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KURRI KURRI ALUMINIUM SMELTER DECOMMISSIONING, DEMOLITION AND REMEDIATION SMELTER ACCESS PLAN

KURRI KURRI ALUMINIUM SMELTER DECOMMISSIONING AND DEMOLITION SMELTER ACCESS PLAN

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Description **Ramboll was engaged by Hydro Aluminium Kurri Kurri Pty Ltd to prepare an Environmental Management Plan (EMP) to describe how environmental management would be undertaken at the former Hydro Aluminium Kurri Kurri aluminium smelter at Hart Road Loxford, NSW and the surrounding land owned by Hydro. This Smelter Access Plan forms a component of the EMP.**

CONTENTS

ACRONYMS AND ABBREVIATIONS	I
GLOSSARY	II
1. INTRODUCTION	1
1.1 Background	1
1.2 Objectives	1
1.3 Purpose and Scope	1
1.4 Regulatory Requirements	1
2. EXISTING ENVIRONMENT AND POTENTIAL IMPACTS	3
2.1 Internal Road Network	3
2.2 Internal Access	3
2.3 Smelter Access Control Plan	3
2.4 Hours of Operation	3
3. IMPLEMENTATION	4
3.1 Roles and Responsibilities	4
3.2 Management Measures	5
4. MONITORING AND REVIEW	8
4.1 Monitoring	8
4.2 Reporting	8
4.3 Non-conformances	8
4.4 Complaints	8
4.5 Review and Improvement	8
5. REFERENCES	9
6. LIMITATIONS	10
6.1 User Reliance	10

TABLES

Table 1-1: Project Approval Conditions.....	1
Table 3-1: Hydro Personnel and Environmental Management Responsibilities....	4
Table 3-2: Access Management Measures.....	6
Table 4-1: Access Monitoring Commitments.....	8

APPENDICES

Appendix A

Smelter Access Control Plan

ACRONYMS AND ABBREVIATIONS

DA	Development Application
DAP	Demolition Access Plan
EIS	Environmental Impact Statement
EMP	Environmental Management Plan
EP&A Act	Environmental Planning and Assessment Act 1979
Hydro	Hydro Aluminium Kurri Kurri Pty Ltd
RWEMP	Remediation Works Environmental Management Plan
SAP	Site Access Plan
SSD	State Significant Development

GLOSSARY

Council	Cessnock City Council
Department	Department of Planning, Industry and Environment
Hydro	Hydro Aluminium Kurri Kurri Pty Ltd
Hydro Land	The land owned by Hydro Aluminium Kurri Kurri Pty Ltd which includes the Smelter and surrounding land.
Remediation	Remediation of contaminated land and soils at the Smelter and on Hydro Land, including the construction of a Containment Cell as addressed in the State Significant Development application to the Department of Planning, Industry and Environment SSD 6666.
Stage 1 Demolition	Demolition of Smelter buildings addressed in the development application to Cessnock City Council 8/2015/399/1.
Stage 2 Demolition	Demolition of Smelter buildings, three concrete stacks, a water tower, subsurface structures to 1.5 m below ground surface and operation of a concrete crushing plant addressed in the development application to Cessnock City Council 8/2018/46/1.
The Smelter	The former Hydro Aluminium Kurri Kurri Pty Ltd aluminium smelter at Hart Road, Loxford

1. INTRODUCTION

1.1 Background

This Smelter Access Plan (SAP) has been prepared by Ramboll Australia Pty Ltd on behalf of Hydro Aluminium Kurri Kurri Pty Ltd (Hydro) to support the Remediation Works Environmental Management Plan (RWEMP) which addresses the decommissioning, demolition and remediation activities at the former Hydro Aluminium Kurri Kurri Smelter (the Smelter) at Hart Road Loxford and the management of the surrounding land owned by Hydro (the Hydro Land).

1.2 Objectives

The objectives of this SAP are to:

- Identify demolition traffic and access route requirements for onsite traffic travelling around the Smelter and Hydro Land.
- Establish the roles and responsibilities of all parties involved in traffic movement and control.
- Establish supervision, monitoring and reporting framework for the SAP.

