



Hydro Aluminium, Kurri Kurri, NSW

Historic Heritage Assessment & Statement of Heritage Impact

Prepared by:

RPS AUSTRALIA EAST PTY LTD

241 Denison Street
Broadmeadow NSW 2292
PO Box 428, Hamilton NSW 2303

T: +61 2 4940 4200
F: +61 2 4961 6794
E: newcastle@rpsgroup.com.au

Client Manager: Tessa Boer-Mah
Report Number: PR122177-1
Version / Date: Final / March 2015

Prepared for:

ESS AUSTRALIA

PO Box 156
Carrington NSW 2326

T: +61 2 49362438
E: Shannon@essaustralia.com.au
W: www.essaustralia.com.au

IMPORTANT NOTE

Apart from fair dealing for the purposes of private study, research, criticism, or review as permitted under the Copyright Act, no part of this report, its attachments or appendices may be reproduced by any process without the written consent of RPS Australia East Pty Ltd. All enquiries should be directed to RPS Australia East Pty Ltd.

We have prepared this report for the sole purposes of ESS Australia ("**Client**") for the specific purpose of only for which it is supplied ("**Purpose**"). This report is strictly limited to the purpose and the facts and matters stated in it and does not apply directly or indirectly and will not be used for any other application, purpose, use or matter.

In preparing this report we have made certain assumptions. We have assumed that all information and documents provided to us by the Client or as a result of a specific request or enquiry were complete, accurate and up-to-date. Where we have obtained information from a government register or database, we have assumed that the information is accurate. Where an assumption has been made, we have not made any independent investigations with respect to the matters the subject of that assumption. We are not aware of any reason why any of the assumptions are incorrect.

This report is presented without the assumption of a duty of care to any other person (other than the Client) ("**Third Party**"). The report may not contain sufficient information for the purposes of a Third Party or for other uses. Without the prior written consent of RPS Australia East Pty Ltd:

- (a) this report may not be relied on by a Third Party; and
- (b) RPS Australia East Pty Ltd will not be liable to a Third Party for any loss, damage, liability or claim arising out of or incidental to a Third Party publishing, using or relying on the facts, content, opinions or subject matter contained in this report.

If a Third Party uses or relies on the facts, content, opinions or subject matter contained in this report with or without the consent of RPS Australia East Pty Ltd, RPS Australia East Pty Ltd disclaims all risk and the Third Party assumes all risk and releases and indemnifies and agrees to keep indemnified RPS Australia East Pty Ltd from any loss, damage, claim or liability arising directly or indirectly from the use of or reliance on this report.

In this note, a reference to loss and damage includes past and prospective economic loss, loss of profits, damage to property, injury to any person (including death) costs and expenses incurred in taking measures to prevent, mitigate or rectify any harm, loss of opportunity, legal costs, compensation, interest and any other direct, indirect, consequential or financial or other loss.

Document Status

Version	Purpose of Document	Orig	Review	Review Date	Approval for Issue	Date Issued
Draft	Draft Report for Client Review	L Nelson	D. Rigby	8.1.2015	D. Rigby	13.1.2015
Revised Draft	For Client Review	L Nelson	D. Rigby	26.2.2015	D. Rigby	26.2.2015
Final	For Issue	L Nelson	D. Rigby	4.3.2015	D. Rigby	4.3.2015

Contents

SUMMARY	1
1.0 INTRODUCTION	3
1.1 Project Area	3
1.2 Kurri Kurri Aluminium Smelter and Proposed Works	3
1.3 Methodology	3
1.4 Authorship and Acknowledgement	5
1.5 Legislative Framework - Heritage in NSW	5
1.5.1 <i>Heritage Act 1977</i> and the NSW Heritage Branch	5
1.5.2 Environmental Planning and Assessment Act 1979	5
1.5.3 The Burra Charter	5
1.6 Statutory Planning Context	6
1.6.1 Cessnock Local Environment Plan 2011 & Maitland Local Environment Plan 2011	6
1.7 Heritage Registers Review	6
2.0 HISTORICAL CONTEXT	8
2.1 History of Kurri Kurri	8
2.2 Recorded Historic Heritage	10
2.2.1 World heritage	10
2.2.2 National and Commonwealth Heritage	10
2.2.3 State Heritage	10
2.2.4 Local heritage	10
3.0 HERITAGE ITEMS AND POTENTIAL HERITAGE ITEMS IN THE PROJECT AREA	11
3.1 Hydro Aluminium Kurri Kurri	11
3.2 South Maitland Railway	17
3.3 The Stanford Railway	20
3.4 Glen Greta (Glen Main) Colliery	21
3.5 Weston Soldier Settlement	22
3.6 Rubbish depot	27
4.0 PHYSICAL EVALUATION	28
4.1 Hydro Aluminium Kurri Kurri	28
4.2 South Maitland Railway	29
4.3 Stanford Railway Line	30
4.4 Glen Greta (Glen Main) Colliery	30
4.5 Weston Soldier Settlement	30
4.6 Rubbish depot	30
5.0 HISTORICAL THEMES	31
6.0 HERITAGE SIGNIFICANCE ASSESSMENT	32
6.2 Hydro Aluminium Kurri Kurri	34

6.3	South Maitland Railway System	34
6.4	Stanford Railway	35
6.5	Glen Greta (Glen Main) Colliery	35
6.6	Weston Soldier Settlement.....	36
6.7	Rubbish depot	36
7.0	IMPACT ASSESSMENT	37
7.1	Hydro Aluminium Kurri Kurri	37
7.2	South Maitland Railway	37
7.3	Stanford Railway Line.....	37
7.4	Glen Greta (Glen Main) Colliery	37
7.5	Weston Soldier Settlement.....	37
7.6	Rubbish depot	37
8.0	STATEMENT OF HERITAGE IMPACT	38
8.1	Hydro Aluminium Kurri Kurri	38
8.1.1	Summary of Proposed Changes	38
8.1.2	Design Options Considered	38
8.1.3	Impact of Development Proposal on Physical Fabric, Attributes, and Setting	38
8.2	Stanford Railway	38
8.2.1	Summary of Proposed Changes	38
8.2.2	Design Options Considered	38
8.2.3	Impact of Development Proposal on Physical Fabric, Attributes, and Setting	38
8.3	Weston Soldier Settlement	39
8.3.1	Summary of Proposed Changes	39
8.3.2	Design Options Considered	39
8.3.3	Impact of Development Proposal on Physical Fabric, Attributes, and Setting	39
8.4	Rubbish depot	39
8.4.1	Summary of Proposed Changes	39
8.4.2	Design Options Considered	39
8.4.3	Impact of Development Proposal on Physical Fabric, Attributes, and Setting	39
8.5	Summary of Heritage Impact	39
9.0	MANAGEMENT AND MITIGATION RECOMMENDATIONS	40
9.1	Recommendations	40
10.0	PLATES	42
11.0	REFERENCES	63
	ACRONYMS	65

Tables

Table 1 Items in Kurri Kurri on the State Heritage Register (Office of Environment and Heritage 2013)	10
Table 2 Items in the vicinity of the Project Area (Cessnock LEP Schedule 5 2011)	10
Table 3 Hydro Aluminium Kurri Kurri - Major structures	29
Table 4 Historical themes	31
Table 5 NSW Heritage Criteria	32
Table 6 Hydro Aluminium Kurri Kurri - Heritage Assessment	34
Table 7 South Maitland Railway – Heritage Assessment.....	34
Table 8 Stanford Railway – Heritage Assessment	35
Table 9 Glen Greta (Glen Main) Colliery – Heritage Assessment.....	35
Table 10 Weston Soldier Settlement – Heritage Assessment.....	36
Table 11 Rubbish depot – Heritage Assessment	36
Table 12 Impact of the Proposal on each Component/Site Element	39

Figures

Figure 1 Project Area.....	4
Figure 2 Heritage items in the Project Area.....	7
Figure 3 Potential Heritage items in the Project Area	12
Figure 4 Visions of Yesteryear (1998) Kurri Kurri Tidy Town Project (Advertisement)	13
Figure 5 Plant Layout: Extract from James B Croft & Associates. 1980 EIS for Expansion of an Aluminium Smelter. Line III Kurri Kurri, NSW	15
Figure 6 Perspective View: Extract from James B Croft & Associates. 1980 EIS for Expansion of an Aluminium Smelter. Line III Kurri Kurri, NSW	16
Figure 7 Bee Siding – historic photograph (Attenborough 2001:100)	18
Figure 8 Location of railways and colliery items (Extract: ARHS Bulletin 1966:146)	19
Figure 9 Aberdare Junction – historic photograph (Source: Cultural Collections – University of Newcastle)..	20
Figure 10 Glen Greta (Glen Main) Colliery c.1930 (Source: National Library of Australia. Digital Collection).	22
Figure 11 Poultry farm - Bankstown Soldier Settlement (Source: Cultural Collections – University of Newcastle)	24
Figure 12 Weston Soldier Settlement.....	26
Figure 13 Extract Parish of Heddon map and annotation (1959) (NSW Lands and Property Information)	27
Figure 14 Indicative location of Hydro Aluminium Kurri Kurri main plant buildings	28
Figure 15 Hydro Aluminium Kurri Kurri Master Plan and Heritage items	33

Plates

Plate 1 Looking south west to Hydro Aluminium Smelter from vicinity of Cessnock Road	42
Plate 2 Entrance to Hydro Aluminium Kurri Kurri	42
Plate 3 Looking south west to Cast House	43
Plate 4 Cast House - interior	43
Plate 5 Carbon Plant – exterior southern wall	44
Plate 6 Carbon Plant – interior	44
Plate 7 Looking west to Scrubbing Plant	45
Plate 8 Looking south east to Scrubbing Plant.....	45
Plate 9 Anode Rod Building - interior	46
Plate 10 Anode Rods.....	46
Plate 11 Switchyard	47
Plate 12 Potline 1 (1969)	47
Plate 13 Potline 1 - detail.....	48
Plate 14 Potline 2 (1978)	48
Plate 15 Potline 2- detail.....	49
Plate 16 Potline 3 (1985)	49
Plate 17 Potline 3 – detail	50
Plate 18 Scrubbing system.....	50
Plate 19 Scrubbing system.....	51
Plate 20 Looking north to chimney	51
Plate 21 Chimney	51
Plate 22 Ancillary building – administration (looking south east)	52
Plate 23 Ancillary building – (administration looking north).....	52
Plate 24 Ancillary buildings – Engineering	52
Plate 25 Ancillary building – Health Safety & Environment	53
Plate 26 Ancillary building – Potroom Process Centre	53
Plate 27 Ancillary building - Potline storage sheds	54
Plate 28 South Maitland Railway line	54
Plate 29 South Maitland Railway bridge.....	55
Plate 30 South Maitland Railway – Bee Siding looking south	55
Plate 31 South Maitland Railway – looking toward Aberdare Junction along Stanford Railway embankment	56
Plate 32 Stanford Railway – looking south east along embankment	56
Plate 33 Stanford Railway– looking north along embankment.....	57
Plate 34 Glen Greta (Glen Main) Colliery – Looking north-east to location of pit top	57
Plate 35 Glen Greta (Glen Main) Colliery – note steel rods - remnant colliery items.....	58
Plate 36 South Maitland Railway cutting deviation - Glen Greta (Glen Main) Colliery subsidence (looking north).....	58
Plate 37 South Maitland Railway cutting deviation - Glen Greta (Glen Main) Colliery subsidence (looking	

south).....	59
Plate 38 Weston Soldier Settlement: 1 Macleod Road - original house.....	59
Plate 39 Weston Soldier Settlement: 2 Dawes Avenue - original house.....	60
Plate 40 Weston Soldier Settlement – example of later housing	60
Plate 41 Weston Soldier Settlement – example of later housing	60
Plate 42 Weston Soldier Settlement – example of later housing	61
Plate 43 Weston Soldier Settlement – light industry	61
Plate 44 Rubbish depot	61
Plate 45 Rubbish depot - example of items.....	62

Appendices

- Appendix 1 Extract: NSW Heritage Office Database - Locally Significant Items
- Appendix 2 Weston Soldier Settlement Loan File

Summary

RPS has been engaged by Hydro Aluminium to prepare a Heritage Impact Assessment and Statement of Heritage Impact for Hydro Aluminium Kurri Kurri Pty Ltd at Kurri Kurri, NSW. This report is required as the area is proposed for redevelopment as residential land; employment land; rural; and conservation lands.

The purpose of this report is to assess the heritage significance and the impact potential works will have on the significance of the site, to identify measures that may mitigate any negative impact and where applicable, detail why more sympathetic options are not viable.

The aluminium smelter at Kurri Kurri, built by Alcan Australia and the first constructed in NSW, commenced operation in 1969. The smelter since that time has undergone modification and expansion under two further owners prior to its purchase by current owner, Hydro Aluminium Kurri Kurri Pty Ltd in 2002. Operating for 43 years it ceased production in 2012. Since that time a skeleton workforce has maintained the plant and managed the buffer zone lands.

A number of historic heritage and potential historic heritage items were investigated as part of the assessment. They include: the Hydro Aluminium Kurri Kurri Smelter Plant; the South Maitland Railway; the Stanford Railway; Glen Ayr Colliery; Weston Soldier Settlement; and a rubbish depot. The heritage significance assessment determined that there were no items of State heritage significance in the Project Area.

This report was prepared adhering to best practice standards as detailed in *The Burra Charter: The Australia ICOMOS Charter for Places of Cultural Significance, 2013 (Burra Charter)*, and in accordance with the requirements of NSW Heritage Division and the Office of Environment and Heritage.

This report found that implementation of the proposed Master Plan would impact on the:

- Hydro Aluminium Kurri Kurri Smelter Plant;
- Stanford Railway;
- Weston Soldier Settlement; and
- A rubbish depot

In the instance of the Hydro Aluminium Kurri Kurri Smelter, while the complex is considered to have local cultural heritage significance its retention solely as a heritage item is not considered viable.

The Stanford Railway; Weston Soldier Settlement; and the rubbish depot are not considered to have a level of cultural heritage significance that would require their retention.

However, to ensure the place of the items in the historical record the following recommendations are made:

Recommendation 1 – Hydro Aluminium Kurri Kurri – Smelter site

A photographic archival record of the Aluminium Smelter should be made in accordance with Photographic recording of Heritage Items using Film or Digital Capture (NSW Heritage Office 2006)

Recommendation 2 – Hydro Aluminium Kurri Kurri – Smelter site

The Kurri Kurri Aluminium Smelter played an important role in the development of the aluminium smelting industry in NSW and forms part of the industrial history of the Hunter Valley, NSW. The documentary record of the construction, expansion and operation of the Smelter is a valuable archive and discussions around

lodgement of significant items within that record may be appropriate with custodians of a suitable archival repository such as Newcastle University Cultural Collection – Archives.

Recommendation 3 – Weston Soldier Settlement

The Weston Soldier Settlement should be the subject of further investigation through documentary research and oral history recording. The outcome should be a report that provides a record of this important but little known aspect of local history.

Recommendation 4 – Rubbish depot

The Rubbish depot should be the subject of an archaeological assessment report. The intention of the assessment report would be to determine if the Rubbish depot warrants the lodging of a Section 140 Application for an Excavation Permit (*NSW Heritage Act 1977*) and if it does, to support that Application.

This investigation of the Rubbish depot has the potential to provide a valuable insight into the social development of Weston Soldier Settlement and neighbouring towns.

Recommendation 5 – Heritage Awareness

As part of the site induction and/or toolbox talks, all relevant staff, contractors and subcontractors should be made aware of their statutory obligations for heritage under the *Heritage Act 1977*.

Recommendation 6 – Unexpected Finds

If, during the course of development works, suspected archaeological relics, as defined by the *Heritage Act 1977*, are uncovered, work should cease in that area immediately.

1.0 Introduction

RPS has been engaged by Hydro Aluminium Kurri Kurri Pty Ltd to prepare a Historic Heritage Assessment and Statement of Heritage Impact (SoHI) to inform the redevelopment of the Hydro Aluminium Smelter and buffer zone at Kurri Kurri (the Project Area). The purpose of this report is to assess the heritage significance of items in the Project Area; the impact proposed works will have on any potential heritage significance; to identify measures proposed to mitigate any negative impact; and where applicable, why more sympathetic options are not viable (Heritage Office and Department of Urban Affairs and Planning 2002:2).

1.1 Project Area

The Project Area, approximately 2.5 kilometres north of Kurri Kurri, is predominately in the Cessnock Local Government Area (LGA) with a small portion of the northern sector in the Maitland LGA (**Figure 1**). The land holdings of the Hydro Aluminium Kurri Kurri Pty Ltd cover approximately 2,000 hectares with the aluminium smelter plant occupying around 60 hectares. The remainder of the Project Area is a buffer zone comprising largely undeveloped land leased for agricultural purposes with some light industry and rural residential areas present.

1.2 Kurri Kurri Aluminium Smelter and Proposed Works

The aluminium smelter at Kurri Kurri was built by Alcan Australia and commenced operation in 1969. The smelter since that time has undergone modification and expansion under two further owners prior to its purchase by the current owner, Hydro Aluminium Kurri Kurri Pty Ltd in 2002. Operating for 43 years it ceased production in 2012. Since that time a skeleton workforce has maintained the plant and managed the buffer zone lands.

The proposed works are guided by a Master Plan with the redevelopment of the area as residential land; employment land; rural; and conservation lands. The proposed redevelopment will include the demolition of the smelter complex.

1.3 Methodology

This report has considered the history of Hydro Aluminium Kurri Kurri Pty Ltd and other items, not associated with the smelter, in the buffer zone. A desk top review of available sources informed a physical inspection of the Project Area. The items considered to have potential heritage significance were assessed under established criteria with potential future impact on those items considered. Following assessment, items of heritage significance were provided with a Statement of Heritage Impact.

