



Planning &
Environment

**STATE SIGNIFICANT DEVELOPMENT ASSESSMENT:
Port Kembla Bulk Liquids Terminal
SSD 7264**



Environmental Assessment Report
Section 89H of the
Environmental Planning and Assessment Act 1979

September 2016

ABBREVIATIONS AND DEFINITIONS

Applicant	TQ Holdings Pty Ltd
Council	Wollongong City Council
Construction	The demolition of buildings or works, carrying out of works, including earthworks, erection of buildings and other infrastructure covered by this consent
Council	Wollongong City Council
DA	Development Application
Demolition	The removal of buildings, sheds and other structures on the site
Department	Department of Planning and Environment
Development	The development as described in the EIS and RTS for the construction and operation of a bulk liquids terminal
DPI	Department of Primary Industries
EIS	Environmental Impact Statement titled <i>Proposed Port Kembla Bulk Liquids Terminal</i> prepared by Cardno, dated 4 December 2015
EPA	Environment Protection Authority
EP&A Act	<i>Environmental Planning and Assessment Act 1979</i>
EP&A Regulation	<i>Environmental Planning and Assessment Regulation 2000</i>
EPI	Environmental Planning Instrument
EPL	Environment Protection Licence
HIPAP	Hazardous Industry Planning Advisory Paper
HIPAP No. 4	<i>Hazardous Industry Planning Advisory Paper No. 4: Risk Criteria for Land Use Safety Planning</i>
HIPAP No. 6	<i>Hazardous Industry Planning Advisory Paper No. 6: Hazard Analysis</i>
Minister	Minister for Planning
OEH	Office of Environment and Heritage
Operation	The import, storage and distribution of bulk liquids as described in the EIS
RMS	Roads and Maritime Services
RTS	Response to Submissions titled <i>Response to Submissions – Proposed Port Kembla Bulk Liquids Terminal</i> prepared by Cardno Pty Ltd, dated 7 April 2016
SEARs	Secretary's Environmental Assessment Requirements
Secretary	Secretary of the Department, or nominee
Sensitive receiver	Residence, education institution, health care facility, religious facility and child care facility
SEPP	State Environmental Planning Policy
SEPP 33	<i>State Environmental Planning Policy No. 33 – Hazardous and Offensive Development</i>
SRD SEPP	<i>State Environmental Planning Policy (State and Regional Development) 2011</i>
SSD	State significant development
Three Ports SEPP	<i>State Environmental Planning Policy (Three Ports) 2013</i>

Cover photo: Port Kembla Bulk Liquids Terminal (Source: Environmental Impact Statement for Port Kembla Bulk Liquids Terminal)

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EXECUTIVE SUMMARY

TQ Holdings Pty Ltd (the Applicant) has lodged a Development Application (DA) and accompanying Environment Impact Statement (EIS) seeking consent to construct and operate a bulk liquids terminal for the importation, storage and distribution of finished fuel products at Port Kembla in the Wollongong local government area (LGA). The terminal would have a total combined storage capacity of 288 mega litres (ML) of petroleum fuel products (including diesel and gasoline) and ethanol and would be comprised of storage tanks, truck loading and unloading equipment and berthing infrastructure. The proposed development would be located on Tom Thumb Road, Port Kembla on four allotments within the operational area of Port Kembla, which is owned and managed by NSW Ports.

In recent years, the Australian fuel supply market has undergone a number of significant changes in response to increased competition from new large-scale refineries in the Asia Pacific region. In NSW, the decline and cessation of all fuel refining in NSW and the ongoing need for the State to have a secure and diverse fuel supply network has created a strong market demand for fuel storage facilities. The Applicant has identified an opportunity to meet the growing demand for fuel products in the Illawarra, Central and Southern NSW.

The proposal is State significant development pursuant to Clause 27(1) of *State Environmental Planning Policy (Three Ports) 2013* (Three Ports SEPP) because it:

- involves development that is within the Port Kembla lease area that is classified as designated development under Schedule 3 of the *Environmental Planning and Assessment Regulation 2000* (EP&A Regulation); and
- has a capital investment value of more than \$100 million.

Consequently, the Minister for Planning is the consent authority for the proposed development.

The proposed development has a capital investment value of \$172 million and would provide up to 139 jobs during construction and 12 jobs during operation.

The Department exhibited the Environmental Impact Statement (EIS) for the development from Friday 11 December 2015 until Friday 29 January 2016 and received ten submissions, including eight from government agencies and two from neighbouring industrial facilities.

Key concerns related to hazards and risks, air quality, traffic and transport, noise and vibration. The Applicant submitted a Response to Submissions (RTS) in June 2016 to address and clarify matters raised in the submissions.

The Department's assessment of the application has fully considered all relevant matters under Section 79C of the EP&A Act, the objects of the EP&A Act and the principles of ecologically sustainable development. The Department identified the following key issues for assessment:

- hazards and risks;
- air quality and odour impacts;
- traffic and transport; and
- noise and vibration impacts.

The Department's assessment concludes the proposed development would satisfy the Department's risk criteria and relevant air quality and noise criteria at the nearest sensitive receivers. While the development would generate up to 206 truck trips a day at full operation, the development can be accommodated by the local road network and can be managed via an operational traffic management plan.

The Department has recommended a number of conditions to manage and monitor hazards and risks, air quality, traffic, soil and water, including but not limited to implementation of:

- a number of hazard studies to ensure the risk from the development to the surrounding environment is minimised;
- air quality and odour measures including dust minimisation measures, implementation of best practice technology and a leak detection and reduction program to manage air and odour emissions during construction and operation of the development; and

- soil and water measures including stormwater management measures to address soil and water impacts during construction and operation of the development.

Consequently, the Department considers the development is in the public interest and should be approved, subject to conditions.

1. BACKGROUND

1.1. The Department's Assessment

This report details the Department's assessment of a State significant development application (SSD 7264) for the Port Kembla Bulk Liquids Terminal. The development involves the construction and operation of a bulk liquids storage and distribution terminal. The Department's assessment considers all documentation submitted by the Applicant, including the Environmental Impact Statement (EIS) and Response to Submissions (RTS), and submissions received from government authorities, stakeholders and the public. The Department's assessment also considers the legislation and planning instruments relevant to the site and the development.

This report describes the proposed development, surrounding environment, relevant strategic and statutory planning and the issues raised in submissions. The report evaluates the key issues associated with the development and provides recommendations for managing any impacts during construction and operations. The Department's assessment of the Port Kembla Bulk Liquids Terminal concludes the development is in the public interest and should be approved, subject to conditions.

1.2. Project Background

TQ Holdings Pty Ltd (the Applicant) is seeking development consent to construct and operate a bulk liquids terminal for the importation, storage and distribution of finished fuel products at Port Kembla in the Wollongong local government area (LGA) (see **Figure 1**). The terminal would have a total combined storage capacity of 288 mega litres (ML) of petroleum fuel products (including diesel and gasoline) and ethanol and would be comprised of storage tanks, truck loading and unloading equipment and berthing infrastructure.

The terminal would be located on Tom Thumb Road, Port Kembla on four separate lots within the operational area of Port Kembla (the Port), which is owned and managed by NSW Ports (see **Figure 2**).



Figure 1: Regional Context (development outlined in red)

The recent decline and cessation of all fuel refining in NSW and the ongoing need for the state to have a secure and diverse fuel supply network has created a strong market demand for fuel storage facilities. The Applicant is an integrated fuel storage and distribution group of companies, partnering with petroleum suppliers and logistics providers. It has identified an opportunity to meet the growing demand for fuel products in the Illawarra, Central and Southern NSW.

1.3. Site Description

The site comprises Sites 1, 2 and 3 and Berth 104 (as identified in **Figure 2**) and is located on Tom Thumb Road in Port Kembla, approximately 70 kilometres (km) south of Sydney and 3 km south of Wollongong City Centre (see **Figure 1**). The site is connected to Wollongong via Springhill Road and to Sydney via the Princes Highway. The Port itself is located on a highly modified estuary at the mouth of Allens Creek and the Gurungaty Waterway.

The proposed development is located over the four separate lots comprising the site which totals 7.22 hectares (ha) (depicted and described in **Figure 2** and **Table 1** below).

Table 1: Development Lot Details

Site	Lot	DP	Size (hectares)
Site 1	3	1125445	1.8
Site 2	301	1148391	4.139
Site 3	11	1182111	0.367
Berth 104	70	1182824	0.91

The site is predominantly covered by gravel and devoid of vegetation. It is not subject to flooding and all site levels are at least 1.7 metres (m) above the levels of the adjacent Garungaty Watercourse. Green and Golden Bell Frogs (a threatened species listed under State and Commonwealth legislation) are known to inhabit the site and the broader Port Kembla area.

1.4. Surrounding Land Uses

A number of industrial and port-related uses operate in the vicinity of the site, including the Port Kembla Coal Terminals, BlueScope Steelworks, Autonexus, Australian Amalgamated Terminals (AAT) and GrainCorp Terminal (refer to **Figure 2**). Berth 104 is currently used by the Graincorp Terminal (a grain and bulk liquids storage facility).

Historically, activities at the Port have been predominantly around coal (export) and steel (import of raw materials and export of steel products). However, between 2007 and 2012, three new berths and 53 hectares of land were developed in the Port Kembla Inner Harbour to accommodate for existing cargo and the operation of the largest vehicle importing hub in Australia. Currently, NSW Ports is developing the Port Kembla Outer Harbour, which will provide additional land and berthing facilities to cater for future trade growth. The Port is also the main grain export port for Southern NSW and directly and indirectly contributes 3,860 jobs and \$839 million to the regional economy each year.

The nearest residential areas are located around 1.3 km north and north-west of the site in the suburbs of Wollongong and Coniston (see **Figure 1**).

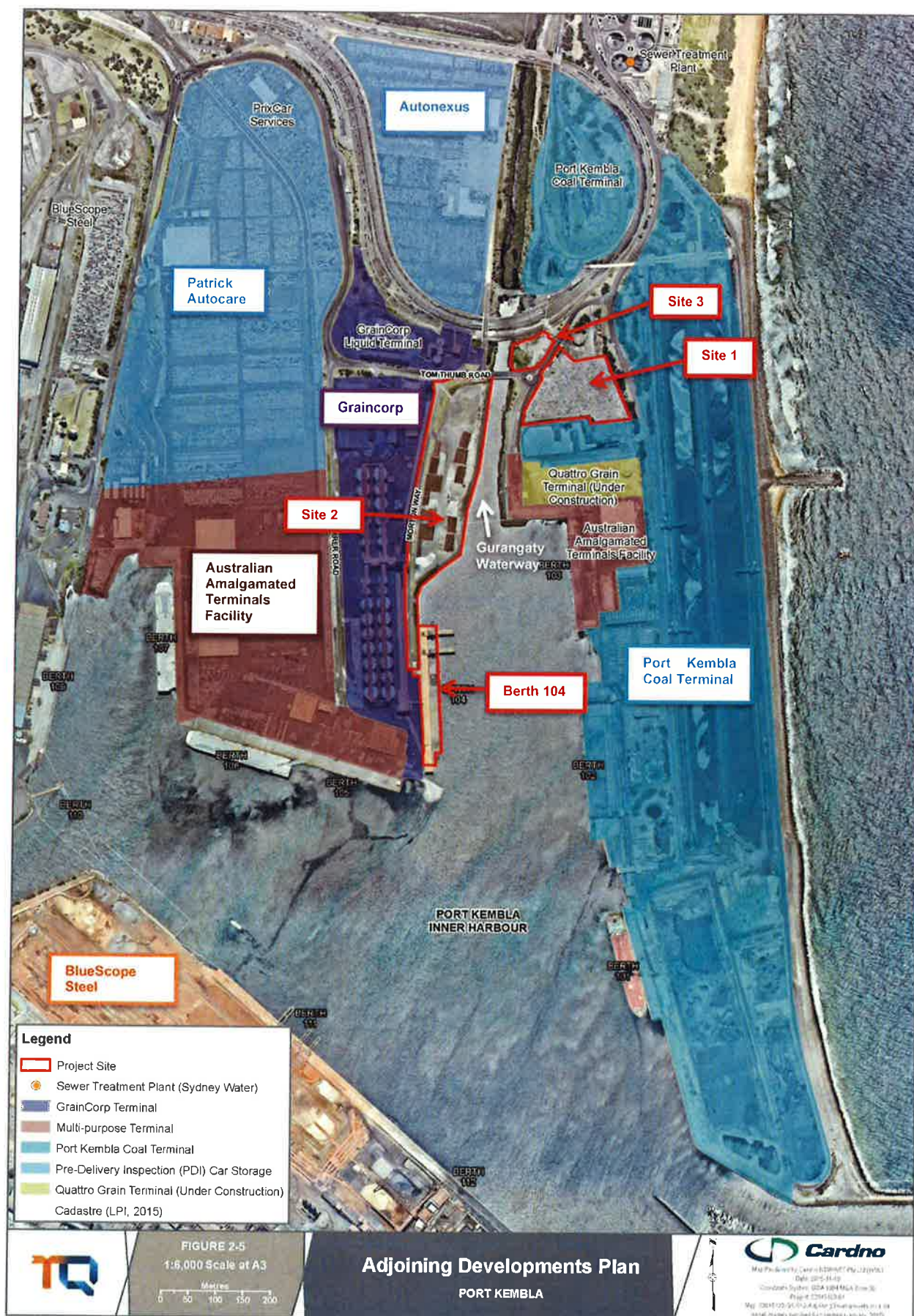


Figure 2: Development Sites 1, 2, 3, Berth 104 and Surrounding Land Uses

2. PROPOSED DEVELOPMENT

2.1. Description of the Development

The Applicant is proposing to construct and operate a bulk fuels terminal for the importation, storage and distribution of petroleum fuel products and ethanol. The major components of the development are summarised in **Table 2**, shown in **Figure 3** and **Figure 4** and described in full in the Environmental Impact Statement (see **Appendix D**).

