

Licence Variation

Section 58(5) Protection of the Environment Operations Act 1997



ORICA AUSTRALIA PTY LTD,
ABN 99 004 117 828,
16-20 BEAUCHAMP ROAD,
MATRAVILLE NSW 2036
STANDARD POST

Attention: Mr. Bruce E GOTTING

Notice Number 1043560
File Number 500755
Date 14-Feb-2005

NOTICE OF VARIATION OF LICENCE NO. 2148

BACKGROUND

- A. ORICA AUSTRALIA PTY LTD ("the licensee") is the holder of Environment Protection Licence No. 2148 ("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 16-20 BEAUCHAMP ROAD, MATRAVILLE, NSW.
- B. The EPA (part of the DEC) has regulated the activities of groundwater remediation in and about Botany Industrial Park for many years. The focus of this work has been on stopping further contamination, fixing up surface drainage, soil remediation works and investigation of groundwater contamination.
- C. On 26 September 2003 the EPA issued the licensee with a Clean Up Notice under the Protection of the Environment Operations Act 1997 (POEO Act) in relation to chlorinated hydrocarbon groundwater plumes sourced from the former ICI site at Botany. This Notice sets a strict framework and timescale for action to contain and reduce the levels of contaminants, to the maximum extent practicable by 31 October 2005, to ensure adverse impacts do not occur.
- D. In order to fulfil the EPA Notice of Clean Up Action requirement to contain the plumes, the licensee has proposed the Botany Groundwater Clean Up Project (the project). The key elements of the project include:
- Extraction of groundwater from the wells in three containment lines (up to 15 million litres per day)
 - Transfer of the groundwater via pipelines to a groundwater treatment plant (GTP)
 - Construction and operation of the GTP
 - Reuse of treated water in Botany Industrial Park (or other identified users) with discharge of excess treated water (not reused) to Bunnerong Canal.

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- Installation of a discharge point to Bunnerong Canal.
- E. On 15 November 2004 the DEC received from the licensee, an Environmental Impact Statement (EIS) relating to the project.
- F. On 22 November 2004 the Minister for Infrastructure and Planning, pursuant to section 110A of the Environmental Planning and Assessment Act (EP&AA) nominated the EPA as the 'nominated determining authority' for the activity described above. The EPA subsequently placed the EIS on exhibition in accordance with Part 5 of the EP&AA and sought and received public submissions in relation to the EIS.
- G. On 23-Dec-2004 the EPA received from the licensee, an application for the variation of the licence to permit the proposal to proceed.
- H. The EPA, the Department of Infrastructure, Planning and Natural Resources, NSW Maritime, Sydney Water Corporation and Sydney Ports Corporation have prepared a joint determination report dated 11 February 2005 in accordance with the EP&AA and associated Regulation. The purpose of this report is to review the EIS, the issues raised in representations made in response to its exhibition, the report from the licensee on the representations and any other matters relevant to the potential environmental impacts of the project.
- I. The joint determination report has been prepared by the determining authorities in relation to each of their relevant instruments of approval for the project. This includes the EPA's consideration of the licensee's application for the variation of the licence.
- J. The determination concludes that the licensee's preferred strategy for the collection and treatment of the contaminated groundwater is consistent with accepted best practice and satisfies best international air emission standards. It also maximises the quantity of extracted water that can be recycled for industrial use significantly reducing the demand on potable supplies. Fundamentally, the project will allow the licensee to comply with the Notice of Clean Up Action issued by the EPA to stop the contamination impacting on Botany Bay and protect the community.
- K. The licence contains existing conditions including but not limited to:
 - Limits in regard to controlling air, noise, water pollution and waste;
 - Requirements for maintaining plant and equipment in a proper manner & operating plant and equipment in a competent manner;
 - Monitoring and reporting environmental performance;
 - Submitting a statement of compliance with respect to licence conditions; and
 - Reporting incidents to the DEC which may cause harm.
- L. The EPA has determined that it is able to vary the licence to incorporate the following new licence conditions for the proposed development.
- M. The licence is being varied by:
 - Attaching air, parameter, water and weather discharge and/or monitoring points;
 - Attaching concentration limits for air pollutant discharges as a result of the project;
 - Attaching concentration limit for water pollutant discharges as a result of the project;
 - Attaching lower limits for parameters in Thermal Oxidation Unit;
 - Attaching noise design goal limits for activities specific to this project;
 - Attaching a requirement to monitor concentration of pollutants discharge for air and water;

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- Attaching a requirement to monitor parameters in the Thermal Oxidation Unit;
- Attaching a requirement to monitor weather at the premises;
- Attaching a signage condition for all EPA identification point at the premises;
- Attaching various Audit and Review Special conditions for air, water, noise, thermal oxidation unit, dioxin minimisation and management, GTP water reuse, groundwater monitoring, ambient environmental monitoring, and engineering;
- Attaching an Independent Monitoring Committee Special condition;
- Attaching a Financial Assurance Special Condition; and
- Minor editorial and formatting changes.

VARIATION OF LICENCE NO. 2148

1. By this notice the EPA varies licence No. 2148 as set out in the Appendix. *(for licences with a lot of changes and where the whole licence document will be in the appendix: The Appendix is a copy of the licence marked with the variations that are made to it by this notice. (for licences with a small number of changes where only the conditions will be printed: The Appendix is a copy of the provisions of the licence which are varied by this notice, marked with the variations that are made to them.*
2. The variations to the licence are indicated in the following way:
 - if a strike through mark appears through any word or other text (eg. ~~Solids or~~) this indicates that the word or other text is deleted from the licence by this notice; and
 - if a double underline appears under any word or other text (eg. must be treated) this indicates that the word or other text is added to the licence by this notice.
3. Except as provided by section 84(2) of the Act, the variations to the licence by this notice begin to operate at the expiry of the period of 21 days after you receive notice of the variations, unless another date is specified in this notice.
4. Section 84(2) of the Act provides that a variation to a licence does not operate:
 - until the expiry of the period of 21 days after you are given notice of the decision to vary the licence is given to the; or
 - if an appeal against the decision is lodged within that period, until the Land and Environment Court confirms the decision or the appeal is withdrawn; or
 - until you notify the EPA in writing that no appeal is to be made against the decision to vary the licence,

whichever first occurs.

.....

Ms Jo Zurrer

Manager Sydney Industry

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Sydney Region

(by Delegation)

INFORMATION ABOUT THIS NOTICE

- Section 287 of the Act enables appeals to be made in connection with decisions about licences within 21 days after you are given notice of the decision.
- Details provided in this notice will be available on the EPA's Public Register in accordance with section 308 of the Act.
- This notice is issued under section 58(5) of the Act .

Environment Protection Authority

Environment Protection Licence

Section 55 Protection of the Environment Operations Act 1997

- ♦ Licence number: 2148
- ♦ File number: 500755
- ♦ Licence Anniversary Date: 21-July
- ♦ Review date not later than 01-Jul-2005

Licence Type

Premises

Licensee

ORICA AUSTRALIA PTY LTD
16-20 BEAUCHAMP ROAD
MATRAVILLE NSW 2036

Licensed Premises

ORICA AUSTRALIA PTY LTD
16-20 BEAUCHAMP ROAD
MATRAVILLE NSW 2036

Fee Based Activity

Scale

Other Chemical Processing (24)	> 25000 - T produced
Chemical Storage - Other Chemical Storage (25)	> 5000 - 100000 kL of active storage capacity
Hazardous, Industrial or Group A Waste Generation or Storage (73)	> 500 - T
Hazardous, Industrial or Group A or Group B Waste Processing (75)	0 - All

EPA Region

Sydney Region
Level 7, 79 George Street
PARRAMATTA NSW 2150
Phone: 02 9995 5000
Fax: 02 9995 6900

PO Box 668 PARRAMATTA
NSW 2124

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Information about this licence

Dictionary

The licence contains a dictionary, which defines terms used in the licence. It is found at the end of the 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).
- Report incidents causing or threatening material environmental harm to the environment, as set out in Part 5.7 of the Act.

Transfer of licence

Transfer of the licence to another person may be requested by the licensee using the form for this purpose available from the EPA.

Variation of licence conditions

Variations to the conditions of this licence may be requested by the licensee using the form for this purpose available from the EPA. The EPA may also vary a 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 3 years after the issue of the licence, as

set out in Part 3.6 of the Act. You will receive advance notice of the licence review. For licences held immediately before 1 July 1999, the first review will take place before 1 July 2002.

Fees and annual return to be sent to the EPA

The licence requires you to forward to the EPA an Annual Return, comprising a Statement of Compliance and a summary of any monitoring required by the licence (including the recording of complaints).

The Annual Return must be submitted within 60 days after the end of each reporting period. Where a licence is transferred, surrendered or revoked, a special reporting period applies.

For each licence fee period you must pay:

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

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

See condition R1 and the accompanying form regarding the Annual Return requirements.

The EPA publication "A Guide to Licensing" contains information about how to calculate your licence fees.

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

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.

Licence anniversary date

21-July

This licence is issued to

ORICA AUSTRALIA PTY LTD
16-20 BEAUCHAMP ROAD
MATRAVILLE NSW 2036

subject to the conditions which follow:

1 Administrative conditions

A1 What the licence authorises and regulates

A1.1 Not applicable.

A1.2 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
Chemical Storage Facilities
Waste Activities
Chemical Industries or Works - other
Waste Facilities - HIGAB processing

Fee Based Activity	Scale
Other Chemical Processing (24)	> 25000 - T produced
Chemical Storage - Other Chemical Storage (25)	> 5000 - 100000 kL of active storage capacity
Hazardous, Industrial or Group A Waste Generation or Storage (73)	> 500 - T
Hazardous, Industrial or Group A or Group B Waste Processing (75)	0 - All

A1.3 Not applicable.

A2 Premises to which this licence applies

A2.1 The licence applies to the following premises:

Premises Details
ORICA AUSTRALIA PTY LTD
16-20 BEAUCHAMP ROAD
MATRAVILLE
NSW
2036
LOTS 2,4 & 9 DP 1016112, LOTS 2,5 & 6 DP 206413, LOT 11 DP 1039919, LOT 1 DP 85542, LOT 11 DP 109505, LOT 2 DP 528680, LOT 1 DP 254392, LOT 1 DP 740704
As defined in letter to DEC- EPA Sydney Region, dated 4 December 2003, and plan titled, 'Botany Site Plan - Sub-Division Boundary Plots', Drawing Number B87201 Rev 12.

A3 Other activities

A3.1 Not applicable.

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 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.

Air

EPA Identification no.	Type of Monitoring Point	Type of Discharge Point	Description of Location
3	Discharge to air Air emissions monitoring	Discharge to air Air emissions monitoring	Vent from the hypochlorite backing tower marked "monitoring point 3" on Drawing No. B78323 submitted as an attachment to the letter to the EPA dated 21 March 2003.
4	Discharge to air Air emissions monitoring	Discharge to air Air emissions monitoring	Vent duct from the absorption tail tower marked "monitoring point 4" on Drawing No. B78323 submitted as an attachment to the letter to the EPA dated 21 March 2003.
7	Discharge to air Air emissions monitoring	Discharge to air Air emissions monitoring	Emergency chlorine vent marked "monitoring point 7" on Drawing No. B78323 submitted as an attachment to the letter to the EPA dated 21 March 2003.
8	Discharge to Air Air emissions Monitoring Discharge to Air monitoring	Discharge to Air Air emissions Monitoring Discharge to Air monitoring	Discharge from the Stack of the Vapour Emissions Capture (VEC) system of the Steam Stripping Unit (SSU) as shown on drawing No B64973 prepared for ICI Operations Pty Ltd
9	Discharge to air Air emissions monitoring	Discharge to air Air emissions monitoring	Stack serving GTP labelled "Monitoring Point 9 (GTP stack)" on drawing number B94744 submitted to the EPA on 25 January 2005.
10	Parameter monitoring		Thermal oxidation unit labelled "Monitoring Point 10 (Thermal Oxidation Unit)" on drawing number B94744 submitted to the EPA on 25 January 2005.
12	Weather monitoring		Weather monitoring station labelled "Monitoring Point 12 (Weather Station)" on drawing number B94743 submitted to the EPA on 25 January 2005.

P1.2 ~~Not applicable~~ 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 Not applicable.~~

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	Description of location
L1	Discharge to waters Effluent quality and volume monitoring	Discharge to waters Effluent quality and volume monitoring	Drain outlet serving the GTP labelled "Monitoring Point 11 (GTP discharge to waters)" on drawing number B94744 submitted to the EPA on 25 January 2005.

P2 Steam Stripping Unit, Transfer Pipeline and Tanker Loading Bay Additional Monitoring/Discharge Points

Note: The location of additional monitoring and discharge points will be specified by the EPA after the EPA has reviewed the information provided in accordance with Conditions E6.2 and E7.2. This may result in additional air discharge or air monitoring points being specified.

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 Not applicable.

L2.2 Not applicable.

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 **vs.**

Air

POINT 3

Pollutant	Units of measure	100 percentile concentration limit
Chlorine	g/m3	0.2

POINT 4

Pollutant	Units of measure	100 percentile concentration limit
Hydrogen chloride	g/m3	0.03

POINT 8

Pollutant	Units of measure	100 percentile concentration limit
1,2-Dichloroethane	ppm	128
Volatile organic compounds	ppm	150
Vinyl chloride	ppm	41

POINT 9

Pollutant	Units of measure	100 percentile concentration limit
1,2-Dichloroethane	mg/m3	8
Chlorine	mg/m3	30
Nitrogen Oxides	mg/m3	400
Volatile organic compounds	mg/m3	10
Hydrogen Sulfide	mg/m3	8
Dioxins & Furans	pg/m3	0.1 Note 1
Hydrogen chloride	mg/m3	30
Sulphur dioxide	mg/m3	100
Vinyl chloride	ppm	10
Solid Particles	mg/m3	20
Carbon monoxide	mg/m3	100

Water and Land**POINT 11**

Pollutant	Units of Measure	50 percentile concentration limit	90 percentile concentration limit	SDGM concentration limit	100 percentile Concentration Limit
1,2-Dichloroethane	mg/L				0.9
Arsenic	mg/L				0.0023
Cadmium	mg/L				0.0007
Carbon tetrachloride	mg/L				0.24
Copper	mg/L				0.0013
Iron	mg/L				0.2
Lead	mg/L				0.0044
Manganese	mg/L				0.08
Mercury	mg/L				0.0001
Nickel	mg/L				0.007
pH	pH				7-8.5
Reactive Phosphorus	mg/L				0.005
Temperature	°C				15-25
Tetrachloroethene (tetrachloroethylene)	mg/L				0.07
Nitrogen (total)	mg/L				0.1 Note2
Phosphorus (total)	mg/L				0.01 Note2
Trichloroethene (Trichloroethylene)	mg/L				0.35
Turbidity	NTU				5 Note2
Zinc	mg/L				0.015
Nitrate + nitrite (oxidised nitrogen)	mg/L				0.015Note2
Benzene	mg/L				0.05
Chloroform	mg/L				0.37
Toluene	mg/L				0.18
Vinyl chloride	mg/L				0.4
Biochemical oxygen demand	mg/L				10
Chromium (total)	mg/L				0.0044
NH3-N	mg/L				0.015Note2

Note: The above air pollutant concentration limits apply to the stack emissions prior to the addition of any re-heat air.

Note 1: For the purposes of the table(s) above, Note 1 means polychlorinated-dibenzo-p-dioxins (PCDD) and polychlorinated-dibenzofurans (PCDF) as 2,3,7,8-tetrachloro-dibenzo-p-dioxin (TCDD) equivalent calculated in accordance with the procedures included in Part 9, Clause 19 of the Clean Air (Plant and Equipment) Regulation 1997.

