

APPENDIX F

Environmental Management Plan

Endo-Technik-Nord – Environment Management Plan

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Endo-Technik-Nord – Environment Policy

Endo-Technik-Nord is a small domestic meat processing facility situated 120km south of Sydney between the townships of Kiama & Gerringong.

Endo-Technik-Nord employs employees within the local area. The site is located at 96 Rose Valley Road, Rose Valley, NSW. Our close proximity to both Kiama & Gerringong, combined with an obvious shortage of land & the environmentally sensitive nature of the local community, are all factors highlighting our need for environmental management.

Given the nature of meat processing, environmental issues associated with liquid & solid waste, gaseous emissions, noise etc are of extreme importance.

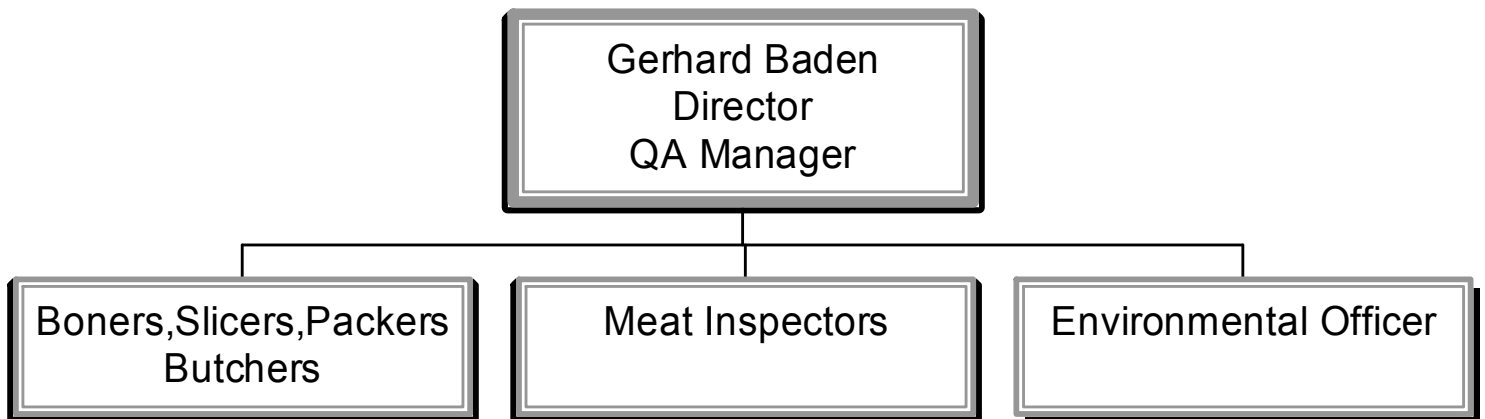
We aim to address these issues through the development of an Environmental Management System. This system will lay the foundation for not only meeting legislative requirements, but more importantly effectively managing & controlling our environmental outputs. In addition the system shall enable us to continually work at reducing waste through the introduction of improved technologies, pollution reduction programs, training, recycling & good work practices.

It is hoped that by actively embracing the principles of Environmental Management we can operate in a manner which minimises any impact on the local environment & ensures the long term sustainability & viability of this site.

Gerhard Baden

Endo-Technik-Nord
Director

Endo-Technik-Nord – Company Structure



Site Map



Job Description – Environment Officer

Responsibilities & Authority

- Ensure the Environmental Management System is established, implemented & maintained.
- Have a thorough understanding of the licence conditions set by the Department of Environment & Conservation (DEC).
- Liaise on behalf of the company with the DEC, other regulatory Authorities & external consultants.
- Notify DEC re any breach of licence condition.
- Keep abreast of statutory requirements & ensure that the environmental Management system is kept up to date with legislative requirements.
- Review environmental monitoring data & records
- Liaise with management to develop & implement pollution reduction programs
- Ensure all equipment associated with EMS is maintained in working order.
- Prepare, keep, test & implement a Pollution Incident Response Management Plan

Specific Environmental Duties

- Document any external complaint in complaints register.
- Purchasing of stores associated with environmental management.
- Keep documented records of all dealings with the DEC.
- Complete all documentation associated with DEC Licence renewal.

Job Description – Director

Responsibilities & Authority

- To stop production if there is a risk to the environment.
- Immediately implement Pollution Incident Response Plan if a pollution incident occurs
- Must have a thorough understanding of the Environment Management Plan as well as DEC Licence conditions & Due Diligence Program
- Liaise on behalf of the company with the DEC, Sydney Water & external consultants.
- Manage waste water irrigation in accordance with DEC licence conditions.
- In particular:
 - There must be no discharge of wastewater to any watercourse or to any area other than the defined wastewater disposal area.
 - Irrigation of wastewater must not be carried out if soil moisture conditions are such that surface run off or ponding is likely to occur.
 - The irrigation area must be maintained in a proper & efficient condition so as to provide adequate percolation, evaporation & transpiration of the effluent.
- Educate staff about the environmental issues facing the business.

