



Transport  
for NSW

# Spoil Management Project

## Determination Report



# Spoil Management Project Determination Report

## Transport for NSW

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# **1. Introduction**

## **1.1. Background**

Transport for NSW is the New South Wales (NSW) Government's lead public transport agency that ensures planning and policy is fully integrated across all modes of transport in NSW. It manages a multi-billion dollar budget allocation for rail, bus, ferry and taxi services and related infrastructure in NSW.

Transport for NSW is responsible for improving the customer experience of transport services, transport policy and regulation, planning and program administration, procuring transport services, and infrastructure and freight.

The Spoil Management Project is a NSW Government initiative designed to remove trucks from the road by reducing the distance that trucks are used to haul materials, such as spoil (excavated material), from transport related projects. This has other benefits including reducing road congestion, improving road safety and improving air quality via the use of a more efficient means of transport for the majority of the trip.

Transport for NSW is the proponent for the Spoil Management Project (referred to as 'the Proposed Activity' for the purposes of this document).

## **1.2. Review of environmental factors**

Transport for NSW prepared a Review of Environmental Factors (REF) for the project, which detailed the scope of works and environmental impacts associated with the Proposed Activity (Appendix 1). The REF was prepared in accordance with clause 228 of the *Environmental Planning and Assessment Regulation 2000*. The REF was on public display from 14 to 28 August 2017 with 23 submissions received by Transport for NSW, including two Council submissions (Canterbury Bankstown Council and Strathfield Municipal Council) and a submission from the Environment Protection Authority (EPA).

## **1.3. Determination Report**

In order to proceed with the Proposed Activity, the Secretary of Transport for NSW must make a determination in accordance with the provisions of Part 5 of the *Environmental Planning and Assessment Act 1979* (the EP&A Act). Following this, the appropriate changes need to be made to the WestConnex Construction Spoil Management Plan prior to spoil transport commencing.

The objectives of this Determination Report are to:

- assess the environmental impacts with respect to the Proposed Activity which are detailed in the REF (and any proposed modifications, as detailed and assessed in this Determination Report)
- identify mitigation measures to minimise potential environmental impacts
- determine whether potential environmental impacts are likely to be significant
- address whether the provisions of the Commonwealth Environment Protection & Biodiversity Conservation Act 1999 (the EPBC Act) applies to the Proposed Activity.

This report has been prepared having regard to, among other things, the objectives of Transport for NSW under the *Transport Administration Act 1988*:

- to plan for a transport system that meets the needs and expectations of the public,

- to promote economic development and investment,
- to provide integration at the decision-making level across all public transport modes,
- to promote greater efficiency in the delivery of transport infrastructure projects,
- to promote the safe and reliable delivery of public transport and freight services.

## **1.4. Description of the Proposed Activity in the REF**

An overview of the Proposed Activity, which is the subject of the Spoil Management Project REF, is provided in the Executive Summary with full details set out in the REF. In summary, the Proposed Activity as outlined in the REF comprises:

- Establishment of Modal Transfer Facilities at each site; the Sydney Trains Chullora rail yard in Sydney and the BlueScope Steel Commonwealth Rolling Mills Site (CRM Site) in the Illawarra.
- Establishment would include formalising access roads and a surge pile area (short-term storage of material due to spoil movement processes, inclement weather or machinery breakdown) at both locations, installing conveyors and the construction of a wagon dump station at the CRM site.
- Trucks would transport spoil generated by the tunnelling activities from the M4 WestConnex project to the Chullora facility. The spoil would then be loaded onto a disused coal wagon train and transported to the CRM site, at which point it would be transferred to trucks for transport to its final destination. A number of construction sites have been identified in the Illawarra that require clean fill. Use of the spoil would be negotiated with the individual construction projects and would be subject to separate planning approval.
- Following completion of the M4 WestConnex project, the transfer facilities may be made available to other projects, subject to separate approval.
- The activity would be licenced in accordance with the *Protection of the Environment Operations Act 1997*. Appropriate licensing mechanisms would be determined in consultation with the NSW Environment Protection Authority (EPA) prior to construction.
- Spoil transport management would be undertaken in accordance with the M4 WestConnex management plans which would be updated to reflect the use of rail as an additional transport mode.

The need for, and benefits of the Proposed Activity are outlined in Chapter two of the REF.

## **2. Consultation and assessment of submissions**

The REF was on public display from Monday 14 August 2017 to Monday 28 August 2017 at four locations, as well as on the Transport for NSW website ([transport.nsw.gov.au/projects](http://transport.nsw.gov.au/projects)).

Community consultation activities undertaken included:

- distribution of a community newsletter to residents and businesses within a one kilometre radius of each Modal Transfer Facility
- public display of the REF at the following locations:
  - City of Canterbury-Bankstown at Bankstown Customer Service Centre, Upper Ground Floor, Civic Tower, 66-72 Rickard Road, Bankstown;

- Bankstown Library and Knowledge Centre, 80 Rickard Road, Bankstown;
- Wollongong City Council, 41 Burelli Street, Wollongong; and
- Warrawong District Library, Level 1, 67-71 King Street, Warrawong
- advertisements in the Illawarra Mercury and Canterbury Bankstown Express local newspapers on 15 and 22 August 2017
- letters to residents with direct line of sight to the proposed transfer facility at Port Kembla (Wentworth Street)
- letters to affected councils (City of Canterbury Bankstown Council, Strathfield Council and Wollongong Council)
- information on the Transport for NSW website
- feedback was also welcomed from the wider community.

Initial consultation was undertaken with key stakeholders prior to public display of the REF. Stakeholders included:

- Sydney Trains
- Transport for NSW departments
- Environment Protection Authority
- WestConnex / Sydney Motorways Corporation
- Port Kembla Coal Terminal
- Port Kembla Port Authority
- Bluescope Steel
- Project management group (comprising representatives from Transport for NSW, Roads & Maritime Services, Sydney Trains, Sydney Motorways Corporation).

A total of 23 submissions were received by Transport for NSW as a result of the above activities.

Submissions raised a variety of issues in relation to the Proposed Activity. The key issues raised in the submissions were:

- Air quality impacts resulting from dust both at the Modal Transfer Facilities and during transportation
- The impact of the additional freight services over improvements to passenger services
- Operational hours and whether activities would occur at night
- Traffic impacts resulting from the number of additional heavy vehicles within the Modal Transfer Facility sites.

Following the receipt of submissions, consultation was also undertaken with the Port Kembla Pollution Meeting on 9 December 2017 and the Wollongong Neighbourhood Forum on 13 December 2017.

A summary of all issues raised and associated responses is provided in Table 1 to Table 4 below.

**Table 1 Response to submissions received from the community**

Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
<b>1</b>	<b>General</b>		
1.1	SMP5	Suggestion that the Port Kembla Coal Terminal may be an appropriate location to host the receiving Modal Transfer Facility, containing the appropriate infrastructure and licences with minimal adjustments required. A process control system is already in place at the terminal to prevent cross contamination.	<p>Transport for NSW investigated the use of the Port Kembla Coal Terminal site initially as the site has some attractive properties including site layout, size and existing infrastructure. Three meetings were held onsite and two meetings within offices, with representatives from Port Kembla Coal Terminal and Transport for NSW in attendance.</p> <p>Following investigation, it was determined that it would be difficult to separate coal and spoil activities and prevent cross contamination at this site despite existing processes. Additionally, due to the dense and therefore heavier weight of the spoil product compared to coal, all of the existing equipment would require replacement for the purpose of moving spoil. Due to the operational requirements of the coal terminal, new equipment would have to be installed on a permanent basis, resulting in higher establishment costs as well as high operational and maintenance costs. As the proposal is a pilot project to test the feasibility of moving spoil by rail, the additional costs and requirements at this site were considered unfeasible.</p>
1.2	SMP7; SMP6; SMP8; SMP14; SMP21	Concern regarding impacts to passenger services. The REF identifies capacity available for the additional freight movements, however residents have been advised there is no additional capacity for passenger services and services are often disrupted and are infrequent. Objection to the proposed extra freight services precluding upgrades to the present passenger services.	<p>Material would be transported by freight between Chullora and Port Kembla. The freight trains would be scheduled so as to minimise impacts with passenger services. TfNSW is working with the freight industry on the options available. Passenger services would be unlikely to experience impacts as a result of this proposal.</p> <p>Upgrades to the existing passenger services are outside the scope of this proposal, however this submission has been referred to the relevant team within Transport for NSW.</p>
1.3	SMP7; SMP13; SMP15; SMP18; SMP20; SMP23	The destination of the spoil within the Illawarra is unclear and there does not appear to have been any consultation with Council or developers on the use of the spoil.	<p>The spoil would be transported to sites that require fill within the Illawarra region for beneficial reuse. A number of potential projects that require fill have been identified and the transport of spoil to these sites would be the subject of a separate planning approval process and would be negotiated at the appropriate time on a project specific basis, considering timing and quantity.</p> <p>The Bombo Quarry is not yet ready for fill as</p>

Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
			<p>reinstatement activities are currently being planned, however consideration of transport of spoil to this destination would be undertaken at the appropriate time.</p> <p>The end point for the spoil would be determined prior to its transportation. Spoil would not be transported via this proposal if there is no agreed destination. Agreements would occur prior to transport of spoil to a particular site and would be reviewed at regular intervals, appropriate for the quantity estimated to be moved.</p> <p>Strathfield Municipal Council, City of Canterbury Bankstown Council and Wollongong City Council have been notified of the proposal.</p>
1.4	SMP9	<p>The REF is focussed on the transfer of Virgin Excavated Natural Material (VENM). Given the nature of tunnel activities, it is understood that the beneficial reuse of tunnel spoil is covered under a Resource Recovery Exemption under Part 9 of the Environment Operations (Waste) Regulation 2014. As such, the spoil may not be classified as VENM but still be suitable for beneficial reuse as engineered fill. The REF should reflect this to ensure suitability and accepted material should be broadened to also include Excavated Natural Material (ENM).</p>	<p>Noted. Classification of the material and allowance of what class of material can be transported will be determined in discussions with the NSW EPA and would be carried out in accordance with licence conditions.</p>
1.5	SMP6; SMP13; SMP16	<p>How many tonnes of spoil is proposed to be moved in total and how long would operations continue?</p>	<p>The proposal would be set up to initially transport spoil from the M4 WestConnex Project. The overall quantity transported from this project would be dependent upon a range of factors including the stage of tunnelling that M4 WestConnex is at upon the commencement of this proposal. Overall, the proposal would be limited to the transport of 9,000 tonnes of spoil per day.</p> <p>Following the completion of the M4 WestConnex tunnelling, the proposal could be made available to other projects seeking to transport spoil to the Illawarra, subject to separate approvals. This proposal would form a pilot to potential future spoil transport projects. Subsequent projects that wish to transport soil by rail would do so in</p>



Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
			accordance with separate approvals.
1.6	SMP10; SMP16	How can Transport for NSW ensure that the spoil material is not contaminated? Quality control processes to identify hazardous waste such as asbestos will be needed.	All waste leaving a site would be classified in accordance with the Environment Protection Authority (EPA) <i>Waste Classification Guidelines; Part 1: Classifying Waste</i> . Measures would be implemented to prevent cross contamination during transportation activities. Hazardous waste is not expected to be found due to the nature of tunnel spoil which is extracted from depths beyond that typically affected by human activities. Regardless, spoil would be monitored and classified prior to transport.
1.7	SMP6; SMP18	More effort should be made by NSW Government authorities to reduce truck noise, including late at night and in the early hours of the morning.	Noted. Truck movements are generally planned to avoid impacts where possible. Consideration includes truck access routes and using major arterial roads as much as possible, scheduling truck movements to avoid peak traffic periods and noise impacts on local roads. The proposal has been assessed as being unlikely to have a noticeable increase on traffic noise levels. The intent of this proposal is to reduce the number of trucks carrying spoil material and the distance travelled. Additionally, activities would comply with the existing site operational hours and licence conditions where applicable. It should also be noted that the truck haulage routes proposed are all existing truck haulage pathways.
1.8	SMP2; SMP6; SMP13; SMP23	Are any measures planned to reduce rail noise, particularly if night time movements are under consideration? Will there be spoil loading/unloading at night time? What times are the spoil trains likely to run?	There is potential for operations to be carried out on a 24 hour basis, dependent on rail movements. Activities outside of standard construction hours (Monday to Friday: 7am to 6pm; Saturday 8am to 1pm) would be limited as far as practicable. Train movements would be limited to three per day. Where possible, activities would be scheduled for less sensitive periods during the day, however, there is a possibility that unloading activities would occur during night time. Train operation times would be subject to the conditions of the operators Access Agreements, one of which is to operate in accordance with the EPA licence. Conditions relating to the proposed train movements and noise levels will be prescribed via this licence. In addition to the scheduling of activities towards less sensitive periods, the REF includes a mitigation measure to construct a

Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
			noise barrier berm to shield receivers to the south of the Illawarra Modal Transfer Facility.
1.9	SMP8	Investigations are currently underway regarding the impacts of the changes to the Illawarra floodplain caused by urban developments. Concerned there is no mention in the REF of where the spoil would be used, and no mention of further environmental impact assessments of this use.	<p>The spoil would be used for developments occurring within the Illawarra region that require fill. The projects receiving this spoil are yet to be determined and would be subject to agreement between the appropriate stakeholders and separate approvals.</p> <p>The spoil would be supplied to the developments in accordance with the requirements of the relevant determining authority (likely Council).</p> <p>Flood impact assessment would have been undertaken for the receiving project as part of their determination and is not required for this proposal.</p>
1.10	SMP15	Industrial spread has been observed within Illawarra area which has adverse effects on residents and amenity.	The proposal would not introduce any additional industrial areas, rather making use of existing industrial lands that are currently underutilised.
1.11	SMP15	Industrialisation has not provided benefits to the community.	This is outside the scope of this project.
1.12	SMP13; SMP14; SMP15; SMP18; SMP20; SMP23	<p>Concern that the Illawarra is just considered an easy place to dispose of spoil.</p> <p>A number of stockpiles exist in the area already which were never envisaged for their current location and are now unlikely to be moved.</p>	<p>The Illawarra currently has a number of projects underway which require the import of clean fill. This proposal would help to facilitate the delivery of clean fill for use in these projects. Spoil would not be transported to the CRM site without a destination to receive it.</p> <p>Transport for NSW has no control over existing stockpiles currently in the area. By ensuring a destination has been nominated prior to transportation, spoil stockpile levels would be kept to a minimum. Consultation would be undertaken with the EPA and community during detailed design and prior to construction of the project to determine appropriate control measures to limit the height and size of stockpiles and the duration for which they can remain.</p>
1.13	SMP14; SMP15	There should be no spoil at all from Sydney transported to Port Kembla even for a short term. This spoil should be transported elsewhere rather than bringing the associated impacts to the Illawarra.	The Illawarra region currently has a need for clean fill in several developments that are underway. These projects need clean fill in order to progress. The material proposed to be moved as part of this proposal is restricted to that classified as virgin excavated natural material (VENM). This means that it would only be high quality clean fill suitable for construction purposes. No contamination would be present in the materials transported

Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
			as part of this proposal.
1.14	SMP13; SMP15; SMP19	The proposal uses terminology that is too vague and can be left open to interpretation. Why were other sites not considered?	Noted. The REF is a technical document which has been written to assess the environmental impacts of the proposal in accordance with the relevant legislation and technical disciplines. Where terms are not defined by the relevant legislation, definitions are provided in the REF document. Transport for NSW can be contacted if further clarity is required in relation to any aspect of the REF. Other sites and locations were considered in early options analysis, however due to the need for spoil in the Illawarra and the immediate availability of suitable sites, the proposed location was chosen for the proposed pilot project.
1.15	SMP13; SMP15; SMP19	Questions the employment opportunities that this proposal would offer.	<p>The Proposal has the potential to create local jobs during both construction and operation. This may include machinery operators, truck drivers and management oversight to ensure compliance.</p> <p>The Proposal would create initial employment benefits through the direct engagement of personnel to construct and set up the two modal transfer facilities. There would also be an ongoing need for personnel during the operation of the facilities including logistics, technical, administration, general operations and management. In addition, there may be indirect employment of personnel in the support and services sector, for example, through education and training services for new employees, local laboratories for material testing, construction jobs and environmental compliance.</p>
1.16	SMP18	How can you be sure there will be no environmental impact?	In accordance with the <i>Environmental Planning and Assessment Act 1979</i> , Transport for NSW is required to consider potential environmental impacts that may arise as a result of proposed activities. The REF has considered the potential impacts in accordance with the legislative requirements and has found that there would be no significant impacts arising as a result of the proposal. Some minor impacts as described in the REF would be experienced, however these would be managed in accordance with the specified mitigation measures, many of which would need to be addressed prior to any works commencing.
1.17	SMP19	Control measures in the REF are not measurable.	Prior to construction, further detailed design and a Construction Environmental

Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
			Management Plan (CEMP) would be developed. The CEMP would contain more specific measures to ensure impacts are reduced or avoided as far as possible. Items to be included in the CEMP are specified in the Conditions of Approval.
1.18	SMP19	This proposal would impact additional areas surrounding the Wollongong suburbs.	The REF has considered the potential impacts arising as a result of the proposal within an area deemed appropriate. Impacts arising along the train line would be minimal and would be limited to diesel train emissions and small amounts of dust.
1.19	SMP21	Sydney Trains should commit to providing the necessary train paths prior to approval being granted.	Operations would be carried out in accordance with agreements between all relevant organisations. The freight trains would be scheduled so as to minimise impacts to passenger services. TfNSW is working with the freight industry on the options available. The trains would use the existing freight lines to move the spoil. And would avoid impacting existing passenger services.
1.20	SMP23	How will this affect the current proposal by Wollongong Council which is trying to increase the number of tourist ships and tourism into Illawarra through Port Kembla harbour?	This proposal would make use of currently underutilised industrial land and provides clean fill to pre-agreed locations. It would not impact other projects happening within the area.
1.21	SMP23	How would Port Kembla benefit from this proposal?	The proposal would reduce the number of truck kilometres travelled by transporting the spoil by rail the majority of the way. Spoil is currently being transported by truck down Mt Ousley Road, resulting in safety and emission concerns. With a portion of these truck movements removed, safety and emission impacts would be reduced. Additionally, the proposal provides clean fill to projects currently underway in the area. These projects need clean fill in order to progress.
1.22	SMP13	There is a whole community and shopping precinct in close proximity to the site, commencing at 350 metres.	The REF has assessed potential impacts to all receivers within the surrounding area likely to be affected and has determined that any impacts arising as a result of the proposal would be no more than minor, with most impacts being negligible. Assessment included consideration around the different types of receivers present and their sensitivity to any changes that may occur.
1.23	SMP13	Noise mitigation measures are vague and provide no	Noise management levels are prescribed in the Noise and Vibration Impact Assessment and are developed based on the current



Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
		definition.	<p>background noise levels. The noise management levels determine the acceptable level of noise impact on an ongoing basis. The noise management levels define the maximum level of desirable noise and therefore any activities associated with this proposal would aim to keep noise emissions below this level.</p> <p>An additional noise and vibration impact assessment would be carried out prior to construction to further determine likely noise impacts and to identify appropriate mitigation measures for implementation during construction and operation. This assessment would be specific to a further progressed design, better capturing likely noise levels.</p>
1.24	SMP14	<p>Port Kembla reuses and/or recycles huge amounts of waste from local industries already and should not have to handle more waste from outside the area.</p> <p>The Sydney area would be better able to recycle or reuse this type of spoil than the Port Kembla area because of the historical waste already recycled and reused in this area.</p>	<p>Transport for NSW proposes to transport only clean fill suitable for use in construction projects currently planned or underway in the Illawarra Region. The spoil would not be transported without an agreed destination and separate approvals would be required to facilitate the re-use of this spoil. The approval for reuse would be in place prior to the spoil being transported.</p> <p>This proposal identifies an opportunity to remove trucks from the road network. These trucks are already hauling spoil to the area via Mt Ousley Road in accordance with current approvals.</p>
<b>2</b>		<b>Air Quality and Sediments</b>	
2.1	SMP1; SMP2; SMP13	Concerns regarding air born sediment and dust. How will this be contained or managed?	<p>Air quality emissions at the Modal Transfer Facilities were a key concern in the assessment of the proposal. An air quality impact assessment was undertaken with an emphasis on how potential impact could be mitigated. With regard to offsite air quality, the modelling analysis indicated that particulate matter emissions are of a scale that is manageable with the implementation of effective air quality management strategies.</p> <p>A number of measures would be employed during operations for the purpose of managing dust emissions. These include watering surge piles and maintaining moisture content within the material, ceasing works during adverse weather conditions and enclosing loading and conveyor locations. In accordance with the Conditions of Approval, an Air Quality Management Plan would be developed prior to construction and would include management measures to be</p>

Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
			implemented during construction and operation. This management plan would be developed by suitably qualified professionals in accordance with the relevant standards.
2.2	SMP2	A number of schools are located within close proximity to the proposed Sydney Modal Transfer Facility. Have health effects on the children been considered?	<p>Transport for NSW does not expect any adverse health impacts to be experienced by community members as a result of the proposal.</p> <p>An Air Quality Management Plan would be developed prior to construction and would include management measures to be implemented during construction and operation.</p> <p>A number of management measures would be employed during operations for the purpose of managing dust emissions. These include watering surge piles and maintaining moisture content within the material, ceasing works during adverse weather conditions and enclosing loading and conveyor locations.</p>
2.3	SMP1	How will sediment be prevented from leaving the site and flowing into waterways?	<p>Sediment and erosion control measures would be in place to prevent the movement of sediment during construction and operation. Site setup would be designed to complement existing landform, implementing short or long-term sediment traps as appropriate. Sediment management would be carried out in accordance with the industry best-practice guide, 'Managing Urban Stormwater: Soils and Construction Volume 1' (Landcom 2004) (the Blue Book).</p> <p>Additionally, spoil would not be stockpiled for long periods and would be managed in accordance with forecast weather where possible to avoid using surge piles during heavy rainfall or high winds.</p>
2.4	SMP7	REF does not appear to consider air quality impacts related to the rail transport of the spoil. Particulate matter from coal dust near the rail line, arising from uncovered coal wagons, combined with diesel fumes from locomotives used was noted. Coal dusts settles on surfaces within at least 500 metres of the rail corridor.	<p>The proposal includes an additional three freight trains on the existing freight line. These freight trains would only carry clean spoil, therefore, there would be no additional coal dust emissions in the area. The relative increase in freight train movements is likely to have a negligible impact on air quality.</p> <p>Investigations would be carried out during detailed design regarding the option to cover the wagons. This would be implemented as a preference to ensure dust emissions are avoided along the route.</p>
2.5	SMP7; SMP6; SMP10; SMP14;	The proposed spoil wagons should be covered to prevent further air pollution near the rail corridor.	Management of dust emissions is a serious consideration and would be further addressed during design development. Procurement of wagons would consider dust emissions during

Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
	SMP21		operation. Design development would consider whether covering the existing open wagons is feasible.
2.6	SMP7; SMP18	Concern relating to health impacts arising from increased air pollution along the rail corridor.	Management of dust emissions is a serious consideration and would be further addressed during design development. Procurement of wagons would consider dust emissions during operation. Design development would consider whether covering the existing open wagons is feasible. Air quality emissions would be minimised as far as feasibly possible.
2.7	SMP6	Both diesel trucks and diesel trains are responsible for air pollution and small particle emissions. However, to move quarry products, trucks use about three times more diesel than trains to move a tonne of freight. This leads to three times the air pollution.	Noted. The Spoil Management Project aims at reducing heavy vehicle kilometres travelled by transporting spoil via rail rather than road for the majority of the journey. Therefore the proposal would result in an overall decrease in adverse air quality emissions from spoil transport.
2.8	SMP18	Concern about the increase of truck movements and potential air pollution.	Trucks are currently transporting spoil to the Illawarra region from Sydney. This proposal aims to remove these trucks for the larger portion of the route by transporting the spoil via rail and only using trucks at the beginning and end of the trip. This would effectively reduce the number of truck kilometres travelled, thereby reducing the air quality emissions of the transportation process. The number of trucks operating within the area would not increase as a result of the proposal, however the routes traversed would be altered and shortened.
2.9	SMP13; SMP14	Dust emissions from surge piles/stockpiles should be managed in accordance with precedent set by latest approvals. Stockpiles should be policed with powers to prosecute if impact is caused.	Transport for NSW would monitor conditions for dust emissions during operation and would apply the appropriate mitigation measures including covering or watering of surge piles or ceasing operations temporarily. Every effort would be made to ensure dust emissions do not occur as a result of operations. The proposed operations would be subject to an Environmental Protection Licence governed by the EPA. All operations would be in accordance with licence conditions.
2.10	SMP13	The REF specifies that the site operating facilities would be actively managed, monitored and regularly maintained to ensure a safe,	The proposal would operate in accordance with the Operational Environmental Management Plan (OEMP) that would be developed prior to operations. The OEMP would include requirements of any licences

Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
		comfortable and tidy work environment is provided. These words do not provide definitive direction and strict guidance.	and Conditions of Approval.
2.11	SMP13	Other stockpiles have licence conditions that do not allow any visible dust to leave the site. At a minimum this should be the case with this proposal.	The operation of this proposal would be subject to an Environmental Protection Licence administered by the EPA. Conditions specified in this licence would be complied and dust emissions would be avoided.
<b>3 Consultation Process</b>			
3.1	SMP3	Information requested regarding how the public display locations were chosen.	Information was provided to the community in the form of four static display locations; two in close proximity to the Chullora site and two in close proximity to the Illawarra site.  Additionally, all information, including the REF was made available in web accessible format on the Transport for NSW project website for access from any location.  Locations for static displays were chosen based on proximity to the area of impact and availability of public locations.
3.2	SMP3; SMP13	Request for extended public display period following notification of a wider catchment area.	Notification of the public display for this proposal was based upon a one kilometre radius from the location of the main activity. The notification provided a brief description of the proposal along with where to view the REF and how make a submission.  The area of notification is deemed appropriate due to the scale of the proposed works and the level of assessed impacts. The public display period was not extended, however the Transport for NSW Project Infoline is available should further information be required and any submissions received prior to determination were considered.
3.3	SMP2	The local Baptist Christian Community School at Chullora did not receive a copy of the project notification in the letterbox drop.	The area of notification is deemed appropriate due to the proposed works and the level of assessed impacts at Chullora. The Baptist Christian Community School is located within this 1 kilometre radius and therefore would have received a notification via letterbox drop on 15 August 2017.
3.4	SMP7; SMP18; SMP19; SMP13	Public display period is inadequate. The REF claims to advertise the project in the commencing week of the two-week exhibition period. The first advice received of the project was an advertisement	Advertisements were placed in the local papers for the two weeks during public display, with the advertisement showing on 15 and 22 August 2017 in all local papers.  The submission period for this proposal was open for a period of two full weeks and was timed outside of school holidays. This is in



Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
		in the local newspaper, the Illawarra Mercury, on 22nd August. The closing date for submissions was 28th August. This provided only six days to prepare a response.	accordance with the Transport for NSW communications policy for activities of this level of impact. The REF was available on the Transport for NSW project website and at specific locations in hard copy from 15 August 2017 for two weeks. The REF is still available to view on the Transport for NSW website. The public display period was not extended, however Transport for NSW has continued to receive submissions, the REF remains publicly accessible on-line and the Project Infoline is available should further information be required. Any submissions received prior to determination have been considered.
3.5	SMP17	What is the process for community consultation for the proposed transport of WestConnex waste to Port Kembla?	The proposed spoil transport method associated with this REF would form a small portion of overall WestConnex spoil movements. WestConnex currently has an approved Construction Spoil Management Plan and Construction Traffic and Access Management Plan under which they can continue operations. It is proposed that these plans would be amended to reflect the use of rail as an additional transport mode under this proposal, however this would form part of the WestConnex project and would be subject to approval by the Department of Planning and Environment. Any further formal feedback sought in relation to the transport of spoil following determination of this REF would be subject to the WestConnex and Department of Planning and Environment processes. For further information, the Project Infoline is available on an ongoing basis.
<b>4</b>		<b>Traffic Impacts</b>	
4.1	SMP2	Traffic impacts may be experienced along Centenary Drive and the Hume Highway due to the increased number of heavy vehicles resulting from this proposal. Congestion is already experienced during the peak periods.	An estimated 255 heavy vehicle movements (one-way) would enter each facility each day. It is likely the fleet would consist of 14 trucks working three, three hour shifts. A traffic impact assessment has been carried out as part of the REF. The assessment considered the major pathways trucks would likely take to and from the facilities. It found that the increase in traffic volumes along the proposed travel routes is generally less than a two percent increase in the total traffic volumes, and therefore would not be expected to have any tangible negative impacts in terms of road network capacity. A detailed review of four key intersections was undertaken to assess operational impacts from the Proposal along the

Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
			<p>proposed travel route using SIDRA 7.0 modelling software, revealing that:</p> <ul style="list-style-type: none"> <li>• There would be minimal impact on the Hume Highway and Worth Street intersection, where operation would continue at a satisfactory level of service;</li> <li>• The Hume Highway, Centenary Drive and Roberts Road intersection would continue to operate at the same level of service as existing;</li> <li>• There would be minimal impact on the Five Islands Road and Flinders Street intersection, where operation would continue at satisfactory level of service;</li> <li>• There would be minimal impact on the Old Port Road and Bis Industries Access and CRM Access intersection, where operation would continue at satisfactory level of service.</li> </ul>
4.2	SMP6	Concern regarding road congestion on Mt Ousley Road, the Princes Highway to Sutherland and around the Wollongong and Shellharbour areas, including a lifting of the night curfew for export coal truck movements.	<p>The Spoil Management Project aims to reduce road congestion through the reduction in heavy vehicle kilometres travelled. Traffic impacts resulting in the distribution of spoil to and from the Modal Transfer Facilities have been assessed and it has been found that the increased number in vehicles would not result in a noticeable difference. This is due to the transport pathways occurring along major arterial roads and within industrial areas containing minimal local traffic. Movements would be subject to approved management plans.</p>
4.3	SMP8; SMP13	Concern around the impact of the 255 trucks required per day, to distribute up to 9,000 tonnes of spoil away from the Illawarra Modal Transfer Facility, and the affect this will have in terms of noise, congestion, and pollution. It is thought trucks are being removed from the highway and placed onto local roads, not designed for heavy haulage. This would put residents at risk, as well as strain Council managed roads.	<p>The REF has assessed impacts likely to result from the proposal including traffic and noise impacts.</p> <p>In terms of traffic impacts, the construction phase would be limited to haulage road construction and the installation of train loading/unloading equipment at each site. The works at each site would require a construction period of approximately three weeks. The numbers of heavy and light vehicles travelling to the sites during construction are expected to be minimal and would utilise existing roadways.</p> <p>For operation, the assessment considered the major pathways trucks would be likely to take to and from the facilities. It found that the increase in traffic volumes along the proposed travel routes is generally less than a two percent increase in the total traffic volumes, and therefore could not be expected to have any tangible negative impacts in</p>

Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
			<p>terms of road network capacity. Additionally, all intersections assessed along the transport route at Sydney and Illawarra would continue to operate at the same level of service as they currently do.</p> <p>A review of predicted increases in traffic noise levels at both sites shows that the predicted worse case total traffic noise level increase would be less than 1 dB which is below the 2 dB relative increase criteria. Therefore, traffic noise increases associated with the proposal are considered to be acceptable.</p> <p>Trucks would travel via approved B-Double routes and therefore would not have a significant increase in road maintenance requirements.</p> <p>A Traffic Management Plan would be prepared prior to the commencement of construction, in consultation with the relevant road authority (RMS and/or Council). The management plan would ensure load limits are respected on proposed haulage routes.</p>
4.4	SMP6; SMP21	Can assurance be provided that no road haulage would be permitted down Mt Ousley Road?	<p>No. This Spoil Management Project currently only relates to the movement of spoil from the M4 WestConnex project. It would form part of the overall spoil management solution for this project. Where trains cannot be provided, truck haulage would still be used in accordance with the existing M4 WestConnex approval. This route may also be used for haulage by other projects not associated with Transport for NSW.</p>
4.5	SMP15	The use of Downie's Bridge as an alternative route should not be considered as it is impossible for two trucks coming in the opposite direction to pass on this bridge. Trucks have been witnessed using this route illegally, including B-Double trucks using Port Kembla's main Street - Wentworth Street.	<p>A Traffic Management Plan would be developed and implemented prior to construction commencing. As part of this, the best route would be identified, ensuring that any impacts from using this route are mitigated and safety is prioritised. The traffic management plan would determine roads used to transport spoil.</p>
4.6	SMP13	There should be total prohibition of the use of Five Islands Road.	<p>A Traffic Management Plan would be developed and implemented prior to construction commencing. As part of this, the best route would be identified, ensuring that any impacts from using this route are mitigated and safety is prioritised. The Traffic Management Plan would determine roads used to transport spoil.</p>

Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
4.7	SMP13	The proposal does not consider the type of road that the traffic is traveling on. The road is dangerous because it is a single lane in two directions. It is also, subject to flooding and has two bridges on corners with one level crossing and a push-bike track on the side.	The proposal considers use of roads currently used by heavy vehicles. A Traffic Management Plan would be developed prior to construction and operation which would ensure roads and routes used are safe and minimise impacts to the surrounding areas.
<b>5</b>		<b>Heavy Vehicle Access</b>	
5.1	SMP4; SMP13	The proposed truck access point for the Illawarra Modal Transfer Facility at an existing driveway on Old Port Road crosses land managed by NSW Ports. It is considered that this access point is not safe for truck use given the layout of existing roads.	The REF has identified that the proposed access point for the Illawarra Modal Transfer Facility requires further investigation and notes that "the proposed access and egress to and from Old Port Road to the CRM Rail Depot poses some alignment constraints and would require some modifications to the entry design to ensure adequate signage, line markings and site distance safety considerations are met. Further assessment would be carried out during detailed design to ensure safe access can be maintained for the duration of operations". Transport for NSW would consult with NSW Ports during this design phase to ensure a safe arrangement is carried forward.
5.2	SMP4	Support for the use on an alternative truck access point. Alternative point should be located at an existing formalised operational access point further to the south. It is believed this access point would be safer.	The REF has identified that the proposed access point for the Illawarra Modal Transfer Facility requires further investigation and notes that "the proposed access and egress to and from Old Port Road to the CRM Rail Depot poses some alignment constraints and would require some modifications to the entry design to ensure adequate signage, line markings and site distance safety considerations are met. Further assessment would be carried out during detailed design to ensure safe access can be maintained for the duration of operations". Use of the alternative access point would be investigated during detailed design however would be subject to agreement with Bluescope Steel.
5.3	SMP13	Access roads should be sealed.	Noted. Access roads would be sealed where required.
<b>6</b>		<b>Use of Bombo Quarry</b>	
6.1	SMP9	The direct transport of spoil to the Bombo quarry site must be considered as part of the proposal. This option has its	Bombo Quarry is identified as a longer term opportunity for spoil reuse in the current REF. This is due to several reasons including that planning for decommissioning is still



Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
		own rail spur and would remove a significant volume of truck movements in the Illawarra transferring material between Port Kembla and Bombo. The proposed unloading and material transfer processes are consistent with the existing quarry operations thus would have minimal impact to the surrounding area. The Bombo site is of sufficient size that it could cater for the distribution of spoil to other developments in the Illawarra if required and is accessed by a direct connection to the grade separated Princes Highway resulting in minimal traffic impacts.	underway and that the necessary planning approvals for Bombo Quarry to accept spoil are not yet in place. Exemptions under Part 9 of the Environment Operations (Waste) Regulation 2014 require the EPA to issue an exemption. Additionally, Port Kembla provides key advantages over Bombo in the short to medium term and is the focus of this REF. Port Kembla is also a more logistically efficient location from which to deliver spoil to a range of locations to key sites throughout the Illawarra as compared to Bombo Quarry which is better suited as a single receptacle site.  The movement of spoil trucks from Port Kembla to Bombo Quarry is not an outcome envisaged by Transport for NSW. The preference would be to develop direct access to Bombo Quarry in the future. Bombo Quarry presents a strategic opportunity for disposal of a significant amount of spoil at a location already connected by rail as identified in the REF.
6.2	SMP9	Bombo Quarry should be considered as it has reached the end of its operational life. Sydney Trains and Boral have commenced discussions with NSW Government departments and Kiama Municipal Council to review an end use plan which require significant volumes of spoil.	Bombo Quarry is identified as a longer term opportunity for spoil reuse in the current REF. This is due to several reasons including that planning for decommissioning is still underway and that the necessary planning approvals for Bombo Quarry to accept spoil are not yet in place. Exemptions under Part 9 of the Environment Operations (Waste) Regulation 2014 require the EPA to issue an exemption. Additionally, Port Kembla provides key advantages over Bombo in the short to medium term and is the focus of this REF. Port Kembla is also a more logistically efficient location from which to deliver spoil to a range of locations to key sites throughout the Illawarra in support of the Premier's Priorities as compared to Bombo Quarry which is better suited as a single receptacle site.  The movement of spoil trucks from Port Kembla to Bombo Quarry is not an outcome envisaged by Transport for NSW. The preference would be to develop direct access to Bombo Quarry in the future. Bombo Quarry presents a strategic opportunity for disposal of a significant amount of spoil at a location already connected by rail as identified in the REF.
6.3	SMP9	The REF identifies Bombo Quarry as the long term	The Bombo Quarry site cannot be included as part of this REF as it is not currently ready for

Issue No.	Sub-Mission No.	Issues raised	Transport for NSW response
		management solution for spoil reuse, however it should be expanded to include Bombo Quarry now to provide certainty of the long term management option.	filling and the timeframe for filling is undetermined. The Bombo Quarry site is still considered to be a feasible option to transport spoil to when the timing is appropriate and would be assessed as part of a separate approval accordingly.

**Table 2 Response to submissions received from Strathfield Municipal Council**

No.	Issues raised	Transport for NSW response
<b>1</b>	<b>General</b>	
1.1	Support for the proposal	Noted.
1.2	Council request an opportunity to review the Construction Environmental Management Plan and the Operational Environmental Management Plan when available.	The Construction Environmental Management Plan and the Operational Environmental Management Plan can be made available to Council for information when available.
<b>2</b>	<b>Traffic Impacts</b>	
2.1	Noted that traffic generated as part of the proposal would add to traffic volumes at the intersection of the Hume Highway and Centenary Drive and Roberts Road, which currently operates at an unsatisfactory level of service. It is expected that this be continually monitored during construction and operation of the proposal.	<p>An estimated 255 heavy vehicle movements (one-way) would enter each facility each day. It is likely the fleet would consist of 14 trucks working three, three hour shifts. A traffic impact assessment has been carried out as part of the REF. The assessment considered the major pathways trucks would be likely to take to and from the facilities. It found that the increase in traffic volumes along the proposed travel routes is generally less than a two percent increase in the total traffic volumes, and therefore would not be expected to have a tangible negative impact in terms of road network capacity.</p> <p>A detailed review of two key intersections within the area surrounding the Sydney Modal Transfer Facility was undertaken to assess operational impacts from the Proposal along the proposed travel route using SIDRA 7.0 modelling software, revealing that:</p> <ul style="list-style-type: none"> <li>• There would be minimal impact on the Hume Highway and Worth Street intersection, where operation would continue at a satisfactory level of service;</li> <li>• The Hume Highway, Centenary Drive and Roberts Road intersection would continue to operate at the same level of service as existing.</li> </ul> <p>Monitoring at key intersections would not be carried out due to the small increase the proposal would have on overall traffic volumes.</p>
2.2	Council request an opportunity to review the documents relating to the Traffic Management Plan as they become available.	A Traffic Management Plan (TMP) would be prepared outlining the approved haulage routes and would be reviewed and updated as appropriate. The TMP would be compiled in coordination with the M4 WestConnex project work sites where the spoil is being hauled from. This may be in the form of an update to the existing M4 WestConnex project's existing TMP and Spoil Management Plan. Council would be consulted as required in the preparation or amendment of any TMP.
<b>3</b>	<b>Sediment and Erosion Control</b>	
3.1	It is expected that all measures relating to control of sediment and erosion be implemented.	Mitigation measures aimed at preventing spoil leaving the site via runoff or erosion would be implemented in accordance with Conditions of Approval. These measures would be in place during construction and operation, as appropriate. Site setup would be designed to complement existing landform, implementing short or long-term sediment traps as appropriate. Sediment management would be carried out in accordance with the industry best-

No.	Issues raised	Transport for NSW response
		practice guide, 'Managing Urban Stormwater: Soils and Construction Volume 1' (Landcom 2004) (the Blue Book). Additionally, spoil would not be stockpiled for long periods of time and would be managed in accordance with forecast weather where possible to avoid using surge piles during heavy rainfall or high winds.

**Table 3 Response to submissions received from Canterbury Bankstown Council**

No.	Issues raised	Transport for NSW response
<b>1</b>	<b>Hydrology and Water Quality</b>	
1.1	Two drains at the south western corner of the site, east of Worth Street, overtop during minor flooding events and flood residential properties upstream. Any obstruction to the water flow path caused by the proposal would increase this impact. Flood warning time is not adequate to alter activities.	This proposal is not altering the amount of permeable surface and would be designed to ensure flood flow paths are not restricted. Existing flood impacts would not be altered as a result of the proposal.
1.2	VENM storage areas must not be located within the overland flow path of storm water.	VENM storage areas would be managed in accordance with the Blue Book measures and would be located outside of water flow paths and with the appropriate management measures installed.
<b>2</b>	<b>Traffic Impacts</b>	
2.1	Traffic volume estimates are based on current total traffic load including light vehicles. As the proposal is for additional heavy vehicles only, the traffic impact due to heavy vehicle traffic only should also be considered. Council believe the proposal would result in an increase of up to 40 percent of heavy vehicle traffic.	The traffic assessment includes an assessment of the proposed truck movements (heavy vehicles) only associated with the project, as outlined in Section 2.4. These proposed truck movements have been assessed against the existing traffic volumes.
2.2	Disagree with traffic modelling results: <b>Hume Highway / Worth Street intersection</b> – This will be impacted in the morning peak hour, with the intersection performance decreasing from Level of Service B to Level of Service C. <b>Hume Highway / Centenary Drive / Roberts Rd intersection</b> – This will be significantly impacted in the PM peak at the Eastern T-Intersection, Hume Highway/ Centenary Drive. The intersection performance decreasing from Level of Service B to Level of Service E. In terms of the delay time,	<b>Hume Highway / Worth Street intersection</b> The Hume Highway / Worth Street intersection will decrease from a Level of Service B to a Level of Service C. However, a Level of Service C is still an acceptable Level of Service and based on best practice does not require mitigation measures.  <b>Hume Highway / Centenary Drive / Roberts Rd intersection</b> The Hume Highway / Centenary Drive / Roberts Rd intersection (a staggered T-intersection) operates at Level of Service F currently, and under future traffic loads. The Hume Highway/ Centenary Drive intersection operating at a Level of Service B is a little misleading as this intersection cannot be considered in isolation and needs to be assessed on a broader scale as a staggered T-intersection.



No.	Issues raised	Transport for NSW response
	motorists will experience three times more delay than the existing situation.	The project would not change the current level of service at this staggered T-intersection.
2.3	Intersection Modelling has not been carried out for the Hume Highway / Waterloo Road intersection. Considering the land use with Chullora Market Place and the schools in Waterloo Road close to this intersection, the proposal is likely to cause operational delays at the intersection	The Hume Highway / Waterloo Road intersection was not identified as a critical intersection and therefore an assessment was not undertaken. The additional traffic movements associated with the project will be on the through movements along the Hume Highway only (and not turning). Whilst Waterloo Road is a collector road for the Chullora Market Place, priority to the Hume Highway will be maintained (i.e. green time favours the through movements on the Hume Highway). The additional traffic movements may increase delay to the side road movements (Waterloo Road) however in the context of maintaining priority this would be generally accepted.
<b>3</b>	<b>Noise Impacts</b>	
3.1	Noise generated by significant increase in heavy vehicle traffic between Centenary Drive and Worth Street will impact on the residents, who live on the southern side of Hume Highway despite the findings of the REF report.	Further noise impact assessment is required to be undertaken at this location and would include identification of noise impacts and appropriate mitigation measures. Works would not commence prior to approval of the noise impact assessment and associated management plan. Transport for NSW will endeavor to ensure impacts resulting from the proposal are minimised.
3.2	Operational noise during the night time period is predicted to exceed noise amenity criteria in the Greenacre residential area. Operations should be limited to normal operating hours to minimise sleep disturbance.	Further noise impact assessment is required to be undertaken at this location and would include identification of noise impacts and appropriate mitigation measures. Works would not commence prior to approval of the noise impact assessment and associated management plan. Transport for NSW will endeavor to ensure impacts resulting from the proposal are minimised.
3.3	Council request to review the noise management plan prior to its adoption.	The noise management plan can be made available to Council for information once available.