Note 2: For the purposes of the table(s) above, Note 2 means that concentration limits may be subject to review and change once the final details are received on the treatment technology and the design of the discharge structure.

L3.4 For the concentration limits specified for Point 8 (above), the following reference conditions also apply:

Pollutant	Units of measure	100 percentile concentration limit	Reference Conditions	Averaging Period
Volatile organic compounds	ppm	150	Dry, 273K, 101.3kPa	As per test method
1,2-dichloroethane	ppm	128	Dry, 273K, 101.3kPa	As per test method
Vinyl Chloride	ppm	41	Dry, 273K, 101.3kPa	As per test method

Note 1: Limits for pollutants other than those nominated above may be specified after the EPA has assessed the reports required by Conditions E6.2 and E7.2.

L3.5 Note 2: The EPA may vary the limits in the above table to those at or approaching best practice. The variation to these limits will apply from the date or dates as may be specified by the EPA by direction issued in accordance with Condition U7.2 of this licence.

L3.5 Reference Condition

For the concentration limits specified for Point 9 (above), the following reference conditions also apply:

Pollutant	Units of measure	100 percentile concentration limit	Reference Conditions	Averaging Period
1,2-Dichloroethane	mg/m ³	8	Dry, 273K, 101.3kPa, 11% O ₂	Rolling 1 hour average
Chlorine	mg/m ³	30	Dry, 273K, 101.3kPa, 11% O ₂	As per test method
Nitrogen Oxides	mg/m ³	400	Dry, 273K, 101.3kPa, 11% O ₂	Rolling 1 hour average
Volatile organic compounds	mg/m ³	10	Dry, 273K, 101.3kPa, 11% O ₂	Rolling 1 hour average
Hydrogen Sulfide	mg/m ³	2	Dry, 273K, 101.3kPa, 11% O ₂	As per test method
Dioxins & Furans	ng/m ³	0.1	I-TEQ, Dry, 273K, 101.3kPa, 11% O ₂	As per test method
Hydrogen chloride	mg/m ³	30	Dry, 273K, 101.3kPa, 11% O ₂	Rolling 1 hour average
Sulfur dioxide	mg/m ³	100	Dry, 273K, 101.3kPa, 11% O ₂	As per test method
Vinyl chloride	ppm	10	Dry, 273K, 101.3kPa, 11% O ₂	Rolling 3 hour average
Solid Particles	mg/m ³	20	Dry, 273K, 101.3kPa, 11% O ₂	As per test method
Carbon monoxide	mg/m ³	100	Dry, 273K, 101.3kPa, 11% O ₂	Rolling 1 hour average

Note ¹Polychlorinated-dibenzo-p-dioxins (PCDD) and polychlorinated-dibenzofurans (PCDF) as 2,3,7,8-tetrachloro-dibenzo-p-dioxin (TCDD) equivalent calculated in accordance with the procedures included in Part 9, Clause 19 of the Clean Air (Plant and Equipment) Regulation 1997.

L3.6 Thermal Oxidation Unit Lower Limits

For each monitoring/discharge point or utilisation area specified in the tables below (by point number), the parameter must be equal to or greater than the lower limits specified for that parameter in that table.

Point 10

Parameter	Units of measure	Lower Limit	Averaging period
Residence time	h	h	Instantaneous
Temperature	°C	850	Instantaneous

L3.7 The Air Stripping and Thermal Oxidiser plants must be shut down and ceases all emissions as soon as safely possible, but in no case later than 10 minutes, if there is a combustion failure in the thermal oxidiser.

L4 Volume and mass limits

~~L4.1 Not applicable.~~

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
11	kL/day	12000

L4.2 For each discharge point or utilisation area specified in the table/s below, the mass of a pollutant discharged at that point, or applied to that area, must not exceed the limits specified for that pollutant in the table.

POINT 8

Air

Pollutant	Units of measure	Mass limit
Volatile organic	g per hour	TBD

compounds		
1,2-dichloroethane	g per hour	TBD
Vinyl Chloride	g per hour	TBD

L4.3 To avoid any doubt, this condition does not authorise the discharge or emission of any other pollutants.

L4.4 For the purposes of the above tables, TBD means 100 percentile load limits to be determined by the EPA after the licensee has submitted the report as required by Conditions E6.2 and E7.2.

L4.5 The EPA may vary the limits in the above table to those at or approaching best practice. The variation to these limits will apply from the date or dates as may be specified by the EPA by direction issued in accordance with Condition U7.2 of this licence.

L5 Waste

L5.1 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.

L5.2 This condition only applies to the storage, treatment, processing, reprocessing or disposal of waste at the premises if it requires an environment protection licence.

L5.3 Except as provided by any other condition of this licence, only the hazardous and or industrial and/or Group A waste listed below may be treated, processed or reprocessed at the premises.

(a) Ferrous chloride (pickle liquor);

(b) Mercury compounds; and

(c) Waste chemical substances arising from research and development activities.

(d) Halogenated organic solvents;

(e) Residues from industrial waste treatment/disposal operations;

(f) Soils contaminated with a controlled waste;

L5.4 Except as provided by any other condition of this licence, only the hazardous and/or industrial and/or Group A waste listed below may be generated and/or stored at the premises.

(a) Basic solutions or bases in solid form;

(b) Mercury; mercury compounds;

(c) Organic solvents excluding halogenated solvents;

(d) Halogenated organic solvents;

(e) Waste from manufacture, formulation and use of wood-preserving chemicals;

(f) Waste mineral oils unfit for their original intended use;

- (g) Waste oil/water, hydrocarbons/water mixtures or emulsions;
- (h) Waste substances and articles containing or contaminated with polychlorinated biphenyls ((PCB's), polychlorinated naphthalenes (PCN's), polychlorinated terphenyls (PCT's) and/or polybrominated biphenyls (PBB's);
- (i) Organohalogenated compounds - other than substances referred to in Appendix 1 of this licence;
- (j) Soils contaminated with a controlled waste;
- (k) Encapsulated, chemically-fixed, solidified or polymerised wastes;
- (l) Residues from industrial waste treatment/disposal operations;
- (m) Clinical and related wastes;
- (n) Acidic solutions or acids in solid form;
- (o) Waste chemical substances arising from research and development activities;
- (p) Filter cake;
- (q) Containers and drums contaminated with substances in the list in Appendix 1 of this licence; and
- (r) Perchlorates.

L6 Noise Limits

L6.1 For the area known as 'Southlands' and the associated wells and reticulation system for the SSU operation the noise limit conditions L6.1.1 to L6.1.4 inclusively, apply:

- L6.1.1** The operation of all plant and equipment must not give rise to an equivalent continuous (L_{Aeq}) sound pressure level at any point on any residential property greater than 5dB(A) above the existing background L_{A90} level (in the absence of the noise under consideration).
- L6.1.2** The operation of all plant and equipment must not give rise to an $LA_{1, 1\text{minute}}$ or $L_{A\text{Max}}$ sound pressure level at any point on any residential property greater than 15dB(A) above the existing background LA_{90} level (in the absence of the noise under consideration) during night time.
- L6.1.3** The operation of all plant and equipment when assessed on any residential property must not give rise to a sound pressure level that exceeds L_{Aeq} 50dB(A) day/evening time, and L_{Aeq} 40 dB(A) night time.
- L6.1.4** The operation of all plant and equipment when assessed on any neighbouring commercial/industrial premises must not give rise to a sound pressure level that exceeds L_{Aeq} 65dB(A) day/evening time and night time.

Note 1 : For assessment purposes, the above L_{Aeq} sound levels must be assessed over a period of 10-15 minutes. The modification factors presented in Section 4 of the NSW Industrial Noise Policy must be applied to the measured noise levels where applicable.

Note 2 : The area known as 'Southlands' and the associated wells and reticulation system for the SSU operation is defined by Lot 2 DP 528680; Lot 11, DP 109505; and Lot 1 DP85542 as shown on drawing titled "Botany Site Plan Sub-division Boundary Plots", drawing no. B87201 Rev 12 4/03 and the reticulation layout shown on Map Ref (to be supplied by Orica).

L6.2 For the operation of the steam stripping unit and associated plant and equipment, located at Botany Industrial Park (BIP) premises the following conditions L6.2.1 to L6.2.3 inclusively apply:

L6.2.1 Noise emissions emanating from all active Plants in the BIP premises, including loading and unloading of material in or above the premises and when determined as a sound level contribution, shall not exceed the following amenity L_{Aeq} criteria when measured or computed at any point within one metre of the nearest boundary of any residence in the vicinity of the premises, using the "FAST" response on the sound level meter.

Time of Day	L_{Aeq}
Day	65
Evening	55
Night	50

L6.2.2 The intrusive noise criterion for all active plants in the BIP shall be that the $L_{Aeq15\text{minute}}$ noise levels shall not exceed the amenity L_{Aeq} noise levels by more than 5 dB(A) when measured or computed at any point within one metre of the nearest boundary of any residence in the vicinity of the premises, using the "FAST" response on the sound level meter.

L6.2.3 Each existing BIP Plant shall ensure that new or replacement equipment is selected and/or installed so that no increase in noise emissions is thereby created when measured or computed at any point within one metre of the nearest boundary of any residence in the vicinity of the premises, using the "FAST" response on the sound level meter.

Note 3: The operation of the steam stripping unit and associated plant and equipment, located at Botany Industrial Park (BIP) premises is defined by all Lot and DPs, excluding the 'Southlands' area, listed on "Botany Site Plan Sub-division Boundary Plots", drawing no. B87201 Rev 12 4/03).

L6.3 A report for all BIP Licences (L7494 Hunstman Corporation; L 2148 Orica Pty Ltd and L10000 Qenos Pty Ltd) demonstrating compliance with the noise conditions listed at Condition L6.1 to L6.2 must be appended to the Annual Return for Qenos L10000.

Definition:

For purpose of assessing compliance with conditions in L6.1 to L6.3 inclusive:

'Day' time is defined as 0700 to 1800 hours

'Evening' time

L6.4 Noise generated by activities associated with the Groundwater Cleanup Project, other than those accepted by the DEC as being "construction" at the premises must not exceed the noise goal level presented in the Table 6.4 below:

Table 6.4 - Noise Design Goal Limits (dB(A))

Location	Day	Evening	Night
	L _{Aeq} (15 minute)	L _{Aeq} (15 minute)	L _{Aeq} (15 minute)
Nearest affected receivers surrounding the Groundwater Cleanup Project	35 dB(A)	35 dB(A)	35 dB(A)

L6.5 For the purpose of Condition L6.1, L6.2 and L6.4:

- Day is defined as 1800 the period from 7am to 6pm Monday to Saturday and 8am to 2200 hours 6pm Sundays and Public Holidays
- Night time Evening is defined as 2200 the period from 6pm to 0700 hours 10pm, and
- Night is defined as the period from 10pm to 7am Monday to Saturday and 10pm to 8am Sundays and Public Holidays

L6.6 Noise from the premises is to be measured at the most affected point on or within the residential boundary to determine compliance with the L_{Aeq}(15 minute) noise limits in condition L6.4

Where it can be demonstrated that direct measurement of noise from the premises is impractical the EPA may accept alternative means of determining compliance. See Chapter 11 of the NSW Industrial Noise Policy.

The modification factors presented in Section 4 of the NSW Industrial Noise Policy shall also be applied to the measured noise level where applicable

L6.7 The noise emission limits identified in condition L6.4 apply under meteorological conditions of:

- wind speeds up to 3 m/s at 10 metres above ground level, or

- temperature inversion conditions of up to 3°C/100m and wind speeds up to 2m/s at 10 metres above ground level.

L6.8 Hours of operation – Construction

All construction work at the premises must only be conducted between 7:00am to 6:00pm Monday to Friday, 8:00am to 1:00pm Saturdays, with no construction activities on Sundays or Public Holidays. Construction is permitted any time if it is not audible at the nearest affected receivers. Audible means that it can be heard by a person at the nearest affected receivers.

L6.9 Activities at the premises, other than construction work, that meet the noise goal provided in L6.4 may be conducted on a continuous basis.

L6.10 The following activities may be carried out at the premises outside the hours specified in conditions L6.8:

- (a) the delivery of materials as requested by Police or other authorities for safety reasons; and
- (b) emergency work to avoid the loss of lives, property and/or to prevent environmental harm.

L7 Polychlorinated Biphenyls (PCBs)

Note: The licensee must comply with the conditions as specified in this licence or where no specific conditions are outlined in this licence, the licensee must comply with the "Chemical Control Order in Relation to Materials and Wastes Containing Polychlorinated Biphenyl, 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.

O3 Emergency Response

- O3.1 Within 3 months of the date of the issue of this licence, the licensee must develop, or update, an emergency response plan which documents the procedures to deal with all types of incidents (eg spill, explosions or fire) that may occur at the premises or outside of the premises (eg during transfer) which are likely to cause harm to the environment.

O4 Processes and management

- O4.1 The licensee must ensure that any liquid and/or non-liquid waste generated and/or stored and/or treated and/or processed and/or reprocessed and/or disposed at the premises is assessed and classified in accordance with the EPA Environmental Guidelines: Assessment, Classification and Management of Liquid and Non-Liquid Wastes, in force as at 1 July 1999.
- O4.2 The licensee must ensure that waste identified for recycling is stored separately from other waste.
- O4.3 All above ground tanks containing material that is likely to cause environmental harm must be bunded or have an alternative spill containment system in-place.
- O4.4 The licensee must ensure that suitable measures (e.g. high/low alarms, control valves with interlock control, one way valves) are installed on all tanks, ponds or clarifiers and associated pipes and hoses to prevent the spillage of waste.

O5 Tracking (within NSW) of Wastes Transported from the Premises

- O5.1 Conditions O5.2 to O5.16 apply to the movement of the types of hazardous and/or industrial and/or Group A waste as listed in L5.3, within NSW.

Note: The conditions in this section relate to wastes that are generated and/or stored at the premises and then transported from the premises to another destination within NSW.

Prerequisites for waste movements

- O5.2 If the waste is transported from the premises, the licensee must ensure that the waste is transported:

- (a) to a place which has been licensed by the EPA to issue consignment authorisation numbers; and
(b) to a place that can otherwise lawfully accept that class of waste.

- O5.3 If the waste is transported from the premises, the licensee must:

- (a) obtain a consignment authorisation number from the consignee
complete an approved waste data form in relation to the consigned waste in accordance with the instructions on the form and to the extent required, and give a copy of the form to the person transporting the waste;
- (b) ensure that the waste data form:
- (i) is completed accurately, and
 - (ii) is retained for a period of not less than 4 years from the time the form was completed, and

- (iii) is made available for inspection by an authorised officer on request.
- (c) ensure, if the waste is of such an amount as to require the person transporting it to be licensed, that the person transporting the waste is licensed.

Application for a consignment authorisation number

O5.4 To obtain a consignment authorisation number as required by O5.3 (a), the licensee must apply in writing to the consignee. An application must include the following information:

- (a) a statement identifying the classification of the waste in accordance with the requirements of condition O4.1;
- (b) copies of all information used to classify the waste;
- (c) an estimate of the amount of waste to which the application applies;
- (d) whether the consignment will consist a single load or multiple loads;
- (e) an estimate of the total period required for transportation of the consignment;
- (f) the date of dispatch of at least the first load in the consignment.