Table 2: Main Development Components

Aspect	Description
<i>Development Summary</i>	The development would operate as an import, storage and distribution terminal for the storage of up to 288 ML of combustible and flammable liquids. The application includes: • 23 tanks for the storage of up to 288 ML at any one time of combustible and flammable liquids; • truck and ship unloading and loading equipment; • 13 waste (slops) tanks and 2 firewater tanks; • piping and pumping equipment for fuel transfer and firefighting; and • control room, offices and amenities. At maximum production, the facility would have the capacity to receive an estimated 2,900 ML of finished fuel products per annum. Product would be received at Berth 104 from tanker ships, transferred by pipeline to storage tanks and distributed to customers across NSW by road tanker.
<i>Staged Construction works</i>	The Applicant proposes to undertake the proposed development in three stages as described in Table 3 and Figure 3. The key elements of the proposed development include: • the staged construction of steel tanks for the storage of flammable and combustible liquid products, slops (spillage and spill liquids) and fire water. All tanks would be constructed with fixed external roofs and those containing flammable fuels would be constructed with an internal floating roof design; • the construction of up to six truck loading bays; • construction of a vapour recovery unit (VRU); and • ship unloading infrastructure. General construction activities include bulk earthworks across all sites (all three sites require 4,355 m³ of fill in total), the installation of drainage and stormwater infrastructure, concrete piling for tanks, construction and fabrication of piping and tanks.
<i>Tanks and bunding</i>	• Tanks would be sized between 20-29 m in diameter and between 20-29 m in height (see Figure 3). • Sites 1 and 2 would be surrounded by external walls of 1.8 m height. A 0.6 m bund would also be provided where required.
<i>Pipelines, pump bays and manifolds</i>	• Pipelines and pump bays to allow the transfer of fuel products between Site 1 and 2 and Berth 104. • Berth manifold to connect the shore lines to the marine unloading arms. • Manifold at Site 2 to transfer fuel products between tanks.
<i>Ship movements</i>	• Stage 1 – 22 vessels per year. • Stage 2 – 25 vessels per year. • Stage 3 – 32 vessels per year. Initially Berth 104 would receive one vessel per month, eventually moving up to two vessels per month. Smaller vessels would be in Port for up to 24 hours, larger vessels would require up to 48 hours to unload.
<i>Truck Movements</i>	Up to 206 trucks daily when fully operational (Stage 3).
<i>Operation</i>	The development would allow for the following operations: • ship unloading at Berth 104 then product distribution to a manifold at Site 2; • tank to tank transfers between tanks on Sites 1 and 2; • tank recirculation; and • direct road tanker loading on Site 2.
<i>Working Hours</i>	• Construction: 7am to 6pm (Monday to Friday), 8am to 1pm (Saturday); and • Operation: 24 hours, 7 days a week. All terminal activities would be controlled from within a control room.
<i>Capital investment value</i>	\$172 million
<i>Employees</i>	Construction – 139 Operation – 12

2.2. Staging Plan

The development consists of three main stages and is described in **Table 3** and **Figure 3**.

Table 3: Staging Plan

Stage	Development Proposed	Commencement Date and Product Throughput
Stage 1	Stage 1 development would occur on all four lots and includes: • 7 combustible liquid storage (CL) tanks on Site 1; • 5 flammable liquid storage (FL) tanks on Site 1; • 2 FL tanks on Site 2; • slop tanks on Site 1; • bund walls around Site 1 and the Site 2 tanks; • 3 truck loading bays on Site 2; • service bridge between Sites 1, 2 and 3; • pump bay and product piping to the truck loading bays from Site 1 to Site 2; • workshop and control room facilities on Site 3; • landscaping along perimeter of Site 3; • fire systems, utilities, stormwater and pavements for constructed areas; • vessel unloading equipment including rail mounted trolley with 3 marine loading arms (MLAs) and associated infrastructure on Berth 104; • vapour recovery unit and additive storage and injection system on Site 2; and • nitrogen and compressed air supply systems and oily water separation system on Site 3.	Stage 1 operations would commence in early 2018. The throughput after completion of Stage 1 is anticipated to be 720 ML per annum at commencement, increasing up to 1,200 ML per annum.
Stage 2	Stage 2 development would occur predominantly over Site 2 and includes: • 3 FL tanks on Site 2; • 2 CL tanks on Site 2; • partial bunding of Site 2; • fit out of 1 additional truck loading bay on Site 2; • pump bay and product piping to allow transfer from Site 2 to Site 1; and • fire and stormwater management systems for additional constructed areas.	Stage 2 operations would commence in late 2018. The additional capacity will allow throughput to increase to 2,000 ML per annum
Stage 3	Stage 3 development would occur predominantly over Site 2 and Berth 104 and includes: • 2 FL tanks on Site 2; • 2 CL tanks on Site 2; • additional bunding of Site 2; • a fourth MLA on Berth 104; • 2 additional truck loading bays on Site 2; and • fire systems and stormwater for additional constructed areas.	Commencement of Stage 3 pending market demand. The additional capacity will allow throughput to increase to 2,900 ML per annum.

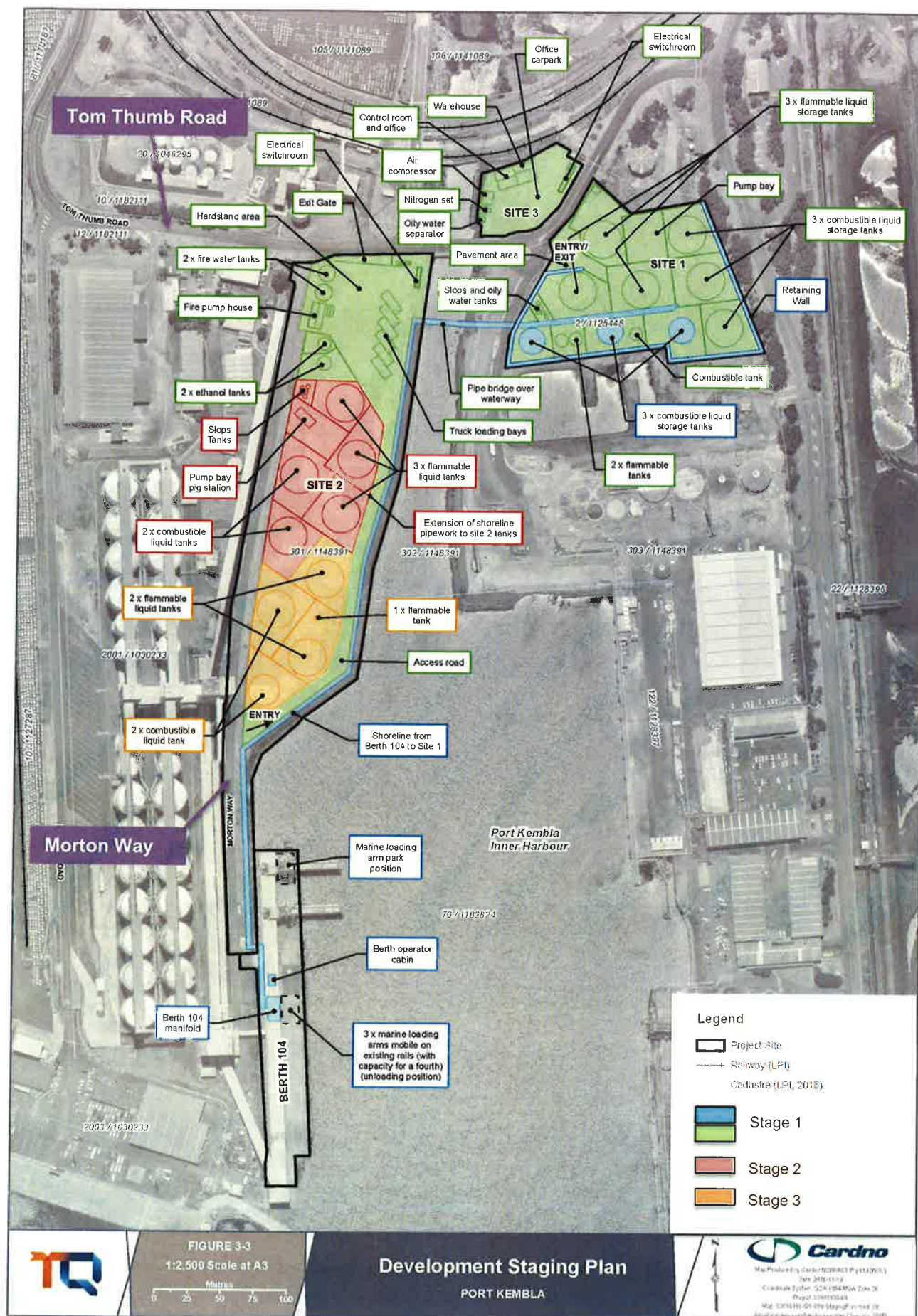


Figure 3: Development Staging Plan

2.3. Fuel Import, Storage and Distribution

The fuel import, storage and distribution process is illustrated in **Figure 4** and described below:

- marine loading arms (MLAs) would unload gasoline from ships at Berth 104. These MLAs would be located at the northern end of the berth to ensure no disruption to existing Graincorp operations;
- fuel products would be transferred via the MLAs to the Site 2 manifold, where it would be piped directly into tanks on Site 2;
- fuels can also be transferred between any tank on any site (i.e. Sites 1 or 2) via the Site 2 manifold;
- ethanol, biodiesel and other additives would also be received at the site via road tanker delivery. These tankers would enter Site 2 on Morton Way (see **Figure 2**), unload via dedicated unloading pumps and the product would be transferred to tanks on Site 1 or Site 2; and
- finished fuel products are then distributed from the development via single, rigid or B-double road tankers to petrol stations across the Illawarra, Central and Southern NSW region.

Road tankers would access the development via Morton Way at the southern end of Site 2, travelling in a one way direction towards the truck loading bays at the northern end of Site 2 (see **Figure 3**). The road tankers would be filled with a variety of gasoline blends and diesel/biodiesel blends using 'in-line blending' or 'in-tank' blending. Road tankers would leave Site 2 via an exit gate on Tom Thumb Road.

All terminal activities would be controlled by a central control room on Site 3. Site 3 would also contain warehousing, an administration building and the development's stormwater treatment system (oily water separator).