**Table 4 Response to submissions received from Environment Protection Authority**

No.	Issues raised	Transport for NSW response
<b>1</b>	<b>Environmental Protection Licence</b>	
1.1	Additional information to that included in the REF would be required to be provided as part of the EPL application unless the REF is revised.	Transport for NSW acknowledges that an EPL would be required in order for the proposal to become operational. The holder of the licence and its implementation would be discussed between the EPA and the relevant organisations at the time the proposal proceeds.
<b>2</b>	<b>Community consultation</b>	
2.1	Targeted community consultation should be carried out, specifically for the Port Kembla community with groups such as the Port Kembla Pollution Meeting. It appears that Transport for NSW has not undertaken this targeted consultation.	The submission period for this proposal was open for a period of two full weeks and was timed outside of school holidays. This is in accordance with the Transport for NSW communications policy for activities of this level of impact. The REF was available online and at specific locations in hard copy from 15 August 2017 for two weeks. The REF is still available to view on the Transport for NSW website.

No.	Issues raised	Transport for NSW response
		<p>An area of a 1 kilometre radius surrounding the two modal transfer facility sites received a notification via letterbox drop on 15 August 2017. Letters were also sent to residents of Wentworth Street, Port Kembla to notify them of the REF and invite them to provide feedback (as they have direct line of sight to the BlueScope site where activities are proposed).</p> <p>Advertisements were placed in the local papers for the two weeks during public display, with the advertisement showing on the 15 and the 22 of August 2017 in all local papers.</p> <p>Stakeholders, including Bluescope Steel and Councils, were advised of the REF being on public display.</p> <p>Transport for NSW has continued to accept submissions and respond to enquiries following the closure of the official submission period. Offers to meet with key community groups were made by Transport for NSW with the purpose being to discuss the proposal in more detail and to understand and address the groups' concerns.</p> <p>Transport for NSW has since met with the Port Kembla Pollution Meeting on 9 December 2017 and the Wollongong Neighbourhood Forum on 13 December 2017. Consultation with these groups and others will be ongoing throughout the development of the project.</p>
<b>3</b>	<b>General</b>	
3.1	Clarification around the time period for which the project is proposed to be undertaken.	<p>The proposal would be set up to initially transport spoil from the M4 WestConnex Project. The overall quantity transported from this project would be dependent upon a range of factors including the stage of tunnelling that M4 WestConnex is at upon the commencement of this proposal.</p> <p>Following the completion of the M4 WestConnex tunnelling, the proposal could potentially be made available to other projects wishing to transport spoil to the Illawarra, subject to separate approvals.</p>
3.2	Clarification around the difference between 'operational' and 'active' sites for the Chullora and Port Kembla sites. The REF indicates that the proposed sites would be 'operational' twenty four hours a day, seven days a week but would only be 'active' for nine hours a day.	<p>The REF proposes that three train movements occur per day and that each train movement would require around three hours of loading/unloading. Hence activity would occur at each site in three, three hour periods. The timing of the train loading/unloading would depend on scheduling of train movements and would be subject to change according to rail operational demands. It is proposed that the train movements could occur at any time during a 24 hour period according to these demands. Hence the sites would be 'operational' 24 hours a day ready to receive, however activities would be dispersed and comprise around 9 hours of loading/unloading.</p> <p>Truck movements would occur following the train delivery with each train delivery requiring around 85 trucks. These trucks would continue to operate as required to remove the spoil from the site and deliver it to the agreed location.</p>
<b>4</b>	<b>Noise</b>	
4.1	EPA was unable to review the Noise	A copy of this report is now available via the website.

No.	Issues raised	Transport for NSW response
	and Vibration Impact Assessment as it was not present in the REF.	
4.2	<p>The noise assessment for Chullora was undertaken for a previously preferred location that is not being progressed and therefore may not correctly identify the full extent of impacts on residents.</p> <p>Sleep disturbance criteria must be assessed against the background +15 screening criteria as per the EPA's Industrial Noise Policy supplication note.</p> <p>Mitigation measures for residences predicted to exceed the noise criteria are deferred to the development of a noise management plan. An assessment of feasible and reasonable noise mitigation measures needs to be undertaken as part of the REF.</p>	<p>A mitigation measure has been included to ensure that a further Noise and Vibration assessment is undertaken once the final location is confirmed during detailed design. The aim of this further impact assessment would be to more accurately assess the potential noise impact and to identify the appropriate mitigation measures with respect to a more detailed design. Additionally, it would assess potential noise emissions against the updated NSW EPA Noise Policy for Industry (2017).</p> <p>In the interim, it was considered that the existing noise and vibration assessment was indicative of potential impacts for the purpose of decision making of whether to proceed with the proposal.</p> <p>A Condition of Approval would be imposed to ensure noise and vibration issues are adequately addressed prior to construction.</p> <p>By delaying the updated Noise and Vibration Impact Assessment to post determination, it allows a more accurate assessment to be undertaken based on a more progressed design and more accurate inputs resulting from further progressed negotiations with appropriate organisations.</p>
4.3	The EPA considers the proposed increase of three trains per day as a rail traffic generating project and advises that it needs to be assessed in accordance with the EPA's Rail Infrastructure Noise Guidelines.	Transport for NSW did not undertake a noise assessment on the rail noise from running three trains per day. This is because the increase was considered minor in relation to the existing trains used and also because the extra train movements were considered consistent with the previous train movements along the line that transported coal. Additional assessment would be carried out prior to construction in order to meet the EPA requirements.
4.4	The EPA notes that EPLs for the operational rail network specify criteria for noise emissions from locomotives being introduced to the network. Trains used for this proposal would be expected to comply with these levels.	Transport for NSW would endeavor to source trains that comply with the licenced levels. Any exceedances would be discussed with the EPA to identify alternative solutions to manage noise emissions.
<b>5</b>	<b>Air Quality</b>	
5.1	<p>Transport for NSW must consider additional design and management processes for the project to more closely align with best practice methods. These include:</p> <ul style="list-style-type: none"> <li>• design loading of rail cars and trucks from overhead bins using a telescoping chute</li> <li>• design to avoid the use of front-end loaders (wheeled loaders)</li> <li>• paving the unsealed portion of the road at Port Kembla</li> <li>• enclosing material transfer at both</li> </ul>	Transport for NSW will take these requirements forward into detailed design for consideration.

No.	Issues raised	Transport for NSW response
	intermodal points.	
5.2	<p>The EPA notes that this project will result in three additional trains (load train wagon configurations) operating on the southern railway line each day. Particulate emissions from rail corridors is a known community concern. The REF does not assess the air quality impacts of this activity and what mitigation and management measures will be employed to avoid/ minimise air emissions (including particulates) during rail transportation.</p>	<p>Transport for NSW did not undertake an air quality assessment specific to the movement of three additional trains along the railway line. This is because the increase was considered minor in relation to the existing trains used and also because the extra train movements were considered consistent with the previous train movements along the line that transported coal, with the exception of coal dust emissions. Additional assessment would be carried out prior to construction in order to meet the EPA requirements.</p>

### **3. Design changes following public display**

There have been no design changes to the proposal subsequent to the public display of the REF.

### **4. Consideration of the environmental impacts**

#### ***Environmental Planning and Assessment Act 1979 (EP&A Act)***

The REF addresses the requirements of section 111 of the EP&A Act. In considering the Proposed Activity, all matters affecting or likely to affect the environment are addressed in the REF, the Determination Report, and associated documentation.

In accordance with the checklist of matters pursuant to clause 228(3) of the *Environmental Planning and Assessment Regulation 2000*, an assessment is provided in Section six and Appendix one of the REF.

In respect of the Proposed Activity an assessment has been carried out regarding potential impacts on critical habitat, threatened species, populations or ecological communities or their habitats, under section 112 of the EP&A Act.

The likely significance of the environmental impacts of the Proposed Activity have been assessed in accordance with the then NSW Department of Planning's 1995 best practice guideline [\*Is an EIS Required?\*](#)<sup>1</sup> It is concluded that the Proposed Activity is not likely to significantly affect the environment (including critical habitat) or threatened species, populations of ecological communities, or their habitats. Accordingly, an environmental impact statement under Part 5.1 of the EP&A Act is not required.

#### ***Environment Protection and Biodiversity Conservation Act 1999 (EPBC Act)***

As part of the consideration of the Proposed Activity, all matters of national environmental significance (NES) and any impacts on Commonwealth land for the purposes of the EPBC Act have been assessed. In relation to NES matters, this evaluation has been undertaken in accordance with Commonwealth Administrative Guidelines on determining whether an action has, will have, or is likely to have a significant impact. A summary of the evaluation is provided in Section four and Appendix two of the REF.

It is considered that the Proposed Activity described in the REF is not likely to have a significant impact on any Commonwealth land and is not likely to have a significant impact on any matters of NES.

### **5. Conditions of Approval**

If approved, the Proposed Activity would be subject to the Conditions of Approval included in Appendix Two.

### **6. Conclusion**

Having regard to the assessment in the REF and consideration of the submissions received, it can be concluded that the Proposed Activity is not likely to significantly affect the environment (including critical habitat) or threatened species, populations of ecological communities, or their habitats. Consequently, an environmental impact statement is not required to be prepared under Part 5.1 of the EP&A Act.

<sup>1</sup> Refer to the National Library of Australia's 'Trove' website  
<http://trove.nla.gov.au/work/7003034?selectedversion=NBD11474648>



It is also considered that the Proposed Activity does not trigger any approvals under Part 3 of the EPBC Act.

The environmental impact assessment (REF and Determination Report) is recommended to be approved subject to the proposed mitigation and environmental management measures included in the Conditions of Approval.

