

Appendix L

Archaeological Report

Insite Heritage Pty Ltd PO Box 98 Wangi Wangi NSW 2267 Ph/Fax 02 49755 818

insite@idl.net.au



Aboriginal Archaeological Assessment 222 Main Road – Toukley Proposed Seniors Living Development

Report to: ADW Johnson Pty Ltd

March 2009

Table of Contents

TABL	E OF CONTENTS	2
LIST (OF FIGURES	3
LIST (OF TABLES	3
	OF PLATES	
	UTIVE SUMMARY	
1.0	PROJECT OVERVIEW	
1.1	LOCATION	
1.2	PROJECT DETAILS	
1.3 1.4	COMMUNITY CONSULTATION	
2.0	ARCHAEOLOGICAL CONTEXT	
2.1	REGIONAL INDIGENOUS ARCHAEOLOGICAL CONTEXT	
2.2	LOCAL INDIGENOUS ARCHAEOLOGICAL CONTEXT	
2.3	AHIMS SEARCH	
2.4	PREDICTIVE MODEL OF ARCHAEOLOGICAL POTENTIAL	
3.0	ARCHAEOLOGICAL SURVEY	18
3.1	Survey Objective	18
3.2	Survey Details	18
3.3	Survey Results	18
4.0	SIGNIFICANCE OF IDENTIFIED SITES	20
4.1	SIGNIFICANCE CRITERIA	20
	Scientific Significance	
	Public Significance	
	Cultural Significance	
	Representative Significance Significance Significance Significance	
4.2		
5.0	LEGISLATION	
6.0	MANAGEMENT RECOMMENDATIONS & CONCLUSION	24
7.0	PLATES	25
8.0	GLOSSARY	29
9.0	REFERENCES	33
APPE	NDIX A COMMUNITY CONSULTATION LOG	34
APPE	NDIX B – PROJECT ADVERTISEMENTS	36
APPE	NDIX C - COMMUNITY REPORTS	37

Cover plate – View north over study area.

List of Figures

FIGURE 1 LOCATION MAP	
FIGURE 2 PROPOSED SENIORS LIVING DEVELOPMENT - GROUND LEVEL	7
FIGURE 3 PROPOSED SENIORS LIVING DEVELOPMENT – LEVEL 1	8
FIGURE 4 PROPOSED SENIORS LIVING DEVELOPMENT – LEVEL 2	9
FIGURE 5 PROPOSED SENIORS LIVING DEVELOPMENT – LEVEL 3	10
FIGURE 6 PROPOSED SENIORS LIVING DEVELOPMENT – LEVEL 4	
FIGURE 7 PROPOSED SENIORS LIVING DEVELOPMENT – SECTION PLAN	
FIGURE 8 LOCATION OF RECORDED SITES IN PROXIMITY TO THE STUDY AREA	17
FIGURE 9 ADVERTISEMENT PLACED IN THE CENTRAL COAST EXPRESS ADVOCATE 20.02.09	36
List of Tables Table 1 Survey Details	19
List of Plates	
PLATE 1 SOUTH WESTERN END OF STUDY AREA FACING NORTH EAST (SA1)	25
PLATE 2 SOUTHERN PORTION OF STUDY AREA FACING NORTH (SA3)	25
PLATE 3 SA1 FACING NORTH - CONCRETE DRIVE/SLIPWAY TO RIGHT, FORESHORE TO THE NORTH	Ⅎ26
PLATE 4 CONCRETE RETAINING WALLS FACING SOUTH WEST	
PLATE 5 FORESHORE AREA, SA2 FACING WEST	27
PLATE 6 FORESHORE AREA (SA2) FACING WEST.	
PLATE 7 RESIDENTIAL DWELLING (STILL OCCUPIED) NOT SURVEYED, FACING EAST	28
PLATE 8 BREAK OF SLOPE FACING WEST, NOTE CUT/DISTURBANCE INTO HILLSIDE	

Executive Summary

Insite Heritage Pty Ltd has been commissioned by ADW Johnson Pty Ltd to conduct an Aboriginal archaeological assessment at 222 Main Road, Toukley, NSW for a proposed seniors living development.

The study area comprises an area of approximately 5000m². Foot surveys were conducted across the study area which was found to be highly disturbed from previous development. Disturbances included concrete driveways, fill, retaining walls cut into the hill side, building debris, levelled areas and sewer mains.

The survey did not identify any items Aboriginal archaeological sites or artefacts or any areas of potential subsurface archaeological deposits. Due to the highly disturbed nature of the study area the survey did not identify any further Aboriginal archaeological constraints regarding the proposed seniors living development.

The authors of this report are Angela Besant and Elizabeth Wyatt of Insite Heritage Pty Ltd.

1.0 Project Overview

1.1 Location

The study area is located at 222 Main Road, Toukley, County of Spencer, Parish of Wallarah, County of Northumberland. Budgewoi Lake forms the northern boundary of the property whilst the southern boundary lies adjacent to Main Road. Toukley Gardens Park is located to the east of the allotment and the Beachcomber Hotel lies adjacent to the western boundary (see Figure 1 below). The study area lies within the boundaries of Darkinjung Local Aboriginal Land Council.

1.2 Project Details

The proposed development seeks to develop the study area into a multi storey Seniors Living Development comprising of approximately fifty one and two bedroom units, car parking facilities and open space (see Figures 2 – 7 below).

1.3 Community Consultation

Community consultation for the project was conducted in accordance with DECC (Department of Environment & Climate Change) guidelines (DECC 2005).