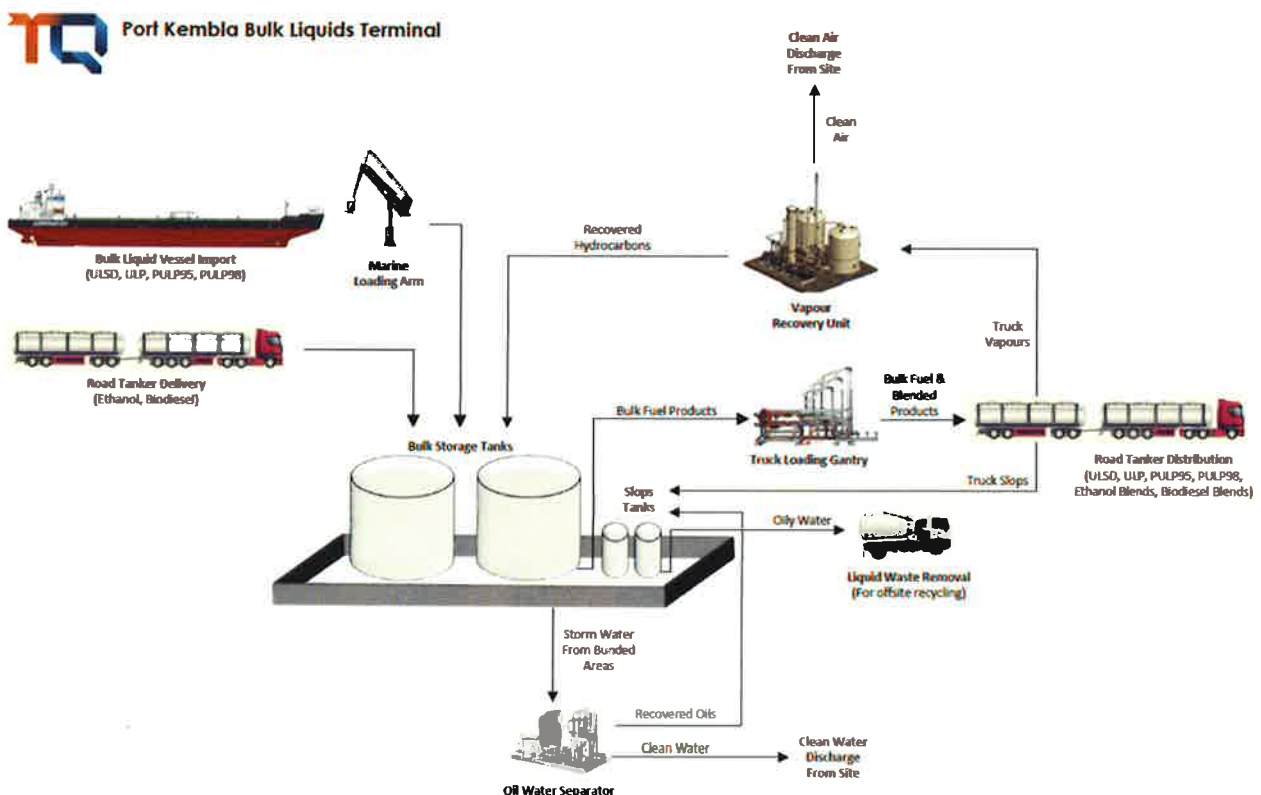


Figure 4: Port Kembla Bulk Liquids Terminal - Fuel Import, Storage and Distribution Process

2.4. Applicant's Need and Justification for the Development

There is currently a strong demand for new portside fuel storage terminals, as all fuel refining activities in NSW have recently ceased. The development would assist Australia in meeting its obligations as a member of the International Energy Agency (IEA), whereby petroleum storage reserves are required to be equivalent to 90 days of the previous year's imports. According to the IEA, Australia has not met this obligation since around 2000. The development would therefore contribute to Australia meeting its international obligations for fuel storage and would also contribute to meeting the growing fuel needs of the Illawarra, Central NSW and Southern NSW.

The proposed development would:

- optimise the use of existing underutilised land and infrastructure at Port Kembla;
- attract \$172 million worth of investment to the Wollongong region;
- generate 139 jobs during the construction phase and 12 jobs once operational; and
- provide new portside fuel storage facilities to service growing NSW markets.

3. STATUTORY AND STRATEGIC CONTEXT

3.1. Strategic Context

The NSW Government has announced the Premier's Priorities which cover 12 key areas including economic growth, provision of infrastructure, protection of vulnerable communities, improving education and environmental protection. One of the Premier's key priorities is 'Creating Jobs'. The NSW Government aims to provide 150,000 new jobs in NSW over the next four years.

The proposed development would contribute toward 'Creating Jobs' by providing 139 construction and 12 ongoing operational jobs in the Wollongong LGA. The development also represents a \$172 million capital investment in industrial development which would have flow on economic benefits for the Illawarra, Central and Southern NSW regions.

As the site is located within an industrial and operational port area, the site would continue to be used for industrial purposes and would be developed to cater for the anticipated increase in fuel demand in the Illawarra, Central and Southern NSW regions.

3.2. State Significant Development

The proposal is State significant development pursuant to Clause 27(1) of *State Environmental Planning Policy (Three Ports) 2013* (Three Ports SEPP) because it:

- involves development that is within the Port Kembla lease area that is classified as designated development under the *Environmental Planning and Assessment Regulation 2000* (EP&A Regulation); and
- has a capital investment value of more than \$100 million.

Consequently, the Minister for Planning is the consent authority for the proposed development.

3.3. Permissibility

The SP1 – Special Activities zone applies to the site under the Three Ports SEPP. Development for a fuel storage terminal is permissible with development consent in the SP1 zone. Therefore, the Minister or delegate may determine the carrying out of the development.

3.4. Consent Authority

On 16 February 2015, the Minister delegated the functions to determine SSD applications to the Executive Director, Key Sites and Industry Assessments, Planning Services where:

- the relevant local council has not made an objection;
- there are less than 25 public submissions in the nature of objections; and
- a political disclosure statement has not been made.

There were no public objections to the proposed development and Council did not object to the proposed development. No reportable political donations were made by the Applicant in the last two years and no reportable political donations disclosures were made by any persons who lodged a submission.

Accordingly, the application can be determined by the A/Executive Director, Key Sites and Industry Assessments under delegation.

3.5. Other Approvals

Under Section 89K of the EP&A Act, other approvals may be required and must be approved in a manner that is consistent with any Part 4 consent for the SSD under the EP&A Act.

In its submission, the EPA advised that the proposed development requires an Environment Protection Licence (EPL) from the EPA under the *Protection of the Environment Operations Act 1997* (POEO Act). The Department has considered the relevant issues relating to the issue of an EPL in the assessment of the proposal (see Section 5 of this report).

3.6. Consideration under Section 79C of the EP&A Act

Section 79C of the EP&A Act sets out matters to be considered by a consent authority when determining a development application. The Department's consideration of these matters is set out in Section 5 and **Appendix B**. In summary, the Department is satisfied the proposed development is consistent with the requirements of Section 79C of the EP&A Act.

3.7. Environmental Planning Instruments

Under Section 79C of the EP&A Act, the consent authority, when determining a development application, must take into consideration the provisions of any environmental planning instrument (EPI), draft EPI (that has been subject to public consultation and notified under the EP&A Act) that apply to the proposal.

The Department has considered the development against the relevant provisions of several key EPIs including:

- *State Environmental Planning Policy (Three Ports) 2013* (Three Ports SEPP);
- *State Environmental Planning Policy (State and Regional Development) 2011* (SRD SEPP);
- *State Environmental Planning Policy (Infrastructure) 2007* (the ISEPP);
- *State Environmental Planning Policy No. 33 – Hazardous and Offensive Development* (SEPP 33);
- *State Environmental Planning Policy No. 55 – Remediation of Land* (SEPP 55); and
- *Wollongong Local Environmental Plan 2012*.

The Department's assessment concludes that, subject to the implementation of the recommended conditions of consent, the development is generally consistent with the aims, objectives and provisions of these instruments (see **Appendix C** for further detail).

3.8. Public Exhibition and Notification

Under Section 89F(1) of the EP&A Act, the Secretary is required to make the development application and any accompanying information of an SSD application publicly available for at least 30 days. The application was on public exhibition from **Friday 11 December 2015** until **Friday 29 January 2016**. Details of the exhibition process and notifications are provided in Section 4.1.

3.9. Objects of the EP&A Act

The Department has fully considered the objects of the EP&A Act, including the encouragement of Ecologically Sustainable Development (ESD), in its assessment of the application.

The Department considers the following objects are most relevant to the assessment of this application:

- (a) *to encourage:*
 - (i) *the proper management, development and conservation of natural and artificial resources, including agricultural land, natural areas, forests, minerals, water, cities, towns and villages for the purpose of promoting the social and economic welfare of the community and a better environment,*
 - (ii) *the promotion and co-ordination of the orderly and economic use and development of land,*
 - (vi) *the protection of the environment, including the protection and conservation of native animals and plants, including threatened species, populations and ecological communities, and their habitats,*
 - (vii) *ecologically sustainable development,*
- (b) *to promote the sharing of the responsibility for environmental planning between the different levels of government in the State, and*
- (c) *to provide increased opportunity for public involvement and participation in environmental planning and assessment.*

The Department has fully considered the objects of the EP&A Act, including the encouragement of Ecologically Sustainable Development (ESD), in its assessment of the (see **Table 3**).

Table 3: Objects of the EP&A Act and Relevance to the Development

Object	Consideration
5(a)(i)	The proposal would ensure the proper management and conservation of natural resources, as it would utilise an existing industrial site. The site is zoned for industrial use and has been strategically identified for industrial and port related uses. Development of the site would promote economic

	welfare for the local community through the provision of 139 construction jobs and 12 operational jobs.
5(a)(ii)	The proposal would ensure the orderly and economic use of the land, which is zoned for industrial use within an existing port. The proposal would enable the site to continue to be used for industrial purposes consistent with its zoning.
5(a)(vi)	The Department's assessment in Section 5 of this report demonstrates that with the implementation of recommended conditions of consent, the impacts of the development can be mitigated and/or managed to ensure an acceptable level of environmental performance.
5(a)(vii)	The development is consistent with the principles of ESD as it would utilise an existing industrial site for the continued supply of fuel to customers in Sydney and NSW, without adverse impacts on the natural environment.
5(b)	The Department has assessed the development in consultation with, and giving due consideration to, the technical expertise and comments provided by Council and other government authorities. This is consistent with the object of sharing the responsibility for environmental planning between the different levels of government in the State.
5(c)	The Department provided the public with opportunity to comment on the proposal and considered all issues raised in the public submissions during its assessment of the application (Section 4). The Department also consulted with the relevant government authorities and Council during preparation of the EIS.

3.10. Ecologically Sustainable Development

The EP&A Act adopts the definition of ESD found in the *Protection of the Environment Administration Act 1991*. Section 6(2) of that Act states that ESD requires the effective integration of economic and environmental considerations in decision-making processes and that ESD can be achieved through the implementation of:

- a) *the precautionary principle;*
- b) *inter-generational equity;*
- c) *conservation of biological diversity and ecological integrity; and*
- d) *improved valuation, pricing and incentive mechanisms.*

The potential environmental impacts of the development have been assessed and, where potential impacts have been identified, mitigation measures and environmental safeguards have been recommended.

As demonstrated by the Department's assessment in Section 5 of this report, the development is not anticipated to have any adverse impacts on native flora or fauna, including threatened species, populations and ecological communities, and their habitats as it would utilise an existing industrial site. The development requires the removal of 0.02 hectares of Green and Golden Bell Frog habitat which would be offset by the purchase and retiring of 1 species credit in accordance with the *NSW Biodiversity Offsets Policy*. Any environmental impacts from the proposed development would be minimised through the provision of management and mitigation measures. As such, the Department considers the proposal would not adversely impact on the environment and is consistent with the objectives of the EP&A Act and the principles of ESD.

3.11. Environment Protection and Biodiversity Conservation Act 1999 (EPBC Act)

Under the EPBC Act, assessment and approval is required from the Commonwealth Government if a development is likely to impact on a matter of national environmental significance (MNES), as it is considered to be a 'controlled action'. The EIS for the development included a preliminary assessment of the MNES in relation to the development and concluded the development would not impact on any of these matters, and is therefore not a 'controlled action'. As such, a referral to the Commonwealth Government was not required.

4. CONSULTATION AND SUBMISSIONS

4.1. Consultation

The Applicant, as required by the Secretary's Environmental Assessment Requirements (SEARs), undertook consultation with relevant local and State authorities as well as the community and affected landowners. The Department undertook further consultation with these stakeholders during the exhibition of the EIS and throughout the assessment of the application. These consultation activities are described in detail in the following sections.

4.1.1. Consultation by the Applicant

The Applicant undertook a range of consultation activities throughout the preparation of the EIS including:

- a community information session with the Port Kembla Pollution Group; and
- meetings with key government agencies, NSW Ports and NSW Port Authority and adjoining neighbours in the Port including the Port Kembla Coal Terminal and the Grain Corp Terminal.

4.1.2. Consultation by the Department

After accepting the EIS for the application, the Department:

- made it publicly available from **Friday 11 December 2015** until **Friday 29 January 2016**:
 - on the Department's website;
 - at the Department's offices (Bridge Street, Sydney and Crown Street Wollongong);
 - at the Wollongong City Council (Council offices); and
- notified landowners in the vicinity of the site about the exhibition period by letter;
- notified relevant State government authorities and Wollongong City Council by letter; and
- advertised the exhibition in the Illawarra Mercury newspaper.