Specific Environmental Duties

- Ensure environment complaints are documented & corrective actions are implemented & monitored.
- Document records of all dealings with the DEC.

Job Description – Director

Responsibilities & Authority

- Signs environmental policy
- Makes available resources essential to the implementation & control of the Management system

Job Description – Slaughterfloor Operator

Responsibilities & Authority

- Notify management of any spillage, blockage or mechanical problem with equipment eg pumps, drain pipes etc

Specific Environmental Duties

- Monitoring contrashear operation during the day

Job Description – QA Manager

Responsibilities & Authority

- In the absence of the Director the QA Manager has the authority to stop production if there is a risk to the environment.
- In the absence of the Director is to immediately implement Pollution Incident Response Plan if a pollution incident occurs.

Specific Environmental Duties

- Ensure drain grates are in place.
- Allocate the usage of cleaning chemicals.

Endo-Technik-Nord

Environment Process Flow-Livestock Handling

Product Inputs & Outputs

Cattle
From grazing



Cattle
Direct into knocking box

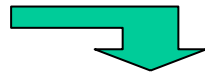
Environmental Inputs & Outputs

Endo-Technik-Nord

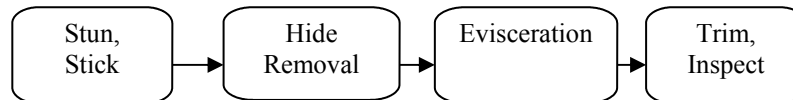
Environment Process Flow- Slaughtering

Product Inputs & Outputs

Cattle



Slaughtering



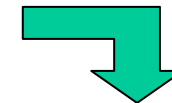
Beef
Edible Offal
Hides
Blood
Rendering Raw Material RRM
(Hooves, heads, viscera, trimmings etc)



Cold Water 42°
Hot Water 82°
Electricity for lighting, water & air
LPG for hot water
Detergents / Sanitiser



Steriliser water
Processing waste water
Wash down water
(detergents & sanitisers)
Noise
Paunch Material



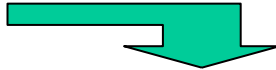
Environmental Inputs & Outputs

Endo-Technik-Nord

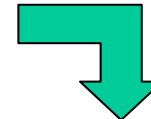
Environment Process Flow- Further Processing

Product Inputs & Outputs

Chilled beef



Carton Meat & Trimmings
Portion Cut Meat
Fat & Bone



Further Processing

Boning

Slicing

Portion
Cutting

Packing



Cold Water 42°
Hot Water 82°
Electricity for lighting, saws, cryovac
machine, mincer
LPG for hot water
Packaging Materials
Detergents / Sanitiser

Environmental Inputs & Outputs

Steriliser water
Wash down water
(detergents & sanitisers)
Packaging Waste

Process/ Operation	Environmental issue	Q1: Do preventive measures exist for this step in the process to control the identified risk If YES – go to Q2 If NO – go to Q3	Q2: Do these risk reduction measures fully control the risk within acceptable levels? If YES – ECCP If NO – go to Q3	Q3: Is the risk control needed at this step of the process to control the risk? If YES – ECCP If NO – not an ECCP	ECCP Number Allocate a number to the ECCP for future reference in other parts of the Environmental Management System.
Effluent Treatment	Odour Biological Degradation Gasses offensive to neighbours	Refer Report Pacific Environmental Services	Yes		ECCP1
		Use of Biological Treatment enzymes			
		Avoid Chemicals Entering waste water system			
	Refer Report from Pacific Environmental Services	Crop harvesting	Yes	Improved Treatment Process	ECCP8
	Sewerage Discharge Regulations				
	Discharge to sewer does Not occur during periods of excessive rain (>50mm/day in preceding 48 hrs)	Yes, Director to record rainfall daily	Yes		ECCP8

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Slaughtering & further processing	Noise Processing noise offensive to neighbours	Yes Slaughtering not to commence before 7am	Yes		
	Energy Consumption -Excessive Water Usage Steriliser, processing & wash down water) is a costly resource, which must be treated & disposed of.	Yes Maintenance of plumbing system to avoid leaks etc Use of water efficient hoses	No		
	Cleaning Chemicals Excessive use may reduce effectiveness of effluent treatment system eg Quaternary sanitisers	Chemical store to be locked to avoid inadvertent use. Staff education & awareness of chemical usage Director to ensure all chemicals are biodegradable prior to purchase	Yes		