Letters of notification of the project and a request for the contact details of Aboriginal stakeholder groups who may have an interest in the project were sent to DECC,, NSW Native Title Services, Office of the State Registrar and Wyong Shire Council. An invitation to register interest in the project was also sent to Darkinjung Local Aboriginal Land Council and Guringai Tribal Link.

An advertisement of the project inviting registrations of interest from Aboriginal community stakeholder groups or individuals was placed in the public notices section of the Central Coast Express Advocate (see Appendix A).

The field work was conducted with Tracey Howie, chairperson, Guringai Tribal Link. All registered stakeholders will receive a copy of the draft archaeological assessment for their review and comment. See Appendix A for Community Consultation Log and Appendix C for Community Reports.



Figure 1 Location Map

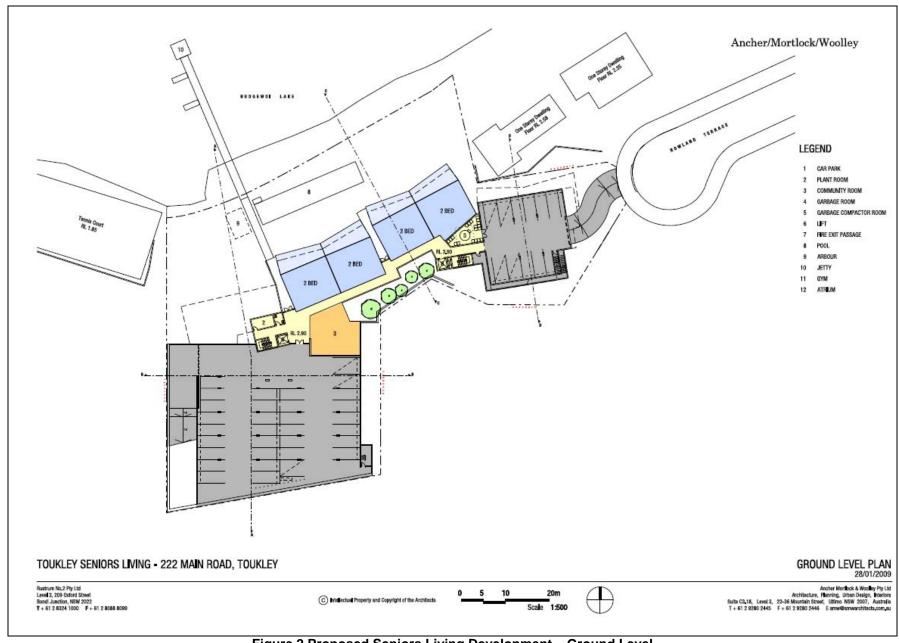


Figure 2 Proposed Seniors Living Development – Ground Level