A total of 10 submissions were received by the Department in response to its exhibition. This comprises eight from public authorities, and two from the neighbouring leaseholders in the Port. A summary of the issues raised in the submissions is provided below. A full copy of these submissions is included in **Appendix E**.

4.2. Submissions

4.2.1. Public Authorities

Wollongong City Council (Council) did not object to the development but requested additional information with regards to traffic, stormwater and flooding. Following review of the Applicant's Response to Submissions (RTS) report, Council provided recommended conditions for flooding and drainage works for the site.

The **Environment Protection Authority (EPA)** advised the development would require an Environmental Protection Licence (EPL). The EPA sought additional information and clarification on a number of issues including air quality (product specification, vapour recovery control efficiency and cumulative air quality impacts), discharge to waters and construction and operational noise (including truck noise). The Applicant provided supplementary information to address air quality and noise issues. A further meeting was required onsite to discuss water quality and managing truck noise at the site. The EPA provided recommended conditions of consent including implementation of a lead detection and reduction program, noise limits and water quality concentration limits.

NSW Roads and Maritime Services (RMS) stated that a permit is required to be obtained from RMS prior to transporting over-mass or oversized loads during construction activities. RMS advised that the proposed development would not affect the classified road network.

The **Office of Environment and Heritage (OEH)** requested further information on the Green and Golden Bell Frog (GGBF) (noting that one species credit would be required to offset potential impacts on the GGBF) and consultation undertaken on aboriginal cultural heritage. The Applicant provided additional information in the RTS. OEH provided a recommended condition for the Applicant to purchase and retire one GGBF species credit.

Fire and Rescue NSW (FRNSW) commented on the proposed fire water systems for the development and recommended that a Fire Safety Study should be prepared and submitted to FRNSW for approval, should consent be given.

The **Department of Primary Industries (DPI Water)** recommended the Applicant be required to consult with DPI Water should groundwater be encountered during excavation or earthworks activities. Depending on quantity, a permit to extract groundwater may be required.

NSW Health noted the Human Health Risk Assessment (HHRA) would require updating following any amendments to the air quality assessment but was satisfied the potential chronic and acute health impacts would be low.

Safework NSW (formerly WorkCover NSW) recommended the Applicant consult further with Safework NSW during detailed design to satisfy its requirements under the *Work Health and Safety Act 2011* for a Major Hazard Facility.

4.2.2. Public

The **Graincorp Terminal (GrainCorp)** requested clarification with regards to the shared use of Berth 104, the Preliminary Hazard Analysis (PHA), traffic modelling, construction noise and impacts on a sediment pit utilised by Graincorp on Site 3. The Applicant met with Graincorp on several occasions to resolve any outstanding issues and provided additional information in the RTS report.

The **Port Kembla Coal Terminal (PKCT)** raised concerns with regards to the off-site risks to its personnel and whether the proposal would restrict the future development of its site. The submission also sought a response to specific technical questions regarding the PHA. The Applicant met with PKCT to discuss outstanding hazards and risk issues and provided additional information in the RTS report.

4.3. Response to Submissions

In July 2016, the Applicant provided a response to the issues raised in the submissions (see **Appendix F**). The Response to Submissions (RTS) report was made publicly available on the Department's website.

The RTS included:

- details of minor changes to the staging of the development;
- additional information on the suitability of the development and assessment of heat radiation impacts on neighbouring facilities in response to GrainCorp and PKCT submissions;
- additional air and noise modelling to include neighbouring industrial receivers in response to the EPA submission; and
- details of proposed discharge limits including characterisation and assessment of the likely impacts of discharges to the local waterway.

The Department has considered the issues raised in submissions and the Applicant's RTS in its assessment of the development.

5. ASSESSMENT

The Department has considered the EIS, the issues raised in submissions and the Applicant's RTS in its assessment of the development. The Department considers the key issues relate to hazards and risk, air quality, traffic and transport and noise and vibration. Other issues are considered to be minor and are discussed in Section 5.4.

5.1. Hazards and Risks

The handling and storage of combustible and flammable liquids presents various hazards and risks to the surrounding environment. The development is identified as a Major Hazard Facility (MHF) under the *Work Health and Safety Act 2011* and the development is deemed a 'potentially hazardous industry' under the provisions of *State Environmental Planning Policy No. 33 – Hazardous and Offensive Development* (SEPP 33). Therefore, a detailed risk assessment was undertaken as part of the EIS.

Sherpa Consulting prepared a PHA as part of the EIS to assess the potential risk to people, property and the environment as a result of the development. The PHA was carried out in accordance with the Department's *Hazardous Industry Planning Advisory Paper (HIPAP) No. 6 – Hazard Analysis*.

The purpose of the PHA is to identify potential hazards, analyse consequences and the likelihood of occurrence, then estimate the resultant risk to surrounding land uses. The risks are then compared with the relevant land use safety criteria defined in the Department's *HIPAP No. 4 – Risk Criteria for Land Use Safety Planning* to determine whether the development would pose an unacceptable risk to surrounding land uses.

Consideration

The PHA identified the major hazardous materials with potential for off-site safety or environmental effects which are gasoline, diesel, ethanol and additives.

The likely hazardous incidents involving the above materials with potential to cause injury or fatalities to people, or damage to property or the biophysical environment include releases from storage tanks, releases from pipework and releases during filling operations (overfilling).

The PHA also considered the likelihood of each incident (frequency) occurring and the potential consequences of these hazardous incidents. A number of safeguards were included in the risk assessment to reduce the frequency of a scenario. These include:

- rim seal fire detection and automatic foam suppression; and
- measures to prevent tank overfill, such as primary and secondary radar tank level gauge, hydrocarbon detection in the intermediate bund sump and operator initiated emergency shut down for loss of containment at Berth 104 and the road tanker gantries.

The potential consequences identified in the PHA include bund fires (immediate ignition) or flash fires (delayed ignition) in the event of overfilling storage tanks. The Department considers the appropriate techniques were used to analyse the potential consequence and likelihood of each identified hazardous scenario and is satisfied it is consistent with HIPAP No. 6.

The frequency and consequence for the release events were combined to estimate the risk from the development which was then assessed against the risk criteria in HIPAP No. 4. The individual fatality risk criteria for various land uses is shown in **Table 4** below.

Table 4: Individual Fatality Risk Criteria

Land Use	Risk Criteria (risk per million per year)*
Hospitals, schools, child-care facilities, old age housing	0.5
Residential, hotels, motels, tourist resorts	1
Commercial developments including retail centres, offices and entertainment centres	5
Sporting complexes and active open space	10
Industrial	50

* Note: Criteria refers to a chance of a fatality occurring in a million years

The risk assessment found the development complies with all the Department's risk criteria in HIPAP No. 4, except the criterion for individual fatality risk for industrial land uses and the criterion for property damage and accident propagation risk.

The Department identified the following key issues for further consideration which are discussed in detail below:

- exceedance of the individual fatality risk criteria for industrial uses;
- exceedance of the property damage and accident propagation risk criteria; and
- transport of dangerous goods.

A number of minor or residual issues are also discussed at the end of this section.

Individual Fatality Risk for Industrial Uses

The PHA showed the individual fatality risk contour for industrial land uses (50 per million per year (pmpy)) would extend off-site by approximately 20 m into the Gurangaty Waterway (see **Figure 5**, blue contour). The PHA noted the affected area is a shallow waterway, which precludes ship or boat access, and is within the Port area, which restricts public access.

The Applicant confirmed the following arrangements would be in place to ensure unauthorised personnel cannot access the Gurangaty Waterway:

- the waterway would be patrolled by the Port Authority of NSW Harbour Master, which authorises the movement and berthing of vessels within the Port; and
- when a berth is in operation, the waterway would be deemed a maritime security zone and access would only be permitted to authorised personnel.

Based on the above safeguards, the Department considers it is unlikely that unauthorised personnel or a member of the general public would access this area, particularly when a ship is at berth. In addition, no industrial activities can take place in the waterway, nor can ships can access the area due to the shallow depth of the waterway. Despite the risk criteria being exceeded, HIPAP No. 4 also states that a higher

industrial risk criterion may be acceptable if an industrial site or part of the site involves only the occasional presence of people, such as in the case of a bulk fuels terminal.

SafeWork NSW and FRNSW did not raise any concerns regarding the exceedance of the risk criteria. The Department therefore considers the development would not pose a significant risk to nearby industrial land uses. Importantly, the Department notes the development complies with the risk criteria for residential land uses.

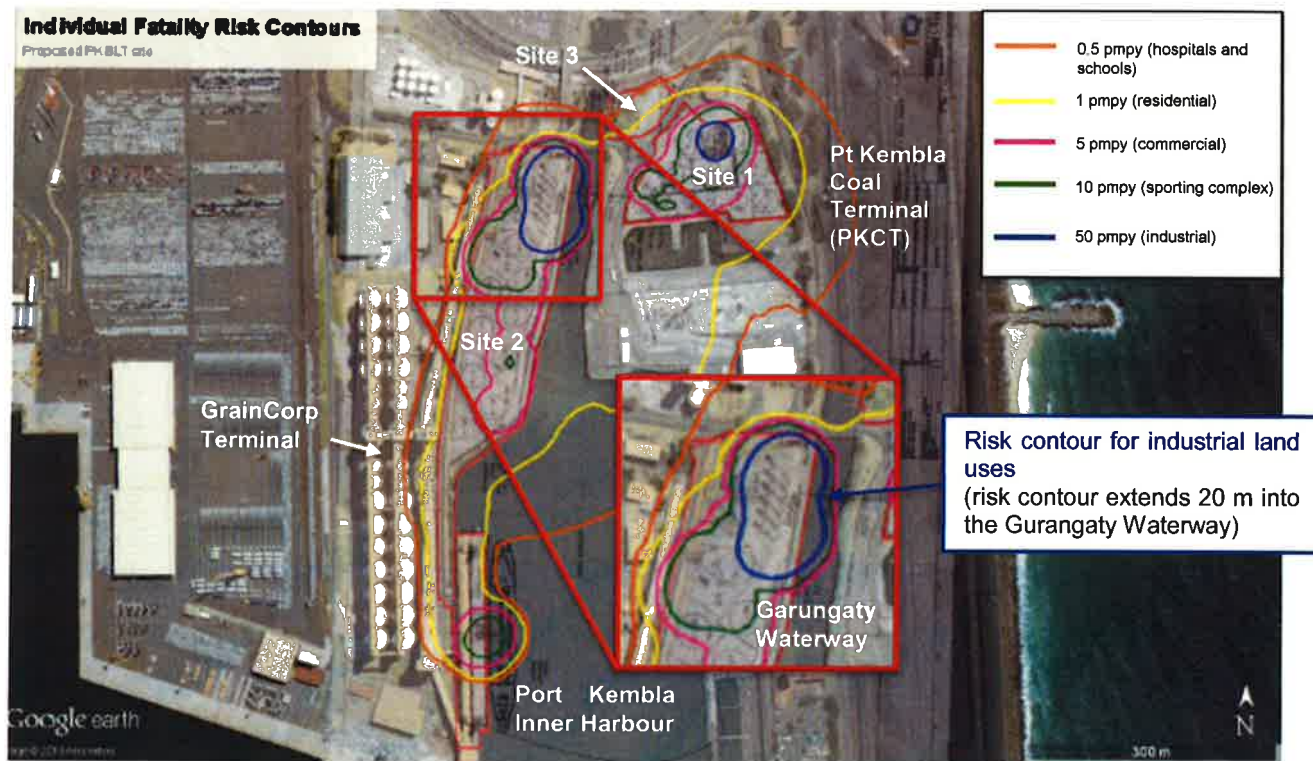


Figure 5: Individual Fatality Risk Contour (50 pmpy) for Industrial Uses (Blue Contour)

Property Damage and Accident Propagation Risk

The criterion for property damage and accident propagation risk (i.e. 'domino effect') relates to the potential of an accident occurring at the development causing damage to buildings and propagating to neighbouring industrial operations. **Figure 6** shows that the risk contour (in blue) extends 5 m north of the development (Site 1) into neighbouring industrial land, therefore exceeding the assessment criteria (50 pmpy). This land is currently leased to the Port Kembla Coal Terminal (PKCT) and is zoned to accommodate potentially hazardous installations. Currently, no equipment, structures or dangerous goods are located in this area.

PKCT raised concerns about the potential restrictions this may place on any future development of this land. In addition, PKCT and GrainCorp requested further information on the potential heat radiation impacts (i.e. heat levels) from the development on PKCT and GrainCorp assets. The Applicant undertook a consequence analysis which showed the development could potentially result in heat radiation impacts on both PKCT and GrainCorp assets in the event of a bund fire or flash fire at the site. However, as the likelihood of these events happening are low (due to the proposed controls as discussed earlier), the risk of property damage and accident propagation would not affect PKCT or GrainCorp's operations and therefore, is only limited to land 5 m north of the development boundary.

