

27 March 2020

Mr Glenn Snow
Director, Transport Assessments
Department of Planning, Industry & Environment
Locked Bag 5022
Parramatta NSW 2124

Reference: SSI-8863 Western Harbour Tunnel & Warringah Freeway Upgrade

Thank you for the opportunity to review and comment on the Environmental Impact Statement for the proposed Western Harbour Tunnel & Warringah Freeway Upgrade. The following are our comments.

The proponent must obtain endorsement and/or approval from Sydney Water to ensure that the proposed project does not adversely impact on any existing water, wastewater or stormwater assets, or other Sydney Water asset, including any easement or property.

Sydney Water wastewater and potable water assets

- Sydney Water owns and operates trunk and reticulation assets located within and outside the project boundary for the proposed Western Harbour Tunnel & Warringah Freeway Upgrade. These assets provide wastewater and potable water services to our customers in the affected area.
- Sydney Water, during and post works of the Western Harbour Tunnel & Warringah Freeway Upgrade, must continue to provide these services as per Sydney Water's Operating Licence and regulatory requirements.
- Sydney Water encourages early consultation and discussions with TfNSW for these works. We also recommend that all relevant information, plans, needs specifications for these assets are requested from Sydney Water.
- The Environmental Impact Statement states there is a need for potable water use within and for the project. The availability and volume of these flows will depend on system capability and will be confirmed during detail design.
- Sydney Water reserves the right to assess, based on final project layout and construction designs prepared by the project team and or their contractors, the impacts on our assets located within the project scope, and the potential needs for adjustments funded by the project to accommodate accessibility of our pipes for operational and maintenance purposes, new pavement locations and changes to structures.
- Sydney Water requires safe unrestricted access to our assets throughout the life of the project. We need to ensure these assets are fully operational at all times.
- Sydney Water recommends early consideration for staging and timing design work and delivery of the project. This is very critical to allow sufficient time for Sydney Water to schedule and program shutdowns and reconnections of our assets. This ensure that Sydney Water continues to meet its Operating Licence and most importantly maintain

services to our customers. A Water Service Coordinator can assist you with this process.

- Sydney Water Asset Adjustment process, found on the Sydney Water website, should be adhered to for the relocation, adjustment and or protection of our assets. Additionally, if assets are required to be changed, the environmental approval will need to cover any works identified that may fall outside of the project boundary, but be a result of the project works.
- Any trade waste licence request, most notably for removal of leachate, will need to meet Sydney Water's requirements.
- The environmental approval needs to meet the discharge protocols of chlorinated water due to watermain shutdown and reconnection of live Sydney Water assets that will need to be adjusted.
- Amplification of assets may be required to facilitate future growth along the development corridor. This will be assessed as adjustment applications are referred to Sydney Water for review. Sydney Water consultation is required early to ensure any amplifications are identified, planned and confirmed early.

*Chapter 2 Assessment Process, Section 2.2.1 NSW Legislation – please add **Sydney Water Act 1994** under *Other relevant legislation*.*

*Appendix D – Utilities management strategy, Section 2.3 Treatment approach to utilities – the proponent **must obtain approval** from the relevant utility provider before commencement of works.*

Sydney Water stormwater assets

Scoping Report

- Sydney Water notes the need for further proposed assessment regarding flood management.
- Further assessments should also include consultation with Sydney Water as owner of stormwater assets in the project vicinity, particularly at Whites Creek and the nearby Rozelle Interchange to ensure that the project is unlikely to:
 - Preclude, reduce or compromise the ability of Sydney Water or Council to cost effectively provide flood mitigation services and stormwater capacity amplifications to accommodate urban uplift in the vicinity.

Secretary's Environmental Assessment Requirements

- Sydney Water notes that '*the environmental values of nearby, connected and affected water sources, groundwater and dependent ecological systems including estuarine and marine water (if applicable) are maintained (where values are achieved) or improved and maintained (where values are not achieved)*'.
- We also note the following statements:

- *The project design considers all feasible measures to avoid and minimise impacts on terrestrial and aquatic biodiversity.*
- *Offsets and / or supplementary measures which are equivalent to any remaining impacts of project construction and operation.*

A concept of 'offsets' has in preceding infrastructure projects been interpreted to allow water quality treatment works in one catchment as offset to the discharge of untreated or lesser treated runoff from a separate and distinct catchment and / or local receiving environment.

The interpretation of 'offsets' in this manner is not reasonable or supported. The stormwater runoff from each project site area shall be managed consistently within each and across all project catchment areas. Inter catchment and inter site 'offsets' tend to 'pick the low hanging fruit' elsewhere and preclude the opportunity for a more effective long-term overall catchment outcome.

- We also note for flooding that the project maintains '*compatibility with the hydraulic functions of flood conveyance in flood ways and storage areas of the land*'.