Process/ Operation	Environmental issue	Q1: Do preventive measures exist for this step in the process to control the identified risk If YES – go to Q2 If NO – go to Q3	Q2: Do these risk reduction measures fully control the risk within acceptable levels? If YES – ECCP If NO – go to Q3	Q3: Is the risk control needed at this step of the process to control the risk? If YES – ECCP If NO – not an ECCP	ECCP Number Allocate a number to the ECCP for future reference in other parts of the Environmental Management System.
	Chemical spills resulting in environmental harm	Adequate bunding in chemical store & clean up procedure			
Cold Storage & Distribution	Noise from refrigeration equipment	Yes Regular maintenance of equipment	Yes		ECCP2
		Adequate screening of compressors & motors	Yes		ECCP2
Effluent Disposal Refer Pacific Environmental Services	Contamination of waste Water on site during irrigation	Yes-Regular Monitoring before & During irrigation. Rotation of sprinklers Irrigation conducted by trained operator familiar with EPA Licence conditions			
	LPG Gas Uncontrolled release of Gas	Yes Director to monitor leaks. If any uncontrolled leaks call EPA on 131555 (24 Hours)			ECCP12

Process/ Operation	Environmental issue	Q1: Do preventive measures exist for this step in the process to control the identified risk If YES – go to Q2 If NO – go to Q3	Q2: Do these risk reduction measures fully control the risk within acceptable levels? If YES – ECCP If NO – go to Q3	Q3: Is the risk control needed at this step of the process to control the risk? If YES – ECCP IF NO – not an ECCP	ECCP Number Allocate a number to the ECCP for future reference in other parts of the Environmental Management System.
	Transport By Products	Yes Director to be notified. Jeffery Transport to respond to remove hazard.			ECCP13

SOP – Irrigation of Wastewater

See attachment Report – Pacific Environmental Services

1.0) Purpose

The purpose of this procedure is to ensure that irrigation of wastewater is conducted in accordance with conditions set out in the DEC Licence & the Protection of the Environment Operations Act 1997.

2.0) Scope

This procedure applies to the irrigation of wastewater at the following premises:

Endo-Technik-Nord
96 Rose Valley Road
Rose Valley NSW 2534

DP 561082 lot 103

3.0) Background

Prior to irrigating wastewater the Director & /or in his absence the person responsible, must be completely aware of the following conditions:

- There must be no discharge of wastewater to any watercourse or to any area other than the defined wastewater disposal area.
- Irrigation of wastewater must not be carried out within 50 metres of any watercourse
- Irrigation of wastewater must not be carried out if soil moisture conditions are such that surface run off or ponding is likely to occur.
- The irrigation area must be maintained in a proper & efficient condition so as to provide adequate percolation, evaporation & transpiration of the effluent.
- The volume of wastewater directed to the irrigation area must not exceed the capacity of the area to assimilate the wastewater.
- Spray from irrigation effluent must not drift into residential or public areas & / or watercourses.

4.0) Responsibilities

The Director is responsible for the irrigation of wastewater & in his absence a suitably trained employee. Suitably trained is defined as someone who completely understands:

- this procedure,
- the irrigation area
- the pumping equipment.

5.0) Procedure – Discharge of Treated Waste Water

5.1) As per report – Pacific Environmental Services

5.2) During periods of wet weather, the Director shall check rainfall records from the bureau of meteorology's site www.bom.gov.au/

If rainfall is in excess of 50ml/day has been recorded for either of the two preceeding days at either Kiama or Gerringong weatherstation, then no irrigation is to take place. Day is measured 9am to 9am.

6.0) Records

6.1) Endo discharge logs

6.2) Kiama/Gerringong rainfall data

SOP – Complaints Reporting

1) Purpose

The purpose of this procedure is to ensure that any pollution complaint is recorded in accordance with the Protection of the Environment Operations Act 1997.

2.0) Scope

This procedure covers all pollution-related complaints made to Endo-Technik-Nord.

3.0) Procedure

3.1) The Director must keep a legible record of all pollution-related complaints made against Endo-Technik-Nord Pty Ltd

3.2) Details of the complaint shall be recorded on the complaint form & shall include the following details:

- the date & time of complaint
- the method by which the complaint was made
- any personal details of the complainant which were provided by the complainant or, if no such details were provided, a note to the effect
- The nature of the complaint
- The action taken by the licensee in relation to the complaint, including any follow up contact with the complainant
- If no action was taken by Endo-Technik-Nord the reason why?

3.3) The Environment Officer must review the complaint at a later stage to ensure that the corrective action taken has either eliminated the problem or reduced it to a manageable level.

