# Tonkin+Taylor





## **Document control**

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#### **Rule AREA2-R1 Dust Management Plan requirements**

Discharges to air from handling logs at the Port of Tauranga Hewletts Road log storage yard is a permitted activity under Rule AREA2-R1 (Interim Permitted Activity Rule (IPAR) for Existing Activities in the MMA) of the Bay of Plenty Regional Council Toi Moana Regional Natural Resource Plan (RNRP), subject to meeting permitted activity standards.

Rule AREA2-R1 (3) sets out the requirements for a Dust Management Plan (DMP) and refers to AIRSCHED2, which prescribes the contents (Part A) and requirements for Investigation and Reporting (Part B) in the event that PM<sub>10</sub> monitoring trigger levels are exceeded.

The following tables reproduces the requirements of Rule AREA2-R1 (3) and AIRSCEHD2 and where these can be found in the DMP.

Rule A	REA2	-R1 (3)	Location within this DMP	
(3)	Dus	t management plan		
	(a)	For discharges associated with activities located outside the Port Industry Area, the owner or occupier of the subject site where the activity is carried out must engage a SQEP who has visited the subject site to prepare a dust management plan in accordance with the requirements of AIRSCHED2.	Document control	
	(b)	N/A		
	(c)	The dust management plan required by (3)(a) or 3(b) must be:		
		(i) Peer reviewed by another SQEP prior to submission to the Regional Council; and	Document control	
		(ii) Revised to address the peer review comments prior to submission to Regional Council, or where the comments are not addressed to the satisfaction of the peer reviewer, the reasons must be stated; and	Document control	
		(iii) Provided to the Regional Council within six months of this rule becoming operative, together with the peer review required by (3)(c)) (i); or for the Port Industry Area, provided to the Regional Council and Ngāi te Rangi within six months of this rule becoming operative, together with the peer review required by (3)(c)(i); and	Document control	
		(iv) Reviewed by a SQEP at least once every calendar year and any updated version of the dust management plan provided to the Regional Council and to Ngāi te Rangi for the Port Industry Area, within one month of its review.	Document control	
	(d)	The dust management plan required by (3)(a) or 3(b) must always remain on site, capital works required to minimise $PM_{10}$ emissions must be completed as soon as practicable and the dust management plan must be complied with at all times by all persons undertaking the bulk solid materials handling or handling of logs activity as soon as practicable following the dust management plan being finalised under (3)(c)(ii),(3)(c)(iv) or (3)(e).	N/A	
	(e)	In the event of an exceedance of the trigger level in Part A Clause (7) of AIRSCHED2 and following an investigation as required by Part B Clause (11) of AIRSCHED2, the dust management plan must be amended by a SQEP to include actions to avoid or minimise future exceedances of the trigger level and	Document control	

Rule AREA2-R1 (3)	Location within this DMP
resubmitted to Regional Council, and to Ngāi te Rangi for the Port Industry Area, within one month of its amendment.	
(f) To demonstrate compliance with standards, the DMP must:	
(i) Set out the baseline in the 12-months ending on 28  November 2019 unless a different compliance date is set out above against which compliance with each standard is to be measured; and	Section 4
(ii) Demonstrate how each standard is or will be met; and	Compliance is met by adhering to the dust management plan
(iii) Describe any additional measures that will be implemented during the term of the IPAR to reduce PM <sub>10</sub> emissions from the subject site to the greatest extent reasonably practicable until objective AIR-O2 of PC13 is met and the annual guideline value in the Health-based Guideline Values of the Ambient Air Quality Guidelines 2002 (or its amendment or replacement) is met; and	Section 5.3.6
(iv) Demonstrate that the proposal will minimise PM <sub>10</sub> emissions to the greatest extent reasonably practicable until Objective AIR-O2 of PC13 is met and the annual guideline value in the Health-based Guideline Values of the Ambient Air Quality Guidelines 2002 (or its amendment or replacement) is met within the term of the IPAR, or within a defined period thereafter, after describing and evaluating all reasonably practical options that have been implemented or could be implemented to reduce PM <sub>10</sub> emissions from the subject site, together with their estimated costs and the estimated likely and range of PM <sub>10</sub> reductions they would achieve.	The DMP minimises PM <sub>10</sub> emissions as far as reasonably practicable through mitigation and management of emissions from Logs and discussed in the following sections. Appendix B Practicable option assessment will be undertaken during the DMP annual review.
(g) The DMP must require that records are kept of:	
(i) The number and significance of complaints received; and.	Section 7.4
(ii) Any exceedances of the $PM_{10}$ Standard attributable to the subject site, abatement notices and enforcement action taken from [the date of the Environment Court decision].	Section 7.4

AIRSC	CHED2 Items	Location within this DMP
Part A	A: Contents	
(1)	Title	Title page
(2)	A purpose to ensure that the discharge of PM <sub>10</sub> into the Mount Maunganui Airshed is minimised to the greatest extent reasonably practicable to contribute to meeting the objectives of PC13 without undue delay, to meet the general standards and to be consistent with Policy AQ P3 to achieve improvements in air quality.	Section 1.2
(3)	A map that includes a scale, a north point, the location of the subject site, distance to all sensitive areas, including any isolated dwellings within the industrial area and predominant wind directions at the subject site.	Figure 3.1
(4)	Process description and method of operation including:	
	(a) A detailed description of the subject site, activity, and discharges to air;	Section 3, Section 5
	(b) A description of the potential sources of dust emissions;	Section 5
	(c) Any locational or operating constraints relevant to the management of handling of bulk solid materials and/or logs; and	N/A
	(d) the type(s), volume(s) and frequency of handling of bulk solid materials or logs at the subject site.	Section 4
(5)	Methods of mitigation and standard operating procedures for the subject site which must include details of dust emission reduction processes and practices including:	
	(a) For all activities:	
	<ul><li>(i) Product movement paths, storage, and processing areas including conveyance systems, and whether these are indoors or outdoors;</li></ul>	Figure 5.2
	(ii) Use of dust suppression (e.g. sprinkler/fog/misting) systems;	Section 5.3
	<ul><li>(iii) Use of wind speed limits relating to the subject site when operations must cease;</li></ul>	Section 6.2.2
	(iv) Vehicle speed limits and vehicle unloading procedures to minimise dust;	Section 5.2
	<ul><li>(v) Site sweeping/vacuuming and containment protocols including hours of operation and sweeping frequency;</li></ul>	Section 5
	<ul><li>(vi) Inventory of mitigation measures in place on or about 28 November 2019;</li></ul>	Section 5
	(vii) Inventory of current mitigation measures, including equipment, materials and procedures;	Section 5
	(viii) Proposed further mitigation measures, including equipment, materials and procedures	No further mitigation measures proposed
	(ix) Frequency of equipment maintenance programmes; and	Section 5.3.6
	(x) Contingency procedures.	Section 5.2
	(b) N/A	N/A
(6)	A monitoring programme which must:	
	(a) Be designed by a SQEP to monitor ambient $PM_{10}$ concentrations in accordance with relevant good practice;	Section 6.2

AIRSCHED2	Items	Location within this DMP	
Part A: Con	tents		
(b	) Include a description of types and locations of devices for $PM_{10}$ and meteorological conditions monitoring;	Table 6.2	
(c	<ul> <li>Provide data that allows for a technically robust comparison with the trigger values in Part A clause (7);</li> </ul>	Section 6.2	
(d	<ul> <li>Be continuous monitoring with a minimum of ten-minute resolution;</li> </ul>	Section 6.2	
(e	) Be telemetered with alarms;	Section 6.2	
(f	Be installed, commissioned, operated, serviced, and maintained in accordance with the manufacturer's instructions and any appropriate standards;	Section 6.2	
(g	<ul> <li>Have as a minimum one monitor funded by the owner or occupier of the subject site;</li> </ul>	Section 6.2	
(h	Produce validated data in accordance with the Good Practice Guide for Air Quality Monitoring and Data Management, including the valid data requirements of 75% for averaging and 95% for data capture;	Section 6.2	
(i)	Specify monitors compliant with either NESAQ Schedule 2 or equivalency as demonstrated through AS 3580.9.17-2018 or EN 12341:2014;	Section 6.2	
(j)	Require that all monitoring data collected must be provided to the Regional Council as follows:	Section 6.2	
	<ul> <li>(i) Raw monthly data to be provided via electronic access to the Regional Council by the 5th day of the following month;</li> </ul>	Section 6.2	
	(ii) Validated quarterly data to be provided via electronic access to the Regional Council on 1 February, 1 May, 1 August, and 1 November of every year; and	Section 6.2	
	(iii) Any exceedance of the trigger values set out in Part A clause (7) must be notified to the Regional Council in writing within 5 working days of the exceedance.	Section 6.2	
(k	<ol> <li>Requires records to be kept, including documentation of maintenance and control parameters.</li> </ol>	Section 6.2	
	e following $PM_{10}$ trigger values for use in Part B and IPAR indard(3)(e):		
(a)	150 micrograms per cubic metre (calculated as a rolling 1-hour average concentration under Schedule 1 NESAQ) recorded by the monitoring devices in the monitoring programme set out in clause 6;	Section 6.2	
OF			
(b)	65 micrograms per cubic metre (calculated as a rolling 12-hour average) recorded by the monitoring devices in the monitoring programme set out in clause 6.	Section 6.2	
(8) Co	mplaints procedures must include:	Section 7	
(a)	The name of the contact person and contact details for complaints from the community;	Section 7	
(b)	Complaints procedures for staff;	Section 7	

AIRSCHED2 Items	Location within this DMP	
Part A: Contents		
(c) Maintenance of a complaints actions undertaken to respon further dust control measure.		Section 7
of any on-site activity, includi	and remedying the cause of	Section 7
(e) A protocol for determining fu be required on site;	rther mitigation measures that may	Section 7
(f) Timeframes for communication complainant; and	on to the Regional Council and	Section 7
(g) Reporting requirements that register which must be submi once per calendar year.	include the complaints/incidents tted to the Regional Council at least	Section 8
(9) Staff training procedures must inc	lude:	
<ul><li>(a) Components of the dust man trained in;</li></ul>	agement plan that staff are to be	Section 9
(b) Methods used to train staff;		Section 9
(c) Frequency of staff training; an	nd	Section 9
(d) How and where staff training	records are to be kept.	Section 9
(10) System review and reporting proc	edures must include:	
<ul><li>(a) The process for reviewing the performance;</li></ul>	overall dust management system	Section 10
(b) Types and frequency of repor Regional Council such as site/	ts not otherwise provided to the process/equipment upgrades; and	N/A
(c) External audits and ISO certifi	cation (optional).	N/A

#### 1 Introduction

#### 1.1 Overview

This Dust Management Plan (DMP) is for the Port of Tauranga Hewletts Road Log Storage Yard (the "Site") (shown in Figure 3.1). The DMP for the Site has been developed as a joint management plan with all parties undertaking handling of logs at the site and those carrying out post-handling clean-up having responsibilities under the plan.

