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Jane Street and Mulgoa Road Infrastructure Upgrade Submissions report

June 2017



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Roads and Maritime Services

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June 2017

Prepared by Arup and Roads and Maritime Services


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Executive summary

Introduction

Roads and Maritime Services proposes to upgrade a section of the Mulgoa Road / Castlereagh Road Corridor at the Jane Street / Mulgoa Road / Castlereagh Road and at the High Street / Mulgoa Road intersections in Penrith. This is located within the western Sydney region of the Roads and Maritime network and the Local Government Area (LGA) of Penrith.

The proposed Jane Street and Mulgoa Road Infrastructure Upgrade (the proposal) is driven by existing road congestion and expected population and employment growth in the region, including the North West Priority Growth Area and the Western Sydney Employment Area. Roads and Maritime forecasts that if the existing infrastructure is not upgraded, there could be times within the next five years when average traffic speeds are less than half of the current speed limit for roads in the area.

The proposal includes:

- widening Mulgoa Road / Castlereagh Road between Union Road and a point south of Museum Drive
- upgrading and widening the Great Western Highway / Mulgoa Road / High Street intersection
- upgrading the Jane Street / Mulgoa Road / Castlereagh Road intersection
- replacement of the existing railway bridge over Castlereagh Road
- provision of a separated shared pedestrian and cycle path along the eastern side of Mulgoa Road / Castlereagh Road
- tree planting and landscaping to match the vision for the whole Mulgoa Road corridor.

The Australian and NSW governments have jointly committed \$70 million to fund the proposal. Subject to planning approval, construction would be completed within five years.

Response to issues

A total of 22 submissions were received in response to the display of the Review of Environmental Factors. Five of these submissions were received from government agencies and other representative bodies, including Penrith City Council, Sydney Trains and the Museum of Fire. 17 of the submissions were received from individuals.

Each submission has been assessed individually to understand the issues being raised. Every issue raised has been collated and corresponding responses have been provided.

Most of the submissions supported the proposal and none opposed it. A high number of community comments were about the concept design and recommended changes or potential improvements. Three submissions did not offer a position on the proposal.

The main comments provided by the community and responses are listed below:

- **Issues:** Ensure that adequate options have been investigated for this project.
Response: The option to extend Jane Street was explored as part of an options analysis carried out during the project's strategic planning phase. The preferred option, which forms the basis of the proposal, was selected as it performed the best against a range of criteria (see Section 2.4 of the Review of Environmental Factors). The preferred option will deliver an appropriate benefit-cost-ratio within the project's budget.

- Issue:** Ensure that effective controls are implemented during construction to reduce noise and vibration impacts during construction.

Response: The construction noise assessment completed for the project indicated that some noise impacts are expected for work in close proximity to some stakeholders. Roads and Maritime will minimise the impacts of construction noise on businesses predicted to be impacted by the project, in accordance with the Construction Environmental Management Plan (CEMP). At the end of critical construction activities (bridge and intersection work), pavement work will need to occur outside standard construction hours. As per the CEMP, businesses will be notified before this work in an attempt to minimise disruptions. Further, all “feasible and reasonable” noise mitigation measures will be implemented to reduce construction noise, as required by the Interim Construction Noise Guideline (ICNG).
- Issue:** That Property Acquisition be resolved before any further Detailed Design work, using the NSW Government’s latest property acquisition requirements.

Response: Discussion between Roads and Maritime and Penrith City Council will continue alongside development of the detailed design. A separate dialogue is underway with Penrith City Council’s property team to determine the most appropriate mechanism and timing to deliver the necessary land acquisition presented in Section 3.6 of the Review of Environmental Factors.
- Issue:** That this project future proofs this section of the road network for all users including: motorists, cyclists, public transport users and pedestrians.

Response: The proposal takes into consideration all future transport modes likely to be available within the modelling period and includes provision of: cycle, pedestrian, bus and road infrastructure. Bus priority measures identified at the two intersections allow for future expansion of the road network if there is a shift towards public transport. The traffic modelling for the future shows that the proposal will ease the congestion currently being experienced at the Jane Street and High Street intersections along Castlereagh and Mulgoa roads. The upgrade would provide improved performance of the intersection for at least 15 years after delivery.
- Issue:** That this project considers the visual amenity of the area and appropriate urban design outcomes.

Response: The proposal considers the urban design treatment along the corridor and the restoration of land disturbed as part of the work.

The issues raised during the public display of the Review of Environmental Factors have been adequately summarised and responded to. Potential environmental impacts have now been assessed with appropriate safeguards and management measures identified to avoid and mitigate impacts. The implementation of the safeguards and management measures identified in the submissions report would appropriately manage and mitigate the potential impacts.

Environmental management

The Jane Street and Mulgoa Road Infrastructure Upgrade Review of Environmental Factors identified the framework for environmental management, including safeguards and management measures that would be adopted to avoid or reduce environmental impacts. After considering the matters raised in the submissions, no changes to the safeguards and management measures identified in the Review of Environmental Factors are proposed. These measures are in Table 3-1 of this report.

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1 Introduction and background

1.1 The proposal

The proposed Jane Street and Mulgoa Road Infrastructure Upgrade (the proposal) is driven by existing road congestion and expected population and employment growth in the region, including the North West Priority Growth Area and the Western Sydney Employment Area.

Roads and Maritime forecasts that if the existing infrastructure is not upgraded there could be times within the next five years where average traffic speeds are less than half of the current speed limit for roads within the proposal area.

The proposal includes:

- widening Mulgoa Road / Castlereagh Road between Union Road and a point south of Museum Drive
- upgrading and widening of the Great Western Highway / Mulgoa Road / High Street intersection
- upgrade of the Jane Street / Mulgoa Road / Castlereagh Road intersection
- replacement of the existing railway bridge over Castlereagh Road
- provision of a separated shared pedestrian and cycle pathway along the eastern side of Mulgoa Road / Castlereagh Road
- tree planting and landscaping to match the vision for the whole Mulgoa Road corridor.

The Australian and NSW governments have jointly committed \$70 million to fund the proposal. Subject to planning approval, construction would be staged for completion within five years.

A more detailed description of the Jane Street and Mulgoa Road Infrastructure Upgrade is found in the Jane Street and Mulgoa Road Infrastructure Upgrade Review of Environment Factors prepared by Roads and Maritime in October 2016.

The location of the proposal is shown in Figure 1-1 and the key features of the proposal are shown in Figure 1-2.

Figure 1-1: Location of the proposal

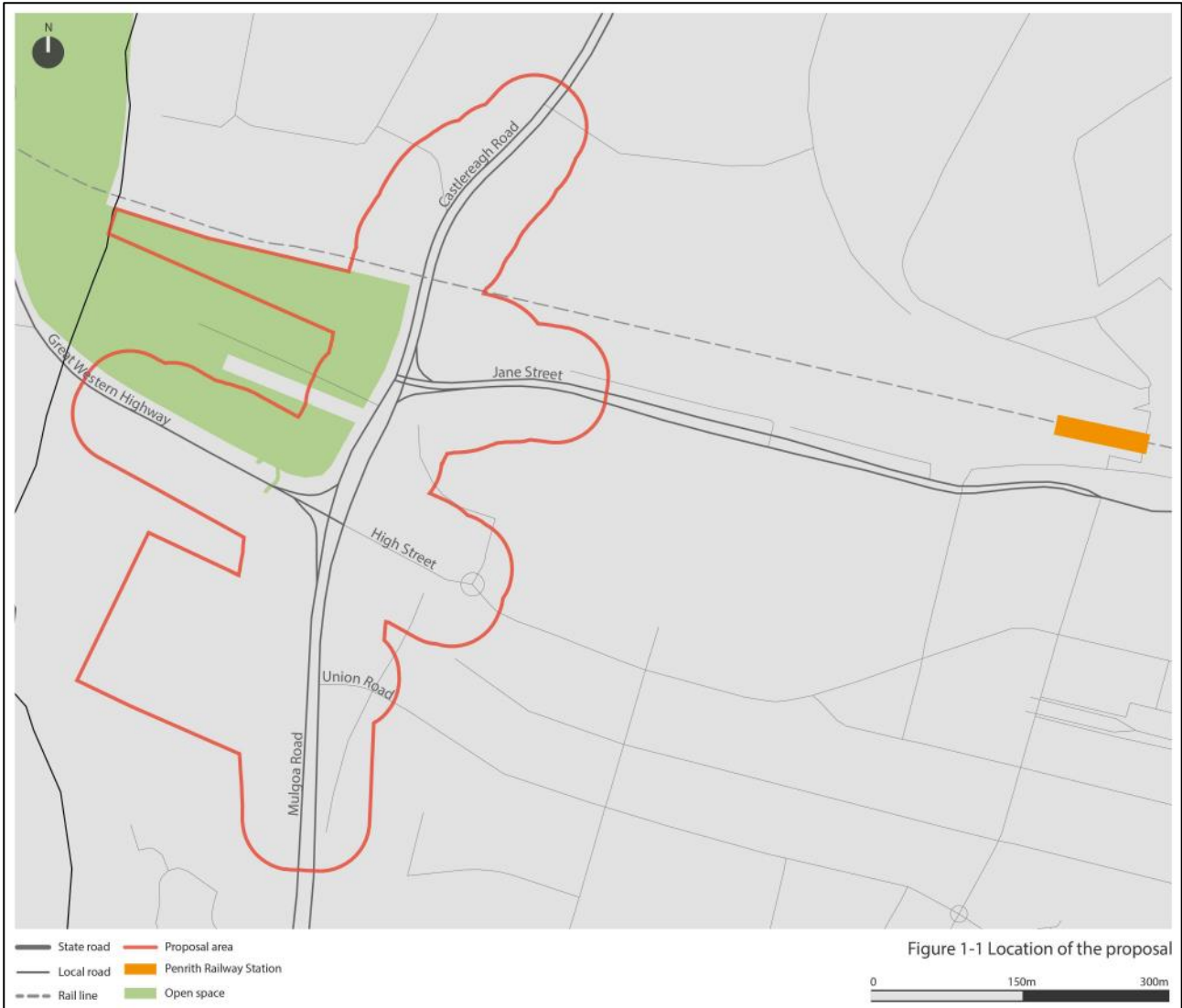


Figure 1-2: Key features of the proposal



1.2 Review of Environmental Factors display

Roads and Maritime prepared a Review of Environmental Factors to assess the environmental impacts of the proposed work. The Review of Environmental Factors was publically displayed for 29 days between 18 November and 16 December, 2016 at Penrith City Library, St Marys Library and St Clair Library, as detailed in Table 1-1. The Review of Environmental Factors was also placed on Roads and Maritime's project website and made available for download. The display locations and website link were advertised in the Penrith Press, Western Sydney Weekender and St Marys Mt Druitt Star local newspapers.

In addition to the above public display, there were a number of events and activities conducted during the consultation period to give the community a chance to learn more about the project, meet the project team and have their say (refer to Table 1-2).