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## Appendix 1: Review of Environmental Factors

<https://www.transport.nsw.gov.au/projects/current-projects/spoil-management-project>

## **Appendix 2: Conditions of Approval**

## Conditions of Approval

### Spoil Management Project

#### Abbreviations

<b>ADEM</b>	Associate Director Environment Management, TfNSW (or nominated delegate)
<b>CEMP</b>	Construction environmental management plan
<b>CLP</b>	Community liaison plan
<b>EIA</b>	Environmental impact assessment
<b>EPA</b>	NSW Environment Protection Authority
<b>EP&amp;A Act</b>	<i>Environmental Planning and Assessment Act 1979</i>
<b>EPL</b>	Environment protection licence issued by the EPA under the <i>Protection of the Environment Operations Act 1997</i>
<b>EMR</b>	Environmental management representative
<b>ISO</b>	International Standards Organisation
<b>NIA</b>	Noise Impact Assessment
<b>OEH</b>	NSW Office of Environment and Heritage
<b>ONVMP</b>	Operational noise and vibration management plan
<b>OOHWP</b>	Out of hours work protocol
<b>PECM</b>	Pre-construction environmental compliance matrix
<b>POCR</b>	Pre-operational compliance report
<b>REF</b>	Review of environmental factors
<b>TfNSW</b>	Transport for NSW
<b>TMP</b>	Traffic Management Plan

## Definitions

Term	Definition
<b>construction</b>	Includes all work in respect of the Project, other than survey, acquisitions, fencing, investigative drilling or excavation, building/road dilapidation surveys, or other activities determined by the EMR to have minimal environmental impact such as minor access roads, minor adjustments to services/utilities, establishing temporary construction compounds (in accordance with this approval), or minor clearing (except where threatened species, populations or ecological communities would be affected).
<b>contamination</b>	The presence in, on or under land of a substance at a concentration above the concentration at which the substance is normally present in, on or under (respectively) land in the same locality, being a presence that presents a risk of harm to human health or any other aspect of the environment.
<b>emergency work</b>	Includes works to avoid loss of life, damage to external property, utilities and infrastructure, prevent immediate harm to the environment, contamination of land or damage to a heritage (indigenous or non-indigenous) item.
<b>environmental impact assessment</b>	The documents listed in Condition 1 of this approval.
<b>environmental management representative</b>	An independent environmental representative appointed to the Project or a delegate nominated by Transport for NSW.
<b>noise sensitive receiver</b>	In addition to residential dwellings, noise sensitive receivers include, but are not limited to, hotels, entertainment venues, pre-schools and day care facilities, educational institutions (e.g. schools, TAFE colleges), health care facilities (e.g. nursing homes, hospitals), recording studios, places of worship/religious facilities (e.g. churches), and other noise sensitive receivers identified in the environmental impact assessment.
<b>reasonable and feasible</b>	Consideration of best practice taking into account the benefit of proposed measures and their technological and associated operational application in the NSW and Australian context. Feasible relates to engineering considerations and what is practical to build. Reasonable relates to the application of judgement in arriving at a decision, taking into account: mitigation benefits, cost of mitigation versus benefits provided, community views and nature and extent of potential improvements.
<b>the Project</b>	The construction and operation of the Spoil Management Project as described in the environmental impact assessment.
<b>the Proponent</b>	A person or body proposing to carry out an activity under Part 5 of the EP&A Act. In the case of the Project, TfNSW.



## Conditions of approval

No	Condition									
	<b>General</b>									
1.	<p><b>Terms of approval</b></p> <p>The Project shall be carried out generally in accordance with the environmental impact assessment (EIA) for this Project, which comprises the following documents:</p> <table><tr><th>DOCUMENT</th><th>AUTHOR</th><th>DATE</th></tr><tr><td>Spoil Management Project – Review of Environmental Factors</td><td>Transport for NSW</td><td>August 2017</td></tr><tr><td>Spoil Management Project – Determination Report</td><td>Transport for NSW</td><td>December 2017</td></tr></table> <p>In the event of an inconsistency between these conditions and the EIA, these conditions will prevail to the extent of the inconsistency.</p>	DOCUMENT	AUTHOR	DATE	Spoil Management Project – Review of Environmental Factors	Transport for NSW	August 2017	Spoil Management Project – Determination Report	Transport for NSW	December 2017
DOCUMENT	AUTHOR	DATE								
Spoil Management Project – Review of Environmental Factors	Transport for NSW	August 2017								
Spoil Management Project – Determination Report	Transport for NSW	December 2017								
2.	<p><b>Project modifications</b></p> <p>Any modification to the project as approved in the EIA would be subject to further assessment. This assessment would need to demonstrate that any environmental impacts resulting from the modifications have been minimised. The assessment shall be subject to approval under delegated authority by TfNSW. The Proponent shall comply with any additional requirements from the assessment of the project modification.</p>									
3.	<p><b>Statutory requirements</b></p> <p>These conditions do not relieve the Proponent of the obligation to obtain all other licences, permits, approvals and land owner consents from all relevant authorities and land owners as required under any other legislation for the Project. The Proponent shall comply with the terms and conditions of such licences, permits, approvals and permissions.</p>									
4.	<p><b>Pre-construction environmental compliance matrix</b></p> <p>A pre-construction environmental compliance matrix (PECM) for the Project (or such stages of the Project as agreed to by the Environmental Management Representative (EMR)) shall be prepared detailing compliance with all relevant conditions and mitigation measures prior to commencement of construction. The PECM shall also include details of approvals, licences and permits required to be obtained under any other legislation for the Project.</p> <p>The Proponent shall:</p> <p>(a) submit a copy of the PECM to the EMR for review. The EMR are to be given a minimum period of 7 days to review and provide any comments to the Proponent in relation to the PECM</p> <p>(b) upon completion of the EMR review period, submit a copy of the PECM to the ADEM for approval, at least 14 days (or within such time as otherwise agreed to by the ADEM) prior to commencement of construction of the Project.</p>									
5.	<p><b>Environmental Protection Licence</b></p> <p>An Environmental Protection Licence (EPL) must be obtained from the NSW EPA prior to any works occurring. All conditions of the EPL must be complied with throughout the project life.</p>									
6.	<p><b>Pre-operation compliance report</b></p> <p>A pre-operation compliance report (POCR) for the Project shall be prepared, prior to commencement of operation of the Project. The POCR shall detail compliance with all conditions of approval, licences and permits required to be obtained under any other legislation for the project.</p> <p>The Proponent shall:</p> <p>(a) submit a copy of the POCR to the EMR for review. The EMR is to be given a minimum period</p>									

No	Condition
	<p>of 7 days to review and provide any comments to the Proponent in relation to the PO CR.</p> <p>(b) upon completion of the EMR review period submit a copy of the PO CR to the ADEM (or nominated delegate) for approval. The PO CR is to be provided to the ADEM at least one month prior to the scheduled operation of the Project (or such time as otherwise agreed to by the ADEM).</p>
	<b>Communications</b>
<b>7.</b>	<p><b>Community liaison plan</b></p> <p>The Proponent shall develop and implement a community liaison plan (CLP) to engage with government agencies, relevant councils, landowners, community members and other relevant stakeholders (such as utility and service providers, bus companies and businesses) where required. The CLP shall comply with the obligations of these conditions and should include, but not necessarily be limited to:</p> <ul style="list-style-type: none"> <li>(a) details of the protocols and procedures for disseminating information and liaising with the community and other key stakeholders about construction activities (including timing and staging) and any associated impacts during the construction period</li> <li>(b) stakeholder and issues identification and analysis</li> <li>(c) procedures for dealing with complaints or disputes and response requirements, including advertising the 24 hour construction response line number</li> <li>(d) details (including a program) of training for all employees, contractors and sub-contractors on the requirements of the CLP.</li> </ul> <p>Sub-plans to the CLP will be developed as required. These sub-plans will detail site-specific consultation and communication requirements for construction works that impact residents, other stakeholders and businesses. They will also identify further mitigation measures and processes to reduce construction impacts.</p> <p>The CLP shall be prepared to the satisfaction of the Director Community Engagement prior to the commencement of construction and implemented, reviewed and revised as appropriate during construction of the Project.</p>
<b>8.</b>	<p><b>Community notification and liaison</b></p> <p>The local community shall be advised of any activities related to the Project with the potential to impact upon them.</p> <p>Consultation with the local community will be undertaken during design development. Prior to the commencement of construction of the Project or any site activities commencing, the local community will be notified at least one month prior. The community to be notified of works to be undertaken, the estimated hours of construction and details of how further information can be obtained (i.e. contact telephone number/email, website, newsletters etc.) including the 24 hour construction response line number.</p> <p>Construction-specific impacts including information on traffic changes, access changes, detours, services disruptions, public transport changes, high noise generating work activities and work required outside the nominated working hours shall be advised to the local community at least seven (7) days prior to such works being undertaken or other period as agreed to by the Director Community Engagement or as required by Environment Protection Authority (EPA) (where an environment protection licence (EPL) is in effect).</p>
<b>9.</b>	<p><b>Website</b></p> <p>The Proponent shall provide electronic information (or details of where hard copies of this information may be accessed by members of the public) related to the Project, on dedicated pages within its existing website, including:</p> <ul style="list-style-type: none"> <li>(a) a copy of the documents referred to under Condition 1 of this approval</li> <li>(b) a list of environmental management reports that are publicly available</li> </ul>

No	Condition
	<p>(c) 24 hour contact telephone number for information and complaints.</p> <p>All documents must be compliant with the Web Content Accessibility Guidelines 2.0.</p>
<b>10.</b>	<p><b>Complaints management</b></p> <p>The Proponent shall set up a 24 hour construction response line number.</p> <p>Details of all complaints received during construction are to be recorded on a complaints register. A verbal response to phone enquiries on what action is proposed to be undertaken is to be provided to the complainant within two (2) hours during all times construction is being undertaken and within 24 hours during non-construction times (unless the complainant agrees otherwise). A verbal response to written complaints (email/letter) should be provided within 48 hours of receipt of the communication. A detailed written response is to be provided to the complainant within seven (7) calendar days for verbal and/or written complaints.</p> <p>Information on all complaints received during the previous 24 hours shall be forwarded to the environmental management representative (EMR) each working day.</p>
	<b>Environmental management</b>
<b>11.</b>	<p><b>Construction environmental management plan</b></p> <p>The Proponent shall prepare a construction environmental management plan (CEMP) prior to commencement of construction which addresses the following matters, as a minimum:</p> <ul style="list-style-type: none"> <li>(a) traffic and pedestrian management (in consultation with the relevant roads authority)</li> <li>(b) noise and vibration management</li> <li>(c) water and soil management</li> <li>(d) air quality management (including dust suppression)</li> <li>(e) indigenous and non-indigenous heritage management</li> <li>(f) flora and fauna management</li> <li>(g) storage and use of hazardous materials</li> <li>(h) contaminated land management (including acid sulphate soils)</li> <li>(i) weed management</li> <li>(j) waste management</li> <li>(k) sustainability</li> <li>(l) environmental incident reporting and management procedures</li> <li>(m) non-compliance and corrective/preventative action procedures</li> </ul> <p>The CEMP shall:</p> <ul style="list-style-type: none"> <li>i. comply with the Conditions of Approval, conditions of any licences, permits or other approvals issued by government authorities for the Project, all relevant legislation and regulations, and accepted best practice management</li> <li>ii. comply with the relevant requirements of <i>Guideline for Preparation of Environmental Management Plans</i> (Department Infrastructure, Planning and Natural Resources, 2004)</li> <li>iii. include an Environmental Policy.</li> </ul> <p>The Proponent shall:</p> <ul style="list-style-type: none"> <li>1. consult with government agencies and relevant service/utility providers as part of the preparation of the CEMP</li> <li>2. submit a copy of the CEMP to the EMR for review</li> <li>3. submit a copy of the CEMP to the ADEM (or nominated delegate) for approval</li> </ul>

