



Your reference:
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Contact:

SSI-4963 DOC12/52029 Robert Donohoe, (02) 6640 2518

Mr Michael Young Senior Planner, Infrastructure Projects Department of Planning GPO Box 39 SYDNEY NSW 2001 - 5 MAR 2013

Department of Planning Received 7 MAR 2013 Scanning Room

Dear Mr Young

Pacific Highway Upgrade – Woolgoolga to Ballina Project (SSI-4963) – Exhibition of Environmental Impact Statement

I refer to the Environmental Impact Statement (EIS) for the Woolgoolga to Ballina Pacific Highway Upgrade Project, and accompanying technical working papers, received by the Environment Protection Authority (EPA) on 12 December 2012. Thank you for the opportunity to provide comments on the Woolgoolga to Ballina EIS.

The EPA and the Office of Environment and Heritage (OEH) have reviewed the information provided in the EIS and accompanying documents and have provided comments in Attachment 1 (EPA Project Noise & Vibration Comments), Attachment 2 (NPWS Park Estate and Biodiversity Related Comments) and Attachment 3 (OEH Aboriginal Cultural Heritage Comments). A copy of the EPA's biodiversity comments, which were submitted separately, is also enclosed with this correspondence.

The details in Attachment 2 primarily represent issues where further clarity and certainty of biodiversity assessment and mitigation are warranted to ensure that the ecological impacts of the project are appropriately managed. The details in Attachments 1 and 3 focus on the need to maintain consistent effective communication with affected parties and ensure the contractor is undertaking appropriate early assessments to identify key mitigation measures.

Based on this assessment of the EIS the EPA has determined that it is able to support the proposal, subject to the biodiversity (submitted separately) and NPWS issues of concern being satisfactorily addressed and any recommended conditions of approval being appropriately considered and adopted.

In relation to the information provided in the EIS, it is noted that the proposal, if approved, will require an Environment Protection Licence as these activities are scheduled under the provisions of the *Protection of the Environment Operations Act 1997* (POEO Act). The proponent will need to make a separate application to the EPA to obtain this licence if project approval is granted.

If you have any questions, or wish to discuss this matter further please contact Robert Donohoe (6640 2518) regarding POEO Act related environmental issues or Craig Harre (6659 8223) regarding biodiversity issues. Contacts for Aboriginal Cultural Heritage and NPWS comments are included with the relevant attachments.

PO Box 498 Grafton NSW 2460 NSW Government Offices 49 Victoria Street Grafton NSW Tel: (02) 6640 2500 Fax: (02) 6640 2539 ABN 30 841 387 271 www.environment.nsw.gov.au Yours sincerely

BRETT NUDD Manager North Coast Region Environment Protection Authority

Attachment 1: EPA Noise and Vibration Comments

Attachment 2: NPWS Comments

Attachment 3: OEH Aboriginal Cultural Heritage Comments

ATTACHMENT 1 – EPA COMMENTS ON THE EIS FOR THE WOOLGOOLGA TO BALLINA UPGRADE OF THE PACIFIC HIGHWAY - WORKING PAPER : NOISE AND VIBRATION.

The Environment Protection Authority (EPA) Noise Assessment Unit (NAU) has reviewed the '*Pacific Highway Woolgoolga to Ballina Upgrade – Working Paper: Noise and Vibration*' (WP) prepared by SKM dated November 2012 (Final). The WP forms part of the Environmental Impact Statement (EIS) for the project.

In summary, the EPA has no major issues with the Working Paper.

With regard to operational noise impacts, EPA notes that in most cases, architectural treatment of residences is recommended as the most appropriate form of noise mitigation. In some cases, low noise pavements are recommended for specific sections of the project, and noise barriers are typically found to be not sufficiently effective to be recommended as a mitigation measure.

With regard to the construction phase of the project, EPA notes that the WP predicts, at times, significant impacts to the surrounding community due to airborne noise from construction works. Highly significant exceedances of the identified noise goals in particular are predicted, even with noise mitigation measures in place, and the project is expected to require significant 'out of hours' work. There is also the potential for blasting to be required.

