

Licence Variation

Licence - 761



Office of
Environment
& Heritage

DELTA ELECTRICITY

Trading as DELTA ELECTRICITY

ABN 67 139 819 642

PO BOX 7285

MANNERING PARK NSW 2259

Attention: Suzanne Laucht

Notice Number	1504645
File Number	LIC06/369
Date	01-May-2012

NOTICE OF VARIATION OF LICENCE NO. 761

BACKGROUND

- A. DELTA ELECTRICITY Trading as DELTA ELECTRICITY ("the licensee") is the holder of Environment Protection Licence No. 761 ("the licence") issued under the *Protection of the Environment Operations Act 1997* ("the Act"). The licence authorises the carrying out of activities at VALES POINT ROAD, MANNERING PARK, NSW, 2259 ("the premises").
- B. On 28-Feb-2012 the EPA received an application for the variation of the licence.
- C. Reference is made to your letter dated 28 December 2011 requesting the EPA consider reinstating the Vales Point Ash Dam as a licensed discharge point. In response EPA suggested that the licensee supply coordinates for this point as well as delineating the methodology to be proposed to monitor the quality and volume of discharges as they occur.
- D. On the 2 March 2012 EPA received formal application for licence variation to request the reinstatement of the Vales Point Ash Dam as a licensed discharge point.
- E. EPA agree that the program as defined is acceptable under the circumstances. A number of variations will be made to the licence including:
 - Reinstating Vales Point Ash Dam discharge point (Point 18), including the requirement to monitor volume from any overflow event.
 - Alteration to waste table to permit the capping of the Vales Point Ash Dam with Virgin Excavated Natural Material ("VENM").
 - Conditional written authority to discharge dilute Ammonia from post combustion carbon capture facility to the Vales Point Ash Dam, including the requirement to monitor ammonia and ammonia compounds from all discharges from this ash dam.

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VARIATION OF LICENCE NO. 761

1. By this notice the EPA varies licence No. 761. The attached licence document contains all variations that are made to the licence by this notice.
2. The following variations have been made to the licence:
 - Condition P1.4 monitoring/discharge point 18 has been added to this table.
 - Condition L3.5 Water and/or Land Concentration Limits now includes Point 18 for concentrations of pH and Total suspended solids.
 - Condition L5.1 waste table has been updated with the Activity to reflect: *'As specified in each particular resource recovery exemption.'* for General or Specific exempted waste. Similarly the Activity for VENM will now read *'Capping of Ash Dam.'*
 - At Condition L5.2(c) a notation has been included to permit the discharge of spent solvent from the carbon capture process to the Ash Dam at prescribed rates and concentrations. This note will read: *'A spent solvent in the form of dilute ammonia of less than 5% concentration and at pH of not more than 9 is permitted to be discharged to the Vales Point Ash Dam. Those discharges from the post combustion carbon capture facility must only occur whilst this facility is operational. The total annual volume discharged should not exceed 5 tonnes.'*
 - Condition M2.2 now includes Point 18 which now has water monitoring requirements and includes monitoring for ammonia and ammonia compounds from discharges to waters from the Vales Point Ash Dam.
 - Condition M8.1 has now included Point 18 as a volume monitoring point.
 - Condition U1.1 and U1.2 are now removed on satisfactory completion of PRPs.

.....
Mark Hartwell
Acting Unit Head
North East - Hunter
(by Delegation)

INFORMATION ABOUT THIS NOTICE

- This notice is issued under section 58(5) of the Act.
- Details provided in this notice, along with an updated version of the licence, will be available on the EPA's Public Register (<http://www.environment.nsw.gov.au/prpoeo/index.htm>) in accordance with section 308 of the Act.

Licence Variation

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 variations to the licence specified in this notice begin 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 vary 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 Details

Number:	761
Anniversary Date:	01-July

Licensee

DELTA ELECTRICITY

PO BOX 7285

MANNERING PARK NSW 2259

Premises

VALES POINT POWER STATION AND COAL UNLOADER

VALES POINT ROAD

MANNERING PARK NSW 2259

Scheduled Activity

Chemical Storage

Coal Works

Crushing, Grinding or Separating

Electricity Generation

Sewage Treatment

Fee Based Activity

Scale

Coal works	> 2000000-5000000 T handled
Crushing, grinding or separating	> 2000000 T processed
General chemicals storage	0-5000 kL stored
Generation of electrical power from coal	> 4000 Gwh generated
Petroleum products storage	0-5000 kL stored
Sewage treatment processing by small plants	0-20 ML discharged

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

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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:

DELTA ELECTRICITY
PO BOX 7285
MANNERING PARK NSW 2259

subject to the conditions which follow.