Community members were encouraged to provide feedback and make submissions at the information sessions or via mail, email or phone contact with the project team. The community were able to contact Roads and Maritime and leave comments and submissions by:

Email janestreetandmulgoaroad@rms.nsw.gov.au
Phone 1800 733 084
Mail Jane Street and Mulgoa Road Upgrade
PO Box 973
Parramatta CBD NSW 2124

Table 1-1: Display locations

Location	Address
Penrith City Library	601 High Street, Penrith
St Marys Library	207 - 209 Queen Street, St Marys
St Clair Library	Shop 12, St Clair Shopping Centre, Bennett Road and Endeavour Avenue, St Clair

Table 1-2: Consultation activities during the public display period

Tool / Activity	Reach	Details
Community update newsletter (Appendix A)	13,500	<p>A community update newsletter was produced including key features of the proposal and further details on the community information sessions and how to provide feedback.</p> <p>The community update newsletters were letterbox dropped to about 13,500 properties – refer to Appendix B for a map of the distribution area. The newsletter was also available on the Roads and Maritime website and at community information sessions.</p>

Tool / Activity	Reach	Details
Doorknocks (Appendix B)	61	At the beginning of the consultation period, 61 properties were door-knocked. The purpose was to notify potentially impacted owners and promote the coming community information sessions. A community update newsletter was left with each property owner and where the property owner was not home, a 'sorry we missed you' flyer was left (see below for details).
Sorry we missed you - flyer (Appendix C)	51	Where the property owner was door-knocked but not home, a 'sorry we missed you' flyer was left informing the property owner/occupant that someone from the project team had tried to make contact. Fifty one properties door-knocked were left a 'sorry we missed you' flyer as we were unable to speak with anyone at the property.
Media release (Appendix D)	1	<p>A media release was distributed to all major Sydney metropolitan and western Sydney publications on 18 November 2016. It was titled <i>Community feedback sought for Jane Street and Mulgoa Road infrastructure upgrade</i> and encouraged local community members and stakeholders to engage in the consultation process.</p> <p>This media release was covered in the Penrith Press on 24 November.</p>
Newspaper advertisement (Appendix E)	4	<p>Newspaper advertisements appeared in local papers between 18 and 24 November 2016 to raise awareness of the consultation and information sessions.</p> <p>Publications included:</p> <ul style="list-style-type: none"> • Western Sydney Weekender (18 and 25 November 2016) • St Marys Mt Druitt Star (22 November 2016) • Penrith Press (24 November 2016).
Email notifications (Appendix F)	111	Direct emails were sent from Roads and Maritime on Monday 21 November 2016 to 111 stakeholders (community members and groups), local Members of Parliament (MPs) and other government stakeholders to announce the Review of Environmental Factors and raise awareness of the consultation and information sessions.
Webpage	644 page views	The project webpage was updated on 18 November, 2016 with project information including the community update newsletter, Review of Environmental Factors and how to submit feedback. A total of 644 page views were recorded during the consultation period. www.rms.nsw.gov.au/JaneStreetMulgoaRoad .
Animation	1	An animated video was developed to provide an overview of the Jane Street and Mulgoa Road Infrastructure Upgrade proposal. It was available on the Roads and Maritime website and shown at the community information sessions.

Tool / Activity	Reach	Details
Community information sessions	3	<p>Three community consultation sessions were held with 13 people attending:</p> <ul style="list-style-type: none"> Thursday 24 November 2016, 5-8pm Penrith Senior Citizens Centre 86 Station Street, Penrith Saturday 26 November 2016, 10am-1pm Cambridge Park Hall 97 Oxford Street, Cambridge Park Saturday 3 December 2016, 2-4pm Penrith City Library Theatre 601 High Street, Penrith.
Stakeholder briefings	2	<p>The project team held two government stakeholder briefings:</p> <ul style="list-style-type: none"> Penrith City Council on Monday 31 October 2016 The Hon Stuart Ayres, Member for Penrith on Friday 11 November 2016.

1.3 Purpose of the report

This submissions report relates to the REF prepared for the Jane Street and Mulgoa Road Infrastructure Upgrade and should be read in conjunction with that document.

During the display period, submissions relating to the proposal and the Review Of Environmental Factors were received by Roads and Maritime. Chapter 2 of this submissions report summarises the issues raised and provides responses to each issue.

No changes to the proposal are proposed that would require the preparation of a preferred infrastructure report, and no revisions have been made to the environmental assessment or management measures as described in the Review of Environmental Factors.

2 Response to issues

Roads and Maritime received 22 submissions until 16 December 2016. Table 2-1 lists the respondents and each respondent's allocated submission number. The table also indicates where the issues from each submission have been addressed in this report.

Table 2-1: Respondents

Respondent	Submission No.	Section number where issues are addressed
Penrith City Council	1	2.3, 2.5
Individual	2	2.2, 2.3, 2.4, 2.5
Individual	3	2.3
Individual	4	2.3
Individual	5	2.3
Individual	6	2.3
Individual	7	2.2
Individual	8	2.2
Individual	9	2.5
Individual	10	2.2
Museum of Fire	11	2.4
Individual	12	2.3
Individual	13	2.3
Penrith City Council	14	N/A (no issues/comments made)
Individual	15	2.3
Individual	16	2.3
Individual	17	2.5
Sydney Trains	18	N/A (no issues/comments made)
Individual	19	2.3
Individual	20	2.3
Urban Apartments	21	N/A (no issues/comments made)
Individual	22	2.2, 2.3, 2.5

2.1 Overview of issues raised

A total of 22 submissions were received in response to the display of the Review of Environmental Factors. This included submissions from two government agencies (Penrith City Council and Sydney Trains) and 19 from the community.

Each submission has been assessed individually to understand the issues being raised. The issues raised in each submission have been collated, and corresponding responses have been provided. Where similar issues have been raised in different submissions, only one response has been provided. This chapter outlines the issues raised and Roads and Maritime's response to these issues.

Most of the submissions supported the proposal and no submissions objected to it. A high percentage of community comments were about the concept design and recommendations for changes or potential improvements. Three submissions did not offer a position on the proposal.

Penrith City Council was heavily involved in the development of the proposal and it also provided comments on the Review of Environmental Factors. Penrith City Council requested that Roads and Maritime continue to provide appropriate community and stakeholder consultation during the land acquisition process, and also during the construction phase of the project when work will occur close to sensitive receivers. Other comments from council included assurance that the current stormwater situation is improved upon and that appropriate treatment options are available. To address the current issue of queuing across intersections, a recommendation was made to include signal coordination as part of the upgrade. Penrith City Council also requested that equal access be provided to bike riders through appropriate signage and line markings, and made comments on visual amenity with an interest to use natural flora in landscaping works where possible.

The community questioned how successful the proposal would be in reducing the current traffic within the project boundary, whether there were potentially more effective options that could be selected and commented on the current issue of queuing at intersections.

2.2 Needs and options considered

Submission number(s)

2, 7, 8, 10, 22

Issue description

Members of the local community made comments on the option selected for concept design. In particular the following concerns were raised:

- Large capital expenditure of project for perhaps small improvement
- Concept design not addressing the issue of arterial roads merging into one lane on Victoria Bridge causing traffic congestion
- Suggestions included:
 - continue Jane St through to the Nepean District Tennis Association onto Victoria Bridge
 - upgrade Mulgoa Road to have three lanes, less traffic lights and recessed bus stops
 - erect an elevated road at the Mulgoa Road intersection to allow continuous movement avoiding intersections and traffic lights.

Response

Detailed in Section 2.4 of the Review of Environmental Factors are the objectives and measures of the project. These include: traffic congestion, road network, road planning and sustainability. Thirteen design options were considered for the upgrade where price formed an element of the selection criteria for the chosen option. Further, a preliminary business case was completed prior to the concept design, where the benefit-cost-ratio identified that the benefits from the project outweigh the costs of construction.

The option to extend Jane Street was explored as part of an options analysis carried out during the strategic planning phase of the project. The preferred option, which forms the basis of the proposal, was selected as it performed the best against a range of criteria (see Section 2.4 of the Review of Environmental Factors). The preferred option will deliver an appropriate benefit-cost-ratio and also meet the budget constraints for the project.

Upgrading Mulgoa Road to have three lanes is outside the outlined scope for this project. However, the Mulgoa Road / Castlereagh upgrade project comprises the upgrade and widening of Mulgoa Road / Castlereagh between Glenmore Parkway, Glenmore Park and Andrews Road, Penrith. This upgrade is consistent with widening in the Mulgoa Road project. Further information about this project can be found on the Roads and Maritime website:
<http://www.rms.nsw.gov.au/projects/sydney-west/mulgoa-rd-castlereagh-rd/>.

The upgrade of Victoria Bridge is also outside the outlined scope for this project. Appendix D of the Review of Environmental Factors shows the results of traffic modelling comparing a base case ('do nothing' scenario) and the proposed upgrade within the project boundary. The modelling shows the project would improve traffic capacity and performance at the Great Western Highway / Mulgoa Road / High Street and Jane Street / Castlereagh Road intersections to a Level of Service D or better to the year 2036, and therefore provide adequate capacity and operational efficiency in the longer term. The preferred option, which forms the basis of the proposal, was selected as it performed the best against a range of criteria (see Section 2.4 of the Review of Environmental Factors) which delivered an appropriate benefit-cost-ratio.

Grade separation was considered as part of the options analysis at the strategic design stage. All design options considered are listed in Section 2.4 of the Review of Environmental Factors. The preferred option, which forms the basis of the proposal, was selected as it performed the best against a range of criteria. Appendix D of the Review of Environmental Factors shows the results of traffic modelling for a 20-year period comparing a base case ('do nothing' scenario) and the proposed upgrade.

2.3 Description of the proposal

2.3.1 Construction

Submission number(s)

1

Issue description

Penrith City Council has identified the following items to be considered by Roads and Maritime as part of the project:

- Ensure that the detailed design activities identified as being required in the Review of Environmental Factors are undertaken with subsequent community consultation to ensure that construction noise and vibration impacts upon nearby receivers are minimised and scheduled for the shortest possible duration
- An assessment of impacts at office, commercial and industrial premises be carried out to understand what mitigation strategies would need to be implemented for the different construction activities in order to reduce potential noise impacts
- Ensure that comprehensive and detailed contaminated land investigation, remediation and validation procedures and protocols are implemented as part of the Contaminated Land Management Plan and Asbestos Management Plan and that consultation with the NSW Environment Protection Authority (EPA) occur, as stated in the Review of Environmental Factors, should land contamination be identified. Also ensure that a comprehensive Waste Management Plan is prepared and implemented to ensure that all waste arising from the construction of the project, including contaminated material and asbestos, is collected, transported and disposed of lawfully at a lawful waste management facility.

Response

The construction noise assessment completed for the project indicated that some noise impacts are expected for works in close proximity to sensitive receptors. Roads and Maritime will minimise the impacts of construction noise on businesses predicted to be impacted by the project, in accordance with the Construction Environmental Management Plan (CEMP). At the completion of critical construction activities (bridge and intersection works), pavement works will be required to occur outside standard hours of construction. As per the CEMP, notification will be given to businesses before this period to assist mitigation of disruption. Further, as required by the Interim Construction Noise Guideline (ICNG), all “feasible and reasonable” noise mitigation measures will be implemented to reduce noise levels from these activities.

A comprehensive Waste Management Plan (Section 6.13 of Review of Environmental Factors) will be prepared and implemented as part of the CEMP for the project.