Notwithstanding this issue, the Department understands the PHA is based on a preliminary design and has requested the Applicant consider options to reduce the damage and propagation risk. The Applicant advised that further refinements can be made to the design to minimise the risk associated with the site, such as relocating the pump bays on Site 1 to bring the risk contour back to within the site boundary.

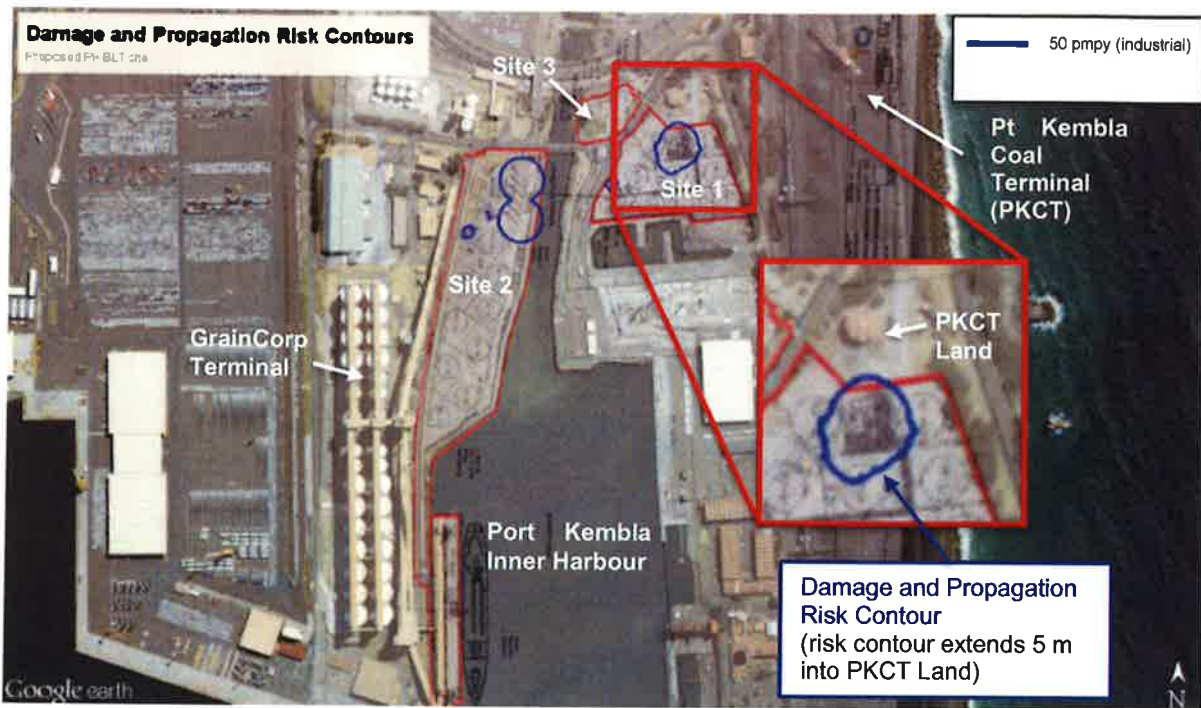


Figure 6: Damage and Propagation Risk Contour – Heat Radiation

The Department agrees with this approach, however the Applicant will be required to demonstrate in the Final Hazard Analysis that the development would not impact surrounding land uses. If the risk is not adequately addressed at the detailed design stage, the Applicant will be required to implement a Risk Reduction Program to ensure the risk contour from the development will be within the site's boundary. The Department has included a number of conditions to reflect this requirement.

Further, the Applicant will be required to also address the potential heat radiation impacts in its Fire Safety Study required for the development. The Applicant would also continue to work closely with PKCT and GrainCorp to ensure the risks of the development does not impact on PKCT and GrainCorp personnel and operations.

Transport of Dangerous Goods

The development is also potentially hazardous due to the number of road tanker movements (around 206 truck trips a day at Stage 3 operations) which are carrying Class 3 PG II materials (i.e. flammable liquids). As a result, a transport route evaluation study was required in accordance with *HIPAP No. 11 – Route Selection*. The EIS stated the preferred route is via internal Port roads including Tom Thumb Road, Morton Way and Springhill Road before heading onto the M1 Princes Motorway (see section 5.3 for further details).

The Department considers the risk associated with the transport of dangerous goods is low particularly as these roads do not pass through a residential area to connect directly with the M1 Princes Motorway. Despite this, the Department recommends a condition for the Applicant to prepare a Route Selection Study to ensure the most appropriate route is used.

Other Issues

The PHA also considered other issues including the cumulative risk of the development and the Applicant's response to the Buncefield incident investigation report (UK Health and Safety Executive, *"Buncefield Explosion Mechanism Phase 1"*, RR718, 2009). Additional issues were also raised by government agencies, which are discussed below.

The PHA considered the cumulative risk of the development and nearby existing facilities including the PKCT and GrainCorp. The PKCT and GrainCorp operations contain coal stockpiles and grain silos which have the potential for coal dust explosions and coal stockpile fires at the PKCT site and dust explosions at the Graincorp terminal. The Department reviewed the separation distances of the PKCT and GrainCorp terminals should such events occur and considers that only localised impacts would occur and is unlikely to impact the development. The Department is therefore satisfied the cumulative risk is low.

In response to the findings of the Buncefield report, the PHA confirmed the Buncefield report recommendations that are applicable to the development would be implemented. The Department considers the Applicant has appropriately addressed the Buncefield recommendations and is satisfied with the Applicant's proposed actions.

SafeWork NSW did not object to the proposal, but raised concerns around potential pipeline failures due to high surge pressures occurring at the marine loading arms. The Applicant confirmed it would undertake a surge analysis during detailed design to determine the adequate valve closure times. SafeWork NSW and the Department is satisfied with the Applicant's commitments and the Department has recommended a Surge Analysis be included in the Final Hazard Analysis for the development.

FRNSW and the EPA commented on the design requirements of the development's proposed fire systems with FRNSW recommending the Applicant continue to liaise with FRNSW during the preparation of the Fire Safety Study. The Department has recommended this requirement in the conditions of consent. The EPA commented on the type of firefighting foam required, noting the foam should not contain components that may lead to long-term toxic impacts on the environment. The Applicant confirmed the Fire Safety Study and fire system design would consider the following:

- selection and justification of firefighting foams to be handled or used; and
- characterisation of any potential discharges to surface or groundwater and how these would be mitigated.

The Department is satisfied the Fire Safety Study would include provisions for how firefighting foam and firewater would be managed on site.

Conclusion

The Department's assessment concludes the development would meet the relevant risk criteria and would not increase the risk to surrounding land uses, through the implementation of the proposed risk reduction measures and all recommendations in the PHA required by the conditions of consent.

To ensure the development operates in a safe manner, a number of conditions are recommended at various stages of construction and operation. This includes conditions at the pre-construction, pre-commissioning, pre-startup, post-startup phases and conditions relating to the ongoing operation of the development. The Applicant is required to submit the following for review and approval:

- a Construction Safety Study consistent with the Department's relevant guidelines;
- a Fire Safety Study considering and, if necessary, implementing measures to ensure acceptable fire protection levels;
- a Final Hazard Analysis in accordance with the Department's relevant guidelines which also includes provisions for a risk reduction program;
- a Hazard and Operability Study consistent with the Department's relevant guidelines which also incorporates a surge analysis;
- a Route Selection Study consistent with the Department's relevant guidelines;
- a comprehensive Emergency Plan and Safety Management System;
- Pre-Startup and Post-Startup Compliance Reports detailing compliance with all conditions required to be satisfied prior to and after operation has commenced; and
- ongoing independent Hazard Audits for the development to ensure safety and compliance with all statutory documents and approvals.

5.2. Air Quality and Odour

The storage and transfer of petroleum liquids has the potential to release volatile organic compounds (VOCs) and polycyclic aromatic hydrocarbons (PAHs), which could result in acute and chronic health impacts on the local community.

Consideration

The primary emissions from the development include:

- air and odour emissions from VOCs and PAHs from tank venting and breathing losses, ship unloading and truck loading operations;
- combustion emissions (auxiliary engine) from ships importing finished petroleum products at Berth 104;
- fugitive emissions from leakages, spills and truck loading gantry; and
- dust emissions and exhaust emissions from construction activities.

Pacific Environment prepared an Air Quality Impact Assessment (AQIA) in accordance with the EPA's *Approved Methods for the Modelling and Assessment of Air Pollutants in New South Wales, 2005*.

Construction

Construction activities associated with the development, including earthworks, tank and bund construction and the use of construction vehicles, have the potential to generate dust or particulate matter and vehicle emissions such as nitrogen oxides (NO_x) and sulfur dioxide (SO₂). The construction of Stage 1 operations is expected to take 24 months to complete. Stage 2 would commence construction at the same time as Stage 1 and conclude 6 months after the commencement of Stage 1 operations. The construction of Stage 3 would depend on market factors.

The AQIA indicated the potential impacts from dust and vehicle emissions would be minimal. The Applicant has committed to implementing best practice measures to minimise dust and vehicle emissions including but not limited to, keeping the number of stockpiles to a minimum and ensuring vehicles are fitted with emissions control equipment. These measures would be detailed in a Construction Environmental Management Plan (CEMP). The nearest industrial receiver (GrainCorp) is at least 26 m from the boundary of the proposed development, while the closest residential receiver is 1.3 km north and north-west of the site in the suburbs of Wollongong and Coniston.

The Department and the EPA concur with the Applicant's commitments and conclusions and are satisfied air emissions during construction can be adequately managed through a CEMP. The Department has recommended formalising the Applicant's commitments for managing air emissions during construction in the recommended conditions of consent and that these measures be incorporated into the CEMP.

Operation

Tanks holding finished fuel products have the potential to release VOCs and PAHs, several of which may be toxic at high concentrations. According to the Applicant, the most significant air quality emissions would occur during road tanker loading and from tanks storing petroleum products (from tank venting and breathing). Other sources of emissions include combustion sources, specifically from ship engines at Berth 104. The AQIA considered the following pollutants to be of potential concern: benzene, toluene, xylene, ethylbenzene and PAH (as Benzo[a]pyrene).

Dispersion modelling was undertaken assuming maximum operations with truck loading occurring 24 hours a day. At the request of the EPA, the Applicant also considered additional emission sources in close proximity to the proposed development including adjoining industrial receivers at the boundary of the site and the BlueScope Steelworks, to the south of the site.

The AQIA found there would be no exceedances of the EPA criteria for all pollutants modelled at all sensitive receivers. At the nearest industrial receiver (R15 – Farer Road (GrainCorp)), the predicted concentration for benzene would be 0.0038 mg/m³ (13% of the EPA criterion of 0.029 mg/m³) and the predicted concentration for xylene would be 0.0349 mg/m³ (18% of the EPA criterion of 0.19 mg/m³). The assessment concluded no adverse impacts are likely to occur as a result of the development at and beyond the site boundary or at sensitive receivers.

The AQIA predicted odour levels from VOCs and PAHs would be below the assessment criteria of 2 Odour Units (OU) at all sensitive receptors except at the site boundary (R22 and R23) where odour levels would be just above 2 OU. The Applicant has acknowledged there may be instances where adverse odour emissions can occur, but it has committed to minimising air and odour emissions by designing and operating the development in line with best practice and industry standards such as ensuring tanks are fitted with internal floating roofs and installing a vapour recovery unit (capable of achieving 99.5% efficiency) as the primary emissions control device to recover VOCs during road tanker loading. The Applicant has also committed to implementing an odour response management plan to ensure odour impacts are minimised and managed and this would be incorporated into an operational air quality management plan for the development.

The EPA and the Department are satisfied the development is well below the EPA's air quality assessment criteria for all pollutants modelled, with the exception of odour emissions which are at the upper limits of the EPA's odour assessment criteria. The EPA has recommended the Applicant implement a leak detection and repair (LDAR) program during operation to identify and minimise any potential fugitive VOCs and PAH emissions from the development. The Department considers a LDAR program and implementation of the Applicant's commitments would be acceptable for managing any potential air

and odour emissions from the development. The Department has included these requirements in the recommended conditions of consent. The Department also recommends a condition for the Applicant to implement an Operational Air Quality Management Plan, which would incorporate an ongoing air and odour emissions monitoring program. The Department's assessment concludes air quality impacts from the development can be adequately managed, subject to the Applicant's commitments and the implementation of relevant conditions of consent.