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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
Coal Works	Coal works	> 2000000 - 5000000 T handled
Crushing, Grinding or Separating	Crushing, grinding or separating	> 2000000 T processed
Chemical Storage	General chemicals storage	0 - 5000 kL stored
Electricity Generation	Generation of electrical power from coal	> 4000 Gwh generated
Chemical Storage	Petroleum products storage	0 - 5000 kL stored
Sewage Treatment	Sewage treatment processing by small plants	0 - 20 ML discharged

A2 Premises or plant to which this licence applies

A2.1 The licence applies to the following premises:

Premises Details
VALES POINT POWER STATION AND COAL UNLOADER
VALES POINT ROAD
MANNERING PARK
NSW 2259
PROPERTY LIST PROVIDED BY LETTER DATED 24 MAY 2002 (NEF 8915)

A3 Other activities

A3.1 This licence applies to all other activities carried on at the premises, including:

Ancillary Activity
Energy recovery
Railway systems activities

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A4 Information supplied to the EPA

- A4.1 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:

- a) 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
- b) the licence information form provided by the licensee to the EPA to assist the EPA in connection with the issuing of this licence.

2 Discharges to Air and Water and Applications to Land

P1 Location of monitoring/discharge points and areas

- P1.1 Any new continuous emission monitoring systems installed on the premises for the purpose of monitoring emissions to atmosphere must comply with "Approved methods of the sampling and analysis of air pollutants in New South Wales."
- P1.2 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
10	Ambient air quality and meteorological monitoring point		Wye air quality monitoring station located at the cemetery as shown on Figure: Environmental Monitoring Stations supplied to EPA on 4 May 2011.
11	Discharge to air from stack	Discharge to air from stack	Stack serving boiler unit 5 labelled 'Point 11' on Figure: Environmental Monitoring Stations supplied to EPA on 4 May 2011.
12	Discharge to air from stack	Discharge to air from stack	Stack serving boiler unit 6, labelled 'Point 12' on Figure: Environmental Monitoring Stations supplied to EPA on 4 May 2011.
13	Ambient air quality		Dust gauge located to the south east of the premises near Tall Timbers Road, labelled 'V2' on Figure: Environmental Monitoring Stations supplied to EPA on 4 May 2011.
14	Ambient air quality		Dust gauge located on north eastern edge of ash dam, labelled V3 on Figure: Environmental Monitoring Stations supplied to EPA on 4 May 2011.
15	Ambient air quality		Dust gauge located to the south-west of the premises, labelled V4 on Figure: Environmental Monitoring Stations supplied to EPA on 4 May 2011.
16	Ambient air quality		Dust gauge located off Dorothy St, labelled V5 on Figure: Environmental Monitoring Stations supplied to EPA on 4 May 2011.

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17	Ambient air quality	Dust gauge located on Griffith Road to the north of the premises, labelled V6 on 'Fig 1 Vales Pt and Munmorah Power Stations Dust Gauges and Ambient Air Quality Monitoring Sites', supplied 24 May 2002
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P1.3 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.

P1.4 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	Discharge to waters	Discharge to waters	Cooling water outlet at Wyee Bay approximately 1000m west of premises. Labelled VPOC on figure: Environmental Monitoring Stations supplied to EPA on 4 May 2011.
2	Discharge to waters and water quality monitoring.	Discharge to waters and water quality monitoring.	Discharge from the ash water recycle system to the cooling water outlet canal. Labelled VPADB on Figure: Environmental Monitoring Stations supplied to EPA on 4 May 2011
3		Discharge to land - Effluent application area	Ash dam effluent application area located on the eastern side of the ash dam.
4	Monitoring seepage from the ash dam wall.	Monitoring seepage from the ash dam wall.	Seepage from ash dam rehabilitated area shown as VPADS on Figure: Environmental Monitoring Stations supplied to EPA on 4 May 2011.
6	Lake Macquarie water quality monitoring point		Background water quality monitoring point located in Crangan Bay, labelled LMB5 on Figure: Environmental Monitoring Stations supplied to EPA on 4 May 2011.
7	Lake Macquarie water quality monitoring point		Water quality monitoring point in Wyee Bay labelled LMB7 on Figure: Environmental Monitoring Stations supplied to EPA on 4 May 2011.
8	Lake Macquarie Water quality monitoring point		Water quality monitoring point located in Chain Valley Bay, near cooling water inlet canal, labelled LMB 15 on Figure: Environmental Monitoring Stations supplied to EPA on 4 May 2011.
18	Monitoring and sampling Ash Dam overflows		Overboarding of Ash Dam at discharge point. Location seen in attached map DOC12/9840

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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 Load limits

L2.1 The actual load of an assessable pollutant discharged from the premises during the reporting period must not exceed the load limit specified for the assessable pollutant in the table below.

Note: An assessable pollutant is a pollutant which affects the licence fee payable for the licence.

L2.2 The actual load of an assessable pollutant must be calculated in accordance with the relevant load calculation protocol.

Assessable Pollutant	Load limit (kg)
Arsenic (Air)	
Benzene (Air)	
Benzo(a)pyrene (equivalent) (Air)	
Coarse Particulates (Air)	
Fine Particulates (Air)	
Fluoride (Air)	
Lead (Air)	
Mercury (Air)	
Nitrogen Oxides (Air)	
Salt (Enclosed Water)	
Selenium (Enclosed Water)	
Sulfur Oxides (Air)	
Total suspended solids (Enclosed Water)	
Volatile organic compounds (Air)	

L2.3 # When a Load Reduction Agreement expires or is terminated the DECC will, after consultation with the licensee, apply a new load limit having regard to the agreed load in the table below or the load that may be achievable if the agreement is terminated early.

