

ATTACHMENT 1
NCIG CET PROJECT APPROVAL (06_0009)

Project Approval

Section 75J of the *Environmental Planning and Assessment Act 1979*

I, the Minister for Planning, approve the project referred to in Schedule 1, subject to the conditions in Schedule 2.

These conditions are required to:

- prevent, minimise, and/or offset adverse environmental impacts;
- set standards and performance measures for acceptable environmental performance;
- require regular monitoring and reporting; and
- provide for the ongoing environmental management of the project.

Frank Sartor MP
Minister for Planning

Sydney

2007

File No: S06/00617

SCHEDULE 1

Application No:	06_0009
Proponent:	Newcastle Coal Infrastructure Group
Approval Authority:	Minister for Planning
Land:	Part Lot 122 DP 874949, Part Lot 6 and Part Lot 7 DP 1015754, Part Lot 20 DP 262325, Part Lot 2 DP 581473.
Project:	Construction and operation of a coal export terminal with capacity of up to 66 million tonnes per annum, including: <ul style="list-style-type: none">• foundation preparation/capping of a rail corridor traversing the existing Kooragang Island Waste Emplacement Facility for the development of the rail spurs, rail sidings and rail loops;• construction of rail spurs, rail sidings and rail loops, rail overpass, train unloading stations and connecting conveyors;• reuse of dredged materials from the south arm of the Hunter River as preload and engineering fill for construction of the coal storage area, rail corridor and wharf facilities;• construction of a coal storage area including coal stockpiles, conveyors, transfer points and combined stacker/reclaimers;

- construction of wharf facilities, shiploaders, conveyors and buffer bins;
- development of water management infrastructure including Site drainage works, stormwater settlement ponds, primary and secondary settling ponds, Site water pond, water tanks and stockpile spray system;
- installation of electricity reticulation and control systems;
- development of access roads and internal roads; construction of administration and workshop buildings;
- other associated minor infrastructure, plant, equipment and activities; and
- operation of the coal export terminal up to a capacity of 66 million tonnes per annum of coal, including the unloading of coal trains, the stockpiling of coal, and the loading of coal to ships via the wharf facilities and shiploaders.

Major Project:

The proposal is DECclared a Major Project under section 75B(1)(a) of the *Environmental Planning and Assessment Act 1979*, because it is a development of a kind that is described in clause 22 of Schedule 1 to *State Environmental Planning Policy (Major Projects) 2005*.

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SCHEDULE 2

Act, the	<i>Environmental Planning and Assessment Act, 1979</i>
ARTC	Australian Rail Track Corporation
BCA, the	Building Code of Australia
Conditions of Approval	The Minister's conditions of approval for the project.
Council	Newcastle City Council
Day	the period from 7am to 6pm on Monday to Saturday, and 8am to 6pm on Sundays and Public Holidays
DECC	Department of Environment and Climate Change
Department, the	Department of Planning.
Director-General, the	Director-General of the Department of Planning (or delegate).
Director-General's Approval	A written approval from the Director-General (or delegate). Where the Director-General's Approval is required under a condition the Director-General will endeavour to provide a response within one month of receiving an approval request. The Director-General may ask for additional information if the approval request is considered incomplete. When further information is requested the time taken for the Proponent to respond in writing will be added to the one month period.
Director-General's Report	The report provided to the Minister by the Director-General of the Department under section 75I of the EP&A Act.
DNR	Department of Natural Resources
EA	<i>Environmental Assessment: Coal Export Terminal</i> (prepared by Resource Strategies on behalf of Newcastle Coal Infrastructure Group and dated July 2006).
EPA	Environment Protection Authority as part of the Department of Environment and Climate Change
EPL	Environment Protection Licence issued under the <i>Protection of the Environment Operations Act, 1997</i>
Evening	the period from 6pm to 10pm on any day
KIWEF	Kooragang Island Waste Emplacement Facility
Minister, the	Minister for Planning.
Mtpa	Million tonnes per annum
Night	the period from 10pm to 7am on Monday to Saturday, and 10pm to 8am on Sundays and Public Holidays
Proponent	Newcastle Coal Infrastructure Group, or any party acting under authorisation from and on behalf of the Newcastle Coal Infrastructure Group.
Publicly Available	Available for inspection by a member of the general public (for example available on an internet Site or at a display centre).
RTA, the	NSW Roads and Traffic Authority
Sensitive Receiver	Residence, education institution (e.g. school, TAFE college), health care facility (e.g. nursing home, hospital) or religious facility (e.g. church).
Site	Land to which Major Projects Application 06_0009 applies.

1. ADMINISTRATIVE CONDITIONS

Terms of Approval

- 1.1 The Proponent shall carry out the project generally in accordance with the:
- a) Major Projects Application 06_0009;
 - b) *Environmental Assessment: Newcastle Coal Infrastructure Group Coal Export Terminal*, prepared by Resource Strategies Pty Ltd and dated July 2006;
 - c) *Responses to Submissions*, prepared by Newcastle Coal Infrastructure Group and dated DECCember 2006; and
 - d) the conditions of this approval.
- 1.2 In the event of an inconsistency between:
- a) the conditions of this approval and any document listed from condition 1.1a) to 1.1c) inclusive, the conditions of this approval shall prevail to the extent of the inconsistency; and
 - b) any document listed from condition 1.1a) to 1.1c) inclusive, and any other document listed from condition 1.1a) to 1.1c) inclusive, the most recent document shall prevail to the extent of the inconsistency.
- 1.3 The Proponent shall comply with any reasonable requirement(s) of the Director-General arising from the Department's assessment of:
- a) any reports, plans or correspondence that are submitted in accordance with this approval; and
 - b) the implementation of any actions or measures contained in these reports, plans or correspondence.

Limits of Approval

- 1.4 This approval shall lapse five years after the date on which it is granted, unless the works the subject of this approval are physically and substantially commenced on or before that time.
- 1.5 The project shall be limited to a maximum export capacity of 66 million tonnes of coal per annum.
- 1.6 The Proponent may only proceed to construct the infrastructure marked as "High Capacity Optional Inlet Rail Spur and Rail Sidings" in Figure 2-1 of the document referred to under condition 1.1b) of this approval upon receipt of the Director-General's satisfaction that:
- a) the Compensatory Habitat and Ecological Monitoring Program required under condition 2.20 has been implemented to the extent agreed by the Director-General; and
 - b) the Proponent has complied with rail infrastructure review requirements required under condition 2.40 of this approval.

Statutory Requirements

- 1.7 The Proponent shall ensure that all licences, permits and approvals are obtained and maintained as required throughout the life of the project. No condition of this approval removes the obligation for the Proponent to obtain, renew or comply with such licences, permits or approvals. The Proponent shall ensure that a copy of this approval and all relevant environmental approvals are available on the Site at all times during the project.
- 1.8 The Proponent shall ensure that all practicable measures shall be taken to prevent and minimise harm to the environment as a result of the construction, operation, and where relevant, DECCommissioning of the development.
- 1.9 The Proponent shall ensure that all plant and equipment installed at the premises or used in conjunction with the project must be:
- a) Maintained in a proper and efficient condition; and
 - b) Operated in a proper and efficient manner.

- 1.10 With the approval of the Director-General, the Proponent may prepare and submit any management plan or monitoring program required by this approval on a progressive basis. Where a management plan and monitoring program is required before carrying out any development or stage of development, the plans/programs may be prepared and submitted in relation to either discrete components of the project or for a specified time period.

2. SPECIFIC ENVIRONMENTAL CONDITIONS

Air Quality Impacts

Odour

- 2.1 The Proponent shall not permit any offensive odour, as defined under section 129 of the *Protection of the Environment Operations Act 1997*, to be emitted beyond the boundary of the Site.

Dust Emissions

- 2.2 The Proponent shall design, construct, commission, operate and maintain the project in a manner that minimises or prevents the emission of dust from the Site including wind blown and traffic generated dust.
- 2.3 The Proponent shall take all practicable measures to ensure that all vehicles entering or leaving the Site, carrying a load that may generate dust, are covered at all times, except during loading and unloading. Any such vehicles shall be covered or enclosed in a manner that will prevent emissions of dust from the vehicle at all times, to the extent practicable.
- 2.4 All activities on the Site shall be undertaken with the objective of preventing visible emissions of dust beyond the boundary of the Site. Should such visible dust emissions occur at any time, the Proponent shall identify and implement all practicable dust mitigation measures, including cessation of relevant works, as appropriate.
- 2.5 The Proponent shall control dust emissions on all internal roads, trafficable areas and manoeuvring areas to minimise the potential for dust generation by sealing, or otherwise treating surfaces in a manner acceptable to the Director-General.
- 2.6 The Proponent shall design, construct, operate and maintain the project in a manner that minimises the potential generation of fugitive dust emissions from plant and equipment, including where relevant and practicable, design of the project to minimise the number of coal transfer points, minimise the drop height from stackers to stockpiles, full or partial enclosure of conveyors, installation of wind shields and belt cleaning systems to conveyors, and installation of dust control equipment to mobile plant.
- 2.7 As soon as practicable after the placement of fill/ preloading material on the Site, the Proponent shall cover, seal, grass or otherwise treat the Site in a manner acceptable to the Director-General to minimise the potential generation of wind-blown dust from the fill/ preload material. The Proponent shall maintain the cover, seal, grass or other treatment for the duration of relevant Site preparation and preloading activities, and following the addition of further fill/ preload materials that may occur from time to time during that period.

Meteorological Monitoring Station

- 2.8 The Proponent shall install, operate and maintain a meteorological monitoring station to monitor weather conditions representative of those on the Site, in accordance with:
- a) AM-1 Guide to Siting of Sampling Units (AS 2922-1987).
 - b) AM-2 Guide for Horizontal Measurement of Wind for Air Quality Applications (AS 2923-1987).
 - c) AM-4 On-Site Meteorological Monitoring Program Guidance for Regulatory Modelling Applications.

The meteorological monitoring station shall be installed at or near the Site and the Proponent shall use the meteorological monitoring station to undertake the monitoring required under condition 3.1 of this approval. This condition does not preclude the Proponent from reaching agreement with any other relevant party for the installation, operation and maintenance of a shared monitoring station, or shared use of an existing monitoring station representative of the Site, provided the outcomes of this condition are achieved.

Noise Impacts

2.9 The Proponent shall minimise noise emissions from plant and equipment operated on the Site in relation to the project according to the principles outlined in the NSW Government's *Industrial Noise Policy*.

Construction Noise

2.10 All Site preparation, filling/ preloading and construction works that may generate an audible noise at any residential receptor shall only be undertaken between 7:00 am and 6:00 pm. Audible noise is defined as "noise that can be heard at the receiver." This condition does not apply in the event of a direction from police or other relevant authority for safety or emergency reasons.

Note: 'safety or emergency reasons' refers to emergency works which may need to be undertaken to avoid loss of life, property loss and/or to prevent environmental harm.

2.11 Notwithstanding condition 2.10 of this approval, piling works shall not be conducted on Sundays or public holidays.

2.12 The Proponent may seek the Director-General's approval to conduct Site preparation, filling/ preloading and construction works outside the hours specified under condition 2.10 on a case-by-case basis. In seeking the Director-General's approval, the Proponent shall demonstrate a need for activities to be conducted during varied hours and how local acoustic amenity will be protected, as well as details of how the DECC's requirements with respect to the variation of hours have been addressed.

Operation Noise

2.13 The Proponent shall design, construct, operate and maintain the project to ensure that the noise contributions from the project do not exceed the maximum allowable noise contributions specified in Table 1 below, at those locations and during those periods indicated. The maximum allowable noise contributions apply under:

- meteorological condition of: wind speeds up to 3 ms^{-1} (measured at 10 metres above ground level); or
- temperature inversion conditions up to 3°C per 100 metres and wind speeds up to 2 ms^{-1} (measured at 10 metres above ground level).

Table 1 – Maximum Allowable Noise Contribution (dB(A))

Location	Day, Evening, Night At all times	Night 10:00pm to 7:00am Monday to Saturday 10.00pm to 8.00am on Sundays and Public Holidays	
	L _{Aeq} (15 minute)	L _{Aeq} (night)	L _{A1} (1 minute)
Fern Bay West	41	37	57
Fern Bay East	39	36	55
Stockton West	41	37	57
Stockton East	38	35	56
Mayfield West	45	40	55
Mayfield	44	39	62
Carrington	36	33	52

- 2.14 For the purpose of assessment of noise contributions specified under condition 2.13 of this consent, noise from the project shall be:
- measured at the most affected point on or within the Site boundary at the most sensitive receiver to determine compliance with $L_{Aeq(15 \text{ minute})}$ night noise limits.
 - measured at one metre from the dwelling façade to determine compliance with $L_{A1(1 \text{ minute})}$ noise limits.
 - subject to the modification factors provided in Section 4 of the *New South Wales Industrial Noise Policy* (EPA, 2000), where applicable.

Notwithstanding, should direct measurement of noise from the development be impractical, the Proponent may employ an alternative noise assessment method deemed acceptable by the DECC (refer to Section 11 of the *New South Wales Industrial Noise Policy* (EPA, 2000)). Details of such an alternative noise assessment method accepted by the DECC shall be submitted to the Director-General prior to the implementation of the assessment method.

Train Noise Performance

- 2.15 The Proponent shall take necessary actions to ensure that trains operated on the Site meet the noise performance criteria established under condition 2.13.

Ecological Impacts

- 2.16 Prior to the commencement of construction, including Site preparation and fill/ preloading activities, the Proponent shall employ a qualified ecologist approved by the Director-General to undertake a pre-construction survey of all areas to be affected by construction works for the presence of *Litoria aurea*. Should members of this species be located within any area to be affected by the project, the Proponent shall notify the Director-General and prepare a management plan for the relocation of *Litoria aurea* individuals in consultation with the DECC and RLMC. The management plan shall include, but not be limited to, the identification of potential locations, management procedures and monitoring requirements for the relocation of *Litoria aurea* individuals prior to the commencement of works.
- 2.17 The Proponent shall design and construct relevant rail infrastructure associated with the project to include culverts, underpasses or other similar measures to permit the movement of *Litoria aurea* and other amphibian species under the rail infrastructure. The culverts, underpasses or other similar measures shall be installed to include suitable habitat for *Litoria aurea*, and to provide protection from predators.
- 2.18 All employees and contractors involved in construction or operation of components of the project in areas known or suspected of providing habitat for *Litoria aurea* and other amphibian species shall be trained in Site hygiene management in accordance with *Hygiene Protocol for the Control of Disease in Frogs* (NPWS, 2001) prior to the commencement of the relevant work.
- 2.19 The Proponent shall employ a qualified ecologist, approved by the Director-General, for the duration of construction works, including Site preparation and fill/ preloading activities, to advise on the mitigation and management of impacts to listed threatened species that may be affected by the relevant works.

Compensatory Habitat and Ecological Monitoring Program

- 2.20 The Proponent shall develop and submit for the approval of the Director-General, a **Compensatory Habitat and Ecological Monitoring Program** to detail how habitat and ecological values lost as a result of the project will be off-set, and how ecological monitoring will be undertaken to inform on-going ecological management. The Program shall be developed in consultation with the DECC, and shall include, but not necessarily be limited to:
- ecological surveys, following detailed design of the project, to identify and quantify the extent and types of habitat that would be lost or degraded as a result of the project;

- b) provision for establishment of compensatory habitat for each relevant component of the project as follows, unless otherwise agreed by the Director-General:
 - i) for *Litoria aurea* habitat lost as a result of the project, establishment of compensatory habitat in a location agreed by the Director-General, in consultation with DECC, to no less than twice the area of habitat identified under a), with commencement of compensatory habitat works within six months of the commencement of construction;
 - ii) for migratory shore bird habitat lost as a result of the filling in of parts of Deep Pond and the construction of the optional rail spur, establishment of compensatory habitat in a location agreed by the Director-General, in consultation with the DECC, equivalent to no less than twice the area of habitat identified under a), with commencement of compensatory habitat works prior to the commencement of construction of the optional rail spur.
- c) provision for on-going ecological studies and migratory bird monitoring in and around Deep Pond, to investigate bird behaviour and to inform the design process for components of the project affecting Deep Pond;
- d) provision for the funding of works required under this condition, to be managed by a board, trust or other mechanism that provides a sound and legally enforceable means of allocating resources for ongoing adaptive management and review of the performance of compensatory habitat works for the life of the project;
- e) provision for research into *Litoria aurea* in and around Kooragang Island and the Hunter Estuary, as may be identified by the Proponent in consultation with relevant ecological and research groups;
- f) provision for ameliorative works on land surrounding the project Site, as may be negotiated by the Proponent with the relevant adjacent land owners, to improve or restore natural hydrology and ecosystems, remove mangrove communities where relevant and restore locally-endemic Endangered Ecological Communities;
- g) consideration of coordinating compensatory and ameliorative works with similar requirements for other developments, including with respect to the development the subject of development consent DA-134-3-2003-i (dredging and remediation of the South Arm of the Hunter River);
- h) monitoring requirements for compensatory habitat works and other ecological amelioration proposed under the Program; and
- i) timing and responsibilities for the implementation of the provisions of the Program.