Human Health Risk Assessment (HHRA)

Environmental Risk Sciences prepared a HHRA for the development which focused on the short (acute) and lifetime (chronic) health impacts from exposure to PAHs and VOCs including, benzene, toluene, ethylbenzene and xylenes. The HHRA assessed VOCs and PAHs against inhalation exposure at maximum operation.

The HHRA found for these emissions, all concentrations in the air would be well below a level that has the potential to result in adverse health effects in all members of the public associated with acute and chronic exposure. The HHRA concluded the development at maximum operation would have no acute or chronic impacts on the local community surrounding the development.

NSW Health was satisfied the HHRA used an appropriate approach for the assessment of human health impacts but noted the HHRA identified an unacceptable level of risk at R2 – Wollongong Greenhouse Park in its assessment of chronic inhalation exposures, associated with potential VOC and PAH emissions.

Given R2 is a recreational area, the Applicant stated the assessment of exposure at R2 was overly conservative as it assumed the public would be exposed for 24 hours per day, 365 days a year over a lifetime. The Applicant revised the exposure level to reflect the average time a person is likely to spend outdoors and determined the exposure risk at R2 would be within an acceptable level. NSW Health agreed with the Applicant's conclusions. The Department concludes the development would meet an acceptable level of risk and is not expected to result in adverse health effects on the local community.

Conclusion

The Department's assessment concludes the potential air quality and odour impacts can be adequately managed at the site with minimal health effects on the local community. The development will be operated in line with best practice and industry standards to minimise air and odour emissions. The Department has included a number of conditions requiring the Applicant to comply with air emission limits set out in the EPL for the site and to prepare and implement an AQMP.

5.3. Traffic, Access and Parking

The proposed development will generate truck movements to and from the Port which has the potential to impact on the capacity and efficiency of the local road network.

Consideration

Cardno prepared a Traffic Impact Assessment (TIA) in accordance with relevant RMS guidelines. The TIA assessed two scenarios for the development:

- Stage 1 operations/Stage 2 construction; and
- Stage 3 operations.

The site would be accessed via Tom Thumb Road/Morton Way and Springhill Road, then either Masters Road (for northern routes) or Five Islands Road (for southern routes) before joining the M1 Princes Motorway (see **Figure 7**). The TIA noted the heavy vehicles accessing the development would consist of B-double, single and rigid trucks with B-double trucks making up 50% of the fleet.

Construction and Operational Traffic Volumes

During construction and operation, personnel numbers on the site would vary greatly. The TIA predicted the maximum number of light vehicles (used by staff) would occur during the Stage 2 construction period with 150 vehicle trips per day (see **Table 5**). During Stage 3 (maximum) operations, the number of light vehicles accessing the site is predicted to reduce to 12 vehicle trips per day.

The number of heavy vehicles accessing the site would also vary greatly until the commencement of Stage 3 operations. During Stage 1 operations and Stage 2 construction, the development is predicted to generate up to 24 trips per hour during AM/PM peak periods. At Stage 3, the development would

generate up to 36 trips per hour during AM/PM peak periods respectively, with a total of 206 trips per day. This would be higher than during any construction stage.

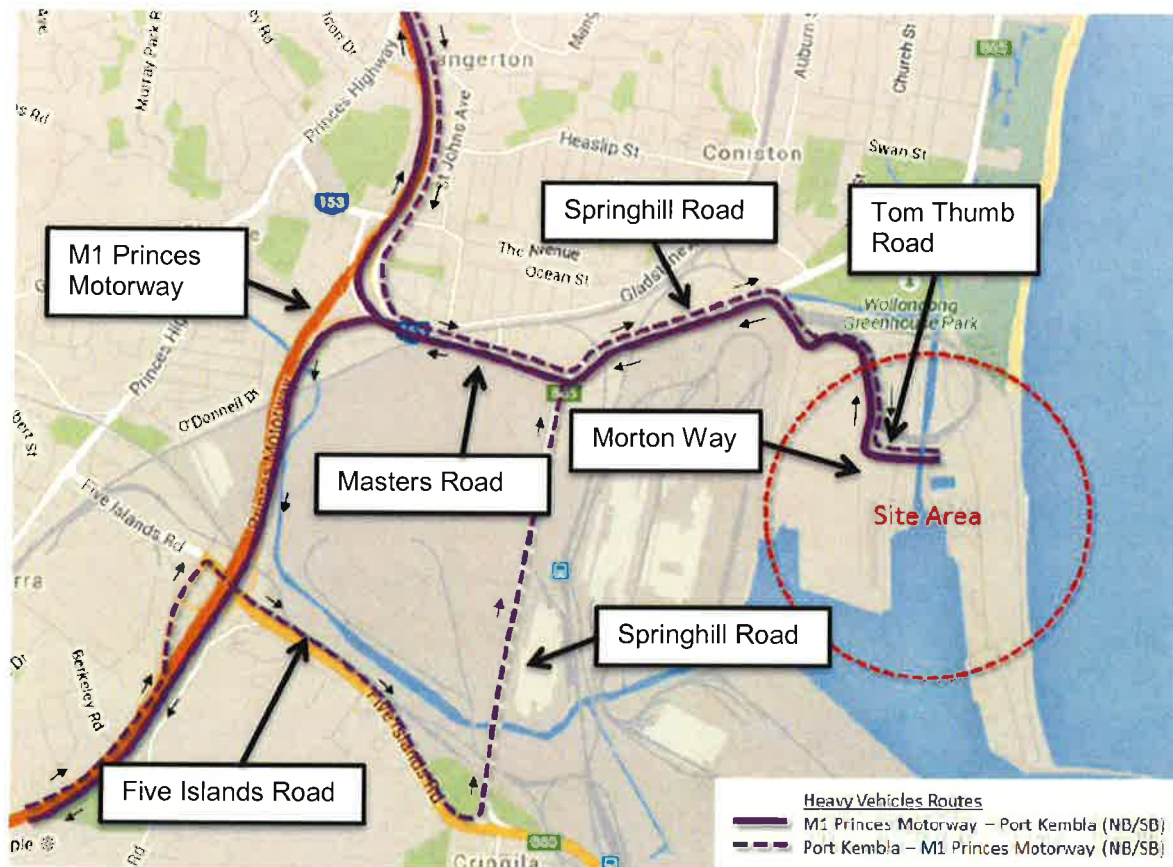


Figure 7: Heavy Vehicle Route and Key Access Roads to and from the Site

Table 5: Peak Traffic Generation

Stage	Trips per day		AM/PM Peak	
	Light vehicles	Heavy vehicles	Light vehicles	Heavy vehicles
Stage 1 Operations and Stage 2 Construction (concurrent)	150	94	120	24
Stage 3 Operations (ongoing)	12	206	10	36

A SIDRA analysis was undertaken for key intersections to assess intersection performance during peak periods. The key intersections are:

- Masters Road/Springhill Road;
- Springhill Road/Tom Thumb Road;
- Tom Thumb Road/Yampi Way; and
- Tom Thumb Road/Farrer Road.

During Stage 1 operations and Stage 2 construction (year 2018), all key intersections would operate at an acceptable Level of Service (LoS) C or better during the AM and PM peak periods. At Stage 3 operations (year 2026 future scenario), the assessment found all key intersections would continue to operate at an acceptable Level of Service (LoS) C or better during the AM and PM peak periods, with the exception of the Masters Road/Springhill Road intersection which would perform at LoS E (at capacity) during the AM peak period and a LoS D (operating at near capacity) during the PM peak period.

The TIA also analysed the Masters Road/Springhill Road intersection with and without the development for the year 2026 scenario. The TIA found that without the development, the intersection is anticipated to operate at a LoS D during AM peak periods. When modelled with the development, the intersection is anticipated to operate at LoS E during AM peak periods. The RMS did not object to the proposal noting the Masters Road/Springhill Road intersection would reach capacity by 2026 regardless of the

development. At this stage, no future upgrades are planned for the Masters Road/Springhill intersection and the RMS has not required the Applicant to undertake any works. The Department understands the performance of this intersection would continue to be monitored by the RMS as operations in the Port continue to expand.

The Applicant has committed to implementing a Traffic Management Plan (TMP) to manage traffic impacts during construction and operation. The TMP would include details regarding:

- hours of haulage, haulage routes, details on vehicle turning, parking, loading and unloading;
- sequence for implementing traffic works and traffic management devices if required; and
- details of a truck slot booking system to prevent queueing on internal port roads and external roads (during construction and operation).

The Department considers the local road network has the capacity to accommodate the additional trucks generated by the development, but notes that as the Port continues to expand, the performance of key intersections such as Masters Road/Springhill Road would need to be monitored by the RMS. The Department agrees with the Applicant's commitments and considers the traffic impacts associated with the development can be managed via a construction and operational Traffic Management Plan. This has been included in the recommended conditions of consent.

Access and Parking

Access to the development site is shown in **Figure 8** and described below:

- Tom Thumb Road for Sites 1 and 3 (tanks, site control room, office block, maintenance work shop and utilities); and
- Morton Way for Site 2 (tanks, truck loading facilities and Berth 104).

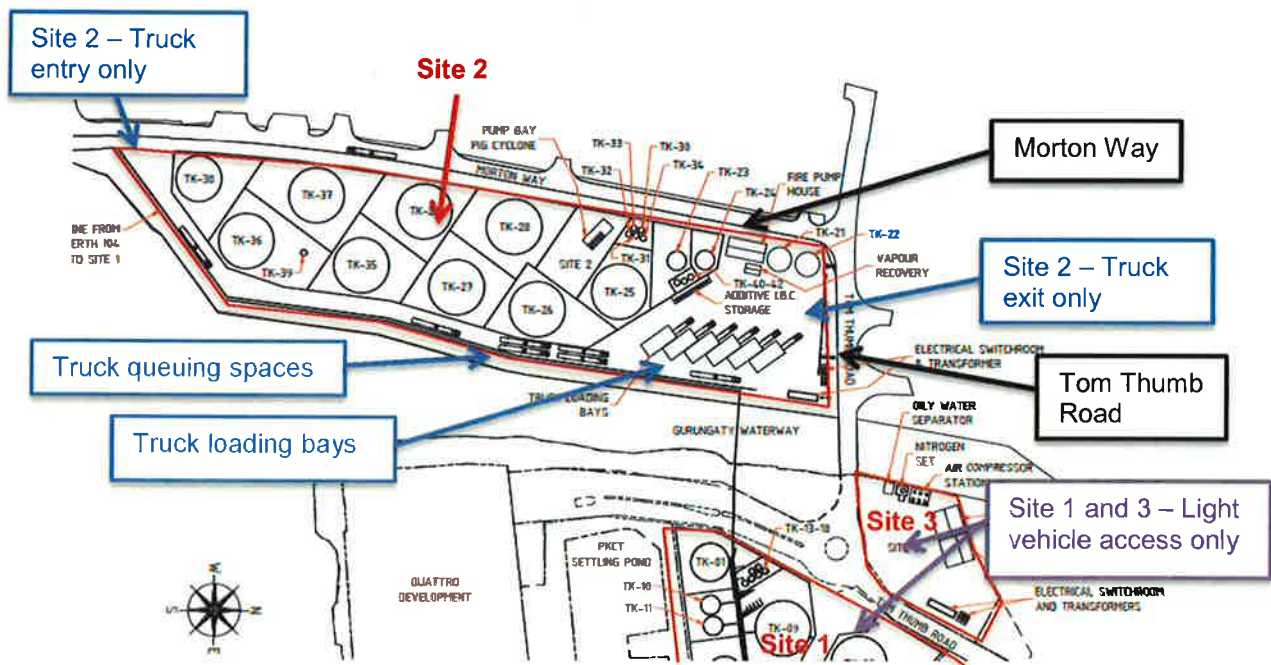


Figure 8: Site Access for the Development

The EIS indicated the majority of heavy vehicles would enter Site 2 via a southern access point on Morton Way. Heavy vehicles would continue in a one way direction towards the truck loading bays and exit onto Tom Thumb Road via the northern access point (left turn only). The access points at Site 2 are designed to accommodate the swept path of a 25 metre B-Double truck. Site 2 also has provisions for up to 8 queuing spaces if all truck loading bays are occupied to ensure heavy vehicles do not queue onto Morton Way. Light vehicles would primarily access Site 1 and 3 for the control room, office block and storage tanks. The Department and Council noted the heavy vehicle swept path analysis for Site 2 identified a potential conflict between heavy vehicles turning from Tom Thumb Road into Morton Way with other users of Morton Way. Morton Way is used to access Berth 104 and is owned and managed by NSW Ports. The Department understands Berth 104 is occasionally accessed via Morton Way by GrainCorp maintenance workers and port and maritime security.