1.3 Purpose and Scope

The purpose of the SAP is to:

- Specify procedures for access management within the Smelter, particularly during Stage 1 and 2 Demolition; and
- Satisfy the relevant conditions of the development consent for demolition and remediation (DA 8/2015/399/1, DA 8/2018/45/1 and SSD 6666) activities.

1.4 Regulatory Requirements

A list of the Project Approval conditions related to access management and where they are addressed in this document are outlined **Table 1-1**.

It should be noted that some of the conditions listed below are addressed within the Traffic Management Plan (TMP) which forms Appendix C of the over-arching RWEMP.

Table 1-1: Project Approval Conditions

No.	Condition	Location in SAP
SSD 6666		
Remediation Works Conditions		
B22	The Applicant must ensure that:	N/A
B22a	the development does not result in any queuing on the public road network unless otherwise approved by the relevant council;	Table 3-2
B22b	all vehicular movement to and from the site must be in a forward direction;	Table 3-2
B22c	the swept path of the longest vehicle entering and exiting the site, as well as manoeuvrability through the site, is in accordance with the relevant AUSTRROADS guideline;	Section 2.1
B22d	all loading and unloading of materials are carried out on-site in designated areas; and	Table 3-2
B22e	vehicle manoeuvring areas must always be kept clear of any obstacles, including parked cars.	Table 3-2
Parking		
B23	The Applicant must provide sufficient parking facilities on-site, including for heavy vehicles and for site personnel, to ensure that traffic associated with the development does not utilise public and residential streets or public parking facilities.	Table 3-2
DA 8/2015/399/1		
15	Submit a Construction Management and Traffic Management Plan (CMTMP) detailing the following matters. The plan must be submitted to the Council as satisfying these matters prior to the commencement of works.	This SAP

No.	Condition	Location in SAP
15(a)	A plan view of the entire site and frontage roadways indicating:	Appendix A
15(a)(i)	Dedicated construction site entrances and exits, controlled by a certified traffic controller, to safely manage pedestrians and construction related vehicles in the frontage roadways	Appendix A
15(a)(ii)	Turning areas within the site for construction and spoil removal vehicles, allowing a forward egress for all construction vehicles on the site.	Appendix A
15(a)(iv)	Location of any proposed crane, concrete pump, truck standing areas on and off the site.	Appendix A
15(a)(v)	A dedicated unloading and loading point within the site for all construction vehicles, plant and deliveries.	Appendix A
15(a)(vii)	An onsite parking area for employees, tradespersons and construction vehicles as far as possible.	Appendix A
19	A temporary site fence shall be erected around the proposed demolition area and signage erected to delineate the development site from the surrounding areas.	Table 3-2
DA 8/2018/46/1		
10	The applicant must prepare a Construction Management and Traffic Management Plan (CMTMP) detailing the following matters. The plan must be submitted to and approved by Council prior to the commencement of works.	This TMP
10(a)	A plan view of the entire site and frontage roadways indicating:	Appendix A
10(a)(i)	Dedicated construction site entrances and exits, controlled by a certified traffic controller, to safely manage pedestrians and construction related vehicles in the frontage roadways.	Table 3-2
10(a)(ii)	Turning areas within the site for construction and spoil removal vehicles, allowing a forward egress for all construction vehicles on the site.	Appendix A
10(a)(v)	A dedicated unloading and loading point within the site for all construction vehicles, plant and deliveries.	Appendix A
10(a)(vii)	An onsite parking area for employees, tradespersons and construction vehicles as far as possible.	Appendix A

In addition, the plan aims to comply with the *Traffic Control at Work Sites Manual* (RMS 2018) and the Austroads Guidelines.

2. EXISTING ENVIRONMENT AND POTENTIAL IMPACTS

2.1 Internal Road Network

The Smelter includes an existing internal road network. This network includes sealed and unsealed roads and pedestrian access is provided adjacent to most of these roads. Concrete footpaths also connect several buildings within the Smelter site.

In accordance with the Austroads *Guide to Road Design Part 3: Geometric Design* (2016), the internal access roads at the Project site have been designed and managed to allow for the swept path of the longest vehicle entering and exiting the Project site, as well as maneuverability through the site.