Traffic and Transport Impacts

General Road Infrastructure and Traffic Management

- 2.21 Prior to the commencement of construction of the project, including fill/preload activities, the Proponent shall develop and submit for the approval of the RTA and Council, construction traffic control measures to be implemented for the project. The construction traffic control measures shall include measures to ensure that project traffic does not adversely affect traffic movements on Cormorant Road during peak traffic times.
- 2.22 The Proponent shall design, install and maintain physical traffic control devices and signs for all prohibited traffic movements referred to in Appendix C of the document referred to under condition 1.1b) of this approval, during construction and operation of the project, as relevant. The Proponent shall submit design details of the traffic control devices and signs to the RTA and Council for approval prior to their installation. Traffic control devices and signs shall be installed prior to the commencement of construction and operation, as relevant, and at the expense of the Proponent.
- 2.23 The Proponent shall ensure that all access to the relevant Site areas shall be via the following routes:
- a) Main Site Area:
 - i) Pacific National access road;
 - ii) Temporary haulage road (construction phase only);
 - iii) Egret Street; and

- iv) Raven Street, Curlew Street.
- b) Wharf Area:
 - i) Temporary haulage road (construction phase only); and
 - ii) Wharf access road.
- c) Rail area:
 - i) Delta access road (construction phase only); and
 - ii) Pacific National access road.

Cormorant Road/Temporary Haul Road Intersection

2.24 The Proponent shall ensure that traffic control signals and associated civil works are designed and constructed at the intersection of Cormorant Road and the temporary haulage road, west of the existing Blue Circle railway level crossing, in accordance with the RTA's *Road Design Guide* and the relevant Austroads guidelines, to the satisfaction of the RTA including but not limited to, the following works:

- a) the traffic control signals shall be designed to restrict all movements at the intersection to through movements only;
- b) the signals shall be co-ordinated with the adjacent Blue Circle railway level crossing signals; and
- c) provision shall be made for on-road Nelson Bay Road cyclists at the intersection.

2.25 The Proponent shall ensure that the traffic control signals outlined in condition 2.24 at the intersection of Cormorant Road and the temporary haul road shall be removed to the satisfaction of the RTA and Council, at completion of the construction phase or after 12 months of operation of the signals. This shall include any rehabilitation work required to Cormorant Road as determined by the RTA and Council.

2.26 The Proponent shall ensure that the traffic control signals at the intersection of Cormorant Road and the temporary haul road shall not be utilised for traffic movements across Cormorant Road between 6.00 am to 9.00 am and 4.00 pm to 6.00 pm on weekdays.

Cormorant Road/Tourle Street/Delta Access Road

2.27 The Proponent shall ensure that the intersection of Cormorant Road/Tourle Street and the Delta access road to the west of the Site is designed and constructed in accordance with the RTA's *Road Design Guide* and the relevant Austroads guidelines to the satisfaction of the RTA. The Proponent shall ensure that the intersection include, as a minimum, the following:

- a) traffic movements shall be physically restricted to left in/left out only;
- b) the left turn in would require a sealed left turn DECCeleration lane;
- c) the left turn out should be constructed at right angles to Cormorant Road as a give way arrangement and sealed for an appropriate length to ensure that materials are not tracked onto Cormorant Road, The Proponent shall ensure that shaker grids are provided on-Site at the start of the seal;
- d) a central median may be required on Cormorant Road at the exit of the Site to physically prevent right turn movements;
- e) adjustments to the footpath and cycleways shall be undertaken to the satisfaction of the RTA and Council.

Cormorant Road/Pacific National Access

2.28 The Proponent shall ensure that the intersection of Cormorant Road/Pacific National access shall be designed and constructed in accordance with the RTA's *Road Design Guide* and the relevant Austroads guidelines, to the satisfaction of the RTA. The Proponent shall ensure that the intersection should include as a minimum:

- a) traffic movements shall be physically restricted to left in/left out/right in only;
- b) the existing intersection shall be upgraded to include construction of concrete medians in Cormorant Road;
- c) this intersection shall be integrated with the wind turbine access to the satisfaction of the RTA and Council.

- 2.29 The Proponent shall construct a u-turn facility at the Pacific National access road to the satisfaction of the RTA and Council. The Proponent shall ensure that the u-turn facility:
- is located a minimum distance of 100 metres from Cormorant Road to avoid any potential conflict with traffic at the intersection; and
 - is designed to cater for B-double movements.

Cormorant Road/Wharf area access

- 2.30 The Proponent shall ensure that the intersection of Cormorant Road and the Wharf access road to the south of the Site is designed and constructed in accordance with the RTA's *Road Design Guide* and the relevant Austroads guidelines to the satisfaction of the RTA. The Proponent shall ensure that the intersection includes the following minimum requirements:
- traffic movements shall be physically restricted to left in/left out/right in only;
 - the left turn in would require a DECCeleration lane; and
 - the left turn out should be constructed at right angles to Cormorant Road as a give way arrangement.

Cormorant Road/Egret Street

- 2.31 The Proponent shall ensure that the intersection of Cormorant Road/Egret Street is designed and constructed in accordance with the RTA's *Road Design Guide* and the relevant Austroads guidelines to the satisfaction of the RTA. The Proponent shall ensure that the intersection includes, as a minimum:
- traffic movements shall be physically restricted to left in/left out and right in only; and
 - the existing intersection shall be modified to include the construction of concrete medians in Cormorant Road.

Conveyor Bridge over Cormorant Road

- 2.32 The Proponent shall ensure that the bridge structure over Cormorant Road is designed and constructed to RTA requirements, including (but not limited to):
- allowance for future road widening/duplication of Cormorant Road;
 - a minimum 6.5 metre vertical height clearance be provided from the top of the Cormorant Road pavement to the underside of the bridge structure;
 - the bridge structure and its approaches to be designed to minimise impacts on maintenance activities required within the road reserve; and
 - any maintenance activities required for the bridge structure shall be carried out from within/on the bridge structure.
- 2.33 The Proponent shall enter into an agreement with the RTA for the ongoing maintenance and demolition of the bridge structure.
- 2.34 The Proponent shall submit for the approval of the RTA and Council, detailed designs for the road works referred to under condition 2.22 to condition 2.32 inclusive, prior to the commencement of construction of those works, and prior to the commencement of construction of the relevant components of the project. All road works shall be undertaken and completed to the satisfaction of the RTA and Council.
- 2.35 The project shall be designed, constructed, maintained and operated so as not to preclude any future expansion of Cormorant Road to accommodate four lanes of traffic. The Proponent shall consult with the RTA during detailed design of the project to ensure that the requirements of this condition are reflected in the final design of the project. In this regard, the Proponent will be required to enter into a Works Authorisation Deed with the RTA and submit detailed design plans and any additional relevant information, as may be required under the Deed, to the RTA for each specific change to the state road network for the RTA's assessment and approval.
- 2.36 The Proponent shall ensure that any property requirements including acquisition and/or road reserve dedication shall be in accordance with the requirements of the RTA and Council and at the full expense of the Proponent.

Internal Roads and Parking

- 2.37 The Proponent shall design, construct and maintain all internal road works, including the car park, to meet the following requirements:
- a) compliance with the provisions of relevant Australian Standards, RTA standards and guidelines, and Council codes;
 - b) installation of clear signage to demarcate all vehicle movements within the Site;
 - c) installation and maintenance of any landscaping on the Site so as not to affect driver sight distance for vehicles entering and exiting the Site; and
 - d) clear demarcation of all visitor, disabled, ambulance and service vehicle parking areas.

Rail Infrastructure and Management

- 2.38 Prior to the commencement of any works associated with the construction of rail infrastructure on land associated with the Kooragang Island Waste Emplacement Facility, the Proponent shall consult with RLMC to reach agreement on the detailed design and operational aspects of the rail infrastructure components of the project on land owned by RLMC. Design details shall include all measures outlined in the documents referred to in condition 1.1.
- 2.39 The Proponent shall consult with, and meet the requirements of ARTC with respect to those components on the project that directly affect the design and connection of rail infrastructure with ARTC's existing rail infrastructure assets.
- 2.40 Prior to the commencement of construction of the infrastructure marked as "High Capacity Optional Inlet Rail Spur and Rail Sidings" in Figure 2-1 of the document referred to under condition 1.1b) of this approval, the Proponent shall undertake, in consultation with ARTC and the owner/ operator of the existing Kooragang Coal Loader, a review of the need for that infrastructure. The purpose of this review shall be to confirm the need for the infrastructure in light of the circumstances and operational requirements existing at the time of implementing this component of the project. The Proponent shall notify the Director-General of the outcomes of the review as soon as practicable after its completion.

Soil and Water Quality Impacts

- 2.41 Except as may be expressly provided under the provision of an Environment Protection Licence for the project, the Proponent shall comply with section 120 of the *Protection of the Environment Operations Act 1997* which prohibits the pollution of waters.
- 2.42 Unless otherwise agreed by the Director-General, the Proponent shall design, construct, maintain and operate surface water and stormwater management infrastructure on the Site to accommodate a 1 in 100 ARI rainfall event, and shall not permit the discharge of any water from the Site to the Hunter River unless expressly provided under the provision of an Environment Protection Licence.

Construction Soil and Water Management

- 2.43 The Proponent shall take all reasonable measures to prevent soil erosion and the discharge of sediments and pollutants from the Site during construction of the project.
- 2.44 The Proponent shall install stormwater drains, stormwater ponds, settlement ponds and/or storage ponds and other erosion, sediment and pollution controls as may be appropriate to manage stormwater on the Site. The Proponent shall maintain all erosion, sediment and pollution control infrastructure at or above design capacity for the duration of construction of the project and until such time as all ground disturbed by the works has been stabilised and rehabilitated so that it no longer acts as a source of sediment.
- 2.45 All stockpiled construction materials shall be stabilised and covered where practicable to prevent erosion or dispersal of the materials. The Proponent shall manage any fill/ preload material brought to the Site in manner that prevents erosion and dispersal of those materials.

Fill/ Preload Material Specifications

- 2.46 Materials classified as Virgin Excavated Natural Materials (VENM) or those referred to under condition 2.47, shall be used as fill/ preload material for the project.
- 2.47 Unless otherwise agreed by the Director-General, the Proponent shall only source clean materials for use in fill/ preloading activities from the development the subject of development consent DA-134-3-2003-i (dredging and remediation of the South Arm of the Hunter River). Where the Proponent seeks the agreement of the Director-General to use fill/ preload materials from a different source, the Director-General may require submission of additional information to demonstrate how the impacts from heavy vehicle movements will be adequately and appropriately mitigated and managed.
- 2.48 Unless otherwise agreed by the Director-General, fill/ preload material sourced from the development the subject of development consent DA-134-3-2003-i shall be transported and managed consistently with an approved Dredged Material Transport Strategy under that development consent (condition B2.29).

Operation Soil and Water Management

- 2.49 All stormwater and surface water management infrastructure on the Site intended to manage actual or potentially contaminated water shall be lined with a low-permeability material to minimise potential leakage. Collected stormwater shall be reused on Site for beneficial purposes such as the wetting of coal to reduce dust emissions from the Site.
- 2.50 In the event that stormwater runoff collection cannot meet the water demand of the Site, treated wastewater, if available from the relevant water authority, shall be used preferentially over potable water for the purposes of dust control, unless otherwise agreed by the Director-General.
- 2.51 All machinery wash down waters and amenities wastewater shall be directed to sewer (subject to Hunter Water Corporation approval), or to an appropriately licensed liquid waste disposal facility.
- 2.52 The Proponent shall design, install, maintain and operate rainwater tanks for the collection of water for domestic and potable uses on the Site. Collected rainwater shall be used preferentially to external potable water supplies.

Contaminated Land Management

- 2.53 The Proponent shall engage an appropriately qualified person to audit construction of the rail infrastructure over land used as part of the KIWEF against the commitments contained in the documents referred to in condition 1.1. The auditor shall provide the Director-General and the DECC with quarterly reports on the disturbance and recapping of the waste emplacement area during construction. In the event of any deviation from the commitments made in the abovementioned documents, prior approval should be sought from the DECC, and any deviation from the commitments shall be described in detail and reasons for the change provided and fully justified.
- 2.54 The Proponent shall ensure that any contaminated materials removed from the Site be directed to a waste management facility lawfully permitted to accept the materials.
- 2.55 To avoid any doubt, nothing in this approval relieves the need to comply with the requirements of Environment Protection Licence No. 6437 as it relates to the on-going management of the KIWEF.

Waste Generation and Management

- 2.56 All waste materials removed from the Site shall only be directed to a waste management facility lawfully permitted to accept the materials.

2.57 Except as expressly permitted in an appropriate licence, waste shall not be received at the Site for storage, treatment, processing or reprocessing or disposal.

Visual Amenity Impacts

2.58 Within six months of the commencement of construction of the project, or as otherwise agreed by the Director-General, the Proponent shall install the bund along the southern side of the stockpile yard (northern side of Cormorant Road) to the satisfaction of the Director-General.

2.59 The Proponent shall ensure that all external lighting installed as part of the project is mounted, screened, and directed in such a manner so as not to create a nuisance to surrounding land uses. The lighting shall be the minimum level of illumination necessary, and be in general accordance with *AS 4282 – 1997 Control of the Obtrusive Effects of Outdoor Lighting*.

2.60 The Proponent shall plant and maintain local native vegetation species along the earthen bund referred to under condition 2.58. Vegetation shall be planted prior to the commencement of operation of the project, and shall aim to screen the project from visual receptors towards the south, to the greatest extent practicable.

2.61 Advertising and project identification signs shall not be installed along the Cormorant Road frontage of the Site.

3. ENVIRONMENTAL MONITORING AND AUDITING

Meteorological Monitoring

3.1 From the commencement of construction of the project, the Proponent shall continuously monitor, utilising the meteorological monitoring station referred to under condition 2.8 of this approval, each of the parameters listed in Table 2, utilising the sampling method indicated and applying a 15-minute average period to all results, and recording data in units specified in Table 2.

Table 2 – Meteorological Monitoring

Parameter	Units of Measure	Sampling Method
Temperature at two metres	°C	AM-4
Temperature at ten metres	°C	AM-4
Wind speed at ten metres	ms ⁻¹	AM-2 and AM-4
Wind direction at ten metres	°	AM-2 and AM-4
Sigma theta at ten metres	°	AM-2 and AM-4
Solar radiation	Wm ⁻²	AM-4

Ambient Dust Monitoring

3.2 Prior to the commencement of operation of the project, the Proponent shall develop and submit for the approval of the Director-General and the DECC, an **Ambient Dust Monitoring Program**, to outline how the ambient dust impacts of the project will be monitored. The Program shall include, but not necessarily be limited to:

- a) identification of an integrated air quality monitoring network, developed in consultation with the owner/ operator of the existing Kooragang Coal Loader;
- b) locations, frequencies and methods for monitoring total suspended particles, PM₁₀ and deposited particulate matter;
- c) provision for the use of at least four hi-volume air samplers (HVAS), four dust depositional gauges and a meteorological station capable of monitoring wind direction and speed in accordance with condition 2.8 and condition 3.1 of this approval;
- d) investigation of the use of Tapered Element Oscillating Microbalance Samplers (TEOMS) as part of the integrated air quality monitoring network. Should the Proponent consider TEOMS not to be required, the Proponent may seek approval from both the Director-General and the DECC to exclude this requirement. In seeking such

an exclusion, the Proponent's reasons for the exclusion shall be provided and be fully justified;

- e) provided that the use of TEOMS is proven to be justified (as outlined in d) above), the Proponent shall utilise real-time monitoring data to inform environmental management DECCisions associated with the project;
- f) a framework for identifying actual and potential dust impacts, and for applying proactive and reactive mitigation and management measures to address those impacts;
- g) provision for independent review and auditing of the Program; and
- h) mechanisms for updating the Program as may be required from time to time.

- 3.3 Following one full year of data collection in accordance with an approved Ambient Dust Monitoring Program (refer to condition 3.2), the Proponent shall undertake a model validation study to review TSP, PM₁₀ and dust deposition levels to assess compliance with the dust impact predictions made in the documents referred to under condition 1.1 and with applicable ambient air quality goals. The model validation study shall be undertaken in accordance with *Approved Methods for the Modelling and Assessment of Air Pollutants in New South Wales* (DECC, 2005), and any specific requirements of the DECC.
- 3.4 Within 28 days of conducting the dust validation study referred to under condition 3.3 of this approval, the Proponent shall provide the Director-General and the DECC with a copy of the report. If the dust validation study identifies significant deviance from the predictions made in the documents referred to under condition 1.1 or any exceedance with ambient air quality goals, the Proponent shall detail what additional measures would be implemented to further mitigate dust impacts. The Proponent shall clearly indicate who would implement these measures, when these measures would be implemented, and how the effectiveness of these measures would be assessed and reported to the Director-General.
- 3.5 The requirements of conditions 3.3 and 3.4 shall be repeated once one year of dust monitoring data is available after the project exceeds an export rate of 33 million tonnes of coal per annum.