2.3.2 Design

Submission number(s)

1, 2, 3, 4, 5, 6, 12, 13, 16, 19, 20, 22

Issue description

Penrith City Council has made comments and identified the following items to be considered by Roads and Maritime as part of the project:

- Excessive concrete median areas can be used for right turn storage, namely the right turn from Mulgoa Road to High Street and High Street to Castlereagh Road. It is important that signal coordination is set up to meet peak hour demand and avoid unnecessary queuing
- Ensure lanes are labelled as Bus Lanes, not Bus Only Lanes, to allow for on-road cyclists
- Penrith City Council has been working with TfNSW and Roads and Maritime to design and construct a shared-use path in Jane Street, between Castlereagh Road and Penrith Railway Station.

Members of the local community made the following comments and suggested the following changes to the concept design:

- Reinstall red-light camera at High St/Mulgoa Rd/Jane St
- Reprogram light sequencing to ensure traffic lights are synchronised
- Monitor queuing across intersections
- Address congestion north bound caused by traffic lights at Museum Drive, Peachtree Drive/Thornton Drive and Coreen Avenue roundabout
- Right turn lanes from Mulgoa Road into High Street West (heading to Emu Plains) will not ease congestion as blockages will still occur when Jane Street traffic enters across the intersection
- Deletion of the right turn lanes in favour of a left hand loop from Mulgoa Road into Union Road then left into John tipping Grove Extension and returning to High Street to head west to the Victoria Bridge
- Traffic light poles should all have Audio Tactile functions and be positioned close to the access ramps to allow people to use either the tactile or audio function effectively and to ensure people can remain oriented and safely aligned
- South-bound traffic caused by cars queuing at the intersection from both the Jane Street to Emu Plains flow blocks south bound flow of Castlereagh Road and vice versa. Introduce signs that state not to queue across the road
- Footpaths in the vicinity of the project are not suitable for a large mobility scooter
- Frequent cases of cars turning right into High Street blocking a through lane of Mulgoa Road at Jane Street
- Erect a new road bridge to relieve Victoria Bridge
- Upgrade Mulgoa Road/Castlereagh Corridor
- Increase in traffic over Victoria Bridge will make it even harder to come out from Ladbury Avenue and Nepean Avenue during peak times
- Concept design not removing cars from the Castlereagh Road/High Street intersection
- Query as to whether a new road at the back of the tennis courts could be used
- Cut across from Old Bathurst Road with a new bridge
- Build a 250 metre long tunnel under the Jane Street and High Street intersections instead of the current concept design.

Response

The project is being developed in accordance with all necessary design standards to provide equal accessibility for all users. Further, the concrete medians presented in the concept design have been designed in accordance with the applicable design standards. However, with regard to the constraints of storage capacity, the extent of median will be further considered during the detailed design phase.

Lanes will be labelled in accordance with design standards to ensure that both buses and on-road cyclists have access to the road. Line marking across the intersections will be investigated in order to reduce the current queuing issues. Additionally, signage at the intersections and the phasing of traffic lights will also be considered as part of detailed design to resolve this current queuing issue.

The Intelligent Transport System Strategy is currently being developed for consideration in the final design in place of the existing red-light cameras. The signalised pedestrian crossings for the intersections do not allow for turning left on a red arrow. However Appendix D of the Review of Environmental Factors shows the results of traffic modelling comparing a base case ('do nothing' scenario) and the proposed upgrade. The modelling shows the project would provide an improvement to the Level of Service and queue lengths at the Mulgoa Road/ Great Western Highway intersection.

Roads and Maritime confirms that the left hand loop from Mulgoa Road into Union Road option is currently available to road users. Further, it is acknowledged that the project may result in increased traffic congestion and further delays for motorists at the Ladbury Avenue and Nepean Avenue intersections as traffic volumes increase over time.

The following community suggestions are outside the outlined scope of works for this project. However where applicable, the comments will be presented to Penrith City Council and the relevant department within Roads and Maritime for further consideration.

- The design and construction of a shared-use path in Jane Street, between Castlereagh Road and Penrith Railway Station
- Upgrade of the Mulgoa Road/Castlereagh Corridor. Note that this project is currently in the planning phase as a separate project
- New road-bridge or upgrade of existing Victoria Bridge
- Tunnel under the Jane Street and High Street intersections.

2.3.3 Property Acquisition

Submission number(s)

1, 15

Issue description

Penrith City Council has made comments and identified the following items to be considered by Roads and Maritime as part of the project:

- Specific description of the land required for acquisition to be resolved prior to any further detailed design works and additional consultation be undertaken regarding compensation under the Just Terms Compensation Act
- Commence a separate dialogue with Penrith City Council's Property team to determine the most appropriate mechanism and timing to deliver the necessary land acquisition
- Provide the exact location of land acquisition in order for Penrith City Council to understand the impact of the proposal on this land. This includes detailed maps which accurately reflect the location of the proposed acquisitions and the number of car spaces proposed to be removed
- Land proposed to be acquired is expected to be rezoned to SP2. Roads and Maritime to consult with Penrith City Council about amending the Penrith LEP 2010 in order to facilitate rezoning
- Roads and Maritime to undertake further consultation with the owners of the Sinclair Motor Site on the proposed land acquisitions over their land
- Finalisation of the Carpenter site access point be incorporated into the detailed design of the Roads and Maritime project
- Potential for concept design to impact upon assets emanating from Endeavour Energy's Penrith Transmission/Zone Substation
- Consider providing an alternative replacement entry statement to the area.

Response

Discussion between Roads and Maritime and Penrith City Council will continue in conjunction with the development of the detailed design. A separate dialogue has begun with Penrith City Council's property team to determine the most appropriate mechanism and timing to deliver the necessary land acquisition presented in Section 3.6 of the Review of Environmental Factors.

Negotiations have commenced between Roads and Maritime and the land owners in relation to the partial acquisition of their land on Mulgoa Road and High Street frontages. The full extent of land acquisition is outlined in Section 3.6 of the Review of Environmental Factors. The extent of impact to car parking at the Civic Centre, Sinclair Motor Site and the Nepean District Tennis Association will be discussed with Penrith City Council during detailed design. Further discussions between Roads and Maritime and Penrith City Council will ensure the proposed Council land acquired is reserved for future road widening and is updated in the Penrith LEP 2010.

The Carpenter site access will require further discussion between Roads and Maritime and Penrith City Council over the requirements for providing access and the larger network impacts. A solution will be developed and implemented separately to this project as dialogue continues with the Penrith City Council. Roads and Maritime is currently working with Endeavour Energy to finalise the detailed design in order to minimise any potential impacts upon the Penrith Transmission/Zone Substation.

Furthermore, Roads and Maritime will provide a replacement entry statement to account for the loss to occur at Woodriff Gardens. The specifics (location, design etc.) is subject to further discussions with Penrith City Council during the detailed design phase.

2.4 Stakeholder and community consultation

Submission number(s)

2, 11

Issue description

The Museum of Fire stated that no consultation was carried out between themselves and Roads and Maritime which contradicted the information presented in Section 5.5 of the project Review of Environmental Factors.

Members of the local community indicated that there was no obvious input from Penrith City Council and the disabled community.

Response

During the preliminary stages of the design, seven options for the upgrade of the existing railway bridge at Castlereagh Road were considered in consultation with key stakeholders including Transport for NSW, Sydney Trains and Penrith City Council. Roads and Maritime also contacted the Museum of Fire during this stage of the process. Further consultation has been carried out with the Museum of Fire's CEO on the 29 November, 2016, since receiving their submission regarding the proposed upgrade's impact upon the museum.

The project is being developed in accordance with all necessary design standards that will account for the requirements of the disabled community. Further consultation will be undertaken to ensure that equal access is provided for the community.

2.5 Environmental assessment

2.5.1 Traffic and access

Submission number(s)

1, 9, 22

Issue description

Penrith City Council has made comments and identified the following items to be considered by Roads and Maritime as part of the project:

- Future proofing of the arterial road as a transport corridor through the provision of dedicated bus lanes to extend the life of the road upgrade as bus priority lanes at intersections may not be sufficient into the future as the services for a Regional City are increased
- Crucial that sufficient storage capacity is provided for south bound through traffic at the critical intersections of Jane Street/Castlereagh Road and High Street/ Mulgoa Road, and avoid queuing during peak times through these intersections. It is also important that signal coordination is set up to meet peak hour demand and avoid unnecessary queuing along both Jane Street (east) and Castlereagh Road (north) as is presently experienced
- Provide more information about the timeframe for the use of its land (Carpenters and Woodriff Gardens) for temporary construction compounds
- Provide infrastructure that caters for the broader range of cyclists, particularly on-road cyclists, who choose to travel at a higher speed than a path provides. The design should be capable of providing for a 2.5 metre wide shared-use path, as well as on-road bike lanes of 1.2 metres minimum for each direction of travel
- Clarification in relation to the separate stages of a crossing.

Members of the local community made comments that the concept design is not alleviating the two-lane congestion issue of eastbound morning traffic from Emu Plains to Jane Street and westbound afternoon traffic from Jane Street to Emu Plains via the Great Western Highway. Further, they questioned why bus lanes are required given the current minimal use of buses within the project area.

Response

An investigation of current road conditions outlines that daily work trips by bus equated to only two per cent in 2011, with 57 per cent of daily trips to work made by car (Table 6-1 of the REF). It is anticipated that bus priority measures at the intersections will encourage a modal shift by commuters towards the use of buses, thereby improving travel times. Further, bus priority measures are encouraged to be included in the scope of the project as they form part of a Transport for NSW (TfNSW) requirement. TfNSW also recognises that improvements to bus movements should occur as part of the upgrade and have provided feedback indicating that bus priority measures at intersections should be provided at the High Street / Mulgoa Road and Castlereagh Road / Jane Street intersections.

Roads and Maritime acknowledges that the storage capacity between Jane Street and High Street is important to the road network performing effectively. However the site constraints do not allow for the dual right turning bays being extended and therefore the performance of the intersections are reliant upon phasing of the traffic signals to avoid queuing across the through lanes travelling south-bound. Delineation, signage and line markings will be incorporated into the design where possible in order to address the current issue of queuing across the intersections.

Further discussions between Roads and Maritime and Penrith City Council will occur to ensure that the 'Carpenters' site can be made available as a site compound to the contractor. A lease will be required with Council outlining all conditions of use including restoration of the site and Endeavour Energy's requirements.

Policy within TfNSW outlines a preference for off-road cycle facilities on state roads, especially roads utilised by a large proportion of heavy vehicles. By law, motorists need to provide 1.0 metres of separation to cyclists for speeds of 60 kilometre/hour or less. On-road cyclist facilities require an additional 2.5 metres of space. This option is not considered appropriate as this would result in an increase of the typical cross sectional width of the corridor, causing a significant increase in the cost and a reduction in safety for off-road cyclists. Linemarking or signage will be used as an interim measure to identify changes between separated and shared path during the transition phase.

The staged crossings presented in the concept design are required because of the length of each of the crossings. The phasing of the pedestrian crossings will operate to standards whilst also ensuring that pedestrians and cyclists have ample time to cross the road (i.e. are not left waiting/stranded in the middle of the road). Other potential solutions were considered, however due to budget constraints on the project, these could not be considered as part of the upgrade.

Appendix D of the REF shows the results of traffic modelling for a 20-year period comparing a base case ('do nothing' scenario) and the proposed upgrade. The modelling shows the project would improve traffic capacity and performance at the Jane Street / Castlereagh Road / Mulgoa Road and Mulgoa Road / High Street intersections to a Level of Service D or better to the year 2036, and therefore provide adequate capacity and operational efficiency in the longer term.