No	Condition
	<p>4. review and update the CEMP at regular intervals, and in response to any actions identified as part of the EMR's audit of the document</p> <p>5. ensure updates to the CEMP are made within 7 days of the completion of the review or receipt of actions identified by any EMR audit of the document, and be submitted to the EMR for approval.</p> <p>The CEMP must be approved by the ADEM prior to the commencement of construction work associated with the Project.</p>
12.	<p><b>Environmental management representative</b></p> <p>Prior to the commencement of construction, the ADEM shall appoint an EMR for the duration of the construction period for the Project.</p> <p>The EMR shall provide advice to the ADEM in relation to the environmental compliance and performance of the Project. The EMR shall have responsibility for:</p> <ul style="list-style-type: none"> <li>(a) considering and advising the Proponent on matters specified in these conditions and compliance with such</li> <li>(b) reviewing and where required by the ADEM, providing advice on the Project's induction and training program for all persons involved in the construction activities and monitoring implementation</li> <li>(c) periodically auditing the Project's environmental activities to evaluate the implementation, effectiveness and level of compliance of on-site construction activities with authority approvals and licences, the CEMP and associated plans and procedures, including carrying out site inspections weekly, or as required by the ADEM</li> <li>(d) reporting weekly to the Proponent, or as required by the ADEM</li> <li>(e) issuing a recommendation to the Proponent for work to stop immediately, if in the view of the EMR circumstances so require. The stop work recommendation may be limited to specific activities if the EMR can easily identify those activities</li> <li>(f) requiring reasonable steps to be taken to avoid or minimise unintended or adverse environmental impacts</li> <li>(g) reviewing corrective and preventative actions to ensure the implementation of recommendations made from the audits and site inspections</li> <li>(h) providing reports to the Proponent on matters relevant to the carrying out of the EMR role as necessary</li> <li>(i) where required by the ADEM, providing advice on the content and implementation of the CEMP and environmental controls map (ECM) in accordance with the conditions</li> <li>(j) reviewing and approving updates to the CEMP.</li> </ul> <p>The EMR shall be available during construction activities to inspect the site(s) and be present on-site as required.</p>
	<p><b>Hours of work</b></p>
13.	<p><b>Standard construction hours</b></p> <p>Construction activities shall be restricted to the hours of 7:00 am to 6:00 pm (Monday to Friday); 8:00 am to 1:00 pm (Saturday) and at no time on Sundays and public holidays except for the following works which are permitted outside these standard hours:</p> <ul style="list-style-type: none"> <li>(a) any works which do not cause noise emissions to be more than 5dBA higher than the rating background level at any nearby residential property and/or other noise sensitive receivers</li> </ul>

No	Condition
	<ul style="list-style-type: none"> <li>(b) out of hours work identified and assessed in the EIA or the approved out of hours work protocol (OOHWP)</li> <li>(c) the delivery of plant, equipment and materials which is required outside these hours as requested by police or other authorities for safety reasons and with suitable notification to the community as agreed by the ADEM</li> <li>(d) emergency work to avoid the loss of lives, property and/or to prevent environmental harm</li> <li>(e) any other work as agreed by the ADEM (or nominated delegate) and considered essential to the Project, or as approved by EPA (where an EPL is in effect).</li> </ul>
14.	<p><b>High noise generating activities</b></p> <p>Rock breaking or hammering, jack hammering, pile driving, vibratory rolling, cutting of pavement, concrete or steel and any other activities which result in impulsive or tonal noise generation shall not be undertaken for more than 3 hours, without a minimum 1 hour respite period unless otherwise agreed to by the ADEM (or nominated delegate), or as approved by EPA (where relevant to the issuing of an EPL), unless inaudible at nearby residential properties and/or other noise sensitive receivers.</p>



No	Condition
	<b>Noise and vibration</b>
15.	<p><b>Construction noise and vibration</b></p> <p>Construction noise and vibration mitigation measures shall be implemented through the CEMP, in accordance with TfNSW's <i>Construction Noise Strategy</i> and the EPA <i>Interim Construction Noise Guideline</i> (July 2009). The mitigation measures shall include, but not necessarily be limited to:</p> <ul style="list-style-type: none"> <li>(a) details of construction activities and an indicative schedule for construction works</li> <li>(b) identification of construction activities that have the potential to generate noise and/or vibration impacts on surrounding land uses, particularly sensitive noise receivers</li> <li>(c) detail what reasonable and feasible actions and measures shall be implemented to minimise noise impacts (including those identified in the environmental impact assessment)</li> <li>(d) procedures for notifying sensitive receivers of construction activities that are likely to affect their noise and vibration amenity, as well as procedures for dealing with and responding to noise complaints</li> <li>(e) an out of hours work protocol (OOHWP) for the assessment, management and approval of works outside the standard construction hours identified in Condition 10 of this approval, including a risk assessment process which deems the out of hours activities to be of low, medium or high environmental risk, is to be developed. All out of hours works are subject to approval by the EMR and/or ADEM (or nominated delegate) or as approved by EPA (where relevant to the issuing of an EPL). The OOHWP should be consistent with the TfNSW <i>Construction Noise Strategy</i></li> <li>(f) a description of how the effectiveness of actions and measures shall be monitored during the proposed works, identification of the frequency of monitoring, the locations at which monitoring shall take place, recording and reporting of monitoring results and if any exceedance is detected, the manner in which any non-compliance shall be rectified.</li> </ul>
16.	<p><b>Vibration criteria</b></p> <p>Vibration (other than from blasting) resulting from construction and received at any structure outside of the Project shall be limited to:</p> <ul style="list-style-type: none"> <li>(a) for structural damage vibration - German Standard DIN 4150:Part 3 – 1999: <i>Structural Vibration in Buildings: Effects on Structures</i></li> <li>(b) for human exposure to vibration – the acceptable vibration values set out in the <i>Environmental Noise Management Assessing Vibration: A Technical Guideline</i> (DEC 2006).</li> </ul> <p>These limits apply unless otherwise approved by the ADEM through the CEMP.</p>
17.	<p><b>Non-tonal reversing beepers</b></p> <p>Non-tonal reversing beepers (or an equivalent mechanism) shall be fitted and used on all construction vehicles and mobile plant regularly used on site (i.e. greater than one day) and for any out of hours work.</p>
18.	<p><b>Operational noise and vibration</b></p> <p>Prior to commencement of construction, an operational noise and vibration management plan (ONVMP) shall be prepared to confirm the final mitigation measures for operational noise and vibration that would be implemented.</p> <p>The ONVMP shall be prepared in consultation with Sydney Trains (where relevant) and other relevant stakeholders. The ONVMP shall:</p> <ul style="list-style-type: none"> <li>(a) consider any changes to the predicted noise and vibration levels identification in the EIA as a result of the detailed design process and any changes to the operations plan</li> <li>(b) examine all reasonable and feasible noise and vibration mitigation measures consistent with the <i>Noise Policy for Industry</i> (EPA, 2017)</li> </ul>

No	Condition
	<p>(c) identify specific physical and other mitigation measures for controlling noise and vibration at the source and at the receiver (if relevant) including location, type and timing of implementation of the proposed operational noise and vibration mitigation measures</p> <p>(d) seek feedback from directly affected receivers on the final mitigation measures proposed in the review.</p> <p>The Proponent shall submit a copy of the ONVMP to the EMR for review and endorsement. The EMR is to be given a minimum period of 7 days to review and endorse the ONVMP. Following receipt of the EMR's endorsement, the ONVMP shall be submitted to the ADEM (or nominated delegate) for approval, at least one month prior to commencement of construction (or such time as is otherwise agreed to by the ADEM).</p> <p>The approved physical mitigation measures are to be installed prior to the commencement of operations, unless otherwise agreed by the ADEM.</p>
19.	<p><b>Operational noise compliance monitoring</b></p> <p>In order to validate the predicted noise levels identified in the ONVMP, monitoring shall be undertaken within three months of commencement of operation. The noise and vibration monitoring shall be undertaken to confirm compliance with the predicted noise and vibration levels, or as modified by the reasonable and feasible review.</p> <p>Should the results of monitoring identify exceedances of the predicted noise and vibration levels, additional reasonable and feasible mitigation measures would be implemented in consultation with the affected property owners.</p>
20.	<p><b>Noise Impact Assessment</b></p> <p>Upon selection of the final location of the spoil management facility at Chullora, and prior to the commencement of construction, a further noise impact assessment (NIA) will be undertaken to reflect the final location and detailed design.</p> <p>The Proponent shall submit a copy of the NIA to the ADEM (or nominated delegate) for approval, at least one month prior to commencement of construction (or such time as is otherwise agreed to by the ADEM).</p> <p>The approved mitigation measures are to be installed prior to the commencement of construction, unless otherwise agreed by the ADEM.</p>
<b>Contamination and hazardous materials</b>	
21.	<p><b>Unidentified contamination (other than asbestos)</b></p> <p>If previously unidentified contamination (excluding asbestos) is discovered during construction, work in the affected area must cease immediately, and an investigation must be undertaken and report prepared to determine the nature, extent and degree of any contamination. The level of reporting must be appropriate for the identified contamination in accordance with relevant EPA guidelines, including the <i>Guidelines for Consultants Reporting on Contaminated Sites</i>.</p> <p>The Proponent shall:</p> <p>(a) submit a copy of any contamination report to the EMR for review. The EMR is to be given a minimum period of 7 days to review and provide any comments to the Proponent in relation to the report</p> <p>(b) submit a copy of the report to the ADEM for consideration upon completion of the EMR review period. The ADEM shall determine whether consultation with the relevant council and/or EPA is required prior to continuation of construction works within the affected area.</p> <p><b>Note:</b> <i>In circumstances where both previously unidentified asbestos contamination and other contamination are discovered within a common area, nothing in these conditions shall prevent the preparation of a single investigation report to satisfy the requirements of both Condition 21 and Condition 22.</i></p>
22.	<p><b>Asbestos management</b></p> <p>If previously unidentified asbestos contamination is discovered during construction, work in the</p>

No	Condition
	<p>affected area must cease immediately, and an investigation must be undertaken and report prepared to determine the nature, extent and degree of the asbestos contamination. The level of reporting must be appropriate for the identified contamination in accordance with relevant EPA and WorkCover guidelines and include the proposed methodology for the remediation of the asbestos contamination. Remediation activities must not take place until receipt of the investigation report.</p> <p>Works may only recommence upon receipt of a validation report from a suitably qualified contamination specialist that the remediation activities have been undertaken in accordance with the investigation report and remediation methodology.</p> <p><b>Note:</b> <i>In circumstances where both previously unidentified asbestos contamination and other contamination are discovered within a common area, nothing in these conditions shall prevent the preparation of a single investigation report to satisfy the requirements of both Condition 21 and Condition 22.</i></p>
23.	<p><b>Storage and use of hazardous materials</b></p> <p>Construction hazard and risk issues associated with the use and storage of hazardous materials shall be addressed through risk management measures, which shall be developed by the construction contractor prior to construction as part of the overall CEMP, in accordance with relevant EPA guidelines, TfNSW <i>Chemical Storage and Spill Response Guideline</i> and Australian and ISO standards. These measures shall include:</p> <ul style="list-style-type: none"> <li>(a) the storage of hazardous materials, and refuelling/maintenance of construction plant and equipment to be undertaken in clearly marked designated areas that are designed to contain spills and leaks</li> <li>(b) spill kits, appropriate for the type and volume of hazardous materials stored or in use, to be readily available and accessible to construction workers. Kits to be kept at hazardous materials storage locations, in site compounds and on specific construction vehicles. Where a spill to a watercourse is identified as a risk, spill kits to be kept in close proximity to potential discharge points in support of preventative controls</li> <li>(c) all hazardous materials spills and leaks to be reported to site managers and actions to be immediately taken to remedy spills and leaks</li> <li>(d) training in the use of spill kits to be given to all personnel involved in the storage, distribution or use of hazardous materials.</li> </ul>
	<b>Erosion and sediment control</b>
24.	<p><b>Erosion and sediment control</b></p> <p>Soil and water management measures shall be prepared as part of the CEMP for the mitigation of water quality impacts during construction of the Project. The management measures shall be prepared in accordance with <i>Managing Urban Stormwater; Soils and Construction 4<sup>th</sup> Edition</i> (Landcom, 2004).</p>
	<b>Heritage management</b>
25.	<p><b>Indigenous and non-Indigenous heritage</b></p> <p>If previously unidentified Indigenous or non-Indigenous heritage/archaeological items are uncovered during construction works, all works in the vicinity of the find shall cease and appropriate advice shall be sought from a suitably qualified heritage consultant (and in consultation with the OEH Heritage Branch where appropriate). Works in the vicinity of the find shall not re-commence until clearance has been received from the heritage consultant.</p> <p><a href="#">Unexpected Heritage Finds Guideline - 3TP-SD-115</a></p>
	<b>Air quality</b>
26.	<p><b>Operational air quality management plan</b></p> <p>As part of the detailed design process, the Proponent shall undertake a review of operational air</p>