Port of Tauranga Limited (POTL) oversees the DMP and is responsible for overall administration. The responsibilities held by POTL include:

- Oversight and administration the DMP.
- Oversight and administration of the Log Standard Operating Procedures (SOPs).
- Monitoring of dust trigger levels.
- Setting of reporting requirements.
- Response and investigations to triggers and breaches.
- Review of the DMP.

Responsibility for the monitoring of compliance with the DMP and SOPs is led by POTL. Specific responsibilities are also held by occupiers, operators, importers and exporters, principals of the marshallers and yard cleaning services. These are set out in subsequent sections of the DMP.

This DMP meets the requirements of Rule AREA2-R1 (3) and AIRSCEHD2 of the RNRP and, where appropriate, is consistent with the guidance in the Ministry for the Environment Good Practice Guide for Assessing and Managing Dust<sup>1</sup>.

#### 1.2 Purpose and scope

The purpose of this DMP is to ensure that the discharge of PM<sub>10</sub> into the Mount Maunganui Airshed is minimised to the greatest extent reasonably practicable to:

- a Contribute to meeting the objectives of the Air Chapter of the RNRP without undue delay,
- b To meet the general standards of Rule AREA2-R1 standards (1)(a) to (1)(f) and
- c To be consistent with Policy AIR-P3 to achieve improvements in air quality.<sup>2</sup>

The DMP provides a framework for controls, maintenance, monitoring, management and operational procedures required to minimise discharges to air from handling logs on site so that potential adverse air quality effects are avoided or mitigated. To achieve this, the DMP includes the following:

- Site contextual information, including a description of sensitive locations near the site and local climatic conditions relevant in terms of generation and management of air quality effects.
- A description of site activities and the potential for discharges to air.
- Identification of air quality risks and controls.
- Maintenance and monitoring procedures.
- Staff training and contact information.

<sup>&</sup>lt;sup>1</sup> Ministry for the Environment. 2016. Good Practice Guide for Assessing and Managing Dust. Wellington: Ministry for the Environment.

<sup>&</sup>lt;sup>2</sup> The purpose of the DMP is prescribed in ARISCHED2.

- Complaint procedure.
- System review and reporting procedures.

#### 1.3 Environmental policy

The POTL environmental policy is contained in Appendix A.

#### 1.4 Integration with system documentation

The DMP is one of a suite of documents used by POTL to manage the environmental aspects and impacts of activities at the Site. Other documents relevant to discharges to air from handling logs are:

- Environmental Management System (EMS) under development.
- Log Standard Operating Procedures ("Log SOP") (Appendix B).
- Log handling induction programme under development.
- Yard cleaning services contract(s).
- Reporting of environmental incidents Learning Management System Module.
- Licence to occupy/operate agreements and lease agreements.

#### 1.5 Responsible parties

The DMP has been developed by POTL. The DMP requires a coordinated response, POTL holds the responsibility of overseeing and directing the coordinated response.

The monitoring of conformance with the operating procedures is undertaken by the operators and POTL. In this DMP, the term operator means the party physically undertaking the task or operation.

Where responsibilities lie at the Site is complex. This DMP identifies actions and then assigns responsibility for each action. A responsibility for actions in the event of a non-conformance of the DMP or adverse effect from operations is in Table 1.1.

Table 1.1: Responsibility as a result of non-conformance of the DMP or adverse effects

Event	Parties with actions to undertake	Action
The DMP is followed and adverse effects and/or non-compliance occurs (system failure of the DMP).	• POTL	<ul><li>Investigate incident.</li><li>Review and update DMP as appropriate.</li></ul>
Failure to follow DMP resulting in an adverse effect and/or trigger exceedance and/or non-conformance and an investigation identifies that it was due to failure to follow the DMP by a certain party.	<ul><li>Operator</li><li>POTL</li></ul>	<ul> <li>Operator and POTL to investigate incident and identify corrective actions.</li> <li>POTL to review and update DMP if appropriate to identify if systems could be improved to minimise future risk.</li> </ul>

There are nuances to the DMP, some examples of responsibility are as follows:

 A single action may have one party responsible e.g. the creation and supply of an induction which explains key dust source control measures procedures for parties undertaking log handling is the responsibility of POTL. The requirement to put all log handling staff in a

- company through the induction prior to them working without direct supervision is the sole responsibility of the company.
- A single action may have more than one responsible party e.g. undertaking of routine monitoring of the handling of log handling and addressing any non-conformances, is the responsibility of both POTL and the operator undertaking the operation. If one of those parties completes their actions as per the DMP (say Party A) but, Party B does not, if an adverse effect and/or trigger exceedance and/or non-conformance occurred and the failure to undertake the monitoring was material to the event, it may mean that accountability sits more with Party B. In this example the DMP may still need to be reviewed to identify any system failures or possible improvements, this is a POTL responsibility with POTL accountability.

The responsible parties to this DMP are listed as follows:

Port of Tauranga Limited ("POTL").

#### Yard cleaning service providers

 Daltons Landscape Supplies Limited (yard cleaning services) ("Daltons" or "yard cleaning services").

#### Marshalling companies:

- C3 Limited ("C3").
- QUBE Ports Limited ("QUBE").

#### 2 Key personnel and responsibilities

#### 2.1 Overview

The DMP provides a framework for the management of discharges to air from activities at the Site. POTL administers the DMP. Monitoring of compliance and operating procedures is required variously by: the occupiers, operators, the marshallers and POTL. Sections 2.2 to 2.3 sets the key responsibilities and the key personnel, their roles and contact details. A schedule of contact details is in Appendix C.

#### 2.2 Port of Tauranga Limited

#### **POTL Environmental Manager**

The POTL Environmental Manager has overall responsibility for:

- Oversight and administration of the DMP.
- Monitoring of dust trigger levels.
- Responding and investigating triggers and breaches.
- Identifying potential dust source controls to address triggers and breaches that occur as a result of Site activities, and presenting these options to operators.
- Reporting triggers and breaches to parties operating inside the Site, to enable their investigations and dust source control responses (if it is identified by POTL that their activities are potential contributors to the trigger or breaches).
- Responding to complaints associated with the Site.
- Reviewing the DMP.
- Maintaining Standard Operating Procedure documents associated to the Site.
- Review of additional dust source controls as applied through Log SOP S.10.
- Monitoring performance against the Log SOP and addressing non-conformances.
- Monitoring and reviewing CCTV footage.
- Leading reviews of reasonably practicable options to improve air quality (Rule AREA2-R1 (3) (f) (iv)).
- Reporting monitoring data to BOPRC.
- Producing reviewing and maintaining a log handling induction and log yard cleaning induction, from 1 January 2024.
- Providing and monitoring performance of log yard cleaning services as per Log SOP S.8.
- Engaging a SQEP for required reporting.

#### **POTL Environmental Coordinator**

The POTL Environmental Coordinator has overall responsibility for:

- Assisting the log yard cleaning providers responses to the log marshalling operations.
- Identifying priority sweeping areas (if not already identified by the log yard cleaning service providers).
- Liaison with Site operators on operating procedures.

#### **POTL CCTV operator**

The POTL CCTV operator will have overall responsibility for:

- Recording complaints and incidents.
- Directing information to the appropriate person.

#### 2.3 Marshalling companies

## The marshalling companies with responsibilities under this DMP are QUBE Environmental Manager and the C3 Mount Manager

The Environmental Manager (refer to Appendix C for a schedule of contact details) has overall responsibility for:

- Responding to and applying dust source control measures to dust triggers exceedances (when
  marshalling activities have been identified as a potential contributor by POTL or by
  subsequent trigger exceedance investigation).
- Notifying POTL of any changes required to this DMP.
- Developing standard operating procedures/DMP specific to their operation where not otherwise covered by POTL procedures.
- Record keeping of activities and materials onsite.
- Training of site staff.
- Assisting the yard cleaning service providers by allowing assess into the marshalling areas, as per agreed procedures.
- Ensuring relevant staff are inducted as per the POTL log handling inductions.
- Monitoring performance against Log SOP and addressing non-conformances.
- Assist POTL with their compliance reporting responsibilities when requested and appropriate.
- Reporting of any complaints and responses to POTL.