Assessable Pollutant	Agreed Load(kg)
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Coarse Particles	750,000
Fine Particles	900,000

Note: For the purposes of calculating fees payable by the licensee on termination or expiration of the Load Reduction Agreement under clause 28B of the Protection of the Environment Operations (General) Regulation, the maximum load for each assessable pollutant is taken to be the lowest reported actual load over the agreement period minus one percent.

- L2.4** If the licence is transferred during the reporting period immediately preceding the termination or expiration of the Load Reduction Agreement, a reference in condition L2.3 to the actual load reported in the Annual Return for that period is taken to be a reference to the total of the actual loads reported in the Annual Returns prepared by the transferring licensee and the new licensee.
- L2.5** Condition R1.3 requires an Annual Return to be prepared by both the transferring licensee and the new licensee.

L3 Concentration limits

- L3.1** For each monitoring/discharge point or utilisation area specified in the table below (by a point number), the concentration of a pollutant discharged at that point, or applied to that area, must not exceed the concentration limits specified for that pollutant in the table.
- L3.2** Where a pH quality limit is specified in the table, the specified percentage of samples must be within the specified ranges.
- L3.3** To avoid any doubt, this condition does not authorise the pollution of waters by any pollutant other than those specified in the table.
- L3.4** Air Concentration Limits

POINT 11,12

Pollutant	Units of measure	100 percentile concentration limit	Reference conditions	Oxygen correction	Averaging period
Hazardous substances	milligrams per cubic metre	5.0			
Total Fluoride	milligrams per cubic metre	50			
Cadmium	milligrams per cubic metre	1.0			
Sulfuric acid mist and sulfur trioxide (as SO ₃)	milligrams per cubic metre	100			
Mercury	milligrams per cubic metre	1.0			
Hydrogen chloride	milligrams per cubic metre	400			

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Nitrogen Oxides	grams per cubic metre	2.5
Total Solid Particles	milligrams per cubic metre	250
Chlorine	milligrams per cubic metre	200

L3.5 Water and/or Land Concentration Limits

POINT 1

Pollutant	Units of Measure	50%Limit	90%Limit	98.5%Limit	100 percentile concentration limit
Chlorine (free residual)	milligrams per litre				0.2
Temperature	degrees Celsius			35	37.5

POINT 2

Pollutant	Units of Measure	50%Limit	90%Limit	98.5%Limit	100 percentile concentration limit
pH	pH				6.5-9.5
Total suspended solids	milligrams per litre				50

POINT 4

Pollutant	Units of Measure	50%Limit	90%Limit	98.5%Limit	100 percentile concentration limit
Total suspended solids	milligrams per litre				50

POINT 18

Pollutant	Units of Measure	50%Limit	90%Limit	98.5%Limit	100 percentile concentration limit
pH	pH				6.5-8.5
Total suspended solids	milligrams per litre				50

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Note: Definition of Temperature Limits at Point 1

- a) The 98.5% limit specified for the pollutant 'Temperature' at Point 1 means during normal electricity supply conditions, cooling waters may be discharged over 35°C but up to a maximum temperature of 37.5°C for up to 131 hours over a reporting period.
- b) An additional 69 hours are allocated under shortfall of electricity supply conditions as per Special Condition E1.3.
- c) The 100% limit specified for the pollutant 'Temperature' at Point 1 means cooling waters may never exceed a maximum temperature of 37.5°C without the consent of AEMO as per Special Condition E2.1.

Note: Definition of Special Temperature Limits at Point 1 between January and June 2012.

- a) The 98.5% limit specified for the pollutant 'Temperature' at Point 1 means during normal electricity supply conditions, cooling waters may be discharged over 35°C but up to a maximum temperature of 37.5°C for up to 100 hours over the special reporting period from 1 January 2012 to 30 June 2012.
- b) An additional 40 hours are allocated between 1 January 2012 and 30 June 2012 under shortfall of electricity supply conditions as per Special Condition E1.3.
- c) On 1 July 2012 the Special Temperature Limit allowance expires.

L3.6 The reference basis for the air pollutants in condition L3.4 are as follows:

For Nitrogen oxides (NO₂ and/or NO), solid particles and Carbon monoxide (CO): dry, 273 K, 101.3kPa, 7% O₂.

For Sulphuric acid mist (H₂SO₄) and/or sulphur trioxide (SO₃), chlorine (Cl₂), Hydrogen chloride (HCl), Total Fluoride, Hazardous substances, Cadmium (Cd) and Mercury (Hg): dry, 273K, 101.3 kPa.

L3.7 For the purposes of NO₂ or NO or both, as NO₂ equivalent, at points 11 and 12 and in accordance with the Protection of the Environment Operations (Clean Air) Regulation 2010, the activity or plant defined by the licence at these locations is taken to belong to Group 2 until 1 January 2017 or unless otherwise approved in writing by the EPA.