The above process was guided by best practice as defined in:

- *The Burra Charter: The Australia ICOMOS Charter for Places of Cultural Significance, 2013 (Burra Charter)*, the best practice standard for the conservation and management of cultural heritage places in Australia. In addition, the guiding principles of The International Committee for the Conservation of the Industrial Heritage (TICCIH), the lead world organization for preserving, conserving, investigating, documenting, researching, interpreting, and advancing education of industrial heritage have been considered (Australia ICOMOS 2013).
- NSW Heritage Division and the Office of Environment and Heritage (formerly the Heritage Office and Department of Urban Affairs and Planning) best practice documents of relevance including: *Assessing Heritage Significance* (2001); *Statements of Heritage Impact* (2002) and *Heritage Interpretation Policy* (2005).

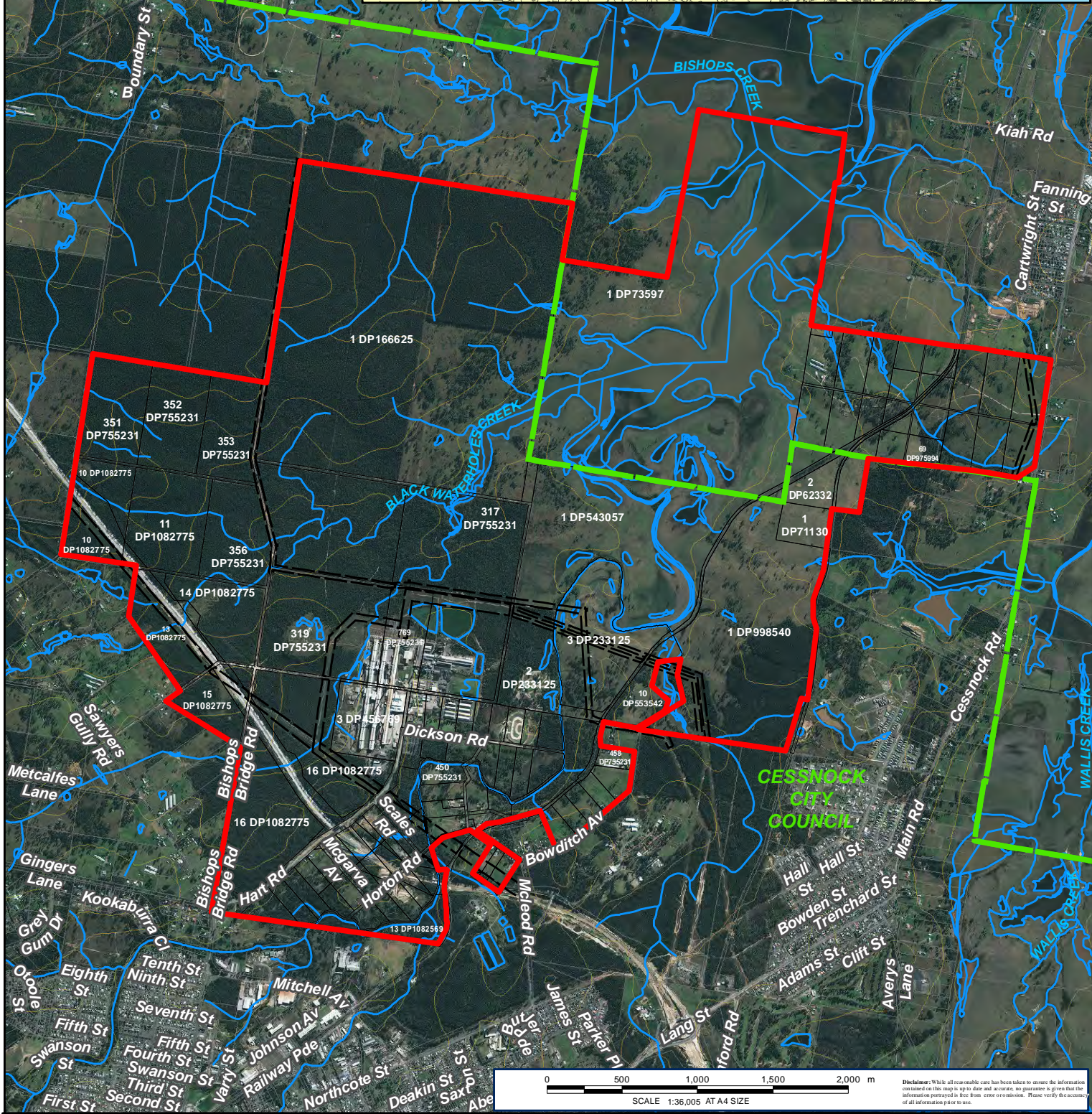


Figure 1: Project Area

LOCATION: Kurri Kurri	DATUM: GDA94
JOB NO.: PR122177	PROJECTION: MGA Zone 56
PURPOSE: HERITAGE	Data Sources: Client RPS
Technician: Natalie Wood	Date: 19/08/2014

CLIENT: ESS AUSTRALIA
 Copyright: This document and the information shown shall remain the property of RPS Australia East Pty Ltd. The document may only be used for the purpose for which it was supplied and in accordance with the terms of engagement for the commission. Unauthorised use of this document in any way is prohibited.

RPS AUSTRALIA EAST PTY LTD (ABN 44 140 292 762)
 241 DENISON STREET BROADMEADOW PO BOX 428 HAMILTON NSW 2303
 T: 02 4940 4200 F: 02 4961 6794 www.rpsgroup.com.au



1.4 Authorship and Acknowledgement

This report was written by RPS Senior Cultural Heritage Consultant, Laraine Nelson with assistance from RPS Spatial Analyst, Natalie Wood. The report was reviewed by RPS Cultural Heritage Technical Director, Darrell Rigby.

The author wishes to thank Mr Kerry McNaughton, Environment Officer/Buffer Zone Supervisor, Hydro Aluminium Kurri Kurri Pty Ltd, for his assistance and sharing his extensive knowledge of the Weston and Kurri Kurri area.

1.5 Legislative Framework - Heritage in NSW

The following section provides an overview of the legislative framework relating to the protection and management of historic heritage in NSW. This overview is provided solely as information for the client rather than as legal advice.

1.5.1 Heritage Act 1977 and the NSW Heritage Branch

Historical archaeological relics, buildings, structures, archaeological deposits and features are protected under the *Heritage Act 1977* (and subsequent amendments) and may be identified on the State Heritage Register (SHR) or by an active Interim Heritage Order.

The Heritage Council of NSW, constituted under the *Heritage Act 1977*, is appointed by the Minister and is responsible for heritage in NSW. The Council reflects a cross-section of community, government and conservation expertise with the NSW Heritage Branch being the operational arm of the Council. The work of the NSW Heritage Branch includes:

- Working with communities to help them identify their important places and objects;
- Providing guidance on how to look after heritage items;
- supporting community heritage projects through funding and advice; and
- Maintaining the NSW Heritage Database, an online list of all statutory heritage items in NSW

The 1996 NSW Heritage Manual, published by the NSW Heritage Branch and the then Department of Urban Affairs and Planning, provides guidelines for conducting statement of heritage impact reports. The Manual includes specific criteria for addressing the significance of an item and this statement has been completed in accordance with those guidelines. These criteria are addressed more fully in Section 5 of this report.

1.5.2 Environmental Planning and Assessment Act 1979

The *Environmental Planning and Assessment Act 1979* (EP&A Act) regulates a system of environmental planning and assessment for NSW. Land use planning requires that environmental impacts are considered, including the impact on cultural heritage. Assessment documents prepared to meet the requirements of the EP&A Act including Reviews of Environmental Factors, Environmental Impact Statements and Environmental Impact Assessments, should address cultural heritage where relevant. Statutory planning documents such as Local Environment Plans and State Environmental Planning Policies typically contain provisions for heritage.

1.5.3 The Burra Charter

The *Burra Charter* is a set of best practice principles and procedures for heritage conservation. It was developed by Australia ICOMOS (International Council for Monuments and Sites), the Australian group of the international professional organisation for conservation. Although without statutory weight, the *Burra Charter* underpins heritage management in New South Wales and Australia. The policies and guidelines of the Heritage Council of NSW and the NSW Heritage Office are consistent with and guided by the *Burra Charter*.

1.6 Statutory Planning Context

1.6.1 Cessnock Local Environment Plan 2011 & Maitland Local Environment Plan 2011

Heritage items in NSW are protected at the local government level under Local Environment Plans (LEP). In 2006 the NSW State Government developed a Standard Instrument LEP Program in order to create a common format and content for LEPs across the state.

As a result the Cessnock Local Environment Plan 2011 (Cessnock LEP) (Cessnock City Council) and the Maitland Local Environment Plan 2011 (Maitland LEP) (Maitland City Council) follow a consistent format. Heritage items are protected under Part 5.10 Heritage Conservation which states that consent is required if it is proposed that a heritage item is demolished, moved, altered, disturbed or if a subdivision or building is to be erected on land on which a heritage item is located. If any of these actions are contemplated, Council must consider the effect that the proposed works will have on the heritage significance of the item or area.

Schedule 5 in the Cessnock and the Maitland LEPs list heritage items within the respective LGA assessed to be of heritage significance to that LGA. **Figure 3** shows potential heritage items in the Project Area.

1.7 Heritage Registers Review

Acknowledged heritage items and places are recorded in statutory and non-statutory registers held at the Federal, State and local level depending on their level of significance. Internationally significant sites of 'outstanding universal value' are inscribed in the World Heritage List (WHL) and in turn, such sites are usually recognised through their inclusion on Federal and state-level registers.

Federal designations include the National Heritage List (NHL) and the Commonwealth Heritage List (CHL) created by the *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act). Both registers are maintained by the Department of Sustainability, Environment, Water, Population and Communities and are available to view on an online database, the Australian Heritage Database. The NHL includes natural, historic and Indigenous places that are of outstanding national heritage value to the Australian nation. The CHL protects natural, Indigenous and historic heritage places on land owned or leased by the Commonwealth or a Commonwealth Authority.

Heritage places of state significance are included on the State Heritage Register (SHR) maintained by the Heritage Branch and available on the NSW Heritage Inventory database. The Inventory includes items of state and local significance in NSW, it may not necessarily be comprehensive and inclusion on the inventory does not carry statutory weight in its own right. In order to reach the threshold for inclusion in the SHR, a place needs to meet one of more of the heritage criteria identified by the Heritage Council of NSW. The ultimate decision on whether a place is included on the State Heritage Register is made by the Minister for Heritage.

Places of local significance are included in heritage schedules in Local Environmental Plans (LEPs).

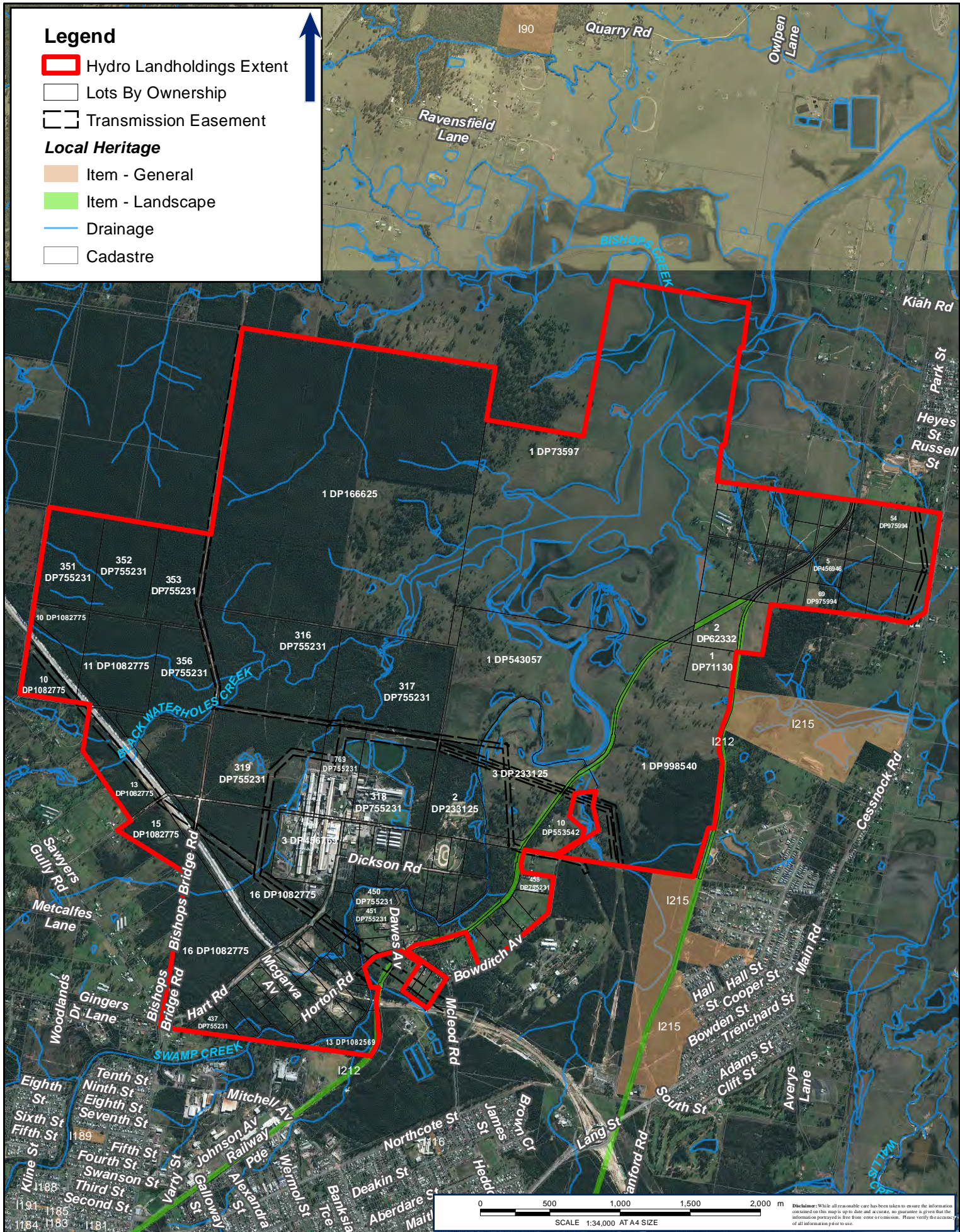


Figure 2: Heritage Items in the Vicinity of the Project Area

LOCATION: Kurri Kurri	DATUM: GDA94
	PROJECTION: MGA Zone 56
JOB NO.: PR122177	Data Sources: Client
PURPOSE: HERITAGE	RPS
Technician: Natalie Wood	Date: 19/08/2014

CLIENT: ESS AUSTRALIA
 Copyright: This document and the information shown shall remain the property of RPS Australia East Pty Ltd. The document may only be used for the purpose for which it was supplied and in accordance with the terms of engagement for the commission. Unauthorised use of this document in any way is prohibited.

RPS AUSTRALIA EAST PTY LTD (ABN 44 140 292 762)
 241 DENISON STREET BROADMEADOW PO BOX 428 HAMILTON NSW 2303
 T: 02 4940 4200 F: 02 4961 6794 www.rpsgroup.com.au



2.0 Historical Context

2.1 History of Kurri Kurri

This section provides a brief history of the Kurri Kurri area followed by sections on: coal mining and coal railways; the Weston Soldier Settlement; and the Kurri Kurri Aluminium Smelter all relevant to the Project Area.

Early settlement

The first official expedition inland to explore the lower reaches of the Coal River (now Hunter River) was led by Lieutenant-Colonel Paterson who in 1801 departed from what is now Newcastle. Lieutenant-Colonel Paterson, on his return, reported that the river systems of the Hunter, Williams and Paterson River gave good access to stands of timber.

Development of the lower Hunter Valley was hampered in the period 1804 to 1821 with Newcastle used as a penal settlement and access to the region restricted for settlers (Brayshaw 1987:9). While settlement was restricted the government used convicts to access resources of the area with enterprises such as coal extraction, lime burning and timber getting. With regard to the area around Kurri Kurri, it is first mentioned with reference to convicts accessing valuable stands of timber such as cedar (Parkes, Comerford et al. 1979).

In 1821 Benjamin Blackburn acquired 400 acres in the area now known as Kurri Kurri and Pelaw Main. Further settlers moved into the area and in 1826 John Campbell acquired 2560 acres which he named Cessnock after his family estate in Scotland. In 1828 it was recorded that Cessnock comprised 100 acres of cleared land with 50 cultivated, three horses and 90 horned cattle, sheep they held previously had been disposed of (Parkes, Comerford et al. 1979:106). The farm, described as heavily wooded, was watered by Black Creek. In 1852 Cessnock was offered for sale as subdivided lots following Campbell's recognition of the persistent use of Black Creek and in particular Cessnock, by travellers on the Great Northern Road (Parkes, Comerford et al. 1979:166).

In 1853 the estate, now divided into allotments and farms, was offered for sale. From this private village the town of Cessnock developed (Parkes, Comerford et al. 1979:168). The area remained largely rural until the discovery of coal in commercial quantities and the subsequent development of the South Maitland Coalfields. The first commercial coal operation was the Greta Coal and Shale Mine Company formed in 1864. At its peak there were seventeen collieries operating on the South Maitland Coalfields (Parkes, Comerford et al. 1979:217).

The real growth in population in Cessnock and the establishment of Kurri Kurri area came with the mining of coal in commercial quantities in the late nineteenth and early twentieth century.

The opening of many small coal mines in the Cessnock district led to the establishment of villages and towns to house the employees and their families. In 1902 the first government mining in New South Wales was established at Kurri Kurri. Kurri Kurri's location was central to the location of newly opened mines such as Stanford Merthyr, Pelaw Main and Abermain.

