

Attachment A – Submissions Report and Preferred Infrastructure Report Requirements

The Submissions Report (SR) and Preferred Infrastructure Report (PIR) documents, as relevant, must address the following issues identified by the Department of Planning and Environment (the Department):

All issues raised by government agencies in their advice

All issues raised in submissions by members of the public, interest groups and councils

Documentation

- Review for consistency required. Different figures have been used in different sections of the document.
 - For example, inconsistent figures for number of evacuations required in different scenarios.
- Data is marked as being sourced from the *Hawkesbury-Nepean Valley Flood Risk Management Strategy (2017)*, but the figures differ from those presented in the strategy.

 The source of the data needs to be clarified.
- The SR and PIR must assess the upstream and downstream impacts of the proposal equally to provide a clear understanding of the balance between the positive and negative impacts of the proposal for purposes of assessment.
- Review for accuracy of citations used through the document to ensure citation has occurred where required, and that citations are correct.
- Statements that suggest field surveys, or methodological approaches were not feasible should include a supporting justification stating reasons why.

Statutory and Planning Framework

- The SR and PIR must clarify the applicability of Clause 125(2)(b) of the *State Environmental Planning Policy (Infrastructure) 2011* to the proposal, as the clause refers to water storage facilities, while the proposal relates to flood mitigation.

Project Need

 Large sections of Chapter 3 of the EIS appear to be copied from the Hawkesbury-Nepean Valley Flood Risk Management Strategy (2017), but this is not attributed in the document.
 The source of this section should be clarified.

Project Development and Alternatives

- The options presented are based on a proposal CIV of approximately \$600 million, however the project CIV has been updated in the Department's system to show a CIV of more than \$1.3 billion. The complete options analysis presented must be reviewed and updated to reflect the revised project costings.
- Are all possible variables considered and included within the chosen dam option? For example, a "plunge pool" is identified as potentially being required which would increase spoil to be removed for "Erosion Protection" from 30,000m³ to 670,000m³. The SR and PIR must address all impacts of the increase of spoil removal if this option is to be progressed.

Project Description

- The Project Description should be reviewed and updated including, where required, relevant figures. For example, Figure 5-4 of the EIS shows a bridge below the lower dissipater slab of the dam. Figure C-5 of Appendix L does not appear to show a bridge in the same location, but further down the river.

Key Issues for PIR

Project Description and Assessment

- Provide a balanced assessment of the upstream and downstream impacts as a result of the proposal, with methodologies applied consistently.
- Provide details of the proposed operational regime and the impacts of this regime
- Provide details of the design of the dam wall, including the:
 - location of any spillways and outlets
 - o maximum design discharge capacity of spillways and outlets.

Flooding and Hydrology

- Provide assessment details about the accuracy of the flooding and hydrology modelling for the proposal, including:
 - o reasons for the difference or uncertainty in the accuracy of modelled flood levels at Wallacia (Appendix H1: Flood and Hydrology Assessment Report p21)
 - o details of data used to calibrate flooding, hydrology and flood behaviour models on floodplain areas that are not from in-channel data.

Heritage

- Provide a more comprehensive assessment of Aboriginal cultural heritage values, including:
 - o ongoing consultation with the Aboriginal community which appropriately considers and addresses their comments and concerns
 - additional work completed in response to issues raised by submissions to identify and assess Aboriginal cultural values likely to be impacted by the proposal, including further field studies
 - o mitigation and management measures for any impacts to Aboriginal heritage, both tangible and intangible
- Provide a balanced assessment of the upstream and downstream impacts to non-Aboriginal heritage, with methodologies applied consistently.
- Provide a more detailed assessment of the impacts of the proposal on World Heritage including:
 - o consideration of the Aboriginal cultural heritage aspects of World Heritage
 - o consideration of the natural and cultural values
 - assessment of the impacts of the proposal against the Statement of Outstanding Universal Value for the Greater Blue Mountains World Heritage Area.
- Clear definition is required for the term "Project Upstream Impact Area (PUIA)" used in analysis for Chapter 18, and across the Aboriginal Cultural Heritage assessment. This definition must clearly state the relevant annual exceedance probability (AEP) or average recurrence interval (ARI) upper and lower bounds for this assessment area.
- The EIS states "There are also a number of sites within the study area above the EUIA." at 18-66 of Chapter 18. Details must be provided of the AEP or ARI upper and lower bounds for this assessment area.

Offsetting

- Details of the proposed offsetting arrangements for all adverse impacts, including:
 - updated and proposed offsetting arrangements for upstream and downstream impacts
 - proposed offsetting arrangements under the Framework for Biodiversity Assessments
 - proposed offsetting arrangements for impacts to the National Parks estate
 - o proposed offsetting arrangements for impacts to the World Heritage areas
 - assessment of the effectiveness and feasibility of the proposed offsetting arrangements.

Sustainability and Climate Change

- Provide a more detailed technical assessment of how the proposal has considered the impacts of climate change, including:
 - detailed assessment of risks under future climate scenarios that would affect the proposal
 - analysis comparing inundation, flooding and hydrology under future climate scenarios with assumptions that have been used to justify the proposal
 - identification of how climate change risks have been incorporated into project design.
 - o identification of how the proposal achieves sustainability outcomes.

Water Quality

- Provide a detailed quantitative assessment of impacts and risks to water quality, that:
 - uses quantitative assessment methods where feasible, and identifies any technical and scientific constraints that justify the use of qualitative methods.
 - identifies the frequency, extent and duration of water quality impacts from the operation of the Flood Mitigation Zone.
- Identification of models and modelling packages used in the 2017 Metropolitan Water Plan (Metropolitan Water Directorate 2017) where information from that plan has been used by the EIS to analyse or estimate water quality parameters, environmental flow regimes, or future water quality states downstream of the dam.
- The EIS states that 'water quality benefits from environmental flows have been considered in determining future background downstream water quality' at chapter 27-3. Therefore, assumptions regarding future water quality appear to be contingent on the approval and construction of environmental flows infrastructure that has not yet occurred. Further details of the proposed environmental flows infrastructure and targeted timeframes for approval and operation are required to assess whether it is appropriate to count these benefits.

Biodiversity

- Include sufficient additional information, as required by the Commonwealth NSW bilateral assessment agreement, to facilitate the assessment of the proposal under the requirements of the *Environment Protection and Biodiversity Conservation Act 1999 (Cth)*.

Visual Amenity

 The PIR must demonstrate what the visual impact would reasonably be from all viewing locations, including areas beyond the project footprint where the works would be readily visible from scenic lookouts or other publicly accessible vantage points.

Other Matters

- Details of road upgrades required and/or maintenance regimes necessary to support heavy vehicle access to the proposal site.
- Changes to the proposal which will minimise its social, environmental and cultural impacts.