Noise Auditing

- 3.6 Within 90 days of the commencement of operation of the project, or as otherwise agreed by the Director-General, and during a period in which the project is operating under normal operating conditions, the Proponent shall undertake a program to confirm the noise performance of the project. The noise program shall include, but not necessarily be limited to:
- a) noise monitoring, consistent with the guidelines provided in the *New South Wales Industrial Noise Policy* (EPA, 2000), to assess compliance with condition 2.13 of this approval.
 - b) methodologies, locations and frequencies for noise monitoring;
 - c) identification of monitoring sites at which pre- and post-project noise levels can be ascertained;
 - d) details of any complaints and enquiries received in relation to noise generated by the project within the first 90 days of operation;
 - e) an assessment of night-time use of audible alarm systems;
 - f) a statement of whether the Site is in compliance with noise limits outlined in condition 2.13; and
 - g) any additional noise mitigation measures and timetables for implementation.
- 3.7 Within 28 days of conducting the noise monitoring referred to under condition 3.6 of this approval, the Proponent shall provide the Director-General and the DECC with a copy of the report. If the noise monitoring report identifies any non-compliance with the noise limits imposed under this approval (refer condition 2.13), the Proponent shall detail what additional measures would be implemented to ensure compliance, clearly indicating who would implement these measures, when these measures would be implemented, and how the effectiveness of these measures would be measured and reported to the Director-General.

- 3.8 The requirements of conditions 3.6 and 3.7 shall be repeated within 90 days of the project exceeding an export rate of 33 million tonnes of coal per annum.

4. COORDINATION OF PORT WORKS AND COAL EXPORT ACTIVITIES

Coordinated Environmental Monitoring and Management Protocol

- 4.1 Prior to the commencement of operation of the project, or within such period as otherwise agreed by the Director-General, the Proponent shall develop, in consultation with owner/operator of the existing Kooragang Coal Loader, a **Coordinated Environmental Monitoring and Management Protocol** to provide a framework for the coordinated and cooperative monitoring and management of environmental impacts from the developments. The Protocol shall include, but not necessarily be limited to:
- a) procedures for access to, and provision of, monitoring data from each development, particularly in relation to dust and noise emissions;
 - b) the respective remediation and redevelopment works;
 - c) arrangements for coordinated and cooperative monitoring of ambient environmental impacts, including agreements relating to sharing of monitoring networks/ infrastructure, coordinated interpretation of monitoring results and coordination dissemination of monitoring results to relevant parties;
 - d) measures to ensure a coordinated and cooperative approach to the management of common or cumulative environmental impacts from the developments;
 - e) arrangements for communication between the parties, including designated contact persons and contact details;
 - f) notification procedures in the event of an incident at either development that may impact on the other development, or generate a significant common or cumulative impact;
 - g) any agreement for participation in the development of any of the management plans or monitoring programs required under this approval;
 - h) mechanism for review of the Protocol from time to time; and
 - i) such other matters as parties may agree.

The Applicant shall provide a copy of the Protocol to the Director-General and the DECC as soon as practicable after agreement on the terms of the Protocol.

Coordinated Works Program

- 4.2 Prior to the commencement of construction of any component of the project, or within such period as otherwise agreed by the Director-General, the Proponent shall develop, in consultation with NSW Maritime, a **Coordinated Works Program** to ensure that the requirements of this approval, and the conditions imposed on the development the subject of development consent DA-134-3-2003-i (dredging and remediation of the South Arm of the Hunter River) are met and coordinated where the relevant works are interrelated. The Program shall specifically focus on requirements for coordination of works in and around the Hunter River foreshore, ecological monitoring and management, and scheduling of dredging and fill/ preloading activities.

Coordination of Cumulative Dust Studies

- 4.3 The Proponent shall participate in any cumulative dust study that may be commissioned by the Department, in consultation with DECC. Any such study shall be focused on cumulative dust impacts from major port and industrial sources in the Lower Hunter Estuary on potentially affected residential and sensitive receptors, with specific reference to receptors in Fern Bay, Stockton, Mayfield and Carrington. The extent of the Proponent's involvement in such a study shall be agreed with and to the satisfaction of the Director-General, and shall include, but not necessarily be limited to:
- a) provision of monitoring data associated with the environmental performance of the project;
 - b) provision of management and auditing documentation associated with the project and relevant to the study;

- c) access to the project and relevant technical and environmental experts associated with the project;
- d) arrangements for any financial contributions to cover the reasonable expenses associated with the study; and
- e) such other matters as the Proponent and the Director-General may agree.

5. COMPLIANCE MONITORING AND TRACKING

Compliance Tracking Program

- 5.1 The Proponent shall develop and implement a **Compliance Tracking Program** to track compliance with the requirements of this approval. The Program shall include, but not necessarily limited to:
- a) provisions for periodic review of the compliance status of the project against the requirements of this approval;
 - b) provisions for periodic reporting of compliance status to the Director-General;
 - c) a program for independent environmental auditing at least annually, or as otherwise agreed by the Director-General, in accordance with *ISO 19011:2002 - Guidelines for Quality and/ or Environmental Management Systems Auditing*; and
 - d) mechanisms for rectifying any non-compliance identified during environmental auditing or review of compliance.

6. COMMUNITY INFORMATION, CONSULTATION AND INVOLVEMENT

- 6.1 Subject to confidentiality, the Proponent shall make all documents required under this approval available for public inspection on request.

Complaints and Enquiries Procedure

- 6.2 Prior to the commencement of construction of the project, the Proponent shall ensure that the following are available for community complaints and enquiries for the life of the project (including construction and operation):
- a) a telephone number on which complaints and enquiries about construction and operational activities at the Site may be registered.
 - b) a postal address to which written complaints and enquires may be sent.
 - c) an email address to which electronic complaints and enquiries may be transmitted.

The telephone number, the postal address and the email address shall be displayed on a sign near the entrance to the Site, in a position that is clearly visible to the public, and which clearly indicates the purposes of the sign. This information is also to be provided on the Proponent's website.

- 6.3 The Proponent shall record details of all complaints received through the means listed under condition 6.2 of this approval in an up-to-date Complaints Register. The Register shall record, but not necessarily be limited to:
- a) the date and time, where relevant, of the complaint.
 - b) the means by which the complaint was made (telephone, mail or email).
 - c) any personal details of the complainant that were provided, or if no details were provided, a note to that effect.
 - d) the nature of the complaint.
 - e) record of operational and meteorological condition contributing to the complaint.
 - f) any action(s) taken by the Proponent in relation to the complaint, including any follow-up contact with the complainant.
 - g) if no action was taken by the Proponent in relation to the complaint, the reason(s) why no action was taken.

The Complaints Register shall be made available for inspection by the Director-General upon request.

Provision of Electronic Information

- 6.4 The Proponent shall establish and maintain a new website, or dedicated pages within its existing website for the provision of electronic information associated with the project. The Proponent shall publish and maintain up-to-date information on this website or dedicated pages including, but not necessarily limited to:
- a) a copy of the documents referred to under condition 1.1 of this approval, and any documentation supporting modifications to this approval that may be granted from time to time;
 - b) a copy of this approval and each relevant environmental approval, licence or permit required and obtained in relation to the project;
 - c) a copy of each strategy, plan and program required under this approval; and
 - d) the outcomes of compliance tracking in accordance with condition 5.1 of this approval.

7. ENVIRONMENTAL MANAGEMENT

Environmental Representative

- 7.1 Prior to the commencement of construction of the project, or otherwise agreed by the Director-General, the Proponent shall nominate a suitably qualified and experienced Environmental Representative(s) for the approval of the Director-General. The Proponent shall employ the Environmental Representative(s) on a full-time basis, or as otherwise agreed by the Director-General, during the operation of the project. The Environmental Representative(s) shall be:
- a) the principal contact point in relation to the environmental performance of the project;
 - b) responsible for all management plans and monitoring programs required under this approval;
 - c) responsible for considering and advising on matters specified in the conditions of this approval, and all other licences and approvals related to the environmental performance and impacts of the project;
 - d) responsible for receiving and responding to complaints in accordance with condition 6.2 of this approval; and
 - e) given the authority and independence to require reasonable steps be taken to avoid or minimise unintended or adverse environmental impacts, and failing the effectiveness of such steps, to direct that relevant actions be ceased immediately should an adverse impact on the environment be likely to occur.

Construction Environmental Management Plan

- 7.2 Prior to the commencement of construction of the project, the Proponent shall prepare and implement a **Construction Environmental Management Plan** to outline environmental management practices and procedures to be followed during construction of the project. The Plan shall be prepared in accordance with *Guideline for the Preparation of Environmental Management Plans* (DIPNR 2004) and shall include, but not necessarily be limited to:
- a) a description of all activities to be undertaken on the Site during construction including an indication of stages of construction, where relevant;
 - b) statutory and other obligations that the Proponent is required to fulfil during construction including all approvals, consultations and agreements required from authorities and other stakeholders, and key legislation and policies;
 - c) details of how the environmental performance of the construction works will be monitored, and what actions will be taken to address identified adverse environmental impacts. In particular, the following environmental performance issues shall be addressed in the Plan:
 - i) measures to monitor and manage dust emissions;
 - ii) measures to monitor and minimise soil erosion and the discharge of sediment and other pollutants to lands and/ or waters during construction activities;
 - iii) measures to monitor and control noise emissions during construction works;
 - d) a description of the roles and responsibilities for all relevant employees involved in the construction of the project;
 - e) the additional studies listed under condition 7.3 of this approval;
 - f) a traffic control plan to detail the various traffic control measures to be used for construction traffic access connections to the classified road network; and

- g) complaints handling procedures during construction.

The Plan shall be submitted for the approval of the Director-General no later than one month prior to the commencement of any construction works associated with the project, or within such period otherwise agreed by the Director-General. Construction works shall not commence until written approval has been received from the Director-General.

- 7.3 As part of the Construction Environmental Management Plan for the project required under condition 7.2 of this approval, the Proponent shall prepare and implement the following:
- a) where soil testing prior to the commencement of construction identifies the presence of acid sulfate soils, an **Acid Sulfate Soil Management Plan** prepared in accordance with guidance provided in *Acid Sulfate Soil Manual* (Acid Sulfate Soil Management Advisory Committee, 1998);
 - b) a **Construction Surface Water Management Plan** to detail how surface water and stormwater will be managed on the Site during construction. The Plan shall include use of appropriately-sized stormwater controls, in accordance with *Managing Urban Stormwater: Soils and Construction* (Landcom, 2004). The Plan shall include specific measures to avoid sediment-laden stormwater from entering Deep Pond, wetland areas or the Hunter River, and a monitoring program for stormwater leaving the Site;
 - c) a **Construction Noise Management Plan** to detail how construction noise and vibration impacts would be minimised and managed, including, but not necessarily limited to:
 - i) details of construction activities and a schedule for construction works;
 - ii) identification of construction activities that have the potential to generate noise and/ or vibration impacts on surrounding land uses, particularly residential areas;
 - iii) a detailed description of what actions and measures would be implemented to ensure that these works would comply with the relevant noise and vibration criteria/ guidelines;
 - iv) procedures for notifying residents of construction activities that are likely to effect their noise and vibration amenity, as well as procedures for dealing with and responding to noise complaints; and
 - v) a description of how the effectiveness of these actions and measures would be monitored during the proposed works, clearly indicating how often this monitoring would be conducted, how the results of this monitoring would be recorded; and, if any non-compliance is detected.
 - d) a **Construction Traffic Management Protocol** to detail how heavy vehicle movements associated with the project will be managed during construction, including Site preparation and fill/ preloading activities. The Protocol shall specifically address the movement of oversize loads to and from the Site, the management of construction traffic, restrictions to the hours of heavy vehicle movements to avoid road use conflicts, and the transport of construction waste materials. In addition to approval from the Director-General, the Construction Traffic Management Protocol shall be submitted for the approval of the RTA and Council.

- 7.4 In the event that construction of the project is phased up to the maximum capacity specified under condition 1.5, the requirements of conditions 7.3 and 7.4 shall be repeated prior to the commencement of construction of each phase of the project.

Operation Environmental Management Plan

- 7.5 Prior to the commencement of operation of the project, the Proponent shall prepare and submit for the approval of the Director-General an **Operation Environmental Management Plan** (OEMP) to detail an environmental management framework, practices and procedures to be followed during the operation of the project. The Plan shall be consistent with the Department's *Guideline for the Preparation of Environmental Management Plans* (DIPNR 2004), and shall include, but not necessarily be limited to:
- a) a description of all activities to be undertaken on the Site during operation including an indication of stages of operation, where relevant;

- b) statutory and other obligations that the Proponent is required to fulfil during operation including all approvals, consultations and agreements required from authorities and other stakeholders, and key legislation and policies;
- c) details of how the environmental performance of the operations will be monitored, and what actions will be taken to address identified adverse environmental impacts. In particular, the following environmental performance issues shall be addressed in the Plan:
 - i) measures to monitor and manage dust emissions;
 - ii) measures to monitor and minimise soil erosion and the discharge of sediment and other pollutants to lands and/ or waters during operation;
 - iii) measures to monitor and control noise emissions during operation;
- d) a description of the roles and responsibilities for all relevant employees involved in the operation of the project;
- e) the additional studies listed under condition 7.6 of this approval; and
- f) complaints handling procedures during operation.

The Operation Environmental Management Plan shall be made available for inspection by the public upon request following its approval by the Director-General.

7.6 As part of the Operation Environmental Management Plan for the project required under condition 7.5 of this approval, the Proponent shall prepare and implement the following:

- a) a **Dust Management Plan** to outline measures to minimise and manage any impacts from the operation of the project on local air quality. The Plan shall include, but not necessarily be limited to:
 - i) identification of all major sources of dust emissions that may occur as result of the operation of the project;
 - ii) description of the procedures to manage the dust emissions from the sources identified;
 - iii) identification of the locations where monitoring of dust emissions is to be undertaken;
 - iv) procedures for monitoring dust emissions from the project, in accordance with the requirements of this approval and the Environment Protection Licence for the project;
 - v) protocols for regular maintenance of plant and equipment, to minimise the potential for fugitive dust emissions; and
 - vi) description of procedures to be undertaken if any non-compliance is detected.
- b) a **Noise Management Plan** to outline monitoring, management procedures and measures to minimise total operational noise emissions from the project. The Plan shall also include, but not necessarily be limited to:
 - i) identification of all relevant receivers and the applicable criteria at those receivers commensurate with the noise limits specified under this approval;
 - ii) identification of activities that will be carried out in relation to the project and the associated noise sources;
 - iii) assessment of project noise impacts at the relevant receivers against the noise limits specified under this approval;
 - iv) details of all management methods and procedures that will be implemented to control individual and overall noise emissions from the Site during the project;
 - v) details regarding the procurement process to guarantee that equipment levels meet the noise levels as provided in the documents listed in condition 1.1;
 - vi) development of reactive and pro-active strategies for dealing promptly with any noise complaints;
 - vii) noise monitoring and reporting procedures; and
 - viii) regular internal audits of compliance of all plant and equipment with acceptable design noise.
- c) a **Water Management Plan** to outline the water management system for the Site. The Plan shall include, but not necessarily be limited to:
 - i) predicted Site water balance including the water supply system;

- ii) details regarding water management structures such as settling ponds, water tanks and the water management system for dredge sea water;
 - iii) locations and design specifications for all water diversions from undisturbed runoff areas including channel design and stabilisation, sediment retention storages and other structures;
 - iv) details on the internal drainage system including bunding, drainage channels, dewatering sumps and any pipelines;
 - v) procedures for the management of groundwater encountered on Site and any temporary dewatering facilities; and
 - vi) procedures to be implemented to minimise potential surface water impacts.
- d) a **Spontaneous Combustion Management Protocol** to outline measures to minimise and manage the spontaneous combustion of the coal stockpiles. The Plan shall include, but not necessarily be limited to:
- i) coal stockpile management measures;
 - ii) monitoring of potential causes of spontaneous combustion events; and
 - iii) corrective action in the event of spontaneous combustion.

7.7 The Operation Environmental Management Plan required under conditions 7.5 and 7.6 shall periodically reviewed and maintained, to reflect any phasing of implementation of the project, and any operational changes that may be made from time to time.