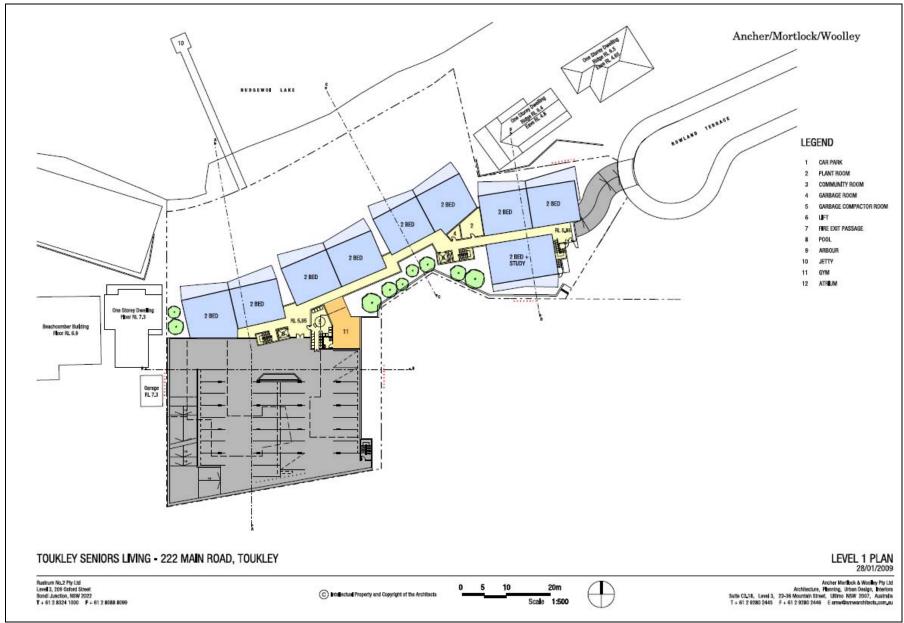


Figure 3 Proposed Seniors Living Development – Level 1

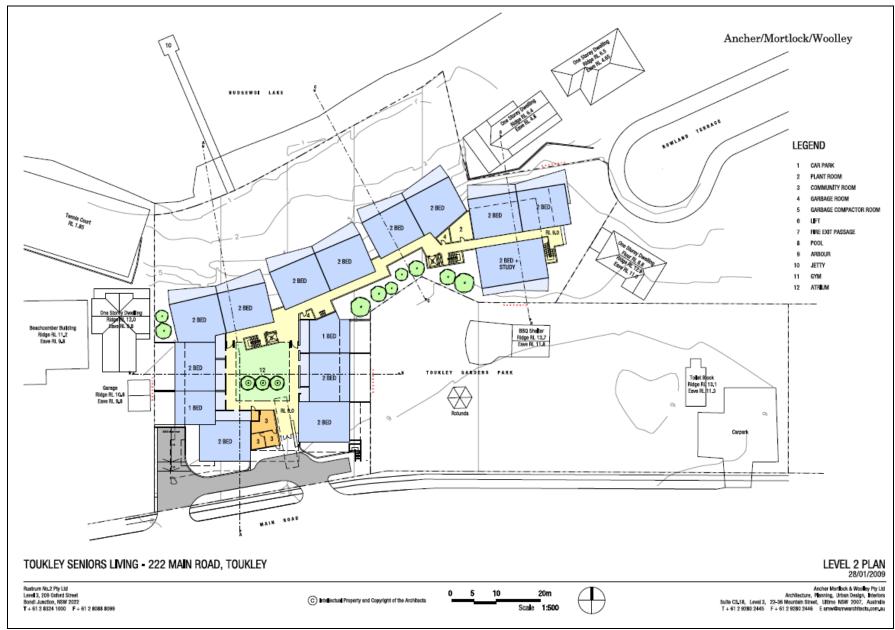


Figure 4 Proposed Seniors Living Development – Level 2



Figure 5 Proposed Seniors Living Development – Level 3

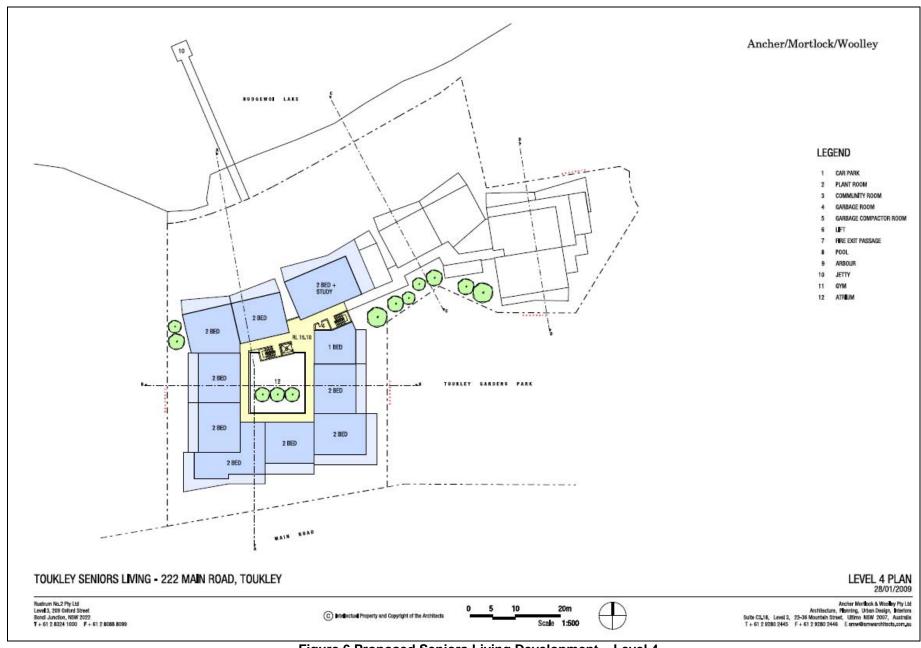


Figure 6 Proposed Seniors Living Development – Level 4

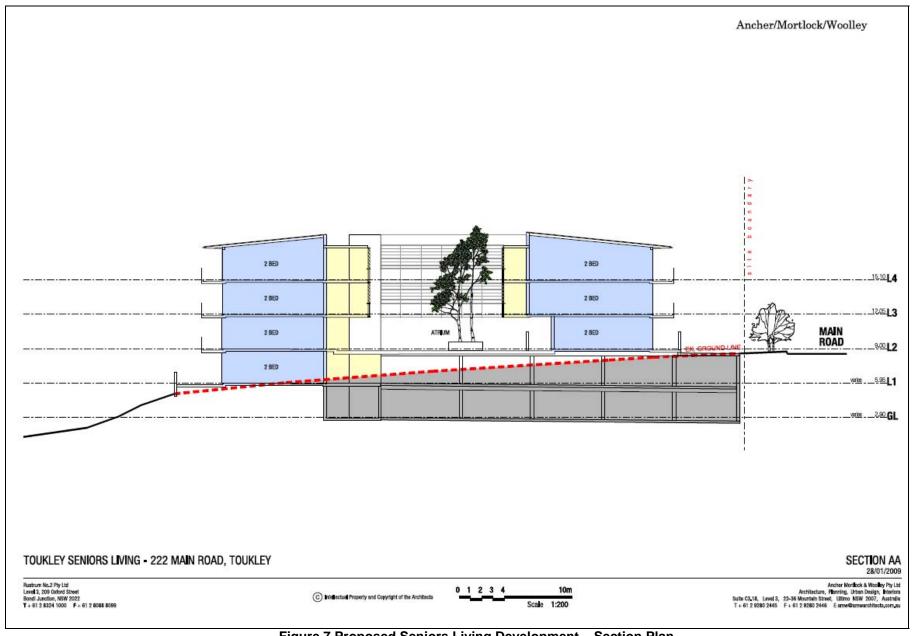


Figure 7 Proposed Seniors Living Development – Section Plan

1.4 Environmental Context

Geology & Soils

The study area is located within the Gorokan Soil Landscape which is located on the undulating low hills and rises of the Central Coast Lowlands. The underlying geology comprises of lithic sandstone, claystone and siltstone of the Tuggerah Formation (Murphy 1993:56).

The main soil types include a topsoil of loose dark brown loamy sand, A2 horizon of yellowish brown hardsetting clayey sand overlying the B horizon of yellowish brown strongly pedal clay (Murphy 1993:56-57).