The Applicant has discussed a number of options with NSW Ports to resolve this conflict, including the implementation of traffic management strategies such as installing line markings, signage and traffic signalling. NSW Ports did not raise any concerns and confirmed it would work with the Applicant to resolve this conflict at the detailed design stage. The Department considers the impact to other port users would be low, subject to the implementation of traffic management strategies agreed with NSW Ports. The Department has recommended this be included in the conditions of consent.

Site 3 would include 20 parking bays for light vehicles to accommodate full time staff and visitors at Stage 3 operations. The EIS states the design for the parking area access to Tom Thumb Road would be subject to detailed design in consultation with NSW Ports, and would be provided in a Traffic Management Plan. The Department is therefore satisfied that suitable parking arrangements will be available.

The Department sought further information about parking arrangements for construction vehicles. The EIS states there would be up to 150 vehicles during the Stage 2 construction activities, however parking on site would not be provided. The Applicant is working with NSW Ports and considers it likely that off-site parking and transfer buses will be required during the construction period.

The Department notes the Applicant is working with NSW Ports to ensure the safest possible access and parking arrangements. However, to ensure this occurs, the Department has recommended as a condition the Applicant include final arrangements for access and parking in its construction and operational TMP. This would ensure:

- there are safe turning areas for the largest vehicles so they can manoeuvre within the site without excessive reversing;
- entry gates to each site are setback from the road to accommodate the longest vehicle accessing each site;
- a strategy is in place for transferring construction workers to the site during construction, including details of its location; and
- parking is provided in accordance with Australian Standards.

Conclusion

The Department's assessment concludes the potential traffic, access and parking impacts associated with the construction and operation of the development would be minor and would be adequately managed by the Applicant via a construction and operational traffic management plan for the development.

5.4. Noise and Vibration

The development has the potential to increase noise and vibration impacts at sensitive receivers. Heavy vehicle traffic on site will also generate noise with the potential to impact on sensitive receivers.

Pacific Environment prepared a Noise and Vibration Impact Assessment (NVIA) as part of the EIS which assessed the construction and operational impacts of the development. The nearest residential receivers are located around 1.3 km north and north-west of the site in the suburbs of Wollongong and Coniston.

Construction

The key noise sources during construction would be machinery undertaking civil earthworks, establishment of foundations and assembly of tank and pipework infrastructure. Large deliveries and electrical work may be undertaken outside standard work hours for safety and logistical reasons.

The NVIA modelled four construction scenarios including civil earthworks, establishment of foundations, assembly of plant infrastructure and out of hours work. The assessment predicted the Interim Construction Noise Guidelines noise management levels would not be exceeded at the closest residential receivers in Coniston, Wollongong or Mt St Thomas under each scenario identified. For example, the predicted construction noise level for the most affected residents in Coniston would be 34 dB(A) during foundation works, which is below the criteria goal of 58 dB(A).

The EPA did not raise any objections but requested additional information on the piling of pre-cast driven concrete piles for tank foundations noting these activities may be annoying to occupants of nearby industrial developments. The Applicant assessed the impact of piling on the nearest industrial receivers to the site and found the construction noise criteria for all receiver types would be met, except at the closest industrial receiver (being GrainCorp) where a minor exceedance of 3 dB(A) of the 70 dB(A) noise criteria is predicted during piling works. In terms of vibration impacts, the NVIA concluded the predicted

vibration levels would be below the guideline levels for industrial buildings and would not cause any structural damage to neighbouring industrial buildings. The NVIA identified the risk of annoyance would be minimal at distances greater than 80 m from impact piling, but as GrainCorp is located 26 m from the development, it is predicted vibration annoyance limits may be exceeded.

The Applicant has committed to undertaking vibration monitoring trials to confirm safe work distances and methods as well as undertake further consultation with its industrial neighbours prior to and during construction and implementing reasonable and feasible noise and vibration measures such as selecting quiet plant and equipment where possible. The Applicant has also indicated that it would undertake piling works during periods when there is low activity at the Port such as Saturdays. The EPA was satisfied with this approach and raised no further concerns.

The Department acknowledges that nearby industrial receivers may experience temporary noise and vibration impacts and considers it appropriate that noisy works be undertaken during periods that minimise disruption to the surrounding neighbours. The EPA and Department are satisfied the closest residential receivers would not be impacted by construction noise and vibration impacts from the development. The Department has recommended the Applicant prepare a construction noise and vibration plan (CNVMP), which would detail reasonable and feasible noise and vibration measures, such as timing of noisy activities for when there is less activity at the Port. The Applicant has also confirmed that it would develop and implement a consultation strategy with its neighbours to adequately manage construction noise and vibration impacts as part of the NVMP. The Department has included this requirement in the recommended conditions of consent.

Operation

The main noise sources from the development would be from the operation of marine loading arms, loading and product pumps and idling trucks.

Under a worst case scenario (Stage 3 operations), the NVIA predicted noise levels would be well below the project specific noise limits (PSNL) at all residential receivers in Wollongong, Coniston and Mt St Thomas at all times. In Coniston, the predicted evening/night-time noise levels for the most affected residential receiver would be 31 dB(A) (during adverse meteorological conditions) and is below the night time PSNL criteria of 43 dB(A). The assessment also predicted there would be no anticipated impacts on any receivers from low frequency noise, nor would there be any vibration impacts at the closest sensitive receivers.

The EPA noted noise from the Port generally contributes to higher background noise levels at the closest residential receivers. The EPA requested further clarification on the predicted sound power levels and source heights used to model the development and recommended more stringent noise limits be applied to the development. In this regard, it has been recommended the noise predictions in the NVIA be set as the criteria and not the noise limits that apply under the EPA's *Industrial Noise Policy*. The EPA further recommended the Applicant verify compliance with the EPA noise limits and the predictions in the NVIA once operation has commenced. The Department concurs with the EPA and has included these requirements in the conditions of consent.

The Department considers the development would be unlikely to result in adverse noise impacts at sensitive receivers, given the closest residential receivers are more than 1.3 km away. The Department also notes the inclusion of noise limits, as recommended by the EPA, would provide stronger regulation of noise from the site. The Department has recommended conditions to adequately manage operational noise, including noise limits, the requirement to implement all reasonable and feasible measures to minimise noise, measures to ensure all plant and equipment are maintained and noise monitoring to demonstrate compliance with the noise limits.

Road Traffic Noise

The NVIA also assessed road traffic noise from traffic expected to be generated during construction and operation of the development, at Springhill Road and Masters Road in accordance with the EPA's *Road Noise Policy*. The RNP sets out the noise assessment criteria for residential land uses affected by additional traffic on existing freeways/arterial roads generated by land use developments as follows:

- 60 dB(A) ($L_{Aeq, 15 \text{ hour}}$) (external) for day time (7 am to 10 pm); and
- 55 dB(A) ($L_{Aeq, 9 \text{ hour}}$) (external) for night time (10 pm to 7 am).

The RNP also states that any increase in the total traffic noise level should be limited to 2 dB(A) above the existing road traffic noise level above that of the corresponding 'no build option' (without the development). The assessment found the highest predicted increase in traffic noise levels would be 0.9 dB(A) at Masters Road (during night periods for Stage 3 operations) which is within the 2 dB(A) increase criteria. The NVIA concluded the road traffic noise associated with the development would represent a minor impact that is barely perceptible to the average person. As no residential receivers are located on Springhill Road and Masters Road, the Department considers the road traffic impacts would be negligible.

The EPA did not comment on offsite road traffic noise impacts but raised concerns about noise emissions from idling trucks onsite. The EPA recommended the Applicant implement an annual truck noise auditing program as part of a Traffic Noise Management Plan (TNMP) to monitor noise levels from truck movements within the port. The plan would also enable the Applicant to identify and implement strategies and measures to achieve the highest noise emissions standards for vehicle movements associated with the development. The Department agrees with the EPA and is satisfied noise emissions from the development can be adequately managed via a TNMP and an annual truck noise auditing program. The Department has included the EPA's recommendation in its recommended conditions of consent.

Conclusion

The Department's assessment concludes the potential noise and vibration impacts associated with the construction and operation of the development would be minor and can be adequately managed by the Applicant via the implementation of reasonable and feasible mitigation and management measures and a construction and operational noise management plan and traffic noise management plan for the development.

5.5. Other Issues

The Department's assessment of other issues is provided in **Table 6**.

Table 6: Assessment of Other Issues

Consideration	Recommended Conditions	
Surface Water		
- The proposed development is located on reclaimed land in the Port Kembla Inner Harbour and the Gurungaty Waterway catchment area. - Sites 1, 2 and 3 are a minimum 1.7 m above the probable maximum flood levels for the Gurungaty Waterway, however, overland flows from local catchments have been known to occur on Morton Way. The existing stormwater drainage networks for all sites ultimately discharge into the Gurungaty Waterway.	Recommended conditions require the Applicant to: - implement soil and water measures consistent with the Blue Book; - ensure the development is fully bundled and a stormwater treatment system is installed for the site; and - prepare and implement a Water Management Plan for the operation of the development;	
Construction		
- Sites 1, 2 and 3 would require regrading of existing surfaces, alteration to the existing drainage network, installation of new drainage infrastructure and construction of bunds, tanks and other terminal infrastructure. - The EIS indicated these works may potentially result in an increase in runoff volumes, localised flooding, flooding on Morton Way and water quality impacts. - To minimise these impacts, the Applicant has committed to implementing best practice management measures consistent with <i>Managing Urban Stormwater – Soils and Construction</i> (the Blue Book) including development of a soil and erosion control plan to minimise disturbance and prevent any polluted water entering the waterways. - The EPA raised no concerns, however Council commented on flooding impacts. - The Department notes flooding from Gurungaty Waterway does not extend into the development, however the Applicant would comply with flood management controls in Council's development control plan to ensure flooding impacts are appropriately managed. Council was satisfied with this approach. The Department considers the appropriate surface water measures would be in place to manage potential impacts during construction and has recommended the Applicant's commitments be formalised in the conditions of consent.		
Operation		
- The development has the potential to result in surface water impacts via the release of hydrocarbons and other waste products to the local waterway. - The EIS indicated such impacts would be low given the storage tanks on Sites 1 and 2 would be fully bundled and any stormwater or bundwater from the tank areas would be treated to remove hydrocarbons via an oily water separator prior to discharge at licensed discharge points.		

Consideration	Recommended Conditions
- Runoff from external catchments would be captured and diverted around the development via the upgraded road drainage and overland flowpaths on Morton Way and Tom Thumb Road. Gross pollutant traps would be installed for the treatment of stormwater flows from the road drainage network prior to discharge into the local waterway. - Berth 104 is owned and managed by NSW Ports. To minimise the risk of pollution incidents associated with shipping activities, the Applicant has committed to preparing a pollution incident management plan in consultation with NSW Ports, detailing the Applicant's responsibilities for pollution response. - NSW Ports did not raise any concerns. However, Council and EPA requested further information about the stormwater design and proposed water discharge locations and flooding matters. The Applicant provided additional information in its RTS. - The Department concurs with the EPA and Council and considers the proposed stormwater system for the development would be adequate during operation, subject to conditions and compliance with the EPL. In addition to formalising the Applicant's commitments in the conditions of consent, the Department also recommends the Applicant prepare a Water Management Plan for the ongoing management of surface water onsite.	
Soil, Groundwater and Contamination	
- The development would be located on reclaimed land which is largely characterised by fill (containing slag), silty clay, sand and gravel. - Previous investigations undertaken for the site have identified concentrations of benzene, toluene, VOCs and PAHs in the soil but concluded the site is not contaminated and is therefore suitable for the development. - The EPA did not raise any concerns but recommended a site audit be undertaken prior to commencement of construction to confirm the site is suitable for the development. - Construction activities associated with the development, such as excavation, transportation of soils and fill and temporary stockpiling can potentially increase the risk of onsite soil erosion, Acid Sulfate Soils (ASS) or migration of contaminants into the soil during the excavation of slag. - The EIS concluded the risk of erosion, ASS and contamination can be appropriately managed through a CEMP and would include sediment and erosion measures consistent with the Blue Book and an unexpected finds protocol. Further details of management and disposal is discussed below (under Waste Management) if ASS or contaminated material is found. - The EIS also stated excavation works for tank and bund construction would be shallow and are unlikely to intercept groundwater or increase the risk of groundwater contamination. - During operation, the EIS noted spills and leakages from storage tanks, slop tanks and pipes could be a source of soil and groundwater contamination, however the development would be fully bunded and a stormwater management system would be in place to ensure these risks are minimised. - DPI Water recommended appropriate licences/approvals be obtained in the event that groundwater is intercepted. The Department has included DPI Water's recommendation in the conditions of consent. - The Department's assessment concludes the proposed earthworks associated with the construction of the development would be minor and that appropriate measures would be in place to manage soil and groundwater impacts during construction and operation of the development. The Department also considers the site is suitable for development and considers the risk of further contamination would be low. However, to ensure potential contamination issues are addressed, the Department also recommends the Applicant obtain a Site Audit Statement of the site prior to commencement of construction works.	Recommended conditions requiring the Applicant to: - ensure licenses/approvals are obtained from DPI Water in the event of dewatering and groundwater interception; and - obtain a site audit statement prior to commencement of construction.
Biodiversity	
- An Ecological Impact Assessment was submitted with the EIS to assess the potential biodiversity impacts of the proposed development including potential impacts to the Green and Golden Bell Frog (GGBF). An expert report was prepared for the GGBF in accordance with the Framework for Biodiversity Assessment. - The site is located within an industrial area on a highly modified estuary. The land around the site is predominantly cleared and/or disturbed due to previous and current industrial uses. The Tom Thumb Lagoon, north of the site adjacent to the Gurangaty Waterway consists of some remnant vegetation. - Due to the highly disturbed nature of the site, impacts from the development are limited to threatened species of the GGBF and the marine vegetation communities along the Gurangaty Waterway. Impacts during construction may include removal of potential	Recommended conditions require the Applicant to: implement a biodiversity offset strategy for the purchase and retirement of one GGBF species credit; and