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2.5.2 Water quality, hydrology and flooding

Submission number(s)

1

Issue description

Penrith City Council has identified the following items to be considered by Roads and Maritime as part of the project:

- The current rail underpass design becomes a trap low point in major storm events. The lack of drainage results in regular flooding of the underpass, causing major traffic disruption. Recommendation to undertake detailed stormwater modelling and design, to ensure that adequate stormwater infrastructure is provided at this trap low point capable of managing flows from all storm events
- Consideration of how the project could be delivered in a way which is consistent with Council's Water Sensitive Urban Design 2013 (WSUD) Policy and that stormwater treatment is incorporated into the project.

Response

Further investigations will be completed during the detailed design stage to ensure that the present stormwater situation is not made any worse due to the implementation of the project. The changes will include a primary gravity fed stormwater outlet to replace the current redundant system and a secondary pump-out system to pump water away from the sag (under the railway bridge) to Peachtree Creek. Further details are provided in Section 3.5 of the REF.

Consistent with specific requirements of the approved SWMP, control measures would be implemented to minimise risks associated with the entry of materials to drainage lines and waterways. This would include measures to divert or capture and filter water prior to discharge, such as drainage channels and first flush and sediment basins. However during the detailed design process, if sufficient space is available, Roads and Maritime will consider implementing a water quality treatment device.

2.5.3 Noise and vibration

Submission number(s)

1, 2

Issue description

Penrith City Council has identified the following item to be addressed by Roads and Maritime as part of the project:

- Ensure that the detailed design activities identified as being required in the Review of Environmental Factors are undertaken, with subsequent engagement in community consultation to ensure that appropriate and effective noise mitigation measures are implemented that respond to the concerns of the noise affected community and ensure that the noise levels at sensitive receivers comply with applicable noise criteria.

Members of the local community also commented on the major disruptions given the lengthy nature of the construction works.

Response

Operational noise impacts have been identified for sensitive receivers in close proximity to the project (Section 6.5.4 of the REF). These properties have been notified of this impact as part of the REF public display process. Further discussions will occur with the respective property owners to ensure that architectural treatments are made available if required.

Roads and Maritime acknowledges that there will be disruptions during the construction phase of the project. Actions in accordance with the CEMP will be taken to ensure that disruptions to the community are mitigated.

2.5.4 Landscape and visual

Submission number(s)

1

Issue description

Penrith City Council have identified the following items to be considered by Roads and Maritime as part of the project.

- Appropriate clearance space for proposed tree locations (mature size) in accordance with Austroads Cycling Aspects of Austroads Guidelines and Roads and Maritime NSW Bicycle Guidelines
- A strong street tree presence is delivered to all road verges impacted for improved visual amenity and public domain outcomes
- All overhead lines be relocated underground for consistent streetscape character and to enable a suitable treescape to establish
- Further develop concepts addressing planting / green walls, art themes, patterns, maintenance requirements, graffiti minimisation, feature lighting etc.
- Provide concepts for the longer term urban and landscape design (Glenmore Parkway to Andrews Road).

Response

Roads and Maritime designers will collaborate with Penrith City Council to ensure that a strong street tree presence is delivered to all road verges impacted for improved visual amenity and public domain outcomes. The plant species and maintenance requirements along the road verges will be considered in determining appropriate urban design treatments. It should be noted that tree species will be outside the clear zone for trees unless a safety barrier is implemented. This is an option to be explored in the detailed design phase.

Ongoing discussions between Roads and Maritime, Penrith City Council and Sydney Trains will occur to ensure a practical urban design outcome that is both achievable and maintainable for the railway bridge.

It is likely that power and telecommunication lines will be located underground. The only expected exclusion is the transmission and power lines currently on High Street, west of the intersection.

The concepts for the longer term urban and landscape design for Glenmore Parkway to Andrews Roads are outside the outlined scope for this project. However, the Mulgoa Road / Castlereagh Road Corridor Upgrade has been identified as a separate project and the project team will be informed of these comments.

2.5.5 Biodiversity

Submission number(s)

17

Issue description

A member of the local community requested that as part of the upgraded work no mature trees with hollows are removed.

Response

There are a number of hollow-bearing trees in the vicinity of the proposal which have the potential to provide habitat to a range of fauna species. Roads and Maritime acknowledge that some trees will need to be removed to accommodate the road upgrade. However this is not likely to include any trees with hollows. Tree removal will be kept to a minimum and additional trees will be planted to offset any impact to any loss of habitat. All trees that are likely to be hollow bearing will be checked and steps taken to ensure that no fauna is harmed by construction activities.

3 Environmental management

The Jane Street and Mulgoa Road Infrastructure Upgrade REF identified the framework for environmental management, including safeguards and management measures that would be adopted to avoid or reduce environmental impacts (Section 7 of the REF).

Should the proposal proceed, environmental management will be guided by the framework and measures outlined below.

3.1 Environmental management plans (or system)

A number of safeguards and management measures were identified in order to manage adverse environmental impacts, including social impacts, which could potentially arise as a result of the proposal. Should the proposal proceed, these management measures would be incorporated into the detailed design and applied during the construction and operation of the proposal.

A Project Environmental Management Plan (PEMP) and a Construction Environmental Management Plan (CEMP) will be prepared to describe the safeguards and management measures identified. The PEMP and CEMP will provide a framework for establishing how these measures will be implemented and who would be responsible for their implementation.

The PEMP and CEMP will be prepared prior to construction of the proposal and must be reviewed and certified by environment staff, prior to the commencement of any on-site works. The CEMP will be a working document, subject to ongoing change and updated as necessary to respond to specific requirements. The PEMP and CEMP would be developed in accordance with the specifications set out in the *QA Specification G36 – Environmental Protection (Management System)*, *QA Specification G38 – Soil and Water Management (Soil and Water Plan)* and *QA Specification G10 – Traffic Management*.

3.2 Summary of safeguards and management measures

The Jane Street and Mulgoa Road Infrastructure Upgrade REF identified a range of environmental outcomes and management measures that would be required to avoid or reduce the environmental impacts. Should the proposal proceed, the environmental management measures in Table 3-1 will be adopted in subsequent phases of the project.