8. ENVIRONMENTAL REPORTING

Incident Reporting

- 8.1 The Proponent shall notify the Director-General of any incident with actual or potential significant off-Site impacts on people or the biophysical environment as soon as practicable after the occurrence of the incident. The Proponent shall provide written details of the incident to the Director-General within seven days of the date on which the incident occurred.
- 8.2 The Proponent shall maintain a register of accidents, incidents and potential incidents with actual or potential significant off-Site impacts on people or the biophysical environment. The register shall be made available for inspection at any time by the independent qualified person or team conducting the Environmental Audit and/or the Director-General.
- 8.3 The Proponent shall meet the requirements of the Director-General to address the cause or impact of any incident, as it relates to this approval, reported in accordance with condition 8.1 of this consent, within such period as the Director-General may agree.
-

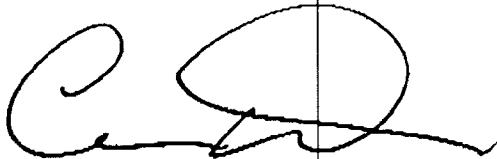
ATTACHMENT 2

NCIG CET MODIFICATION OF MINISTER'S APPROVAL AND PLAN OF
SUBDIVISION

Modification of Minister's Approval

Section 75W of the Environmental Planning and Assessment Act 1979

I, the Executive Director, Major Project Assessments Division of the Department of Planning, in accordance with the Instrument of Delegation issued by the Minister for Planning, on 7 June 2007, pursuant to section 75W of the *Environmental Planning and Assessment Act 1979* determine to approve of the modification to the approval referred to in Schedule 1 in the manner set out in Schedule 2.



Executive Director, Major Project Assessments
As delegate for the Minister for Planning

Sydney,

27 November 2007

SCHEDULE 1

Project Approval:

granted by the Minister for Planning on 13 April 2007 (MP 06_0009).

For the following:

Construction and operation of a coal export terminal with capacity of up to 66 million tonnes per annum, including:

- foundation preparation/capping of a rail corridor traversing the existing Kooragang Island Waste Emplacement Facility for the development of the rail spurs, rail sidings and rail loops;
- construction of rail spurs, rail sidings and rail loops, rail overpass, train unloading stations and connecting conveyors;
- reuse of dredged materials from the south arm of the Hunter River as preload and engineering fill for construction of the coal storage area, rail corridor and wharf facilities;
- construction of a coal storage area including coal stockpiles, conveyors, transfer points and combined stacker/reclaimers;
- construction of wharf facilities, shiploaders, conveyors and buffer bins;
- development of water management infrastructure including Site drainage works, stormwater settlement ponds, primary and secondary settling ponds, Site water pond, water tanks and stockpile spray system;

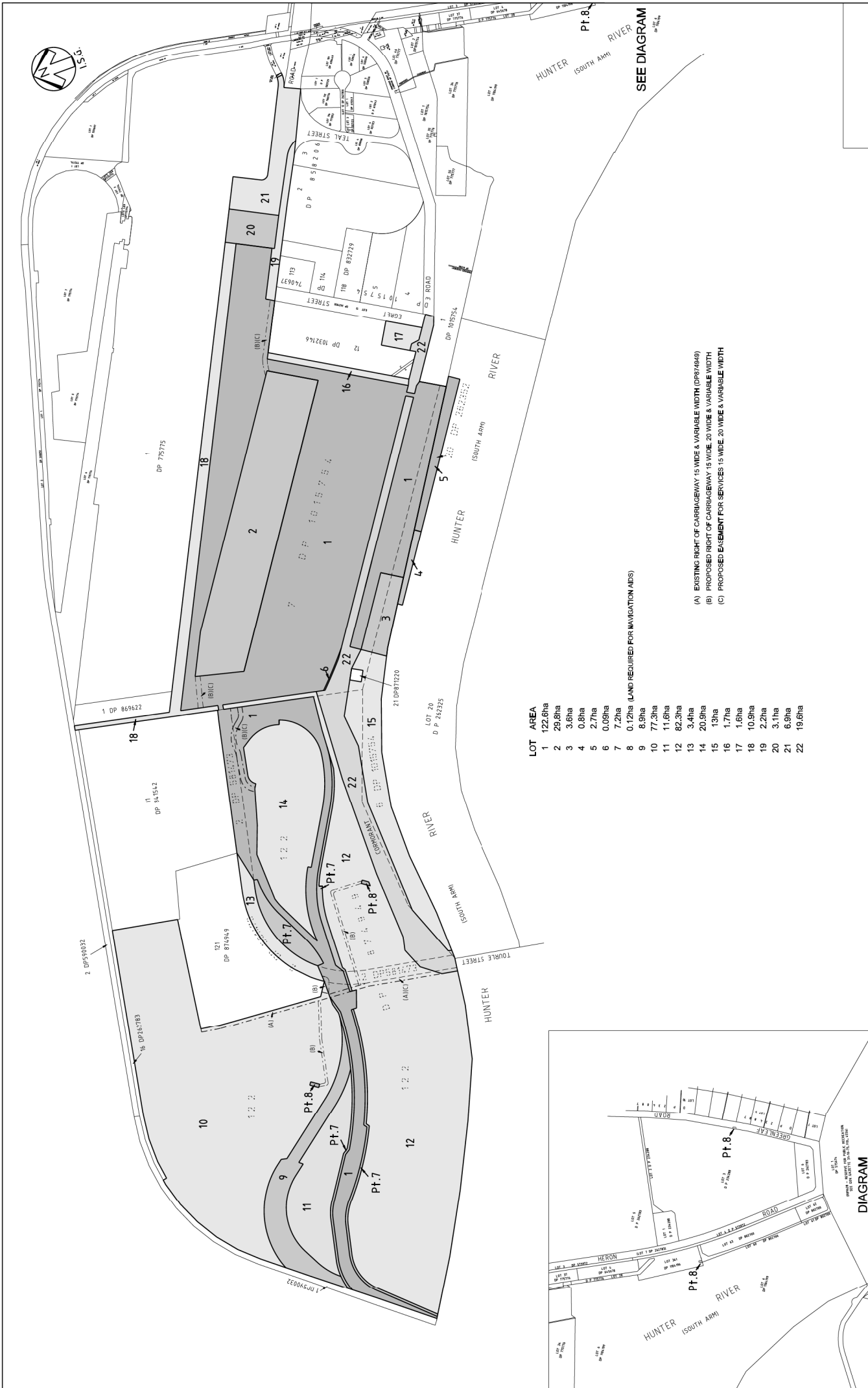
- installation of electricity reticulation and control systems;
- development of access roads and internal roads;
- construction of administration and workshop buildings;
- other associated minor infrastructure, plant, equipment and activities; and
- operation of the coal export terminal up to a capacity of 66 million tonnes per annum of coal, including the unloading of coal trains, the stockpiling of coal, and the loading of coal to ships via the wharf facilities and shiploaders.

Modification:

The subdivision of land to facilitate the registration of leasehold over the land area by the State Property Authority to allow NCIG to lease the land for the construction and operation of the Coal Export Terminal, Kooragang Island, in the Newcastle local government area. Subdivision of Lot 122 DP 874949, Lot 2 DP 581473, Lot 6 DP 1015754, Lots 71 and 74 DP 1119950 and Lot 20 DP 262325.

SCHEDULE 2**The Approval is modified by:**

1. Delete condition 1.1 and replace with the following:
 - 1.1 The Proponent shall carry out the project generally in accordance with the:
 - a) Major Projects Application 06_0009;
 - b) *Environmental Assessment: Newcastle Coal Infrastructure Group Coal Export Terminal*, prepared by Resource Strategies Pty Ltd and dated July 2006;
 - c) *Responses to Submissions*, prepared by Newcastle Coal Infrastructure Group and dated December 2006;
 - d) Plan of subdivision titled *Stage 1 Proposed Subdivision of Lot 122 DP 874949, Lot 2 DP 581473, Lot 6 DP 1015754 and Lots 71 and 74 DP 1119950, Stages 2 and 3 Proposed Subdivision of Lot 20 DP 262325* (surveyors reference HW43.01.03.00) prepared by Paul John Stivano and undated; and plan of subdivision titled *Plan of Subdivision of Lot 122 DP 874949, Lot 2 DP 581473, Lot 6 DP 1015754 and Lots 71 and 74 DP 1119950* (surveyors reference HW43.01.03.00) prepared by Paul John Stivano and dated 2 November 2007; and
 - e) the conditions of this approval.
2. Delete condition 1.2 and replace with the following:
 - 1.2 In the event of an inconsistency between:
 - a) the conditions of this approval and any document listed from condition 1.1a) to 1.1d) inclusive, the conditions of this approval shall prevail to the extent of the inconsistency; and
 - b) any of the documents listed from condition 1.1a) to 1.1d) inclusive, the most recent document shall prevail to the extent of the inconsistency.
3. Insert the following condition after 1.7:
 - 1.7(a) Prior to the issue of the Subdivision Certificate, the Proponent shall provide to the relevant certifying authority evidence that all easements and covenants required by this approval have been or will be registered for the subdivision.



SEE DIAGRAM

LOT	AREA
1	122.6ha
2	29.8ha
3	3.6ha
4	0.8ha
5	2.7ha
6	0.09ha
7	7.2ha
8	0.12ha (LAND REQUIRED FOR NAVIGATION AIDS)
9	8.9ha
10	77.3ha
11	11.6ha
12	82.3ha
13	3.4ha
14	20.9ha
15	13ha
16	1.7ha
17	1.6ha
18	10.9ha
19	2.2ha
20	3.1ha
21	6.9ha
22	19.6ha

- (A) EXISTING RIGHT OF CARRIAGEWAY 15 WIDE & VARIABLE WIDTH (DPS74849)
- (B) PROPOSED RIGHT OF CARRIAGEWAY 15 WIDE, 20 WIDE & VARIABLE WIDTH
- (C) PROPOSED EASEMENT FOR SERVICES 15 WIDE, 20 WIDE & VARIABLE WIDTH



Rev.	Date	Revision Details	Drawn	Checked	Designated	Verified	Approved	Signed	Date
0	28.9.07	INITIAL ISSUE	LMB	KAJ	WD				
			Drm.	Ver.	App.				

Client:	Cornell HATCH <small>Cornell Hatch 116 Military Road (PO Box 530) Neutral Bay New South Wales 2088 Australia</small>
Telephone:	+61 2 9462 5500
Fax:	+61 2 9462 5508
Email:	enquiry@cornellhatch.com
<small>A person using Cornell Hatch's drawings and other data accepts the risk of: 1. errors or omissions in the drawings and other data; 2. using the drawings and other data for a purpose not intended by Cornell Hatch.</small>	

Project No.	HW43-01
Scale	1:7500
Drawing No.	VSO06
Sheet Size	A1
Rev.	0

NCIG COAL EXPORT TERMINAL PROPOSED PLAN OF SUBDIVISION OF LOT 122 DP 874959, LOT 2 DP 581473, LOTS 6 & 7 DP 1015754 KOORAGANG ISLAND	
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ATTACHMENT 3

NCIG CET EPBC ACT PARTICULAR MANNER DECISION 2006/2987

COMMONWEALTH OF AUSTRALIA
ENVIRONMENT PROTECTION AND BIODIVERSITY CONSERVATION ACT 1999

**DECISION THAT ACTION IS NOT A CONTROLLED ACTION
PROVIDED IT IS UNDERTAKEN IN A PARTICULAR MANNER**

I, ALEX RANKIN, Assistant Secretary, Environment Assessment Branch, Department of the Environment and Heritage, a delegate of the Minister for the Environment and Heritage for the purposes of section 75 of the *Environment Protection and Biodiversity Conservation Act 1999*, decide that the proposed action, set out in the Schedule, is not a controlled action. Provided that the proposed action is taken in the manner described in the Schedule, the provisions of Part 3 of the EPBC Act set out in the Schedule are not controlling provisions.

SCHEDULE

The proposed action to develop a Coal Export Terminal, including associated rail and coal handling infrastructure and wharf/shiploading facilities on the south arm of the Hunter River, Kooragang Island, Newcastle, NSW, and as described in the referral received under the Act on 9 August 2006 and additional information received 11 September and 3 October 2006 (EPBC 2006/2987).

Provisions of Part 3

The relevant provisions of Part 3 are:

- Sections 16 and 17B (Ramsar wetlands);
- Sections 18 and 18A (Listed threatened species); and
- Sections 20 and 20A (Migratory species).

Manner in which the proposed action is to be taken:

The following measures must be taken to ensure that significant impacts are avoided on populations of the listed vulnerable Green and Golden Bell Frog (*Litoria aurea*), listed migratory shorebirds that utilise Deep Pond, and the ecological character of the Hunter Estuary Wetlands Ramsar site.

Green and Golden Bell frog

1. Green and Golden Bell Frogs found on the project site during construction or operation will be removed from the direct disturbance area and placed in adjacent similar habitat within the Kooragang Nature Reserve, and in accordance with the NPWS *Hygiene Protocol for the Control of Disease in Frogs 2001*.
2. The following management measures, as a minimum, will be undertaken to minimise the further spread of amphibian chytrid fungus:
 - The training of all project personnel in site hygiene management in accordance with the NPWS *Hygiene Protocol for the Control of Disease in Frogs 2001*.
 - Procedures will be implemented to inspect mobile plant entering the proposal site during construction activities to ensure the plant is free of soil and/or organic matter and to disinfect tyres and wheels of vehicles entering the proposal site that have been exposed to mud.
3. Rail culverts, to act as frog underpasses, will be designed and constructed along the proposed rail loop and as described in the referral and on Drawing 3, NCIG Coal Export Terminal (NCIG 2006) attached to the referral.
4. The following measures will be undertaken to establish habitat for the Green and Golden Bell Frogs at the frog underpasses, including culverts placed within existing drainage channels that will be retained for use as frog underpasses:
 - Planting of vegetation preferred by the frog species, including Cumbungi (*Typha* sp), spikerushes (*Eleocharis* spp) or sedges (*Schoenoplectus* spp).
 - Placing piles of rocks at either end of, or within, frog underpasses.
 - Establishment of pond areas at either end of the frog underpasses.
5. Project personnel will be prohibited from entering Green and Golden Bell Frog habitat area located outside defined construction areas.

6. Annual monitoring during the breeding season of the Green and Golden Bell Frog will be undertaken on the Coal Export Terminal site until 2020. Thereafter, monitoring will be undertaken on a three yearly basis until 2030. If monitoring indicates declining populations attributable to the development, measures will be implemented, in consultation with the Department, to reverse any decline. Such measures may include control of *Gambusia* populations, further creation or enhancement of frog habitat and dispersal pathways, and establishment of new populations.

Shorebirds

7. Screens, comprising timber paling fences or similar structures, will be placed at intervals along the rail infrastructure to minimise lighting impacts on shorebird habitat along the southern shores of Deep Pond from trains and ground-level rail corridor lighting.
8. Annual monitoring of the Australasian Bittern and shorebird populations utilising Deep Pond will be undertaken during summer (eg peak waterbird usage period) until 2020. Thereafter, monitoring will be undertaken on a three yearly basis until 2030.
9. Monitoring results will be provided on an annual basis to the Department up to 2020 (by 31 March of each year). A summary and analysis of the results will also be provided each three years (by 31 March) addressing any changes in the utilisation patterns of listed migratory shorebirds at Deep Pond since the monitoring commenced. Measures will be implemented to enhance existing habitat, or provide additional habitat, in the event monitoring indicates a decline in listed shorebird usage attributable to construction and operation of the rail loop. Design and construction of any new habitat, or habitat enhancement measures, will be undertaken in consultation with a shorebird specialist.
10. The Department will be notified a minimum of 24 months prior to construction of the northern rail spur, if it proceeds. An assessment of potential impacts on listed shorebird habitat in Deep Pond will be provided at that time, together with a description of any design or other mitigation measures required to avoid significant impacts on listed birds. Such measures may include enhancement of existing habitat and creation of new habitat alongside the northern rail spur embankment. Design and construction of any new habitat, or habitat enhancement measures, will be undertaken in consultation with a shorebird specialist.

Hunter Estuary Ramsar Wetlands

11. A site water management plan, including a surface water monitoring program, will be developed in accordance with the measures outlined in the *Site Water Management Plan (SWMP) (Construction and Operation)* provided in Section 5 of the *Draft Statement of Commitments, Environmental Assessment* (Newcastle Coal Infrastructure Group, July 2006) and Sections 8 & 9 of the *Land Contamination and Groundwater Assessment, Newcastle Coal Infrastructure Group Coal Export Terminal, Kooragang Island, Appendix D* (RCA Australia, June 2006).