L3.8 Effective 1 January 2012 the concentration of pollutants discharged at Point 11 and 12, must not exceed the concentration limit specified for that pollutant in the table below. The reference basis for the air pollutants specified in this condition are as follows: *Dry, 273K, 101.3kPa, 7% O₂*

Pollutant	Units of Measure	100% percentile concentration limit
Chlorine (Cl ₂)	Milligrams per cubic metre	200
Cadmium (Cd)	Milligrams per cubic metre	1
Mercury 9Hg)	Milligrams per cubic metre	1

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Nitrogen Dioxide (NO ₂) or Nitric oxide (NO) or both as NO ₂ equivalent	Milligrams per cubic metre	1500
Fluorine F ₂) and any compound containing fluorine, as total fluoride (HF equivalent)	Milligrams per cubic metre	50
Hydrogen Chloride (HCl)	Milligrams per cubic metre	100
Total solid particles	Milligrams per cubic metre	100
Sulphuric acid mist (H ₂ SO ₄) or sulphur trioxide (SO ₃) or both, as SO ₃ equivalent	Milligrams per cubic metre	100
Type 1 and Type 2 substances in aggregate	Milligrams per cubic metre	5

L4 Volume and mass limits

L4.1 For each discharge point or utilisation area specified below (by a point number), the volume/mass of:

a) liquids discharged to water; or;

b) solids or liquids applied to the area;

must not exceed the volume/mass limit specified for that discharge point or area.

Point	Unit of Measure	Volume/Mass Limit
1	megalitres per day	6500
2	megalitres per day	120
3	kilolitres per day	380

L5 Waste

L5.1 The licensee must not cause, permit or allow any waste to be received at the premises, except the wastes expressly referred to in the column titled "Waste" and meeting the definition, if any, in the column titled "Description" in the table below.

Any waste received at the premises must only be used for the activities referred to in relation to that waste in the column titled "Activity" in the table below.

Any waste received at the premises is subject to those limits or conditions, if any, referred to in relation to that waste contained in the column titled "Other Limits" in the table below.

This condition does not limit any other conditions in this licence.

Code	Waste	Description	Activity	Other Limits
NA	General or Specific exempted waste	Waste that meets all the conditions of a resource recovery exemption under Clause 51A of the Protection of the Environment Operations (waste) Regulation	As specified in each particular resource recovery exemption	NA

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		2005.		
NA	Virgin excavated natural material	As defined in Schedule 1 of the POEO Act, as in force from time to time	Capping of Ash Dam	NA

L5.2 The following wastes generated on the premises may be disposed of to the ash dam or within the ash dam catchment.

- a) Ash,
- b) Coal, coal fines, mill pyrites, residual detergents and oil sheens, sand, concrete products, boiler blowdown, minor chemical spill residues, chemicals for environmental control, ash dam water treatment plant residues, dust returned from the ash recovery plant, marine growth, debris, seaweed, chemical cleaning solutions, oil and chemically impacted soil, de-silting of settling basins, dredge spoil, waste wood, wood chips, dirty water drains, treatment plant discharges, coal handling plant stormwater, neutralised demineralisation effluent, polisher plant effluent, spent ion exchange resins, chlorine plant storage vessel precipitates, cable tunnel drainage, fabric filter bags, coal chitter and soil capping materials, coal mine dewatering discharges,
- c) Any other material approved in writing by the EPA.

Note: A spent solvent in the form of dilute ammonia of less than 5% concentration and at pH of not more than 9 is permitted to be discharged to the Vales Point Ash Dam. Those discharges from the post combustion carbon capture facility must only occur whilst this facility is operational. The total annual volume discharged should not exceed 5 tonnes.

L6 Potentially offensive odour

L6.1 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.

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.

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.

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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.

O3 Effluent application to land

- O3.1 Effluent application must not occur in a manner that causes surface runoff.
- O3.2 Spray from effluent application must not drift beyond the boundary of the premises.

O4 Other operating conditions

- O4.1 The sulphur content of coal used in the boilers must not exceed 0.5% by weight on a monthly average basis.
- O4.2 The sulphur content of any fuel oil used in the boilers must not exceed 0.5% by weight on a monthly average basis.
- O4.3 The anti-foaming agents DEAIRES 8042 or DEAIRES 7055 may be added to the outlet canal at a rate of not more than 1680 litres per day to control the discharge of floating foam.
- O4.4 The cooling water system may be chlorinated at a rate of not more than 1200 kilograms of chlorine per day.

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

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d) the name of the person who collected the sample.

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 Water and/ or Land Monitoring Requirements

POINT 1

Pollutant	Units of measure	Frequency	Sampling Method
Chlorine (free residual)	milligrams per litre	Monthly	Grab sample
Oil and Grease	Visible	Continuous	In line instrumentation
Temperature	degrees Celsius	Continuous	In line instrumentation

POINT 2

Pollutant	Units of measure	Frequency	Sampling Method
Cadmium	milligrams per litre	Quarterly	Grab sample
Copper	milligrams per litre	Quarterly	Grab sample
Lead	milligrams per litre	Quarterly	Grab sample
Manganese	milligrams per litre	Quarterly	Grab sample
Nitrate + nitrite (oxidised nitrogen)	milligrams per litre	Monthly	Grab sample
pH	pH	Monthly	Grab sample
Phosphorus (total)	milligrams per litre	Monthly	Grab sample
Reactive Phosphorus	milligrams per litre	Monthly	Grab sample
Selenium	milligrams per litre	Quarterly	Grab sample
Total suspended solids	milligrams per litre	Fortnightly	Grab sample
Zinc	milligrams per litre	Quarterly	Grab sample