Table 3-1: Summary of environmental safeguards and management measures

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
G1	General	All environmental safeguards must be incorporated within the following: <ul style="list-style-type: none"> • Project Environmental Management Plan • detailed design stage • contract specifications for the proposal • Contractor's Environmental Management Plan 	Project Manager	Pre-construction
G2	General	A risk assessment must be carried out on the proposal in accordance with Roads and Maritime Services procedures to determine an audit and inspection program for the work. The recommendations of the risk assessment are to be implemented. A review of the risk assessment must be carried out after the initial audit or inspection to evaluate if the level of risk chosen for the project is appropriate. Any work resulting from the proposal and covered by the REF may be subject to environmental audit(s) and/or inspection(s) at any time during their duration.	Project Manager and regional environmental staff	Pre-construction After first audit
G3	General	The environmental contract specification G36 must be forwarded to the Roads and Maritime Services Environment Manager Western Sydney Region for review at least 10 working days prior to the tender stage. A contractual hold point must be maintained until the CEMP is reviewed by the Roads and Maritime Services Environment Manager Western Sydney Region.	Project Manager	Pre-construction
G4	General	The Roads and Maritime Services Project Manager/ Site Manager must notify the Roads and Maritime Services Environment Officer Western Sydney Region at least five working days prior to work commencing.	Project Manager/ Site Manager	Pre-construction
G5	General	All businesses and residences likely to be affected by the proposed work must be notified at least five working days prior to the commencement of the proposed activities.	Project Manager	Pre-construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
G6	General	Environmental awareness training must be provided, by the contractor, to all field personnel and subcontractors.	Contractor/ Site Manager	Pre-construction and during construction as required.
T1	Traffic and transport	A Traffic Management Plan must be prepared and implemented in accordance with the Roads and Maritime Traffic control at worksites manual (Version 4), Australian Standard 1742.3 Manual of uniform traffic control devices, and instruction from the Transport Management Centre.	Contractor/ Site Manager	Pre-construction
T2	Traffic and transport	Road users, rail commuters, local residents, pedestrians and cyclists would be informed in advance of changed conditions, including any likely disruptions to access.	Project Manager and consultation team	Pre-construction and construction
T3	Traffic and transport	Real-time information would be made available through temporary Variable Message Signs (VMS), the Live Traffic and 131 500 websites, and the media.	Project Manager/ Site Manager	Construction
T4	Traffic and transport	Materials would be managed to control the number of haulage and delivery vehicles required on site.	Site Manager	Construction
T5	Traffic and transport	The designated site access points and haulage routes would be used.	Site Manager	Construction
T6	Traffic and transport	Affected areas would be restored to a condition equivalent to that which existed prior to the commencement of the work	Site Manager	Post-construction
AH1	Aboriginal Heritage	The Standard Management Procedure – <i>Unexpected Heritage Items</i> must be followed in the event that a known or potential Aboriginal object(s), including skeletal remains, is found during construction. This applies where Roads and Maritime does not have approval to disturb the object(s) or where a specific safeguard for managing the disturbance (apart from the Procedure) is not in place. Work may only re-commence once the requirements of that Procedure have been satisfied.	Site Manager	Construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
NAH1	Non-Aboriginal Heritage	<p>A non-Aboriginal Heritage Management Plan (HMP) would be prepared and implemented as part of the CEMP.</p> <p>It would provide specific guidance on measures and controls to be implemented to avoid and mitigate impacts to non-Aboriginal heritage. The HMP would be prepared in consultation with the Office of Environment and Heritage. The HMP would give effect to any management measures contained in any non-Aboriginal heritage assessment carried out for the project and include, but not necessarily be limited to:</p> <ul style="list-style-type: none"> • details of investigations completed or planned to be carried out and any associated approvals required • mapping of areas of non-Aboriginal heritage value and identification of protection measures to be applied during construction • procedures to be implemented if previously unidentified non-Aboriginal relics or heritage items are discovered during construction, in accordance with the Roads and Maritime Standard Management Procedure – Unexpected Archaeological Finds an induction program for construction personnel on the management of non-Aboriginal heritage values. 	Project Manager	Pre-construction
NAH2	Non-Aboriginal Heritage	Should any heritage items, archaeological remains or potential relics of non-Aboriginal origin be encountered, construction work that might affect or damage the material must cease and notification be provided to the relevant Roads and Maritime officer identified in the Roads and Maritime Standard Management Procedure – Unexpected Archaeological Finds. Work may only re-commence once the requirements of that Procedure have been satisfied.	Site Manager	Construction
NAH3	Non-Aboriginal Heritage	All personnel working on-site would receive training to ensure awareness of requirements of the non-Aboriginal Heritage Management Plan and relevant statutory responsibilities. Site-specific training would be given to personnel when working in the vicinity of identified non- Aboriginal heritage items.	Site Manager	Pre-construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
NAH4	Non-Aboriginal Heritage	The protection of areas of identified non-Aboriginal cultural heritage values that are to be retained such as the Penrith Ambulance Station would occur in accordance with the adopted non-Aboriginal Heritage Management Plan.	Site Manager	Construction
NAH5	Non-Aboriginal Heritage	Consistent with any specific requirements of the approved non-Aboriginal Heritage Management Plan and/or any exemptions, exceptions or excavation permits issued by the Office of Environment and Heritage, salvage of non-Aboriginal cultural heritage material would be carried out.	Project Manager	Construction
NAH6	Non-Aboriginal Heritage	An archival recording would be prepared of the railway bridge and Woodriff Gardens prior to any work being carried out that affects the item. The recording would be prepared in accordance with guidelines published by the Office of Environment and Heritage.	Project manager	Construction
W1	Water quality, hydrology and flooding	A Soil and Water Management Plan (SWMP) would be prepared in accordance with QA Specification G38 and implemented as part of the CEMP. The SWMP would identify reasonably foreseeable risks relating to soil erosion and water pollution associated with undertaking the activity, and describe how these risks would be managed during construction. That would include arrangements for managing pollution risks associated with spillage or contamination on the site and adjoining areas, and monitoring during and post-construction.	Project Manager	Pre-construction
W2	Water quality, hydrology and flooding	A site specific Erosion and Sediment Control Plan (ESCP) would be prepared and included in the SWMP and CEMP. The ESCP would identify detailed measures and controls to be applied to manage erosion and sediment control risks including, but not necessarily limited to: runoff, diversion and drainage points; sediment basins and sumps; scour protection; check dams, fencing and swales; and staged implementation arrangements . The ESCP would also include arrangements for managing wet weather events, including monitoring of potential high risk events (such as storms) and specific controls and follow-up measures to be applied in the event of wet weather.	Project Manager	Pre-construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
W3	Water quality, hydrology and flooding	<p>Consistent with any specific requirements of the approved SWMP, control measures would be implemented to manage risks associated with erosion and sedimentation and entry of materials to drainage lines and waterways. That would include, but not necessarily be limited to:</p> <ul style="list-style-type: none"> • sediment management devices, such as fencing, hay bales or sand bags • measures to divert or capture and filter water prior to discharge, such as drainage channels and first flush and sediment basins • scour protection and energy dissipaters at locations of high erosion risk • installation of measures at work entry and exit points to minimise movement of material onto adjoining roads, such as rumble grids or wheel wash bays • appropriate location and storage of construction materials, fuels and chemicals, including bunding where appropriate. 	Site Manager	Construction
NV1	Noise and vibration	<p>A Noise and Vibration Management Plan (NVMP) would be prepared as part of the CEMP. The NVMP would be prepared in accordance with the Interim Construction Noise Guideline (ICNG) and would identify:</p> <ul style="list-style-type: none"> • potential significant noise and vibration generating activities associated with the activity • measures to be implemented during construction to manage noise and vibration impacts, such as restrictions on working hours, staging, placement and operation of work compounds, parking and storage areas, temporary noise barriers, haul road maintenance, and controlling the location and use of vibration generating equipment • feasible and reasonable mitigation measures to be implemented • a monitoring program to assess performance against relevant noise and vibration criteria • arrangements for consultation with affected neighbours and sensitive receivers, including notification and complaint handling procedures • contingency measures to be implemented in the event of non-compliance with noise and vibration criteria. 	Project Manager	Pre-construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
NV2	Noise and vibration	The majority of works would be carried out during standard working hours (7am – 6pm Monday to Friday, 8am –1pm Saturdays). Any work that is performed outside normal work hours or on a Sunday or public holiday would be required to manage noise impacts in accordance with Roads and Maritime's <i>Environmental Noise Management Manual Practice Note 7 – Roadworks Outside of Normal Working Hours</i> and the ICNG.	Site Manager	Construction
NV3	Noise and vibration	Construction personnel would be made familiar with the potential for noise and vibration impacts upon local residents and encouraged to take all practical and reasonable measures to minimise noise during the course of their activities.	Site Manager	Construction
NV4	Noise and vibration	Where practical, the layout and positioning of noise-producing plant and activities at each work site would be optimised to contain noise emission levels.	Site Manager	Construction
NV5	Noise and vibration	Where practical, equipment would be selected to reduce noise emissions. Equipment would be fitted with appropriate noise control equipment and be in good working order.	Site Manager	Construction
NV6	Noise and vibration	Where possible, non-“beeper” reversing movement alarms would be used such as broadband (non-tonal) alarms or ambient noise-sensing alarms. Work sites would also be designing the site to reduce the need for reversing, potentially minimising the use of reversing beepers.	Site Manager	Construction
NV7	Noise and vibration	Vehicles, plant and equipment would be regularly inspected and maintained to avoid increased noise levels from rattling hatches, loose fittings etc.	Site Manager	Construction
NV8	Noise and vibration	All vehicles, plant and equipment would be shut off when not in use.	Site Manager	Construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
NV9	Noise and vibration	Resilient damping material would be fitted on bin trucks to reduce noise impacts from the loading of materials on trucks.	Site Manager	Construction
NV10	Noise and vibration	If feasible and reasonable, localised temporary acoustic hoardings/screens would be installed in proximity to high noise generating activities. Hoardings/screens would be located as close to the noise source as possible, and would be an appropriate height as structurally feasible to appropriately manage noise emissions	Site Manager	Construction
NV11	Noise and vibration	If piling is proposed for bridgework, nearby properties would be consulted regarding the intended activities associated with the piling process.	Project Manager and consultation team	Pre-construction and construction
NV12	Noise and vibration	<p>Measures to reduce the impact of percussive piling activities should be considered, including:</p> <ul style="list-style-type: none"> • using a resilient pad (dolly) between pile and hammer head • enclosing the hammer head in a temporary acoustic shroud <p>Alternatively, rotary bored or vibro-piling may be used where consistent with the type of pile used and restrictions on soil disturbance.</p>	Site Manager	Construction
NV13	Noise and vibration	A sleep disturbance assessment should be carried out prior to construction for any planned out of hours work. The sleep disturbance assessment should consider the absolute noise level of the activity, the degree of above the existing ambient noise level, and the number of individual noisy events likely to occur per night.	Project Manager	Pre-construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
NV14	Noise and vibration	<p>Architectural treatment should be considered for the residential found to be in exceedance of the Roads and Maritime Noise Criteria Guidelines (NCG) noise levels and the 'acute' noise levels. The number of properties requiring architectural treatment should be refined and confirmed following approval of the proposal and after detailed design is developed. Architectural treatment to be implemented should be agreed with the individual property owners and carried out in accordance with the Roads and Maritime Noise Management Guidelines (NMG). Architectural noise treatments may include one or a combination of the following:</p> <ul style="list-style-type: none"> • the installation of courtyard screen walls • fresh air ventilation systems that meet building code of Australia requirements with the windows and doors shut. • upgraded windows and glazing and solid core doors on exposed facades of substantial structures only (i.e. masonry or insulated weather board cladding with sealed underfloor) • upgrading window and doors seals and appropriately treating sub-floor ventilation • the sealing of wall vents • the sealing of the underfloor below the bearers 		
LV1	Landscape and visual	Project work sites, including construction areas and supporting facilities (such as storage compounds and offices) must be managed to reduce visual impacts, including appropriate storage of equipment, parking, stockpile screening and arrangements for the storage and removal of rubbish and waste materials.	Site manager	Construction
LV2	Landscape and visual	Temporary site lighting must be installed and operated in accordance with AS4282:1997 Control of the Obtrusive Effect of Outdoor Lighting.	Site manager	Construction
UD1	Urban design	The Urban Design Strategy for the proposal should be reviewed during the final detailed project design and implemented as part of the CEMP.	Project manager and site manager	Detailed design and construction
UD2	Urban design	The retaining walls and replacement rail bridge should be designed together to consider the sense of arrival and departure from the Penrith CBD.	Project manager	Detailed design