Landform & Topography

The landform comprises of undulating low hills and rises with local relief <30m and slopes <15% (Murphy 1993:56).

Vegetation

Extensive clearing of the native vegetation in urban and grazing areas has occurred within the Gorokan Soil Landscape. Remnant native tree species include smooth barked-apple, scribbly gum, red bloodwood, brown stringy bark and forest oak (Murphy 1993:56).

Hydrology

Budgeowi Lake is located on the northern boundary of the study area. There are no watercourses or natural drainage lines located within the study area. The allotment slopes north down to the lakes edge.

2.0 Archaeological Context

2.1 Regional Indigenous Archaeological Context

It is believed that Aboriginal occupation in the Sydney region occurred around the late Pleistocene. Radiocarbon dating of a shelter site at Shaw's Creek in the Blue Mountains has given the earliest occupation of the Hawkesbury-Nepean area at c. 14 700 years BP (Attenbrow in AHMS 2005). A study by Vinnicombe (1982) of the Gosford-Wyong area indicated that the aboriginal population of the area increased between 3000 – 1000 years ago, together with a preferential shift to the use of open campsites from rock shelters (Haglund 2000). Excavations of an Aboriginal cemetery at Swansea channel at Lake Macquarie to the north of the study area have obtained dates of 2080 +/- 90 BP and 2280 +/- BP. Excavations of a midden site at Swansea Heads have also established radiocarbon dates of 7870 +/-115 BP (Dyall 1972, Dyall & Bently 1972 in Kelton 1998:9).

Dallas, Menses & Rola-Wojciechowski in Kelton (1998) describes that the broader "Wyong area' was occupied by the Kuringgai (Guringai), Darkinjung and Awabakal peoples (Kelton 1998:7). Ross in English (1999) outlines that the coastal area between Pittwater, Broken Bay and the southern shores of Lake Macquarie were occupied by the Guringai people. Analysis of skeletal material of Aboriginal remains from the Central Coast indicates that their diet appears to have been predominantly marine based. Contact with Europeans occurred shortly after invasion, with the Broken Bay area being explored by Governor Phillip in 1788. European settlement not only displaced the indigenous population from their lands but the introduction of diseases such as small pox also had a devastating effect on population numbers (English 1999).

2.2 Local Indigenous Archaeological Context

A review of previous archaeological assessments was conducted in proximity to the proposed development in order to place the study area into an archaeological context.

Kelton (1998) conducted an archaeological survey between Lake Munmorah and Toukley on behalf of Telstra for a proposed fibre optic cable route. The survey covered an area of approximately 10 hectares from the Pacific Highway at Budgeowi along the eastern shore of Lake Munmorah to Noraville approximately 2km east of

the study area. Foot and vehicle surveys of the proposed route were conducted. The survey did not identify any archaeological material or sites.

Kelton (1998) undertook an archaeological survey on behalf of Telstra for a proposed fibre optic cable route between Toukley and The Entrance North. The proposed route was approximately 6.9km long. No indigenous archaeological sites were identified by the survey which was conducted using a combination of vehicle and foot surveys.

Nelson and Ruig (1993) surveyed the site of the Henry Kendall Retirement Village at Bonnells Bay on Lake Macquarie, north of the study area. An isolated artefact and disturbed midden were located on the lake foreshore.

Dallas, Navin and McConchie (1993) surveyed a large area of Morisset Peninsula prior to the installation of a sewerage scheme. A total of 12 midden sites were recorded, some of which were considered to retain reasonable degrees of integrity.

A survey of a proposed tourist resort at Summerland Point (Brayshaw, 1989) located a large midden comprising 90% *Anadara trapezia* (Sydney cockle) shell. Shell densities were estimated in the order of 400 per m² and a small number of mud whelk and abalone were also noted. The site was to be retained in a foreshore reserve.

Subsurface test excavations have been undertaken by Officer et al (1996) at 'The Hole', Mannering Bay to the north of the study area. Artifacts were found in the course of channel constructions and further investigations indicated the maximum dimensions of the site were 180m x 100m. A total of 137 artifacts were recorded at the site, 95 of which occurred on the surface and a further 42 found in test pits. The distribution of surface artifacts was considered to indicate *in-situ* deposits, the surface artifacts exposed on a deflated surface. The surface artifacts occurred at densities of 5.2 per m², and the subsurface densities at between 20 and 32 per m². The shell associated with the site was found to be fragmented, exhibiting a wide range of size and growth stages, species included small and 'non-edible' species mixed within sandy silts. No associated charcoal, and the fact that many shells showed signs of natural predation indicated that the shell deposits were not of Aboriginal origin.

.

2.3 AHIMS Search

A search of the AHIMS (Aboriginal Heritage Information Management System) maintained by DECC for recorded aboriginal archaeological sites was conducted for a 208km² area surrounding the study area. The search identified 54 recorded sites in the search area. The majority of recorded sites include; midden sites often containing artefacts and open campsites/artefact scatters. Scarred Trees, areas of PAD (Potential Archaeological Deposit), ochre quarries and burials have also been identified. Figure 8 below displays the location of recorded sites.

No previously recorded archaeological sites identified by the search occur in the study area.

2.4 Predictive Model of Archaeological Potential

Previous archaeological investigations have shown that archaeological sites are more prevalent in areas in close proximity to water sources with the number and density of archaeological sites increasing with the permanence of the water resource. Areas surrounding creek confluences have also been shown to be of importance in the region and potentially contain larger and more complex archaeological sites. River terraces have also been noted to have been favoured areas for Aboriginal encampments. The preference for occupation close to water resources may also lead to the re-deposition of artefacts in alluvial sediments and the exposure of subsurface archaeological material as a result of geomorphological processes. Whilst these areas can be favoured for larger camp sites, smaller artefact scatters may occur in all landscapes, resulting from movement between areas and the procuring of resources. Rock engravings are prevalent in areas where sandstone exposures are common.