Note: The licensee may nominate the dates of dispatch of as many loads as is feasible. This should be discussed with the consignee and will depend on the predicability of the rate of generation of the waste and the likelihood of the need for amendments to the dates nominated. If the waste is predictable, a schedule may be able to be submitted for the entire consignment, however if it is unpredictable, the date of only one future load may be able to be determined at a time (see also O5.9 about amending notified dates).

Note: The requirement for a written application for a consignment authorisation number does not preclude preliminary contact to obtain quotes and/or advice. Such preliminary contact does not require the formal provision of the above information that need only be supplied in the formal application.

O5.5 Once an application for a consignment authorisation number, as set out in O5.4 has been submitted, the licensee must not submit an application for the same consignment to another consignee until notification is received concerning the outcome of the application.

Notification of dates of dispatch of the second and subsequent loads in a consignment

- O5.6** The licensee must provide the consignee with written notification of the date of dispatch of each load of waste.
- O5.7** The notification referred to in O5.6 must be received by consignee no later than the date of arrival of the preceding load at the destination.

Notification of a final load in a consignment

O5.8 Unless the movement of an entire consignment of waste occurs in a single load, by the time the final load in a consignment is accepted at the destination, the licensee must have informed the consignee in writing, that no further loads are to be dispatched under that consignment authorisation number.

Note: The notifications referred to in conditions O5.6 and O5.8 may be attached to the waste data form of the preceding load.

Amendments to the nominated date(s) of dispatch

O5.9 If the date of dispatch for a load of waste is changed, the licensee must give written notification of this to the consignee and nominate a revised date of dispatch.

O5.10 A notification referred to in O5.9 must occur on or before the date of delivery as previously nominated.

Note: More than one amendment to dates of dispatch may occur.

Cancellation of consignment authorisations

O5.11 If the licensee determines that the delivery of a consignment of waste is to be discontinued for any reason, the consignee must be notified in writing before the nominated date of dispatch of the next expected load.

Notification of delayed delivery by transporter

O5.12 If the licensee receives written notification from a transporter who removed waste from the premises specifying a revised date of delivery to the destination which is more than 7 days after the date of dispatch, the licensee must note and record that date.

Record keeping

O5.13 The licensee must record and retain all information related to each consignment of waste.

Note: This includes waste data forms and copies of other documents such as notifications of revised delivery dates, regular and other reports, etc.

O5.14 The records referred to in O5.13 must be kept so that:

- (a) all records relating to individual consignment authorisation numbers are kept physically together;
- (b) consignments transported by each transporter can be readily identified and accessed; and
- (c) consignments sent to each destination can readily be identified and accessed.

Note: The licensee must keep all information for at least 4 years.

Exception reporting

O5.15 The licensee must notify the EPA, in writing, within 48 hours of becoming aware of any suspected breaches of the Act, the Protection of the Environment Operations (Waste) Regulation 1996 or this licence.

- O5.16 The licensee must notify the EPA in writing within 48 hours of becoming aware of any of the following:
- (a) the refusal by a person to whom the licensee has applied for a consignment authorisation number in accordance with O5.4 to issue such a number;
 - (b) the refusal of a transporter to transport waste after arriving at the licensee's premises for the purposes of transporting that waste;
 - (c) a transporter who transports, or attempts to transport, waste without a waste data form completed to the extent required;
 - (d) the refusal of a consignee to accept waste from the licensee;
 - (e) the failure of the licensee to receive written confirmation of receipt of waste from a consignee within 21 days of dispatch, or where a transporter has provided written notification of a revised date of delivery as set out in O5.12 within 21 days of that date.
 - (f) the notification by a transporter of a revised date of delivery which is more than 90 days after the date of dispatch of the waste.

Note: The EPA should be notified of exception reports by sending a facsimile to:

Manager, Hazardous Waste Regulation

NSW Environment Protection Authority

Facsimile number (02) 9995 5914.

O6 Tracking of Wastes Transported from the Premises to an Interstate Destination

- O6.1 Conditions O6.2 to O6.11 apply to the movement of the types of hazardous and/or industrial and/or Group A waste as listed in L5.3, out of NSW.

Note: The requirements of the NEPM apply to the interstate movement of any of the wastes listed in Appendix 1 of this licence.

Note: The conditions in this section relate to wastes that are generated and/or stored at the premises and then transported from the premises to another interstate destination.

Classification of controlled waste

- O6.2 The licensee must accurately identify the waste, in accordance with O4.1, and determine if the waste is a controlled waste within the meaning of the NEPM.

Note: The waste producer should check with the agency in the State or Territory of destination to determine whether waste is classified as a controlled waste under the NEPM. Unless advised otherwise by the agency of the State or Territory of destination, any waste included in Appendix 1 of this licence is a controlled waste for the purposes of the NEPM.

Application for a consignment authorisation number

- O6.3 If the waste is transported from the premises to another participating State or Territory, the licensee must comply with all conditions attached to the consignment authorisation issued by an

agency or a facility delegated by an agency in the destination State or Territory.

Note: The waste producer is required by the Protection of the Environment Operations (Waste) Regulation 1999 to obtain, prior to the waste being dispatched, a consignment authorisation from an agency, or a facility delegated by an agency, in the destination State or Territory to allow the movement of controlled waste.

Waste movements

O6.4 If the waste is transported from the premises to another participating State or Territory, the licensee must ensure that the waste is transported to a place that can lawfully be used as a waste facility for that waste.

O6.5 The licensee must ensure that the waste transporter is licensed as required by the agency of each participating State or Territory through which the waste is transported.

O6.6 The licensee must:

- (a) retain a copy of the waste transport certificate for the waste for a period of not less than 4 years from the time the form was completed, and
- (b) make the copy of the waste transport certificate available for inspection by an authorised officer on request.

Note: The waste producer is required by the Protection of the Environment Operations (Waste) Regulation 1999 to complete a waste transport certificate for the waste. This should be done in accordance with the instructions printed on the certificate and the required copy of the waste transport certificate should be forwarded to the agency in the State of destination.

Notification of delayed delivery by transporter

O6.7 If the licensee receives written notification from the transporter who removed waste from the licensee's premises specifying a revised date of delivery to the destination which is more than 7 days after the date of dispatch, the licensee must note and record that date.

Record keeping

O6.8 The licensee must record and retain all information related to each consignment of waste.

Note: This includes the waste transport certificates and copies of other documents such as consignment authorisations issued by an agency in the destination State or Territory, notifications of revised delivery dates by transporters, regular and other reports, etc.

O6.9 The records referred to in O6.8 must be kept so that:

- (a) all records relating to each consignment authorisation are kept physically together;
- (b) consignments transported by each transporter can be readily identified and accessed; and
- (c) consignments sent to each destination can readily be identified and accessed.

Note: The licensee must keep all information for at least 4 years.

Exception reporting

- O6.10 The licensee must notify the EPA in writing within 48 hours of becoming aware of a suspected breach of the Act, the Protection of the Environment Operations (Waste) Regulation 1996 or this licence.
- O6.11 The licensee must notify the EPA in writing within 48 hours of becoming aware of any of the following:
- (a) the refusal by an agency, or facility delegated by an agency, in a participating State or Territory to whom the licensee has applied for a consignment authorisation in accordance with O6.3, to issue such an authorisation;
 - (b) the refusal of a transporter to transport waste after arriving at the licensee's premises for the purposes of transporting that waste to another participating State or Territory;
 - (c) a transporter who transports, or attempts to transport, waste to another participating State or Territory without a waste transport certificate completed to the extent required;
 - (d) the refusal of a destination in another participating State or Territory to accept from the licensee waste for which a consignment authorisation has been issued;
 - (e) the failure of the licensee to receive written confirmation of receipt of waste from a destination in another participating State or Territory within 28 days of dispatch.

Note: The EPA should be notified of exception reports by sending a facsimile to:
Manager, Hazardous Waste Regulation
NSW Environment Protection Authority
Facsimile number (02) 9995 5914.

O7 Tracking of Wastes Received at the Premises from other Locations Within NSW

- O7.1 Conditions O7.2 to O7.19 apply to the movement of the types of hazardous and/or industrial and/or Group A waste as listed in L5.5, within NSW.

Note: Group B wastes are not required to be monitored and tracked within NSW.

Note: The conditions in this section relate to wastes that are accepted at the premises and that originate from within NSW.

Prerequisites for receipt of waste

- O7.2 Before entering into an agreement to accept waste for storage, treatment or disposal, the licensee must:
- (a) receive a written application containing the information set out in O7.4, from the consignor; and
 - (b) take all reasonable care to verify the accuracy of the classification of the waste stated in the written application by the consignor.

Note: The EPA will provide advice on compliance with the Waste Guidelines, however it will not confirm the classification of a waste.

- O7.3 When formally agreeing to accept the waste, the licensee must issue a consignment authorisation number in writing to the consignor.

Application for consignment authorisation numbers

- O7.4 The licensee must not issue a consignment authorisation number unless a written application containing the following information has been received from the consignor:
- (a) a statement describing the waste and identifying the waste class in accordance with Schedule 1 of the *Protection of the Environment Operations Act*; and
 - (b) an estimate of the amount of waste to which the application applies; and
 - (c) whether the consignment will consist of a single load or multiple loads; and
 - (d) an estimate of the total period required for transportation of the consignment; and
 - (e) the date of dispatch of at least the first load in the consignment; and
 - (f) copies of all information used by the consignor to classify the waste.

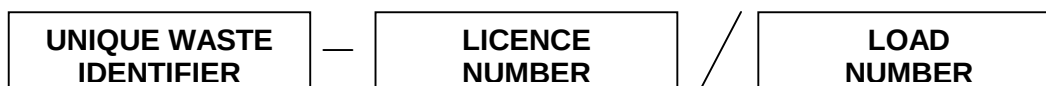
Note: Licensed activities are required by their licence to notify the destination of subsequent dates of dispatch. Non-licensed activities are required to nominate such dates under condition O7.8(a) of this licence, and included in the destinations conditions of acceptance.

Consignment authorisation

- O7.5 A consignment authorisation number issued by the licensee must be in writing and in the format set out in O7.7.
- O7.6 Each consignment authorisation number issued by the licensee must be accompanied by a written statement to the consignor which describes:
- (a) the waste to which it applies; and
 - (b) the amount of waste in kilograms or tonnes; and
 - (c) the period of time, not exceeding 12 months, for which it applies; and
 - (d) the expected date of dispatch of the first load of waste under the consignment authorisation number.

Format of consignment authorisation numbers

- O7.7 A consignment authorisation number must be issued in the following format:



Where:

- (a) the unique waste identifier is a number or an alpha-numeric sequence generated by the licensee. The format of the unique identifier is not otherwise specified by this licence, however it must uniquely identify:
 - (i) the person to whom the consignment authorisation was issued; and
 - (ii) the waste to which the consignment authorisation applies.
- (b) The licence number is the number of this licence;

- (c) the load number is inserted as required by the consignor to identify each load delivered under that consignment number.

Requirements when issuing a consignment authorisation number to a non-licensed waste activity

- O7.8 When a consignment authorisation number is issued to a person who carries on a non-licensed waste activity, the licensee must include the following additional requirements in the written statement referred to in O7.6.
- (a) The consignor must ensure that Orica Australia Pty Ltd is always advised of the date of dispatch of the next load under this consignment authorisation number.
 - (b) Unless the total consignment consists of one load, the consignor must notify Orica Australia Pty Ltd in writing, of the delivery of the final load under this consignment authorisation number. That notification must occur no later than date on which the final load is delivered to the destination.
 - (c) The consignor must complete the waste data form to the required extent and in accordance with the instructions on the form.
 - (d) The correct load number must be included on the waste data form by the consignor for each load of waste delivered under this consignment authorisation number. The load number is to start at 1 for the first load and increase by 1 for each subsequent load dispatched by the consignor.
 - (e) All waste delivered to Orica Australia Pty Ltd under this consignment authorisation number must be consistent with the characteristics stated in the application for the number.
 - (f) Orica Australia Pty Ltd must be informed immediately of any change in the classification of the waste as stated in the application for the consignment authorisation number.
 - (g) Persons carrying on non-licensed waste generation or storage activities are required to inform the EPA of any suspected breach of the Protection of the Environment Operations Act or Regulation in connection with the transportation of waste from their premises. It is an offence under the Protection of the Environment (Waste) Regulation not to do so.
 - (h) To ensure that your waste reaches the proper destination, Orica Australia Pty Ltd is required by the EPA to provide you with written confirmation of receipt for each load of waste transported under this consignment authorisation number. If you do not receive written confirmation for a load within 21 days of dispatch, you must notify the EPA by sending a facsimile to:

Manager, Hazardous Waste Regulation
NSW Environment Protection Authority
Facsimile number (02) 9995 5914.

- O7.9 The licensee must attach to the statement of requirements referred to in O7.8 copies of
- (a) Appendix 1 of this licence; and
 - (b) the waste data form.

Amendments to the dates of transport

- O7.10 If the consignor notifies the licensee of a revised date of dispatch, the licensee must note and keep a record of the revised date.

- O7.11 If a transporter notifies the licensee of a revised date of delivery of a load of waste, the licensee must note and keep a record of the revised date.

Acceptance of waste

- O7.12 When receiving waste, the licensee must:
- (a) only accept waste from a non-licensed waste activity if the conditions of acceptance set out in O7.8 have been complied with by the consignor;
 - (b) only accept waste for which the licensee has issued a valid consignment authorisation number;
 - (c) obtain and keep a copy of the waste data form from the waste transporter;
 - (d) accurately record on the waste data form, to the extent required and in accordance with the instructions on the form:
 - (i) the date of receipt of the load; and
 - (ii) the quantity of waste received (in tonnes or kilograms, to a level of accuracy sufficient to allow determination of any discrepancy as required by O7.19(i); and
 - (iii) the treatment given to the waste at the destination; and
 - (iv) the name of the person recording the information; and
 - (e) sign and date the waste data form.

Post acceptance requirements

- O7.13 After the waste has been accepted at the premises, the licensee must, where applicable, accurately record the following information:
- (a) where the premises is a disposal or storage facility - the location within the premises where the waste is placed; or
 - (b) where the premises is an incinerator - the date of incineration; or
 - (c) where the premises is a facility that treats, processes or reprocesses the waste - the temporary storage location and the date and means of treatment.

Confirmation of receipt

- O7.14 The licensee must forward to the consignor of the waste within 14 days of receipt of each load, written confirmation of acceptance of that load of waste.

Return of waste

- O7.15 If waste is found to have been wrongly classified by the consignor and the licensee cannot accept such waste under this licence, the waste must be returned to the consignor within 21 days of the licensee becoming aware of such wrong classification.

Record keeping

- O7.16 The licensee must record and retain all information related to each consignment of waste for which an application for a consignment authorisation is received.

Note: This includes the waste data form and copies of other documents such as notifications of revised delivery dates, regular and other reports, etc.

O7.17 The records referred to in O7.16 must be kept so that:

- (a) all records relating to each consignment authorisation numbers are kept physically together;
- (b) consignments collected from each consignor can be readily identified and accessed; and
- (c) consignments transported by each transporter can be readily identified and accessed.

Note: The licensee must keep all information for at least 4 years.

Exception reporting

O7.18 The licensee must notify the EPA in writing within 48 hours of becoming aware of any suspected breach of the Act, the Protection of the Environment Operations (Waste) Regulation 1996 or this licence.