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
UD3	Urban design	A Landscape Management Plan to ensure cost effective and consistent management of landscape works should be developed in consultation with Penrith City Council and implemented during construction. The plan will be prepared in accordance with the RTA Landscape guideline.	Project manager and site manager	Pre-construction and construction
SE1	Socio-economic	<p>A Communication Plan (CP) would be prepared and implemented as part of the CEMP to ensure provision of timely and accurate information to the community during construction. The CP would include (as a minimum):</p> <ul style="list-style-type: none"> mechanisms to provide details and timing of proposed activities to affected residents, including changed traffic and access conditions contact name and number for complaints. <p>The CP would be prepared in accordance with the Roads and Maritime <i>Community Involvement and Communications Resource Manual</i>.</p>	Project Manager and consultation team	Pre-construction
SE2	Socio-economic	<p>Access for emergency vehicles would be maintained at all times during construction. Any site-specific requirements would be determined in consultation with the relevant emergency services agency. Specifically, access must be maintained for Penrith Ambulance Station while the station is operational in its current location via signals or traffic controllers. This must be integrated into traffic management planning which must also incorporate actions for allowing ambulances to quickly move through the area.</p> <p>Where possible, work in the vicinity of the Penrith Ambulance Station should occur later in the construction program to allow time for the operational facility to move.</p>	Project Manager and consultation team	Pre-construction and construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
SE3	Socio-economic	Consultation would be carried out with potentially affected residences prior to the commencement of and during work in accordance with the RTA's Community Involvement and Communications Resource Manual. Consultation would include but not be limited to door knocks, newsletters or letter box drops providing information on the proposed work, working hours and a contact name and number for more information or to register complaints.	Project Manager and consultation team	Pre-construction and construction
SE4	Socio-economic	<p>Consultation would be carried out with all affected property owners and businesses during detailed design and construction to develop and implement measures to mitigate impacts on land use viability, infrastructure and severance. Consultation with local businesses would identify appropriate management strategies to avoid or reduce impacts on access and operations. This would include consideration of measures such as additional signage and alternative access arrangements. Specific discussions would include:</p> <ul style="list-style-type: none"> • consultation with Council around urban design treatments to repair and provide another entry statement at Woodriff Gardens • engagement with the Nepean and District Tennis Association to investigate reasonable opportunities to improve access/egress from the Nepean District Tennis Association facility. • discussion with Council about the best way to make good the car park area and landscape design to investigate re-provision of vegetation in this area • development of a suitable detour route for Lion Dairy and Drinks trucks during construction. • reviewing the phasing of traffic lights around Westfield to determine if this may assist with access/egress from the centre during construction. 	Project Manager and consultation team	Pre-construction and construction
SE5	Socio-economic	Disruptions to property access and traffic would be notified to landowners at least five days in advance in accordance with the relevant community consultation processes outlined in the TMP.	Project Manager and consultation team	Construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
LU1	Land-use	Temporary leasing arrangements would be managed and setup at the earliest stage possible in the project and all land owners would be consulted in accordance with the standard consultation measures.	Project Manager	Pre-construction
LU2	Land-use	Prior to the commencement of utility work, consultation would occur with identified persons and organisations that may be adversely affected by service disruptions (such as businesses, educational or medical facilities) to determine any special requirements or alternative service arrangements.	Project Manager	Pre-construction
SG1	Soils and geology	A Soil Management Plan would be prepared in accordance with QA Specification G38 and implemented as part of the CEMP. The SWMP would identify all reasonably foreseeable risks relating to subsurface impacts and pollution associated with undertaking the activity, and describe how these risks would be managed during construction. That would include arrangements for managing pollution risks associated with spillage or soil contamination on the site and adjoining areas, and monitoring during and post-construction.	Project Manager	Pre-construction
SG2	Soils and geology	A Spoil and Fill Management Plan (SFMP) would be prepared and implemented as part of the CEMP. The SFMP would identify the locations of spoil and fill stockpiles, sources of imported fill, and methods to re-use or dispose of excess or unsuitable spoil material including estimated volumes and disposal sites.	Project Manager	Pre-construction
SG3	Soils and geology	In addition to the implementation of general erosion, sediment and water quality control safeguards, any sediment basins, stockpiles, washdowns, batch plants, refuelling and chemical storage sites would be lined and/or bunded if they are located within 50 metre of a shallow groundwater source.	Site Manager	Construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
SG4	Soils and geology	<p>Where groundwater is intercepted during construction works, such as around the replacement railway bridge, measures to manage potential adverse impacts would be implemented in accordance with the RTA <i>Technical Guideline: Environmental management of construction site dewatering</i>. These may include, but not necessarily be limited to:</p> <ul style="list-style-type: none"> options to collect and store groundwater to enable recharge of the water table (such as via grassed swales) where recharge is not appropriate or feasible, discharging groundwater to the surface water drainage system following appropriate treatment to ensure discharged water is of sufficient quality. Prior to any dewatering activities being carried out, an approval must first be obtained in accordance with Section 92 of the WM Act. 	Site Manager	Construction
SG5	Soils and geology	Topsoil would be stockpiled in cleared or disturbed areas and managed in accordance with the RTA <i>Stockpile Site Management Guideline</i> until it is removed from the construction site and disposed of at an appropriately licensed facility.	Site Manager	Construction
SG6	Soils and geology	<p>The rehabilitation of disturbed areas would be carried out progressively as construction stages are completed, and in accordance with:</p> <ul style="list-style-type: none"> Landcom's Managing Urban Stormwater: Soils and Construction series RTA Landscape Guideline Roads and Maritime Guideline for Batter Stabilisation Using Vegetation. 	Site Manager	Construction
SG7	Soils and geology	Batters would be designed and constructed to minimise risk of exposure, instability and erosion, and to support long-term, on-going best practice management, in accordance with the Roads and Maritime <i>Guideline for Batter Stabilisation Using Vegetation</i> .	Site Manager	Construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
C1	Contamination	<p>A Contaminated Land Management Plan (CLMP) would be prepared and implemented as part of the CEMP for any areas of existing contaminated land or to address land contamination likely to be caused by the activity. The CLMP would be prepared in accordance with relevant requirements of the Roads and Maritime <i>Guideline for the Management of Contamination</i> and, as a minimum address the following matters:</p> <ul style="list-style-type: none"> • control measures to divert surface runoff away from the contaminated land • capture and management of any surface runoff contaminated by exposure to the contaminated land • further investigations required to determine the extent, concentration and type of contamination, as identified in the detailed site investigation (Phase 2) • manage the remediation and subsequent validation of the contaminated land, including any certification required • measures to ensure the safety of site personnel and local communities during construction. 	Project Manager	Pre-construction
C2	Contamination	<p>If contaminated areas are encountered during construction, appropriate control measures would be implemented to manage the immediate risks of contamination, such as the diversion of surface runoff, capture of any contaminated runoff or temporary capping.</p> <p>All other work that may impact on the contaminated area would cease until the nature of the contamination has been confirmed and necessary site-specific controls or further actions identified in consultation with the Environment Manager and/or EPA.</p>	Site Manager	Construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
C3	Contamination	A site specific emergency spill plan would be developed, and include spill management measures in accordance with the Roads and Maritime <i>Code of Practice for Water Management</i> and relevant EPA guidelines. The plan would address measures to be implemented in the event of a spill, including initial response and containment, notification of emergency services and relevant authorities (including Roads and Maritime and EPA officers).	Project Manager / Site Manager	Construction
BD1	Biodiversity	<p>A Flora and Fauna Management Plan (FFMP) would be prepared and implemented as part of the CEMP. It would address terrestrial and aquatic matters and include, but not necessarily be limited to:</p> <ul style="list-style-type: none"> (a) plans showing areas to be cleared and areas to be protected, including exclusion zones and protected habitat features (e.g. hollow-bearing trees), and areas for rehabilitation or re-establishment of native vegetation; (b) requirements set out in the RTA <i>Landscape Guideline</i>; (c) procedures addressing relevant matters specified in the <i>Biodiversity Guidelines – Protecting and managing biodiversity on RTA projects</i> including but not limited to: <ul style="list-style-type: none"> • pre-clearing, including the outcomes of final flora and fauna species checks, establishment of exclusion zones and on-ground identification of specific habitat features to be retained (such as hollow-bearing trees) • vegetation clearing and bushrock removal, including staged habitat removal and any specified seasonal limits on clearing activities • fauna handling and unexpected threatened species finds • rehabilitation, revegetation, re-use of soils, woody debris and bushrock, and other habitat management actions • weed and pathogen management (d) procedures addressing relevant matters specified in the NSW DPI (Fisheries) <i>Policy and guidelines for fish habitat conservation and management</i>. 	Project Manager	Pre-construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
BD2	Biodiversity	<p>Measures to further avoid or reduce the construction footprint and native vegetation or habitat removal would be considered during the detailed design stage and implemented where practicable and feasible. Measures to manage impacts should be prioritised in the following order:</p> <ul style="list-style-type: none"> (a) critical habitat (b) threatened species, endangered ecological communities or their habitat (c) native vegetation and habitat supporting flora and fauna connectivity and/or that supports other environmental objectives such as protecting water quality, hydrology or erosion and sediment controls (d) native vegetation of higher quality condition (e) other native vegetation. 	Design team	Pre-construction
BD3	Biodiversity	All personnel working on-site would receive training to ensure awareness of requirements of the FFMP and relevant statutory responsibilities. Site-specific training would be given to personnel when working in the vicinity of areas of identified biodiversity value that are to be protected.	Site Manager	Pre-construction
BD4	Biodiversity	Consistent with the Biodiversity Guidelines – Protecting and managing biodiversity on RTA projects, and any specific requirements of the approved FFMP, an unexpected finds procedure would be implemented in the event that a threatened species or ecological community that had not been identified and assessed by the REF is unexpectedly encountered during the construction process.	Site Manager	Construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
BD5	Biodiversity	<p>Consistent with the <i>Biodiversity Guidelines – Protecting and managing biodiversity on RTA projects</i>, and any specific requirements of the approved FFMP, management arrangements would be implemented to manage environmental risks associated with weeds, pest species and pathogens. As a minimum that would include:</p> <ul style="list-style-type: none"> • completion of a site weed assessment and, if necessary based on the assessment outcomes, a weed management plan • implementation of appropriate weed control methods and weed disposal • implementation of appropriate hygiene protocols where there are potential or known pathogen risks. 	Site Manager	Construction
BD6	Biodiversity	<p>Consistent with the <i>Biodiversity Guidelines – Protecting and managing biodiversity on RTA projects</i>, the <i>RTA Landscape Guideline</i>, and any specific requirements and locations identified in the approved Flora and Fauna Management Plan, habitat management actions would be implemented post-construction, including rehabilitation, re-vegetation, re-use of soil, woody debris and bushrock.</p>	Site Manager	Post-construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
AQ1	Air quality	<p>An Air Quality Management Plan (AQMP) would be prepared and implemented as part of the CEMP. The AQMP would identify:</p> <ul style="list-style-type: none"> • potential sources of air pollution (such as dust, vehicles transporting waste, plant and equipment) during construction • air quality management objectives consistent with any relevant published EPA and/or OEH guidelines • mitigation and suppression measures to be implemented, such as spraying or covering exposed surfaces, provision of vehicle clean down areas, covering of loads, street cleaning, use of dust screens, maintenance of plant in accordance with manufacturer's instructions • methods to manage work during strong winds or other adverse weather conditions • a progressive rehabilitation strategy for exposed surfaces • a monitoring program to assess compliance with the identified objectives, and developed in accordance with any relevant published EPA and/or OEH guidelines • community notification and complaint handling procedures 	Site Manager	Pre-construction
AQ2	Air quality	All sensitive receivers (e.g. residences, the MountainView Aged Care Facility) likely to be affected must be notified at least five days prior to commencement of any work associated with the activity that may have an adverse impact on local air quality. The notification must include details of: the project; construction period and construction hours; any recommended measures that can be implemented (e.g. window closure, staying indoors, etc.); contact information for project management staff; complaint and incident reporting; and how to obtain further information.	Project Manager	Pre-construction and construction
AQ3	Air quality	All personnel working on-site would receive training to ensure awareness of requirements of the AQMP. Site-specific training would be given to personnel when working in the vicinity of sensitive receivers.	Site Manager	Pre-construction
AQ4	Air quality	Consistent with the approved AQMP mitigation and suppression measures would be implemented to protect local air quality.	Site Manager	Construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
WMRU1	Waste and resource management	<p>A Waste Management Plan (WMP) would be prepared and implemented as part of the CEMP. It would provide specific guidance on measures and controls to be implemented to support minimising the amount of waste produced and appropriately handle and dispose of unavoidable waste. It would also address the importation of waste to the site for use in undertaking the project.</p> <p>The WMP would give effect to any management measures contained in any waste assessment carried out for the project and include, but not necessarily be limited to:</p> <ul style="list-style-type: none"> • measures to avoid and reduce waste associated with the project • classification of wastes generated by the project and management options (re-use, recycle, stockpile, disposal) • classification of wastes received from off-site for use in the project and management options • identifying any statutory approvals required for managing both on and off-site waste, or application of any relevant resource recovery exemptions • procedures for storage, transport and disposal • monitoring, record keeping and reporting, including any documentation management obligations arising from resource recovery exemptions. <p>The WMP would be prepared taking into account the Roads and Maritime Environmental Procedure – Management of Wastes on Roads and Maritime Services Land and relevant Roads and Maritime Waste Fact Sheets.</p>	Project Manager	Pre-construction
WMRU2	Waste and resource management	Waste would be classified in accordance with the methods and specifications of the Waste Classification Guidelines.	Site Manager	Construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
WMRU3	Waste and resource management	Any trees to be removed shall be reused as millable timber wherever practicable. Other vegetated material from native species shall be mulched and re-used on-site for landscaping or rehabilitation purposes if consistent with the approved FFMP for the project. Weed species, or vegetation not considered appropriate for re-use on-site, would be removed and disposed of to an appropriately licensed facility.	Site Manager	Construction
WMRU4	Waste and resource management	After considering the outcomes of relevant information that becomes available during construction, appropriate measures would be implemented to address identified deficiencies or undertake actions needed to address waste related impacts. If necessary, the WMP would be reviewed and updated to include any additional measures.	Site Manager	Construction
WMRU5	Waste and resource management	A post-construction land assessment must be carried out to determine the suitability for hand-back to the landowner. The assessment is to be prepared in accordance with the <i>Roads and Maritime Environmental Procedure – Management of Wastes on Roads and Maritime Services Land</i> . Where the land is privately owned, a copy of the assessment would be provided to the landowner.	Site Manager	Construction
CC1	Climate Change	<p>Specific measures would be outlined in the CEMP to ensure that construction reduces potential impacts on or from climate change including:</p> <ul style="list-style-type: none"> • Energy efficiency and related carbon emissions would be considered during the development of construction methodologies, procurement of low carbon alternatives and the selection of efficient plant vehicles, and equipment. • Plant, vehicles and machinery must be operated efficiently in accordance with the manufacturers guidelines to ensure optimal performance and be switched off when not in use. • Procedures would be set out for the management of extreme events including flooding, heatwaves and bushfires. 	Project Manager	Pre-construction

No.	Impact	Environmental safeguards and management measures	Responsibility	Timing
CU1	Cumulative impacts	Cumulative impacts would be incorporated into the traffic management plan and the noise and vibration management plan.	Project Manager	Pre-construction and construction
CU2	Cumulative impacts	Management measures within the CEMP would be reviewed in response to any complaints received.	Project Manager	Construction

3.3 Licensing and approvals

Should the proposal proceed, the licenses and approvals as outlined in Table 3-2 may be required prior to the commencement of construction.

