encountered:

1. If any Aboriginal object is discovered and/or harmed in, or under the land, while undertaking the proposed development activities, the proponent must:
 - a. Not further harm the object
 - b. Immediately cease all work at the particular location
 - c. Secure the area to avoid further harm to the Aboriginal object
 - d. Notify Heritage NSW as soon as practical on (02) 9873 8500 (heritagemailbox@environment.nsw.gov.au), providing any details of the Aboriginal object and its location; and
 - e. Not recommence any work at the particular location unless authorised in writing by Heritage NSW.
2. If Aboriginal burials are unexpectedly encountered during the activity, work must stop immediately, the area secured to prevent unauthorised access and NSW Police and Heritage NSW contacted.
3. Cooperate with the appropriate authorities and relevant Aboriginal community representatives to facilitate:
 - a. The recording and assessment of the find(s)
 - b. The fulfilment of any legal constraints arising from the find(s), including complying with Heritage NSW directions
 - c. The development and implementation of appropriate management strategies, including consultation with stakeholders and the assessment of the significance of the find(s).
4. Where the find(s) are determined to be Aboriginal object(s), recommencement of work in the area of the find(s) can only occur in accordance with any consequential legal requirements and after gaining written approval from Heritage NSW (normally an Aboriginal Heritage Impact Permit).

APPENDIX 4: ABORIGINAL HERITAGE: ARTEFACT IDENTIFICATION

	
A retouched silcrete flake	A quartz flake
	
Microliths (scale = 1 cm)	Volcanic flakes
	
Flake characteristics (scale = 1 cm)	A mudstone/tuff core from which flakes have been removed