Consideration	Recommended Conditions
GGBF habitat, construction activities damaging mangroves in the waterway and water quality impacts from hydrocarbon spills and sedimentation. - The assessment found the development would not impact on any marine vegetation in the waterway but it would remove approximately 0.02 hectares of GGBF habitat on site during construction. - The EIS concluded the development would be unlikely to cause the extinction of the local GGBF population or reduce the viability of the GGBF population. - The Applicant has committed to implementing an offset strategy to purchase and retire one species credit to offset the impacts of the development. It is also proposing to undertake a number of ongoing management measures for the GGBF and marine communities during construction and operation. - The Department and OEH are satisfied with the Applicant's findings and concur with the proposed offset strategy. The Department has recommended that in addition to the Applicant carrying out an offset strategy, it should also prepare a Biodiversity Management Plan incorporating a number of the Applicant's commitments for managing marine vegetation and GGBF communities during construction and operation of the development.	prepare a Biodiversity Management Plan.
Waste Management	
- During construction, the main waste products generated by the development would include surplus materials, excess cut from excavation works and equipment and vehicle fluids. - Where possible, spoil would be reused onsite, however waste materials such as acid sulfate soils, asphalt or any other previously unidentified contaminated material would be classified and disposed of off-site to an appropriately licensed facility. - During operation, the development would not generate a significant amount of operational waste with the main source being from the generation of slops and wastewater due to product spills or utilisation of firewater or foam solution. - Wastewater from the tanks and bunds would be treated onsite and any fuels would be recovered or disposed appropriately to a licensed facility. - The Applicant has committed to incorporating a number of waste strategies into its CEMP and OEMP in accordance with EPA guidelines. - The EPA and Council did not raise any concerns. - The Department considers waste impacts would be minimal and can be adequately managed subject to conditions. - The Department recommends formalising the Applicant's commitments and that waste is managed in accordance with <i>Environmental Guideline: Assessment, Classification and Management of Liquid and Non-Liquid Wastes</i> (EPA, 1998).	Recommended conditions require the Applicant to: - implement reasonable and feasible measures to minimise waste; and - comply with the EPA's <i>Waste Classification Guidelines</i> for the management of all waste on site.
Visual Amenity	
- The Applicant prepared a Visual Impact Assessment to identify any potential visual impacts as a result of the proposed development. - The proposed development would be located within an established industrial and port area close to other industrial and port related activities including the PKCT, GrainCorp, GrainCorp Liquids Terminals and BlueScope Steel. - The EIS concluded the proposed development would have a minimal visual impact because the visual character of the development would integrate well with the existing industrial environment. The EIS further added that as the materials and scale of the proposed development would be similar to the surrounding land uses, the development would not appear to be visually intrusive or dominant. - The EIS considered the impact of light spill and it was found the development would not contribute significantly to light pollution, particularly as the existing industrial environment is already illuminated. - To minimise the impact of the development to surrounding receivers, the Applicant has committed to using materials that blend with the existing industrial environment and to design and implement external lighting in accordance with Australian Standards. - NSW Ports and Council did not raise any concerns. NSW Ports commented that external lighting would need to be designed in consultation with the Port Kembla Harbour Master. A condition to this effect has been included in the recommended conditions of consent. - The Department considers the development is not visually intrusive and complements the surrounding industrial land uses. The Department's assessment concludes the proposed development would have minimal visual impact to surrounding receivers, subject to conditions.	Recommended conditions require the Applicant to: design external lighting in consultation with the Port Kembla Harbour Master and ensure compliance with Australian Standards.

6. CONCLUSION

The Department's assessment of the application has considered all relevant matters under Section 79C of the EP&A Act, the objects of the EP&A Act and the principles of ecologically sustainable development.

The development would provide new fuel storage capacity in Port Kembla to meet the growing fuel needs of the Illawarra, Central NSW and Southern NSW. The development would also provide an investment of approximately \$172 million to the Wollongong region and generate 139 jobs during the construction phase and 12 jobs during operation.

The Department's assessment concluded the development would:

- not increase the hazardous risk to surrounding land uses to unacceptable levels;
- meet relevant air quality and noise criteria at the closest residential receivers during operation, however, there would be some temporary air and noise impacts for the closest industrial receivers during construction; and
- not impact on future traffic performance levels at key intersections, although the Masters Road/Springhill Road intersection may be operating at capacity regardless of the development.

The Department has recommended a number of conditions to manage and monitor hazards and risks, air quality, traffic, soil and water, including but not limited to implementation of:

- a number of hazard studies to ensure the risk from the development to the surrounding environment is minimised;
- best practice technology and an air emissions program to manage air and odour emissions from the development;
- a construction and operational traffic management plan to manage traffic impacts associated with the development; and
- soil and water measures including stormwater management measures to address soil and water impacts during construction and operation of the development.

The Department has also recommended conditions for ongoing environmental management, including regular and incident reporting and regular independent environmental audits.

The Department has concluded that with the commitments made by the Applicant and with the implementation of the recommended conditions of consent, the impacts of the development can be mitigated and/or managed to ensure an acceptable level of environmental performance. Consequently, the Department considers the development is in the public interest and should be approved, subject to conditions.

7. RECOMMENDATION

It is recommended that the Acting Executive Director, Key Sites and Industry Assessments:

- **consider** the findings and recommendations of this report;
- **approve** the development application under section 89E of the EP&A Act; and
- **sign** the attached development consent (refer **Appendix A**).

Pamela Morales
Planning Officer, Industry Assessments


Chris Ritchie
Director
Industry Assessments
8/9/16.

 9.9.16
Ben Lusher
A/Executive Director
Key Sites and Industry Assessments

APPENDIX A: DEVELOPMENT CONSENT

APPENDIX B: CONSIDERATIONS UNDER SECTION 79C

Section 79C of the EP&A Act requires that the consent authority, when determining a development application, must take into consideration the following matters:

(a) the provisions of: (i) any environmental planning instrument, and (ii) any proposed instrument that is or has been the subject of public consultation under this Act and that has been notified to the consent authority (unless the Director-General has notified the consent authority that the making of the proposed instrument has been deferred indefinitely or has not been approved), and (iii) any development control plan, and (iiia) any planning agreement that has been entered into under section 93F, or any draft planning agreement that a developer has offered to enter into under section 93F, and (iv) the regulations (to the extent that they prescribe matters for the purposes of this paragraph), and (v) any coastal zone management plan (within the meaning of the <i>Coastal Protection Act 1979</i>) that apply to the land to which the development application relates,	Detailed consideration of the provisions of all environmental planning instruments (including draft instruments subject to public consultation under this Act) that apply to the proposed development is provided in Appendix C of this report. The Applicant has not entered into any planning agreement under section 93F. The Department has undertaken its assessment of the proposed development in accordance with all relevant matters as prescribed by the regulations, the findings of which are contained within this report. The site is not located within the coastal zone and the Department is not aware of any coastal zone management plan that applies to the land to which the development application relates.
(b) the likely impacts of that development, including environmental impacts on both the natural and built environments, and social and economic impacts in the locality,	The Department has considered the likely impacts of the development in detail in Section 5 of this report. The Department concludes that all environmental impacts can be appropriately managed and mitigated through recommended conditions of consent.
(c) the suitability of the site for the development,	The development is a suitable land use for the site, given its location within a working port. In addition the site is zoned for industrial purposes and the development is permissible with development consent in this zone.
(d) any submissions made in accordance with this Act or the regulations,	All matters raised in submissions have been summarised in Section 4 of this report and given due consideration as part of the assessment of the proposed development in Section 5 of this report.
(e) the public interest.	The recommended conditions of consent impose a range of controls, which the Department considers will mitigate any potential environmental impacts of the proposed development. On balance, the proposed development is considered to be in the public interest.

APPENDIX C: CONSIDERATION OF ENVIRONMENTAL PLANNING INSTRUMENTS

State Environmental Planning Policy (Three Ports) 2013

The site is zoned SP1 Special Activities under the *State Environmental Planning Policy (Three Ports) 2013* (Three Ports SEPP). Development for a fuel storage terminal is permissible with development consent in the SP1 zone.

The proposal is State significant development pursuant to Clause 27(1) of the Three Ports SEPP because it:

- involves development that is within the Port Kembla lease area that is classified as designated development under Schedule 3 of the *Environmental Planning and Assessment Regulation 2000* (EP&A Regulation); and
- has a capital investment value of more than \$100 million.

State Environmental Planning Policy (State and Regional Development) 2011

State Environmental Planning Policy (State and Regional Development) 2011 (SRD SEPP) identifies certain classes of development as SSD.

In particular, Clause 10 of Schedule 1 of the SRD SEPP classifies liquid fuel depots with a capital investment value of more than \$30 million as SSD.

The proposal satisfies the classification of land use being a liquid fuel depot and meets the capital investment requirements as required by Clause 10(2) as the proposed additional diesel storage tanks have an approximate capital investment value of \$172 million. Notwithstanding, the proposed development is considered as SSD under the Three Ports SEPP and is permissible with consent.

State Environmental Planning Policy No. 33 – Hazardous and Offensive Development

SEPP 33 aims to identify proposed developments with the potential for significant off-site impacts, in terms of risk and/or offence (odour, noise etc). A development is defined as potentially hazardous and/or potentially offensive if, without mitigating measures in place, the development would have a significant risk and/or offence impact on off-site receptors.

The terminal would handle flammable materials which is classified as dangerous goods and are stored on site. Therefore SEPP 33 does apply and the development is considered as "potentially hazardous industry". The Department's assessment of hazards and risk is contained in Section 5.1 of this report.

State Environmental Planning Policy (Infrastructure) 2007

The Infrastructure SEPP (ISEPP) aims to facilitate the effective delivery of infrastructure across the State by improving regulatory certainty and efficiency, identifying matters to be considered in the assessment of development adjacent to particular types of infrastructure development, and providing for consultation with relevant public authorities about certain development during the assessment process.

The proposal constitutes traffic generating development under Schedule 3 of the ISEPP and was referred to the RMS for comment. RMS confirmed that they have no objection to the proposed development. The development is considered to be consistent with the aims and objectives of the ISEPP, and the requirements of Clause 104 of the SEPP, as demonstrated by the response received from the RMS and in the assessment of the proposal contained in Section 5 of this report.

Wollongong Environmental Plan 2012

Wollongong LEP aims to encourage the development of housing, employment, infrastructure and community services to meet the needs of the existing and future residents of the Wollongong LGA. The WLEP also aims to conserve and protect natural resources and foster economic, environmental and social well-being. This plan applies to the whole of the Wollongong LGA but does not apply to the proposed development as it is located on land identified under the Three Ports SEPP.

The Department has consulted with the Wollongong City Council (Council) throughout the assessment process. The Department has considered all relevant provisions of the Wollongong LEP and those matters raised by Council in its assessment of the proposal in Section 5 of this report.

APPENDIX D: ENVIRONMENTAL IMPACT STATEMENT

See link: http://majorprojects.planning.nsw.gov.au/index.pl?action=view_job&job_id=7264

APPENDIX E: SUBMISSIONS

See link: http://majorprojects.planning.nsw.gov.au/index.pl?action=view_job&job_id=7264

APPENDIX F: RESPONSE TO SUBMISSIONS

See link: http://majorprojects.planning.nsw.gov.au/index.pl?action=view_job&job_id=7264