Table 3-2: Summary of licensing and approval required

Instrument	Requirement	Timing
<i>Heritage Act 1977</i>	Excavation Permit in accordance with Sections 139-140 of the Heritage Act.	Prior to the commencement of the work
<i>Water Management Act 2000</i>	Water supply work approval in accordance with Section 92 of the WM Act if groundwater needs to be extracted for dewatering purposes during construction.	Prior to the commencement of the work
<i>National Parks and Wildlife Act 1974</i>	Under the NPW Act, an AHIP is required prior to the harm of any Aboriginal objects.	Prior to the commencement of the work
<i>Protection of the Environment Operations Act 1997</i>	EPL in accordance with Schedule 1(33) of the POEO Act for activities associated with the replacement of the existing railway bridge	Prior to the commencement of the work

4 References

Australian Standard 1997, *Control of the Obtrusive Effect of Outdoor Lighting (AS4282:1997)*, December 1997

Australian Standard 2009, *Manual of uniform traffic control devices, Part 3: Traffic control for works on roads (AS 1742.3—2009)*, January 2009

Department of Environment and Climate Change (DECC) 2009, *Interim Construction Noise Guideline*, July 2009, Sydney

Department of Primary Industries 2013, *Policy and guidelines for fish habitat conservation and management*, June 2013

Environment Protection Agency 2014, *Waste Classification Guidelines Part 1: Classifying waste*, November 2014

Landcom 2004, *Soils and Construction: Managing Urban Stormwater*, March 2004

Roads and Maritime Services 2013, *Roads and Maritime Guideline for the Management of Contamination*, September 2013

Roads and Maritime Services 2014, *Environmental Procedure – Management of Wastes on Roads and Maritime Services Land*, August 2014

Roads and Maritime Services 2015, *Guideline for Batter Stabilisation Using Vegetation*, April 2015

Roads and Maritime Services 2015, *QA Specification G10 – Traffic Management*, June 2015

Roads and Maritime Services 2015, *QA Specification G38 – Soil and Water Management (Soil and Water Plan)*, February 2015

Roads and Maritime Services 2015, *Standard Management Procedure – Unexpected Heritage Items*, March 2015

Roads and Maritime Services 2016, *Jane Street and Mulgoa Road Infrastructure Upgrade Review of Environmental Factors*, October 2016

Roads and Maritime Services 2016, *QA Specification G36 – Environmental Protection (Management System)*, January 2016

Roads and Traffic Authority 1999, *Code of Practice for Water Management*, April 1999

Roads and Traffic Authority 2001, *Environmental Noise Management Manual Practice Note 7 – Roadworks Outside of Normal Working*, December 2001

Roads and Traffic Authority 2008, *Landscape guideline*, April 2008

Roads and Traffic Authority 2008, *Roads and Maritime Community Involvement and Communications Resource Manual*, June 2008

Roads and Traffic Authority 2010, *Traffic control at worksites manual (Version 4)*, June 2010

Roads and Traffic Authority 2011, *Biodiversity Guidelines – Protecting and managing biodiversity on RTA projects*, September 2011

Appendix A

Community update newsletter



Australian Government

BUILDING OUR FUTURE



MAKING IT HAPPEN

Jane Street and Mulgoa Road Infrastructure Upgrade

November 2016

The Australian and NSW governments have jointly committed \$70 million toward road improvements to alleviate congestion and improve traffic flow along Mulgoa Road and Castlereagh Road adjacent to Penrith's CBD. Roads and Maritime is seeking comments on the Jane Street and Mulgoa Road Infrastructure Upgrade concept design and Review of Environmental Factors until **16 December 2016**.



Artists impression: Jane Street and Mulgoa Road intersection

The Jane Street Mulgoa Road / Castlereagh Road and High Street / Mulgoa Road intersections play a vital role in connecting road users to the Penrith CBD, Blue Mountains and surrounding suburbs. These intersections currently experience congestion during the morning and afternoon peak times.

Additionally, as part of the NSW Government's Plan for Growing Sydney, Penrith will continue to grow as a regional city centre and accommodate future residential and employment growth. Without any improvement to cater for this growth, future traffic congestion at these intersections will worsen, resulting in further delays for road users.

The Jane Street and Mulgoa Road Infrastructure Upgrade would ease this congestion and provide increased capacity to cater for future transport growth.

Background

Following the identification of a preferred option in November 2014 and in consideration of community feedback, Roads and Maritime has prepared a concept design and Review of Environmental Factors. These are now on display for community comment until 16 December 2016.

The Review of Environmental Factors assesses the potential environmental effects of the project and outlines the mitigation measures to reduce these impacts. It includes an assessment of impacts including noise, property, heritage, biodiversity and construction. It also provides details about traffic diversions during the construction phase and access arrangements for businesses and properties located along the project route.

Since the last round of community consultation in November 2014, there have been a number of minor changes to the preferred option design. These changes include:

- A dedicated left turn lane southbound turning in to High Street
- Addition of bus priority at the two key intersections
- Moving the rail bridge slightly west to avoid impacts to Sydney Trains assets
- Two dedicated right turn lanes out of High Street heading north
- Dedicated left lane from High Street westbound on to Mulgoa Road.

Benefits

- Reduce congestion and delays at the Jane Street / Castlereagh Road and Mulgoa Road / High Street intersections during morning and afternoon peak times
- Deliver infrastructure that provides effective network performance
- Improve access for public transport
- Provide safe and effective pedestrian and cycling infrastructure

- Support economic growth
- Allow for upgrades of other sections of Mulgoa Road in the future.

Features

- An additional lane both north and south bound on Mulgoa Road / Castlereagh Road between Union Road and to the south of Museum Drive
- A longer left turn lane along Mulgoa Road for vehicles turning westbound onto High Street / the Great Western Highway
- Upgrading the Mulgoa Road and High Street intersection to provide increased capacity
- Upgrading the T-intersection of Jane Street and Castlereagh Road / Mulgoa Road to provide increased capacity
- Widening the existing rail underpass to allow three lanes in each direction on Castlereagh Road and a left turn into Jane Street
- Bus priority at the Jane Street and High Street intersections.

Other projects in the area

Mulgoa Road / Castlereagh Road Corridor Upgrade

The Australian and NSW governments are planning for a potential future widening and upgrade of Mulgoa Road / Castlereagh Road to support current and future traffic demands and expected growth in the area.

Following the announcement of the future Mulgoa Road / Castlereagh Road Corridor Upgrade in February 2015, Roads and Maritime started investigations and technical studies to develop a number of possible corridor options. This included seeking feedback from the community and key stakeholders in August / September 2015.

In October 2015, a value management workshop was held and the options were assessed against a set of criteria. In consultation with representatives from Penrith City Council, Penrith Valley Chamber of Commerce and specialist consultants, a preferred option was recommended.

Jeanette Street to Blaikie Road

As part of the Mulgoa Road / Castlereagh Road Corridor Upgrade the Australian and NSW governments have committed \$100 million to fast-track the corridor upgrade between Jeanette Street, Regentville and Blaike Road Jamisontown. This includes a proposal to widen Mulgoa Road to three lanes in each direction. More information about this upgrade will be available on the Roads and Maritime website shortly.

Jane Street and Mulgoa Road Infrastructure Upgrade



Artists impression: Jane Street and Mulgoa Road intersection



Artists impression: new rail bridge and widened underpass to three lanes in each direction



Artists impression: upgrades to the Mulgoa Road and High Street intersection



Check out our new interactive video at:
www.rms.nsw.gov.au/JaneStreetMulgoaRoad

Have your say

The Jane Street and Mulgoa Road Infrastructure Upgrade concept design and Review of Environmental Factors is on display until 16 December 2016. You can download a copy of the report from www.rms.nsw.gov.au/JaneStreetMulgoaRoad or view the documents in hard copy at the following locations:

Penrith City Library

601 High Street, Penrith

Opening hours: Monday to Friday 9am to 8pm

Saturday 9am to 5pm – Sunday 10am to 5pm

St Clair Library

Shop 12, St Clair Shopping Centre

Corner of Bennett Road and Endeavour Avenue, St Clair

Opening hours: Monday to Friday 10am to 5.30pm

Saturday 9am to 1pm – Sunday Closed

St Marys Library

207-209 Queen Street, St Marys

Opening hours: Monday to Thursday 9am to 8pm

Friday 9am to 5.30pm – Saturday 9am to 5pm

Sunday 10am to 5pm

We will also hold three community information sessions where the project team will be available to answer questions and receive feedback. A formal presentation will not be given so please feel free to drop in at any time during the following sessions:

Thursday 24 November

5.00pm to 8.00pm

Penrith Senior Citizens Centre, 86 Station Street, Penrith

Saturday 26 November

10.00am to 1.00pm

Cambridge Park Hall, 97 Oxford Street, Cambridge Park

Saturday 3 December

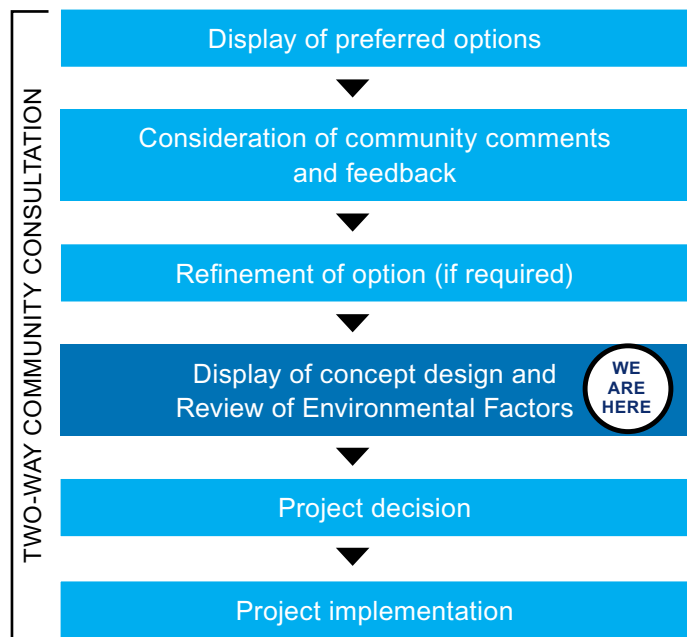
2.00pm to 4.00pm

Penrith City Library Theatre, 601 High Street, Penrith



Artists impression: Separated pedestrian and cycle path near the rail bridge and road underpass.

Next steps



Contact us

For further information about the concept design and Review of Environmental Factors, or to provide feedback, please contact the project team:



1800 733 084



janestreetandmulgoaroad@rms.nsw.gov.au



Jane Street Mulgoa Road Upgrade
Roads and Maritime Services
PO Box 973, Parramatta CBD NSW 2124



www.rms.nsw.gov.au/JaneStreetMulgoaRoad



Check out our new interactive video at:
www.rms.nsw.gov.au/JaneStreetMulgoaRoad



Translating and Interpreting Service

If you need an interpreter, please call the Translating and Interpreting Service (TIS National) on **131 450** and ask them to telephone Roads and Maritime Services on 1800 733 084.