2.2 Internal Access

Activities undertaken at the Smelter require delineation of the Project site from surrounding areas. In turn areas of the Project site have been isolated for demolition activities and remediation activities.

This requires the closure of, or access restrictions to, several internal roads and pedestrian footpaths for non-essential vehicles. This will protect personnel and minimise interactions between Hydro personnel, decommissioning vehicles, demolition vehicles and remediation vehicles.

2.3 Smelter Access Control Plan

The Smelter Access Control Plan, presented in **Appendix A**, has been developed to reflect the current and scheduled decommissioning, demolition and remediation activities at the Smelter.

The Control Plan would continue to be revised to reflect the progressive nature of the activities and the required amendments to access.

Traffic control activities will be undertaken in accordance with *Traffic Control at Work Sites Manual* (RMS 2018).

2.4 Hours of Operation

Activities at the Smelter will generally be undertaken between 7:00 am to 6:00 pm, Mondays to Fridays and 7:00 am to 1:00 pm on Saturdays. There is the potential that vehicle movements (such as removal or delivery of major equipment or structures, or to service activities that need to occur at the Smelter outside of standard hours) may be required outside of these hours.

3. IMPLEMENTATION

3.1 Roles and Responsibilities

Key personnel responsible for implementation of this SAP are in **Table 3-1** and consistent with the overall RWEMP.

Table 3-1: Hydro Personnel and Environmental Management Responsibilities

Position	Responsibilities
OVERALL SITE MANAGEMENT	
Managing Director	Make certain that the Hydro Team and contractors are implementing this SAP.
	Provide adequate resources and funding for the implementation of this SAP.
	Review and approve the SAP.
Principal Environmental Consultant	Provide advice on and assistance in implementation, monitoring and auditing of the SAP (as a part of the RWEMP).
	Review and modify the SAP as directed by the Managing Director and/or Project Manager.
Principal Communications Consultant	Manage the mechanisms available for the community to receive information and to make enquiries or complaints about activities
SMELTER DECOMMISSIONING, DEMOLITION AND REMEDIATION ACTIVITIES	
Project Manager	Review and approve the SAP on an annual basis or when changes to activities at the Smelter occur.
	Facilitate implementation of the SAP.
Construction Manager	Verify that the work of contractors and Hydro personnel on the Project are undertaken in accordance with this SAP and relevant procedures and standards.
	Review and approve the contractors' environmental management documentation (including traffic management) prior to commencement of activities and inform contractors of changes to the SAP.
Contract Administrator	Provide relevant legislative, regulatory and management requirements in tender documentation.
	Verify that the work of contractors is undertaken in accordance with this SAP.
WHS Manager	Provide Hydro personnel with the necessary tools and training to enable effective implementation of the SAP.
	Maintain a record of personnel induction and training records.
	Implement and maintain an induction package to be provided to all personnel working at the Smelter, which will include information relevant to Smelter access.
	Review and approve contractors' environmental management documentation (including compliance with this SAP) prior to commencement of activities.
	Undertake a weekly inspection of the Project activities at the Smelter, for the duration of the Project.
CARE, MAINTENANCE AND HYDRO LAND MANAGEMENT ACTIVITIES	
Demolition Contractor	Comply with the requirements of this SAP as it applies to Smelter demolition activities.
	Implement the measures and actions as described in the RWEMP and this SAP through a Demolition EMP and SAP, with procedures that comply with this SAP.
	Develop and implement procedures for self-checking environmental management compliance with the Demolition Contractor's procedures and this SAP.