POINT 4,2

Pollutant	Units of measure	Frequency	Sampling Method
ammonia and ammonium compounds	milligrams per litre	Quarterly	Grab sample

POINT 4

Pollutant	Units of measure	Frequency	Sampling Method
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Cadmium	milligrams per litre	Quarterly	Grab sample
Copper	milligrams per litre	Quarterly	Grab sample
Lead	milligrams per litre	Quarterly	Grab sample
Manganese	milligrams per litre	Quarterly	Grab sample
Nitrate + nitrite (oxidised nitrogen)	milligrams per litre	Monthly	Grab sample
pH	pH	Monthly	Grab sample
Phosphorus (total)	milligrams per litre	Monthly	Grab sample
Selenium	milligrams per litre	Quarterly	Grab sample
Total suspended solids	milligrams per litre	Monthly	Grab sample
Zinc	milligrams per litre	Quarterly	Grab sample

POINT 18

Pollutant	Units of measure	Frequency	Sampling Method
ammonia and ammonium compounds	milligrams per litre	Daily for any discharge >2 hrs	Grab sample
Cadmium	milligrams per litre	Daily for any discharge >2 hrs	Grab sample
Copper	milligrams per litre	Daily for any discharge >2 hrs	Grab sample
Lead	milligrams per litre	Daily for any discharge >2 hrs	Grab sample
Manganese	milligrams per litre	Daily for any discharge >2 hrs	Grab sample
Nitrate + nitrite (oxidised nitrogen)	milligrams per litre	Daily for any discharge >2 hrs	Grab sample
pH	pH	Daily for any discharge >2 hrs	Grab sample
Phosphorus (total)	milligrams per litre	Daily for any discharge >2 hrs	Grab sample
Selenium	milligrams per litre	Daily for any discharge >2 hrs	Grab sample
Total suspended solids	milligrams per litre	Daily for any discharge >2 hrs	Grab sample
Zinc	milligrams per litre	Daily for any discharge >2 hrs	Grab sample

M2.3 Air Monitoring Requirements

POINT 10

Pollutant	Units of measure	Frequency	Sampling Method
Fluorides	micrograms per cubic metre	Continuous	AM-8
Nitrogen dioxide	parts per hundred million	Continuous	AM-12
Sulphur dioxide	parts per hundred million	Continuous	AM-20

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Total suspended particles	micrograms per cubic metre	Continuous	AM-15
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POINT 11,12

Pollutant	Units of measure	Frequency	Sampling Method
Cadmium	milligrams per cubic metre	Yearly	TM-12
Chlorine	milligrams per cubic metre	Yearly	TM-7 & TM-8
Copper	milligrams per cubic metre	Yearly	TM-12, TM-13 & TM-14
Fluorides	milligrams per cubic metre	Yearly	TM-9
Hazardous substances	milligrams per cubic metre	Yearly	TM-12, TM-13 & TM-14
Hydrogen chloride	milligrams per cubic metre	Yearly	TM-7 & TM-8
Mercury	milligrams per cubic metre	Yearly	TM-12
Moisture	percent	Yearly	TM-23
Molecular weight of stack gases	grams per gram mole	Yearly	TM-23
Nitrogen Oxides	grams per cubic metre	Continuous	In line instrumentation
Sulfuric acid mist and sulfur trioxide (as SO ₃)	milligrams per cubic metre	Yearly	TM-3
Sulphur dioxide	parts per million	Continuous	In line instrumentation
Temperature	degrees Celsius	Yearly	TM-2
Total Solid Particles	milligrams per cubic metre	Yearly	TM-15
Undifferentiated Particulates	grams per cubic metre	Continuous	In line instrumentation
Velocity	metres per second	Yearly	TM-2
Volatile organic compounds	parts per million	Yearly	OM-2
Volumetric flowrate	cubic metres per second	Yearly	TM-2

POINT 13,14,15,16,17

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

M2.4 For ambient air monitoring of pollutants, the recording of results, and reporting for Annual Return purposes shall include “averaging periods” as stipulated in the National Environment Protection (Ambient Air Quality) Measure e.g. Nitrogen dioxide averaging periods of one hour and one year; and Sulfur dioxide averaging periods of one hour, one day and one year.

M2.5 The following cooling system dosing rates must be carried out using the units of measure and

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at the frequency specified below

Monitoring required	Units of Measure	Frequency
Amount of anti-foaming agent used	kg/month	Monthly
Amount of Chlorine used	kg/month	Monthly
Amount of biocides used	kg/month	Monthly
Amount of inhibitors used	kg/month	Monthly
Amount of sawdust used	kg/month	Monthly

- M2.6 Not less than two water quality surveys as specified below must be conducted in Lake Macquarie during each quarter of the reporting period. The surveys must be scheduled so that there are at least two surveys in each season. For each of the points specified below (by a point), 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 and sample at the frequency specified opposite in the other columns.