EPA considers that prior approval should be required for any construction works on the project outside the standard hours in the Interim Construction Noise Guideline, and that any blasting should be assessed in detail against ANZECC guidelines. The proposal to extend standard construction hours put forward in Section 3.2.4 of the WP should be supported by detailed justification for its adoption, and clear community support.

The WP proposes a suite of noise and vibration mitigation and management measures to address the expected impacts. It should be clearly acknowledged, however, that the implementation of the Construction Noise and Vibration Management Plan referred to in Section 3.3.4 of the WP will not, in many cases, be able to reduce the impacts from the works to a level that even approaches the relevant construction noise and vibration goals.

The EPA considers that the key construction noise issues which will need to be managed in seeking to comply with the relevant construction noise and vibration goals will be:

- effective communication with and management responses to the concerns of the affected community;
- the need for clear justification, clear community support and prior approval to carry out any construction works outside the recommended standard hours defined in Section 2.2 of the Interim Construction Noise Guideline (ICNG), including the adoption of the proposed construction hours (6am to 7pm Mon-Fri, 8am to 5pm Sat);
- the early erection of temporary and, where possible, operational noise barriers and/or other mitigation measures proposed in the WP;
- the need to minimise any construction traffic movements outside standard hours, and particularly at night time (10pm to 7am), to reduce the potential for sleep disturbance as much as possible; and

• if blasting is required, the need to carry out an assessment of the potential noise and vibration impacts from blasting, and a strategy to minimise and manage those impacts.

ATTACHMENT 2 - NPWS COMMENTS ON THE EIS FOR THE WOOLGOOLGA TO BALLINA UPGRADE OF THE PACIFIC HIGHWAY.

Contact for comments: Janet Cavanaugh (ph: 02 6641 1551)

The National Parks and Wildlife Service (NPWS – part of the Office of Environment and Heritage) provides the following comments in relation to the project's potential impacts on areas of existing 'park' (that is, lands reserved or acquired under the *National Parks and Wildlife Act 1974 (NPW Act)*), and the potential implications of the the project's proposed biodiversity offset strategy for NPWS.

Impacts on areas of 'park'

Revocation of lands reserved under NPW Act

The chapter summary in *Chapter 16 – Land Use and Property Assessment* mentions the fact that RMS needs to secure the corridor for the project will force the acquisition of state forest and Crown land. The summary fails to mention the revocation and acquisition of reserved lands (namely, three small parts of Yaegl Nature Reserve and several sections of Broadwater National Park) which has been required.

It is noted that the Bill revoking these lands (the *National Parks and Wildlife Amendment (Adjustment of Areas) Bill 2012*) has passed through the NSW Parliament, with assent given in September 2012. However, until appropriate compensatory lands are obtained and transferred to NPWS, RMS will not be able to gain access to or receive transfer of these revoked lands. The revoked lands are currently vested in the Minister for the Environment under Part 11 of the *National Parks and Wildlife Act 1974*.

Impacts on national parks and other reserves

Section 16.3.13 of the EIS states that the project would pass through or adjacent to the following areas reserved under the *National Parks and Wildlife Act 1974*: Broadwater National Park, Tabbimoble Swamp Nature Reserve, Bundjalung National Park, Bundjalung State Conservation Area, Yaegl Nature Reserve and Yuraygir State Conservation Area.

This list needs correcting as follows:

- delete mention of Bundjalung State Conservation Area as no part of this park abuts the existing or proposed alignment of the Pacific Highway (an outlying section of Bundjalung National Park on the western side of the Highway provides a buffer between the State Conservation Area and the Highway)
- add Mororo Creek Nature Reserve to this list the project area abuts its boundary in the vicinity of the Iluka Road Interchange, and so it should be considered a directly adjacent property (and should be shaded as such on the detailed mapping provided in the *Working Paper – Land Use and Property*).

The EIS should acknowledge that impacts on areas of park will occur during the project's construction period and following the upgrade. Potential impacts include: unauthorised encroachments of equipment or personnel during and following construction; sedimentation, dust and other pollution during construction; litter from motorists, road runoff and weed invasion following construction; changes in hydrology; barriers to wildlife movement and increased incidence of faunal road kill;

edge effects due to changes to microclimate, noise and light; and restrictions on management access.