Dated this 11th day of October 2006


.....
**ASSISTANT SECRETARY
ENVIRONMENT ASSESSMENT BRANCH
DEPARTMENT OF THE ENVIRONMENT AND HERITAGE**

ATTACHMENT 4
NCIG CET EPL 12693

Environment Protection Licence

Licence - 12693



Licence Details

Number:	12693
Anniversary Date:	26-October

Licensee

NEWCASTLE COAL INFRASTRUCTURE GROUP PTY LTD
 LOCKED BAG 6003
 HUNTER REGION MAIL CENTRE NSW 2310

Premises

NEWCASTLE COAL INFRASTRUCTURE GROUP
 CORMORANT ROAD
 KOORAGANG NSW 2304

Scheduled Activity

Cement or Lime works
 Coal Works
 Railway Systems Activities
 Shipping in Bulk

Fee Based Activity

Scale

Cement or lime handling	> 30000-100000 T handled
Coal works	> 5000000 T handled
Railway systems activities	Any annual capacity
Shipping in bulk	> 500000 T loaded and unloaded

Region

North East - Hunter
 Ground Floor, NSW Govt Offices, 117 Bull Street
 NEWCASTLE WEST NSW 2302
 Phone: (02) 4908 6800
 Fax: (02) 4908 6810
 PO Box 488G NEWCASTLE
 NSW 2300

Environment Protection Licence

Licence - 12693



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Information about this licence

Dictionary

A definition of terms used in the licence can be found in the dictionary at the end of this licence.

Responsibilities of licensee

Separate to the requirements of this licence, general obligations of licensees are set out in the Protection of the Environment Operations Act 1997 ("the Act") and the Regulations made under the Act. These include obligations to:

- ensure persons associated with you comply with this licence, as set out in section 64 of the Act;
- control the pollution of waters and the pollution of air (see for example sections 120 - 132 of the Act); and
- report incidents causing or threatening material environmental harm to the environment, as set out in Part 5.7 of the Act.

Variation of licence conditions

The licence holder can apply to vary the conditions of this licence. An application form for this purpose is available from the EPA.

The EPA may also vary the conditions of the licence at any time by written notice without an application being made.

Where a licence has been granted in relation to development which was assessed under the Environmental Planning and Assessment Act 1979 in accordance with the procedures applying to integrated development, the EPA may not impose conditions which are inconsistent with the development consent conditions until the licence is first reviewed under Part 3.6 of the Act.

Duration of licence

This licence will remain in force until the licence is surrendered by the licence holder or until it is suspended or revoked by the EPA or the Minister. A licence may only be surrendered with the written approval of the EPA.

Licence review

The Act requires that the EPA review your licence at least every 5 years after the issue of the licence, as set out in Part 3.6 and Schedule 5 of the Act. You will receive advance notice of the licence review.

Fees and annual return to be sent to the EPA

For each licence fee period you must pay:

- an administrative fee; and
- a load-based fee (if applicable).

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The EPA publication “A Guide to Licensing” contains information about how to calculate your licence fees. The licence requires that an Annual Return, comprising a Statement of Compliance and a summary of any monitoring required by the licence (including the recording of complaints), be submitted to the EPA. The Annual Return must be submitted within 60 days after the end of each reporting period. See condition R1 regarding the Annual Return reporting requirements.

Usually the licence fee period is the same as the reporting period.

Transfer of licence

The licence holder can apply to transfer the licence to another person. An application form for this purpose is available from the EPA.

Public register and access to monitoring data

Part 9.5 of the Act requires the EPA to keep a public register of details and decisions of the EPA in relation to, for example:

- licence applications;
- licence conditions and variations;
- statements of compliance;
- load based licensing information; and
- load reduction agreements.

Under s320 of the Act application can be made to the EPA for access to monitoring data which has been submitted to the EPA by licensees.

This licence is issued to:

NEWCASTLE COAL INFRASTRUCTURE GROUP PTY LTD

LOCKED BAG 6003

HUNTER REGION MAIL CENTRE NSW 2310

subject to the conditions which follow.

Environment Protection Licence

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1 Administrative Conditions

A1 What the licence authorises and regulates

- A1.1 This licence authorises the carrying out of the scheduled activities listed below at the premises specified in A2. The activities are listed according to their scheduled activity classification, fee-based activity classification and the scale of the operation.

Unless otherwise further restricted by a condition of this licence, the scale at which the activity is carried out must not exceed the maximum scale specified in this condition.

Scheduled Activity	Fee Based Activity	Scale
Cement or Lime works	Cement or lime handling	> 30000 - 100000 T handled
Coal Works	Coal works	> 5000000 T handled
Railway Systems Activities	Railway systems activities	annual capacity
Shipping in Bulk	Shipping in bulk	> 500000 T loaded and unloaded

A2 Premises or plant to which this licence applies

- A2.1 The licence applies to the following premises:

Premises Details
NEWCASTLE COAL INFRASTRUCTURE GROUP
CORMORANT ROAD
KOORAGANG
NSW 2304
LOT 1 DP 1119752, LOT 2 DP 1119752, LOT 3 DP 1119752, LOT 6 DP 1119752, LOT 7 DP 1119752

A3 Information supplied to the EPA

- A3.1 Works and activities must be carried out in accordance with the proposal contained in the licence application, except as expressly provided by a condition of this licence.

In this condition the reference to "the licence application" includes a reference to:

- the applications for any licences (including former pollution control approvals) which this licence replaces under the Protection of the Environment Operations (Savings and Transitional) Regulation 1998; and
- the licence information form provided by the licensee to the EPA to assist the EPA in connection with the issuing of this licence.

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2 Discharges to Air and Water and Applications to Land

P1 Location of monitoring/discharge points and areas

P1.1 The following points referred to in the table below are identified in this licence for the purposes of monitoring and/or the setting of limits for the emission of pollutants to the air from the point.

<i>Air</i>			
EPA identification no.	Type of Monitoring Point	Type of Discharge Point	Location Description
7	Ambient Air Quality		DG3 located on Western boundary of Kooragang Island as shown on Fig 5 of the NCIG Coal Export Terminal - Operation Dust Management Plan dated March 2010, Version 1.
8	Ambient Air Quality		DG4 located in Mayfield as shown on Fig 5 of the NCIG Coal Export Terminal - Operation Dust Management Plan dated March 2010, Version 1.
9	Ambient Air Quality		DG5 located in Mayfield West as shown on Fig 5 of the NCIG Coal Export Terminal - Operation Dust Management Plan dated March 2010, Version 1.
10	Ambient Air Quality		DG6 located at Steel River as shown on Fig 5 of the NCIG Coal Export Terminal - Operation Dust Management Plan dated March 2010, Version 1.
14	Ambient Air Quality		HVAS 1 located in Mayfield West as shown on Fig 5 of the NCIG Coal Export Terminal - Operation Dust Management Plan dated March 2010, Version 1.
15	Ambient Air Quality		HVAS 2 Located in Mayfield as shown on Fig 5 of the NCIG Coal Export Terminal - Operation Dust Management Plan dated March 2010, Version 1.
19	Ambient air quality - meteorological monitoring station		Within premises boundary

P1.2 The following points referred to in the table are identified in this licence for the purposes of the monitoring and/or the setting of limits for discharges of pollutants to water from the point.

P1.3 The following utilisation areas referred to in the table below are identified in this licence for the purposes of the monitoring and/or the setting of limits for any application of solids or liquids to the utilisation area.

Water and land

EPA Identification no.	Type of Monitoring Point	Type of Discharge Point	Location Description
1	Groundwater Monitoring		GW1, on Kooragang Island, shown on Fig 4 (NCIG-07-02 Task 1 CEMP-004F) of the Construction Environmental Management Plan June 2007

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20	Groundwater quality monitoring	Bore K9/3N located to the east of the rail loop adjacent to Pacific National haul road.
21	Groundwater quality monitoring	Bore K9/3S located to the east of the rail loop adjacent to Pacific National haul road.
22	Groundwater quality monitoring	Bore K11/1 located to the south of the rail loop between Cormorant Road and the Hunter River
23	Groundwater quality monitoring	Bore K11/1S located to the south of the rail loop between Cormorant Road and the Hunter River
24	Groundwater monitoring	Bore K11/3E located down gradient of southern boundary, west of bore K11/1.
25	Groundwater quality monitoring	Bore K11/3W located down gradient of southern boundary, west of bore K11/1.
26	Groundwater quality monitoring	Bore K11/2W located down gradient of southern boundary, west of bore K11/1.
27	Groundwater quality monitoring	Bore K11/2E located down gradient of southern boundary, west of bore K11/1.
28	Groundwater quality monitoring	Bore K9/4W located up gradient of northern boundary, west of GW1.
29	Groundwater quality monitoring	Bore K9/4E located up gradient of northern boundary, west of GW1.
30	Groundwater quality monitoring	Bore K9/2W located up gradient of northern boundary, east of GW1.
31	Groundwater quality monitoring	Bore K9/2E located up gradient of northern boundary, east of GW1.
32	Groundwater quality monitoring	Bore K10/4W located on eastern site boundary.
33	Groundwater quality monitoring	Bore DM10 located on eastern site boundary.

3 Limit Conditions

L1 Pollution of waters

L1.1 Except as may be expressly provided in any other condition of this licence, the licensee must comply with section 120 of the Protection of the Environment Operations Act 1997.

L2 Waste

L2.1 The licensee must not cause, permit or allow any waste generated outside the premises to be received at the premises for storage, treatment, processing, reprocessing or disposal or any waste generated at the premises to be disposed of at the premises, except as expressly permitted by the licence.

L3 Noise limits

Note: 'safety or emergency reasons' refers to emergency works which may need to undertaken to avoid loss of life, property loss and / or to prevent environmental harm.

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- L3.1 All site preparation, filling/preloading and construction works that may generate an audible noise at any residential receptor shall only be undertaken between 7.00 am and 6.00 pm.

This condition does not apply in the event of a direction from police or other emergency authority for safety or emergency reasons.

- L3.2 Notwithstanding any other condition of this licence, piling works shall not be conducted on Sundays or public holidays.

- L3.3 The licensee shall design, construct, operate and maintain the premises to ensure that the noise contributions from the premises do not exceed the maximum allowable noise contributions specified in the Table below, at those locations and during those periods indicated. The maximum allowable noise contributions apply under:

- a) wind speeds up to 3m/s (measured at 10 metres above ground level), or
- b) temperature inversion conditions up to 3°C per 100 metres and wind speeds up to 2m/s (measured at 10 metres above ground level).

NOTE: For the purposes of the Table , 'Night' is defined as being 10:00pm to 7:00am Monday to Saturday and 10:00pm-7:00am on Sundays and Public Holidays.

For the purpose of assessment of noise contributions specified in this licence, noise from the project shall be:

- a) measured at the most affected point on or within the site boundary at the most sensitive locations to determine compliance with LAeq(15 minute) noise limits.
- b) measured at one metre from the dwelling façade to determine compliance with LA1(1minute) noise limits.
- c) subject to the modification factors provided in Section 4 of the *New South Wales Industrial Noise Policy* (EPA 2000) where applicable.

Notwithstanding, should direct measurement of noise from the development be impractical, the licensee may employ an alternative noise assessment method deemed acceptable by the EPA (refer to Section 11 of the *New South Wales Industrial Noise Policy* (EPA 2000)). Details of such an alternative noise assessment method must be accepted by the EPA prior to the implementation of the assessment method.

Location	Day, Evening, Night at all times LAeq (15 minute)	Night - LAeq(night)	Night - LA1(1 minute)
Fern Bay West	41	37	57
Fern Bay East	39	36	55
Stockton West	41	37	57
Stockton East	38	35	56
Mayfield West	45	40	55
Mayfield	44	39	62
Carrington	36	33	52

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L4 Potentially offensive odour

Note: Section 129 of the Protection of the Environment Operations Act 1997, provides that the licensee must not cause or permit the emission of any offensive odour from the premises but provides a defence if the emission is identified in the relevant environment protection licence as a potentially offensive odour and the odour was emitted in accordance with the conditions of a licence directed at minimising odour.

L4.1 No condition of this licence identifies a potentially offensive odour for the purposes of section 129 of the Protection of the Environment Operations Act 1997.

4 Operating Conditions

O1 Activities must be carried out in a competent manner

O1.1 Licensed activities must be carried out in a competent manner.

This includes:

- a) the processing, handling, movement and storage of materials and substances used to carry out the activity; and
- b) the treatment, storage, processing, reprocessing, transport and disposal of waste generated by the activity.

O2 Maintenance of plant and equipment

O2.1 All plant and equipment installed at the premises or used in connection with the licensed activity:

- a) must be maintained in a proper and efficient condition; and
- b) must be operated in a proper and efficient manner.

5 Monitoring and Recording Conditions

M1 Monitoring records

M1.1 The results of any monitoring required to be conducted by this licence or a load calculation protocol must be recorded and retained as set out in this condition.

M1.2 All records required to be kept by this licence must be:

- a) in a legible form, or in a form that can readily be reduced to a legible form;
- b) kept for at least 4 years after the monitoring or event to which they relate took place; and
- c) produced in a legible form to any authorised officer of the EPA who asks to see them.

M1.3 The following records must be kept in respect of any samples required to be collected for the purposes of this licence:

- a) the date(s) on which the sample was taken;
- b) the time(s) at which the sample was collected;
- c) the point at which the sample was taken; and
- d) the name of the person who collected the sample.

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M2 Requirement to monitor concentration of pollutants discharged

M2.1 For each monitoring/discharge point or utilisation area specified below (by a point number), the licensee must monitor (by sampling and obtaining results by analysis) the concentration of each pollutant specified in Column 1. The licensee must use the sampling method, units of measure, and sample at the frequency, specified opposite in the other columns:

M2.2 Air Monitoring Requirements

POINT 7,8,9,10

Pollutant	Units of measure	Frequency	Sampling Method
Particulates - Deposited Matter	grams per square metre per month	Monthly	AM-19

POINT 14,15

Pollutant	Units of measure	Frequency	Sampling Method
PM10	micrograms per cubic metre	Weekly	AM-18
Total suspended particles	micrograms per cubic metre	Weekly	AM-15

M2.3 Water and/ or Land Monitoring Requirements

POINT 1

Pollutant	Units of measure	Frequency	Sampling Method
Aluminium	milligrams per litre	Every 6 months	Grab sample
Ammonia	micrograms per litre	Every 6 months	Grab sample
Benzene	micrograms per litre	Every 6 months	Grab sample
Cobalt	micrograms per litre	Every 6 months	Grab sample
Conductivity	microsiemens per centimetre	Every 6 months	Grab sample
Copper	milligrams per litre	Every 6 months	Grab sample
Cyanide (free)	micrograms per litre	Every 6 months	Grab sample
Cyanide (total)	micrograms per litre	Every 6 months	Grab sample
Ethyl benzene	micrograms per litre	Every 6 months	Grab sample
Iron	milligrams per litre	Every 6 months	Grab sample
m+p-Xylene	micrograms per litre	Every 6 months	Grab sample
Magnesium	milligrams per litre	Every 6 months	Grab sample
Manganese	milligrams per litre	Every 6 months	Grab sample
Nickel	milligrams per litre	Every 6 months	Grab sample
o-Xylene	micrograms per litre	Special Frequency 1	Grab sample
pH	pH	Every 6 months	Grab sample
Phenol	micrograms per litre	Every 6 months	Grab sample
Potassium	milligrams per kilogram	Every 6 months	Grab sample
Sodium	milligrams per litre	Every 6 months	Grab sample

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Toluene	micrograms per litre	Every 6 months	Grab sample
Total PAHs	micrograms per litre	Every 6 months	Grab sample
Total Petroleum Hydrocarbons C10-C14 Fraction	micrograms per litre	Every 6 months	Grab sample
Total Petroleum Hydrocarbons C15-C28 Fraction	micrograms per litre	Every 6 months	Grab sample
Total Petroleum Hydrocarbons C29-C36 Fraction	micrograms per litre	Every 6 months	Grab sample
Total Petroleum Hydrocarbons C6-C9 Fraction	micrograms per litre	Every 6 months	Grab sample
Zinc	milligrams per litre	Every 6 months	Grab sample

POINT 20,21,22,23

Pollutant	Units of measure	Frequency	Sampling Method
Ammonia	micrograms per litre	Every 6 months	Grab sample
Benzene	micrograms per litre	Every 6 months	Grab sample
Conductivity	microsiemens per centimetre	Every 6 months	Grab sample
Cyanide (free)	micrograms per litre	Every 6 months	Grab sample
Cyanide (total)	micrograms per litre	Every 6 months	Grab sample
Ethyl benzene	micrograms per litre	Every 6 months	Grab sample
m+p-Xylene	micrograms per litre	Every 6 months	Grab sample
o-Xylene	micrograms per litre	Special Frequency 1	Grab sample
pH	pH	Every 6 months	Grab sample
Phenol	micrograms per litre	Every 6 months	Grab sample
Toluene	micrograms per litre	Every 6 months	Grab sample
Total PAHs	micrograms per litre	Every 6 months	Grab sample
Total Petroleum Hydrocarbons C10-C14 Fraction	micrograms per litre	Every 6 months	Grab sample
Total Petroleum Hydrocarbons C15-C28 Fraction	micrograms per litre	Every 6 months	Grab sample
Total Petroleum Hydrocarbons C29-C36 Fraction	micrograms per litre	Every 6 months	Grab sample
Total Petroleum Hydrocarbons C6-C9 Fraction	micrograms per litre	Every 6 months	Grab sample

POINT 24,25,26,27,28,29,30,31,32,33

Pollutant	Units of measure	Frequency	Sampling Method
Aluminium	micrograms per litre	Special Frequency 1	Grab sample
Ammonia	micrograms per litre	Special Frequency 1	Grab sample
Benzene	micrograms per litre	Special Frequency 1	Grab sample
Cobalt	micrograms per litre	Special Frequency 1	Grab sample
Conductivity	microsiemens per centimetre	Special Frequency 1	Grab sample
Copper	micrograms per litre	Special Frequency 1	Grab sample
Cyanide (free)	micrograms per litre	Special Frequency 1	Grab sample
Cyanide (total)	micrograms per litre	Special Frequency 1	Grab sample

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Ethyl benzene	micrograms per litre	Special Frequency 1	Grab sample
Iron	micrograms per litre	Special Frequency 1	Grab sample
m+p-Xylene	micrograms per litre	Special Frequency 1	Grab sample
Manganese	micrograms per litre	Special Frequency 1	Grab sample
Nickel	micrograms per litre	Special Frequency 1	Grab sample
o-Xylene	micrograms per litre	Special Frequency 1	Grab sample
pH	micrograms per litre	Special Frequency 1	Grab sample
Phenol	micrograms per litre	Special Frequency 1	Grab sample
Polycyclic aromatic hydrocarbons	micrograms per litre	Special Frequency 1	Grab sample
Potassium	micrograms per litre	Special Frequency 1	Grab sample
Sodium	micrograms per litre	Special Frequency 1	Grab sample
Toluene	micrograms per litre	Special Frequency 1	Grab sample
Total Petroleum Hydrocarbons C10-C14 Fraction	micrograms per litre	Special Frequency 1	Grab sample
Total Petroleum Hydrocarbons C15-C28 Fraction	micrograms per litre	Special Frequency 1	Grab sample
Total Petroleum Hydrocarbons C29-C36 Fraction	micrograms per litre	Special Frequency 1	Grab sample
Total Petroleum Hydrocarbons C6-C9 Fraction	micrograms per litre	Special Frequency 1	Grab sample
Zinc	micrograms per litre	Special Frequency 1	Grab sample

Note: Special Frequency 1 is defined as sample on a quarterly basis if trigger values specified in condition E1.1 of this licence are exceeded at one or more of monitoring points 20-23 inclusive.