#### 3 Site description

The Site is located within the Industry Zone within the Tauranga City Plan (Operative: 12 Aug 2022, Revision: 11 Oct 2022). Sensitive areas are defined in the RNRP as follows:

**Sensitive area** means an activity that is particularly sensitive to adverse effects associated with air contaminant discharges either due to the vulnerability of the population or area exposed to the contaminant, or due to the potential for people to be exposed for prolonged periods and may include:

- a residential buildings and areas (including marae)
- b childcare centres, schools, educational facilities
- c hospitals, nursing homes, aged care facilities
- d offices, consulting rooms, gymnasiums, community centres
- e hotels, motels, caravan parks, camping areas, tourist accommodation
- f correctional facilities
- g public amenity areas
- h manufacturing or storage of food or beverages
- i manufacturing or storage of electronics
- j public water supply catchments and intakes.
- k incompatible crops or farming systems (e.g. organic farms, greenhouses)
- household water supplies (including roofs from which a water supply is obtained).

The location of the Site, nearby sensitive areas, the surrounding Tauranga City Plan zoning and a wind rose showing the predominant wind direction as measured at Railyard North for 2019-2023 are shown in Figure 3.1. The nearest residential zones/receptors and sensitive areas to the Site are as follows:

- 330 m to the west-southwest to the "Urban Marae Community" zone.
- 370 m to the east to live/work units on the Airport Designation.
- 500 m to the west-southwest to Whareroa Marae.
- 180 m to the west to an "Active Open Space" zone.

The RNRP definition of sensitive area includes "offices" however, given the industrial zoning of the surrounding area, office uses will be ancillary to the primary industrial activity and are likely to have a lower sensitivity to air discharges compared to commercial or business offices.

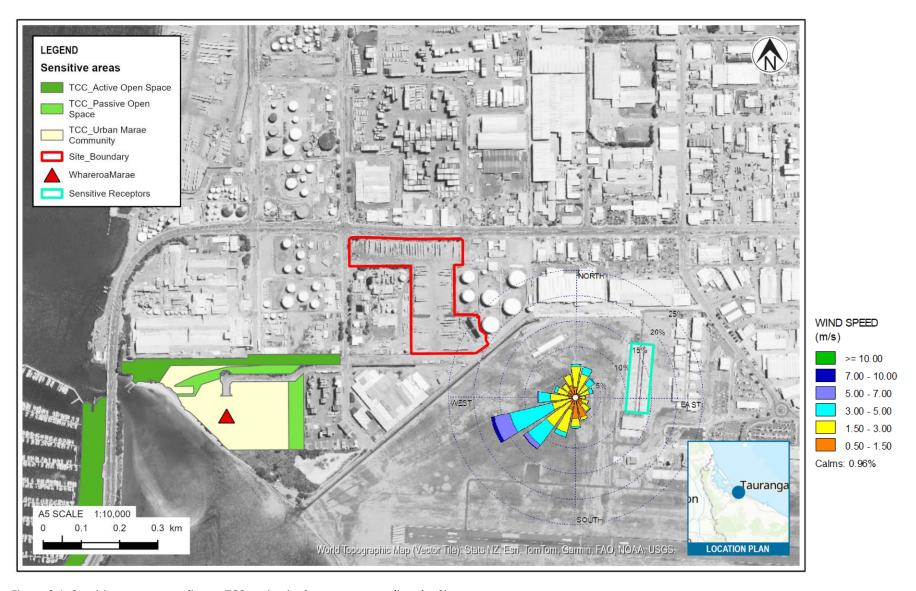


Figure 3.1: Sensitive areas according to TCC zoning in the area surrounding the Site.

#### **Baseline information** 4

In broad terms, the IPAR restricts the location and scale of log handling to that which was occurring in the year prior to 31 July 2019.

The intent of the standards following are achieved through the baseline volumes/tonnages, storage location restrictions and dust control measures outlined throughout this DMP.

Rule AREA2-R1 (D) (1) (a) The discharge of PM<sub>10</sub> must be the same or similar in character and the same or less in scale and intensity than that occurring in the 12 months ending on 28 November 2019, as estimated in accordance with all standards of this rule. The discharge of PM<sub>10</sub> from the handling of logs or handling of bulk solid Rule AREA2-R1 (D) (1) (b) materials must be on the same subject site as the existing discharge as at 1 October 2020 and must have been occurring in the 12 months ending on 28 November 2019. The discharge does not cause any offensive or objectionable effect beyond Rule AREA2-R1 (D) (1) (d) the boundary of the subject site.

Specific quantifiable "permitted activity" baselines for logs are shown in Table 4.1. Storage locations and dust control measures including the dates are Section 5.

**Table 4.1:** Baseline product volumes and tonnages for logs for year end 31 July 2019

Product	AREA2-R1 reference	Value
Logs		
Total volume/tonnage	Rule AREA2-R1 (D) (1) (e) <sup>3</sup>	See Note 1
Fully debarked logs delivered to site	Rule AREA2-R1 (D) (1) (i) <sup>4</sup>	See Note 1
Storage and handling location	Rule AREA2-R1 (D) (1) (g) <sup>5</sup>	Figure 5.2

#### Note 1:

The total volume/tonnage of logs and the average volume/tonnage of fully debarked logs delivered to this site are governed by the volumes at the Port of Tauranga. As the Port of Tauranga is restricted to the baseline volumes for the year ending 31 July 2019, then the volumes at this location are therefore also restricted. The Site acts as an overflow yard for the Port of Tauranga and therefore the volume/tonnage at this Site will be no greater than the year ending 31 July 2019.

**Tonkin & Taylor Ltd** Dust Management Plan - Hewletts Road Log Yard Port of Tauranga Limited

August 2024

<sup>&</sup>lt;sup>3</sup> The average volume/tonnage or average percentage (whichever is higher) of fully debarked logs delivered to site and at the point of loading onto vessels must be the same or greater than the corresponding average volume or tonnage and average percentage in the 12 months ending on 31 July 2019.

<sup>&</sup>lt;sup>4</sup> The average volume/tonnage or average percentage (whichever is higher) of fully debarked logs delivered to site... must be the same or greater than the corresponding average volume or tonnage and average percentage in the 12 months ending on 31 July 2019.

<sup>&</sup>lt;sup>5</sup> The locations in which logs are stored and handled must be the same as they were in the 12 months ending on 31 July 2019 and the area must be the same or less than the area in which they were stored and handled in the 12 months ending on 31 July 2019.

### 5 Log storage and handling

## 5.1 Process description - transportation, receipt, dispatch and transfer to storage of logs

The movement of logs from delivery to storage and storage to dispatch is managed by the marshalling companies.

Logs are transported to and from the Site via logging trucks.

Logs arrive scaled (sized and barcoded). Prior to arrival at the Site, the log ends may have been cleaned at the designated checkpoint cleaning lane by water blaster or scraped by scalers during the ticketing and scaling process in the C3 checkpoint cleaning lane.

Log trucks arrive to the Site and contact the relevant marshalling company. The marshaller informs the truck driver of which log storage area to deliver the logs to. The truck driver proceeds to the area and unchains the logs prior to the logs being collected by the marshaller.

The movement of logs from delivery to storage is managed by the marshalling companies. The marshallers use a front-end loader with grapple or mounted material handler (as shown in Figure 5.1) to move the logs from the truck and trailer unit to the log yard storage row and for dispatch from the log storage row to a truck and trailer unit.





Figure 5.1: Left: Mounted material handler.

Right: Front-end loader with grapple (beaked loader).

The locations of log storage and truck paths are shown in Figure 5.2.

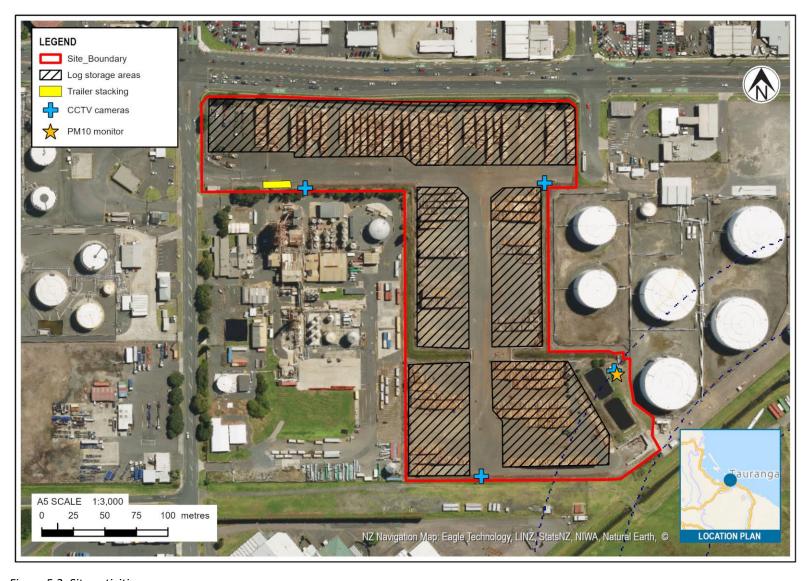


Figure 5.2: Site activities.

#### 5.2 Sources of dust

Dust can be generated from log handling activities through the process of dislodgment of bark and debris from the logs and subsequent pulverisation of deposited material by mobile plant and vehicles. The movement of mobile plant vehicles can entrain and re-suspend the deposited dust. The process of scraping and sweeping can also generate dust emissions.

#### 5.3 Log handling dust mitigation

#### 5.3.1 Ploughing and sweeping

The transfer of logs from trucks to the storage areas and from the storage area to offsite, results in some abrasion of the logs, which leads to bark and dirt (debris) being left on the yard areas of the Site.

Debris removal from log yard areas is done by a third-party operator on behalf of the POTL, using a process called ploughing and sweeping. This is to minimise both tracking of debris and debris being crushed into smaller particles when driven over, which could then cause dust emissions as windblown dust or pick-up from vehicle travel.