To reduce these impacts, NPWS recommends the following:

- installation of temporary and permanent sedimentation basins and litter traps to intercept any runoff from construction site and the final road pavement;
- design and installation of drainage adjacent to Yaegl and Mororo Creek nature reserves to maintain existing sheet flow and avoid creating concentrated flow;
- erection of fencing along the project area's boundary to reduce the likelihood of inadvertent entry onto NPWS lands;
- installation of wildlife crossings combined with revegetation with locally indigenous trees and shrubs along corridors to enhance and improve linkages between areas of suitable habitat;
- installation of exclusion fencing along the highway to reduce faunal movement onto the road's surface (fence to be offset from the park boundary, to reduce need for clearing within the park, and not to include any barbed wire);
- development and implementation of a weed management plan for the highway's corridor; and
- provision made to ensure uninterrupted access for fire, pest and other management purposes by NPWS vehicles (and others authorised by NPWS) to existing management trails in Broadwater and Bundjalung national parks, and Tabbimoble Swamp Nature Reserve.

It is noted that the locations of temporary construction activities such as ancillary facilities or temporary sedimentation basins are yet to be determined and so are not included in the EIS. NPWS would **not** support any such construction sites being located on lands under its control.

It is stressed that effective litter, sediment and erosion control measures are particularly important in the vicinity of Mororo Creek Nature Reserve and Yaegl Nature Reserve, as both reserves, which will receive direct runoff from the highway, should be considered **sensitive receiving environments**, protecting swamp sclerophyll forest endangered ecological communities in close proximity to the highway.

It should be noted that the EIS references to SEPP 14 wetlands within areas of national park and other reserves is incorrect. State Environmental Planning Policy 14 (Coastal Wetlands) does not apply to any lands reserved under the NPW Act. However, the vast majority of lands that were formerly mapped under SEPP 14 which are now within reserves are recognised as endangered ecological communities (EECs) listed under the *Threatened Species Conservation Act 1995* and should thus be considered sensitive receiving environments.

Effective wildlife crossings are required in the vicinity of these reserves, and also in the vicinity of Bundjalung National Park and Yuraygir State Conservation Area. The Pacific Highway in the vicinity of Yaegl Nature Reserve is recognised as a fauna road-kill 'hotspot' and there is currently limited connectivity between the eastern and western sections of the reserve. However, Chapter 16 of the EIS only mentions the installation of fauna overpasses in the vicinity of Broadwater National Park and Tabbimoble Swamp Nature Reserve, and the erection of fauna exclusion fencing is only mentioned in relation to Broadwater National Park. Some additional fauna crossings can be inferred from figures 10-31 to 10-56, and Table 10-29 identifies, in

addition to the above structures, a potential crossing at station 17 (near Yuraygir State Conservation Area), fencing along the highway in the vicinity of Yaegl Nature Reserve (between stations 82.5 and 85.1) and a crossing at Koala Drive (station 83.1), and structures in the vicinity of Bundjalung National Park (namely fauna crossings at stations 99.7, 100.6, 101.1 and 101.5, and fencing between stations 97.9 and 101.9). NPWS considers the current **connectivity strategy to be inadequate** and recommends:

- the erection of fencing and installation of culverts or other crossing structures in the vicinity of Mororo Creek Nature Reserve (station 96); and
- along the interface of Bundjalung National Park and Devils Pulpit State Forest between stations 104 and 109).

An earlier RMS report prepared in September 2011 on the proposed upgrade through Yaegl Nature Reserve recommended design of the Koala Drive underpass to improve its suitability as a fauna crossing, and a landscaping strategy which will reinforce tree plants with revegetation being undertaken with locally indigenous dense trees and shrubs. These recommendations are missing from the EIS.