M3 Testing methods - concentration limits

M3.1 Monitoring for the concentration of a pollutant emitted to the air required to be conducted by this licence must be done in accordance with:

- a) any methodology which is required by or under the Act to be used for the testing of the concentration of the pollutant; or
- b) if no such requirement is imposed by or under the Act, any methodology which a condition of this licence requires to be used for that testing; or
- c) if no such requirement is imposed by or under the Act or by a condition of this licence, any methodology approved in writing by the EPA for the purposes of that testing prior to the testing taking place.

M3.2 Subject to any express provision to the contrary in this licence, monitoring for the concentration of a pollutant discharged to waters or applied to a utilisation area must be done in accordance with the Approved Methods Publication unless another method has been approved by the EPA in writing before any tests are conducted.

Note: The *Protection of the Environment Operations (Clean Air) Regulation 2010* requires testing for certain purposes to be conducted in accordance with test methods contained in the publication "Approved Methods for the Sampling and Analysis of Air Pollutants in NSW".

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M4 Testing methods - load limit

Note: *Clause 18 (1), (1A) and (2) of the Protection of the Environment Operations (General) Regulation 2009* requires that monitoring of actual loads of assessable pollutants listed in L2.2 must be carried out in accordance with the testing method set out in the relevant load calculation protocol for the fee-based activity classification listed in condition A1.1.

M5 Weather monitoring

M5.1 The licensee must measure and electronically log the meteorological parameters and sampling methods listed below and applying a 15-minute average period to all results, record data in units specified below.

Parameter	Unit of Measure	Sampling Method
Siting of monitoring station	not applicable	AS2922-1987
Temperature at two metres	degrees celcius	AM-4
Temperature at ten metres	degrees celcius	AM-4
Wind speed at ten metres	metres per second	AM-2 and AM-4
Wind direction at ten metres	degrees	AM-2 and AM-4
Sigma theta at ten metres	degrees	AM-2 and AM-4
Solar radiation	Wm-2	AM-4

M6 Recording of pollution complaints

M6.1 The licensee must keep a legible record of all complaints made to the licensee or any employee or agent of the licensee in relation to pollution arising from any activity to which this licence applies.

M6.2 The record must include details of the following:

- the date and time of the complaint;
- the method by which the complaint was made;
- any personal details of the complainant which were provided by the complainant or, if no such details were provided, a note to that effect;
- the nature of the complaint;
- the action taken by the licensee in relation to the complaint, including any follow-up contact with the complainant; and
- if no action was taken by the licensee, the reasons why no action was taken.

M6.3 The record of a complaint must be kept for at least 4 years after the complaint was made.

M6.4 The record must be produced to any authorised officer of the EPA who asks to see them.

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M7 Telephone complaints line

- M7.1 The licensee must operate during its operating hours a telephone complaints line for the purpose of receiving any complaints from members of the public in relation to activities conducted at the premises or by the vehicle or mobile plant, unless otherwise specified in the licence.
- M7.2 The licensee must notify the public of the complaints line telephone number and the fact that it is a complaints line so that the impacted community knows how to make a complaint.
- M7.3 The preceding two conditions do not apply until 21 days after:
 - a) the date of the issue of this licence or
 - b) if this licence is a replacement licence within the meaning of the Protection of the Environment Operations (Savings and Transitional) Regulation 1998, the date on which a copy of the licence was served on the licensee under clause 10 of that regulation.

6 Reporting Conditions

R1 Annual return documents

- R1.1 The licensee must complete and supply to the EPA an Annual Return in the approved form comprising:
 - a) a Statement of Compliance; and
 - b) a Monitoring and Complaints Summary.At the end of each reporting period, the EPA will provide to the licensee a copy of the form that must be completed and returned to the EPA.
- R1.2 An Annual Return must be prepared in respect of each reporting period, except as provided below.
- R1.3 Where this licence is transferred from the licensee to a new licensee:
 - a) the transferring licensee must prepare an Annual Return for the period commencing on the first day of the reporting period and ending on the date the application for the transfer of the licence to the new licensee is granted; and
 - b) the new licensee must prepare an Annual Return for the period commencing on the date the application for the transfer of the licence is granted and ending on the last day of the reporting period.
- R1.4 Where this licence is surrendered by the licensee or revoked by the EPA or Minister, the licensee must prepare an Annual Return in respect of the period commencing on the first day of the reporting period and ending on:
 - a) in relation to the surrender of a licence - the date when notice in writing of approval of the surrender is given; or
 - b) in relation to the revocation of the licence - the date from which notice revoking the licence operates.
- R1.5 The Annual Return for the reporting period must be supplied to the EPA by registered post not later than 60 days after the end of each reporting period or in the case of a transferring licence not later than 60 days after the date the transfer was granted (the 'due date').
- R1.6 The licensee must retain a copy of the Annual Return supplied to the EPA for a period of at least

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4 years after the Annual Return was due to be supplied to the EPA.

R1.7 Within the Annual Return, the Statement of Compliance must be certified and the Monitoring and Complaints Summary must be signed by:

- a) the licence holder; or
- b) by a person approved in writing by the EPA to sign on behalf of the licence holder.

R1.8 A person who has been given written approval to certify a certificate of compliance under a licence issued under the Pollution Control Act 1970 is taken to be approved for the purpose of this condition until the date of first review of this licence.

Note: The term "reporting period" is defined in the dictionary at the end of this licence. Do not complete the Annual Return until after the end of the reporting period.

Note: An application to transfer a licence must be made in the approved form for this purpose.

R2 Notification of environmental harm

R2.1 Notifications must be made by telephoning the Environment Line service on 131 555.

R2.2 The licensee must provide written details of the notification to the EPA within 7 days of the date on which the incident occurred.

Note: The licensee or its employees must notify the EPA of incidents causing or threatening material harm to the environment as soon as practicable after the person becomes aware of the incident in accordance with the requirements of Part 5.7 of the Act.

R3 Written report

R3.1 Where an authorised officer of the EPA suspects on reasonable grounds that:

- a) where this licence applies to premises, an event has occurred at the premises; or
- b) where this licence applies to vehicles or mobile plant, an event has occurred in connection with the carrying out of the activities authorised by this licence, and the event has caused, is causing or is likely to cause material harm to the environment (whether the harm occurs on or off premises to which the licence applies), the authorised officer may request a written report of the event.

R3.2 The licensee must make all reasonable inquiries in relation to the event and supply the report to the EPA within such time as may be specified in the request.

R3.3 The request may require a report which includes any or all of the following information:

- a) the cause, time and duration of the event;
- b) the type, volume and concentration of every pollutant discharged as a result of the event;
- c) the name, address and business hours telephone number of employees or agents of the licensee, or a specified class of them, who witnessed the event;
- d) the name, address and business hours telephone number of every other person (of whom the licensee is aware) who witnessed the event, unless the licensee has been unable to obtain that information after making reasonable effort;

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- e) action taken by the licensee in relation to the event, including any follow-up contact with any complainants;
- f) details of any measure taken or proposed to be taken to prevent or mitigate against a recurrence of such an event; and
- g) any other relevant matters.

R3.4 The EPA may make a written request for further details in relation to any of the above matters if it is not satisfied with the report provided by the licensee. The licensee must provide such further details to the EPA within the time specified in the request.

7 General Conditions

G1 Copy of licence kept at the premises or plant

- G1.1 A copy of this licence must be kept at the premises to which the licence applies.
- G1.2 The licence must be produced to any authorised officer of the EPA who asks to see it.
- G1.3 The licence must be available for inspection by any employee or agent of the licensee working at the premises.

8 Special Conditions

E1 Groundwater Monitoring - Trigger Values for Further Investigation

- E1.1 In the event that groundwater quality results at monitoring Points 20, 21, 22, and 23 detect parameters at levels specified in the table below, the licensee must instigate the actions outlined in condition E1.2 of this licence.

Parameter	Monitoring Point 20	Monitoring Point 21	Monitoring Point 22	Monitoring Point 23
Total PAHs	>1.0ug/L	>1.1ug/L	>2.2ug/L	>1.5ug/L
Phenols	>400ug/L	>400ug/L	>400ug/L	>400ug/L
Cyanide (free)	>4ug/L	>4ug/L	>4ug/L	>4ug/L
Cyanide (total)	>81.1ug/L	>21.8ug/L	>16.6ug/L	>75.6ug/L
TPH (C6-C9)	>20ug/L	>20ug/L	>20ug/L	>20ug/L
TPH (C10-C14)	>50ug/L	>50ug/L	>50ug/L	>50ug/L
TPH (C15-C28)	>100ug/L	>100ug/L	>100ug/L	>100ug/L
TPH (C29-C36)	>50ug/L	>50ug/L	>50ug/L	>50ug/L
Benzene	>700ug/L	>700ug/L	>700ug/L	>700ug/L
Toluene	>180ug/L	>180ug/L	>180ug/L	>180ug/L

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Ethylbenzene	>5ug/L	>5ug/L	>5ug/L	>5ug/L
o xylene	>350ug/L	>350ug/L	>350ug/L	>350ug/L
m/p xylene	>75ug/L	>75ug/L	>75ug/L	>75ug/L

E1.2 The following actions must be taken by the licensee, if groundwater quality results at Monitoring Points 20, 21, 22 and 23 detect parameters at levels specified in condition E1.1 of this licence.

Step 1: Notify the EPA in writing within two (2) working days of initial results becoming available to the licensee, including details of the monitoring bore and concentration recorded.

Step 2: Resample the monitoring point at which the trigger level was reached to confirm the elevated level.

Step 3: Notify the EPA in writing within two (2) working days of the results collected in Step 2 becoming available to the licensee, including details of the monitoring bore and concentration recorded. The EPA must be notified regardless of whether the results are elevated or not.

Step 4: If the results collected in Step 2 confirm the elevated levels, the licensee must commence quarterly monitoring of all groundwater monitoring points as identified in condition M2.3 of this licence (being monitoring points 1 and 20-33 inclusive).

Step 5: A suitably qualified and experienced person must undertake an assessment of the cause of the elevated concentration(s), as well as trends in the groundwater contaminant concentrations.

The analysis must consider data collected at monitoring point 1, and any other relevant groundwater data, both historical and current.

The assessment report must be submitted to the EPA within seven (7) working days of the assessment being completed.

The assessment report must provide advice of, and justification for, the trend identified and any actions to be taken by the licensee in response to the elevated concentration.

Step 6: If the assessment undertaken in Step 5 identifies an increasing or upward trend in contaminant levels, the licensee must undertake a risk assessment of the risks posed by the migration of the contaminated groundwater on the Hunter River.

The risk assessment report must include groundwater fate and transport modelling.

The risk assessment report must include justification for the conclusions reached as to whether the risk identified is acceptable or unacceptable and what actions are to be taken by the licensee.

The risk assessment report must be submitted to the EPA within seven (7) working days of the assessment being completed.

Step 7: If the risk identified in Step 6 is deemed 'unacceptable', the licensee must undertake a Remedial Options Study to identify remediation options to be implemented to remediate the identified groundwater risk.

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The Remedial Options Study must be undertaken by a suitably qualified and experienced person.

The Remedial Options Study must identify and provide justification for the remedial actions to be undertaken, criteria to validate/monitor the effectiveness of the remedial works and timeframes for implementation.

The Remedial Options Study report must be submitted to the EPA within seven (7) working days of the study being completed.

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Dictionary

General Dictionary

3DGM [in relation to a concentration limit]	Means the three day geometric mean, which is calculated by multiplying the results of the analysis of three samples collected on consecutive days and then taking the cubed root of that amount. Where one or more of the samples is zero or below the detection limit for the analysis, then 1 or the detection limit respectively should be used in place of those samples
Act	Means the Protection of the Environment Operations Act 1997
activity	Means a scheduled or non-scheduled activity within the meaning of the Protection of the Environment Operations Act 1997
actual load	Has the same meaning as in the Protection of the Environment Operations (General) Regulation 2009
AM	Together with a number, means an ambient air monitoring method of that number prescribed by the <i>Approved Methods for the Sampling and Analysis of Air Pollutants in New South Wales</i> .
AMG	Australian Map Grid
anniversary date	The anniversary date is the anniversary each year of the date of issue of the licence. In the case of a licence continued in force by the Protection of the Environment Operations Act 1997, the date of issue of the licence is the first anniversary of the date of issue or last renewal of the licence following the commencement of the Act.
annual return	Is defined in R1.1
Approved Methods Publication	Has the same meaning as in the Protection of the Environment Operations (General) Regulation 2009
assessable pollutants	Has the same meaning as in the Protection of the Environment Operations (General) Regulation 2009
BOD	Means biochemical oxygen demand
CEM	Together with a number, means a continuous emission monitoring method of that number prescribed by the <i>Approved Methods for the Sampling and Analysis of Air Pollutants in New South Wales</i> .
COD	Means chemical oxygen demand
composite sample	Unless otherwise specifically approved in writing by the EPA, a sample consisting of 24 individual samples collected at hourly intervals and each having an equivalent volume.
cond.	Means conductivity
environment	Has the same meaning as in the Protection of the Environment Operations Act 1997
environment protection legislation	Has the same meaning as in the Protection of the Environment Administration Act 1991
EPA	Means Environment Protection Authority of New South Wales.
fee-based activity classification	Means the numbered short descriptions in Schedule 1 of the Protection of the Environment Operations (General) Regulation 2009.
general solid waste (non-putrescible)	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997

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flow weighted composite sample	Means a sample whose composites are sized in proportion to the flow at each composites time of collection.
general solid waste (putrescible)	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997
grab sample	Means a single sample taken at a point at a single time
hazardous waste	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997
licensee	Means the licence holder described at the front of this licence
load calculation protocol	Has the same meaning as in the Protection of the Environment Operations (General) Regulation 2009
local authority	Has the same meaning as in the Protection of the Environment Operations Act 1997
material harm	Has the same meaning as in section 147 Protection of the Environment Operations Act 1997
MBAS	Means methylene blue active substances
Minister	Means the Minister administering the Protection of the Environment Operations Act 1997
mobile plant	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997
motor vehicle	Has the same meaning as in the Protection of the Environment Operations Act 1997
O&G	Means oil and grease
percentile [in relation to a concentration limit of a sample]	Means that percentage [eg.50%] of the number of samples taken that must meet the concentration limit specified in the licence for that pollutant over a specified period of time. In this licence, the specified period of time is the Reporting Period unless otherwise stated in this licence.
plant	Includes all plant within the meaning of the Protection of the Environment Operations Act 1997 as well as motor vehicles.
pollution of waters [or water pollution]	Has the same meaning as in the Protection of the Environment Operations Act 1997
premises	Means the premises described in condition A2.1
public authority	Has the same meaning as in the Protection of the Environment Operations Act 1997
regional office	Means the relevant EPA office referred to in the Contacting the EPA document accompanying this licence
reporting period	For the purposes of this licence, the reporting period means the period of 12 months after the issue of the licence, and each subsequent period of 12 months. In the case of a licence continued in force by the Protection of the Environment Operations Act 1997, the date of issue of the licence is the first anniversary of the date of issue or last renewal of the licence following the commencement of the Act.
restricted solid waste	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997
scheduled activity	Means an activity listed in Schedule 1 of the Protection of the Environment Operations Act 1997
special waste	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997
TM	Together with a number, means a test method of that number prescribed by the <i>Approved Methods for the Sampling and Analysis of Air Pollutants in New South Wales</i> .