No	Condition
	<p>quality management for the Project and prepare an operational air quality management plan. The plan shall include:</p> <ul style="list-style-type: none"> <li>(a) air flow modelling to confirm proposed air quality goals, and compliance with applicable air quality parameters</li> <li>(b) identification of reasonable and feasible mitigation measures to ensure compliance with applicable air quality parameters.</li> </ul> <p>The plan is to be submitted to the ADEM for approval, at least 14 days prior to commencement of permanent built works (or such time as otherwise agreed to by the ADEM).</p>
<b>27.</b>	<p><b>Operational air quality monitoring</b></p> <p>Monitoring of predicted air quality levels shall be undertaken within 12 months of commencement of operation of the Project. The air quality monitoring shall assess compliance with the air quality goals identified in the operational air quality management plan.</p> <p>Where exceedance of the predicted operational air quality levels are identified, the Proponent shall investigate additional measures to mitigate the exceedance to comply with the operational air quality goals and implement these measures where reasonable and feasible to the satisfaction of the ADEM.</p>
<b>28.</b>	<p><b>Access Roads</b></p> <p>Access roads used to truck the spoil from the modal transfer facilities shall be appropriately sealed to avoid dust emissions.</p>
<b>29.</b>	<p><b>Dust Management</b></p> <p>Detailed design must consider the following requirements and where feasible, must implement these requirements. Where items cannot be implemented, justification and options considered must be documented and endorsed by the Director, Planning and Environment.</p> <ul style="list-style-type: none"> <li>• design loading of rail cars and trucks from overhead bins using a telescoping chute</li> <li>• design to avoid the use of front-end loaders (wheeled loaders)</li> <li>• paving the unsealed portion of the road at Port Kembla</li> <li>• enclosing material transfer at both intermodal points.</li> </ul> <p>Train wagons will be covered during the transport of spoil, unless otherwise agreed by the ADEM. If it is proposed to not cover wagons, detailed evidence will need to be provided to demonstrate why it is not feasible to cover wagons and the approval of the ADEM is required.</p>
<b>30.</b>	<p><b>Stockpiles</b></p> <p>During detailed design, consultation with the EPA and community groups will be undertaken to determine appropriate measures to control the size and height of stockpiles, the duration for which a stockpile can remain and measures to minimise dust emissions from these stockpiles. Material will not be transported to the CRM site without a final destination having been agreed prior to transportation.</p>
	<b>Traffic and Access</b>
<b>31.</b>	<p><b>Traffic Management Plan</b></p> <p>The Proponent shall prepare a construction Traffic Management Plan (TMP) as part of the CEMP which addresses, as a minimum, the following:</p> <ul style="list-style-type: none"> <li>(a) ensuring adequate road signage at construction work sites to inform motorists and pedestrians of the work site ahead to ensure that the risk of road accidents and disruption to surrounding land uses is minimised</li> <li>(b) maximising safety and accessibility for pedestrians and cyclists</li> <li>(c) ensuring adequate sight lines to allow for safe entry and exit from the site</li> <li>(d) ensuring access to railway stations, businesses, entertainment premises and residential properties (unless affected property owners have been consulted and appropriate alternative</li> </ul>

No	Condition
	<p>arrangements made)</p> <p>(e) managing impacts and changes to on and off street parking and requirements for any temporary replacement provision</p> <p>(f) parking locations for construction workers away from stations and busy residential areas and details of how this will be monitored for compliance</p> <p>(g) routes to be used by heavy construction-related vehicles to minimise impacts on sensitive land uses and businesses</p> <p>(h) details for relocating kiss-and-ride, taxi ranks and rail replacement bus stops if required, including appropriate signage to direct patrons, in consultation with the relevant bus operator. Particular provisions should also be considered for the accessibility impaired.</p> <p>(i) measures to manage traffic flows around the area affected by the Project, including as required regulatory and direction signposting, line marking and variable message signs and all other traffic control devices necessary for the implementation of the TMP.</p> <p>The Proponent shall consult with the relevant roads authority during preparation of the TMP, as required. The performance of all Project traffic arrangements must be monitored during construction.</p>
32.	<p><b>Road condition reports</b></p> <p>Prior to construction commencement, the Proponent shall prepare road condition surveys and reports on the condition of roads and footpaths affected by construction. Any damage resulting from the construction of the Project, aside from that resulting from normal wear and tear, shall be repaired at the Proponent's expense.</p>
33.	<p><b>Road safety audit</b></p> <p>A Road Safety Audit would be undertaken as part of the detailed design process. The Road Safety Audit would include specific assessment of:</p> <p>(a) sight distances for vehicles at key intersections and/or crossings and mitigation measures proposed</p> <p>(b) assessment of the at key intersections and/or crossings and mitigation measures proposed</p> <p>The Road Safety Audit is to be submitted to and accepted by TfNSW.</p>



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## Determination

### SPOIL MANAGEMENT PROJECT

### APPROVAL

I, John Karaboulis, as delegate of the Secretary, Transport for NSW:

1. Have examined and considered the Proposed Activity in the Spoil Management Project Review of Environmental Factors (August 2017) and Spoil Management Project Determination Report (December 2017) in accordance with the provisions of section 111 of the *Environmental Planning and Assessment Act 1979*.
2. Determine on behalf of Transport for NSW (the Proponent) that the Proposed Activity may be carried out in accordance with the Conditions of Approval in this Determination Report, consistent with the proposal described in the Spoil Management Project Review of Environmental Factors as amended by this Determination Report.



John Karaboulis  
Acting Deputy Secretary, Infrastructure and Services  
Transport for NSW

Date: 18-12-17

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# Memorandum

## Infrastructure & Services

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<b>To</b>	John Karaboulis	<b>Document Ref:</b>	3859858_7.doc
<b>From</b>	Louise Sureda		
<b>Date</b>	14 December 2017		
<b>Copied to</b>	Trish McClure, Anna Bradley, Nicola Weimann, Tamasin Soehardi, Nigel Cocks		
<b>Subject</b>	<b>Recommendation to Determine Spoil Management Project</b>		

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**Issue:**

To determine the Spoil Management Project (the Proposed Activity), as assessed in the Review of Environmental Factors (REF) prepared by Cardno (August 2017) and the Determination Report prepared by Transport for NSW (December 2017).

**Background:**

Transport for NSW is the proponent for the Proposed Activity. An environmental impact assessment has been carried out for the Project in accordance with the provisions of the *Environmental Planning and Assessment Act 1979* and the *Environmental Planning and Assessment Regulation 2000*.

Internal approval to the final reports, the mitigation measures and conditions has been obtained from the relevant directorates.

**Community feedback:**

The REF was placed on public display from 14 to 28 August 2017 with 23 submissions received by Transport for NSW, including two from local Councils and one from the EPA. Letters were delivered to properties within a one kilometre radius of the proposed location.

The key issues raised during the public display period primarily related to noise, air quality and traffic impacts. Measures to avoid these impacts are included as mitigation measures within the REF.

**Design changes:**

There have been no design changes to the proposal subsequent to the public display of the REF.

**Current Position:**

The Proposed Activity is ready to be approved, subject to mitigation measures contained in the REF (August 2017), the Determination Report (December 2017) and the Conditions of Approval at Appendix 2 of the Determination Report.

**Recommendation:**

It is recommended that Transport for NSW determine to approve the Proposed Activity in accordance with the provisions of the *Environmental Planning and Assessment Act 1979* by signing the Approval in the attached Determination Report.



Louise Sureda,

Director, Planning and Environment

Integrated Planning

Transport for NSW

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# Memorandum

## Infrastructure & Services

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<b>To</b>	Trish McClure	<b>Document Ref:</b>	3859858_7.doc
<b>From</b>	Louise Sureda		
<b>Date</b>	14 December 2017		
<b>Copied to</b>	Anna Bradley, Nicola Weimann		
<b>Subject</b>	<b>Spoil Management Project</b>		

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**Issue:**

Implementation of the Spoil Management Project should a 'decision to proceed' be made.

**Background:**

The Spoil Management Project is a proposal to transport spoil from the M4 WestConnex tunneling project to the Illawarra via freight rail. The spoil would be transported to the Sydney Modal Transport Facility within the existing train yards at Chullora via truck. From here it would be loaded onto a disused coal wagon train and transported to the Commonwealth Rolling Mills Bluescope Steel site in Port Kembla. Spoil would be unloaded from the trains and placed into a temporary surge pile for loading onto trucks and transported to agreed locations where clean fill is needed for existing projects. Spoil would only be transported where a final destination has been agreed prior.

The Spoil Management Project has been assessed in a REF which was placed on public display for a period of two weeks. During this time, submissions from the community were received which were then responded to in the Determination Report. The community submissions reflected a number of concerns including dust emissions, management of surge piles and operational hours.

As the Spoil Management Project is being developed for the purpose of the M4 WestConnex project, it is permissible under Clause 94(1) of the State Environmental Planning Policy (Infrastructure) 2007. This clause allows development for the purpose of a road or road infrastructure facilities to be carried out by or on behalf of a public authority without consent (which includes development for the purposes of the extraction of extractive materials and stockpiling of those materials, if the extraction and stockpiling are ancillary to road construction, and if the development is in connection with a road or road infrastructure facilities). The proposed development of both modal transfer facilities and the associated operations are ancillary to road infrastructure facilities, with development consent not required. Accordingly, the environmental impacts of the Proposal have been assessed under the provisions of Part 5 of the EP&A Act.

If the proposed spoil pathway were to be used in conjunction with a different project, the planning approval would need to be modified to incorporate the alternative project, or a separate planning approval would need to be obtained. For projects currently in their planning approval stage, incorporation of the use of the Spoil Management Pathway should be included within the overall project approval, particularly for rail-related projects.

Following the decision to proceed with this project, and during the detailed design stage, a range of conditions would need to be satisfied. In particular, the project team would need to consider loading and unloading changes to avoid undue impacts, undertake a new noise assessment based on the final design and in accordance with new guidelines, and re-engage with key stakeholders and community representatives, particularly if a significant time period has elapsed. The community and other stakeholders should be consulted during detailed design of the project and informed at least one month prior to any works commencing, in accordance with Condition of Approval 8.

**Recommendation:**

Prior to activities commencing, a memo shall be provided to the Director, Planning and Environment to demonstrate how the relevant Conditions of Approval have been considered and complied with during detailed to allow activities to commence. The memo is to be endorsed by the Director, Planning and Environment prior to activities proceeding.



Louise Sureda  
**Director, Planning & Environment**  
**Integrated Planning**  
**Transport for NSW**

Date:

18.12.17.