An analysis of previous studies conducted in proximity to the study area has shown that the most likely site types which may occur in the study area are; Midden sites (concentrations of locally sourced mollusc shells) often located in foreshore areas, open campsites/artefact scatters and isolated artefacts. Where suitable rock out crops may occur in creek lines, grinding grooves may also be present. Burials may occur in sand deposits associated with midden sites but are unlikely to be visible on the surface.



Figure 8 Location of recorded sites in proximity to the study area

3.0 Archaeological Survey

3.1 Survey Objective

The aim of the survey was to identify any Aboriginal sites or areas of potential archaeological deposit within the study area which may be impacted by the proposed development.

3.2 Survey Details

The survey was conducted on the 17th March 2009. The survey was attended by Tracey Howie, Chairperson, Chevy Heath Field Officer, Guringai Tribal Link and Elizabeth Wyatt, Archaeologist, Insite Heritage Pty Ltd.

The survey covered the majority of the study area on foot with the exception of the area of land occupied by the brick residence on the eastern boundary (approximately 800m²). Foot transects were conducted across the study area, walking three abreast.

In general visibility across the study area was low (0-10%) due to grass cover and thick weed cover was also noted along the foreshore area which was very wet underfoot and boggy. The study area was also found to be very highly disturbed from subsequent buildings and earthworks on the site. The study area was formerly the location of a block of units, which have since been demolished¹. The survey details are presented in Table 1 below.

3.3 Survey Results

As mentioned in Section 3.2 above, the study area was fond to be highly disturbed. The extensive disturbances across the study area included; a concrete driveway running north from Main Road, the length of the study area terminating at a slip way at the waterfront, numerous brick, concrete block and concrete retaining walls, concrete stair ways, areas of cut, levelling and fill and two sewer lines one running adjacent to the foreshore and the other southwards from the foreshore to the brick residence on the eastern boundary. The construction of the retaining walls over successive years has also resulted in a series of large cuts into the hillside across the study area. The area of level ground adjacent to Main Road had also been levelled. A number of mature introduced plants were also noted in the study area.

The survey did not identify any Aboriginal archaeological sites or relics. Due to the highly disturbed nature of the site the potential for subsurface archaeological deposits was considered to be very low.

¹ M Rolls Surveyor Personal Comment Insite Heritage Pty Ltd

Table 1 Survey Details

Survey Area	Location	Landform	Surveyed Area (approx.)	Surface Visibility	Arch. Visibility	Effective Coverage
SA1	Western boundary between concrete driveway and fence line to waterfront	Top of slope to foreshore	500m²	0-10%	0%	0m²
SA2	Foreshore area from western boundary to eastern boundary	Foreshore	1500m²	0-10%	0%	0m²
SA3	Top of hill east side of driveway to eastern boundary and edge of slope above retaining walls	Top of slope	2200m²	0-10%	0%	0m²
Totals			4200m²			0m²

4.0 Significance of Identified Sites

4.1 Significance Criteria

The basic processes of assessing significance for items of heritage are outlined by *The Australian ICOMOS Charter for the Conservation of Places of Cultural Significance: the Burra Charter* (amended 1999) and its associated *Guidelines*. Sites may be significant according to several criteria, including scientific or archaeological significance, significance to Aboriginal people, aesthetic value, the degree to which a site is representative of archaeological and/or cultural type, and value as an educational resource. In New South Wales the nature of significance relates to historic, aesthetic, social, scientific, cultural or educational criteria and sites are also assessed on the degree to which they exhibit rare or representative characteristics of their type, or whether they exhibit historic or cultural connections.

SCIENTIFIC SIGNIFICANCE

In order to determine scientific significance it is necessary to first place sites within a local and regional context. This process enables the assessment of any individual site in terms of merit against other sites of similar nature within similar contexts.

PUBLIC SIGNIFICANCE

The sites are assessed in terms of their educational value, to enhance community knowledge and appreciation of cultural heritage.

CULTURAL SIGNIFICANCE

Generally, all sites are of significance to the Aboriginal people. It has been recognised however that with the widespread nature of site distribution, sites will eventually be impacted upon by development. It is however necessary to conserve where possible sites which are of high significance to the community.

REPRESENTATIVE SIGNIFICANCE

Site significance is rated low, medium and high. The significance of individual sites is determined by factors such as representativeness, rarity, and the sites potential to add scientific data to what is known about past human occupation of the Australian continent. Conservation outcomes are determined by comparison of a site's qualities with known sites in the region that have been protected.

4.2 Significance Assessment

As no Aboriginal archaeological sites or relics were identified by the survey a significance assessment is not required.

5.0 Legislation

THE NATIONAL PARKS AND WILDLIFE ACT 1974

The NPW Act (section 90) provides statutory protection for all material evidence of Aboriginal occupation of NSW. Aboriginal places which are areas of cultural significance to the Aboriginal community, are also protected by the 1974 Act (section 84) that states:

The Minister may declare lands to be 'protected archaeological areas' to preserve Aboriginal places and relics; and

It is an offence to disturb or destroy an Aboriginal place or relic without first obtaining written consent from the Director of National Parks and Wildlife Service NSW.

The National Parks and Wildlife Act 1974 requires the obtaining of a Section 87 Permit if a person wishes to excavate land to disturb or discover an Aboriginal object (relic) or disturb or move an Aboriginal object.