Biodiversity Offset Strategy

The EIS claims the Biodiversity Offset Strategy will deliver a package of offsets to achieve a neutral or net beneficial biodiversity outcome for the region. The EIS recognises the Biodiversity Offset Strategy detailed in Appendix C of the *Working paper – Biodiversity* is not finalised, stating that it 'would be further developed, in consultation with relevant state and Commonwealth agencies', namely the NSW Office of Environment and Heritage, and the Commonwealth's DSEWPaC, over the next two years.

Dedication of land under the *National Parks and Wildlife Act 1974* is one of the means by which the offsets can be effectively managed and protected from clearing in the long term. As such, NPWS is a major stakeholder in the implementation of the Biodiversity Offset Strategy and needs to be closely involved in the selection of lands which may be offered to NPWS.

NPWS is concerned that the EIS makes no mention of the compensatory lands required for the areas of national park and nature reserve that have already been revoked to allow for the project's development. As advised above, the transfer of these lands to RMS is dependent on NPWS being provided with appropriate compensation.

NPWS is further concerned at the scale of the offsets being proposed as part of this project. NPWS does not believe it is feasible for RMS to acquire such large portions of like-for-like habitat. According to the information presented in tables 10-33 and 10-34, the offset target is 3829.26 ha (407.58 ha for clearing in state forest, 3421.68 for other lands), including at least 1643.04 ha of relevant EECs. This figure does not include the compensation for the revocation of lands dedicated under the NPW Act.

It will be impossible to acquire lands sufficient to meet the stated offset target for all vegetation types within 30 kilometres of the project. For example, the offset for Coast Cypress Pine Shrubby Open Forest of the North Coast Bioregion (an EEC) is 129.6 hectares. According to the information in Table C-8 (p.582 of the *Working Paper – Biodiversity*), only 84.5 hectares of this vegetation has been mapped within a 30 kilometre radius of the project area (not including lands that are within the conservation reserve system).

NPWS therefore recommends that the Biodiversity Offset Strategy should be finalised and approved prior to construction commencing. While the offsetting lands identified and purchased under the strategy should be secured as early as possible. Estimates of the likely purchase and management costs, should be included in the project's costings.

Other matters of relevance to NPWS

The mapping of EECs is problematic in some sections of the project area. For example, the paperbark swamp in Yaegl Nature Reserve on pp. 10-59 and 10-60 appears to be mapped as swamp mahogany forest. According to its plan of management (NPWS 2012), a small area in the south-east corner of Mororo Creek Nature Reserve may also be consistent with the federal EPBC Act's critically endangered ecological community listing for littoral rainforest and coastal vine thickets of Eastern Australia – a community which is not mentioned in the EIS.

The absence of some records of threatened fauna in the vicinity of the project area on figures 10-31 to 10-56 is concerning. These include records of Grey-headed Flying-foxes from near Yaegl Nature Reserve or elsewhere near Maclean, records of Spotted-tailed Quolls from near Harwood Bridge and Ferry Park, and an abundance of records from the highway's corridor at Halfway Creek in the vicinity of Yuraygir State Conservation Area (including records for Green-thighed Frog, Little Lorikeet, Glossy Black-cockatoo, Varied Sitella, Brown Treecreeper, Spotted-tailed Quoll, Rufous Bettong and Little Bentwing-Bat). Table 10-10 does not include several species that have been recorded from the project area, including Varied Sitella, Little Lorikeet and Spotted-tailed Quoll (although the latter two are included in Table 10-11). The inclusion of the record of the Emu in Yaegl Nature Reserve is surprising, given it is of low geographical accuracy (10 km) and does not indicate that suitable habitat is present in the nature reserve. The reference to the Black Flying-Fox on p.10-160 is also surprising as it is no longer listed as a vulnerable species under the TSC Act.