3.4) Records of the complaint must be kept for at least 4 yrs after the complaint was made.

4.0) Records

4.1) Complaints Register

Work instructions – Soil Sampling **as per Pacific Environmental Report**

<u>Critical Operation:</u>	Soil Sampling
<u>Location:</u>	Yet to be determined
<u>Person(s) responsible:</u>	Environment Officer

Surface Soil Monitoring – As per Pacific Environmental Services Report

- 1) Soil samples shall be conducted bio annually.
- 2) Analysis must include at a minimum determination of:
 - Nitrate-nitrogen (every 2 years)
 - Total nitrogen (every 2 years)
 - Bray Phosphorus (every 2 years)
 - Total Phosphorus (every 2 years)
 - Soil Salinity, measured as electrical conductivity (every 2 years)
 - Sodicity, measured as exchangeable sodium percentage (every 2 years)
- 3) All methodologies used must be as per recognised industry standards
- 3) All methodologies used must be as per recognised industry standards
- 4) The Environment Officer shall record the following information.
 - The date on which the sample was taken
 - The times at which the sample was taken
 - The points at which samples were taken
- 7) All records & test results must be kept in a legible form for at least 4 years.

Work Instructions – Waste Water Treatment

As per Pacific Environmental Services report. Work is subcontracted to independent company “Bennetts”.

Pollution Incident Response Management Plan

1) Purpose

The purpose of this plan is to improve the management of pollution incidents & facilitate better coordination with relevant response agencies.

2) Background

The aim of the pollution incident response management plan is to:

- Ensure comprehensive & timely communication about a pollution incident to :
 - o Staff
 - o EPA
 - o Local Councils, NSW Ministry of Health, Workcover NSW, Fire & Rescue NSW
 - o Neighbours
- Identify risks & implement procedures to control & minimise the risk
- Ensure the plan is implemented (by whom) & regularly tested for accuracy , currency & suitability

3) Definitions

Pollution incident means an incident or set of circumstances during or as a consequence of which there is likely to be a leak, spill or other escape or deposit of a substance, as a result of which pollution has occurred, is occurring or is likely to occur. It includes an incident or set of circumstances in which a substance has been placed or disposed of on premises, but it does not include an incident or set of circumstances involving only the emission of any noise._

Material harm to the environment – harm to the environment is material if it involves actual or potential harm to the health or safety of human beings or to ecosystems that is not trivial.

4) Responsibilities

If a pollution incident occurs which results in material harm to the environment then the Director is responsible for immediately implementing the Pollution Incident Response Management Plan.

In his absence the General Manager shall be responsible for implementing the plan.

5) Procedure

5.1) Descriptions & Likelihood of Hazards

Refer Endo-Technik-Nord Environment Management Plan:

- Environment Critical Control Point

5.2) *Pre-emptive actions to be taken*

Refer Endo-Technik-Nord Environment Management Plan:

- Environment Critical Control Point Table

5.3) *Inventory of Pollutants*

- Blood, Boning Room & Slaughter Floor waste
- Cleaning & Maintenance Chemicals – Refer SOP 4.15 Handling & Storage of chemicals for description of chemicals, storage, use, MSDS & chemical register.

5.4) *Contact Details*

In the case of a pollution incident the following person(s) are responsible for activating the plan & managing the response:

Gerhard Baden Director
Mobile 0418 248 292

Office (02) 9679 8333

The above shall contact the following immediately:

EPA – Wollongong	02 9224 4100 131555(24 Hour)
Kiama Council Health & Environment Officer	02 4232 0444
Ministry of Health Wollongong Public Health Unit	02 42216700
Workcover	131050
SES	132500
Fire & Rescue NSW	000 1300 729 579

5.5) *Communicating with Neighbours*

Jack Quinn	02 4234 1246
Peter Quinn	02 4234 1254
Peter Osbourne	0408 853 994

5.6) *Minimising harm to persons on the premises*

Endo-Technik-Nord – Environment Management Plan

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Issue:1

Refer Endo Wagu -Emergency Evacuation Procedure.

5.7) Maps

Refer Site Map Attached

5.8) Auditing

Refer SOP 4.15 Cleaning and Maintenance Chemicals Internal Auditing- Pollution Incident Response Plan is on audit schedule to be audited annually or within one month of a pollution incident occurring.

Maintenance Schedule**Year**

Plant & Equipment	Jan	Feb	Mar	Apr	May	June	July	Aug	Sep	Oct	Nov	Dec
Abattoir Grease Trap												
Restaurant Grease Trap												
Clarifier												
Irrigation Pump												

Maintenance Schedule:

Pumps – Check seals

Grease Trap – Check

Endo Wagyu – Complaints Register

[illegible]