There are several locations and phases of the log handling operation at which debris is collected and removed using ploughing and sweeping:

#### 1 Initial log delivery - trailer hoist area

After trucks are unloaded, they travel to the designated sweeping areas, where loose material is swept from the truck and trailer unit prior to the truck leaving the site.

#### 2 Log storage area

Prior to logs arriving at a storage row, standard operating procedure is for debris from the previous load to be ploughed and swept from the storage row by the yard cleaning service providers. Details of this process are further specified in the Log SOP. The Log SOP describes standard operating procedures for both the Hewletts Road Log Yard site and the Port Operational Area and therefore not all of the procedures contained in the Log SOP are relevant for this site.

The plough is a modified straight edge snow plough. A plough dedicated to this site is utilised for this task, it is fitted with a water suppression spray system to minimise dust emissions. The debris is removed using a plough and pushed into piles. The debris piles are picked up with a front-end loader with a bucket and deposited into an open topped truck bin. The truck bin is fitted with dust suppression sprays around the top of the bin which are used during loading. The debris is transported to the bark shed, located at the Mount Maunganui Wharves, where it is stored before being dispatched.

After ploughing and removal of the bark piles, the area is swept using a vacuum sweeper truck.

Up to one plough and one sweeper, operated by Daltons, are operating at the Site at any time.

#### 3 Log yard roadways

At the discretion of the yard cleaning service providers and POTL under an active management approach alongside other routine sweeping.

#### 5.3.2 Log yard speed controls

The marshallers mobile log handling equipment is restricted to operate at 20 km/h or less.

- 20 km/hour on main log yard roadways.
- Less than 20 km/h on all non-roadway areas, such as log storage areas.

#### 5.3.3 Other dust control measures

Other dust source control measures processes that occur on site include the following:

- Restricting vehicles in empty log store areas to prevent travel through log storage areas.
- If other measures are assessed to be insufficient with dealing with acute dust incidents, POTL may utilise a contracted water cart for dust suppression purposes.

#### 5.3.4 Log handling Standard Operating Procedures

Procedures for log storage and handling are detailed in the log handling Standard Operating Procedures (Log SOP) included in Appendix B. The Log SOP details dust source controls and management measures for log handling within the Site.

The Log SOP applies to all log marshalling, transporting and yard cleaning activities/operations undertaken within the Site, namely:

- Transportation and receipt of logs via truck.
- Storage of logs.
- Cleaning, movement and operation of equipment used for log handling operations.
- Management and cleaning of land.
- Any other operation associated with Log Operations.
- Yard Cleaning Services operation hours.
- Vehicle speed limits and travel restrictions.
- Site sweeping/vacuuming protocols.

#### 5.3.5 Inventory of dust source controls

An inventory of the dust source controls for log handling and storage that occur at the Site are detailed in Table 5.1.

Table 5.1: Inventory of log handling dust source controls operated or overseen by POTL and establishment date

Activity Responsible		Controls (establishment date)		
	party	Structural	Operational	
Log handling	Marshallers	Use of material handlers to load and unload rows instead of wheeled loaders, resulting in less tracking of machines in dusty areas (Ongoing - increasing frequency).		

Activity	Responsible party	Controls (establishment date)		
		Structural	Operational	
Debris removal	Daltons (contracted by POTL)	<ul> <li>Ploughing</li> <li>One plough.</li> <li>Water suppression plough head on the bark plough (July 2024).</li> </ul>	<ul> <li>Up to one plough and one sweeper at the Site.</li> <li>Sweeping rostered for once per day.</li> <li>Reference photos used to determine if sweeping is completed to the required</li> </ul>	
	Daltons (contracted by POTL)	<ul><li>Sweeping</li><li>One vacuum sweeper (Jul 2019).</li></ul>	<ul> <li>standard (Aug 2024).</li> <li>Log rows should be swept prior to new logs being stacked in that row (Jul 2021).</li> <li>Cease sweeping if visible dust is being generated beyond the distance stated in Section 6.1 (Jul 2021).</li> </ul>	
General	POTL	Entire Site is sealed.	<ul> <li>Log SOP (previously named "Log Handling Procedure") document released (Jul 2021).</li> <li>Dedicated Environmental Coordinator position established (2018) to oversee:         <ul> <li>Operations of log yard users.</li> <li>Yard cleaning services.</li> <li>Housekeeping and bark management.</li> </ul> </li> </ul>	
Vehicle travel	POTL Marshallers	Port dedicated machines are physically restricted to 20 km/h (through gearing or similar). (Pre 2018)	<ul> <li>Marshallers to travel on roads rather than through empty storage yards unless the area has been designated as a 'temporary roadway' (Feb 2020).</li> <li>Port Marshalling companies educating drivers about the importance of dust minimisation (Feb 2020).</li> <li>Speed limit of 20 km/h.</li> </ul>	

#### 5.3.6 Contingency measures

Contingency measures may be applied if:

- Log handling is identified as a potential cause of the trigger levels being exceeded as discussed in Section 6; and
- The control measures as detailed in Table 5.1 are unable to reduce the dust concentrations to below the trigger values.

Potential contingency measures for log handling and storage are as follows:

- Increase frequency of visual monitoring.
- Increase frequency of ploughing and sweeping by contracting additional ploughs and sweeper trucks and temporarily stopping work to allow cleaning to proceed.
- Increase use of water suppression plough head.
- Further reduce vehicle speed limit in specified areas.
- Set "pre-alert" PM<sub>10</sub> concentration levels (for example sub-hourly concentration thresholds lower than the PM<sub>10</sub> concentrations in Table 6.3), to provide early warning that dust levels are elevated.
- Install wind break fences.

## 5.4 Maintenance and equipment monitoring procedures

Table 5.2 identifies maintenance and monitoring procedures undertaken to minimise discharges to air and the frequency in which these activities are undertaken. The full details of the inspections and maintenance activities to take place are in the following documents:

Table 5.2: Maintenance programme for log yard equipment

Equipment	Frequency	Responsible party	Maintenance or monitoring requirement	Record location
Plough vehicles	Daily	Vacuum truck operator	Misting systems working	Yard cleaning service prestart check form
Bark truck	Daily	Vacuum truck operator	Misting system working	Yard cleaning service prestart check form
Vacuum truck	Daily	Vacuum truck operator	Inspect filters	Yard cleaning service prestart check form
	6-monthly		Replace vacuum truck filters	Yard cleaning service prestart check form

#### 6 Monitoring

#### 6.1 Visible dust

Visible site observations are used to assess the effectiveness of dust control measures. They also help identify dust emission events and investigating and responding to any received complaints. The procedure for undertaking visible site inspections is outlined below:

- Visible dust is to be monitored by the following parties:
  - POTL Environmental Manager or delegate.
  - POTL Environmental Co-ordinator.
  - Marshalling companies.
  - Yard cleaning service provider.
- Visible dust emissions that exceed standards identified by the Log SOP are to be rectified immediately (if identified by the party responsible for the emission) or reported to the POTL CCTV operator as soon as possible.
- Dust emissions are to be monitored for all operations undertaken by parties undertaking work. The requirements for visible airborne dust generation are in place:
  - Less than 15 m from the vacuum sweeper truck.
  - Less than 20 m beyond the Site boundary.
- If visible dust emissions are observed reaching beyond the site boundary, the following details must be recorded:
  - Source of the visible dust emissions, if known.
- If visible dust is noted beyond the distances noted above, the Port CCTV operator (or delegated person) must be notified immediately to undertake further action and record the following details.
  - Date and time, and general weather conditions (wind speed/direction and temperature) at the time of the incident.
  - Detail the possible cause of the incident, and any preventative or corrective actions taken.
- Further action is to include investigating the cause of the dust emission and taking necessary actions to reduce dust emission from on-site activities.

Specific monitoring of the Site is in Table 6.1.

Table 6.1: Monitoring programme for log yard debris levels

Frequency	Responsible party	Maintenance or monitoring requirement	Record location
Daily	Environmental Co- ordinator	Monitor Yard cleaning services performance and identifies any priority areas requiring service.	E-road vehicle monitoring system
Weekly	Environmental Manager	Inspect outdoor and yard surfaces for dust and assess yard cleaning services performance.	Survey 123
Daily	Marshallers POTL Daltons	Advise driver immediately if dust coming out of the top of the vacuum truck.	No formal record

Frequency	Responsible party	Maintenance or monitoring requirement	Record location
Annual	POTL Environmental Manager POTL management team	Review SOPs and DMP.	Within SOP and DMP version control

#### 6.2 Continuous dust monitoring and trigger levels

#### 6.2.1 Current monitoring

Continuous dust monitoring is carried out on the eastern boundary of the site as shown in Figure 5.2.

The location of the monitor to the east of the southern portion of the site was based on a combination of the nature of activities in this part of the site (i.e. greater potential to generate dust) and being in the same downwind direction as the closest residential receptors. Other factors were also considered, including:

- Availability of power supply.
- Physical protection for the monitor from damage by logs or machinery.
- Adequate separation from log piles to minimise wind channelling effects and physical protection of the monitor from other dust sources.

Monitoring is currently undertaken using an eBAM instrument. The eBAM and any future replacement is/will be compliant either the National Environmental Standards for Air Quality (NESAQ) Schedule 2 or equivalency as demonstrated through AS 3580.9.17-2018 or EN 12341:2014 as required by IPAR AIRSCEHD2 Part A (6). Details of the dust monitor are summarised in Table 6.2.