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TSP	Means total suspended particles
TSS	Means total suspended solids
Type 1 substance	Means the elements antimony, arsenic, cadmium, lead or mercury or any compound containing one or more of those elements
Type 2 substance	Means the elements beryllium, chromium, cobalt, manganese, nickel, selenium, tin or vanadium or any compound containing one or more of those elements
utilisation area	Means any area shown as a utilisation area on a map submitted with the application for this licence
waste	Has the same meaning as in the Protection of the Environment Operations Act 1997
waste type	Means liquid, restricted solid waste, general solid waste (putrescible), general solid waste (non-putrescible), special waste or hazardous waste

Mr Grahame Clarke

Environment Protection Authority

(By Delegation)

Date of this edition: 26-October-2007

Environment Protection Licence

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End Notes

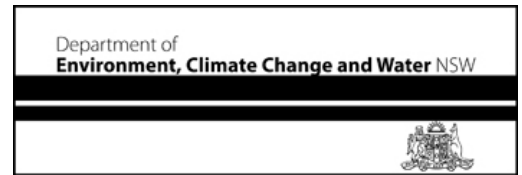
- 1 Licence varied by notice 1084101, issued on 12-May-2008, which came into effect on 12-May-2008.
- 2 Licence varied by notice 1087326, issued on 29-May-2008, which came into effect on 29-May-2008.
- 3 Licence varied by notice 1088793, issued on 20-Jun-2008, which came into effect on 20-Jun-2008.
- 4 Condition A1.3 Not applicable varied by notice issued on <issue date> which came into effect on <effective date>
- 5 Licence varied by notice 1093735, issued on 18-Nov-2008, which came into effect on 18-Nov-2008.
- 6 Licence varied by notice 1095190, issued on 21-Nov-2008, which came into effect on 21-Nov-2008.
- 7 Licence varied by correction to DECC file number data, issued on 18-Dec-2008, which came into effect on 18-Dec-2008.
- 8 Licence varied by notice 1096151, issued on 23-Dec-2008, which came into effect on 23-Dec-2008.
- 9 Licence varied by change to DECCW file number, issued on 07-Oct-2009, which came into effect on 07-Oct-2009.
- 10 Licence varied by notice 1111313, issued on 08-Apr-2010, which came into effect on 08-Apr-2010.
- 11 Licence varied by notice 1120662, issued on 13-Jan-2011, which came into effect on 13-Jan-2011.
- 12 Licence varied by notice 1127205, issued on 15-Jun-2011, which came into effect on 15-Jun-2011.
- 13 Licence varied by notice 1500779 issued on 12-Aug-2011
- 14 Licence varied by notice 1502660 issued on 16-Nov-2011
- 15 Licence varied by notice 1503211 issued on 07-Dec-2011

ATTACHMENT 5

NOTICE 1111840 FOR APPROVAL OF SURRENDER OF EPL 6437

Approval of the Surrender of a Licence

Licence - 6437



HUNTER DEVELOPMENT CORPORATION ,
ABN 94 688 782 063,
PO BOX 813,
NEWCASTLE NSW 2300

Attention: Mr. Michael Bardsley

Notice Number 1111840
File Number LIC07/20
Date 08-Dec-2010

APPROVAL OF THE SURRENDER OF LICENCE NO. 6437

BACKGROUND

A. The following licensee(s):

HUNTER DEVELOPMENT CORPORATION

94 688 782 063

applied to the Environment Protection Authority ("EPA") to surrender Environment Protection Licence No. 6437 ("the licence") issued under the *Protection of the Environment Operations Act 1997* ("the Act"). The licence authorises the carrying out of Scheduled Activity - Premises Based at KOORAGANG ISLAND, CORMORANT DRIVE, KOORAGANG, NSW.

B. The EPA received the application on 13-Jan-2010.

C. The following documents were supplied in support of the application:

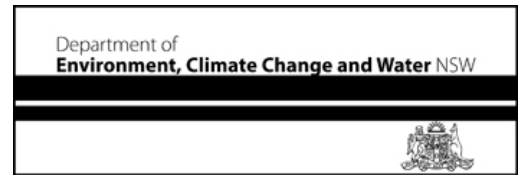
- a. Hunter Development Corporation – Report on KIWEF – Revised Final Landform and Capping Strategy – August 2009 – Revision 2, prepared by GHD;
- b. Hunter Development Corporation – Revised Capping Strategy – Flora and Fauna Impact Assessment – January 2010 – Revision 3, prepared by GHD; and
- c. Hunter Development Corporation – KI Groundwater and Surface Water Monitoring – Trend Analysis Report – January 2010 – Revision 1, prepared by GHD.

APPROVAL OF THE SURRENDER OF A LICENCE

1. The surrender of the licence is approved.

Approval of the Surrender of a Licence

Licence - 6437



PART A GENERAL CONDITIONS

2. The approval of the surrender is subject to the following conditions:
 - a) The licensee must provide the EPA with an Annual Return in relation to compliance with the conditions of the licence during the period beginning on the last licence anniversary date and ending on the date that the surrender of the licence takes effect as set out in point 5 below.
 - b) The Annual Return must be supplied to the EPA within 60 days of the date from which this notice operates (see note at the end of this notice).
 - c) The content and form of the Annual Return must be in accordance with the applicable reporting conditions in the licence before it was surrendered.
 - d) The Annual Return must be signed in accordance with the applicable reporting conditions in the licence before it was surrendered.

3. This surrender notice applies to the following land on Kooragang Island as defined by Lot and DP numbers:

Part Lot 7, Lot 10, Lot 11 and Part Lot 14 of DP1119752,

and shown on map titled '*Plan of Subdivision of Lot 122 DP874949, Lot 2 DP581473, Lot 6 DP1015754 and Lots 71 and 74 in DP1119950*' date of survey 2 November 2007, Surveyors Reference HW43.01.03.00 and registered on 29 November 2007, attached to this notice.

Note: Part Lot 14 DP1119752 refers to that area identified as Lot 14 DP 1119752 excluding land labelled as '*Extra Land Area 2*', '*Extra Land Area 4*' and '*Extra Land Area 5*' shown on map titled '*Plan of Extra Land Showing Coordinates Kooragang*' dated 08/06/10, attached to this notice.

PART B SITE SPECIFIC CONDITIONS

4. Final Capping
 - a) The licensee shall implement the final landform and capping strategy as detailed in the document titled *Hunter Development Corporation – Report on KIWEF – Revised Final Landform and Capping Strategy – August 2009 – Revision 2, prepared by GHD*, ('the Landform and Capping Strategy') by **28 March 2013**.
 - b) Three months prior to the commencement of final capping of Pond 5 (defined in Figure 4 - Areas of Contamination Hotspots – 20 May 2009, provided in the Landform and Capping Strategy) the licensee shall provide a report to the EPA, that confirms the geotechnical stability of the geosynthetic liner to withstand the additional weight of a coal washery reject capping layer as described in the Landform and Capping Strategy.
 - c) The licensee shall update the Materials Management Plan provided in the Landform and Capping Strategy and provide the updated Materials Management Plan for approval to the EPA by **30 November 2011**. The updated Materials Management Plan must provide and commit to specific engineered and/or management measures to be adopted for contingency purposes if/when unknown contaminated material is encountered during the cut and fill component of the Landform and Capping Strategy.
 - d) The licensee shall implement, maintain and operate erosion and sedimentation controls during the final capping process to ensure that there is no sedimentation of waterways.
 - e) All activities associated with the closure, capping, rehabilitation and post-closure maintenance and monitoring at the premises must be carried out in a competent manner. This includes:
 - i) The processing, handling, movement and storage of materials and substances used at the premises; and

Approval of the Surrender of a Licence

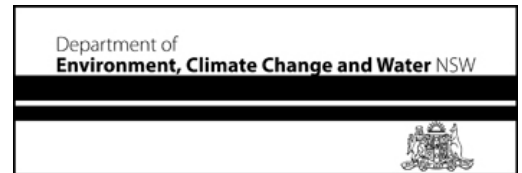


Licence - 6437

- ii) The treatment, storage, processing, reprocessing, transport and disposal of any waste generated by the activity.
 - f) All plant and equipment installed at the premises or used in connection with the closure, capping, rehabilitation and post-closure maintenance and monitoring activities at the premises must be:
 - i) maintained in a proper and efficient condition; and
 - ii) operated in a proper and efficient manner.
 - g) All activities associated with the closure, capping, rehabilitation and post-closure maintenance and monitoring at the premises must be carried out in a manner that will minimise the emission of dust from the premises.
 - h) Within three months of completion of the installation of the final cap, the licensee must provide the EPA with a written Validation Report that includes:
 - i) Advice that the final cap has been installed;
 - ii) Advice from a suitably qualified and experienced person as to whether or not the cap was installed in accordance with Chapter 7 of the Landform and Capping Strategy and relevant conditions of this Notice, or future variations to this Notice;
 - iii) Provision of the results of all relevant test results to validate that the permeability of the final capping layer is less than or equal to $K = 1 \times 10^{-7} \text{m/s}$. Permeability testing must be taken of the sealing layer material at a rate of not less than 1 per 2000T (or 1250m³);
 - iv) Provision of information that establishes the thickness of the installed sealing and revegetation layers in the format of either:
 - (i) As constructed drawings, including cross sections, of the surfaces of the coal washery reject layer; and
 - (ii) The results of surveys undertaken for each capping layer by a registered surveyor.
 - i) The Validation Report must be prepared by a suitably qualified person who had suitable involvement in overseeing the cap's installation.
 - j) At the completion of the final cap, the licensee shall undertake inspections of the cap, on a six (6) monthly basis, to detect and remediate areas where the cap has eroded, degraded or slumped.
 - k) The licensee shall provide the EPA with a written statement of the results of the inspection required by condition 4(j) on an annual basis. The statement must describe the condition of the cap and any actions taken to remediate the cap as a result of the inspection. The first statement must be provided to the EPA by **30 September 2013** with subsequent reports provided 12 monthly following the provision of the first report.
5. Environmental Monitoring
- a) The licensee shall prepare and submit a K26/32 Groundwater and Green and Golden Bell Frog Monitoring Program to the EPA for approval by **13 April 2011**. The Monitoring program shall:
 - i) Document known risks associated with the contaminant hotspot located in the area known as K26/32 (defined in Figure 4 - Areas of Contamination Hotspots – 20 May 2009, provided in the Capping Strategy);
 - ii) Be designed to assess the:
 - (i) risk of contaminant mobilisation; and
 - (ii) ongoing viability of the Green and Golden Bell Frog population in the K26/32 area; and

Approval of the Surrender of a Licence

Licence - 6437



- iii) Identify triggers for Green and Golden Bell Frog management intervention and/or actions required to address contaminant mobilisation.
- b) The licensee shall prepare and submit a **Green and Golden Bell Frog Management Plan** to the EPA for approval by **13 April 2011**. The Plan shall encompass the entire premises occupied by the licensee and include, but not be limited to:
- i) Management measures to be undertaken to minimise the spread of the amphibian *Chytrid* fungus including:
 - (i) the training of project personnel in site hygiene management; and
 - (ii) site hygiene procedures for project personal, mobile plant and equipment, in accordance with the NPWS Hygiene Protocol for the Control of Disease in Frogs 2001; and
 - ii) Measures to maintain, restore and enhance Green and Golden Bell Frog habitat, including movement corridors across the site.
- c) The licensee shall undertake the groundwater monitoring program as outlined in Table 1, 2 and 3 of this notice. Monitoring locations are those groundwater bores identified in both the fill and natural aquifers as shown on the map titled '*Figure 2 - Rationalised Groundwater and Surface Water Monitoring Program*', dated 28 SEP 2010 and attached to this notice.

Table 1 – Deep Estuarine Wells being K5/5S, K5/6S, K7/2N, K9/2E, K9/3N, K9/4W, K11/1S, K11/2W, K11/3W, K12/1E, K12/3N, K12/4N, K12/7E, K12/9E and K12/10

Pollutant	Units of Measure	Frequency	Sampling Method
Ammonia	mg/L	Every 12 months	Grab sample
Phenols ¹	mg/L	Every 12 months	Grab sample
Cyanide (Total, WAD and free)	mg/L	Every 12 months	Grab sample
Chromium (hexavalent)	mg/L	Every 12 months	Grab sample
Molybdenum (dissolved) ²	mg/L	Every 12 months	Grab sample
Lead (dissolved) ³	mg/L	Every 12 months	Grab sample
Total PAHs	mg/L	Every 12 months	Grab sample
Conductivity	mg/L	Every 12 months	Grab sample
pH	pH	Every 12 months	Grab sample

¹ Not required to be analysed at wells K5/5S, K9/2E, K9/4W

² Not required to be analysed at wells K5/5S, K5/6S, K7/2N, K9/4W

³ Not required to be analysed at wells K5/5S, K5/6S, K7/2N, K9/2E, K9/4W

Approval of the Surrender of a Licence

Licence - 6437

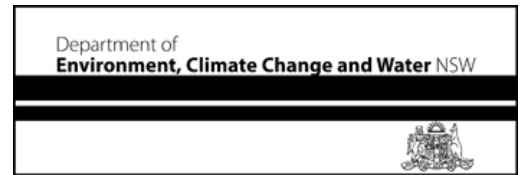


Table 2 – Shallow Estuarine Wells being K3/1W, K5/6NN, K7/2S, K7/4S, K8/5W, K9/2W, K9/3S, K9/4E, K10/2NN, K11/1, K11/2E, K11/3E, K12/1W, K12/3W, K12/6, K12/7, K12/9, K12/10E, BHe29s, GHD02, E61D, 336B, 334B

Pollutant	Units of Measure	Frequency	Sampling Method
Ammonia	mg/L	Every 12 months	Grab sample
Phenols ⁴	mg/L	Every 12 months	Grab sample
Cyanide (Total, WAD and free)	mg/L	Every 12 months	Grab sample
Chromium (hexavalent)	mg/L	Every 12 months	Grab sample
Molybdenum (dissolved) ⁵	mg/L	Every 12 months	Grab sample
Lead (dissolved) ⁶	mg/L	Every 12 months	Grab sample
Total PAHs	mg/L	Every 12 months	Grab sample
Conductivity	mg/L	Every 12 months	Grab sample
pH	pH	Every 12 months	Grab sample

Table 3 – Fill Wells being K5/4, K5/5N, K5/6N, K7/4N, K8/5E, K10/2, K10/2N, K7/1, GHD01, E61S, 336A, 344A

Pollutant	Units of Measure	Frequency	Sampling Method
Ammonia	mg/L	Every 12 months	Grab sample
Phenols ⁷	mg/L	Every 12 months	Grab sample
Cyanide (Total ⁸ , WAD and free)	mg/L	Every 12 months	Grab sample
Chromium (hexavalent)	mg/L	Every 12 months	Grab sample
Molybdenum (dissolved) ⁹	mg/L	Every 12 months	Grab sample
Lead (dissolved) ¹⁰	mg/L	Every 12 months	Grab sample
Total PAHs	mg/L	Every 12 months	Grab sample
Conductivity	mg/L	Every 12 months	Grab sample
pH	pH	Every 12 months	Grab sample

⁴ Not required to be analysed at wells K7/4S, K8/3W, K9/2W, K9/4E, K10/2NN

⁵ Not required to be analysed at wells K5/6NN, K7/2S, K9/4E

⁶ Not required to be analysed at wells K5/6NN, K7/2S, K9/4E, K7/4S, K9/2W, K9/4E

⁷ Not required to be analysed at wells K5/4, K5/5N, K7/4N, K8/5E, K10/2, K10/2N

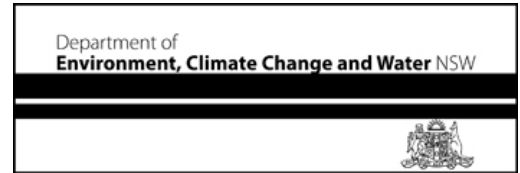
⁸ Not required to be analysed at wells K5/5N, K10/2, K10/2N

⁹ Not required to be analysed at wells K5/4, K5/5N, K5/6N

¹⁰ Not required to be analysed at wells K5/4, K5/5N, K5/6N, K7/4N

Approval of the Surrender of a Licence

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d) The licensee shall undertake the surface water monitoring program as outlined in Table 4 of this notice. Monitoring locations are those surface water monitoring locations as shown on the map titled 'Figure 2 - Rationalised Groundwater and Surface Water Monitoring Program', dated 28 SEP 2010 and attached to this notice.