O7.19 The licensee must notify the EPA in writing within 48 hours of becoming aware of any of the following:

- (a) waste that is wrongly classified by a consignor;
- (b) the licensee refusing to issue a consignment authorisation number following a written application as set out in O7.4;
- (c) the rejection of waste by the licensee;
- (d) if a load of waste, for which a consignment authorisation number has been issued, has not been accepted at the premises within 7 days of the date of dispatch nominated by the consignor, or if the licensee has been notified by a licensed transporter of a revised delivery date pursuant to O7.11, within 7 days of that date;
- (e) a transporter delivers or attempts to deliver waste to the premises for which the licensee has not issued a valid consignment authorisation number;
- (f) the notification by a transporter of a revised date of delivery which is more than 90 days after the date of dispatch of the waste.
- (g) a delivery, or attempted delivery, to the premises of waste for which the transporter did not provide a waste data form completed to the extent required;
- (h) waste which is delivered to the premises without the correct load number included on the waste data form;
- (i) a load of waste delivered to the premises where the amount received varies by more than 20% from the amount stated on the waste data form for that load, or where other discrepancies occur which could indicate that the waste is not accurately described on the waste data form.

Note: The EPA should notified of exception reports by sending a facsimile to:

Manager, Hazardous Waste Regulation
NSW Environment Protection Authority
Facsimile number (02) 9995 5914.

Note: The EPA recognises that many consignors rely on estimates of the amount of waste dispatched. This method is permitted, however if errors prove to be un-acceptably large, additional requirements may be imposed to require a more accurate measurement of the amount of waste leaving a premises.

Note: While in general a maximum of 20% error in the estimation of waste quantity is allowed before an exception report is generated, actual errors are expected to be significantly smaller in most cases. Any discrepancies should be noted and recorded by the destination and reported to the EPA if significant or suspicious.

O8 Tracking of Wastes Received at the Premises from Interstate

O8.1 Conditions O8.2 to O8.12 apply to the movement of the types of hazardous and/or industrial and/or Group A and/or Group B waste listed in L5.5 into NSW.

Note: The requirements of the NEPM apply to the interstate movement of any of the wastes listed in Appendix 1 of this licence.

Note: The conditions in this section relate to wastes that are received at the premises from an interstate generator.

Prerequisites for receipt of waste

- O8.2 Before entering into an agreement to accept controlled waste for storage, treatment or disposal, the licensee must:
- (a) be advised in writing by the waste producer of
 - (i) the description of the waste according to Schedule 1 of the NEPM;
 - (ii) the quantity of waste;
 - (iii) the expected date(s) of dispatch;
 - (iv) the expected date(s) of arrival at the destination; and
 - (b) obtain from the waste producer a copy of a current consignment authorisation issued by the EPA for the waste.

Amendments to the dates of transport

- O8.3 If a waste producer notifies the licensee of a revised date of dispatch the licensee must record that revised date along with the details of how and when such notification was received.
- O8.4 If a transporter notifies the licensee of a revised date of delivery, the licensee must record that revised date along with the details of how and when such notification was received.

Acceptance of waste

- O8.5 The licensee must:
- (a) only accept waste for which the waste producer has provided a copy of a valid consignment authorisation issued by the EPA;
 - (b) obtain from the waste transporter on delivery at the destination the relevant copy of the waste transport certificate;
 - (c) accurately complete Part 3 of the waste transport certificate stating the following:
 - (i) the date the waste was received at the facility;
 - (ii) any discrepancy between the information provided in Parts 1 and 2 of the waste transport certificate; and

- (iii) the type of treatment, if any, given to the waste at the facility.

Post acceptance requirements

- O8.6 After the waste has been accepted at the premises, the licensee must, where applicable, accurately record the following information:
- (a) where the premises is a disposal or storage facility - the location within the premises where the waste is placed; or
 - (b) where the premises is an incinerator - the date of incineration; or
 - (c) where the premises is a facility that treats, processes or reprocesses the waste - the temporary storage location and the date and means of treatment.

Confirmation of receipt

- O8.7 The licensee must sign and date the relevant copies of the waste transport certificate and, in accordance with the instructions printed on the certificate, forward copies to:
- (a) the waste producer; and
 - (b) the EPA; and
 - (c) the agency of the State or Territory of origin.

Return of waste

- O8.8 If a load of waste is found to have been wrongly classified by the waste producer and the licensee cannot accept such waste under this licence, the waste must be returned to the producer within 21 days of the licensee becoming aware of the wrong classification.

Record keeping

- O8.9 The licensee must record and retain all information related to each consignment of waste received.
- O8.10 The records referred to in O8.9 must be kept so that:
- (a) all records pertaining to each consignment authorisation numbers are kept physically together;
 - (b) consignments collected from each waste producer can be readily identified and accessed; and
 - (c) consignments transported by each transporter can be readily identified and accessed.

Note: The licensee must keep all information for at least 4 years.

Exception reporting

- O8.11 The licensee must notify the EPA in writing within 48 hours of becoming aware of any suspected breaches of the Act, the Protection of the Environment Operations (Waste) Regulation 1996, the NEPM or this licence.
- O8.12 The licensee must notify the EPA in writing within 48 hours of becoming aware of any of the following:

- (a) waste that is wrongly classified or otherwise misrepresented by a waste producer or transporter;
- (b) the refusal by the licensee to accept waste arriving at the premises;
- (c) when a load of waste has not been accepted at the premises within 7 days of the date nominated by the waste producer or transporter, or where the licensee has been notified of a revised delivery date, within 7 days of that date;
- (d) the failure of a transporter delivering or attempting to deliver waste to provide a copy of a valid consignment authorisation issued by the EPA;
- (e) the delivery, attempted delivery, or notification of a revised date of delivery, by a transporter that is outside the period of validity of the consignment authorisation;
- (f) a delivery, or attempted delivery, of waste for which the transporter did not provide a waste transport certificate completed to the extent required;
- (g) a load of waste delivered to the premises where the amount received varies by more than 20% from the amount stated on the waste data form for that load, or where other discrepancies occur which could indicate that the waste is not accurately described on the waste data form.

Note: The EPA should be notified of exception reports by sending a facsimile to:

Manager, Hazardous Waste Regulation
NSW Environment Protection Authority
Facsimile number (02) 9995 5914.

Note: The EPA recognises that many waste producers rely on estimates of the amount of waste dispatched from their premises. While in general a maximum of 20% error in the estimation of waste quantity is acceptable before an exception report is required from the licensee, actual errors are expected to be significantly smaller in most cases. Any discrepancies should be noted and recorded by the licensee and reported to the EPA if significant or suspicious.

09 Clinical Wastes

09.1 The licensee must ensure that the handling, labelling, containment, storage and disposal of clinical and sharps wastes are carried out in accordance with the "Waste Management Guidelines for Health Care Facilities", 1998, issued by the NSW Department of Health.

09.2 Without limiting to 09.1, the licensee must ensure that:

- (a) Containers that are to be reused must be thoroughly cleansed and disinfected with hospital strength disinfectant before being reused.
- (b) Where second hand containers are used, all other irrelevant markings must be removed or otherwise effectively destroyed.
- (c) Sharps are segregated by the use of enclosed rigid impenetrable containers, which comply with Australian Standards AS/NZS 4031-1992 (non-reusable containers) and 4261-1994 (reusable containers) and disposed of as clinical waste.

010 Odour

- O10.1 The licensee must not cause permit or allow the emission of offensive odour beyond the boundary of the premises.
- O10.2 No condition of this licence identifies a potentially offensive odour for the purposes of Section 129 of the Protection of the Environment Operations Act.

O11 Steam Stripper Unit and associated groundwater piping system emissions

- O11.1 The licensee must operate the Steam Stripper Unit and associated groundwater transfer system plant at all times to minimise the concentration and mass of total VOCs, 1,2-dichloroethane and vinyl chloride emissions at all times.

O12 Dust

- O12.1 Activities occurring at the premises must be carried out in a manner that will minimise emissions of dust from the premises.
- O12.2 Trucks entering and leaving the premises that are carrying loads must be covered at all times, except during loading and unloading.

O13 Stormwater management – construction phase

- O13.1 An Environment Management Plan or Sediment Control Plan (ESCP) must be prepared and implemented. A copy of the ESCP must be submitted to the Manager Sydney Industry at PO box 668 Parramatta NSW 2124 preferably **prior to the commencement of any construction works and in any case within 14 days of the commencement of construction works**. The plan must describe the measures that will be employed to minimise soil erosion and the discharge of sediment and other pollutants to lands and/or waters during construction activities. The EMP and ESCP should be prepared in accordance with the requirements for such plans such as those outlined in Guidelines for Preparation of EMPs Final Draft Aug 2003 (available from DIPNR); and Managing Urban Stormwater: Soils and Construction (available from the Department of Housing) respectively.
- O13.2 A dewatering and spill plan must be prepared and implemented. A copy of the plan must be submitted to the Manager Sydney Industry at PO box 668 Parramatta NSW 2124 preferably **prior to the commencement of any construction works and in any case within 14 days of the commencement of construction works**. The plan must describe the measures that will be employed to prevent pollution of waters and achieve best practice for dewatering and spill management activities during construction works.
- O13.3 An acid sulfate management plan must be prepared and implemented. A copy of the plan must be submitted to the Manager Sydney Industry at PO box 668 Parramatta NSW 2124 preferably **prior to the commencement of any construction works and in any case within 14 days of the commencement of construction works**. The plan must describe the measures that will be employed to detect the presence of acid sulfate soils and the management of excavation activities where acid sulfate soils are detected. The plan must be developed to achieve best practice for acid sulfate soil management during construction works.

O14 Stormwater management – operation phase

- O14.1 A Stormwater Management Scheme (SWMP) must be prepared for the development and must be implemented. A copy of the SWMP **must be submitted to the Manager Sydney Industry at PO Box 668 Parramatta NSW 2124 at least 28 days** prior to the commencement of normal operations. Implementation of the Scheme must mitigate the impacts of stormwater run-off from and within the premises following the completion of construction activities. The Scheme should be consistent with the Stormwater Management Plan for the catchment. Where a Stormwater Management Plan has not yet been prepared the Scheme should be consistent with the guidance contained in Managing Urban Stormwater: Council Handbook (available from the EPA).
- O14.2 A spill management plan must be prepared and implemented. A copy of the plan **must be submitted to the Manager Sydney Industry at PO Box 668 Parramatta NSW 2124 at least 28 days** prior to the commencement of normal operations. The plan must describe the measures that will be employed to prevent pollution of waters and achieve best practice for spill management activities during operations. In particular, the plan must address management practices associated with the proposed truck loading facility and the EPA's bunding requirements for such facilities.

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.

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:

Air

POINT 3

Pollutant	Units of measure	Frequency	Sampling Method
Chlorine	mg/m3	Continuous	In line instrumentation

POINT 4

Pollutant	Units of measure	Frequency	Sampling Method
Hydrogen chloride	mg/m3	Quarterly	Method approved in writing by the Authority

POINT 7

Pollutant	Units of measure	Frequency	Sampling Method
Chlorine	mg/m3	Continuous	In line instrumentation

POINT 8

Pollutant	Units of measure	Frequency	Sampling Method
1,2-Dichloroethane	mg/m3	Special Frequency 1	Special Method 1
Moisture	%	Continuous	TM-22
Speciated organic compounds	mg/m3	Quarterly	OM-2
Temperature	oC	Continuous	TM-2
Vinyl chloride	mg/m3	Special Frequency 1	Special Method 1
Volatile organic compounds	mg/m3	Continuous	CEM-8
Volumetric flowrate	m3/s	Monthly	By Calculation (volume flow rate or pump capacity multiplied by operating time)

POINT 9

Pollutant	Units of measure	Frequency	Sampling Method
1,2-Dichloroethane	mg/m3	Continuous	CEM-8
Carbon monoxide	mg/m3	Continuous	CEM-3
Chlorine	mg/m3	Quarterly	TM-7 & 8
Dioxins & Furans	ng/m3	Special Frequency 2	TM-18
Dry gas density	kg/m3	Quarterly	TM-23
Hydrogen Sulfide	mg/Nm3	Quarterly	TM-5
Hydrogen chloride	mg/m3	Continuous	Method approved in writing by the Authority
Moisture content	%	Continuous	TM-22
Molecular weight of stack gases	g/g-mole	Quarterly	TM-23
Nitrogen Oxides	mg/m3	Quarterly	TM-14
Oxygen (O2)	%	Continuous	CEM-3
Solid Particles	mg/m3	Special Frequency 3	TM-15
Sulphur dioxide	mg/m3	Special Frequency 3	TM-4
Temperature	K	Continuous	TM-2
Velocity	m/s	Continuous	CEM-5
Vinyl chloride	ppm	Continuous	CEM-8
Volatile organic compounds	mg/m3	Continuous	CEM-8
Volumetric flowrate	m3/s	Continuous	CEM-6

POINT 11

Pollutant	Units of measure	Frequency	Sampling Method
1,2-Dichloroethane	mg/L	Weekly	Grab sample
Arsenic	mg/L	Weekly	24 hour composite sample
Benzene	mg/L	Weekly	Grab sample
Biochemical oxygen demand	mg/L	Weekly	24 hour composite sample
Cadmium	mg/L	Weekly	24 hour composite sample
Carbon tetrachloride	mg/L	Weekly	Grab sample
Chloroform	mg/L	Weekly	Grab sample
Chromium (total)	mg/L	Weekly	24 hour composite sample
Conductivity	uS/cm	Continuous	In line instrumentation
Copper	mg/L	Weekly	24 hour composite sample
Iron	mg/L	Weekly	24 hour composite sample
Lead	mg/L	Weekly	24 hour composite sample
Manganese	mg/L	Weekly	24 hour composite sample
Mercury	mg/L	Weekly	24 hour composite sample
Nickel	mg/L	Weekly	24 hour composite sample
Nitrate + nitrite (oxidised nitrogen)	mg/L	Weekly	24 hour composite sample
Nitrogen (ammonia)	mg/L	Weekly	24 hour composite sample
Nitrogen (total)	mg/L	Weekly	24 hour composite sample
Phosphorus (total)	mg/L	Weekly	24 hour composite sample
Reactive Phosphorus	mg/L	Weekly	24 hour composite sample
Temperature	°C	Continuous	In line instrumentation
Tetrachloroethane (tetrachloroethylene)	mg/L	Weekly	Grab sample
Toluene	mg/L	Weekly	Grab sample
Trichloroethane (trichloroethylene)	mg/L	Weekly	Grab sample
Turbidity	NTU	Weekly	24 hour composite sample
Vinyl chloride	mg/L	Weekly	Grab sample
Zinc	mg/L	Weekly	24 hour composite sample
pH	pH	Weekly	24 hour composite sample

M2.2 For the purpose of the table[s] above:

- Emission monitoring for hydrogen chloride must be undertaken when the burner is on line at such a steady rate as will facilitate sampling in accordance with the EPA's letter dated 20 August 2002.
- Emission monitoring for hydrogen chloride is TM 7 & TM 8 using site specific variations as outlined in the EPA's letter dated 20 August 2002 or any other methods approved in writing by the EPA.
- Special Frequency 1 means the collection of samples must be collected and analysed continuously and reference samples must also be collected and analysed on a quarterly basis.
- Special Frequency 2 is defined as monitoring monthly for the first 6 months and bimonthly thereafter. This monitoring frequency could be reviewed after 2 years.
- Special Frequency 3 is defined as monitoring monthly for the first 6 months and quarterly thereafter. This monitoring frequency could be reviewed after 2 years.
- Special Method 1 means continuous monitoring and analysis for 1,2-dichloroethane and vinyl chloride is CEM-10 while the quarterly method for 1,2-dichloroethane is OM-2 and the quarterly method for vinyl chloride is OM-2 or USEPA Method 106.