Table 6.2: Dust monitor details

Name	Wind speed	Wind direction	PM <sub>10</sub> concentration and resolution	TSP concentration and resolution	Monitor type	NESAQ Schedule 2 or equivalency
Hewletts Road Log Yard	Yes	Yes	Primary resolution is 10- minute average	No	Watercare eBAM plus	Yes

Data from the monitor is to be telemetered to a central database that is available in real time. The dust monitors are powered using mains power. The following information is recorded from the dust monitors:

- Live feed of PM<sub>10</sub> concentrations from the Site monitor.
- Live feed of meteorological information from the Site monitor.

The monitor is operated with an alarm system that alerts the POTL Environmental Manager and any other nominated persons (i.e., via text message alerts or similar) who have the responsibility of managing dust from the site. The POTL Environmental Manager or other nominated person will respond to alarm trigger events and take necessary measures to reduce dust emissions from the site where possible. Trigger levels and actions that are to be taken in response are outlined in Table 6.3.

**Table 6.3:** PM<sub>10</sub> trigger levels

Trigger level	PM <sub>10</sub> concentration	Action
Alert	150 μg/m³ (calculated as a rolling 1-hour average concentration under Schedule 1 NESAQ)	Record and investigate trigger alert.
Alert	65 μg/m³ (calculated as a rolling 12-hour average)	Record and investigate trigger alert.

The continuous monitor is to be routinely checked to ensure that it is operating correctly, and calibration is maintained at a frequency and in accordance with manufacturer instructions. Maintenance and calibration records are provided by Watercare and copies are held by POTL.

#### 6.2.2 **Future monitors and contingency measures**

Investigation into additional monitors may occur in the future. A monitor such as a DustTrak, nephelometer or similar could be deployed to collect data. Any additional monitors would be for POTL internal use only. The use of additional monitors may be considered by the following events:

- Regular dust nuisance complaints.
- Frequent exceedances of the PM<sub>10</sub> concentration trigger limits at the current monitoring location.
- Investigation of future additional dust mitigation measures.
- Specific process investigations; or
- If there are any significant changes to processes that could result in increased PM<sub>10</sub> emissions.

Establishment of a pre-alert level may occur in the future if the trigger levels in Table 6.3 are regularly exceeded. Pre-alert levels could aid in applying control measures before the PM<sub>10</sub> trigger concentrations are reached.

Wind speed limits relating to when operations on the Site must cease are currently not used as the main mechanism for dust generation on the Site is due to pulverisation of debris from vehicle movements. However, the use of wind speed triggers may be reviewed is the existing dust control measures the control measures as detailed in Table 5.1 are unable to reduce the dust concentrations to below the PM<sub>10</sub> concentration trigger values.

#### 6.3 Meteorological

Wind speed and wind direction is measured on at the monitoring station. The monitoring station is to be operated, maintained and calibrated in accordance with the manufacturer specifications at least annually.

#### 6.4 Response to PM<sub>10</sub> triggers

The POTL response for trigger of the PM<sub>10</sub> concentration is as follows:

- 1 Trigger exceeded and notification will be sent to the POTL Environmental Manager and any other nominated person, this notification will be sent via email and/or SMS.
- 2 AQ data and met data will be reviewed by utilising the live feed data. This will include the data for the triggered site and other sites (to help identify extent of effect).
- 3 Investigations will be undertaken via CCTV (where possible) to attempt to identify potential contributing activities undertaken upwind of the monitor (this could include both current and past activities).

- Where possible, on ground investigation will also be undertaken (this will occur at the same time as the CCTV review where practicable).
- When potential contributing activities are identified, contact will be made with the operators undertaking the identified activities. Information will be passed on from observations and dust source control measures actions will be discussed and implemented where practicable.
- The situation will then be monitored via CCTV, monitoring data and on ground inspections where practicable. If  $PM_{10}$  concentrations do not reduce, this process will be reinitiated.
- A review of the incident will be undertaken or lead by the POTL Environmental Manager (or delegate) and/or other environmental manager.
- 8 An assessment of if standard operating procedures was followed will be undertaken;
  - If the SOPs/DMP was followed then a review the SOPs and/or DMP will be undertaken.
  - If the SOPs/DMP was not followed then corrective actions will be identified and undertaken by the appropriate parties, the SOPs/DMP may also be reviewed.
- 9 Corrective actions will be identified with the operators. Once the corrective actions are confirmed, they will be documented and actioned.
- 10 Records of incident are created (currently saved in ARCGIS software Survey123).
- An Investigation Report will be filed as required by AIRSCHED2 Part B (Refer to DMP Section 8).

The response to a PM<sub>10</sub> trigger for operators that are contracted by POTL is as follows:

- 1 Discuss immediate dust source control measures actions with POTL and identify course of action.
- 2 Assist POTL with their investigation and provide information.
- 3 Identify corrective actions with POTL.
- 4 Report back to POTL if further information is required.

#### 7 Pollution incident and complaints procedure

#### 7.1 Overview

Although the measures outlined in this DMP are aimed at preventing and reducing emissions to air from activities on the Site and preventing air quality issues beyond the boundary of the Site, there may be occasion where an incident occurs and a complaint from a member of the public is received. Any reported dust incident or complaint must be promptly investigated to resolve the source of the dust emissions and implement appropriate actions to mitigate the effects. The full details of the activities to take place in the event of a complaint are in the following forms and registers:

- Safe operation Procedure, SOP 5.1, version 2, 29 June 2018.
- ArcGIS Survey 123.

The following provides the procedures for receiving and keeping records of any incidents or complaints.

The correct information must be collected by the person receiving the incident or complaint to help investigate the cause and identify any corrective action that has been or needs to be undertaken.

A record is to be kept of all dust related complaints received relating to site activities. Those details shall be recorded in the above-mentioned forms and registers. The recorded complaints information and investigations must be available at the site office and made available to BOPRC staff when requested and as part of annual compliance reporting.

#### 7.2 Contact person

The POTL Environmental Manager will be the nominated contact person for complaints received. Complaints received by parties operating under this DMP shall be forwarded to the POTL Environmental Manager in a timely manner. The POTL Environmental Manager shall be responsible for investigation of complaints and subsequent contact with the complainant and BOPRC.

The responsibilities of various parties are stated in the Customer Service Centre SOP 5.1.

#### 7.3 Receiving and responding to complaints

#### 7.3.1 Who receives the complaint

A pollution incident or complaint can be received from a member of the public via the following methods:

- A Site employee or contractor.
- Direct call to POTL.
- Written email or letter correspondence.
- Complainant may attend the site in person.
- Complaint received via BOPRC and/or Tauranga City Council (TCC).

#### 7.3.2 Recording of complaint

Upon the receipt of a complaint relating to discharges to air from the site (odour, dust or other contaminants), the following process will be followed:

- Be courteous.
- Immediately suspend contact with the complainant if there is a risk of injury or abuse.

 Advise the complainant that an investigation will be taken out to identify the likely cause of their concern, and that appropriate mitigating actions are being undertaken or will be undertaken promptly.

Record the following information as supplied by the complainant into Survey 123:

- 1 Date and time of the incident report.
- 2 Details of who received the incident report (Site staff details).
- 3 Where the incident has been reported from:
  - Identified by POTL.
  - Identified by Site user.
  - Identified by member of the public.
  - Identified by regulator.
- 4 Name and contact details of the incident reporter (if available), and location/address of when the dust was detected. Personal details such as name, contact number and address are to be kept confidential unless permission is granted by the incident reporter to share these details.
- A description of the incident, including details of the alleged incident (e.g. any effects noted, duration).
- 6 Whether the incident is still occurring.

#### 7.3.3 Incident investigation

Following the receipt of the incident report, an investigation into the potential cause(s) is required.

The investigation should be carried out promptly following the receipt of the incident report and at least ideally within 30 minutes of the report being made (if the report is being made at the time of the incident/during the incident).

The details of the investigation are to be recorded in Survey 123. The investigation shall include:

- Assessment of environmental conditions at the time of the incident from the monitoring site(s):
  - Wind direction.
  - Wind speed.
  - Rain.
  - Changes to wind direction.
- 2 Concentration of PM<sub>10</sub> recorded at the monitoring site(s).
- 3 Identification of areas upwind and activities that can occur in that area which could be a potential source
- 4 Is the issue still happening:
  - If the issue is still occurring then undertake:
    - o CCTV review.
    - o Monitoring data review; and
    - o In-field investigation where possible.
    - o Record findings.
    - o Undertake critical review of activities upwind to see if they were operating as per the SOPs/DMP requirements, including record of dust mitigation measures in place at the time of the incident.
  - If the issue is not still occurring then undertake:
    - o CCTV review.
    - o Monitoring data review.

- o Review other records to try identify potential source.
- Undertake critical review of activities upwind to see if they were operating as per the SOPs/DMP requirements, including record of dust mitigation measures in place at the time of the incident.
- Record details of potential on-site dust sources that may be responsible for the incident, including type and approximate volume or rate of material being handled.
- 6 Details of who to contact with issues and record that contact was made
- 7 Details that the POTL Environmental Manager was notified of the incident.
- 8 Detail any corrective action taken at the time to resolve the incident and by who.

#### 7.3.4 Corrective actions

Following the incident report and investigation the following steps are required:

- 1 Contact the incident reporter detailing the investigation findings and corrective actions taken.
- 2 Identification of if issue was a result of failure to follow the SOPs/DMP,
  - If the SOPs/DMP were followed then complete a review (and, if appropriate, update)
     the SOPs/DMP and/or other measures to remedy future occurrences.
  - If the SOPs/DMP were not followed then record any measures taken to reiterate the SOPs/DMP to the relevant parties, including reviewing the frequency of refresher training.
- 3 Report incident and investigation to BOPRC annually as required in AIRSCHED2 Part A (8) (g).