References cited:

NPWS (2012) *Mororo Creek Nature Reserve and Chatsworth Hill State Conservation Area Plan of Management.* NSW National Parks and Wildlife Service, part of the Office of Environment and Heritage, Sydney

ATTACHMENT 3 – OEH COMMENTS ON THE EIS FOR THE WOOLGOOLGA TO BALLINA UPGRADE OF THE PACIFIC HIGHWAY – ABORIGINAL CULTURAL HERITAGE VALUES

The Aboriginal Heritage Unit (North East) of the Office of Environment and Heritage (OEH) has received correspondence from the Environment Protection Authority (EPA) and the Department of Planning and Infrastructure (DP&I) regarding the public exhibition of the Environmental Impact Statement prepared by the NSW Roads and Maritime Services (RMS) for the proposed Woolgoolga to Ballina Pacific Highway Upgrade Project (the EIS) located in northern NSW. It is noted that this project is being assessed by the Department of Planning and Infrastructure (DP&I) as a State Significant Infrastructure development application in accordance with the provisions of Part 5.1 of the *Environmental Planning and Assessment Act 1979* (EP&A Act).

A review of the EIS, including Chapter 12, Section 19.6 and the four Aboriginal Heritage Working Papers was undertaken by OEH to assess the potential impacts of the project on Aboriginal cultural heritage, in accordance with OEH's Aboriginal cultural heritage assessment guidelines and the requirements of Part 6 of the *National Parks and Wildlife Act* 1974 (NPW Act).

Aboriginal cultural heritage assessment

OEH acknowledges that the Aboriginal cultural heritage assessment has been undertaken in accordance with the OEH's assessment guidelines. The results of the Aboriginal cultural heritage assessment undertaken for the project area are also acknowledged.

OEH also acknowledges the management measures described in Table 12-22 and in Table 19-5 by RMS in order to manage the likely and potential impact on Aboriginal cultural heritage as a result of the development proposal.

OEH also encourages the proponent to continue to engage with the registered Aboriginal parties in developing and maintaining appropriate cultural heritage outcomes for the life of the proposed development.

Conclusion

OEH has no additional comments in relation to the Aboriginal cultural heritage assessment for the modified project application and recommends that the following conditions of approval for Aboriginal cultural heritage are reflected in any approval conditions for the project.

RECOMMENDED CONDITIONS OF APPROVAL FOR ABORIGINAL CULTURAL HERITAGE

- 1. The proponent must consult with and involve all the registered Aboriginal parties for the project, in the ongoing management of the Aboriginal cultural heritage values. Evidence of this consultation must be collated and provided to the consent authority upon request.
- 2. The proponent must prepare an Aboriginal Heritage Management Plan (AHMP) to detail procedures for managing the Aboriginal cultural heritage values associated with the project area. The AHMP is to be implemented in consultation with the registered Aboriginal parties. The plan must also detail the involvement and responsibilities of the Aboriginal stakeholders in the implementation of all Aboriginal cultural heritage mitigation measures; details of the responsibilities of all other stakeholders; details of all mitigation and management measures (including salvage programs, further investigations/assessments, reporting requirements, etc); procedures for the identification and management of previously unrecorded sites (including human remains); details of an appropriate keeping place agreement with local Aboriginal

community representatives for any Aboriginal objects salvaged through the development process; access arrangements; details of the Cultural Awareness Program for all contractors and personnel associated with construction activities; and compliance procedures in the unlikely event that non-compliance with the AHMP is identified. This process must be undertaken prior to commencing any ground disturbance or development works subject to the development.

- 3. All Aboriginal sites impacted by the project must have an Aboriginal Site Impact Recording (ASIR) form completed and be submitted to the Aboriginal Heritage Information Management System (AHIMS) Register within three months of being impacted.
- 4. If human remains are located, all works must halt in the immediate area to prevent any further impacts to the remains. The NSW Police must be are contacted immediately. No action is to be undertaken until the NSW Police provide written notification to the proponent. If the skeletal remains are identified as Aboriginal, the proponent must contact the OEH's Environment Line on 131 555 and representatives of the local Aboriginal community. No works are to continue until the OEH provides written notification to the proponent.
- 5. A Cultural Awareness Program must be developed for the induction of all personnel and contractors involved in the construction activities on site. Records are to be kept of which staff/contractors were inducted and when for the duration of the project. The program should be developed and implemented in collaboration with the registered Aboriginal parties.

Contact for Aboriginal Cultural Heritage comments is Nick Pulver (02) 6659 8225