- M2.3 At Point 4, the licensee is required to take a grab sample during 4 startups and shutdowns to determine the concentration of HCl emissions during startup or shutdown conditions. In these circumstances, the licensee may use the in-house HCl sampling method.
- M2.4 Monitoring positions used for determining the concentration and mass of pollutants discharged from Point 8 must comply with TM-1.
- M2.5 In relation to monitoring requirements for Point 8, a performance specification test must be conducted for all continuous emissions monitoring systems at the time of installation, or soon after, and thereafter on a quarterly basis. The quarterly tests must be conducted at least two months apart for each continuous emissions monitoring system and in accordance with the requirements of the applicable CEMS protocol. The results of all performance specification tests must be submitted to the EPA within one month after completion of the tests.
- M2.6 The number and location of the points at which the above monitoring must be performed will be specified by the EPA after submission of the report specified by Condition E7.2.
- M2.7 As a minimum, the above monitoring must be performed at the common stack discharge point from the vapour recovery units attached to the steam stripper unit.
- Note: Additional monitoring may be specified for other monitoring and/or discharge points as may be determined by the EPA to be appropriate based upon the information provided in reports provided in accordance with Conditions E6.2 and E7.2.**

~~For the purposes of the table(s) above Special Frequency 1 means the collection of samples must be collected and analysed continuously and reference samples must also be collected and analysed on a quarterly basis.~~

~~For the purposes of the table(s) above Special Method 1 means continuous monitoring and analysis for 1,2-dichloroethane and vinyl chloride is CEM-10 while the quarterly method for 1,2-dichloroethane is OM-2 and the quarterly method for vinyl chloride is OM-2 or USEPA Method 106.~~

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 concentration of the pollutant; or
 - 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
 - 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.

Note: The Clean Air (Plant & Equipment) Regulation 1997 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".

~~M3.2 Not applicable.~~

~~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.~~

M4 Recording of pollution complaints

- M4.1 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.
- M4.2 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.
- M4.3 The record of a complaint must be kept for at least 4 years after the complaint was made.
- M4.4 The record must be produced to any authorised officer of the EPA who asks to see them.

M5 Telephone complaints line

- M5.1 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.
- M5.2 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.
- M5.3 Conditions M5.1 and M5.2 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.

M6 Requirement to monitor volume or mass

~~M6.1 Not applicable.~~

~~M6.1 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 11~~

Frequency	Unit Of Measure	Sampling Method
Daily during any discharge	KL/day	Method approved in writing by the Authority

M6.2 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 mass 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:

POINT 8

Pollutant	Units of measure	Frequency	Sampling Method
Volatile organic compounds	g per hour	Continuous	CEM-8 and CEM-6
1,2-dichloroethane	g per hour	Continuous	TBD
Vinyl Chloride	g per hour	Continuous	TBD
Speciated Organic Compounds	g per hour	Quarterly	OM-2

M6.3 The number and location of the points at which the above monitoring must be performed will be specified by the EPA after submission of the report specified by Condition E7.2.

M6.4 As a minimum, the above monitoring must be performed at the common stack discharge point from the vapour recovery units attached to the steam stripper unit.

Note: The sampling and analytical method used to determine continuous emissions of 1,2-dichloroethane and vinyl chloride is subject to approval of the method by the EPA.

M7 Requirement to monitor thermal oxidation unit parameters

M7.1 For each monitoring/discharge point or utilisation are specified in the tables below (by point number), the licensee must monitor (by sampling and obtaining results by analysis) each 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:

Air			
POINT 10			
Parameter	Units of measure	Frequency	Averaging period
Volumetric flow rate	m ³ /s	Continuous	CEM-6
Temperature	°C	Continuous	TM-2

M8 Weather monitoring

M8.1 For each monitoring point specified below (by a point number), the licensee must monitor (by sampling and obtaining results by analysis) the parameter specified in Column 1. The licensee must use the sampling method, units of measure, averaging period and sample at the frequency, specified opposite in the other columns:

POINT 12				
Parameter	Units of measure	Averaging period	Frequency	Sampling Method
Wind speed @ 10 m	m/s	1 hour	Continuously	AM-2 & AM-4
Wind direction @ 10 m	°	1 hour	Continuously	AM-2 & AM-4
Sigma Theta @ 10 m	°	1 hour	Continuously	AM-2 & AM-4
Additional Requirements				
Siting				AM-1 & AM-4
Measurement				AM-2 & AM-4

6 Reporting conditions

R1 Annual return documents

What documents must an Annual Return contain?

- 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.

A copy of the form in which the Annual Return must be supplied to the EPA accompanies this licence. Before 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.

Period covered by Annual Return

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.

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.

Deadline for Annual Return

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').

Notification where actual load can not be calculated

R1.6 Not applicable.

Licensee must retain copy of Annual Return

R1.7 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.

Certifying of Statement of Compliance and Signing of Monitoring and Complaints Summary

R1.8 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.

R1.9 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.

R2 Notification of environmental harm

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.

R2.1 Notifications must be made by telephoning the EPA's Pollution 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:

- (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; and
- (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;
- (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 Reporting of Wastes Transported from the Premises to another Destination within NSW

R4.1 Conditions R4.2 to R4.5 apply to the transport of hazardous and/or industrial and/or Group A waste within NSW.

Note: The conditions in this section relate to wastes that are generated and/or stored at the premises and then transported from the premises to another destination within NSW.

Regular reporting

R4.2 The licensee must supply to the EPA, for each transporter that transported waste from the licensee's premises, the information as set out in Appendix 2, table 1.

R4.3 The licensee must supply to the EPA, for each destination within NSW which received waste from the licensee, the information as set out in Appendix 2, table 2.

Reporting periods

R4.4 Reports to the EPA in accordance with R4.2 and R4.3 shall be supplied on or before:

- (a) 30 April for the reporting of information relating to wastes transported from the premises between 1 January and 31 March of that year;
- (b) 31 July for the reporting of information relating to wastes transported from the premises between 1 April and 30 June of that year;
- (c) 31 October for the reporting of information relating to wastes transported from the premises between 1 July and 30 September of that year;
- (d) 31 January for the reporting of information relating to wastes transported from the premises between 1 October and 31 December of the previous year.

Note: The EPA should be notified of exception reports by sending a facsimile to:
Manager, Hazardous Waste Regulation
NSW Environment Protection Authority

Nil Reports

R4.5 If waste has not been transported from the premises in any reporting period as set out in R4.4 the EPA must be advised in writing by the licensee, by the dates referred to in R4.4 in lieu of reporting as required in R4.2 and R4.3.

R5 Reporting of Wastes Transported from the Premises to an Interstate Destination

R5.1 Conditions R5.2 to R5.5 apply to the movement of hazardous and/or industrial and/or Group A waste as listed in L5.3, out of NSW.

Note: The requirements of the NEPM apply to the interstate movement of any of the wastes listed in Appendix 1 of this licence.

Note: The conditions in this section relate to wastes that are generated and/or stored at the premises and then sent from the premises to an interstate destination.

Regular reporting

R5.2 The licensee must supply to the EPA, for each transporter that transported waste from the premises to a destination in another participating State or Territory, the information as set out in Appendix 2, table 3.

Reporting periods

R5.3 Reports to the EPA in accordance with R5.2 shall be supplied on or before:

- (a) 30 April for the reporting of information relating to wastes transported from the premises between 1 January and 31 March of that year;
- (b) 31 July for the reporting of information relating to wastes transported from the premises between 1 April and 30 June of that year;
- (c) 31 October for the reporting of information relating to wastes transported from the premises between 1 July and 30 September of that year;
- (d) 31 January for the reporting of information relating to wastes transported from the premises between 1 October and 31 December of the previous year.

Nil reports

R5.4 If waste has been not transported from the premises in any reporting period as set out in R5.3, the EPA must be advised in writing by the licensee, by the dates referred to in R5.3 in lieu of reporting as defined in R5.2.

Interstate transport of controlled wastes

R5.5 The licensee must comply with the requirements of the NEPM.

R6 Reporting of Waste Received at the Premises from other Locations within NSW

R6.1 Conditions R6.2 to R6.4 apply to the movement of the types of hazardous and/or industrial and/or Group A waste as listed in L5.5 within NSW.

Note: Group B wastes are not required to be monitored and tracked within NSW.

Note: The conditions in this section relate to wastes that are accepted at the premises and that originate from within NSW.

Regular reporting

- R6.2 The licensee must supply to the EPA the information set out in Appendix 3, tables 1 and 2, for waste received. The waste codes specified in Appendix 1, and the relevant ANZSIC code must be entered in the required columns when completing tables 1 and 2.

Reporting periods

- R6.3 Reports to the EPA in accordance with R6.2 shall be supplied on or before:
- (a) 30 April for the reporting of information relating to wastes transported to the premises between 1 January and 31 March of that year;
 - (b) 31 July for the reporting of information relating to wastes transported to the premises between 1 April and 30 June of that year;
 - (c) 31 October for the reporting of information relating to wastes transported to the premises between 1 July and 30 September of that year;
 - (d) 31 January for the reporting of information relating to wastes transported to the premises between 1 October and 31 December of the previous year.

Nil reports

- R6.4 Where waste has not been transported by the licensee in any reporting period as set out in R6.2 the EPA must be advised of this in writing by the licensee in lieu of the reports required in R6.3.

R7 Reporting of Wastes Received at the Premises from Interstate

- R7.1 Conditions R7.2 to R7.5 apply to the movement of the types of hazardous and/or industrial and/or Group A and/or Group B waste listed in L5.5 into NSW.

Note: The requirements of the NEPM apply to the interstate movement of any of the wastes listed in Appendix 1 of this licence.

Note: The conditions in this section relate to wastes that are received at the premises from an interstate generator.

Regular reporting

- R7.2 The licensee must supply to the EPA, the information set out in Appendix 3, tables 3 and 4, for waste received. The waste codes specified in Appendix 1, and the relevant ANZSIC code must be entered in the required columns when completing tables 3 and 4.

Reporting periods

- R7.3 Reports to the EPA in accordance with R7.2 shall be supplied on or before:
- (a) 30 April for the reporting of information relating to wastes received at the premises between 1

January and 31 March of that year;

- (b) 31 July for the reporting of information relating to wastes received at the premises between 1 April and 30 June of that year;
- (c) 31 October for the reporting of information relating to wastes at the premises between 1 July and 30 September of that year;
- (d) 31 January for the reporting of information relating to wastes received at the premises between 1 October and 31 December of the previous year.

Nil reports

- R7.4 Where waste has not been transported by the licensee in any reporting period as set out in R7.3 the EPA must be advised of this in writing by the licensee in lieu of the reports required in R7.2.

Interstate transport

- R7.5 The licensee must comply with the requirements of the NEPM.

General conditions

G1 Copy of licence kept at the premises

- 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.

G2 Signage

G2.1 The location of EPA point number(s) 3,4,7,8,9,10,11 and 12 must be clearly marked by signs that indicate the point identification number used in this licence and be located as close as practical to the point.

Pollution studies and reduction programs

U1 Noise Pollution Reduction Program

- U1.1 A continuous improvement program must be implemented to ensure that the level of noise emanating from the premises, including loading and unloading of material in or above the premises, does not exceed an LA90 sound pressure level of 60 dB (A) (daytime) or 50 dB (A) (night time) when measured or computed at any point within one metre of the nearest boundary of any residence in the vicinity of the premises, using the "FAST" response on the sound level meter.
- U1.2 All new manufacturing plants on the premises must be designed such that the sum of all noise emissions from each individual plant does not exceed an LA90 sound pressure level of 47 dB (A) (daytime) or 37 dB (A) (night time) when measured or computed at any point within one metre of the nearest boundary of any residence in the vicinity of the premises, using the "FAST" response of the sound level meter.
- U1.3 All upgrades to existing plants must comply with the following requirements:
- a) The sound power level of the plant in which the alteration is made must not increase
 - b) Where possible, the sound pressure level contribution of replacement equipment shall be lower than the equipment it replaces
 - c) Where the sound pressure level contribution of replacement equipment exceeds that of the original equipment, sufficient acoustic treatment shall be made to other equipment in the same plant so that there is no net increase in the plant's sound pressure level overall.

The sound pressure level contribution of the plant or equipment is to be measured or computed at any point within one meter of the nearest boundary of any residence in the vicinity of the premises, using the "FAST" response of the sound level meter to determine compliance with this condition.

- U1.4 A report must be forwarded to the EPA annually as an attachment to the Qenos P/L (Environment Protection Licence No. 10000) annual return, that details the following:
- a) Areas that exceed the desired noise limit
 - b) Programs that have been and will be implemented to address areas requiring attention
 - c) Progress made towards noise goals.

U2 Stormwater Pollution Reduction Program

- U2.1 A continuous improvement program must be implemented to address issues associated with the

stormwater system on any part of the premises. The stormwater improvement program must be consistent with the Botany Industrial Park stormwater improvement plan.

U2.2 A report must be forwarded to the EPA annually as an attachment to the Qenos P/L (Environment Protection Licence No. 10000) annual return, that details the following:

- a) Issues associated with the stormwater system
- b) Programs that have been and will be implemented to address areas requiring attention
- c) Progress made towards the goals outlined in the stormwater improvement plan.

U3 Steam Stripper Unit Optimisation Plan

U3.1 Objective

The objective of this PRP is to prepare a plan to optimise the steam stripper unit (SSU) including the vapour recovery plant during commissioning to ensure that it minimises the mass and concentration of VOCs, 1,2-dichloroethane and vinyl chloride emissions.

U3.2 Optimisation Plan

On or before *1 October 2004*, the licensee must submit in writing to the *Manager Sydney Industry PO Box 668 Parramatta 2124*, a report detailing an optimisation plan for the SSU. The report must include, but not be limited to, the following:

- I. A theoretical description of how the plant could be run to achieve the lowest possible mass and concentration of emissions.
- II. Details regarding how it is proposed to translate the theory into operational practice;
- III. A proposed method to verify the vapour recovery system is operating optimally; and
- IV. A proposed methodology for developing mass rate emission limits for total VOCs, 1,2-dichloroethane and vinyl chloride.

The optimisation plan must outline a timetable that ensures the SSU is optimised within one month of commissioning.

U4 Steam Stripper Unit Optimisation

U4.1 Objective

The objective of this PRP is to ensure that within one month of commissioning, the operation of the steam stripper unit (SSU) including the vapour recovery plant has been optimised to achieve the lowest possible mass and concentration of total VOCs, 1,2-dichloroethane and vinyl chloride emissions.

U4.2 Plant Optimisation

Within one month of commissioning, operation of the vapour recover plant must be optimised to achieve the lowest possible mass and concentration of total VOCs, 1,2-dichloroethane and vinyl chloride emissions. This work must be performed in accordance with the report specified in Condition U3.2.

U4.3 Plant Optimisation Report

By 1 January 2005, the licensee must submit in writing to the *Manager Sydney Industry PO Box 668 Parramatta 2124*, a report detailing the results of the SSU optimisation. The report must include, but not be limited to, the following:

- I. A description of how the SSU optimization plan was implemented;
- II. Mass emission limits based on the optimal plant performance for total VOCs, 1,2-dichloroethane and vinyl chloride;
- III. Air emission monitoring results for all pollutants and other monitoring requirements as specified in Conditions M2.1 and M3.1;
- IV. Monitoring results for groundwater composition fed to the plant; and
- V. The optimal collection efficiency on a mass basis for total VOCs, 1,2-dichloroethane and vinyl chloride.