#### 7.4 Records

Complaints are to be kept in a centralised register and include the following:

- Details of the complaint.
- Significance of the complaint.
- Any exceedances of the PM<sub>10</sub> Standard attributable to the site, abatement notices and enforcement action taken.

Although the measures outlined in this DMP are aimed at preventing and reducing emissions to air from activities on the Site and preventing air quality issues beyond the boundary of the Site, there may be occasion where an incident occurs and a complaint from a member of the public is received. Any reported dust incident or complaint must:

- Be promptly investigated to resolve the source of the dust emissions, where possible (this may not be possible when dust incidents are reported after activities have been undertaken).
- Have appropriate actions implemented to mitigate the effects and reduce the likelihood of future occurrences.

The full details of the activities to take place in the event of a complaint are in the following forms and registers:

ArcGIS Survey 123.

The following provides the procedures for receiving and keeping records of any incidents or complaints.

The correct information must be collected by the person receiving the incident or complaint to help investigate the cause and identify any corrective action that has been or needs to be undertaken.

A record is to be kept of all dust related complaints received relating to site activities. Those details shall be recorded in the above-mentioned forms and registers. The recorded complaints information and investigations must be available at the site office and made available to BOPRC staff when requested and as part of annual compliance reporting.

#### 8 Reporting

#### 8.1 PM<sub>10</sub> monitoring data reporting

The following reporting is required as part of the PM<sub>10</sub> monitoring onsite:

#### Part A: Contents

- 6 A monitoring programme which must
  - j Require that all monitoring data collected must be provided to the Regional Council as follows:
  - Raw monthly data to be provided via electronic access to the Regional Council by the 5th day of the following month;
    - ii Validated quarterly data to be provided via electronic access to the Regional Council on 1 February, 1 May, 1 August, and 1 November of every year; and
    - iii Any exceedance of the trigger values set out in Part A clause (7) must be notified to the Regional Council in writing within 5 working days of the exceedance.

An annual report is required to be prepared by a SQEP and provided to the Regional Council 30 June every year. According to AIRSCHED2 the following is required for investigation and reporting:

#### Part B: Investigation and Reporting

- e An annual report prepared by a SQEP must be provided to the Regional Council..., on 30 June of every year containing the following:
  - *i* A summary of the year's monitoring data;
  - ii Details of investigations into all exceedances of the trigger value;
  - iii Steps taken to implement corrective actions;
  - iv Ongoing actions to reduce discharges of contaminants from the site; and
  - v Changes/modifications to the air quality monitoring programme; and

#### 8.2 PM<sub>10</sub> trigger investigation and reporting

An investigation and report are required should the trigger values be exceeded. According to AIRSCHED2 the following is required for investigation and reporting:

#### Part B: Investigation and Reporting

- In the event that either of the trigger values set out in Part A Clause (7) are exceeded, then an investigation must be undertaken as soon as reasonably practicable by, or under the direction of, a SQEP to:
  - *i* Determine the cause of and reasons for the trigger value being exceeded;
  - ii Identify corrective actions required to minimise the potential for the trigger value being exceeded in the future; and
  - iii Set out the timeframes for implementation of the identified corrective actions;
- b The investigation results and findings must be documented by the SQEP in an Investigation Report;
- The Investigation Report in (b) must be provided to the Regional Council within two months of the trigger value being exceeded;
- d The owner of the subject site and/or the parties responsible for the activity/operation that caused the exceedance of the trigger values must implement the corrective actions within the timeframes identified by the SQEP in the Investigation Report and

must provide written confirmation to the Regional Council within 5 working days of completion of the actions.

## 8.3 Complaints reporting

In addition, as required by AIRSCHED2 Part A (8) (g), a summary of the complaints/incidents register must be reported annually.

#### 9 Training

POTL recognises the importance of staff and Site Users being aware of both the risks to air quality from activities on-site and what standard operating procedures should be employed to reduce those risks. Therefore, it is considered critical that these people are trained and competent to undertake their roles in the management of these risks.

It is the ultimate responsibility of the Marshallers and Yard Cleaning Service Providers to ensure that their staff and visitors to their work areas are adequately trained and/or inducted prior to undertaking works without direct supervision.

As a minimum, Yard Cleaning Providers and Marshalling staff undertaking log handling activities identified by this DMP should have completed the relevant induction materials detailed below:

- Log Handling Induction.
- Yard Cleaning Services Induction.

At the time of writing, the above-mentioned inductions are under development by POTL. However, will be completed by 30 September 2024. Following the completion of these induction materials, key POTL staff, the Yard Cleaning Providers and Marshallers shall:

- Ensure that a list of all staff working in each area is provided to POTL on request.
- Ensure that all relevant staff working in each area have completed the induction by 30 November 2024.
- Ensure that all new staff working in these areas have completed the induction prior to undertaking any works without direct supervision.
- Ensure that all staff working in these areas undertake the induction annually between 1 August and 30 September.
- Ensure that all staff working in these areas undertake refreshers of these inductions if advised by POTL that the induction has been updated.

As a minimum, Yard Cleaning Providers and Marshallers will ensure that supervisors/forepersons/or other person who holds responsibility of overseeing operations of others in these work areas have received training that encompasses the full requirements of the relevant SOPs by 30 November 2024, or prior to overseeing operations of others if engaged for this role after that date. Records of this training will be kept by those parties.

POTL will ensure that all key POTL staff have received training that encompasses the full requirements of all SOPs associated to activities in the Site by 30 November 2024. Records of this training will be kept by POTL.

POTL will ensure that these induction materials are kept up to date and available to these Site Users at all times.

Key POTL staff detailed above includes:

- Port of Tauranga Environmental staff.
- Port of Tauranga Cargo Services Manager.

#### 10 DMP review and reporting procedures

This Plan may require update or review to reflect material changes associated with:

- Significant new or changed processes log delivery, loading and debris management, or
- The risks, dust source control measures, responsibilities and management processes associated with such changes.

Any such change would be to support continuous improvement.

The DMP will be reviewed once per year as required by Rule AREA2-R1 (3) (c) (iv). The review will take into consideration:

- Site personnel comments.
- Audit findings and recommendations.
- Environmental monitoring records.
- Environmental incidents and emergencies.
- Details of corrective and preventative actions.
- Changes to organisational structure.
- Ongoing compliance with objectives, conditions and targets.
- Possible changes in legislation and standards.

The review process will assess whether the procedures are still appropriate. Reasons for making changes will be documented.

Standard document control procedures will be used, so a copy of the original DMP document and subsequent versions will be kept on file and each version of the DMP is issued with a version number, date and review date to ensure obsolete DMP documentation is not used.

Any update will be supplied to the Regional Council within one month of the amendment. POTL will ensure that BOPRC always has a copy of the most recent version of the DMP.

#### 11 **Applicability**

This report has been prepared for the exclusive use of our client Port of Tauranga Limited, with respect to the particular brief given to us and it may not be relied upon in other contexts or for any other purpose, or by any person other than our client, without our prior written agreement.

We understand and agree that our client will submit this report as part of an application for resource consent and that Bay of Plenty Regional Council, as the consenting authority will use this report for the purpose of assessing that application.

Tonkin & Taylor Ltd **Environmental and Engineering Consultants** 

Report prepared by: Authorised for Tonkin & Taylor Ltd by:

Michele Dyer Senior Environmental Engineer Jenny Simpson **Project Director** 

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### Appendix A Environmental Policy





# **Environmental Policy**

**15 December 2023** 



#### Introduction

The Port of Tauranga Limited (the Port) is committed to demonstrating environmental leadership. This is reflected in its commitment to preserving and ensuring sustainability of the environment for future generations.

#### **Purpose**

This policy is designed to ensure the actions of the Port are environmentally sustainable.

The Port is committed to maintaining the life supporting capacity of our environment and positively managing environmental resources for the benefit of the Port, local communities and its future generations. Initiatives include:

- Setting standards for environmental performance that are consistent with the Port's environmental aspirations.
- Creating an attitude of responsible and positive environmental performance.
- Sustainably managing adverse environmental effects and environmental risks associated with port activities by setting, monitoring, and improving (where practicable) environmental operational standards.
- Seeking opportunities to improve resource use efficiencies and where possible, reduce our environmental impact.
- Recognising the role of local iwi and hapu in the moana and its surrounds.

#### **Scope**

This policy details the principles behind environmental management decisions and procedures undertaken at the port.

This policy applies to all activities undertaken within port operational areas by all port users.

#### **Policy**

The Port endeavours to act as stewards of the environment and to advocate responsible environmental practice as follows:

- Requiring all port users to consider and undertake diligent environmental performance at all times for all activities.
- Requiring that activities undertaken on the Port comply with all relevant environmental legislation and regulations.

- Working with relevant stakeholders to create and update environmental operational standards to reduce environmental risk. Particular emphasis is to be placed on ensuring air and stormwater quality standards are met.
- Educating port users on environmental issues associated with activities, sharing best practice, and advising how to achieve conformance with the Port's environmental operational standards.
- Undertaking audits of port users' activities to monitor conformance with the Port's environmental operational standards.
- Addressing non-conformance with Port environmental operational standards and taking appropriate action.
- Seeking and incorporating continuous improvement opportunities, including technological advances and innovations, to current environmental operational standards and practices to improve environmental outcomes.
- Investigating all environmental incidents occurring on the port that are reported to the Port.
- Considering environmental impacts when purchasing equipment.
- Recognising and acknowledging strong environmental leadership and best practice on the port.
- The Port is a Toitū carbon reduce programme member and is committed to a greenhouse gas emissions management and reduction programme.
- The Port is targeting Net Zero Emissions by 2050.