Arabic

إذا كنتم بحاجة إلى مترجم، الرجاء الاتصال بخدمة الترجمة الخفية والشفهية (TIS National) على الرقم **131 450** والطلب منهم الاتصال بوكالتكم على الرقم 1800 733 084.

Cantonese

若你需要口譯員，請致電 **131 450** 聯絡翻譯和口譯服務署 (TIS National)，要求他們致電 1800 733 084 聯絡 Roads and Maritime Services。

Mandarin

如果你需要口譯員，請致電 **131 450** 联系翻译和口译服务署 (TIS National)，要求他们致电 1800 733 084 联系 Roads and Maritime Services。

Greek

Αν χρειάζεστε διερμηνέα, παρακαλείσθε να τηλεφωνήσετε στην Υπηρεσία Μετάφρασης και Διερμηνείας (Εθνική Υπηρεσία ΤΙΣ) στο **131 450** και ζητήστε να τηλεφωνήσουν Roads and Maritime Services στο 1800 733 084.

Italian

Se desiderate l'assistenza di un interprete, prego telefonare al Servizio Interpreti e Traduttori (TIS National) al **131 450** chiedendo di contattare Roads and Maritime Services al 1800 733 084.

Korean

통역사가 필요하시면 번역통역서비스 (TIS National)에 **131 450** 으로 연락하여 이들에게 1800 733 084 번으로 Roads and Maritime Services 에 전화하도록 요청하십시오.

Vietnamese

Nếu cần thông ngôn viên, xin quý vị gọi cho Dịch Vụ Thông Phiên Dịch (TIS Toàn Quốc) qua số **131 450** và nhờ họ gọi cho Roads and Maritime Services qua số 1800 733 084



November 2016
RMS 16.530

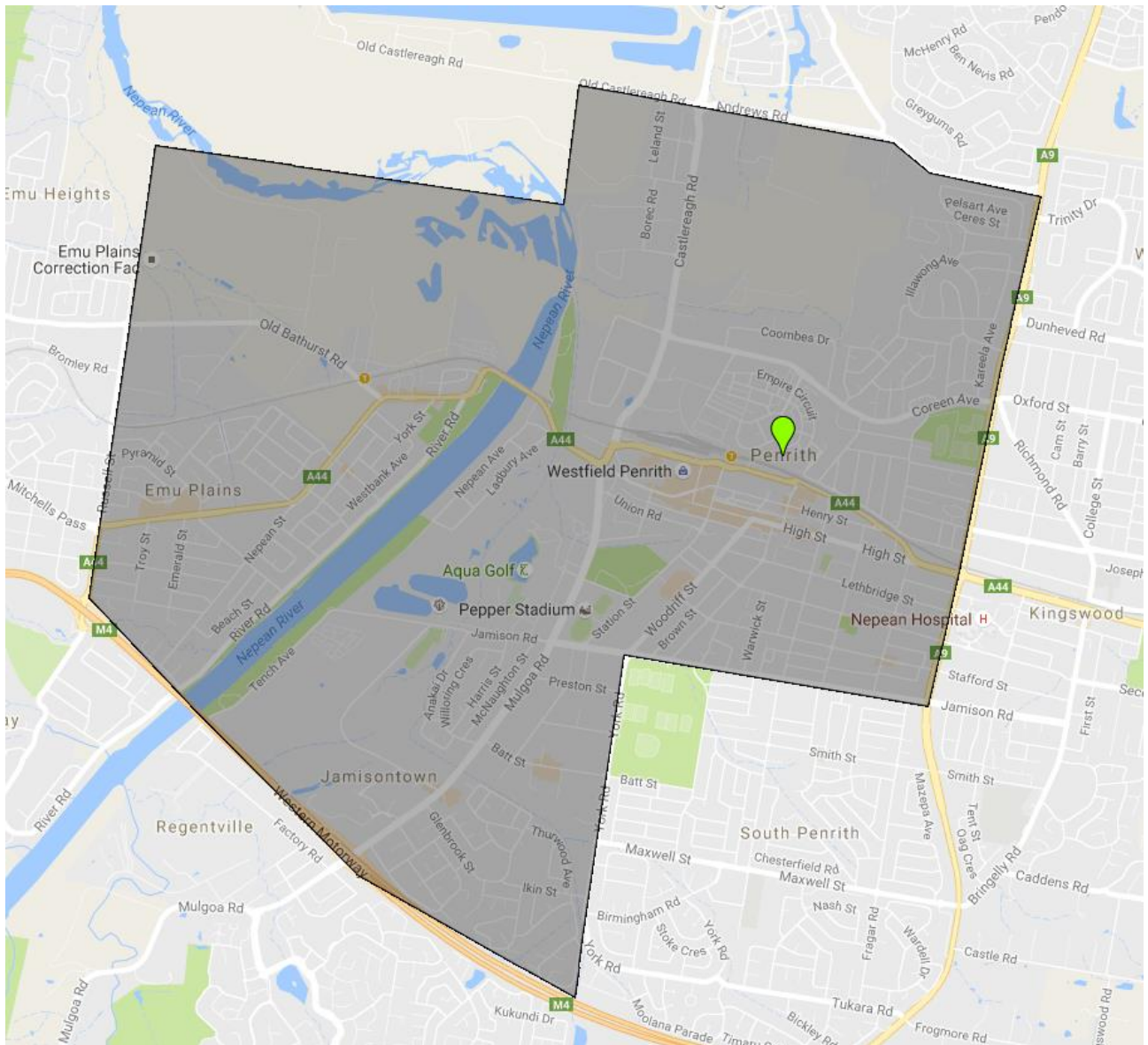


Transport
Roads & Maritime
Services

Privacy Roads and Maritime Services ("RMS") is subject to the Privacy and Personal Information Protection Act 1998 ("PPIP Act") which requires that we comply with the Information Privacy Principles set out in the PPIP Act. All information in correspondence is collected for the sole purpose of assisting in the assessment of this proposal. The information received, including names and addresses of respondents, may be published in subsequent documents unless a clear indication is given in the correspondence that all or part of that information is not to be published. Otherwise RMS will only disclose your personal information, without your consent, if authorised by the law. Your personal information will be held by RMS at Level 7, 27 Argyle Street, Parramatta NSW 2150. You have the right to access and correct the information if you believe that it is incorrect.

Appendix B

Distribution map



Appendix C

Sorry we missed you flyer



Sorry we missed you

16 November 2016

The Australian and NSW governments have jointly committed \$70 million toward road improvements to alleviate congestion and improve traffic flow along Mulgoa Road and Castlereagh Road adjacent to Penrith's CBD.

Representatives from Roads and Maritime Services visited your property today to update you on the Jane Street and Mulgoa Road Infrastructure Upgrade.

The concept design and Review of Environmental Factors (REF) for the Upgrade is now available and we invite your comments until **Friday 16 December 2016**.

For more information, please refer to the Jane Street and Mulgoa Road Infrastructure Upgrade Community Update newsletter or visit www.rms.nsw.gov.au/JaneStreetMulgoaRoad

To provide feedback, please contact the project team on 1800 733 084 (toll free) or email janestreetandmulgoaroad@rms.nsw.gov.au.

We also encourage you to attend a community information session (details are in the newsletter).



Appendix D

Media release

Community feedback sought for Jane Street and Mulgoa Road infrastructure upgrade

18 November 2016

Western Sydney residents will be able to have a direct say in the design of the Jane Street and High Street intersection upgrades along Mulgoa and Castlereagh roads, with feedback now being sought on a key stage of the project.

Federal Minister for Urban Infrastructure Paul Fletcher said offering feedback on the concept design and environmental factors for the project would help ensure it reflected community views, comments and concerns.

"This is a project that will reduce congestion and improve traffic conditions for motorists in Western Sydney," Mr Fletcher said.

"These intersections provide important connections for road users to Penrith's CBD, the Blue Mountains and surrounding suburbs.

"Due to population growth, motorists experience considerable congestion during the morning and afternoon peaks. The project will help alleviate these issues.

"Since the last consultation period there have been minor changes to the design including new dedicated turning lanes, the addition of bus priority zones at key intersections and moving the rail bridge slightly west."

Member for Penrith Stuart Ayres said there would be information sessions for those wishing to provide feedback or to learn about the project in person.

"I encourage all those who are interested in providing feedback to attend one of the information sessions," Mr Ayres said.

"The first will be on Thursday 24 November from 5pm to 8pm at the Penrith Senior Citizens Centre, with another session on Saturday 26 November between 10am and 1pm at the Cambridge Park Hall.

"The Penrith Library Theatrette will host our final event on Saturday 3 December between 2pm and 4pm. Community feedback will form a significant part of the project's final delivery.

"Feedback on the concept design and Review of Environmental Factors is invited until 16 December, with the community able to provide feedback via email, phone or post.

"I want to see the best possible project delivered for local motorists and I would encourage everyone to get in and have their say," Mr Ayres said.

"Copies of the Review of Environmental Factors, including the concept design, can be viewed at Penrith City Library, St Marys Library and St Clair Library."

The Australian and New South Wales governments have each committed \$35 million to the project.

For more information please visit the www.rms.nsw.gov.au/JaneStreetMulgoaRoad.

Appendix E

Newspaper advertisement



Australian Government

BUILDING OUR FUTURE



Transport
**Roads & Maritime
Services**

Jane Street and Mulgoa Road infrastructure upgrade

Review of Environmental Factors

Have your say

The Australian and NSW governments have jointly committed \$70 million toward improvements to alleviate congestion and improve traffic flow along Mulgoa Road and Castlereagh Road, adjacent to Penrith's CBD.

Roads and Maritime Services is now inviting feedback on the concept design and Review of Environmental Factors (REF) until **Friday 16 December 2016**.

You can view a hard copy of the REF at the following locations:

Penrith City Library: 601 High Street, Penrith

St Clair Library: Shop 12, St Clair Shopping Centre, corner of Bennett Road and Endeavour Avenue, St Clair

St Marys Library: 207-209 Queen Street, St Marys

Alternatively the REF, supporting documents and project animation can be downloaded from:

www.rms.nsw.gov.au/JaneStreetMulgoaRoad

We encourage you to drop in to one of our information sessions to speak to a member of the project team and provide feedback. Our sessions will be held:

Thursday 24 November 2016 5pm to 8pm – Penrith Senior Citizens Centre, 86 Station Street, Penrith

Saturday 26 November 2016 10am to 1pm – Cambridge Park Hall, 97 Oxford Street, Cambridge Park

Saturday 3 December 2016 2pm to 4pm – Penrith City Library Theatre, 601 High Street, Penrith

For more information or to provide feedback, please phone: 1800 733 084

Email: janestreetandmulgoaroad@rms.nsw.gov.au

**Mail: Jane Street and Mulgoa Road Upgrade, Roads and Maritime Services,
PO BOX 973, Parramatta CBD NSW 2124**



www.rms.nsw.gov.au/JaneStreetMulgoaRoad



1800 733 084



Jane Street and Mulgoa Road Upgrade
Roads and Maritime Services
PO Box 973
Parramatta CBD NSW 2124

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