U5 Best practice Benchmarking for Steam Stripper Unit

U5.1 Objective

The objective of this PRP is to benchmark the optimised performance of the steam stripper unit (SSU) against world's best practice for control of 1,2-dichloroethane and vinyl chloride emissions.

U5.2 Best Practice Benchmarking Report

By 1 January 2005, the licensee must submit in writing to the *Manager Sydney Industry PO Box 668 Parramatta 2124*, a report detailing the results of the SSU benchmarking. The operation and emission limits for the SSU including the vapour recovery plant must be benchmarked against relevant international standards including (but not limited to) the following:

- I. The United States "Consolidated Final Air Rule: Synthetic Organic Chemical Manufacturing Industry". Particular attention should be paid to Section 65.63(2), which prescribes a requirement to reduce emissions by at least 98 weight percent, or to a concentration of 20 ppmv, whichever is less stringent.
- II. The United States "National Emission Standard for Vinyl Chloride". Particular attention should be paid to Section 61.65(4), which prescribes an emission limit for vinyl chloride of 10 ppm (3-hr average) for control systems serving vents in vinyl chloride service.
- III. The Californian South Coast Air Quality Management District "Rule 11163 - Control of Vinyl Chloride Emissions". Particular attention should be paid to paragraph (e) of this rule, which prescribes an emission limit for vinyl chloride of 50 grams per hour.
- IV. OSPAR Decision 98/4 on Emission and Discharge Limit Values for the Manufacture of Vinyl Chloride Monomer (VCM) including Manufacture of 1,2-dichloroethane (EDC). Particular attention should be paid to Section 3.2 which prescribes an emission limit for vinyl chloride of 5 mg/m³ (annual average)
- V. PARCOM Recommendation 96/2 Concerning Best Available Techniques for the Manufacture Vinyl Chloride Monomer (VCM).

U6 Measures to achieve worlds best practice

U6.1 Objective

The objective of this PRP is to identify measures that could be implemented to achieve worlds best practice control of 1,2-dichloroethane and vinyl chloride emissions from the steam stripper unit (SSU).

U6.2 Best Practice Benchmarking Report

By 1 April 2005, the licensee must submit in writing to the *Manager Sydney Industry PO Box 668 Parramatta 2124*, a report detailing measures and a timetable for implementation of those measures that could be implemented to achieve worlds best practice control of 1,2-dichloroethane and vinyl chloride emissions. The report must contain a number of different options for improving the performance of the SSU. Timetables for implementation of each option must be provided.

U7 Requirement to achieve worlds best practice

U7.1 Objective

The objective of this PRP is to ensure that emissions of 1,2-dichloroethane and vinyl chloride from the SSU satisfy or are close to satisfying worlds best practice should the SSU be required to operate beyond 1 October 2005.

U7.2 Issuing of a Direction to Improve SSU Performance towards Best Practice

Based upon the report submitted to the EPA as required by Condition U4.2, the EPA may direct the licensee to undertake any necessary works to upgrade the SSU so that emissions of 1,2-dichloroethane and vinyl chloride achieve emission values approaching or able to achieve worlds best practice emission values within a timetable specified in accordance with this condition.

Under this direction, the EPA may also vary the licence limits as specified in Condition L3.6 and L4.5 from a date or dates as may be specified in the direction issued under this Condition.

U8 Air Stripping Unit

The objective of this PRP is to permit the licensee to conduct a series of pilot scale trials to optimise certain aspects of the design of the Air Stripping Unit (ASU) associated with the proposed Groundwater Treatment Plant (GTP).

U8.1 General requirements

1. These trials must be conducted for a period of four (4) weeks only unless otherwise approved in writing by the EPA.

2. The licensee must install an ASU in accordance with the information submitted to the EPA on 30 September 2004 in a document referred to as the ASU proposal and the supplementary information submitted to the EPA on 22 October 2004.
3. Air emissions emitted from the ASU must be directed to flow through activated carbon beds/filters prior being discharged to atmosphere via a stack.
4. The stack installed to serve the activated carbon beds/filters must be 5 metres high and its diameter must be 0.1 metre.
5. Any air impurities emitted from the stack must not have VOC concentration higher than 50 ppm.
6. The licensee must conduct continuous monitoring for VOC by PID sensor installed in the carbon bed interspace.
7. The licensee must provide the EPA with results of the trials within two weeks of the last day of the trial period.

Special conditions

E1 Delineation and remediation of the source of Hexachlorobutadiene (HCBT) and associated compounds in the vicinity of the Hexachlorobenzene (HCB) encapsulation cell

E1.1 By **23 April 2004**, the licensee must submit a report to Manager Sydney Industry, PO Box 668 Parramatta 2124 containing the following information:

- (a) A summary of all groundwater and soil sampling results to date relating to HCBT and associated compounds within the vicinity of the area known as the HCB encapsulation cell. All sampling methodology, analytical QA/QC results associated with the sampling and detection of HCBT and associated compounds must be included.
- (b) An interpretation of those results to determine the extent of soil and groundwater contamination by HCBT and associated compounds, within the vicinity of the area known as the HCB car park encapsulation.
- (c) An assessment of risk and classification of the impacted materials, as a waste material and with regard to potential for movement of groundwater contamination and environmental impacts off-site.
- (d) Details of and justification for the remediation works option(s) proposed to remove and/or minimise the risks identified in condition E1.1 (c) above including timetables for completion of works, including further investigations as required to enable confirmation of the contamination mechanism to enable selection of effective

remediation works option(s). This may include but is not limited to the option of removal and appropriate storage and/or disposal of all or part of the impacted materials in accordance with NSW waste regulations.

E2 Progress reporting on remediation works to remove the source of HCBd and associated compounds

- E2.1** Every **six weeks after 23 April 2004**, until the completion of the remediation works option identified in E1.1 (d), the licensee must submit a report to Manager Sydney Industry, PO Box 668 Parramatta containing the following information:
- (a) Progress report on remediation works identified in Condition E1.1(d), which may include but not be limited to the option of removal and appropriate storage and/or disposal of all or part of the impacted materials.
 - (b) Confirmation that the works have been undertaken in accordance with the NSW waste management regulations.
 - (c) Results of any additional monitoring or alternative works to demonstrate as far as practical that this action has been effective in removing the source that led to the detection of HCBd in groundwater at the groundwater monitoring point at WG 95S.
 - (d) An interpretive report on the results of groundwater and/or soil monitoring and an assessment of the effectiveness of the remediation works to achieve an HCBd groundwater concentration not greater than 0.04µg/L at the boundary of the premises.

Note: the above concentration is a low reliability trigger value taken from ANZECC/ARMCANZ 2000 water quality guidelines. Exceedances of such levels trigger further investigation.

E3 Ongoing groundwater and soil monitoring to confirm the integrity of the HCB car park encapsulation cell

- E3.1** By **1 July 2004 and on a quarterly basis thereafter** until the completion of the remediation works option identified in E1.1 (d), the licensee must submit a progress report to Manager Sydney Industry, PO Box 668 Parramatta containing the following information:
- (a) The results of a program of monitoring (including groundwater and/or other appropriate methods) to demonstrate to the maximum extent practicable:
 - that the integrity of the HCB encapsulation cell is not compromised; and
 - that there are no other HCBd sources outside of the cell in the vicinity of the encapsulation cell.

- (b) A timetable for undertaking this future monitoring, where the groundwater monitoring must be completed at a minimum of once every three months for the first year and every six months thereafter, unless otherwise agreed in writing by the EPA.
- (c) An interpretive comment on the monitoring results including an assessment, to the maximum extent practicable, on whether the integrity of the HCB encapsulation cell has been impacted or whether there is any evidence of HCB outside the cell.

E4 Proposals for future works

E4.1 By **1 December 2004**, the licensee must submit a report to the Manager Sydney Industry, PO Box 668 Parramatta 2124, containing the following information :

- a) Proposals, including timetables for any future works that may be implemented to more effectively rectify the HCB groundwater and soil contamination.
- b) Confirmation, to the maximum extent practicable, that the integrity of the HCB encapsulation cell is not compromised and that there are no other sources of impacted material outside of the cell.
- c) Recommendations for any changes that should be made to the remediation works option identified in E1.1(d) together with timetables for implementation of those changes.

Note : For the purposes of all special condition(s) above:

'Impacted materials' is defined as: any materials contaminated by HCB and/or associated compounds.

'HCB encapsulation cell' is defined as: the HCB encapsulation cell that lies beneath the car park on the North East boundary of the Orica premise as shown on map Fig 4.1 from "HCB Encapsulation Groundwater Monitoring Report No 7" dated 28 August 2003.

E5 Supply of air quality modelling report of air emissions

E5.1 Objective

The objective of this special condition is to require the supply of an air emission modelling report.

E5.2 Air Emission Modelling Report

On or before *1 October 2004*, the licensee must submit in writing to the *Manager Sydney Industry PO Box 668 Parramatta 2124*, a report containing the results of air emission modelling for air emissions from the steam stripper unit (SSU). The report must be prepared in accordance with the EPA's *Approved Methods and Guidance – For the Modelling and Assessment of Air Pollutants in New South Wales*. The report must provide all items as specified in Section 10 of that Guideline.

E6 Emission Limits Based upon minimum plant performance

E6.1 Objective

The objective of this Special Condition is to develop 100th percentile concentration limits for total VOCs, 1,2-dichloroethane and vinyl chloride, based on minimum plant performance for the steam stripper unit (SSU).

E6.2 Emission Limits

On or before *1 October 2004*, the licensee must submit in writing to the *Manager Sydney Industry PO Box 668 Parramatta 2124*, a report proposing emission limits for the SSU. The report must include, but not be limited to, the following:

- I. emission limits based on the expected minimum plant performance for total VOCs, 1,2-dichloroethane (EDC) and vinyl chloride;
- II. a justification that the emission limits represent the minimum level of performance that can be achieved by the SSU;
- III. a demonstration that the emission limits are consistent with the proposed bed regeneration trigger level;
- IV. a justification that the proposed bed regeneration trigger level is as low as practicable; and
- V. a procedure for assessment of deterioration of bed performance and bed replacement program.

E7 Emission monitoring plan

E7.1 Objective

The objective of this special condition is to prepare a plan to continuously monitor the mass and concentration of 1,2-dichloroethane and vinyl chloride and other air pollutants from the SSU.

E7.2 Emission Monitoring Plan

On or before *1 October 2004*, the licensee must submit in writing to the *Manager Sydney Industry PO Box 668 Parramatta 2124*, a report detailing the proposed methods to continuously monitor VOCs and the mass and concentration of 1,2-dichloroethane and vinyl chloride emissions from the SSU. Published standard methods must be used wherever practicable. A detailed justification must be provided where it is not practicable to use a standard published method, or where a deviation from the method is required.

E8 Emergency release emission management plan

E8.1 Objective

The objective of this special condition is to prepare a plan for the licensee to develop a system for managing the operation of all emergency vent discharge points in the transfer piping and steam stripper unit (SSU). The management system must include an appropriate monitoring system that has been designed to assess the performance of the system against best practice.

E8.2 Emergency Release Emission Management Plan

On or before *1 October 2004*, the licensee must submit in writing to the *Manager Sydney Industry PO Box 668 Parramatta 2124*, a report detailing the system proposed to manage the incidence of emergency venting of air emissions from the groundwater piping system and SSU. The plan must outline an appropriate monitoring system to assess the performance of the management system against best practice. The management plan must also identify options to reduce air emissions from emergency venting activities.

For the purpose of this condition, an emergency release is any release of gaseous material from the piping and SSU other than from the discharge point associated with the vapour recovery unit.

E9 AUDITS AND REVIEWS

The objective of this condition is:

- To conduct a series of ongoing independent audits to validate the predictions contained in the Environmental Impact Statement (EIS) submitted to the Department of Environment and Conservation (DEC) on 15 November 2004 and compliance with this licence, and to the extent required by any other approval, compliance with those approval conditions relating to the project.
- To conduct environmental reviews with the aim of optimising performance; and
- To conduct engineering audits to ensure the performance of the plant will not deteriorate in the longer term.
- To identify remedial measures that can be implemented in the event an audit shows a discrepancy between actual and predicted performance.

This condition comprises two parts:

- Part A - Validation Audit and Environmental Review
- Part B - Engineering Audit

PART A - VALIDATION AUDIT & ENVIRONMENTAL REVIEW

General Requirement

The licensee must undertake comprehensive validation audits and environmental reviews of the works undertaken in accordance with the EIS.

The auditor must prepare a written report on the validation audit and environmental review for submission to the DEC, Department of Infrastructure, Planning and Natural Resource (DIPNR), Sydney Ports Corporation, Sydney Water Corporation, NSW Maritime, City of Botany Council, Independent Monitoring Committee and make this report available for public inspection on request.

The single report must be submitted which includes all the validation audit and environmental review requirements of this licence and to the extent required by any other approval, compliance with those approval conditions relating to the project.

The report must be submitted with each Annual Return for the first two reporting periods during which the groundwater treatment plant has commenced operation. The ongoing necessity for this requirement will be reviewed in consultation with the independent monitoring committee and taking into account the success of the performance of the groundwater treatment plant.

Note: The Environment Protection Authority (EPA) may require the licensee to undertake works to address the findings or recommendations presented in the Report as a requirement of this license. Any such works must be completed within such time as the EPA may agree.

Each Validation Audit and Environmental Review must include the following components specified in Conditions E9.1 and E9.2:

- Validation Audit
- Environmental Review

E9.1 VALIDATION AUDIT

The licensee must engage (and bear the full cost of), an independent and suitably qualified auditor to undertake comprehensive validation audits of the project.

The auditor must:

- be a certified environmental auditor who has gained certification from a certification body (such as Registrar Accreditation Board and Quality Society of Australasia international (RABOSA) formerly known as (QSA) who have been accredited by the Joint Accreditation Services Australia & New Zealand (JAS/ANZ);
- have Lead Environmental Auditor certification; and
- have held lead environmental certification for at least 2 years.

The licensee must consult with the Independent Monitoring Committee in the selection of the auditor.

The validation audit must:

- (a) be carried out in accordance with *ISO 19011:2003 - Guidelines for Quality and/ or Environmental Management Systems Auditing*;
- (b) take into account representative operating conditions including worst case scenarios which relate to the groundwater treatment plant;
- (c) assess compliance with the requirements of this license, and to the extent required by any other approval, compliance with those approval conditions relating to the project;
- (d) assess the project against the predictions made and conclusions drawn in the EIS and supporting documents prepared by the licensee; and
- (e) include the following components:
 - Air Emission Validation Program;
 - Water Discharge Validation Program;
 - Noise Validation Program; and
 - Thermal Oxidation Unit Validation Program.

E9.1.1 Air Emission Validation Program

The licensee must conduct an Air Emissions Validation Program which includes but is not be limited to the following:

- (a) Ensures the range of all air pollutants monitored are continually reviewed and modified where necessary to ensure the licensee is capable of detecting the presence of all significant air pollutants not already specified in the licence;
- (b) Make recommendations about changes to existing monitoring, including substances monitored and frequency of monitoring;
- (c) Validate the conclusions of the human health risk assessment that was undertaken as part of the EIS using monitoring data collected under this licence.

- (d) Validate the conclusions of the air quality impact assessment that was undertaken as part of the EIS using monitoring data collected under this licence; and
- (e) Preparation and implementation of a comprehensive odour detection program. This must include but not be limited to:
 - (i) A Leak Detection and Repair (LDAR) Program to detect and minimise fugitive Volatile Organic Compounds (VOC) emissions from the groundwater treatment plant and associated plant and equipment in accordance with US EPA Method 21 – Determination of Volatile Organic Compound Leaks (40 CFR Part 60, Appendix A, Method 21) or such other method agreed in writing by the EPA; and
 - (ii) An overall odour detection program, including representative offsite observations by independent and suitably qualified persons to identify and prevent unanticipated odour sources.