POINTS 6 , 7 and 8

Pollutant	Frequency	Sampling Method
Dissolved Oxygen	At least two(2) surveys per three (3) month period with a minimum of four (4) weeks between each survey.	Measured at 0.1 metres below the surface, 0.5 metres below the surface and thereafter at 1.0 metre intervals to the bottom.
Temperature	At least two(2) surveys per three (3) month period with a minimum of four (4) weeks between each survey.	Measured at 0.1 metres below the surface, 0.5 metres below the surface and thereafter at 1.0 metre intervals to the bottom.
Salinity	At least two(2) surveys per three (3) month period with a minimum of four (4) weeks between each survey.	Measured at 0.1 metres below the surface, 0.5 metres below the surface and thereafter at 1.0 metre intervals to the bottom.
Water clarity	At least two(2) surveys per three (3) month period with a minimum of four (4) weeks between each survey.	Using a Secchi disk.
Zoo-plankton - total count	At least two(2) surveys per three (3) month period with a minimum of four (4) weeks between each survey.	Samples must be preserved and counted annually, Samples must be preserved and retained for species identification if required by the EPA.

- M2.7 Information collected for Condition M2.6 - Ambient water quality monitoring for Points 6, 7 and 8 must be submitted to the EPA's Manager, annually on the 1 March.

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:
- any methodology which is required by or under the Act to be used for the testing of the

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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".

M4 Testing methods - load limits

Note:

Clause 18(1),(1A) and 2 of the Protection of the Environment Operations(general)Regulations 1998 requires monitoring of actual loads and 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 A1.2.

M5 Weather monitoring

M5.1 For each monitoring specified below(by a point number), the licensee must monitor (by sampling and obtaining results by analysis) each weather parameter 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.

Parameter	Units of Measure	Frequency	Averaging Period	Sampling Method
Rainfall	mm	Continuous	1 hour	AM-4
Wind Speed at 10m	m/s	Continuous	15 minutes	AM-2 & AM-4
Wind Direction at 10m	°	Continuous	15 minutes	AM-2 & AM-4
Temperature at 5m	°C	Continuous	15 minutes	AM-4
Humidity	%	Continuous	15 minutes	AM-4
Net Radiation	W/m ²	Continuous	15 minutes	AM-4
Additional requirements				
- sitting				AM-1 & AM-4
- measurement				AM-1 & AM-4

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

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 3 months 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.

M8 Requirement to monitor volume or mass

- M8.1 For each discharge point or utilisation area specified below, the licensee must monitor:
- a) the volume of liquids discharged to water or applied to the area;
 - b) the mass of solids applied to the area;
 - c) the mass of pollutants emitted to the air;
- at the frequency and using the method and units of measure, specified below.

POINT 1

Frequency	Unit of Measure	Sampling Method
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Daily	megalitres per day	By Calculation (volume flow rate or pump capacity multiplied by operating time)
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POINT 2

Frequency	Unit of Measure	Sampling Method
Continuous	megalitres per day	Flow meter and continuous logger

POINT 4

Frequency	Unit of Measure	Sampling Method
Continuous during discharge	kilolitres per day	Weir structure and level sensor

POINT 18

Frequency	Unit of Measure	Sampling Method
Daily during any discharge	kilolitres per day	By Calculation (volume flow rate or pump capacity multiplied by operating time)

M9 Other monitoring and recording conditions

- M9.1 Any new continuous emission monitoring systems installed on the premises for the purpose of monitoring emissions to atmosphere must comply with "Approved methods of the sampling and analysis of air pollutants in New South Wales."

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.

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.

- 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.

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

- 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 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.
- R1.9 Where the licensee is unable to complete a part of the Annual Return by the due date because the licensee was unable to calculate the actual load of a pollutant due to circumstances beyond the licensee's control, the licensee must notify the EPA in writing as soon as practicable, and in any event not later than the due date. The notification must specify:
- a) the assessable pollutants for which the actual load could not be calculated; and
 - b) the relevant circumstances that were beyond the control of the licensee.

R2 Notification of environmental harm

Note: The licensee or its employees must notify all relevant authorities of incidents causing or threatening material harm to the environment immediately after the person becomes aware of the incident in accordance with the requirements of Part 5.7 of the Act.

- 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.

R3 Written report

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

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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;
- 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.

R4 Other reporting conditions

R4.1 The licensee must produce an air emission exceedance report if the concentration of Sulphur dioxide at any time exceeds 600 ppm.

Within seven (7) days of the licensee becoming aware of the exceedance of the limits specified in this condition, a written report must be sent to the EPA's Regional Manager Hunter and must include the following:

- a) details of the date and time of the exceedance;
- b) the duration of the exceedance; and
- c) the reason(s) for the exceedance.

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

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working at the premises.

8 Special Conditions

E1 Discharge of cooling waters into Lake Macquaire

E1.1 DEFINITIONS

For the purpose of these Special Conditions '*pending shortfall of electricity supply*' means that the Australian Energy Market operator (AEMO), spot price for electricity in any half hour period exceeds \$300 per megawatt hour.