A Section 90 Heritage Impact Permit is required if an activity will or is likely to destroy, damage, desecrate or deface and Aboriginal object or Aboriginal place.

A relic is defined as any deposit, object or material evidence (not being a handicraft made for sale) relating to indigenous and non-European habitation of the area that comprises NSW, being habitation both prior to and concurrent with the occupation of that area by persons of European extraction, and includes Aboriginal remains (NPW A s.5(1)).

THE ENVIRONMENTAL PLANNING AND ASSESSMENT ACT (1979)

The EP&A Act states that environmental impacts are to be considered in land use planning. The term 'environmental impacts' specifically relates to Aboriginal heritage in three parts.

Part III covers planning instruments such as State Environmental Planning Policies (SEPP), Regional Environmental Plans (REP) and Local Environmental Plans (LEP).

The guidelines on the preparation of planning instruments specifically state that Aboriginal heritage should be assessed as an integral part of these studies.

Part IV of the Act determines the way in which consent authorities make decisions regarding development applications. Section 79C (b) states that;

"The impact of development on the natural or built environment should be considered before consent is granted; and"

Part V of the EP&A Act points out that State government agencies which act as determining authorities must also conduct reviews of their own or other agencies activities in terms of impact on the environment. Where these impacts are deemed to be minimal a Review of Environmental Factors is required, although where impacts are greater an EIS would be generated. This part of the Act requires that;

'any impacts on a locality having aesthetic, anthropological, architectural, cultural, historic, scientific, recreational, scenic or social significance or other special value for present or future generations' be accounted for (DUAP 1995).

6.0 Management Recommendations & Conclusion

The following management recommendations are applicable to the study area as surveyed at the time. Please also refer to Appendix C – Community Reports.

No archaeological sites or relics were identified by the survey and given the previous disturbances across the study area it is also considered highly unlikely that any *in situ* subsurface archaeological material remains. Therefore there are no identified archaeological constraints on the proposed development.

Should any suspicious material be noted in the course of the development, work should cease in that area and DECC contacted.

The potential for burials in the study area are limited as the site appears to have been cut to the level of the underlying clays, however the study area has been obscured by development. Should any thing that may indicate a burial be noted work must cease and the DECC and /or NSW Police notified.

7.0 Plates



Plate 1 South western end of study area facing north east (SA1)



Plate 2 Southern portion of study area facing north (SA3)



Plate 3 SA1 facing north – concrete drive/slipway to right, foreshore to the north.



Plate 4 Concrete retaining walls facing south west



Plate 5 Foreshore area, SA2 facing west.



Plate 6 Foreshore area (SA2) facing west.



Plate 7 Residential dwelling (still occupied) not surveyed, facing east.



Plate 8 Break of slope facing west, note cut/disturbance into hillside.

28

8.0 Glossary

Angular Fragment: Flaking debris that lacks diagnostic features. Also referred to as a

flaked piece.

Artefact: Any object, usually portable, that has been made or shaped by human

hand.

Assemblage: A set of artefacts found in close association with each other.

Backed: Unidirectional or bi-directional retouch located on one lateral margin of a

tool.

Backed Blade: A blade with one margin deliberately blunted to form a penknife-like

back.

Basalt: Volcanic igneous rock dark in colour (black - dark grey). Fine grained

containing 45-55% silica, iron and magnesium.

Bioturbation: Reworking of sediments through the action of ground dwelling life forms

such as ants, termites, and earthworms.

Blade: A parallel sided flake, twice as long as it is wide.

Broken Flake: A flake fragment which displays only part of the diagnostic features of

a complete flake. Broken flakes are classed are classed as either proximal flakes,

medial flakes, lateral and distal flakes depending on their visible attributes.

Chert: A fine grained crystalline aggregate of silica.

Clay: Sediment that contains particles less than 4 µm in size.

Coal: Combustible sedimentary rock, greater than 50% carbonaceous material.

Colluvial: Transported by non fluvial processes.

Conglomerate: Sedimentary rock containing rounded clasts greater than 2 mm in

size.

Core: A piece of stone, often a cobble or pebble but also quarried stone, from which

flakes have been struck for toolmaking.

Core Tool: A core bearing trimming or use wear indicating its use as an implement.

Cortex: Outer weathered surface of a rock or mineral.

Debitage: The waste product from tool manufacture.

Distal Flake: Flakes which have a termination but do not show a platform or evidence of an impact point.

Dorsal Surface: Retains part of the original surface of the core or scars from earlier flake removals.

Erosion: Process where particles are detached from rock or soil and transported away principally via water, wind, ice and air.

Flake: A piece of stone detached by striking a core with another stone.

Flake piece/s: Refer to angular fragment.

Geometric Microlith: A microlith of triangular, trapezoidal or other geometric shape, with an abruptly trimmed thick margin.

Geomorphology: The description and interpretations of landforms.

Hearth: The site of a campfire.

Heat Treatment: Also referred to as heat shatter. The natural or human induced process of heating raw materials to change their properties prior to tool manufacture. Observable changes include alterations in colour, lustre and crystalline structure.

Loam: A soil which contains approximately equal proportions of sand, silt and clay.

Medial flake: Flake or flake fragment with an identifiable ventral surface but lacking proximal and distal margins.

Microlith: A variety of small, less than 30mm in size, retouched implements of various shapes.

Microblade Cores: Provide the blanks for the small –tool tradition – Bondi points and geometric microliths. Less than 100mm in maximum dimension. Flake scars are parallel and elongate and long relative to core size.