As a planned town, Kurri Kurri was laid out by surveyors on a grid pattern with blocks set aside for services such as a school, police station, court house and post office. In 1903 blocks of land were offered for sale and over the next decade the population increased rapidly. By the 1960s most mines had ceased production (Penelope Pike Meredith Walker and Associates 1992-1994).

Coal mining and coal railways

While the early history of the lower Hunter Valley is based on agriculture, the identification of large quantities of accessible coal was the impetus for rapid population growth at the end of the nineteenth century and beginning of the twentieth century. The presence of coal deposits in the lower Hunter Valley was first identified by the Reverend W B Clarke prior to 1860; however, it was not until more definitive survey work was undertaken by T.W. Edgeworth David in 1886 into what was to become the South Maitland Coalfields that the industry rapidly developed (Ellis 1969:126).

The development of a number of mines led to a rapid population influx and the establishment of new towns and villages to house them most notably Kurri Kurri. In 1902 Kurri Kurri became the first government proclaimed mining town in NSW. The town was well positioned to service the mines of the Greta Coal measures with Stanford Merthyr (opened 1900), Pelaw Main (1901) and Abermain (1903). A major boost to the town was the construction of a private railway system that linked the new mines to the main rail network at East Greta. By 1903 the town had been laid out by surveyors and the first house blocks were offered for sale. The success of Kurri Kurri and the surrounding villages was linked to the fortunes of the coal mining with the town reaching its maximum population in 1920. A downturn in the industry was followed by a decline in population that reflected the reduction in output or the cessation of mining at local collieries ([NSW Heritage](#)) (NSW Office of Environment & Heritage 2002). A history of the coal mines and railways in the Project Area is at Section 3.0.

Weston Soldier Settlement

After World War I, Kurri Kurri, like other small towns throughout the country, was faced with the prospect of resettling returned soldiers. In 1919, in a response to the need to provide housing and occupations to soldiers returning from the war one of many of Hunter Valley soldier settlements was established to the north of Weston, two kilometres west of Kurri Kurri. The settlement required the clearing of a number of acres of land and the construction of dwellings. The intention was that the small acreages, in addition to providing housing, would provide the opportunity for the establishment of poultry farms. The settlement comprised approximately forty-one farms although it appears many were not occupied and many of the farms failed. A history of the Weston Soldier Settlement is at Section 3.5

Kurri Kurri Aluminium Smelter

The workforce of Kurri Kurri remained largely dependent on the employment provided by the mining industry and to a lesser extent rural industry until the late 1960s. In 1969 the announcement by Alcan Australia that Kurri Kurri had been chosen as the location for a new aluminium smelter, the first in NSW, was seen as a positive outcome for employment in the area.

This decision provided a major boost not only for the local workforce but also for the establishment of small dependent industries. The plant, when operating at maximum capacity, was projected to provide employment for over 700 people, with numerous more employed in ancillary and support industries.

The smelter played a greater role than just a major employer in the community. Alcan and subsequent owners developed the area around the smelter as sporting fields with ovals and attendant facilities. The Kurri Kurri Aluminium Smelter supported ninety local organisations including schools; the Weston Art Show; and the Tidy Town Committee, while education and future employment was promoted through schools, TAFE and University (Hydro Aluminium 2012:155).

The pride the smelter workers had in their workplace was demonstrated in the Aluminium Smelter regularly winning the Kurri Kurri Garden Club Annual Garden Competition – Industrial Section (Hydro Aluminium 2012:150) while the connection to the community was reflected in the 1978 Smelter Open Day attracting 1,250 people. The history of the Kurri Kurri Aluminium Smelter is described in detail in Section 3.1.

2.2 Recorded Historic Heritage

Acknowledged heritage items and places are recorded in statutory and non-statutory registers held at the Federal, State and local level depending on their level of significance and as detailed in Section 1.6 of this report.

2.2.1 World heritage

A search of the Australian Heritage Database, which includes World Heritage items, on 3 June 2014, found no World Heritage Sites located within the Project Area.

2.2.2 National and Commonwealth Heritage

A search of the Australian Heritage Database was undertaken on 3 June 2014, which indicated that there are no National or Commonwealth heritage items within or in the vicinity of the Project Area.

2.2.3 State Heritage

A search of the NSW State Heritage Register on 3 June 2014 identified one item of state heritage significance in the Kurri Kurri area and no items subject to an interim, or authorised interim heritage order (**Table 1**). A search of the NSW State Heritage Register (3 June 2014) found no items registered in the vicinity of the Project Area in the Maitland LGA.

The proposal will not impact on the heritage significance of the items.

Table 1 Items in Kurri Kurri on the State Heritage Register (Office of Environment and Heritage 2013)

Item	Address	Heritage listing	Distance from Project Area
Richmond Main Colliery	South Maitland Coalfields, Kurri Kurri	State	7 kilometres (direct line)

2.2.4 Local heritage

A search on 3 June 2014 of the State Heritage Inventory for the Cessnock LGA found 35 items registered as locally significant in Kurri Kurri (**Appendix 1**). Two items listed in **Table 2** and shown in Figure 3 are in, or in close proximity to, the Project Area.

A search of the State Heritage Inventory (3 June 2014) was also conducted for items in the Maitland LGA that may be in the Project Area with no items recorded.

Table 2 Items in the vicinity of the Project Area (Cessnock LEP Schedule 5 2011)

Item	Address	Heritage listing	Distance from Project Area
Collieries of the South Maitland / Greta Coal Measure. Item I215	Various	Local	Adjacent
South Maitland Railway System. Item I212	Various	Local	Inside and adjacent

3.0 Heritage Items and potential Heritage Items in the Project Area

The Project Area encompasses approximately 2,000 hectares and includes a number of potential heritage items.

The Kurri Kurri Aluminium Smelter plant itself covers approximately 60 hectares, the remainder of the land is held to ensure an adequate buffer to the smelter works. The buffer zone comprises largely undeveloped land leased for agricultural purposes with some light industry and rural residential areas present. The location of the potential heritage items described in Section 3 is shown in **Figure 3**.

The potential heritage items are not deemed to be of significance until an historic investigation (3.0) and physical assessment (Section 4.0) had been conducted. Those potential heritage items are then assessed for heritage significance (Section 5.0 & Section 6.0).

3.1 Hydro Aluminium Kurri Kurri

The Kurri Kurri Aluminium Smelter complex is in the southern section of the Project Area (**Figure 3**).

The establishment of an aluminium smelting industry in Australia was largely a result of Government intervention. In 1963 the Federal Government placed an embargo on the importation of all metal products in a move intended to establish a viable production base in Australia. In 1965, Australuco, a partially owned Australian fabrication company who had sourced metal overseas, decided to build its own smelter. At the time Alcan (Aluminium Company of Canada) took the opportunity to increase its ownership in Australuco and with the change in the balance of ownership, the name of the company was changed to Alcan Australia Pty Ltd (Hydro Aluminium 2012).

Alcan Australia Pty Ltd chose Kurri Kurri, in the lower Hunter Valley, as the location for the first aluminium smelter to be constructed in New South Wales. This location was chosen largely because of the proximity to the Port of Newcastle; the presence of the state's major power stations in the Hunter; road and rail links; large area of level land; and a skilled workforce developed by the Hunter mining industry.

The method of production was through the Hall Heroult aluminium reduction cell, a process that had been developed independently in both the United States (Charles Martin Hall) and in France (Paul Heroult) in the late 1880s. Using this method at Kurri Kurri, in 1969 the first aluminium ingots were produced from a single potline (Potline 1) that consisted of 72 cells with a potential output of 27,000 tonnes per annum (Hydro Aluminium 2012:148). Within four years the number of cells in the potline had increased to 120 with a capacity of 45,000 tonnes per annum. The type of cell utilised was developed by Alcan and incorporated end to end, high amperage, pre-bake cell prototypes (Hydro Aluminium 2012:149).

Further development of the smelter plant came in 1977 with a new crane and new pollution control equipment that used a process known as dry scrubbing. This system provided an emission control programme that included the capture of the primary emission fume and its treatment in alumina dry scrubbing centres for fluoride and particulate removal. Each potline had two centres for scrubbing (Mulligan 1996:427).

Between 1979 and 1980 Potline 2 was designed and built. This Potline was wider, longer and strengthened to prevent bowing that had occurred with Potline 1. At the same time the Carbon Plant Rodding building was completed. These developments led to an increase in apprentice intake to ensure the supply of a skilled workforce to meet future demand (Hydro Aluminium 2012:150). By 1981 Potline 2 was fully operational with a capacity of 90,000 tonnes per annum, however an increase in demand saw further expansion planned with an additional potline, Potline 3 (Hydro Aluminium 2012:151). While work commenced on the third potline, by mid 1982 a worldwide reduction in the demand for aluminium saw the work on the new potline halt (Hydro Aluminium 2012:151).

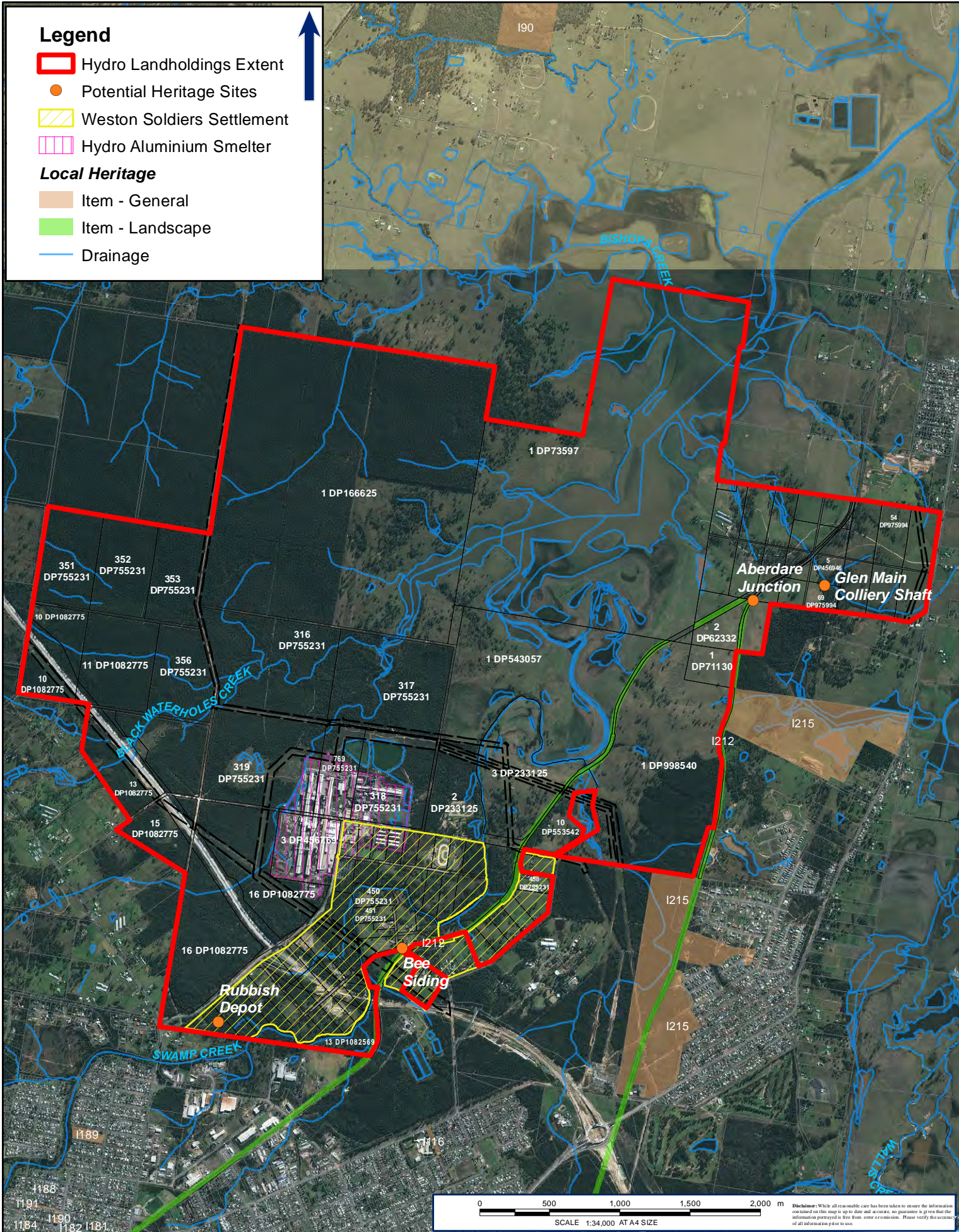


Figure 3: Potential Heritage Items within Project Area

LOCATION: Kurri Kurri	DATUM: GDA94
JOB NO.: PR122177	PROJECTION: MGA Zone 56
PURPOSE: HERITAGE	Data Sources: Client RPS
Technician: Natalie Wood	Date: 24/02/2015

CLIENT: ESS AUSTRALIA
 Copyright: This document and the information shown shall remain the property of RPS Australia East Pty Ltd. The document may only be used for the purpose for which it was supplied and in accordance with the terms of engagement for the commission. Unauthorised use of this document in any way is prohibited.

RPS AUSTRALIA EAST PTY LTD (ABN 44 140 292 762)
 241 DENISON STREET BROADMEADOW PO BOX 428 HAMILTON NSW 2303
 T: 02 4940 4200 F: 02 4961 6794 www.rpsgroup.com.au



Work on Potline 3 re-commenced in 1983 as demand increased (Hydro Aluminium 2012:151). A strong demand for aluminium products resulted in Potlines 1 and 2 operating at maximum capacity for the first time in 1984. In the same year the No. 1 Ring Furnace was rebuilt incorporating 1,131,000 bricks. This furnace, comprising 64 sections with 8 pits each, operated in a circular fashion and was 111 metres long; 25 metres wide; and 3.5 metres deep (Hydro Aluminium 2012:152).

The new Potline 3 was completed and commenced production in 1985. The works included the building of a new switchyard, two potline dry scrubbers, and bath handling facility. New technology saw the introduction of tilt furnaces; a new casting machine; automated ingot handling; a new slab saw; and an inspection and saving facility (Hydro Aluminium 2012:152).

In 1987, the three Potlines, totalling 360 pots, were operating at full capacity. In the same year the greenmix plant was shut-down for refurbishment. The greenmix plant is where carbon for anode manufacture is crushed, screened, and mixed with liquid pitch before being formed into anodes and baked. The refurbished greenmix plant had new crushers, new screens, new wear resistant chute work; and a new automated control system (Hydro Aluminium 2012:153).

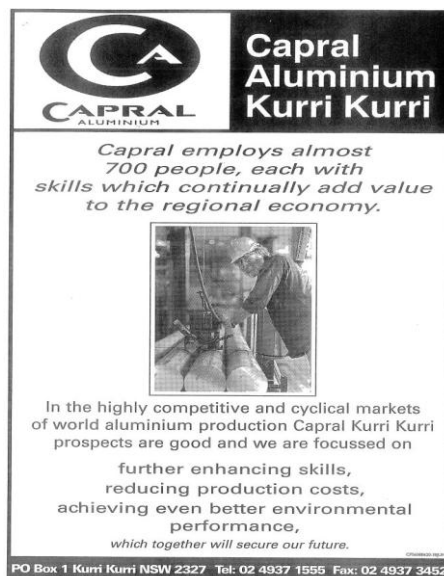
In 1991 a new recycling plant was commissioned with a significant number of local people employed in the new facility. In the wider community an even larger number of people were employed indirectly through local companies and contractors. By 1992 the recycling plant was close to full production with 13,000 tonnes produced in first 12 months.

In 1992 a new pouring system was installed with sheet ingots produced for the first time at the plant. By 1994, 710 people were employed at the smelter while in 1995 Alcan Australia changed its name to Capral Aluminium Pty Ltd (Hydro Aluminium 2012:157).

The period to 2000 saw further upgrade and modernisation of the plant, a response to the firm market for aluminium products. This work included a \$27 million upgrade of the Carbon Plant and Potrooms which resulted in improved operational and environmental performance (Hydro Aluminium 2012:158).

In June 2000 Capral Aluminium Pty Ltd announced the sale of the Kurri Kurri aluminium smelter to the German group VAW AG for A\$464 million (Mining Journal 2000). VAW AG held the smelter for two years before selling it in 2002 to Norway based Norsk-Hydro ASA. At the time it was reported that the smelter had a capacity for 150,000 tonnes annually and 600 staff (Hydro Aluminium 2012:160).

Figure 4 Visions of Yesteryear (1998) Kurri Kurri Tidy Town Project (Advertisement)



The viability of aluminium production in Australia was however becoming tenuous with the impact of a number of significant factors. One of the most significant factors was the increasing privatisation of the local electricity market that resulted in a loss of subsidies. A weak global price for aluminium also had an impact on the viability of production. The commercial assessment was that the negative issues were not short term and they would continue to impact on the industry over the longer term making continued viability difficult (Recycling Today 2012).

As a result in 2012 Norsk Hydro announced the closure of the Hydro Aluminium Smelter at Kurri Kurri with primary metal production ceasing in September 2012 and casthouse production finishing in October 2012.