E1.2 In the event that Delta Electricity exceeds the 98.5 percentile temperature limit specified under licence condition L3.5 (ie 35°C) of this licence in any calendar year, the licensee must advise the EPA. The EPA must be advised every day such an exceedence occurs.

E1.3 In the further event of a pending shortfall of electricity supply to meet the demand for electricity the licensee may exceed the cooling water discharge temperature limit of 35° C at discharge point 1 for an additional 69 hours per calendar year.

E1.4 The temperature of cooling water discharged via discharge point 1 must never exceed 37.5° C.

E1.5 These Special Conditions only apply to 31 August 2016.

E1.6 The licensee must implement the Seagrass Monitoring Program as described in the document titled '*Seagrass Monitoring Programme for Vales Point Power Station*' prepared by Bio-analysis Pty Ltd, dated January 2011.

E1.7 The licensee must submit, on an annual basis, a Seagrass Monitoring Program Report that includes, but not necessarily limited to:

- a. Provision of date, analysis and conclusions of the Seagrass Monitoring Program carried out in the previous 12 months.
- b. Comparison and discussion of data collected since the commencement of the monitoring program in February 2011 and any other relevant or previous studies.
- c. The Seagrass Monitoring Program Report is to be submitted to the Regional Manager - Hunter on 31 November 2011 and then annually from the 31 August 2012 up until and including the 31 August 2016.

E1.8 Should any observed changes indicate a reduction in seagrass areas and the observed changes are likely to be attributable to the operation of the licensed premises, the licensee must submit a report that provides the following:

- a) a description of ameliorativemeasures, including a timeframe for management actions and in the case where impacts are considered unavoidable.
- b) a description of how impacts will be offset.

Submission Date: within 4 months of the provision of the Seagrass Monitoring Report referred to in condition E1.7

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E2 Discharge of Cooling Waters into Lake Macquarie

E2.1 REQUIREMENTS

Notwithstanding the requirements of Special Conditions E1.2, E1.3, E1.4 and E1.5 in the event that the AEMO, or a person authorised by AEMO, directs the licensee, under the national Electricity Rules, to maintain, increase or be available to increase power generation for system security, the licensee may exceed the maximum operating hours above 35°C and the maximum temperature specified in condition L3.1 for discharge Point 1.

When the direction is revoked by AEMO, or a person authorised by AEMO, the licensee must, as soon as practicable, run down the cooling water discharge temperature to within the limits specified in condition L3.1.

In the event that the licensee receives a direction from AEMO, and exceeds the limits specified in condition L3.1, the licensee must notify the EPA in writing, as soon as practicable, of the time and date the direction was given by AEMO and the period of time that the limits specified in condition L3.1 were exceeded.

Note: The EPA may vary the licence temperature conditions after 30 June 2016 following a review of studies undertaken on thermal discharges to Lake Macquarie.

E3 Fuels used in the power station

E3.1 The following fuels may be used in the power station for station startup and combustion support provided that they comply with the specification set out in this licence:

- a) Distillate / heating oils
- b) Distillate / heating oils blended with refined oil additives

E3.2 The licensee must sample and analyse sufficient samples of fuel received on the premise to assess whether the material complies with the specifications in this licence.

E3.3 SPECIFICATION OF FUELS

Distillate / heating oil and distillate refined oil blends burnt in the power station must comply with the specifications in Table 1.

TABLE 1

Characteristic of Fuel	Limit	Test Method
Ag	Less than 10ppm by weight	
As	less than 10ppm by weight	Pre-treatment method
Be	less than 10ppm by weight	USEPA 200.2(waters)
Cd	less than 5ppm by weight	
Cr(total)	less than 30ppm by weight	Pre-treatment method
Co	Less than 10ppm by weight	HNO ₃ H ₂ O ₂ (oils and organic matrices)

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Cu	less than 50ppm by weight	
Hg	less than 10ppm by weight	
Mn	less than 50ppm by weight	Analysis:
Mo	less than 50ppm by weight	ALPHA 20 th ed under part 3000
Ni	less than 50ppm by weight	
Pb	less than 50ppm by weight	
Sb	less than 15ppm by weight	
Se	less than 15ppm by weight	
Sn	less than 40ppm by weight	
V	less than 40ppm by weight	
Polychlorinated biphenyls	less than 2ppm by weight	USEPA 8081A
Energy	10 - 48 MJ per Kg	AS1038.5
Sulphur (total)	less than 1.10% by weight	AS1038.6.3.2
Flourine (total)	less than 0.05% by weight	AS1038.10.4D (2002)
Chlorine (total)	less than 0.50% by weight	AS1038.8.2 (1996)

E3.4

Source Emission Testing - Alternative Fuel Burning Trials

Any distillate / heating oil or distillate refined oil blend that complies with the specification in Table 2 may be burnt for the purpose of undertaking emission monitoring trials in accordance with monitoring specified in this licence.

TABLE 2.