Table 4– Surface Water Monitoring at Locations KS2/1, KS1/3, K10/1, KS7/1, KS12/6

Pollutant	Units of Measure	Frequency	Sampling Method
Ammonia	mg/L	Every 12 months	Grab sample
Phenols	mg/L	Every 12 months	Grab sample
Cyanide (Total, WAD and free)	mg/L	Every 12 months	Grab sample
Chromium (hexavalent)	mg/L	Every 12 months	Grab sample
Molybdenum (dissolved)	mg/L	Every 12 months	Grab sample
Lead (dissolved)	mg/L	Every 12 months	Grab sample
Total PAHs	mg/L	Every 12 months	Grab sample
Conductivity	mg/L	Every 12 months	Grab sample
pH	pH	Every 12 months	Grab sample

e) The licensee shall provide the EPA with a written report of the results of the monitoring required by condition 5(c) and 5(d) on an annual basis. The report must be in a tabular and graphical format and the first report must be provided by **30 June 2011** with subsequent reports provided 12 monthly after the provision of the first report.

6. Except as provided by section 84(2) of the Act, the approval of the surrender of the licence by this notice operates from the date of this notice.

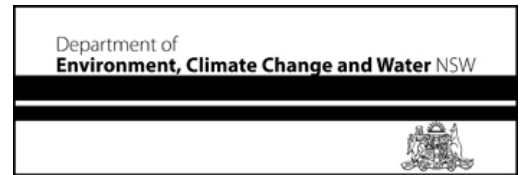
.....
Mr Grahame Clarke
Regional Manager
North East - Hunter
 (by Delegation)

INFORMATION ABOUT THIS NOTICE

- On the date that the surrender of your licence takes effect the current licence fee period comes to an end. However, the surrender of your licence does not affect your liability to pay fees owing to the EPA for that licence fee period or for any earlier licence fee period.
- If you have not already paid the administrative fee for the licence fee period which has just come to an end on the surrender of your licence you must still do so. The administrative fee for a licence fee period

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must be paid no later than 60 days after the beginning of that licence fee period (clause 36(1) of the *Protection of the Environment Operations (General) Regulation 2009*).

- Any load-based fees payable in relation to the licence fee period ending on the surrender of the licence must be paid no later than 90 days after the surrender of the licence takes effect (clause 37(1) of the *Protection of the Environment Operations (General) Regulation 2009*).
- Details provided in this notice will be available on the EPA's Public Register in accordance with section 308 of the Act.
- The reporting period on your Annual Return must be filled in to reflect the appropriate dates beginning on the last licence anniversary date and ending on the date that the surrender of the licence takes effect.
- The completed Annual Return must be sent by Registered Post no later than 60 days from the end of the reporting period to:

Regulatory and Compliance Support Unit
Department of Environment, Climate Change and Water
PO Box A290
SYDNEY SOUTH NSW 1232

- This notice is issued under section 80(1) of the Act.

Appeals against this decision

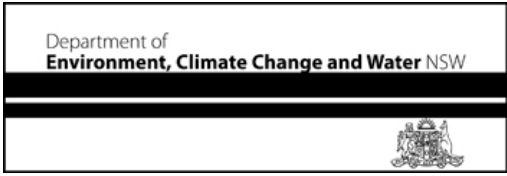
- You can appeal to the Land and Environment Court against this decision. The deadline for lodging the appeal is 21 days after you were given notice of this decision.

When this notice begins to operate

- The surrender of the licence specified in this notice begins to operate immediately from the date of this notice, unless another date is specified in this notice.
- If an appeal is made against this decision to approve the surrender of the licence and the Land and Environment Court directs that the decision is stayed the decision does not operate until the stay ceases to have effect or the Land and Environment Court confirms the decision or the appeal is withdrawn (whichever occurs first).

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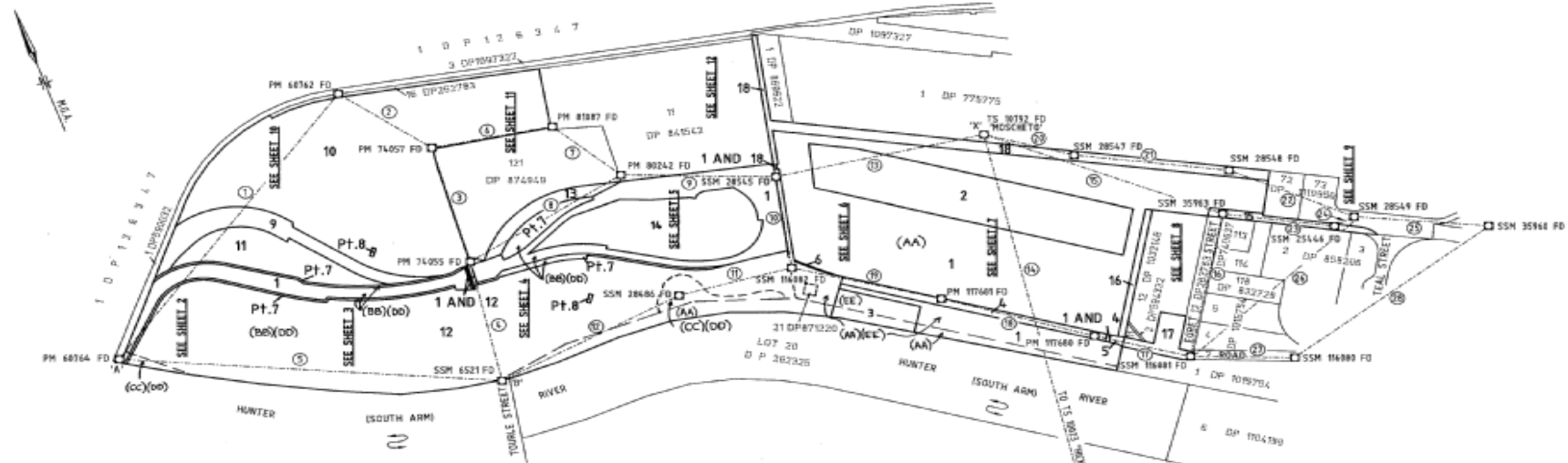
Licence - 6437



PLAN FORM 2 (A2)

WARNING: CREASING OR FOLDING WILL LEAD TO REJECTION

Sheet 1 of 12 sheets



LINE	BEARING	DISTANCE	MGA GRID	BEARING	DISTANCE
1	53° 43' 43"	544.924	53° 43' 13"	544.910	
2	143° 34' 10"	455.905	143° 34' 05"	454.991	
3	3° 07' 54"	566.855			
4	4° 39' 57"	584.4	4° 30' 09"	584.385	
5	292° 50' 05"	1541.581	292° 50' 15"	1541.607	
6	97° 10' 20"	495.740	97° 10' 22"	495.736	
7	148° 42' 45"	351.65	148° 43' 36"	351.651	
8	74° 39' 15"	736.445	74° 39' 17"	736.919	
9	164° 44' 16"	632.785	164° 44' 18"	632.821	
10	190° 33' 57"	444.901			
11	92° 48' 58"	478.56			
12	259° 19' 23"	828.354			
13	95° 28' 30"	873.88	95° 29' 21"	873.85	
14	185° 44' 53"		185° 44' 53"		
15	180° 07' 05"	184.772	180° 07' 06"	184.756	
16	21° 52' 03"	696.895			
17	302° 59' 44"	484.18			
18	304° 52' 42"	658.675	304° 53' 59"	658.655	
19	122° 29' 20"	628.545	122° 29' 18"	628.535	
20	303° 54' 58"	381.983			
21	295° 31' 10"	634.94			
22	312° 15' 30"	555.96			
23	296° 21' 25"	459.96			
24	259° 30'	92.93			
25	119° 32' 58"	550.38			
26	63° 50' 49"	744.65			
27	109° 44' 01"	425.395			
28	254° 19'	1813.16			

(A) LAND EXCLUDES MINERALS - T447400
 (B) LAND EXCLUDES MINERALS VIDE S.H. PUBLIC WORKS ACT 1912
 (C) LAND EXCLUDES MINERALS - SEE CROWN GRANT
 (D) COVENANT - R363374
 (E) BENEFITED BY EASEMENT FOR SERVICES VARIABLE WIDTH - DP667622

MARK	M.G.A. CO-ORDINATES		ZONE	CLASS	ORDER	R.L.	CLASS	ORDER	METHOD	ORIGIN
	EASTING	NORTHING								
PM 25444	384.981	6,363,217	56	U	U					
PM 60762	381,954.815	6,363,128.872	56	A	1					
PM 61764	389,188.093	6,362,213.745	56	B	2					
PM 74855	381,594.68	6,362,196.84	56	D	4	4.13	LB	L2	CLOSED LOOP LEVEL	FOUND
PM 74857	381,635.65	6,362,191.91	56	D	4					
PM 80242	382,385.36	6,362,291.81	56	D	4					
PM 81007	382,117.43	6,362,286.82	56	D	4					
PM 117681	383,883.829	6,361,035.912	56	C	U	3.91	D	4	FROM SCIMS	SCIMS
PM 117681	383,350.793	6,361,407.936	56	C	U					
SSM 4521	381,538.515	6,361,615.551	56	B	2	3.788	LB	L2	FROM SCIMS	SCIMS
SSM 28446	382,347	6,361,109	56	U	U					
SSM 28545	382,950.91	6,362,178.84	56	D	4	2.856	LB	L2	CLOSED LOOP LEVEL	FOUND
SSM 28547	384,087	6,361,882	56	U	U					
SSM 28548	384,681	6,361,681	56	U	U					
SSM 28549	385,873	6,361,234	56	U	U					
SSM 35946	385,577.111	6,361,033.698	56	B	2					
SSM 35943	384,570.051	6,361,429.439	56	A	1					
SSM 116080	384,698	6,360,656	56	U	U					
SSM 116081	384,796	6,360,821	56	U	U					
SSM 116082	382,820.149	6,361,715.439	56	C	U					
TS 10023	382,888.657	6,353,335.440	56	B	2					
TS 10712	381,749.175	6,362,074.777	56	B	2					

COMBINED SCALE FACTOR: 0.999745
 SOURCED BY SCIMS: 14th May 2007

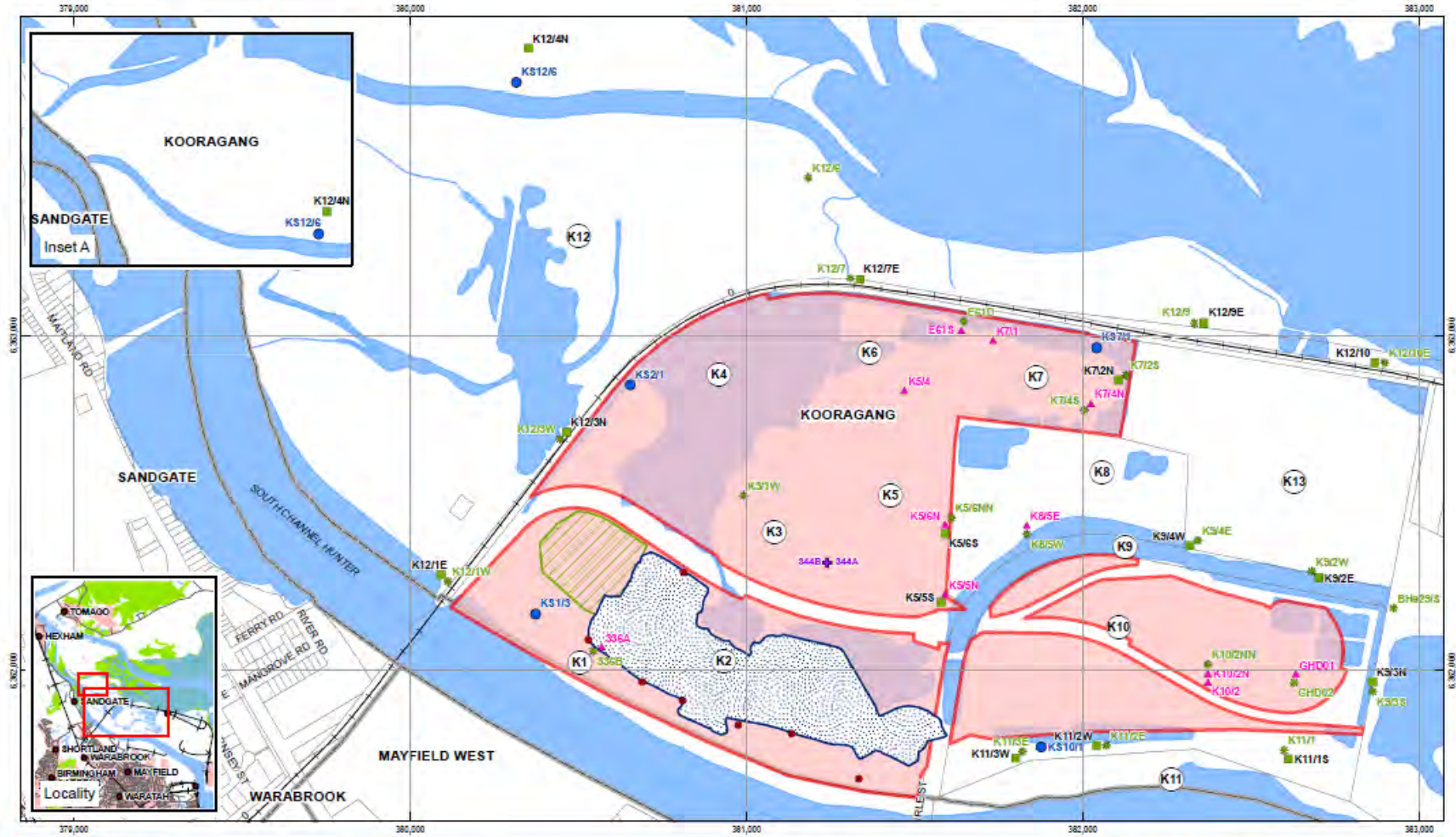
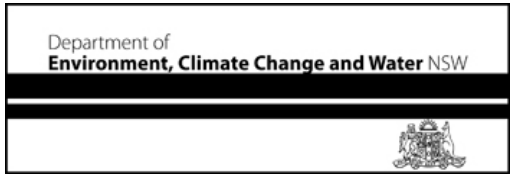
ALL R.L.'s ARE BASED ON A.H.D. DATUM

Surveyor: PAUL JOHN STRIVANO Date of Survey: 2nd NOVEMBER 2007 Surveyor's Reference: H943.81.03.08	PLAN OF SUBDIVISION OF LOT 122 DP874949, LOT 2 DP581473 LOT 6 DP1015754 AND LOTS 71 AND 74 IN DP1119950	LGA: NEWCASTLE Locality: KOORAGANG ISLAND Subdivision No: SUC002 Lengths are in metres. Reduction Ratio: 1:12500	Registered 29.11.2007	DP1119752
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Reg: R243117 / Doc: DP 1119752 P / Rev: 03-Dec-2007 / Sta: SC OK / Prt: 10-Dec-2008 16:21 / Pgs: ALL / Seq: 1 of 14
 Ref: lee-ann / Sco: T

Approval of the Surrender of a Licence

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1:15,000 (at A4)
 0 50 100 200 300 400
 Metres
 Map Projection: Transverse Mercator
 Horizontal Datum: Geocentric Datum of Australia (GDA)
 Grid: Map Grid of Australia 1994, Zone 56



LEGEND

- KIWEF Licence Area
- BHPB KIEC Staging Area
- BHPB KIEC
- Cadastre
- Watercourse
- Watercourse Area
- Not Monitored
- KIEC Monitored
- Fill Aquifer
- Shallow Estuarine Aquifer
- Deep Estuarine Aquifer
- Surface Water



Hunter Development Corporation
 Kooragang Island Ground Water
 and Surface Water Monitoring
 Job Number 22-15196
 Revision A
 Date 28 SEP 2010

Rationalised Groundwater & Surface
 Water Monitoring Program **Figure 2**

012213628/018/Map/Developed/2215196/2215196_002_Fig2_Rationalised_Program_20100928_A.mxd
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 Data Source: Geosciences Australia; Topography - 2007; Department of Lands; Cadastre - 2007; HDC; Monitoring Data - 2010. Created by: tmorton, frackay, TMorton, gndclarmid