Figure 5 Plant Layout: Extract from James B Croft & Associates. 1980 EIS for Expansion of an Aluminium Smelter. Line III Kurri Kurri, NSW

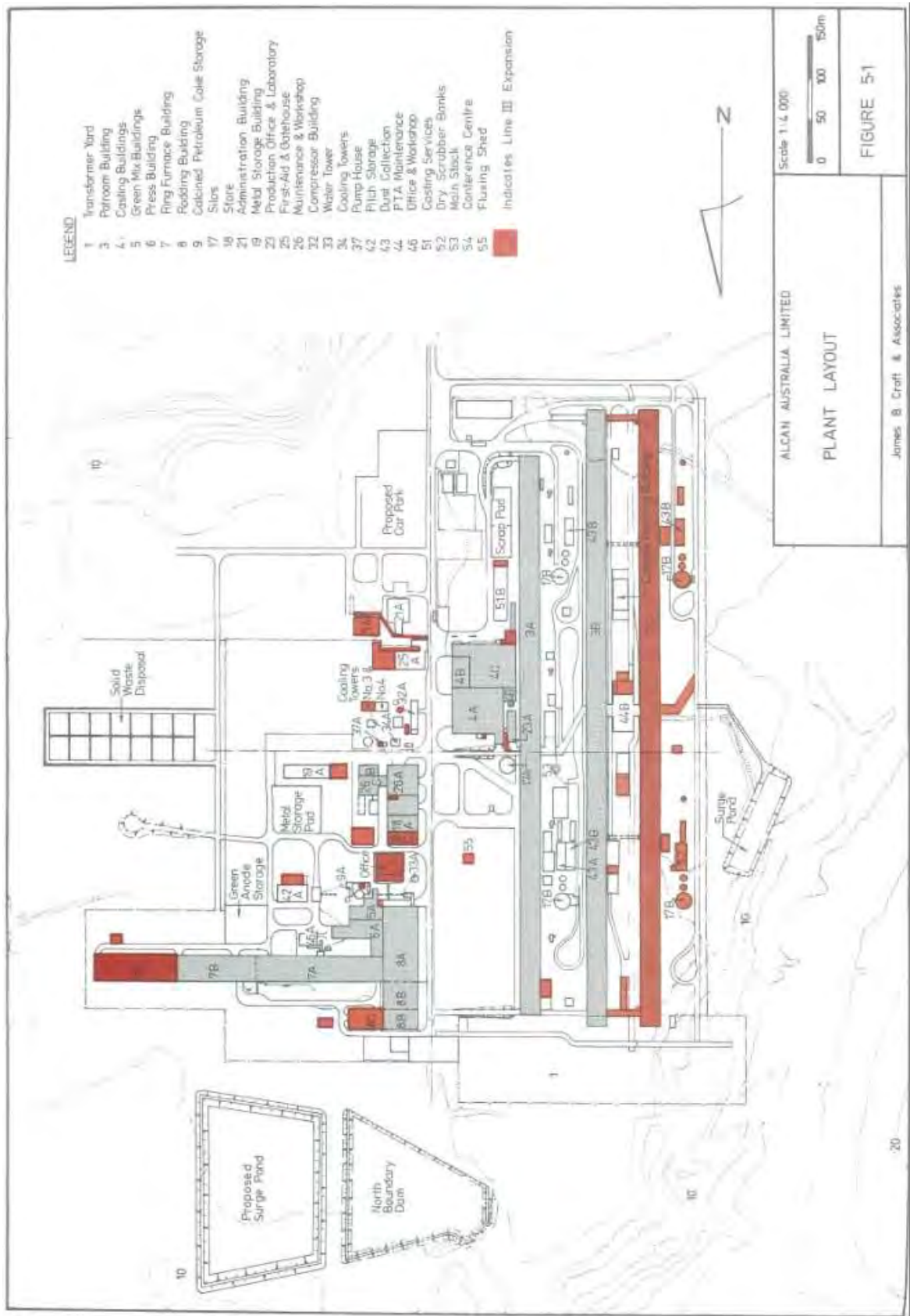
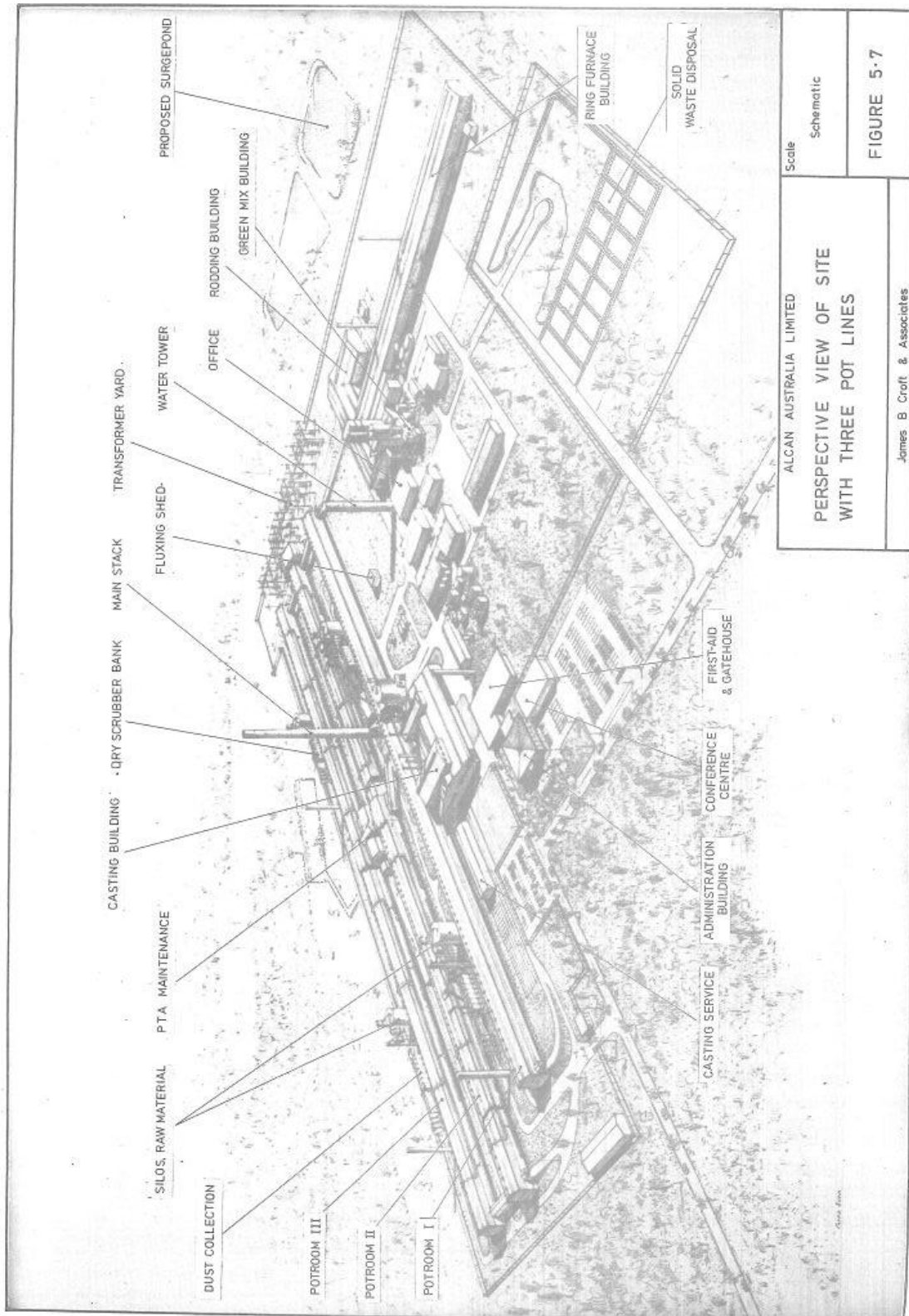


Figure 6 Perspective View: Extract from James B Croft & Associates. 1980 EIS for Expansion of an Aluminium Smelter. Line III Kurri Kurri, NSW



3.2 South Maitland Railway

The Project Area contains operational sections of the South Maitland Railway (SMR) and remnant sections of the defunct Stanford Railway (Section 3.3) (**Figure 3**).

The operational SMR is used by Austar Coal Mine to ship coal from Paxton (approximately 23 km to south of the Project Area) to Maitland Junction where it joins the Great Northern Line (Umwelt 2008 Austar Stage 3 – Preliminary Environmental Impact Statement p.34).

The SMR comprised a series of privately constructed and owned rail lines built to service the early coal mining industry in the Cessnock and Maitland area. Following the successful survey for coal deposits by Professor Edgeworth David, the Silkstone Coal Company formed in 1888 and acquired 250 acres for the purpose of coal mining. This was followed shortly (1891) by the founding of the East Greta Coal Mining Company.

The difficulty in transporting the mined coal to markets led to the NSW Parliament passing the 1889 Silkstone Coal Mine Railway Act that provided approval for the construction of a private railway line. In 1892 the Clyde Coal Land and Investment (which had been acquired by the Silkstone Coal Company) collaborated with the East Greta Coal Company to build a railway line from the Great Northern Line at Maitland to the East Greta Colliery. This private Aberdare Railway, operating as the East Greta Coal Mining Company Railway, ultimately owned the majority of railways in the South Maitland coalfields. As the construction of new railway lines required an Act of Parliament a successive number of acts were passed they included: the Stanford Railway Act of 25 July 1900; and Aberdare Railway Act of 27 December 1901 (Delaney 1968:2).

By August 1903 the East Greta Coal Company Railway, by agreement, operated all coal haulage and passengers services for the various coal companies (Delaney 1985:1). On 22 November 1918 a new company, South Maitland Railways Pty Ltd was incorporated to amalgamate the railway operations of the East Greta Coal Mining Company and the Hebburn Coal Company thereby separating the railway from the coal mining activities. The new company was responsible for all coal and passenger services from Cessnock to the government-owned Great Northern Railway Line at West Maitland (Tonks 1978:53). The coal was transported north to East Greta Junction from there it was transferred to the NSW Government Railway system for transport to dockyards at either Hexham or Newcastle (Attenborough 2001:13).

The operation of the railway system was dependent on the coal industry and its output. In 1928 many of the collieries were idle for up to 10 months, a result of a depressed coal trade and this was followed in 1929 by a widespread miner's strike that was supported by SMR employees. With the SMR employees on strike the rail passenger service halted for nine months. On 1st March 1930 the SMR Company carriages at East Greta Junction caught fire with all 30 passenger wagons destroyed. When the miners returned to work the NSW Government Railways contracted SMR Limited to operate the passenger service from Maitland to Cessnock. The Government Railways supplied the locomotives, the carriages, the engine crews and the guards, while SMR provided the station staff and signalmen.

As new rail lines were required, such as for Greta Main in 1922 and the Weston to Pelaw Main Colliery link in 1936, branch railway lines were constructed. In addition to rail lines, significant infrastructure such as Cessnock Railway Station and minor functional infrastructure such as Bee Siding near Weston was also constructed (**Figure 7**). The interconnectedness of the private and Government railway systems proved invaluable in 1949 when major flooding closed the SMR. The Weston to Pelaw Main link enabled the SMR trains to connect to the Government network via the Richmond Vale Railway (Delaney 1968:10).

The decline in the coal industry in the lower Hunter in the 1950s and 1960s and the closure of many mines led to subsequent closure of the related railway links. In 1974 an inspection of the SMR by representatives of the Public Transport Commission led to speculation that they would assume control of the private railway

system. While this did not eventuate, in 1983 termination notices were issued to SMR locomotive staff. The end of the last steam-operated railway in the Southern Hemisphere came in July 1983 with the remaining locomotives moved to the still operational engine sheds. The heritage value of the SMR locomotives was noted with the NSW Heritage Council placing a Section 130 Preservation Order over the SMR complex at East Greta Junction (Attenborough 2001:114).

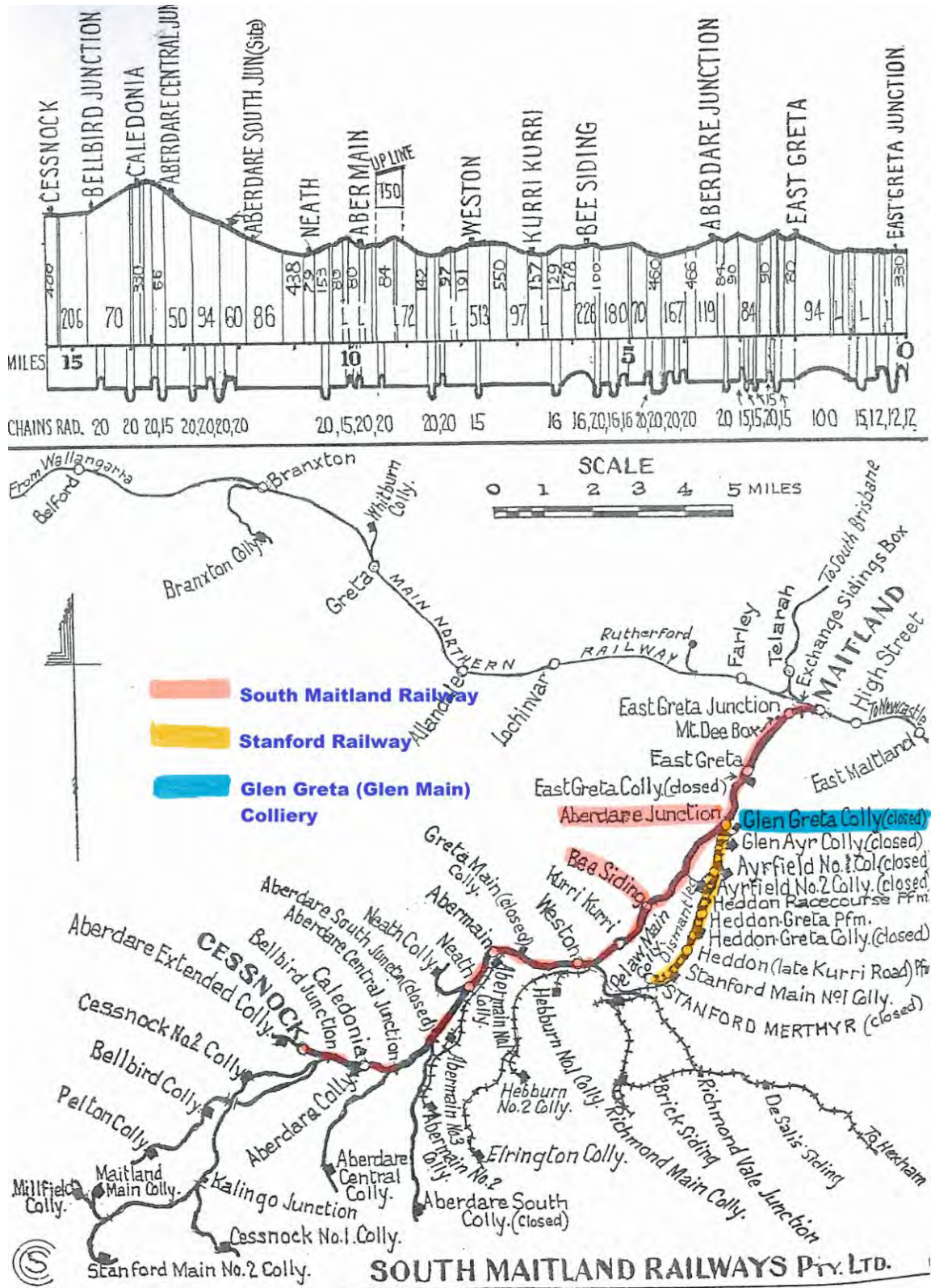
As the mines ceased production the rail lines and infrastructure were removed. While some sections of the SMR are still functional the remainder and majority is only apparent in remnant rail embankments and infrastructure such as bridge supports. The Cessnock Heritage Study (Penelope Pike Meredith Walker and Associates 1992-1994) details a number of items pertaining to the SMR. Those items include (the bracketed number is the Heritage Study Reference Number):

- Abermain (037); Caledonia (161); Neath (226) and Weston (048) railway platforms
- Railway embankment to Neath (278)
- Kurri Kurri North Railway (096)

Figure 7 Bee Siding – historic photograph (Attenborough 2001:100)



Figure 8 Location of railways and colliery items (Extract: ARHS Bulletin 1966:146)



3.3 The Stanford Railway

The northern section of the Stanford Railway is in the Project Area (**Figure 3**)

On 25th July 1900 the NSW Parliament passed the Stanford Coal Mining Railway Act, permitting the extension of the East Greta Coal Mining Company Railway from East Greta to Stanford Merthyr. Construction of the 5 miles 18 chains (8.36km) Stanford Railway commenced in March or April 1901 and was officially opened on Friday 6th September 1901 with a banquet held in the blacksmith's workshops at Stanford Merthyr Colliery (Collections Australia 2013).

With the commencement of mines at Stanford Greta No.1 and Pelaw Main, the potential of the line for use as a passenger service was recognised and on 15 June 1902 a passenger service from East Greta Junction to Stanford Merthyr commenced. Station staff was provided at East Greta Junction, East Greta and Stanford Merthyr with Aberdare Junction and Heddon having unattended platforms (Delaney 1987:20).

Figure 9 Aberdare Junction – historic photograph (Source: Cultural Collections – University of Newcastle)



The Stanford Railway serviced the following collieries:

Pelaw Main Colliery: Pelaw Main developed by J & A Brown was originally known as Stanford Greta No. 2. The colliery commenced production in 1901 with the first coal sent over the newly opened 1 mile 26 chain extension of the Stanford Railway in 1902. The subsidence of a section of the Stanford Railway in 1937 resulted in coal production being sent via Paxton, this remained in place until Pelaw Main Colliery ceased operation in 1961. All rail sidings and tracks have been removed and pit-top structures demolished. Some red brick "skeleton" buildings (apart from the colliery office) still stand (Collections Australia 2013).