Characteristic of Fuel	Limit	Test Method
Ag	Less than 10ppm by weight	
As	Less than 50ppm by weight	Pre-treatment method
Be	Less than 50ppm by weight	USEPA 200.2 (waters)
Cd	Less than 20ppm by weight	
Cr (total)	Less than 100ppm by weight	Pre-treatment method
Co	Less than 50ppm by weight	HNO3H2O2 (Oils and organic matrices)
Cu	Less than 100ppm by weight	
Hg	Less than 20ppm by weight	
Mn	Less than 250ppm by weight	ANALYSIS:
Mo	Less than 200ppm by weight	ALPHA 20 th ed under part 3000
Ni	Less than 250ppm by weight	
Pb	Less than 200ppm by weight	
Sb	Less than 50ppm by weight	
Se	Less than 50ppm by weight	

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Sn	Less than 100ppm by weight	
V	Less than 150ppm by weight	
Polychlorinated biphenyls	Less than 2ppm by weight	USEPA 8081A
Energy	10 - 48 MJ per Kg	AS1038.5
Sulphur (total)	Less than 1.10% by weight	AS1038.6.3.2
Flourine (total)	Less than 0.05% by weight	AS1038.10.4 D (2002)
Chlorine (total)	Less than 0.50% by weight	AS1038.8.2 (1996)

E4 Solid alternative fuel

E4.1 For the purpose of this licence, solid alternative fuel means timber products that are: -

- a) In accordance with regulation 8 (special requirements – wood wastes) of division 2.2 (eligible renewable energy sources) in part 2 of the Renewable Energy (Electricity) Regulations 2001 and Renewable Energy (Electricity) Act 2000.
- b) Biomass that is sustainably harvested as defined in, Greenhouse Gas Emissions from Electricity Supplied in NSW; Emissions Workbook, October 2000. Ministry of Energy and Utilities.

Note: No condition of this licence authorises the intentional burning of solid alternative fuel contaminated with paint, chemicals, timber preservatives and treatments or hazardous substances.

E4.2 Solid alternative fuel may only be co-fired with coal and at a rate not exceeding five (5) percent by weight of the coal feed rate.

E4.3 The concentration of Type 1 & 2 elements and substances (as defined in the Clean Air Plant and Equipment Regulation 1997) in solid alternative fuel burnt in the power station, must not exceed 350 milligrams per kilogram.

E4.4 The licensee must have a statistically valid sampling and quality control program for all solid alternative fuel co-fired with coal on the premises. The quality control program must include the determination of the solid alternative fuel's calorific value (MJ/kg), the concentration of Type 1 & 2 elements and substances as described in the Clean Air Plant and Equipment Regulation 1997, and the concentration of chlorine (Cl), copper (Cu), fluorine (F) and sulphur (S).

The concentration of the elements and substances referred to above must be reported as milligrams per kilogram of solid alternative fuel.

E4.5 Before commencing regular use of alternative fuels the licensee must provide the EPA with: -

- a) A report describing the results of the assessment trial(s) including emission monitoring conducted during the trials, and
- b) Documented evidence that either the alternative fuels specified in this licence are permitted to be used under the terms of any development consent issued or this premise or that development consent is not required under the provisions of the Environmental Planning and Assessment Act.

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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: 14-June-2000

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End Notes

- 1 Licence varied by notice V/M upgrade, issued on 08-Jul-2000, which came into effect on 08-Jul-2000.
- 2 Licence varied by notice 1001143, issued on 22-Sep-2000, which came into effect on 17-Oct-2000.
- 3 Licence varied by notice 1015942, issued on 24-May-2002, which came into effect on 18-Jun-2002.
- 4 Licence varied by notice 1019491, issued on 19-Dec-2003, which came into effect on 13-Jan-2004.
- 5 Licence varied by notice 1039721, issued on 12-Aug-2004, which came into effect on 06-Sep-2004.
- 6 Licence varied by notice 1053558, issued on 05-Dec-2005, which came into effect on 30-Dec-2005.
- 7 Licence varied by notice 1065959, issued on 01-Nov-2006, which came into effect on 01-Nov-2006.
- 8 Licence varied by notice 1068259, issued on 01-Nov-2007, which came into effect on 01-Nov-2007.
- 9 Condition A1.3 Not applicable varied by notice issued on <issue date> which came into effect on <effective date>
- 10 Licence varied by notice 1096237, issued on 24-Dec-2008, which came into effect on 24-Dec-2008.
- 11 Licence varied by notice 1099216, issued on 07-May-2009, which came into effect on 07-May-2009.
- 12 Licence varied by notice 1105162, issued on 19-Aug-2009, which came into effect on 19-Aug-2009.
- 13 Licence varied by notice 1109542, issued on 01-Dec-2009, which came into effect on 01-Dec-2009.
- 14 Licence varied by notice 1117452, issued on 22-Nov-2010, which came into effect on 22-Nov-2010.
- 15 Licence varied by notice 1128999, issued on 16-Jun-2011, which came into effect on 16-Jun-2011.
- 16 Licence varied by notice 1502146 issued on 02-Nov-2011
- 17 Licence format updated on 03-Nov-2011
- 18 Licence fee period changed by notice 1502852 on 01-Jan-2012
- 19 Licence varied by notice 1503238 issued on 04-Jan-2012