Position	Responsibilities
Remediation Contractor	<p>Report potential or actual environmental incidents associated with demolition activities at the Smelter, and assist as required in the investigation, implementation of corrective actions and recording of the incident.</p> <p>Comply with the requirements of the SAP as it applies to Smelter and relevant Hydro Land remediation activities.</p> <p>Implement the measures and actions as described in the RWEMP and this SAP through a Remediation EMP and SAP, with procedures that comply with this SAP.</p> <p>Develop and implement procedures for self-checking environmental management compliance with the Remediation Contractor’s procedures and this SAP.</p> <p>Report potential or actual environmental incidents associated with remediation activities at the Smelter, and assist as required in the investigation, implementation of corrective actions and recording of the incident.</p>
ALL AREAS AND ACTIVITIES	
Contractors	<p>Comply with the requirements of the SAP as applicable to their activities.</p> <p>Develop and implement procedures for self-checking compliance with Contractor’s procedures and this SAP.</p>
All Personnel	Implementation of the relevant measures described in this SAP applicable to their activities.

3.2 Management Measures

Hydro will implement several controls to manage onsite access impacts that may be generated from trafficable areas and demolition activities. The access management measures to be implemented on Site are outlined in **Table 3-2**.

Table 3-2: Access Management Measures

Management Measures	Actions	Timing / Frequency	Responsibility	Further Detail	
Establish internal access restrictions and alternative access routes for the Smelter prior to the commencement of remediation.	Implement the version of the Smelter Access Control Plan (included in Appendix A) at the commencement of remediation.	Prior to remediation activities	Project Manager	Appendix A	
	Traffic controls (including the type and location of signage and safety barriers) will be installed in accordance with <i>Traffic Control at Work Sites Manual</i> (Roads and Traffic Authority, 2018).	Prior to and during activities	Project Manager		
	Prohibit queuing on the public road network unless otherwise approved by Council.	Prior to and during activities	Project Manager		
All personnel required to drive on the Smelter will be informed during the site induction of access restrictions and dynamic nature of changes to access restrictions.	The Smelter Access Control Plan (and information on the expected changes to access restrictions as activities progress) will be presented in the remediation site induction.	Prior to and during activities	WHS Manager	Section 3.3.2 of the RWEMP (inductions and training)	
	The Smelter Access Control Plan presented in Appendix A will be communicated to site personnel to describe the required changes to accommodate remediation activities.	Prior to remediation activities	Project Manager	Appendix A	
	The Smelter Access Control Plan is to be displayed in central locations (such as Site Office, kitchens and crib rooms).	Prior to and during activities	WHS Manager	Appendix A	
	All vehicular movement to and from the site will be in a forward direction.	During activities	WHS Manager		
	Vehicle manoeuvring areas will always be kept clear of any obstacles, including parked cars.	During activities	WHS Manager		
	The initial internal access restrictions and alternative access routes will be managed as required to reflect the status of remediation, demolition and decommissioning activities.	Undertake quarterly review of internal access restrictions and access routes to determine whether changes are required.	Prior to and during activities	Project Manager	Appendix A
		When access changes are required, update the Control Plan and communicate to all personnel via a toolbox talk and display in central locations (such as Site Office, kitchens and crib rooms).	During activities	WHS Manager	

Management Measures	Actions	Timing / Frequency	Responsibility	Further Detail
<p>A speed limit of 20 km/hr will be imposed on internal roads within parts of the Smelter (some parts would remain at 12 km/hr).</p> <p>Sufficient parking facilities will be available on-site, including for heavy vehicles and for site personnel, to ensure that traffic associated with the development does not utilise public and residential streets or public parking facilities.</p>	Install speed limit signage along access roads.	Prior to activities	Project Manager	Section 3.3.2 of the RWEMP (inductions and training)
	Communicate speed limit change to all personnel via a toolbox talk.	Prior to and during activities	WHS Manager	
	Update site induction to include new speed limit information.	Prior to and during activities	WHS Manager	
	Over 130 parking spaces would be available for the predicted peak personnel on-site during the works.	During activities	Project Manager	

4. MONITORING AND REVIEW

4.1 Monitoring

Hydro will undertake regular monitoring to ensure the demolition activities are not causing a detrimental environmental or community impact and to maintain compliance with relevant approvals and licences.

The cumulative impact of increased traffic on internal access roads has the potential to alter the road condition, as such monitoring of internal road condition and maintenance will be undertaken on an as needs basis.

The internal access monitoring commitments are outlined in **Table 4-1**.