**Approved:** Board of Directors, 15 December 2023

**Leonard Sampson** 

**Chief Executive** 

#### **Review**

Approved:	Board	
Policy Owner:	Chief Financial Officer	
Effective Date:	15 December 2023	
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Approval: The Chief Financial Officer or the Chief Executive has the auth-		
	approve minor revisions or amendments.	



## Appendix B Log Standard Operating Procedures





# Log Standard Operating Procedures



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# Purpose and Responsibilities

#### 1. Background

1.

1.1 This document (the Procedures) details the standard operating procedures for log handling that Port Users should follow while operating within the Port Operational Area. These procedures form part of the Port Industry Area Dust Management Plan (DMP), as required by Rule AREA2-R1 (Interim Permitted Activity Rule (IPAR) for Existing Activities in the Mount Maunganui Airshed) of the Bay of Plenty Regional Natural Resources Plan.

2. Scope

2.

- 2.1 These Procedures cover the physical area of the Port Operational Area (as detailed in Schedule 1).
- 2.2 The Procedures apply to:

All activities associated with log storage and handling within the Port Operational Area (**Log Operations**)

- 2.3 References in the Procedures to **Log Operators** means any party undertaking the activities identified below:
  - Transportation and receipt of logs via train or truck,
  - Collection and transfer of logs from train, truck or storage areas to storage, staging or berth areas,
  - Storage of logs,
  - Debarking of logs
  - Loading or unloading of logs onto a vessel,
  - Cleaning, movement and operation of equipment used for log handling operations,
  - Management and cleaning of land associated to log handling on the berth area, and
  - Any other operation associated with Log Operations.
- 2.4 References in the Procedures to **Yard Cleaning** (management and cleaning of land associated with log handling other than berth areas) means any Party undertaking the activities identified as Yard Cleaning.
- 2.5 The Procedures detail the Log Operators and Yard Cleaning standard operating procedures that should be followed. Dust Control measures applied in addition to those detailed in the Procedures can only replace the measures detailed in the Procedures if an exemption is provided by the Port of Tauranga Limited (POTL) (as detailed in Section 10).
- 2.6 POTL will monitor conformance with the Procedures. POTL is not responsible for conformance with the procedures by other Log Operators, this is the responsibility of the Log Operator.

2.7 The procedures form part of the Port Industry Area Dust Management Plan (DMP), as required by Rule AREA2-R1 of the Bay of Plenty Regional Natural Resources Plan.

#### 3. Log Operator – additional documentation

3.

- 3.1 Marshalling and stevedoring companies undertaking Log Operations may also have an Environmental Management Plan (EMP) or equivalent document which details how their Log Operations will align with the Procedures as well as include any other additional dust control measures that may be employed.
- 3.2 POTL may require a party undertaking Log Operations or associated activities to hold an EMP in respect to their activities

#### 4. Yard Cleaning – additional documentation

4.

- 4.1 Yard cleaning service operators engaged by the POTL may also have an EMP or equivalent document which details how their operations will align with the procedures, as well as:
  - how they will operate to minimise the generation of airborne particulate/dust when undertaking yard cleaning services,
  - how they will operate during times of elevated winds.
  - how they will operate during times when cleaning areas of high particulate load with high risk of dust generation, and
  - How they will prioritise their services to minimise the risk of adverse environmental effects occurring beyond the boundary of the Port Industry Area, as far as is practicable.

<u>Note</u>: Section 4.1 does not constrain such an EMP or equivalent document from including other environmental risk mitigation measures.

4.2 POTL may require Yard Cleaning Service operators to hold an EMP in respect to their activities

#### 5. Responsibilities of Parties

5.

- 5.1 POTL will maintain the Procedures and DMP and will provide access to the current version at <a href="https://www.port-tauranga.co.nz/health-safety/procedures-compliance/">https://www.port-tauranga.co.nz/health-safety/procedures-compliance/</a>.
- 5.2 POTL will provide bark and particulate removal services to recover bark and particulate material associated to general day to day log handling activities in the Port of Tauranga Log Yard. All materials recovered are the property and responsibility of the POTL or their authorised agent. This excludes:

- the Stevedores Work Area (See Schedule 3) which is the responsibility of the stevedore
- the excavator park lease areas (see Schedule 3) which is the responsibility of the lease holders.
- 5.3 Litter, dunnage, wood chip, spillages (hydrocarbons or other materials), spill response absorbent materials, are not considered to be associated with general day to day log handling activities. Recovery of these materials is the responsibility of the party whose activity they are associated.
- 5.4 All parties undertaking Log Operations including marshallers, stevedores, and transport providers must monitor their activities for conformance with the Procedures and any Environmental Management Plan required by Section 3.2 and undertake actions to correct non-conformances should they be identified.
- 5.5 All parties undertaking Yard Cleaning must monitor their activities for conformance with the Procedures and any Environmental Management Plan required by Section 4.2 and undertake actions to correct non-conformances should they be identified.
- 5.6 All parties undertaking Log Operations and Yard Cleaning must train their staff and contracted parties so that they are familiar with any EMP required by Section 3.2 and 4.2 and the sections of the Procedures applicable to their activities.
- 5.7 POTL will undertake routine monitoring of Log Operations and Yard Cleaning Services to check for non-conformances with the Procedures (in addition to the supervision of the parties undertaking the activities, detailed in Section 5.4). This may be achieved by in field observations (where possible) and via CCTV. If POTL identify non-conformances, actions should be taken by POTL to address the non-conformance.

# **Operating Procedures**

#### 6. Log Marshallers

- 6. Log Marshallers should at all times:
  - 6.1 Travel at or below the designated speed limits. These are sign-posted on site and detailed in Schedule 2.
  - 6.2 Adhere to the traffic management plan,
  - 6.3 Travel on designated roadway areas (as detailed in Schedule 2) as much as is practicable,

Note:

The intent of Section 6.3 is to avoid travel in areas not designated as a roadway (such as berth pre-load/staging areas or storage areas) Marshallers required to travel off designated roadways should undertake this work as per Section 6.4.

6.4 When Marshallers must operate within an area that is not a designated roadway they should restrict their speed as per Schedule 2 to minimise the generation excessive visible airborne dust.

Note:

When required to operate mobile plant in areas other than a designated roadway or a temporary roadway (as detailed in Section 6.4), Marshallers should identify and prioritise travel in areas with less particulate and dust accumulations where practicable. Heavy machinery travel through areas both swept and unswept may result in airborne dust generation. Speed reductions should be applied when operations cause excessive quantities of airborne dust.



Figure 1. Example of excessive visible airborne dust.

- 6.5 Marshallers may use a section of a log storage area as a 'temporary roadway' if:
  - 6.5.1 The temporary roadway is swept to a standard that is visually comparable to a designated roadway prior to its use, and
  - 6.5.2 Frequent sweeping occurs on the area to ensure it remains visually comparable to designated roadways for the time that it is used as a temporary roadway,
  - 6.5.3 Speeds are reduced if travel in these areas is generating excessive visible airborne dust.

- 6.6 Water should not be used for dust suppression within the Port Operational Area unless prior approval from POTL has been given, using the Section 10 approval process. Water use by Yard Cleaning services (vacuum sweeper trucks, bark ploughs and bark collection trailers) to supress dust generated by their operations is approved in its current form as at July 2024.
- 6.7 On request by POTL, Marshallers should temporarily cease operations (stand down), to allow for bark and particulate removal, vacuum sweeping, or other action. POTL may require stand-down in any area of the Port of Tauranga Operational Area.

POTL may require a stand down of an area when there are reasonable grounds to believe that Log Operations or activities in that area might be:

- 6.7.1 Causing or risking non-compliance with regional rules, as assessed by POTL, or
- 6.7.2 Causing nuisance or adverse effect within or beyond the Port Industry Area that POTL regards as requiring immediate mitigation action.

Note: Section 6.7 is in addition to Marshallers or other port operators responsibilities to monitor the effects of their activities and applying appropriate dust control measures to minimise environmental risk.

#### 7. Stevedores

7.

- 7.1 Prior to the commencement of a stevedoring Log Operation:
  - 7.1.1 The Stevedore should ensure that the Stevedores Work Area is of a 'clean state' and free of any particulate matter/dust or other material. Examples of what is considered a 'clean state' and free of foreign particulate matter is demonstrated in Figures 2 and 3 below.
  - 7.1.2 The Stevedore should have a sweeping plan in place that complies with Section 7.2

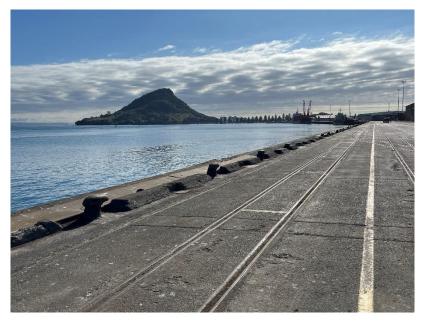


Figure 2. Example of a 'clean state' wharf apron and fender area



Figure 3. Example of a 'clean state' wharf apron

- 7.2 The Stevedore should ensure bark and dirt is removed from the Stevedores Work Area that they are using (refer to Schedule 3) including via vacuum sweeping. The minimum vacuum sweeping frequency should be:
  - For 'trailer' operations, once every 12 hours, and
  - For 'bunk' operations, once every four hours throughout an operation.
     Bark, dirt and other particulate matter/dust from on and around bunk structures must also be removed.
- 7.3 Water should not be used for dust suppression in the Port Operational Area unless prior approval from the POTL has been given using the Section 10 approval process.
- 7.4 Once stevedoring of a Log Operation is complete the Stevedore should ensure that the Stevedores Work Area apron is of a 'clean state' as demonstrated above in figures 1 and 2.