Flood storage consideration has been provided limited weight in previous infrastructure projects and should be considered of equal importance to other flood impact considerations.

Appendix D – Utilities management strategy

- Does not specifically note likely significant modifications to Sydney Water stormwater assets particularly in the vicinity of the Rozelle Interchange.
- We note that TfNSW do '*not allow for the upgrading of utilities apart from upgrades required to manage the requirements of the project*'.

The no-upgrade approach for stormwater infrastructure is a reasonable presumption up until the project proposes to either:

- Adjust or deviate an existing Sydney Water stormwater asset.
- Install project infrastructure in a proximity and manner that may restrict the ability of Sydney Water to provide future flood mitigation services or related asset amplifications.

The no-upgrade presumption does not automatically apply in the foregoing circumstances. The project proponents shall undertake necessary investigations and negotiations to ensure that proposed and existing Sydney Water stormwater assets are 'future-proofed' for a growth Sydney. Sydney Water shall assess each circumstance on merit.

- Close consultation with Sydney Water during the concept & detailed design, construction and operational phases of the project must be required to ensure that the objectives are met and that the impacts to Sydney Water stormwater assets is minimised, or improvements to the receiving environment can be achieved.
- Strict requirements for Sydney Water's stormwater assets apply to this project. TfNSW should ensure that satisfactory steps/measures been taken to protect existing stormwater assets, such as avoiding building over and/or adjacent to stormwater assets and building bridges over stormwater assets. TfNSW should consider taking measures to minimise or eliminate potential flooding, degradation of water quality, and avoid adverse impacts on any heritage items, and create pipeline easements where required.
- Sydney Water's stormwater quality targets will apply when a connection to our asset is required (Refer to Sydney Water's website <http://www.sydneywater.com.au/SW/waterthe-environment/how-we-manage-sydney-s-water/stormwater-network/stormwaterquality-targets/index.htm>).
- Stormwater quality monitoring results for stormwater discharges should be provided to Sydney Water throughout including pre, during and post construction of the road (3 years).
- Continual communication with Sydney Water regarding the detailed design and flood assessment will be required. Any weakening of the EIS position during detailed design will be critically examined by Sydney Water.

Other findings in Appendix

Appendix N – Groundwater

- Notes '*after 100 years of operation, predicted drawdown magnitudes are similar to end of construction, with a maximum drawdown of about 40 metres in Rozelle (particularly Easton Park, an area of environmental interest for contamination)*'.
- Sydney Water seeks further clarification to understand the potential for groundwater drawdown generally to impact the structural integrity of its assets.
- References a Sydney Water concept design (2016) for naturalisation of part of Whites Creek. Sydney Water seeks further clarification to understand the interface and complementary design elements by the project proponents.

Appendix O – Surface water quality and hydrology

- Notes '*the key water quality objective would be to ensure downstream waterways are protected against potential impacts from surface runoff generated during the construction phase of the project.*'
- Notes '*during the operation of the project, tunnels would incorporate drainage infrastructure to capture and treat wastewater generated from groundwater ingress and rainfall runoff in tunnel portals. A permanent operational wastewater treatment*

plant located at Rozelle is proposed to treat discharge and manage adverse impacts on the receiving environment at Rozelle Bay.'

Other tunnel projects have proposed discharge of groundwater into existing Sydney Water stormwater drains. The indicated strategy to manage tunnel water (groundwater and portal stormwater ingress) discharges separate from Sydney Water drainage infrastructure is supported and preferred.

- Notes that '*existing water quality in all waterways indicates a highly urbanised catchment with elevated nutrients and heavy metals.*'

A proposition that existing water ways are already of poor quality and that '*residual risk to sensitive receiving environments and environmental values is expected be low provided the proposed management measures are implemented, maintained and monitored*' should not be interpreted to justify reduced stormwater runoff quality management effort for any specific site or catchment.

- The report references water quality guidelines and policies including *Sydney Harbour Water Quality Improvement Plan* (Sydney Metropolitan Catchment Management Authority (SMCMA, 2010) and the project should ensure stormwater runoff management targets from each site should at least directly meet the minimum requirements of the plan.

Appendix R – Flooding

- We note that there is an emphasis to minimise adverse impacts on existing flood characteristics.
- The foregoing criteria is limiting. The assessment of project related works is to also consider the project works in the context of likely local community urban uplift ambitions and facilitating / not precluding the provision of future flood mitigation services to accommodate a growth Sydney.

Overall, Sydney Water strongly recommends continued consultations with TfNSW to discuss designs and constraints which will benefit the project.

Please contact me on 8849 3528 for further information and to discuss any questions.

Yours sincerely,



Willy Ramlie
Account Manager – Motorways

Infrastructure Development