Midden: Aboriginal occupation site consisting chiefly of shells with minor components of other refuse such as ash, stone artifacts and animal bones.

Mudstone: Used to refer to the fine to very fine grained sedimentary rocks of siltstones and mudstones.

Open Campsite: A surface of stone and other artefacts exposed on the ground surface.

Permian: Geological time period from 290 – 245 Ma.

Platform: The area on a stone core on which a blow is struck to detach a flake. The detached flake bears on its butt end the original striking platform.

Podzolic: Acid soils with strong texture contrast between sandy or loamy topsoils and clay subsoils.

Porcellanite: A rock formed by the thermal metamorphism of a soil horizon in basalt.

Proximal flake: broken flakes that do not have a termination but exhibit features from where the flake was struck from the core such as a platform, bulb of percussion, impact point.

Quartz: Common mineral with naturally sharp edges and poor fracturing properties. Colour ranging from clear, to milky white and pink.

Quartzite: Homogenous medium to coarse grained metamorphosed sandstone.

Retouch: To shape, sharpen or blunt a stone tool by flaking.

Retouched flake: Flakes removed during retouching of a tool.

Sandstone: A sedimentary rock comprised of greater than 25% clasts of sand grains 0.625-2mm in diameters.

Scarred tree: Trees which have had portions of their barked removed.

Scraper: A flake with one or more margins displaying retouch along the entire margin.

Shale: A sedimentary rock with particles less than 4µm in diameter.

Silcrete: A sedimentary rock comprising of quartz grains in a matrix of fine grained – amorphous silica.

Soloth (or Solodic): Acid soils with strong texture contrast between pale topsoil and clay subsoil with coarse blocky or columnar structure.

Stratigraphy: The study of natural and cultural sedimentary strata.

Symmetrical backed artefact: see geometric microlith.

Thumbnail Scraper: A small flake with a convex scraper edge opposite the platform of the flake and with a shape similar to a thumbnail.

Tuff: Fine grained stone formed after a cloud of ash ejected by volcanic event descends to form a thin layer over the ground surface. After burial some tuff beds become indurated through a metamorphic process in which the stone hardens and recrystallises to a less friable structure.

Use-wear: Alteration of an artefact caused by its use.

9.0 References

Brayshaw, H.	1989	Archaeological survey of proposed tourist resort at Summerland Point, Lake Macquarie NSW. Report to Bexford Pty Ltd.
Dallas, M. Navin, K. & McConchie, D.	1993	Archaeological Investigation of the Morisset Peninsula Sewage Scheme. Report to PWD Hunter Sewerage Project.
English, A	1999	Archaeological Survey of Spectacle Island Nature Reserve, Hawkesbury River NSW. Report to NPWS & Metropolitan LALC.
Murphy C.L	1993	Soil Landscapes of the Gosford – Lake Macquarie 1:100 000 Sheet. Department of Conservation and Land Management.
Murphy C.L & Tille P.J	1993	Soil Landscapes of the Gosford – Lake Macquarie 1:100 000 Sheet Map. Department of Conservation and Land Management.
McDonald, J.	1993	On a Clear Day You Can See Mt Yengo. Australian Rockart Research, Publication No.8, Melbourne.
Mulvaney, J. & Kamminga, J.	1999	Prehistory of Australia. Allen & Unwin, Sydney.
Nelson, L & Ruig, J.	1993	Report of an Archaeological Survey for a Proposed Retirement Village, Bonnells Bay, Lake Macquarie NSW. Report to C. Burgess and Associates Architects.
Officer, K., Navin, K. & Saunders, P.	1996	Test Excavations at "The Hole 1" Mannering Bay Lake Macquarie NSW. Report to Pacific Power

Appendix A Community Consultation Log

16.02.2009

Notification letters detailing proposed development and requesting contact information of any registered Aboriginal stakeholder groups or individuals who may have an interest in the project sent to:

DECC – Northern Zone Office of the Registrar NSW Native Title Services Wyong City Council

Invitation to register interest in the project sent to:

Darkinjung Local Aboriginal Land Council – PO Box 401 Wyong NSW 2259

Guringai Tribal Link – PO Box 4061 Wyongah NSW 2259

18.02.2009

Registration received from Tracey Howie Guringai Tribal Link

20.02.2009

Advertisement placed in the Central Coast Express Advocate

02.03.2009

Received email from Deborah Swan senior field officer – Darkinjung LALC. Sent email that she is unable to attend field work tomorrow.

Sent reply email to Deborah explaining that the 03.03.09 was just the close of registration for the project and that we will be conducting field work in the week of 16th of March.

12.03.2009

Emailed Deborah Swan DLALC and Tracey Guringai Tribal Link regarding availability for survey work on 17.03.09.

16.03.09

Telephoned DLALC, spoke to Kara at reception who informed that Deborah was away all week attending meetings etc., and that Craig Foreshew was also unavailable as he is on leave.

Telephone and emailed Tracey – to check availability for field work.

23.03.2009

Sent report to DLALC and Guringai Tribal Link for review and comment.

25.03.2009

Response to draft report received from Guringai Tribal Link.