#### 8. Yard Cleaning Services

8.

- 8.1 POTL engages Yard Cleaning Services that remove bark and particulate by bark ploughing, bark collection and vacuum sweeping in the Port of Tauranga Log Yard area affected by Log Operations.
- 8.2 The stevedore's working area and excavator park lease area (as detailed in Schedule 3) are the responsibility of the Operators and/or leaseholders to vacuum sweep and maintain in a tidy condition.
- 8.3 Yard Cleaning Services operators should:
  - 8.3.1 Travel at or below the designated speed limits. These are sign-posted on site and detailed in Schedule 2.
  - 8.3.2 Travel on designated roadway areas (as defined in Schedule 2), as much as is practicable,

Note: Yard Cleaning Service mobile plant operating in areas outside of designated roadways as a part of day-to-day operations should follow Section 8.4. The intent of Section 8.3 is to advise

that other areas, such as berth pre-load/staging areas or storage areas are not used in the place or as an alternative to travel that could be undertaken on a designated roadway.

- 8.4 Yard Cleaning Service Providers should restrict their speed to under 10 km/h for vacuum sweeper trucks and 15 km/h for bark ploughs when actively recovering bark and particulate materials.
- 8.5 Where bark piles are formed during cleaning operations, these piles should:
  - 8.5.1 Be placed out of the way of log yard operations, where practicable.
  - 8.5.2 Not be moved across roadways, where practicable.
- 8.6 Yard Cleaning Services should meet the below levels of service:

Minimum vacuum sweeper hours per week	180
Minimum bark recovery hours (plough/loader/truck) per week	80
Weekday sweeper presence	0500 - 2300hrs
Saturday sweeper presence	0600-1800
Sunday sweeper presence	0600-1800

<u>Note:</u> At times of reduced log handling, such as at Christmas to New Year, these levels may reduce.

- 8.7 Yard Cleaning Service providers should cease operations if they are causing visible discharge of airborne dust beyond the boundary of the Port Industry Area, unless otherwise instructed by the POTL.
- 8.8 Yard cleaning services should cease bark ploughing, bark collection services and/or sweeping if the activity is causing visible airborne dust discharge greater than 20 metres from the area being cleaned.

Note:

If airborne dust is visible at a distance greater than 20 metres or beyond the Port Industry Area boundary occurs (as per Section 8.7 or 8.8), operators may reduce speed, in order to reduce dust and continue operations. If speed reduction actions are not able to achieve compliance with Section 8.7 or 8.8, then the operation is to shut down until compliance can be achieved, unless otherwise instructed by POTL. Such instruction from POTL would be made if it was considered that failure to recover the bark and/or particulate/dust material would result in greater adverse environmental effects.

#### 9. Truck transport operators and all other parties

9.

- 9.1 Whilst operating in the Port of Tauranga Facility, all other parties/Port Users undertaking Log Operations should:
  - 9.1.1 Travel at or below the designated speed limits. These are sign-posted and detailed in Schedule 2 and sign posted on site.

- 9.1.2 Adhere to traffic management plans in place.
- 9.1.3 Travel on designated roadway areas (see Schedule 2), as far as is practicable, unless entry is required for the loading or unloading of logs or other legitimate purpose

Note:

The intent of Section 9.1 is to avoid unnecessary travel in areas not designated as roadway (such as berth preload/staging or storage areas). Some Log Operators are required to travel in areas outside of designated roadways as a part of day to day operations. In those instances, Log Operators shall comply with Section 9.2.

9.2 If a truck transport operator is required to operate within an area other than a designated roadway they should restrict their speed (as defined in Schedule 2) as required to prevent the generation of excessive visible airborne dust, as much as is practicable

Note:

When required to operate mobile plant in areas other than a designated roadway, Log Operator should also identify and prioritise travel in areas with less particulate and dust accumulations. Vehicle travel through areas that have been swept may still result in the generation of airborne dust in which case speed reduction is recommended to reduce dust generation.

- 9.3 Water should not be used for dust suppression in the Port of Tauranga Operational Area unless prior approval from the POTL has been given. Details on how to seek approval to undertake water dust suppression are in Section 10.
- 9.4 Truck transport providers should only sweep bark and particulate material off their trucks and trailers at the designated sweeping area of the trailer hoisting facility.

# Administration

## 10. Exemptions and approvals (water suppression, alternative equipment)

10.

10.1 An application for exemption from any part of the Procedures must state what section the exemption is sought from, why, for how long and any additional or alternative dust control measures proposed instead. Applications are to be made to the POTL Environmental Manager prior to operations commencing.

POTL reserves discretion to apply any reasonable conditions to a granted exemption, or to decline it.

#### 10.2 Water suppression

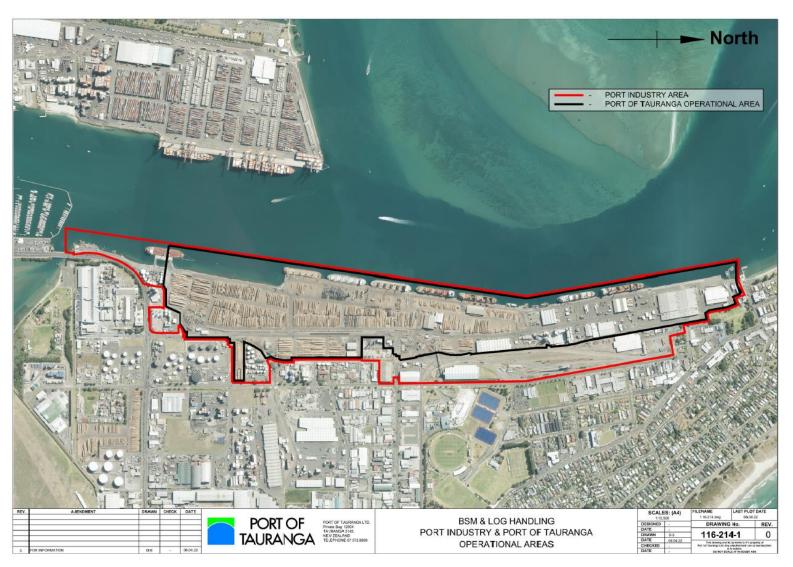
- 10.2.1 An application to use water suppression must state which section the exemption is sought from, why, for how long and any additional or alternative mitigation measures proposed. Applications are to be made to the POTL Environmental Manager prior to operations commencing.
- 10.2.2 POTL reserves discretion to apply any reasonable conditions to a granted exemption, or to decline it.

#### 10.3 Changes to equipment

- 10.3.1 Any party wishing to use new or alternative equipment (type or technology) for any Log Operation activity must seek prior approval from POTL. This includes any alternative to the standard equipment type and technology used on site as of in the 12-months ending on 12 February 2024.
- 10.3.2 In assessing the proposal POTL will consider:
  - The degree of mitigation of environmental effects provided by the equipment compared to current equipment;
  - Potential environmental effects both within and beyond the Port Industry area associated with the equipment or technology, including potential impacts on compliance with any relevant legislation or regulation;
  - Potential logistical issues associated with the equipment or technology that may directly affect POTL infrastructure, operation or procedure, or the operations and procedures of other port users, and
  - Any potential additional infrastructure requirements or constraints that may occur as a result of the new equipment or technology.
- 10.4 The assessment will be recorded in Vault (or similar)
- 10.5 POTL reserves the right to apply any reasonable conditions to such proposals or to decline the request for approval if it is considered that the effects/impacts outweigh the benefits for the matters listed above.

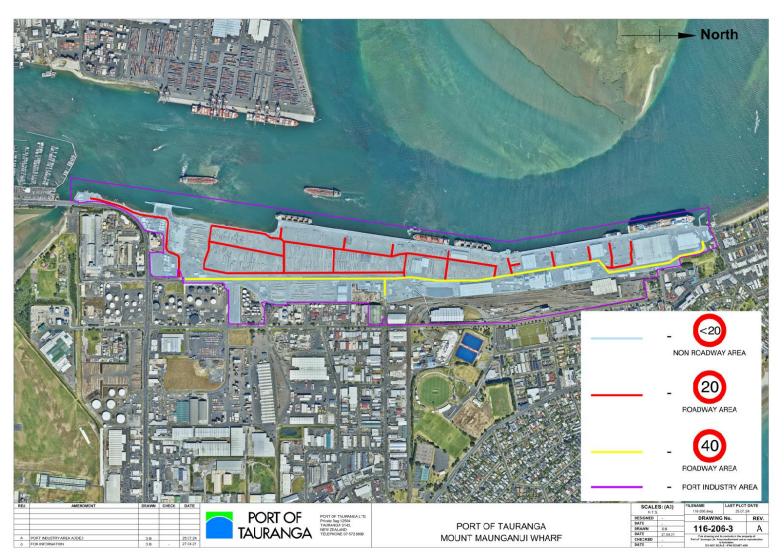
Note: logistical aspects that are relevant are the effects on: site weight limits/ wharf loadings, equipment transport, cleaning, operational and storage space requirements, space or timing effects on services to other Port Users

Schedule 1 – Port of Tauranga Operational Area



Port Industry Area Log Handling Standard Operating Procedures v1.0

Schedule 2 – Designated speed limits and roadways



Port Industry Area Log Handling Standard Operating Procedures v1.0

#### Schedule 3 – Stevedore's work area



Port Industry Area Log Handling Standard Operating Procedures v1.0

### **Appendix C** Key contacts

Company	Role	Contact details
POTL	Environmental Manager	Joey McKenzie
		027 600 5901 joey.mckenzie@port-tauranga.co.nz
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