Stanford Merthyr: This colliery commenced with the sinking of bores around 1891. Work appears to have been intermittent however on the 4th February 1901 the East Greta Coal Mining Company announced they had commenced mining operations in its recently purchased Stanford Merthyr mine. Following a fatal fire and explosion in 1905 full production wasn't achieved again at the mine until late 1906. In January 1931 the J. & A. Brown Abermain - Seaham Company Limited took over the East Greta Coal Mining Company and renamed Stanford Merthyr as the Stanford Main No. 1 Colliery. Like

other mines in the area Stanford Merthyr/ Stanford Main No. 1 had recurrent problems with flooding of the mine workings, despite this it remained in production until 24th May 1957 (Delaney 2012).

Heddon Greta: In 1890 mining commenced at Heddon Greta with production of 45 ton being recorded in 1892. In 1905 an underground fire in the Heddon Greta Colliery caused the "sealing-off" of the whole of the north section of the workings. This section was re-opened after 117 days on the 14th June 1905. When the fire reignited a smaller area of the colliery's north section was sealed off permanently. Fire remained a problem for the mine and in 1910 a further fire caused the whole pit to be sealed off and abandoned (Delaney 2012).

Ayrfield No 1: The colliery opened in 1910 and in 1923 it became the first mine owned by R.W. Miller, who was to become a major force in the local coal industry. Despite repetitive problems with flooding the mine continued operating. In 1938 an underground fire spread to surface facilities with a number of buildings destroyed. The mine was sealed and mining operations ceased. A further fire in 1946 destroyed more of the then-abandoned structure and the area was bulldozed. The rails in the colliery area were removed at this time (Delaney 2012).

Ayrfield No 2: In 1924 the colliery opened in the vicinity of the Heddon Greta Racecourse Platform. Poor demand for coal saw the closure of the mine in 1928. There was sporadic further mining, however, the mine finally closed in 1929–1930 when the shafts were flooded. The railway was removed around that time (Tonks 1978:56).

Glen Ayr: The colliery commenced production in 1914 despite a low demand for coal. In 1929–30 the mine was closed when water seeping from the East Greta No. 1 and No.2 flooded the underground workings. The surface facilities and tracks were removed some time prior to 1945 and the location of the mine is now only evident through a large area of subsidence (Tonks 1978:48).

Glen Greta (Glen Main) Colliery (see Section 3.4)

On 1st March 1930 the SMR Company carriages at East Greta Junction caught fire with the entire fleet of thirty passenger wagons destroyed. Subsequently the passenger train service that had operated on the Stanford Railway between Maitland Stanford Merthyr was cancelled. The SMR replaced the service with an omnibus road service from Stanford Merthyr village, Pelaw Main village and a number of other Kurri localities to the North Kurri Railway Station, at that point it connected to a new passenger service (Delaney 2012).

On the 27th July 1934, near the Ayrfield Collieries, a huge area of ground subsided rendering that section of the rail line inoperable. As a result the Stanford Railway beyond the entry to Ayrfield No. 1 Colliery was closed. In August 1934 the remainder of the Stanford Railway was closed with the still operating collieries sending coal via the Richmond Vale Railway (Attenborough 2001:13).

3.4 Glen Greta (Glen Main) Colliery

The Glen Greta Colliery site is in the Project Area (**Figure 3**).

Glen Greta Colliery, owned by James and Edward Fallin, was established in January 1930 with the intention of mining the Greta Top Seam. The Fallin brothers also owned Glen Ayr Colliery approximately 500 metres to the south. In June of that year serious flooding led to the flooding of the Glen Ayr Colliery and destruction of the pit top infrastructure, the damage was so significant that the mine closed permanently. At the same time the Glen Greta mine suffered a major fall-in near the mine entrance with the Miners Federation subsequently petitioning for its closure due to unsafe working conditions (Delaney 2012).

The mine was subsequently closed for six months to allow for repairs, a period that also saw difficult operating conditions for the coal industry with industrial disputes and low coal prices. The mine reopened in

December 1930 but had closed again by July 1931. In May 1933 ownership of the Glen Greta Colliery passed to Mr E. M. Robbins. The Colliery name was at this point changed to Glen Main and once again commenced operation, however, only managed a low output of only 20 tons per week. In January 1936 it once again closed (Delaney 2012).

Figure 10 Glen Greta (Glen Main) Colliery c.1930 (Source: National Library of Australia. Digital Collection)



In 1936 the mine reopened under new ownership (Mr Alfred Osland) with output doubling to 40 tons per week. During this period the mine suffered two major cave-ins, both in close proximity to the South Maitland Railway Line. The impact on the rail line was so great that trains were required to run at reduced speeds. By 1954 concerns about ground stability in the area led to the South Maitland Railways Pty Ltd deviating the line. A section 800 feet long was moved 12 feet to the west (Delaney 2012).

This was the final reopening for the mine with it closing permanently in August 1939 (Delaney 2012). In 1936 a newspaper article details the dismantling of the slack box at Glen Ayr Colliery and the removal of a large quantity of railway line by West Maitland Municipal Council works for use in the construction of a sports ground (Newcastle Morning Herald and Miners' Advocate 1936:6).

3.5 Weston Soldier Settlement

The Weston Soldier Settlement is in the south of the Project Area (**Figure 3 & Figure 12**).

Background

In February 1916 a conference comprising Commonwealth representatives and State Premiers met to establish a method of rewarding ex-servicemen of World War I and a process for settling them back into the community. The result of that conference was the enactment of soldier settlement legislation in every Australian state. To meet the commitment, Crown Lands were set aside and additional lands acquired to provide ex-soldiers with farming allotments. This decision to resettle ex-soldiers in rural areas was based on

a widely held view that the future economic and social development of Australia was best achieved through rural settlement (Murnane n.d.).

Following the end of World War I an analysis of suitable primary industries identified poultry-raising; hog raising; prune growing; viticulture; market gardening; tropical fruit culture and other orchards as suitable ventures. The report suggested that 'ready-made farms' should be offered to the soldier-settlers. The farms would contain cottages, the quantity of land appropriate for the specialty, stock, plants, and equipment, and the settlers received financial assistance during the establishment period. The Commonwealth government assisted with loans for purposes such as constructing railways, resuming land and providing financial assistance to settlers. The Department of Agriculture made available places in the various training colleges to prepare the soldiers for the work (Royal Australian Historical Society 2009:20).

Despite the efforts the soldier settlement scheme was ultimately a failure with an estimated 59% of soldier settlers in the Hunter Valley having abandoned their holdings by 1933 (Murnane n.d.:43). There were many reasons for the high failure rate with the main factors being: poor physical health of ex-soldiers; unproductive allotments; and inability to repay loans.

Weston Soldier Settlement

This history of the Weston Soldier Settlement has been largely taken from contemporary newspaper reports.

In June 1919, at the annual poultry breeder's conference, the NSW Minister for Lands announced that by the end of that year there would be 175 poultry farms established in NSW for returned soldiers (The Cessnock Eagle and South Maitland Recorder June 1919:3). The development of land at Weston for that purpose was underway quickly and by September 1919 the NSW Returned Soldiers Settlement Branch were advertising for tenders for the clearing of roads and frontages to blocks at the soldier settlement. The estimated area to be cleared was 100 acres although this was later revised to 140 acres. The area was described as:

'adjacent to the 'North Kurri Railway Station, on the Kurri side, thence on the opposite side of the line and extending to Sawyer's Gully Road' in an area known as Callaghan's Estate' (The Cessnock Eagle and South Maitland Recorder 5 September 1919:2).

The area was to be subdivided into 4 to 6 acre lots for poultry farming with the land described as of poor soil and unsuitable for cultivation (The Maitland Daily Mercury 15 October 1919:3). The intention was for the construction of fifty cottages which were to be provided with town water by the Hunter District Water Supply and Sewerage Board (Newcastle Morning Herald and Miners' Advocate 4 November 1919:3).

The farms were described as being provided at a total cost of £1200 to the Commonwealth. Each settler was provided with a well-equipped poultry run with a living supply of well-bred fowls. In addition they received £2.00s weekly as well as an allowance for each child, also fodder for poultry. The allowance and supplies lasted for two years, after which repayments were to be made (Newcastle Morning Herald and Miners' Advocate 15 October 1921:6).

By 1921 forty-two soldier settlers had been housed at the Weston. The Returned Soldier Settlement Loan File provides a list of returned soldiers granted loans for the Weston Soldier Settlement ([NSW Data Records Appendix 2](#)) (NSW Government 2011).

Figure 11 Poultry farm - Bankstown Soldier Settlement (Source: Cultural Collections – University of Newcastle)



The contemporary newspaper reports of the Weston Soldier Settlement provide an account of the difficulties faced by the settlers with the following providing an overview.

The soldier settlers occupying the land were bound by a number of conditions including the repayment of a loan that incorporated the value of the land and a requirement that all marketing of farm output must be through the settlement manager.

The repayment of the loan was a major issue with many settlers unable to meet the repayments required. This is demonstrated in a report of the eviction of a returned soldier and his family in 1924 because of arrears in payments. The newspaper article describes the wife and children of the ex-soldier, who was not home at time the Sheriff arrived, being put out onto the street with their furniture. They remained there until it was possible to arrange a vehicle for transport while the man's request for a few extra days grace was refused (Singleton Argus 15 January 1924:3).

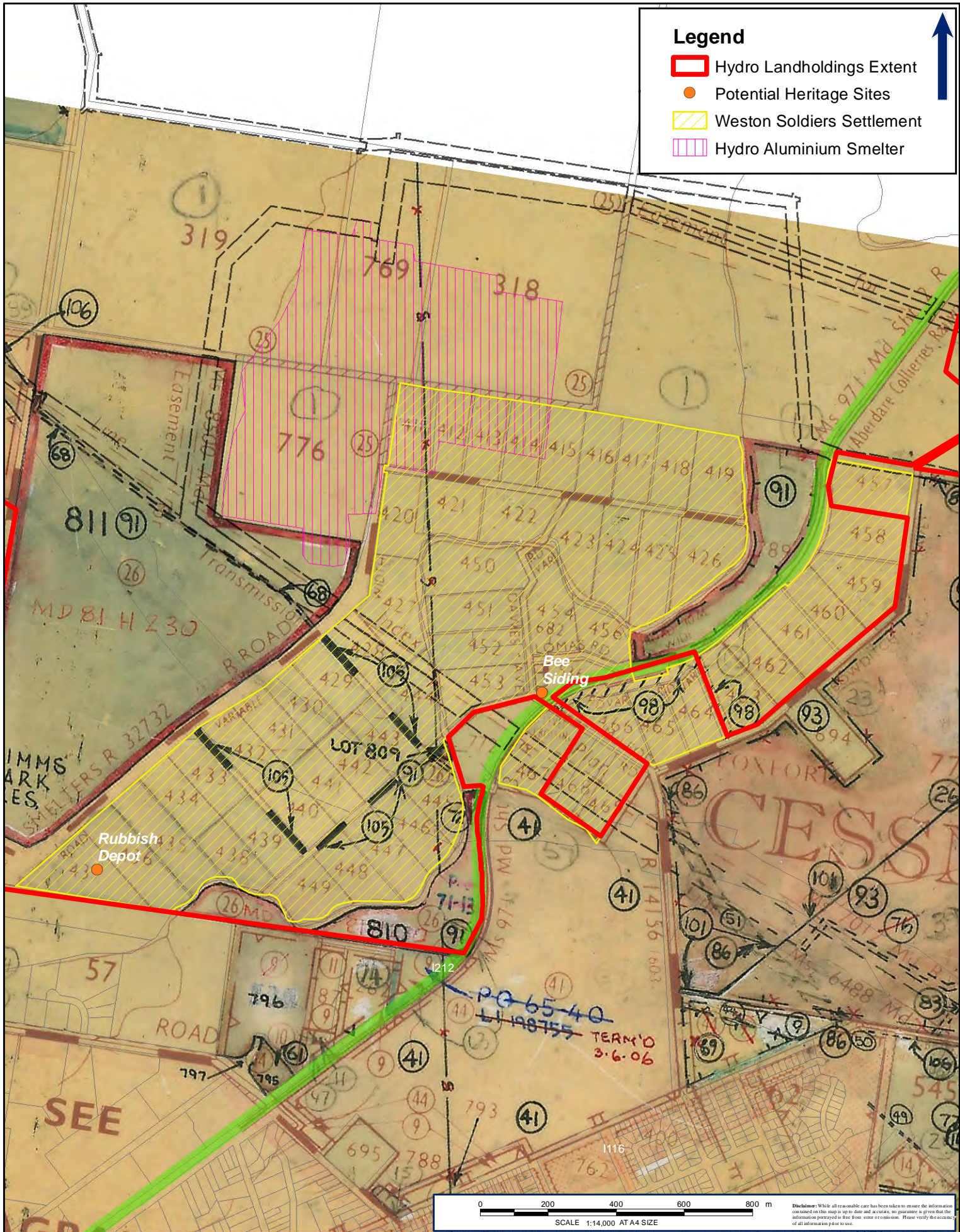
In 1921 a breach of agreement under which the soldier settlers occupied their blocks was reported in the local newspaper. This related to the condition that poultry and produce could only be sold through the manger of the settlement. The evidence was that dressed fowls and eggs from the settlement had been sold outside the agreement with cases of eggs seized by police (Newcastle Morning Herald and Miners' Advocate 15 October 1921:6).

The problems surrounding the soldier settlements resulted in a Committee of Enquiry into Conditions of Soldier Settlements in 1923. The Committee visited the Weston Settlement and discussed the recommendations proposed for their operation. Those recommendations included: that full value of property be determined with repayments made monthly or quarterly; the Government should provide sufficient poultry food to allow a fair start; the settlers would have no further recourse to the Government for assistance; and the settlers should handle their own marketing. It would appear the Committee's main intention was self-sufficiency of the settlements and reduced dependency on the Government (Newcastle Morning Herald and Miners' Advocate 11 April 1923:8).

Dissatisfaction by ex-soldiers with the soldier settlement scheme meant that by September 1924 there were still a number of vacant houses at Weston. At that time there was a proposal for people, other than returned soldiers, should be allowed to take up vacant holdings (The Sydney Morning Herald 10 September 1924:14). This appeared to be still unsuccessful with 22 of the 42 cottages still recorded as being vacant in 1925 (The Maitland Weekly Mercury 2 May 1925:4).

By July 1926 the NSW Department of Lands was disposing of poultry farms at the Weston Soldier Settlement at a greatly reduced price. The article describes the original valuation being from £1070 to £1120 while the re-evaluated disposal price ranged from £550 to £750. The occupying settlers had the right to apply for a revaluation of their holdings if they wished to purchase them. The settlement is described, at the time, as having seventeen farms including the administrator's block occupied while a further twenty five farms were vacant. It was also noted that of the original 41 settlers, only 5 remained. A newspaper article in 1926, only seven years after the settlement was first established, describes 60 settlers having occupied the farms with the majority failing to establish a viable livelihood (South Coast Times and Wollongong Argus 2 July 1926:2).

The Weston Soldier Settlement is still referred to by that name in newspaper articles for a number of years though it is unlikely that many of the ex-soldiers for whom the settlement was intended remained.



3.6 Rubbish depot

The redundant rubbish depot is in the Project Area (**Figure 3**).

There was no available written evidence for a rubbish depot being located in the area. A review of maps for the Parish of Heddon however provided a general indication of the history of that land.

The 1922 map for the Parish of Heddon indicates that the Portions, bordering Swamp Creek, were part of the southernmost extent of the Weston Soldier Settlement. The annotation shows that Portion 437 was the second soldier settlement lot listed for sale (29 June 1923) with the remainder of the Portions listed in the following year. In 1930 the annotations indicate that the designation of a number of blocks for soldier settlement, including Portions 434 and 435, was revoked and tenders called for their sale.

The Parish of Heddon map (1943) shows no owners for the Portions 434; 435; 436; 437 and 438 while Portion 434 appears to be owned by J. McGarvan, the remainder of the Portions have no owners recorded.

The Parish of Heddon map (1959) shows that Pt. Portion 434 to 438 inclusive were deemed 'unsuitable for building purposes' under Section 55 of the Public Health Act 1902 (annotated 3.5.1974). This annotation occurs when the land is contaminated (pers. comm. Stewart Greville RPS Senior Planner) and would indicate that the land had been used for waste disposal prior to that date.

It was not possible to find any immediately available written information on the rubbish depot. It is possible that the local council managed it for the benefit of ratepayers or likely that the area was used by the residents of the Weston Soldier Settlement.

Figure 13 Extract Parish of Heddon map and annotation (1959) ([NSW Lands and Property Information](#))



(82) UNHEALTHY BUILDING LAND - PT. PORTS. 434 TO 438 INCL. (PUB. HEALTH ACT 1902 SEC. 55) GAS. 3.5-1974 (S.E.)
(83) R89278 FOR PUBLIC POUND PURPOSES GAS. 6.8-1974 (S.E.)

4.0 Physical Evaluation

A visual inspection of the Project Area was undertaken on the 19 June and 8 July, 2014 by RPS Senior Cultural Heritage Consultant, Laraine Nelson in conjunction with Kerry McNaughton Environment Officer/Buffer Zone Supervisor, Hydro Aluminium Kurri Kurri Pty Ltd. The inspection included the smelter plant location and potential heritage items in the surrounding buffer zone.

4.1 Hydro Aluminium Kurri Kurri

The Hydro Aluminium Kurri Kurri smelter is no longer operational, however it is in good repair and well maintained. The range of buildings both operational and administration reflect the development of the smelter from 1969, when it was constructed, to date (Plate 1 & Plate 2). The operational buildings are functional and purpose built. They are steel framed, unlined and clad with metal. Natural light is gained through opaque corrugated fibreglass and in some buildings.

The administration buildings and offices, generally constructed of brick with metal roofing, reflect a range of periods with the main buildings dating from the initial construction of the smelter. Functional in style they have little to commend in terms of architectural merit (Plate 3 to Plate 27).