E9.1.2 Water Discharge Validation Program

The licensee must conduct a Water Discharge Validation Program which must include but not be limited to the following:

- (a) Ensures the range of all water pollutants monitored are continually reviewed and modified where necessary to ensure the licensee is capable of detecting the presence of all significant water pollutants not already specified in the licence; and
- (b) Make recommendations about changes to existing monitoring, including substances monitored and frequency of monitoring.

E9.1.3 Noise Validation Program

The licensee must conduct a Noise Validation Program which must include but not be limited to the following:

- (a) Identification and ranking by sound power level (in 1/3 octave bands for any source with potentially undesirable noise character) all significant noise sources on the Groundwater Treatment Plant site;
- (b) Identification of all noise sensitive receivers that may be affected by the operation of the Groundwater Treatment Plant, and select an appropriate number of representative receiver locations to represent all sensitive receivers;
- (c) The results of all noise measurements undertaken to assess compliance with Condition L6.4 of the licence;
- (d) A statement of whether noise levels from all activities at the Groundwater Treatment Plant site comply with the specified noise limits at the representative receiver locations. The statement must take into account tonal, impulsive and short duration noises originating from the Groundwater Treatment Plant site;
- (e) Where noise levels have been assessed as exceeding allowable licence limits, a statement explaining the reason why this has taken place; and
- (f) A statement of what feasible and reasonable additional measures may be implemented to further reduce noise levels below those specified in the licence.

E9.1.4 Thermal Oxidation Unit Validation Program

The licensee must conduct an Thermal Oxidation Unit Validation Program which includes but is not be limited to the following:

- (a) Ensures that all parameters monitored comply with the Thermal Oxidation Unit lower limits specified in Condition L3.6 in the licence;
- (b) Reports the fraction of time the lower temperature limit specified in Condition L3.6 is not achieved within $\pm 50^{\circ}\text{C}$;
- (c) Correlates all dioxin air emissions data monitored at Point 9 in accordance with Condition M2.1 with temperature and flow rate data monitored at Point 10;
- (d) Quantitatively assess dioxin air emissions at Point 9 with the thermal oxidiser operating at or near 850°C , and
- (e) Where there are increases in dioxin air emissions at the lower temperature limit set at Point 10 (as investigated in (d) above), make recommendations to change the lower temperature limit set at Point 10 and associated operational procedures to prevent dioxin concentration increases at the recommended lower temperature limit.

Note: Quantitative assessment of dioxin at Point 9 is to be undertaken in accordance with the *Approved Methods for the Sampling and Analysis of Air Pollutants in NSW, 2000*, unless otherwise agreed by the EPA.

E9.2 ENVIRONMENTAL REVIEW

The licensee must conduct an Environmental Review which must include but not be limited to the following:

- (a) A review of complaints received and action taken by the licensee;
- (b) Summary of environmental monitoring required under the licence and to the extent required by any other approval, compliance with those approval conditions relating to the project;
- (c) Identification of trends in all monitoring data collected since the commencement of operation of the groundwater treatment plant;
- (d) A statement on the effectiveness of the overall environmental management and performance of the project;
- (e) The following programs:
 - Dioxin Minimisation & Management Program;
 - Groundwater Treatment Plant Water Reuse Strategy;
 - Groundwater Monitoring Program; and
 - Ambient Environmental Monitoring Program.

E9.2.1 Dioxin Minimisation and Management Program

The licensee must conduct a program that includes, but is not limited to the following:

- (a) An investigation into technical options and scientific developments which would allow continuous monitoring and or sampling of any dioxins emissions which may be emitted from the groundwater treatment plant;

- (b) An investigation of chemical and/or physical parameters which are likely to correlate with the actual or potential formation of dioxins and could be used as a surrogate indicator of dioxin formation in the groundwater treatment plant; and
- (c) Make recommendations about changes to existing monitoring, including substances monitored and frequency of monitoring;

E9.2.2 Groundwater Treatment Plant (GTP) Water Reuse Strategy

The licensee must conduct a program that investigates opportunities to maximize the reuse of treated water from the groundwater treatment plant and reduce the amount of treated water discharged to waters provided the reuse or reduction can be achieved in a safe and practical manner and it will provide the best environmental outcome, in the circumstances.

The program must include but need not necessarily be limited to the following:

- Characterisation of the treated water in terms of quality and quantity;
- Identification of potential uses of this treated water, taking into account relevant and recognised environmental and human health guidelines or standards to ensure it is appropriate for this use;
- Identification of options to beneficially reuse treated waters to minimise the amount of treated water being discharged;
- Assessment of the feasibility and cost of these options;
- Selection of options for implementation;
- Time table for implementation of the selected options; and
- Inclusion of any other relevant recommendations relating to treated water reuse.

The licensee must consult with the DEC, NSW Health Department, Sydney Water Corporation, Sydney Ports Corporation, Botany Bay Council, DIPNR and NSW Maritime on the development of the program.

E9.2.3 Groundwater Monitoring Program

The licensee must conduct a Groundwater Monitoring Program which must include but not be limited to the following:

- (a) Monitoring of groundwater to assess whether the extraction of groundwater will result in any actual or potential impacts to surface waters or habitats in the locality;
- (b) Review the conclusions of the groundwater assessments and modelling that was undertaken as part of the EIS, including using all monitoring data collected under this license or other approvals for this project;
- (c) include a mechanism to regularly review the effectiveness of the monitoring program to ensure it is effective in detecting the presence of actual or potential impacts not already identified; and

(d) Make recommendations about changes to existing monitoring and frequency of monitoring.

The program must be prepared and implemented in consultation with the DEC, DIPNR, Department of Primary Industry (DPI), Sydney Ports Corporation, Sydney Water Corporation, NSW Maritime and City of Botany Council.

E9.2.4 Ambient Environmental Monitoring Program

The licensee must conduct an Ambient Environmental Monitoring Program which must include but not be limited to the following

- (a) Develop and implement a program to monitor ecological health of habitats in the locality and water quality in the receiving environment, including specification of sampling locations, sampling frequencies and parameters to be tested.
- (b) Include quality control elements.
- (c) include monitoring sites at Penrhyn Estuary, Botany Bay and Bunnerong Canal as well as other relevant off site locations.
- (d) Assess whether the project will not result in any actual or potential impacts to surface waters or habitats in the locality from the operation of the groundwater treatment plant and associated plant and equipment.
- (e) Review the conclusions of the ecological and ambient water quality assessments that were undertaken as part of the EIS, including using monitoring data collected under this license or other approvals for this project.
- (f) include a mechanism to regularly review the effectiveness of the monitoring program to ensure it is effective in detecting the presence of actual or potential impacts not already identified; and
- (g) Make recommendations about changes to existing monitoring, including substances monitored and frequency of monitoring.

The program must be prepared and implemented in consultation with the DEC, DIPNR, DPI, Sydney Ports Corporation, Sydney Water Corporation, NSW Maritime and City of Botany Council.

PART B - ENGINEERING AUDIT

E9.3 General requirement

The licensee must make arrangements for, and bear the full cost of, an independent auditor to undertake engineering audits of the groundwater treatment plant and associated plant and equipment (including all control systems) to ensure it is maintained in a proper and efficient condition and operated in a proper and efficient manner with respect to its environmental and safety capability and performance.

Matters to be addressed in the audits must include but not be limited to:

- (a) Review of the frequency of inspections and maintenance programs to ensure they are effective in detecting actual or potential changes in the environmental and safety performance.
- (b) Review of procedures for detecting changes to the equipment which could impact on performance, including corrosion and wear; and
- (c) Review of results of internal inspections of all equipment, using video techniques where appropriate.

The licensee must consult with the Independent Monitoring Committee in the selection of the auditor.

The engineering audits must generate a report for submission to the DEC, DIPNR, Sydney Water Corporation, City of Botany Council, Community Liaison Group and available for public inspection on request.

The report must be submitted with each Annual Return

- At the end of every 5th reporting period, for the first 15 years of operation of the groundwater treatment plant; and then
- Every 2nd reporting period in which the plant remains in operation.

The EPA may require the licensee to undertake works to address the findings or recommendations presented in the Report as a requirement of this licence. Any such works shall be completed within such time as the EPA may agree.

E10 INDEPENDENT MONITORING COMMITTEE

E10.1 The licensee must establish and service an Independent Monitoring Committee with technical and community representatives. The licensee must provide monitoring information and reports and consult with this Committee as required by the relevant conditions of this licence.

Note: The Independent Monitoring Committee may be formed by the licensee in conjunction with the existing Community Liaison Group currently established and serviced by the licensee.

E11 FINANCIAL ASSURANCE

Requirement for works

The licensee must construct and operate the groundwater treatment plant referred to, and required by, the Environment Protection Authority (EPA) Notice of Clean-up Action issued on 26 September 2003 as subsequently varied, and this licence.

E11.1 Purpose of financial assurance

This licensee requires construction and operation of the groundwater treatment plant to complete the Botany groundwater clean-up project. The purpose of this project is to undertake remediation

work to address groundwater contamination caused by historical manufacturing activities undertaken at the Botany Industrial Park (former ICI site). The objective of this condition is to secure or guarantee funding for or towards the ongoing operating costs of the project, following construction of the groundwater treatment plant.

E11.2 Due date for financial assurance

The licensee must lodge a financial assurance in the form of a bank guarantee, a bond, or in another manner acceptable to the EPA by 30 November 2006.

The financial assurance must be maintained during the operation of the groundwater treatment plant and thereafter until such time as the EPA notifies the licensee in writing that it is satisfied that the contaminated groundwater has been appropriately remediated.

Expert advice to be provided to the EPA

The licensee must engage (and bear the full cost of) independent and suitably qualified experts to:

- Review and confirm the estimated annual and total remaining net operating and maintenance costs of the groundwater treatment plant and the associated monitoring and reporting costs over the life of the project, and
- Review and advise on the risks associated with the licensee's ability and commitment to meet those costs during the life of the project and the probabilities of those risks; and
- Review and advise on the technical and environmental risks if the licensee is unable to meet the operating costs during the life of the project and the probability of those risks.

The licence must provide the expert reports to the EPA, together with any written comments from the licensee about the appropriate form or amount of the financial assurance, by 30 June 2006.

Determination of financial assurance

The form and amount of the financial assurance will be determined by the EPA (and imposed by a subsequent licence condition), following the EPA's consideration of the expert reports on costs and risks and probabilities, and the licensee's submission on the appropriate form and amount of the financial assurance.

The EPA may require the financial assurance to be adjusted so that it keeps pace with inflation for so long as the EPA requires the financial assurance to remain in place. The EPA may review the financial assurance from time to time in light of the remaining works required to complete the remediation.

Appendices

APPENDIX 1

WASTE DESCRIPTIONS AND CORRESPONDING WASTE CODES

The waste descriptions and waste codes shown below must be used to identify hazardous, industrial and Group A wastes on the waste data form for movements of those wastes within NSW, and to identify controlled wastes on the waste transport certificate for those wastes moved between NSW and other States

and Territories. The waste codes must also be used to identify wastes when reporting the information required in the Tables in Appendix 2.

Description	Waste Code	Description	Waste Code
Acidic solutions or acids in solid form	B100	Organohalogen compounds - other than substances referred to in this list	M160
Animal effluent and residues (abattoir effluent, poultry and fish processing wastes)	K100	Perchlorates	D340
Antimony; antimony compounds	D170	Phenols, phenol compounds including chlorophenols	M150
Arsenic; arsenic compounds	D130	Phosphorus compounds excluding mineral phosphates	D360
Asbestos	N220	Polychlorinated dibenzo-furan (any congener)	M170
Barium compounds (excluding barium sulphate)	D290	Polychlorinated dibenzo-p-dioxin (any congener)	M180
Basic solutions or bases in solid form	C100	Residues from industrial waste treatment/disposal operations	T190
Beryllium; beryllium compounds	D160	Selenium; selenium compounds	D240
Boron compounds	D310	Sewage sludge and residues including nightsoil and septic tank sludge	K130
Cadmium; cadmium compounds	D150	Soils contaminated with a controlled waste	N120
Ceramic-based fibres with physico-chemical characteristics similar to those of asbestos	N230	Surface active agents (surfactants), containing principally organic constituents and which may contain metals and inorganic materials	M250
Chlorates	D350	Tannery wastes (including leather dust, ash, sludges and flours)	K140
Chromium compounds (hexavalent and trivalent)	D140	Tellurium; tellurium compounds	D250
Clinical and related wastes	R100	Thallium; thallium compounds	D180
Cobalt compounds	D200	Triethylamine catalysts for setting foundry sands	M230
Containers and drums which are contaminated with residues of substances referred to in this list	N100	Tyres	T140
Copper compounds	D190	Vanadium compounds	D270
Cyanides (inorganic)	A130	Waste chemical substances arising from research and development or teaching activities including those which are not identified and/or are new and whose effects on human health and/or the environment are not known	T100
Cyanides (organic)	M210	Waste containing peroxides other than hydrogen peroxide	E100
Encapsulated, chemically-fixed, solidified or polymerised wastes	N160	Waste from heat treatment and tempering operations containing cyanides	A110
Ethers	G100	Waste from manufacture, formulation and use of wood-preserving chemicals	H170
Filter cake	N190	Waste from the production, formulation and use of biocides and phytopharmaceuticals	H100
Fire debris and fire washwaters	N140	Waste from the production, formulation and use of inks, dyes, pigments, paints, lacquers and varnish	F100
Fly ash	N150	Waste from the production, formulation and use of organic solvents	G160
Grease trap waste	K110	Waste from the production, formulation and use of photographic chemicals and processing materials	T120
Halogenated organic solvents	G150	Waste from the production, formulation and use of resins, latex, plasticisers, glues and adhesives	F110
Highly odorous organic chemicals (including mercaptans and acrylates)	M260	Waste from the production and preparation of pharmaceutical products	R140
Inorganic fluorine compounds excluding calcium fluoride	D110	Waste mineral oils unfit for their original intended use	J100
Inorganic sulfides	D330	Waste oil/water, hydrocarbons/water mixtures or emulsions	J120
Isocyanate compounds	M220	Waste pharmaceuticals, drugs and medicines	R120
Lead; lead compounds	D220	Waste resulting from surface treatment of metals and plastics	A100
Mercury; mercury compounds	D120	Waste tarry residues arising from refining, distillation, and any pyrolytic treatment	J160
Metal carbonyls	D100	Waste substances and articles containing or contaminated with solubilised bishemicals	M100

Nickel compounds	D210	contaminated with polychlorinated biphenyls, polychlorinated naphthalenes, polychlorinated terphenyls and/or polybrominated biphenyls	
Non toxic salts	D300		
Organic phosphorous compounds	H110		
Organic solvents excluding halogenated solvents	G110	Wool scouring wastes Zinc compounds	K190 D230

Appendix 2

Table 1

[The purpose of Table 1 is to provide information on the total amount of waste moved by each transporter from waste activities in NSW.]

1. The licensee must provide a copy of the information in the following table for each transporter used by the licensee in the reporting period.