Appendix B - Project Advertisements

ARCHAEOLOGICAL ASSESSMENT

As per DECC guidelines, Insite Heritage P/L invites registrations of interest from Aboriginal persons or groups who would like to be consulted in the preparation of an Aboriginal archaeological assessment at Main Rd, Toukley for a proposed seniors living development. Please register in writing to PO Box 98 Wangi Wangi NSW 2267, Fax 0249755818 or Email insite@idl.net.au by COB 6 March 2009

Figure 9 Advertisement placed in the Central Coast Express Advocate 20.02.09

Appendix C – Community Reports



Guringai Tribal Link Aboriginal Corporation ABN 18 351 198 069. ICN 4270 (Traditional Owners of the NSW Central Coast)

P.O. Box 4061, Wyongah NSW 2259 Phone:(02) 4392 8743 Fax:(02) 4396 9525 Mobile: 0404 182 049 Email: guringai@kooee.com.au

24th March, 2009

Angela Besant & Liz Wyatt, INSIGHT HERITAGE.Pty.Ltd. P.O.Box 98 Wangi Wangi, NSW, 2267.

emailed to: insight@idl.net.au

Dear Liz and Angela,

Please find following; ABORIGINAL CULTURAL HERITAGE IMPACT ASSESSMENT for 222 MAIN ROAD TOUKLEY. PROPOSED MULTI-STORY SENIORS LIVING DEVELOPMENT.

Thank you for including the Guringai Mob in this project. We look forward to working with you in the future.

> Tracey-lee Howie Chairperson Female Cultural Heritage Officer (contacts above)

ABORIGINAL CULTURAL HERITAGE IMPACT ASSESSMENT

for

222 MAIN ROAD, TOUKLEY.

PROPOSED MULTI-STOREY SENIORS LIVING DEVELOPMENT.

INTRODUCTION:

Guringai Tribal Link Aboriginal Corporation(GTLAC) was contacted by Liz Wyatt, Insight Heritage, to conduct an Aboriginal Cultural Heritage impact assessment of 222 Main Road, Toukley, for a proposed Multi-Storey Seniors Living Development.

This assessment was to establish the presence or absence of Aboriginal materials/artefacts, scar trees, rock engravings, camping/hunting areas and identify potential impacts to native flora and fauna.

STUDY AREA;

The survey area is within the Wyong Local Government Area, on the northern side of the Main Rd, Toukley.

The survey area is approximately 5000m2 and is bound by Budgewoi Lake to the north, Toukley Gardens Park to the east and a residential dwelling and the Beachcomer Hotel to the west.

This location has been heavily disturbed in the past, with the construction of an Appartment building, since been destroyed and removed.

PROPOSAL:

The proposal for this location is a Multi-Storey Seniors Living Development, consisting of approx. 50×1 and 2 bedroom units.

METHODOLOGY:

The survey was conducted on foot, with transects of approximately 10metres apart, by myself (Tracey Howie) and Chevy Heath - GTLAC and Liz Wyatt, Archaeologist representative for Insight Heritage.

The portion of the survey area to the east of 222 Main Rd, Toukley, was not assessed due to current occupation of this dwelling and ground surface coverage. (grassed)

HISTORICAL INFORMATION:

The study area for the proposed development has been and still is, home to the Guringai speaking Mob for generations and seasonally occupied in various locations by the Darginyung people. Pre and post European settlement.

Well known and documented members of the Guringai mob were; Boongaree, Matora, Mosquito, Jewfish, Cora(Gooseberry), Flathead, Long Dick, Sophy (Booratora) and Charlotte Ashby (nee. Webb).

Thier presence in this area was initially recorded pre 1790. References to these Guringai speaking people are located on Government Blanket list and Court Bench records taken in the Gosford/Wyong areas and Colonial Secretary minutes, which are held at Gosford City Library and early recordings from surveyors John Fraser, Chappell, journals written by Rev. L.E. Threlkeld, Rev. Glennie, Matthew Flinders, Augustus Earl, R.H Mathews and current AIATSIS maps.

The traditional areas occupied by the Guringai speaking comprises of, All of Port Jackson catchment, including the tributaries of Middle Harbour and Lane Cove River, the Broken Bay catchment, including tributaries of Brisbane Water, Cowan Creek and Pitt Water, the water shed along Peats Ridge, following along the range through to Kulnura, as well as the Lakes of the Central Coast to lower Lake Macquarie.

Guringai - People of the Coast.

Darginyung - People of the Ranges

Darug - People of the Plains. (as described by J.Fraser 1892)

Charlotte Webb was the very first recorded Aboriginal birth on the Central Coast. She was born in 1823. Charlotte was the daughter of Sophy (Booratora), daughter of Boongaree and Matora. Sophy was sexually assulted by Ship-building merchant, James Webb. Charlotte was the result of this rape.

Well known and documented Darginyung man was Billy Faulkner. His presence was initially recorded on the Central Coast in the 1860's. Billy Faulkner was found drowned in Tuggerah Lake in 1875.

FINDINGS:

No Aboriginal sites or oblects were identified within the survey area at the time of this assessment.

DISCUSSION:

Levels of disturbance varied throughout the study area, associated with previous appartment building and associated infrastructure.

A cement driveway extending from the southern boundary of the survey area is still present, along with several besser-block and cement retaining walls with cement staircases and metal railings.

A large section of the northern portion of the survey area has been subject to a large cutting of the landscape.

RECOMMENDATIONS:

No further investigations or studies are required for this area, due to the high level of disturbance across the surveyed area.

Should any Aboriginal objects or skeletal materials be unearthed during any earth works for the proposed development, work must cease within the vicinity of the object and Department of Environment and Climate Change (DECC) and GTLAC are to be contacted immediately.

This report was written and compiled by Tracey Howie, Female Cultural Heritage Officer, Guringai Tribal Link Aboriginal Corporation. P.O Box 4061, Wyongah, NSW, 2259.

Should you have any queries about this report and the information contained in it, please don't hesitate to contact me on 0404 182 049 or 4392 8743. email: guringai@kooee.com.au.

MANUA OOMULIYAN GOORI