The main plant buildings are described in Table 3 with an indicative location shown in **Figure 14**.

Figure 14 Indicative location of Hydro Aluminium Kurri Kurri main plant buildings

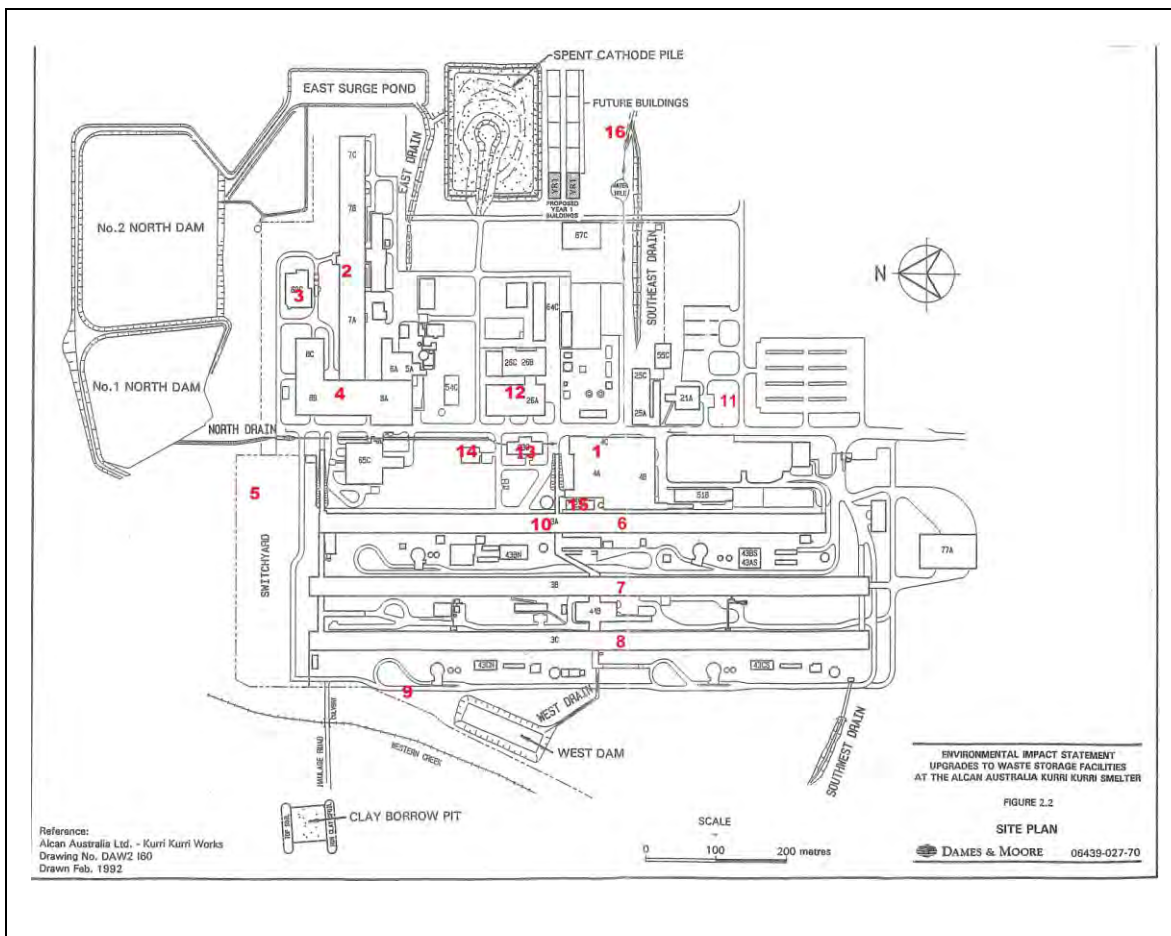


Table 3 Hydro Aluminium Kurri Kurri - Major structures

Building	Description	Plates	Number in Figure 14
Cast house	Steel framed, metal clad, concrete floor, eastern side not clad	Plate 3 & Plate 4	1
Carbon Plant and Ring Furnace	Steel frame metal clad, concrete floor, clear Perspex for natural lighting	Plate 5 & Plate 6	2
Scrubbing system – carbon plant	Comprising metal and reinforced concrete chimneys, associated metal structures with varying dates of construction.	Plate 7 & Plate 8	3
Anode rodding building	Steel frame metal clad, concrete floor, clear Perspex for natural lighting	Plate 9 & Plate 10	4
High voltage Switchyard	Utilitarian	Plate 11	5
Potline buildings	Steel frame metal clad, suspended concrete floor, clear Perspex for natural lighting. Overhead cranes.	Plate 12 to Plate 17	6;7;8
Scrubbing system - potline	Series of utilitarian steel structures	Plate 18 & Plate 19	9
Chimneys	A number of reinforced concrete chimneys are part of the scrubbing process	Plate 20 & Plate 21	10
Administration Block	Utilitarian, metal roof, prefabricated walls,	Plate 22 & Plate 23	11
Engineering	Construction possibly post 2000, steel framed, metal clad	Plate 24	12
HS & E Building and Computer Centre	Health Safety and Environment Building and the Computer Centre Buildings look contemporaneous: Utilitarian, Brick, aluminium windows, metal roof	Plate 25	13; 14
Potroom process centre	Brick and metal roof different construction style to HS and E and CC	Plate 26	15
Potline storage sheds	Series of metal structure, metal clad, concrete floor. No windows.	Plate 27	16

4.2 South Maitland Railway

The section of the South Maitland Railway in the Project Area is operational and is in good repair (Plate 28 & Plate 29).

While the rail line and essential infrastructure is maintained, other ancillary structures such as Bee Siding and Aberdare Junction have been previously removed.

Bee Siding is described as having a pair of 30 metre platforms flanking the main lines including one known as the Soldiers Settlement siding ([NSW RailNet](#)) (NSW RailNet n.d.). The area of Bee Siding, located where MacLeod Road crosses the South Maitland Railway line, was inspected and while the rail line remains and is operational there is no evidence of Bee Siding (Plate 30).

Aberdare Junction was where the Stanford Railway joined the South Maitland Railway. Aberdare Junction is described as having had a sixty-metre platform with shelter on the up main, and a joined pair of sixty-metre platforms serving the down main and Stanford Railway line. A signal box was situated between the platforms and the junction ([NSW RailNet](#)) (NSW RailNet n.d.). The Aberdare Junction area was inspected and while the South Maitland Railway line remains there was no evidence remaining of the platforms, signal box or associated infrastructure (Plate 31).

4.3 Stanford Railway Line

A section of the Stanford Railway Line approximately 500 metres long, heading south from where the Stanford Railway Line joined the South Maitland Railway at Aberdare Junction, is in the Project Area. This portion of the Stanford Railway was walked and was found to be an indistinct embankment with no evidence, other than the embankment of any infrastructure remaining (Plate 32 & Plate 33).

4.4 Glen Greta (Glen Main) Colliery

The inspection of the Glen Greta (Glen Main) Colliery site revealed no evidence of the original pit top infrastructure. The location of the shaft is apparent in a depression approximately three metres square (Plate 34). The only other physical indication that there had once been structures at the location were a number of iron rods sunk into the ground (Plate 35).

There are a number of depressions, which support the contemporary evidence of the mine tunnels being so close to the ground surface that it raised safety issues.

Despite a careful examination of the ground surface there was no evidence of the rail line that serviced the Glen Greta (Glen Main) Colliery. The evidence, with regard the relocation of the Stanford portion of the South Maitland Railway, was still present. Parallel to and on the eastern side of the operating rail line is a redundant rail cutting approximately 150 metres long (Plate 36 & Plate 37).

The physical evidence supports the documentary evidence that the Glen Greta (Glen Main) Colliery was on a small scale and only functioned for a short period.

4.5 Weston Soldier Settlement

The post World War I Weston Soldier Settlement is still evident as a subdivision on parish maps (Figure 12).

An inspection of the area found that it comprised mainly rural holdings with some light industrial businesses. Of the original houses constructed for soldier settlers it appears only two remain (Plate 38 & Plate 39) (pers. comm. Mr Kerry McNaughton). The houses appear to have been modified, are occupied and in reasonable to good repair. The remainder of the area has light industrial buildings, sheds and houses that reflect a pattern of construction that dates from approximately the 1950s onward (Plate 40 to Plate 43).

Despite searches of the Newcastle Public Library – Local Studies Collection; the University of Newcastle Photo Bank; and enquiries to the Coalfields Heritage Group, no historic photographs of the Weston Soldier Settlement could be located.

4.6 Rubbish depot

The rubbish depot is covered in grass with shrubs and trees tending to be more common around the perimeter. The ground surface is uneven with small and large mounds and depressions across the area (Plate 44). A closer inspection of surface exposures revealed broken glass, tin cans, bottles and a variety of debris that appear to date from the late twentieth century (Plate 45).

5.0 Historical Themes

In 1993 the Principle Historic Themes Project was initiated by the Australian Heritage Commission to establish a practical and comprehensive framework of Australian themes that would assist in the identification, assessment, interpretation and management of heritage places in Australia. The intention was that the thematic framework, applicable at National, State and Territory, regional and local level, would provide a consistent and balanced approach to the identification and conservation of heritage places. The Australian Historic Themes (Australian Heritage Commission 2001) describes nine Thematic Groups, which encompass a network of specific themes and sub-themes. **Figure 3** lists the potential heritage items in the Project Area and with relevant themes.

The assessment of the following potential heritage items as being of heritage significance is in Section 6.0.

Table 4 Historical themes

Item	Australian Theme	NSW Theme	Local Theme
Hydro Aluminium Smelter	3 Developing local, regional and national economies 3.13 Developing an Australian manufacturing capacity	Activity associated with the manufacture, production and distribution of goods	Industry
South Maitland Railway	3 Developing local, regional and national economies 3.8 Moving goods and people 3.8.6 Building and maintaining railways	Activity associated with the moving of people and goods from one place to another, and systems for the provision of such movements	Transport
Stanford Railway	3 Developing local, regional and national economies 3.8 Moving goods and people 3.8.6 Building and maintaining railways	Activity associated with the moving of people and goods from one place to another, and systems for the provision of such movements	Transport
Glen Greta (Glen Main) Colliery	3 Developing local, regional and national economies 3.4 Utilising natural resources 3.4.3 Mining	Activity associated with the identification, extraction, processing and distribution of inorganic substances	Mining
Weston Soldier Settlement	4 Building settlements, towns and cities 4.5 Making settlements to serve rural Australia	Activities and processes for identifying forms of ownership and occupancy of land	Land tenure
Rubbish depot	4 Building settlements, towns and cities 4.2 Supplying urban services	Activities associated with the provision of services, especially on a communal basis	Utilities

6.0 Heritage Significance Assessment

In line with the Burra Charter, before making decisions about the future of a heritage item, it is first necessary to understand its heritage significance and the values it embodies. The following section contains an assessment of the heritage significance of each of the items inside the Project Area in accordance with NSW state significance heritage criteria as contained within the *Heritage Act 1977* and explained in 'Assessing Heritage Significance' (NSW Heritage Office 2001). Consideration is also given to the integrity and intactness of the items. **Table 5** below details the NSW Heritage Assessment Criteria.

Table 5 NSW Heritage Criteria

Criterion	Description
Criterion (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);
Criterion (b)	An item has strong or special association 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);
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);
Criterion (d)	An item has strong or special association with a particular community or cultural group in NSW (or the local area) for social, cultural or spiritual reasons;
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);
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);
Criterion (g)	An item is important in demonstrating the principal characteristics of a class of NSW's <ul style="list-style-type: none"> • cultural or natural places; or • cultural or natural environments. (or a class of the local area's <ul style="list-style-type: none"> • cultural or natural places; or cultural or natural environments)

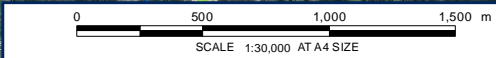
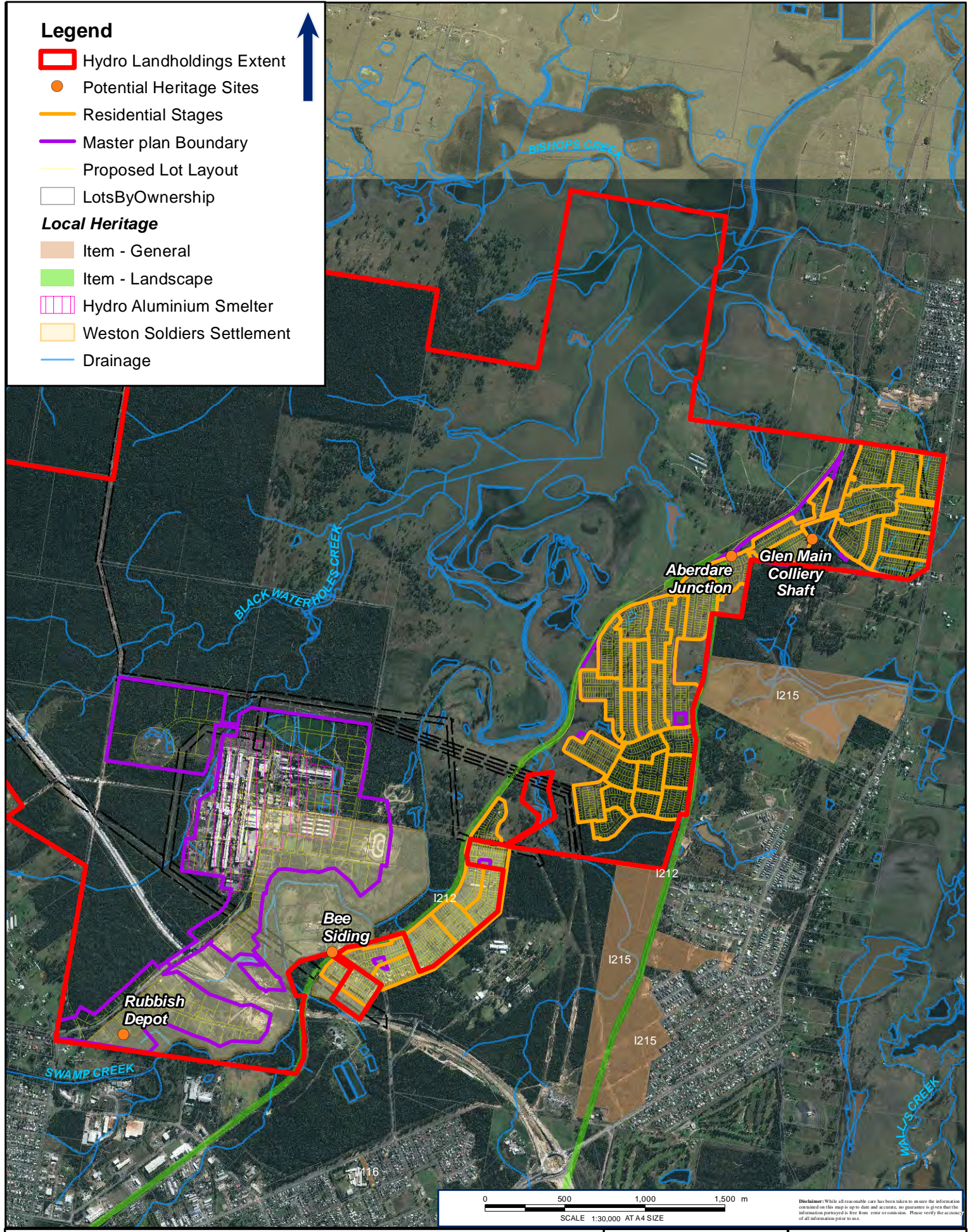
In assessing level of significance a further determinant is the degree of integrity of the site. To assist in the assessment the following grading is also determined:

- Exceptional
- High
- Moderate
- Little
- Intrusive

A more detailed account of the above can be found in [Assessing Heritage Significance](#) (NSW Heritage Office).

Legend

- Hydro Landholdings Extent
 - Potential Heritage Sites
 - Residential Stages
 - Master plan Boundary
 - Proposed Lot Layout
 - LotsByOwnership
- Local Heritage**
- Item - General
 - Item - Landscape
 - Hydro Aluminium Smelter
 - Weston Soldiers Settlement
 - Drainage



Disclaimer: While all reasonable care has been taken to ensure the information contained on this map is up to date and accurate, no guarantee is given that the information portrayed is free from error or omission. Please verify the accuracy of all information prior to use.

Figure 15: Hydro Aluminium Kurri Kurri Master Plan and heritage items

LOCATION: Kurri Kurri	DATUM: GDA94
JOB NO.: PR122177	PROJECTION: MGA Zone 56
PURPOSE: HERITAGE	Data Sources: Client RPS
Technician: Natalie.Wood	Date: 24/02/2015

CLIENT: ESS AUSTRALIA

Copyright: "This document and the information shown shall remain the property of RPS Australia East Pty Ltd. The document may only be used for the purpose for which it was supplied and in accordance with the terms of engagement for the commission. Unauthorised use of this document in any way is prohibited"

RPS AUSTRALIA EAST PTY LTD (ABN 44 140 292 762)
241 DENISON STREET BROADMEADOW PO BOX 428 HAMILTON NSW 2303
T: 02 4940 4200 F: 02 4961 6794 www.rpsgroup.com.au



6.2 Hydro Aluminium Kurri Kurri

Table 6 Hydro Aluminium Kurri Kurri - Heritage Assessment

Heritage Assessment	Hydro Aluminium Kurri Kurri
Criterion	<p>SHR Criterion (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);</p> <p>SHR Criterion (b) An item has strong or special association 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);</p>
Statement of Significance	The Hydro Aluminium Smelter (Kurri Kurri) was the first aluminium smelter constructed in NSW [Criterion (a)]. The smelter has played an important role in the economic development of the lower Hunter Valley, and significantly as a major employer for the people of Kurri Kurri [Criterion (b)].
Grading of Significance	High: High degree of original fabric. Demonstrates a key element of the item's significance. Alterations do not detract from significance. The Hydro Aluminium Kurri Kurri Smelter is not listed under the NSW Heritage Act as State significant.