Waste Activities Table 1: Waste Movements By Transporter and Waste Category			
Name of Licensed Waste Activity:		Waste Activity Licence No.:	
Reporting Period:		ANZSIC Code for Waste Activity:	
Name of Transporter:		Licence No. of Transporter	
Waste class	Waste Code	Amount of Waste Transported in Reporting Period (tonnes)	
<i>Hazardous Non-Liquid Waste</i>	<i>Code for each waste of this class</i>	<i>Total Weight for waste of each code</i>	
<i>Hazardous Liquid Waste</i>	<i>Code</i>	<i>Weight</i>	
	..	..	
	<i>Code</i>	<i>Weight</i>	
<i>Industrial Non-Liquid Waste</i>	<i>Code</i>	<i>Weight</i>	
	..	..	
	<i>Code</i>	<i>Weight</i>	
<i>Group A Liquid Waste</i>	<i>Code</i>	<i>Weight</i>	

	"	"
	Code	Weight

NOTES:

*Waste code refers to the codes listed in Appendix 1 of this licence and entered on waste data forms.
Waste class refers to the classification of waste in accordance with Schedule 1 of the Protection of the Environment Operations Act 1997 and its regulations.*

ANZSIC code means the Australian and New Zealand Standard Industrial Classification code published by the Australian Bureau of Statistics.

Table 2:

[The purpose of Table 2 is to provide information on the total amount of waste sent to each destination within NSW. Cross-referencing by ANZSIC code provides data on which types of industry are sending wastes to disposal and treatment facilities.]

1. The licensee must provide a copy of the information in the following table for each destination within NSW used by the licensee in the reporting period for the purposes of the receipt of controlled waste.

Waste Activities Table 2: Waste Movements By Destination (within NSW) and Waste Category		
Name of Licensed Waste Activity:		Waste Activity Licence No.:
Reporting Period:	ANZSIC Code for Waste Activity	
Destination:		
Waste class	Waste Code	Amount of Waste Transported in Reporting Period (tonnes)
Hazardous Non-Liquid Wastes	Code for each waste of this class	Total Weight for waste of each code
	..	..
	Code	Weight
Industrial Non-Liquid Wastes	Code	Weight
	..	..
	Code	Weight
Hazardous Liquid Wastes	Code	Weight
	..	..
	Code	Weight
Group A Liquid Wastes	Code	Weight
	..	..
	..	..

NOTES:

*Waste code refers to the codes listed in Appendix 1 of this licence and entered on waste data forms.
Waste class refers to the classification of waste in accordance with Schedule 1 of the Protection of the Environment Operations Act 1997 and its regulations.*

ANZSIC code means the Australian and New Zealand Standard Industrial Classification code published by the Australian Bureau of Statistics.

Table 3:

[The purpose of Table 3 is to provide information on the total amounts of controlled wastes sent from NSW licensed waste activities to other States and Territories. Cross-referencing by ANZSIC code allows data on which types of industries are sending wastes interstate.]

1. The licensee must provide a copy of the information in the following table for each destination outside NSW used by the licensee in the reporting period for the purposes of the receipt of controlled waste.

Waste Activities Table 3: Controlled Waste Movements By Interstate Destination and Waste Category			
Name of Licensed Waste Activity:		Waste Activity Licence No.:	
Reporting Period:		ANZSIC Code Waste Activity:	
Destination State or Territory:		Destination Facility	
Waste class	Waste Code	Amount of Waste Transported in Reporting Period (tonnes)	
Hazardous Non-Liquid Waste	Code for each waste of this type	Total Weight for waste of this code	
	"	"	
	Code	Weight	
Industrial Non-Liquid Waste	Code	Weight	
	"	"	
	Code	Weight	
Hazardous Liquid Waste	Code	Weight	
	"	"	
	Code	Weight	
Group A Liquid Waste	Code	Weight	
	"	"	
Other Types of Waste (eg Group B and C Liquid Wastes, Used Tyres)	Code	Weight	

[NOTES: Waste code refers to the codes listed in Appendix 1 of this licence and entered on the waste transport certificates.]

Waste class refers to the classification of waste in accordance with Appendix 1 of the Protection of the Environment Operations Act 1997 and its regulations.
ANZSIC code means the Australian and New Zealand Standard Industrial Classification code published by the Australian Bureau of Statistics].

Appendix 3

Table 1
Instructions:

[The purpose of Table 1 is to provide information on the total amounts of hazardous, industrial and group A wastes received at NSW licensed facilities from both EPA licensed and non-licensed waste activities. Cross referencing this by ANZSIC code for the waste generating activity will allow information to be collected on which types of wastes are produced by specific industry sectors.]

1. Separate copies of table 1 should be completed so as to provide information on the total amounts of waste transported from the following:
 - (i) licensed waste activities; and
 - (ii) non-licensed waste activities,
 in the reporting period.

Destinations Table 1: Waste Movements By Activity Licence Status and ANZSIC Code			
Name of Licensed Facility:		Facility Licence No.:	
Reporting Period:			
[Licensed] / [Non-licensed] Waste Activities			
Waste Type	Australian and New Zealand Standard Industry Code	Amount of Waste Accepted in Reporting Period (tonnes)	
Hazardous non-liquid Waste	ANZSIC Code for waste generating activity	Total Weight received of this type of waste for each ANZSIC code	
Hazardous liquid Waste	ANZSIC Code	Weight	
Industrial non-liquid Waste	ANZSIC Code	Weight	
Group A liquid Waste	ANZSIC Code	Weight	

[Note:

Waste code refers to the codes listed in Appendix 1 and entered on waste data forms.

Waste class refers to the classification of waste in accordance with Schedule 1 of the Protection of the Environment Operations Act 1997 and its regulations.

ANZSIC code means the Australian and New Zealand Standard Industrial Classification code published by the Australian Bureau of Statistics.]

Table 2**Instructions:**

[The purpose of Table 2 is to provide information total amounts of amounts of hazardous, industrial and group A wastes received at NSW licensed facilities from both EPA licensed and non-licensed waste activities. Cross referencing this by waste code for the waste generating activity will allow information to be collected on the specific wastes within each broad waste type]

1. Two copies of table 2 should be completed and contain information on the total amounts of waste transported from:
 - (i) licensed waste activities; and
 - (ii) non- waste activities,
 in the reporting period.

Destinations Table 2: Waste Movements By Activity Licence Status and Waste Code		
Name of Licensed Facility	Facility Licence No.:	
Reporting Period:		
[Licensed] / [Non-licensed] Waste Activities		
Waste Type	Waste Code	Amount of Waste Accepted at Facility in Reporting Period (tonnes)
Hazardous Non-liquid Wastes	Code of each waste	Total weight of each waste
	"	"
	Code	Weight
Hazardous liquid Wastes	Code	Weight
	"	"
	Code	Weight
Industrial Non-liquid Wastes	Code	Weight
	"	"
	Code	Weight
Group A liquid Wastes	Code	Weight
	"	"

[Note:

Waste code refers to the codes listed in Appendix 1 and entered on waste data forms.

Waste class refers to the classification of waste in accordance with Schedule 1 of the Protection of the Environment Operations Act 1997 and its regulations.

ANZSIC code means the Australian and New Zealand Standard Industrial Classification code published by the Australian Bureau of Statistics.]

Table 3**Instructions:**

[The purpose of Table 3 is to provide information on the total amounts of controlled waste coming into NSW from other States or Territories and received by EPA licensed facilities]

1. A copy of the following table must be provided by the licensee for each state outside of NSW, from which the licensee received controlled waste in the reporting period.

Destinations Table 3: Waste Movements Interstate Movements by State or Territory of Origin and Waste Code		
Name of Licensed Facility:		Facility Licence No.:
Reporting Period:		
State or Territory of Origin:		
Waste Class	Waste Code	Amount of Waste Accepted at Facility in Reporting Period (tonnes)
Hazardous non-liquid Wastes	<i>Code of each waste of this waste class received</i>	<i>Total weight of waste received</i>
	"	"
	<i>Code</i>	<i>Weight</i>
Hazardous liquid Wastes	<i>Code</i>	<i>Weight</i>
	"	"
	<i>Code</i>	<i>Weight</i>
Industrial non-liquid Wastes	<i>Code</i>	<i>Weight</i>
	"	"
	<i>Code</i>	<i>Weight</i>
Group A liquid Wastes	<i>Code</i>	<i>Weight</i>
	"	"
Other Wastes (Group B and C Liquid Wastes, Used Tyres)	<i>Code of each waste</i>	<i>Total weight of each waste</i>

[NOTES:

Waste code refers to the codes listed in Appendix 1 of this licence and entered on the waste transport certificates.

Waste class refers to the classification of waste in accordance with Schedule 1 of the Protection of the Environment Operations Act 1997 and its regulations.]

Table 4

Instructions:

[The purpose of Table 4 is to provide information on the total amounts of hazardous, industrial and group A wastes received at EPA licensed facilities in NSW from waste generating activities in other States and Territories. Cross referencing this by ANZSIC code for the waste generating activity will allow information to be collected which types of wastes are produced by specific industry sectors.]

1. A copy of the following table must be provided by the licensee for each state outside of NSW, from which the licensee received controlled waste in the reporting period.

Destinations Table 4: Waste Movements Interstate Movements by State or Territory of Origin and ANZSIC Code		
Name of Licensed Facility:		Facility Licence No.:
Reporting Period:		
State or Territory of Origin:		
Waste Class	Australian and New Zealand Standard Industry Code	Amount of Waste Accepted at Facility in Reporting Period (tonnes)
Hazardous non-liquid Wastes	ANZSIC Code for waste generating activity	Total waste of this class originating from premises having this ANZSIC code
	ANZSIC Code	Weight
Industrial non-liquid Wastes	ANZSIC Code	Weight
Hazardous liquid Wastes	ANZSIC Code	Weight
Group A liquid Wastes	ANZSIC Code	Weight
Other Wastes (eg Group B and C Liquid Wastes, Used Tyres)	ANZSIC Code	Weight

[NOTES:1. ANZSIC Code is the Australian and New Zealand Standard Industry Code (or Waste origin code) supplied by waste activities on included on the waste transport certificates.

Waste class refers to the classification of waste in accordance with Schedule 1 of the Protection of the Environment Operations Act 1997 and its regulations.]

Dictionary

General Dictionary

In this licence, unless the contrary is indicated, the terms below have the following meanings:

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 1998
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 1998
assessable pollutants	Has the same meaning as in the Protection of the Environment Operations (General) Regulation 1998
BOD	Means biochemical oxygen demand
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 1998.
flow weighted composite sample	Means a sample whose composites are sized in proportion to the flow at each composites time of collection.
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
industrial waste	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997
inert 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 1998
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.
reprocessing of 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
solid waste	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997
treatment of waste	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997
TSP	Means total suspended particles
TSS	Means total suspended solids

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 code	Means the waste codes listed in Appendix 5 of the EPA document A Guide to Licensing Part B.
waste type	Means Group A, Group B, Group C, inert, solid, industrial or hazardous waste

Model Licence Dictionary

In this licence, unless the contrary is indicated, the terms below have the following meanings:

Agency	A body or bodies of a participating State or a participating Territory which that State or Territory has nominated for the purposes of the NEPM.
ANZIC Code	The Australian and New Zealand Standard Industrial Classification Code published by the Australian Bureau of Statistics
Chemical control order (CCO)	An order under sections 22 and 23 of the Environmentally Hazardous Chemicals Act 1985.
Consignee	The person to whom the waste is dispatched, and includes: (a) in the case of a waste facility that is licensed - the occupier; (b) in the case of a person carrying on mobile waste processing that is licensed - the person operating the mobile place; (c) in the case of a place that can otherwise lawfully be used as a waste facility for that waste - the owner or occupier of that premises.
Consignment	One or more shipments of a specified waste dispatched to a particular destination.
Consignment authorisation	An approval which includes a unique identifier granted by an agency, or a facility delegated by an agency, in the jurisdiction of destination to allow the movement of controlled waste.
Consignor	The occupier of the premises from which the waste is transported.
Controlled waste	Any waste included List 1 of Schedule A of the NEPM, provided that the waste possesses one or more of the characteristics in List 2, of Schedule A of the NEPM.
Date of dispatch	The date on which a load of waste is removed from the premises.
Destination	Where hazardous, industrial or Group A wastes are transported within NSW, the place described in the waste data form as the destination for the waste. Where controlled wastes are transported between NSW and another participating State or Territory, the place described in Part 3 of the waste transport certificate as the facility receiving the waste.
Facility	A place where controlled wastes are received.
Facility Operator	A person in charge of a facility.
Jurisdiction of destination	In relation to a particular consignment of waste means the State or Territory in which the facility is located to which the waste is intended to be transported.
Load	The amount of a consignment of waste placed on a vehicle for any single dispatch from the premises at which it was generated or stored.
Load number	A consecutive number identifying each load of waste within a consignment and starting with 1 for the first load of each consignment. One or more loads may make up a consignment.
NEPM	National Environment Protection (Movements of Controlled Wastes between States and Territories) Measure 1998.
Non-liquid waste	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997
Participating State or Territory	A State or Territory that is (a) a party to the Intergovernmental Agreement on the Environment made on 1 May 1992 between the Commonwealth, the States, the Australian Capital Territory, the Northern Territory and the Australian Local Government Association, a copy of which is set out in the Schedule to the Commonwealth Act; and (b) in which an Act that corresponds to the National Environment Protection Council Act 1994 of the Commonwealth is in force in accordance with the Agreement.
Recycling of waste	The processing of waste into a similar non-waste product.

Regulation	The Protection of the Environment Operations (Waste) Regulation 1996.
Transporter	A person responsible for moving controlled wastes either from one participating State or Territory to another or through participating States or Territories.
Waste activity	An activity, whether required to be licensed or not, carried on for business or other commercial purposes, that involves the generating or storage of any of the following waste classes: (a) hazardous waste, (b) industrial waste, (c) Group A waste.
Waste class	Means either hazardous, industrial or Group A waste.
Waste data form	A certificate in the form approved by the EPA.
Waste guidelines	The document called <i>Environmental Guidelines: Assessment, Classification and Management of Liquid and Non-Liquid Wastes</i> issued by the EPA and in force as at 1 July 1999.
Waste producer	Means the licensee.
Waste transport certificate	A certificate in the form approved by the EPA as fulfilling the requirements of Schedule B of the National Environment Protection (Movement of Controlled Wastes between States and Territories) Measure 1998.

Mr Mark Gifford

Environment Protection Authority

(By Delegation)

Date of this edition - 03-Nov-2004

Licence Variation

Section 58(5) Protection of the Environment Operations Act 1997

End Notes

- | | |
|---|--|
| 1 | Licence varied by notice 1000723, issued on 01-Aug-2000, which came into effect on 22-Aug-2000. |
| 2 | Licence varied by 010937 (ALaN) s.58 notice, issued on 01-Sep-2000, which came into effect on 26-Sep-2000. |
| 3 | Licence varied by notice 1008660, issued on 27-Jul-2001, which came into effect on 21-Aug-2001. |
| 4 | Licence varied by notice 1014464, issued on 15-Jan-2003, which came into effect on 09-Feb-2003. |
| 5 | Licence varied by notice 1025431, issued on 24-Dec-2003, which came into effect on 18-Jan-2004. |
| 6 | Licence varied by notice 1035261, issued on 30-Apr-2004, which came into effect on 30-Apr-2004. |
| 7 | Licence varied by notice 1040183, issued on 07-Sep-2004, which came into effect on 07-Sep-2004. |
| 8 | Licence varied by notice 1041498, issued on 26-Oct-2004, which came into effect on 27-Oct-2004. |
| 9 | Licence varied by notice 1041954, issued on 03-Nov-2004, which came into effect on 03-Nov-2004. |