Table 4-1: Access Monitoring Commitments

Monitoring Details	Frequency	Locations	Parameters	Person/s Responsible
Monitoring of internal road conditions	Monthly	Throughout the Smelter	Identify damage to/ deterioration of haul routes that could lead to spills and/ or vehicle damage	WHS Manager

4.2 Reporting

All internal and external environmental reporting requirements will be undertaken in accordance with the RWEMP.

Reporting will also be undertaken in accordance with relevant legislation, guideline and notification requirements, as outlined in as outlined in **Section 1.4**.

4.3 Non-conformances

The need for preventative or corrective action arises from the identification of non-conformance with environmental legal requirements, Hydro environmental requirements or the potential for non-conformances to occur.

Non-conformances will be resolved and recorded in accordance with Section 3.5.5 of the RWEMP.

4.4 Complaints

Community Complaints are considered environmental incidents and are investigated and documented accordingly. This will include any complaints relating to Smelter- related traffic.

Handling and investigation of complaints will be undertaken in accordance with Section 3.5.6 of the RWEMP.

4.5 Review and Improvement

Continual improvement of this SAP will be achieved by the continual evaluation of environmental management performance against environmental policies, objectives and targets for the purpose of identifying opportunities for improvement.

The Environmental Officer is responsible for ensuring that a regular review of the RWEMP and specialist management plans is undertaken.

Reviews will be recorded in the document control section of this plan.

5. REFERENCES

Ramboll Environ. 2015. "Statement of Environmental Effects - Demolition of Former Aluminium Smelter Buildings at Kurri Kurri".

Ramboll Environ. 2016. "Environmental Impact Statement: Former Hydro Aluminium Kurri Kurri Smelter Demolition and Remediation."

Ramboll Australia. 2018. "Environmental Impact Statement: Former Hydro Aluminium Kurri Kurri Smelter Stage 2 Demolition."

Ramboll Australia. 2020. "Response to Submissions Report: Former Aluminium Kurri Kurri Smelter Remediation."

NSW Roads and Maritime Service. 2018. "Traffic Control at Work Sites Manual"

NSW Roads and Traffic Authority. 2002. "Guide to Traffic Generating Developments"

6. LIMITATIONS

Ramboll Australia Pty Ltd prepared this report in accordance with the scope of work as outlined in our proposal to Hydro Aluminium Pty Ltd dated 20 July 2018 and in accordance with our understanding and interpretation of current regulatory standards.

Site conditions may change over time. This report is based on conditions encountered at the site at the time of the report and Ramboll Australia Pty Ltd disclaims responsibility for any changes that may have occurred after this time.

The conclusions presented in this report represent Ramboll Australia Pty Ltd's professional judgment based on information made available during the course of this assignment and are true and correct to the best of Ramboll Australia Pty Ltd's knowledge as at the date of the assessment.

Ramboll Australia Pty Ltd did not independently verify all of the written or oral information provided to Ramboll Australia Pty Ltd during the course of this investigation. While Ramboll Australia Pty Ltd has no reason to doubt the accuracy of the information provided to it, the report is complete and accurate only to the extent that the information provided to Ramboll Australia Pty Ltd was itself complete and accurate.

This report does not purport to give legal advice. This advice can only be given by qualified legal advisors.

6.1 User Reliance

This report has been prepared exclusively for Hydro Aluminium Pty Ltd to support a Development Application to Cessnock City Council. It may not be relied upon by any other person or entity without Ramboll Australia Pty Ltd's express written permission.

**APPENDIX A
SMELTER ACCESS CONTROL PLAN**



RAMBOLL AUSTRALIA - GIS MAP file : 318000533 GIS_P001 RemediationEMP | F007 SmelterAccessCP_V02 | 4/11/2020

Aerial photography by Nearmap, flown 15.06.2020

Legend

- Project site
- Access road
- Parking area

A4
1:8,000

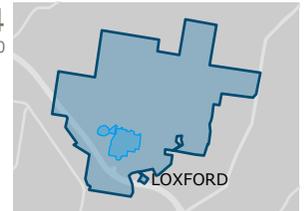


Figure 1 | Smelter Access Control Plan