6.3 South Maitland Railway System

The SMR in the Project Area comprises a section of the still operational line that services Austar Colliery. The following assessment is an extract from the NSW Heritage Division Database.

Table 7 South Maitland Railway – Heritage Assessment

Heritage Assessment	South Maitland Railway
Criterion	<p>SHR Criterion (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)</p>
Statement of Significance	<p>From 1892 until the 1960s the South Maitland Railway was the largest and busiest private railway in Australia - essential in the export of Australia's richest coal resources as well as moving passengers. It was the focus of some bitter industrial disputes, and of the conflict, competition and co-operation of some of NSW's largest industrial organisations including J&A Brown and the Australian Agricultural Co. The growth and decline of the line provides evidence of the growth and decline of the coal industry around Cessnock. The largest rail system to retain steam power until it was finally abandoned in 1983. (Source: Pike, Walker and Assoc, 1994) .</p> <p>Date significance updated: 27 May 04</p>
Grading of Significance	Exceptional: This item is assessed as having a rare value at a regional level and an associative value at a regional level. The South Maitland Railway is not listed under the NSW Heritage Act as State significant.

6.4 Stanford Railway

The Stanford Railway section is evident in the remnant rail embankment and remnant infrastructure such as bridge supports. The following assessment has been adapted from the extract for the South Maitland Railway entry on the NSW Heritage Division Database.

Table 8 Stanford Railway – Heritage Assessment

Heritage Assessment	Stanford Railway
Criterion	SHR Criterion (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)
Statement of Significance	From 1892 until the 1960s the South Maitland Railway, which included the Stanford Railway, was the largest and busiest private railway in Australia - essential in the export of Australia's richest coal resources as well as moving passengers. It was the focus of some bitter industrial disputes, and of the conflict, competition and co-operation of some of NSW's largest industrial organisations including J&A Brown and the Australian Agricultural Co. The growth and decline of the line provides evidence of the growth and decline of the coal industry around Cessnock. The largest rail system to retain steam power until it was finally abandoned in 1983. (Source: Pike, Walker and Associates 1994). Date significance updated: 27 May 04
Grading of Significance	Intrusive While the South Maitland Railway System is assessed as having a rare value at a regional level and an associative value at a regional level the Stanford Railway has been severely impacted on since its closure and therefore is classed as Intrusive. As the grading of significance is dependent on the integrity of the elements and fabric of the item. In the instance of the Stanford Railway the only remaining evidence in the Project Area are remnants of the embankment.

6.5 Glen Greta (Glen Main) Colliery

There is no physical evidence of the Glen Greta (Glen Main) Colliery remaining.

Table 9 Glen Greta (Glen Main) Colliery – Heritage Assessment

Heritage Assessment	Glen Greta (Main) Colliery
Criterion	SHR Criterion (a) [Historical significance] Little information for the site. Significance lies in association at local level.
Statement of Significance	The Glen Greta (Glen Main) Colliery was only operational intermittently for a short period. It demonstrates the difficulty of establishing successful coal mines in marginally viable areas.
Grading of Significance	Intrusive: does not fulfil criteria for local or state listing

6.6 Weston Soldier Settlement

The only evidence of the Weston Soldier Settlement is two remaining houses from that era; the settlement layout and documentary evidence.

Table 10 Weston Soldier Settlement – Heritage Assessment

Heritage Assessment	Weston Soldier Settlement
Criterion	SHR Criterion (b) An item has strong or special association 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)
Statement of Significance	Weston Soldier Settlement reflects the poorly implemented intention to establish a method of rewarding ex-servicemen of World War I and a process for settling them back into the community. The poor choice of land, inadequate resources and lack of commitment by government at all levels resulted in the schemes failure not only in Weston but throughout Australia.
Grading of Significance	Little: Alterations detract from significance. Difficult to interpret.

6.7 Rubbish depot

There is little surface evidence of the rubbish depot, however, the subsurface or archaeological evidence could be extensive.

Table 11 Rubbish depot – Heritage Assessment

Heritage Assessment	Rubbish depot
Criterion	SHR Criterion (a) [Historical significance] Little information for the site. Significance lies in association at local level. Potential archaeological value.
Statement of Significance	The rubbish depot may retain evidence of the development of the Weston Soldier Settlement or nearby Kurri Kurri, the first gazetted Government mining town in NSW, through intact deposits of refuse. Intact historic waste disposal areas are increasingly rare with ongoing impact of bottle collectors causing damage and destruction of sites.
Grading of Significance	Moderate: Elements with little heritage value, but which contribute to the overall significance of the item

7.0 Impact Assessment

The following describes the proposed impact on the heritage items in the Project Area. **Figure 15** details the location of the heritage items in the context of the proposed Master Plan.

7.1 Hydro Aluminium Kurri Kurri

The proposal is that all smelter structures are demolished and the area is rezoned General Industrial. The impact therefore will be significant with all record of the smelter removed from the landscape.

7.2 South Maitland Railway

The proposal is for nil impact on the South Maitland Railway.

7.3 Stanford Railway Line

The proposal is for a portion of the Stanford Railway route to be zoned Residential. The area of the Line proposed for rezoning has no evidence of the line, including the embankment, remaining.

7.4 Glen Greta (Glen Main) Colliery

The proposal is for a Residential zoning to the immediate south of the site of the Glen Greta (Glen Main) Colliery but there will be nil impact on the site. While the proposal will have residential properties built in close proximity, given there is no physical evidence of the colliery remaining, it is considered there will be nil impact on the Glen Greta (Glen Main) Colliery.

7.5 Weston Soldier Settlement

The proposal is that the Weston Soldier Settlement area will be rezoned to: Business Park; General Industrial; and Residential Southern with the current allotments altered and /or subdivided. The impact will be the loss of the allotment layout that reflects the original plan of the settlement. While the allotment layout is not immediately obvious on visual inspection it is clear on current and historic land title maps. It is unknown whether the two remaining soldier settlement houses will remain following development.

The impact will be the loss of the original allotments of the Weston Soldier Settlement; however, in historic land title maps the allotment layout will remain.

7.6 Rubbish depot

The proposal is that the rubbish depot will be rezoned to a Business Park. The construction of a Business Park will have a major impact; it is likely the contents of the rubbish depot would be removed to decontaminate the area and allow building works to progress.

8.0 Statement of Heritage Impact

The following section assesses the likely impacts of the proposed development on the heritage significance of the items in the Project Area.

The proposed development will impact on the:

- Hydro Aluminium Smelter (Kurri Kurri);
- Stanford Railway route;
- Weston Soldier Settlement; and the
- Rubbish depot

The remainder of the heritage items: the South Maitland Railway and the Glen Greta (Glen Main) Colliery will not be impacted by the proposed works. The Hydro Kurri Kurri Master Plan for rezoning together with identified heritage items can be found at **Figure 15**.

8.1 Hydro Aluminium Kurri Kurri

8.1.1 Summary of Proposed Changes

The proposal is that all buildings and structures will be demolished and removed from the site and the area. In the Master Plan the current area of the smelter complex will be re-zoned to General Industrial.

8.1.2 Design Options Considered

The retention of the buildings that comprise the smelter complex is not considered viable given their specialised use. The maintenance of the buildings solely as heritage items is not viable given the high cost of maintenance with limited or negligible long term benefit.

8.1.3 Impact of Development Proposal on Physical Fabric, Attributes, and Setting

The demolition of the Hydro Aluminium Kurri Kurri smelter plant will remove it completely from the landscape.

8.2 Stanford Railway

8.2.1 Summary of Proposed Changes

A section of the Stanford Railway route approximately 500 metres long (**Figure 15**) will be impacted by the rezoning of the area to Residential.

8.2.2 Design Options Considered

It is understood that there are no other design options considered.

8.2.3 Impact of Development Proposal on Physical Fabric, Attributes, and Setting

This section has no visible remnant of the Stanford Railway line and it is considered the proposal will have negligible impact.

8.3 Weston Soldier Settlement

8.3.1 Summary of Proposed Changes

The proposal is for the re-zoning of the Weston Soldier Settlement area to: Business Park; General Industrial; and Residential Southern and will result ultimately in the current allotments being altered and /or subdivided.

8.3.2 Design Options Considered

It is understood that there are no other design options considered.

8.3.3 Impact of Development Proposal on Physical Fabric, Attributes, and Setting

The outcome of the proposed re-zoning would be the loss of the allotment layout. A physical inspection of the area provided little evidence of the original soldier settlement scheme with the majority of the houses constructed after the decline of the settlement. It is considered that the result of the new zonings would not have a negative impact on the physical fabric, attribute or setting of the Weston Soldier Settlement.

8.4 Rubbish depot

8.4.1 Summary of Proposed Changes

The proposal is for the rubbish depot area to be re-zoned to Business Park.

8.4.2 Design Options Considered

It is understood that there are no other design options considered.

8.4.3 Impact of Development Proposal on Physical Fabric, Attributes, and Setting

The outcome of the proposed changes will be the loss of the rubbish depot. The physical fabric of the rubbish depot, that is its contents, will be lost if building construction is conducted. While the rubbish depot has little in the way of attributes or setting, its contents may provide a valuable insight into the social and cultural history of the adjoining Weston Soldier Settlement.

8.5 Summary of Heritage Impact

The following **Table 12** summarises the heritage impact on the items in the Project Area.

Table 12 Impact of the Proposal on each Component/Site Element

Item	Proposed Works	Level and Nature of Heritage Impact
Hydro Aluminium Kurri Kurri smelter	Removal	High Adverse
South Maitland Railway	No proposed works	Nil
Stanford Railway (a section 500 metres long)	Rezoning	Negligible
Glen Greta (Glen Main) Colliery	No proposed works	Nil
Weston Soldier Settlement	Rezoning	Negligible
Rubbish depot (archaeological deposit only)	Rezoning	High Adverse

9.0 Management and Mitigation Recommendations

This Heritage Impact Assessment and Statement of Heritage Impact for Hydro Aluminium Kurri Kurri Pty Ltd at Kurri Kurri, NSW has considered the impact of the proposed rezoning on historic heritage items in the Project Area.

The heritage significance assessment determined that there were no items of State heritage significance in the Project Area. There is however a number of items identified as significant at the local level that will be impacted on.

In the instance of the Hydro Aluminium Kurri Kurri Smelter, while the complex is considered to have high cultural heritage significance its retention solely as a heritage item is not considered viable. The Stanford Railway; Weston Soldier Settlement; and the rubbish depot are not considered to have a level of importance that would require their retention.

However, to ensure the place of the items in the historical record the following recommendations are made:

9.1 Recommendations

Recommendation 1 – Hydro Aluminium Kurri Kurri – Smelter site

A photographic archival record of the Aluminium Smelter should be made in accordance with Photographic recording of Heritage Items using Film or Digital Capture (NSW Heritage Office 2006)

Recommendation 2 – Hydro Aluminium Kurri Kurri – Smelter site

The Kurri Kurri Aluminium Smelter played an important role in the development of the aluminium smelting industry in NSW and forms part of the industrial history of the Hunter Valley, NSW. The documentary record of the construction, expansion and operation of the Smelter is a valuable archive and discussions around lodgement of significant items within that record may be appropriate with custodians of a suitable archival repository such as Newcastle University Cultural Collection – Archives.

Recommendation 3 – Weston Soldier Settlement

The Weston Soldier Settlement should be the subject of further investigation through documentary research and oral history recording. The outcome should be a report that provides a record of this important but little known aspect of local history.

Recommendation 4 – Rubbish depot

The Rubbish depot should be the subject of an archaeological assessment report. The intention of the assessment report would be to determine if the Rubbish depot warrants the lodging of a Section 140 Application for an Excavation Permit (*NSW Heritage Act 1977*) and if it does, to support that Application.

This investigation of the Rubbish depot has the potential to provide a valuable insight into the social development of Weston Soldier Settlement and neighbouring towns.

Recommendation 5 – Heritage Awareness

As part of the site induction and/or toolbox talks, all relevant staff, contractors and subcontractors should be made aware of their statutory obligations for heritage under the *Heritage Act 1977*.

Recommendation 6 – Unexpected Finds

If, during the course of development works, suspected archaeological relics, as defined by the *Heritage Act 1977*, are uncovered, work should cease in that area immediately.

10.0 Plates



Plate 1 Looking south west to Hydro Aluminium Smelter from vicinity of Cessnock Road



Plate 2 Entrance to Hydro Aluminium Kurri Kurri



Plate 3 Looking south west to Cast House



Plate 4 Cast House - interior



Plate 5 Carbon Plant – exterior southern wall



Plate 6 Carbon Plant – interior



Plate 7 Looking west to Scrubbing Plant



Plate 8 Looking south east to Scrubbing Plant



Plate 9 Anode Rod Building - interior



Plate 10 Anode Rods



Plate 11 Switchyard



Plate 12 Potline 1 (1969)



Plate 13 Potline 1 - detail



Plate 14 Potline 2 (1978)



Plate 15 Potline 2- detail



Plate 16 Potline 3 (1985)



Plate 17 Potline 3 – detail



Plate 18 Scrubbing system



Plate 19 Scrubbing system



Plate 20 Looking north to chimney

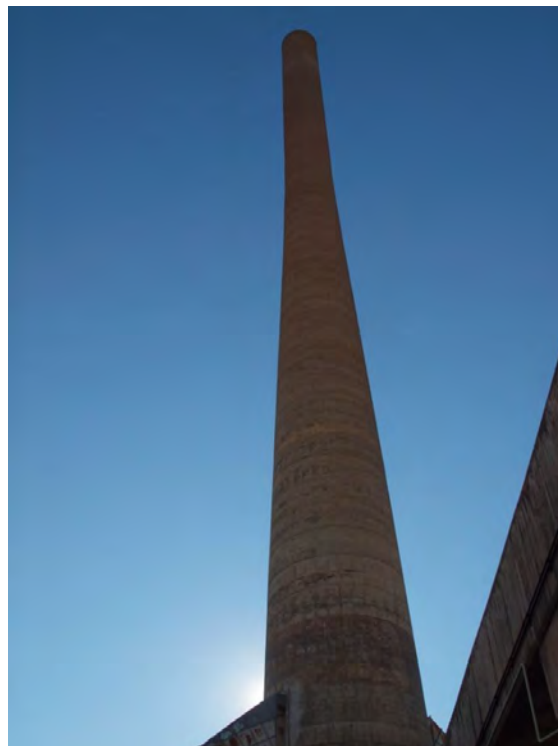


Plate 21 Chimney



Plate 22 Ancillary building – administration (looking south east)



Plate 23 Ancillary building – administration (looking north)



Plate 24 Ancillary buildings – Engineering



Plate 25 Ancillary building – Health Safety & Environment



Plate 26 Ancillary building – Potroom Process Centre



Plate 27 Ancillary building - Potline storage sheds



Plate 28 South Maitland Railway line



Plate 29 South Maitland Railway bridge



Plate 30 South Maitland Railway – Bee Siding looking south



Plate 31 South Maitland Railway – looking toward Aberdare Junction along Stanford Railway embankment



Plate 32 Stanford Railway – looking south east along embankment



Plate 33 Stanford Railway– looking north along embankment



Plate 34 Glen Greta (Glen Main) Colliery – Looking north-east to location of pit top



Plate 35 Glen Greta (Glen Main) Colliery – note steel rods - remnant colliery items



Plate 36 South Maitland Railway cutting deviation - Glen Greta (Glen Main) Colliery subsidence (looking north)



Plate 37 South Maitland Railway cutting deviation - Glen Greta (Glen Main) Colliery subsidence (looking south)



Plate 38 Weston Soldier Settlement: 1 Macleod Road - original house



Plate 39 Weston Soldier Settlement: 2 Dawes Avenue - original house



Plate 40 Weston Soldier Settlement – example of later housing



Plate 41 Weston Soldier Settlement – example of later housing



Plate 42 Weston Soldier Settlement – example of later housing



Plate 43 Weston Soldier Settlement – light industry



Plate 44 Rubbish depot



Plate 45 Rubbish depot - example of items

11.0 References

- Attenborough, P. (2001). South Maitland Railways: A century of railways on the South Maitland Coal Fields. Sydney, Eveleigh Press.
- Australia ICOMOS (2013). The Burra Charter, The Australia ICOMOS Charter for Places of Cultural Significance.
- Australian Heritage Commission (2001). Australian Historic Themes.
- Brayshaw, H. (1987). Aborigines of the Hunter Valley, Scone and Upper Hunter Historical Society.
- Cessnock City Council (2011). Cessnock Local Environmental Plan.
- Collections Australia (2013). "The History of the Greta Coal Measures ". Retrieved 1 April, 2013, from <http://hosting.collectionsaustralia.net/newcastle/greta/frames.html>.
- Delaney, J. W. (1968). A brief history of the railway known as South Maitland Railway.
- Delaney, J. W. (1985). South Maitland Railways Pty Ltd Railway Accounting.
- Delaney, J. W. (1987). "Brief history of the railway known as South Maitland Railway." The Newcastle and Hunter District Historical Society **15**(2).
- Delaney, J. W. (2012). "History of the Greta Coal Measures." Retrieved 29 November 2012, 2012, from <http://hosting.collectionsaustralia.net/newcastle/greta/>.
- Ellis, M. H. (1969). A saga of coal: the Newcastle and Wallsend Coal Company's centenary volume. Sydney, Angus and Robertson.
- Heritage Office and Department of Urban Affairs and Planning (2002). Statements of Heritage Impact. Originally published as part of the NSW Heritage Manual.
- Hydro Aluminium (2012). Smeltdown: Memories from an Industrial Age.
- Maitland City Council (2011). "Maitland Local Environmental Plan."
- Mining Journal (2000). "VAW to buy Kurri Kurri." Mining Journal (16 June 2000).
- Mulligan, D., Ed. (1996). Environmental management in the Australian minerals and energy industries: principles and practices. Sydney, N.S.W., University of New South Wales Press Ltd.
- Murnane, C. (n.d.). Frustration, Futility and Failure: Soldier Settlement within the Hunter Valley, 1916-1938. Unpublished.
- Newcastle Morning Herald and Miners' Advocate (4 November 1919). Newcastle Morning Herald and Miners' Advocate,.
- Newcastle Morning Herald and Miners' Advocate (11 April 1923). Newcastle Morning Herald and Miners' Advocate,.
- Newcastle Morning Herald and Miners' Advocate (15 October 1921). Newcastle Morning Herald and Miners' Advocate,.
- Newcastle Morning Herald and Miners' Advocate (1936). Various works. Newcastle Morning Herald and Miners' Advocate,: 6.
- NSW Government (2011). "Returned Soldier Settlement Loan Files." Retrieved 7 August, 2014, from <http://data.records.nsw.gov.au/wp-content/uploads/2011/03/Returned-Soldier-Settlement-Loan-Files.txt>.

NSW Heritage Office (2001). Assessing heritage significance. New South Wales Heritage Manual. Sydney, NSW Heritage Office.

NSW Heritage Office (2006). "Heritage Information Series: Photographic Recording of Heritage Items using Film or Digital Capture." from <http://www.environment.nsw.gov.au/resources/heritagebranch/heritage/infophotographicrecording2006.pdf>.

NSW Office of Environment & Heritage (2002). "Glenolive: History." from <http://www.environment.nsw.gov.au/heritageapp/ViewHeritageItemDetails.aspx?ID=1340578>.

NSW RailNet (n.d.). "South Maitland Railway - Aberdare Junction." Retrieved 18 August, 2014, from <http://www.nswrail.net/locations/show.php?name=NSW:Aberdare+Junction&line=NSW:cessnock:0>.

OEH (2005). Heritage Interpretation Policy, New South Wales Government: 13.

Parkes, W. S., J. Comerford, et al. (1979). Mines, Wines and People: a history of Greater Cessnock. Cessnock, N.S.W., Council of the City of Greater Cessnock.

Penelope Pike Meredith Walker and Associates (1992-1994). City of Cessnock heritage study. Sydney, N.S.W., Penelope Pike, Meredith Walker and Associates.

Recycling Today (2012). "Hydro to Close Australian Aluminium Smelter." Retrieved 12 August, 2014.

Royal Australian Historical Society (2009). A new study of WW1 Soldier Settlements in NSW. History: Magazine of the Royal Australian Historical Society. **101**.

Singleton Argus (15 January 1924). Singleton Argus.

South Coast Times and Wollongong Argus (2 July 1926). South Coast Times and Wollongong Argus.

The Cessnock Eagle and South Maitland Recorder (5 September 1919). The Cessnock Eagle and South Maitland Recorder.

The Cessnock Eagle and South Maitland Recorder (June 1919). The Cessnock Eagle and South Maitland Recorder.

The Maitland Daily Mercury (15 October 1919). The Maitland Daily Mercury.

The Maitland Weekly Mercury (2 May 1925). Maitland Weekly Mercury.

The Sydney Morning Herald (10 September 1924). The Sydney Morning Herald.

Tonks, E. (1978). South Maitland Coal Fields. Field Study Notes., NSW Department of Education.

Acronyms

cal. years BP	Calibrated years before present
CHL	Commonwealth Heritage List
DECCW	Department of Environment, Climate Change and Water
EP&A Act	Environmental Planning and Assessment Act 1979
LEP	Local Environment Plan
LGA	Local Government Area
NHL	National Heritage List
NPW Act	National Parks and Wildlife Act 1974
NPW Regulation	National Parks and Wildlife Regulation 2009
OEH	Office of Environment & Heritage
RMS	Roads and Maritime Services
SHI	State Heritage Inventory
SHR	State Heritage Register

Appendix I

Extract: NSW Heritage Office Database - Locally Significant Items

Item	Address	Suburb	LGA	Information Source
Bickmore's Store and Storage Shed And House	84 Lang Street	Kurri Kurri	Cessnock	LGOV
Builder's House	42 Gillies Street	Kurri Kurri	Cessnock	LGOV
Burnetts Slaughter Yard	Mulbring Or Railway Streets?	Kurri Kurri	Cessnock	LGOV
Chelmsford Hotel	122 Lang Street, Cnr Victoria Street	Kurri Kurri	Cessnock	LGOV
Chelmsford Hotel	122 Lang Street	Kurri Kurri	Cessnock	GAZ
Commonwealth Bank, (Former)	199 Lang Street	Kurri Kurri	Cessnock	LGOV
Courthouse and Police Station Group	121 Lang Street	Kurri Kurri	Cessnock	LGOV
Empire Tavern	45 Railway Street	Kurri Kurri	Cessnock	LGOV
General Cemetery	Hospital Road	Kurri Kurri	Cessnock	GAZ
Glenolive	35 Edward Street	Kurri Kurri	Cessnock	LGOV
Kurri Fabrications	259 Leggetts Drive	Richmond Vale	Cessnock	LGOV
Kurri Kurri Band Rotunda	Lang Street	Kurri Kurri	Cessnock	LGOV
Kurri Kurri Co-op Store (Former)	245 Lang Street	Kurri Kurri	Cessnock	LGOV
Kurri Kurri Court House	121 Lang Street	Kurri Kurri	Cessnock	LGOV
Kurri Kurri Fire Station	107 Lang Street	Kurri Kurri	Cessnock	SGOV
Kurri Kurri Fire Station	119 Lang Street	Kurri Kurri	Cessnock	LGOV
Kurri Kurri Hospital	434 Lang Street	Kurri Kurri	Cessnock	LGOV
Kurri Kurri Hotel	186 Lang Street	Kurri Kurri	Cessnock	GAZ
Kurri Kurri Hotel	180 Lang Street,	Kurri Kurri	Cessnock	LGOV
Kurri Kurri Police Station	121 Lang Street	Kurri Kurri	Cessnock	LGOV
Kurri Kurri Police Station and Official Residence	113 Lang Street	Kurri Kurri	Cessnock	SGOV
Kurri Kurri Post Office (Former)	120 Lang Street	Kurri Kurri	Cessnock	LGOV
Kurri Kurri Public School	Lang Street	Kurri Kurri	Cessnock	LGOV
Leconfield Road Bridge	Leconfield Road	Greta	Cessnock	LGOV
Masonic Hall (Former)	130 Barton Street	Kurri Kurri	Cessnock	LGOV
Original Hospital buildings	Lang Street and Hospital Road	Kurri Kurri	Cessnock	SGOV
Railway Tunnel (Former)	George Booth Drive	Kurri Kurri	Cessnock	LGOV
Railway Tunnel, Former	George Booth Drive	Kurri Kurri	Cessnock	GAZ
Rotary Park Miners Memorial	Lang Street	Kurri Kurri	Cessnock	LGOV
Sandstone Kerbs, Gutters, Roads In Kurri Kurri	Allworth Street	Kurri Kurri	Cessnock	LGOV
Station Hotel	Victoria Street	Kurri Kurri	Cessnock	GAZ
Station Hotel	26-32 Coronation Street	Kurri Kurri	Cessnock	LGOV
Trade Union Banners	11 Deakin Street	Kurri Kurri	Cessnock	LGOV
Wilderness Winery (Former)	Wilderness Road	Rothbury	Cessnock	LGOV

Appendix 2

Weston Soldier Settlement Loan File

Loan Details	Surname	Christian Name	Address & Land District	Loan start date and end date
4409,"[12/7321]"	"08638"	"YORK","Robert John"	"Lot 465 Weston Soldier Settlement","Maitland"	"3 Mar 1922","14 Mar 1927"
4411,"[12/7321]"	"08640"	"BARRETT","Thomas William"	"Block 462 Weston Soldier Settlement","Maitland"	"6 Sep 1921","18 Apr 1927"
4414,"[12/7321]"	"08641"	"FAIRLEIGH","Hector Homer"	"Block 458 Weston Soldier Settlement","Maitland"	"6 Sep 1921","27 May 1925"
4416,"[12/7321]"	"08642"	"BARNICOAT","Charles Percy"	"Block 469 Weston Soldier Settlement","Maitland"	"6 Sep 1921","9 Aug 1926"
4418,"[12/7321]"	"08643"	"FITZGERALD","Patrick"	"Block 467 Weston Soldier Settlement","Maitland"	"5 Sep 1921","1 May 1926"
4421,"[12/7321]"	"08644"	"HENRY","Percy Wakefield"	"Lot 460 Weston Soldier Settlement","Maitland"	"2 Mar 1922","6 May 1929"
4422,"[12/7321]"	"08645"	"MILLS","Ernest"	"Block 457 Weston Soldier Settlement","Maitland"	"16 Dec 1921","8 Feb 1928"
4425,"[12/7321]"	"08646"	"HINDMARSH","George"	"Block 463 Weston Soldier Settlement","Maitland"	"5 Sep 1921","29 Feb 1928"
2055,"[12/7092]"	"05385"	"OBRIEN","James Dennis"	"Weston Soldier Settlement","Maitland"	"18 Aug 1920","30 Dec 1926"
2058,"[12/7092]"	"05386"	"SORRELL","Arthur Willim"	"Weston Soldier Settlement","Maitland"	"14 Sep 1920","30 Jun 1932"
2060,"[12/7092]"	"05387"	"ROBERTS","William"	"Weston Soldier Settlement","Maitland"	"13 Jul 1920","25 Mar 1929"
2062,"[12/7093]"	"05388"	"HOOPER","William Ernest"	"Weston Soldier Settlement","Maitland"	"15 Sep 1920","28 Mar 1928"
2083,"[12/7093]"	"05396"	"JONES","Ernest"	"Weston Soldier Settlement","Maitland"	"13 Sep 1920","24 Sep 1926"
2088,"[12/7093]"	"05397"	"BLAKENEY","Claude Milton Peter"	"Weston Soldier Settlement","Maitland"	"14 Oct 1920","28 Mar 1928"
2091,"[12/7093]"	"05398"	"SIGGERS","John Frederick"	"Weston Soldier Settlement","Maitland"	"14 Sep 1920","21 Dec 1926"
2094,"[12/7093]"	"05399"	"PHILL","Errol Edwin"	"Weston Soldier Settlement","Maitland"	"13 Sep 1920","21 Dec 1926"
2097,"[12/7093]"	"05402"	"WALDEN","T G"	"Weston Soldier Settlement","Maitland"	"18 Aug 1920","27 Apr 1925"
2100,"[12/7093]"	"05404"	"STEWART","John Henderson"	"Weston Soldier Settlement","Maitland"	"26 May 1920","8 Feb 1928"
2104,"[12/7093]"	"05405"	"FENWICK","John"	"Weston Soldier Settlement","Maitland"	"30 Sep 1920","28 Mar 1928"
2135,"[12/7094]"	"05406"	"MCLEAN","Donald Hector"	"Weston Soldier Settlement","Maitland"	"9 Sep 1920","20 Jun 1925"
2270,"[12/7115]"	"05720"	"CLULOW","John Cecil"	"Weston Soldier Settlement","Maitland"	"3 Sep 1920","28 May 1930"
2548,"[12/7143]"	"06075"	"MARLAN","Louis Thomas"	"Weston Soldier Settlement","Maitland"	"8 Jan 1921","27 Nov 1930"
4407,"[12/7321]"	"08637"	"SCOTT","William Dixon"	"Lot 464 Weston Soldier Settlement","Maitland"	"5 Sep 1921","29 Feb 1928"
4517,"[12/7320]"	"08634"	"LOVE","Alfred"	"Block 468 Weston Soldier Settlement","Maitland"	"3 Feb 1922","20 Mar 1925"
4521,"[12/7320]"	"08636"	"TAYLOR","Alfred"	"Block 461 Weston Soldier Settlement","Maitland"	"7 Feb 1921","1 Dec 1926"
1175,"[12/6994]"	"04170"	"CHALLAND","J B"	"Weston Soldier Settlement","Maitland"	"25 Mar 1920","12 Jan 1928"
2047,"[12/7092]"	"05383"	"BUDGE","Charles James"	"Weston Soldier Settlement","Maitland"	"13 Jul 1920","20 Dec 1927"
2049,"[12/7092]"	"05384"	"DAWES","Albert James"	"Weston Soldier Settlement","Maitland"	"18 Aug 1920","22 Dec 1931"
2067,"[12/7093]"	"05389"	"VALE","Percy Martin"	"Weston Soldier Settlement","Maitland"	"17 May 1919","3 Jun 1925"
2069,"[12/7093]"	"05390"	"CHALLAND","Leonard John"	"Weston Soldier Settlement","Maitland"	"9 Sep 1920","2 Oct 1925"

2071,"[12/7093]","05391","CRAWFORD","Samuel","Weston Soldier Settlement","Maitland","15 Sep 1920","17 Apr 1925"
2075,"[12/7093]","05394","HUMPHRY","Percy Gordon","Weston Soldier Settlement","Maitland","25 May 1921","12 Jan 1928"
2079,"[12/7093]","05394","WHITEHEAD","Arthur","Weston Soldier Settlement","Maitland","13 Sep 1920","20 May 1921"
2080,"[12/7093]","05395","THOMAS","John Arthur","Weston Soldier Settlement","Maitland","15 Sep 1920","29 Feb 1928"
2108,"[12/7100]","05501","PYKE","A R","Weston Soldier Settlement","Maitland","26 Jul 1920","20 Dec 1927"
2111,"[12/7100]","05504","STEWART","William Kidson","Weston Soldier Settlement","Maitland","5 Aug 1920","22 Oct 1926"
4702,"[12/7350]","09033","KING","Bertie Leonard","CSP Block 447 Weston Soldier Settlement","Maitland","22 Sep 1920","27 May 1922"
3790,"[12/7274]","07903","PORTEUS","Arthur","Weston Soldier Settlement","Maitland","217 Aug 1920","4 Jun 1926"
3791,"[12/7274]","05647","ATKINSON","Kenneth A","Weston Soldier Settlement","Maitland","27 Jan 1922","4 Jun 1926"
4708,"[12/7350]","09033","DIXON","John","CSP Block 447 Weston Soldier Settlement","Maitland","9 Oct 1922","28 Mar 1928"
4646,"[12/7341]","05403","OSBORN","Stanley Green","Weston Soldier Settlement","Maitland","10 Sep 1920","8 Nov 1929"
4649,"[12/7341]","08927","HANLEY","Charles","Weston Poultry Settlement","Maitland","1 Aug 1922","8 Nov 1929"
4785,"[12/7347]","09011","JONES","A W","Block 421 Weston Soldiers Settlement","Maitland","18 Aug 1920","19 Sep 1928"
4786,"[12/7347]","09011","PALMER","John","Block 421 Weston Soldier Settlement","Maitland","21 Aug 1922","19 Sep 1928"
4954,"[12/7359]","09154","PORTUS","Albert","Weston Soldier Settlement","Maitland","22 Jan 1923","10 Aug 1932"
4977,"[12/7367]","09256","BENNETT","Stanley Raymond","Block 442 Weston Soldier Settlement","Maitland","13 Mar 1933","24 Mar 1925"
4980,"[12/7367]","09256","MONTAGUE","Charles","Block 442 Weston Soldier Settlement","Maitland","30 Aug 1920","17 Jan 1923"
6969,"[12/7274]","05647","PORTEUS","Arthur","Weston Soldier Settlement","Maitland","217 Aug 1920","4 Jun 1926"
5364,"[12/7495]","14940","DAVIS","Claude Halliday Weston","SP, Insipingo, Merriwa","Muswellbrook","25 May 1934","29 Aug 1934"
5602,"[12/7374]","09355","ALLAN","James","Weston Soldiers Settlement","Maitland","12 Jul 1923","28 May 1926"
5604,"[12/7374]","09356","LEITCH","Oliver James","Block 462 Weston Soldiers Settlement","Maitland","6 Jul 1923","1 Apr 1925"
5628,"[12/7373]","09353","COUPER","John Thomas Fornear","CSP, Block 458, Weston Soldier Settlement","Maitland","9 Feb 1924","6 May 1929"
5631,"[12/7373]","09354","DIXON","T M","CSP, Weston Soldier Settlement","Maitland","25 Jul 1923","9 Nov 1923"
5804,"[12/7383]","09528","ROBERTS","Robert","CSP, Block 457 Weston Soldier Settlement","Maitland","15 Feb 1927","13 Dec 1929"
5639,"[12/7380]","09472","BALKHAM","Edwin Charles","Block 467, Weston Soldiers' Settlement","Maitland","6 Jul 1923","16 Aug 1929"
5643,"[12/7380]","09473","DIXON","Herbert Oswald","Block 425, Weston Soldiers' Settlement","Maitland","24 Oct 1923","13 Feb 1930"
6959,"[12/7274]","07903","ATKINSON","Kenneth A","Weston Soldier Settlement","Maitland","27 Jan 1922","4 Jun 1926"
7008,"[12/7350]","07763","KING","Bertie Leonard","CSP Block 447 Weston Soldier Settlement","Maitland","22 Sep 1920","27 May 1922"
7141,"[12/7463]","11936","WILLGOSS","Walter William","Weston","Maitland","27 May 1929","3 Dec 1934"