



OUT15/15537

24 JUL 2015

Mr Thomas Watt
Planning Office
Resource Assessments
NSW Department of Planning and Environment
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Dear Mr Watt

**Slys Quarry Expansion Project (SSD 6642)
Response to exhibition of Environmental Impact Statement**

I refer to your email dated 20 May 2015 requesting advice from the Department of Primary Industries (DPI) in respect to the above matter.

Comment by Fisheries NSW

The footprint of the proposed does not directly impact on any areas of key fish habitat although it should be noted that the endangered fish species Oxleyan Pygmy Perch is known to occur in the Tabbimoble catchment downstream of the Pacific Highway. It is possible that the species could occur in reaches further upstream closer to the proposal. Strict adherence to sediment and erosion control and water quality parameters is recommended to minimise impacts on aquatic biodiversity.

For further information please contact Patrick Dwyer, Acting Regional manager Aquatic Ecosystems (North), Fisheries on (02) 6626 1397 or at Patrick.dwyer@dpi.nsw.gov.au.

Comment by NSW Office of Water

The NSW Office of Water (Office of Water) has reviewed the Environmental Impact Statement (EIS) for the Slys Quarry Expansion Project and provides our comments below.

Groundwater Management:

Aquifer Interference Assessment:

The applicant has demonstrated a sound knowledge of the Aquifer Interference Policy and has provided a section of the report detailing this. The following are comments from the report with respect to this:

The NSW AIP requires that potential impacts on groundwater sources, including their users and GDEs, be assessed against minimal impact considerations, outlined in Table 1 of the Policy. If the predicted impacts are less than the Level 1 minimal impact considerations, then these impacts will be considered as acceptable.

The level 1 minimal impact considerations for Less Productive Fractured and Porous and Fractured Rock Groundwater Sources have been adopted for this groundwater impact assessment and are as follows.....etc

Overall, the search of the NSW Groundwater Bore Database indicated that there is limited groundwater reliance and usage of the porous and fractured rock aquifer for domestic and stock purposes in the vicinity of the site. Based on the low yields reported, the porous and fractured rock aquifer is considered to be a less productive groundwater source under the NSW AIP.

The Office of Water's assessment of the development concurs with these comments and as such this proposal is compatible with the Aquifer Interference Policy (AIP).

Proposed Mitigation Measures:

As it has been identified that the quarry will not receive groundwater inflows, a water quality management plan has been developed specifically for surface water management and will be included as part of the Environment Protection Licence.

There are no proposed mitigation measures with respect to groundwater other than relating to monitoring within the alluvial material, being:

If an unexpected change in groundwater level or quality is recorded, that is outside natural variability, then an investigation should be undertaken to determine if the change in level or quality is due to the quarry operations.

The Office of Water believes that this proposal should be developed further and as such is reflected in the recommendations section of this document.

It should also be noted that licensing mitigation measures should be included in that, should any unforeseen discharges from the quarry face or floor become evident over time, a licence shall be obtained to cover the volume of potential discharge.

Groundwater Monitoring:

No groundwater monitoring is proposed within the hard rock. This is acceptable to the Office of Water for this proposal.

Monitoring is proposed within the adjacent alluvium to ensure the quarry does not have an impact on alluvial water levels and subsequent surface water systems. The monitoring proposed is lacking in water level threshold values, contingency measures, and reporting. Details of the Office of Water's requirements are reflected in the recommendations section of this report.

Water Licensing:

As there is no take of groundwater either actively or passively, there is no requirement for licences for the proposed development.

In the event that sustained groundwater flows are encountered at the site, a groundwater licence will be required. This is reflected in our recommendations.

Conclusions:

The groundwater assessment undertaken is based on the regional geological conditions as determined by information from regional bores, including water

bearing zones and SWLs. It is expected that the local groundwater at the site would be comparable to these regional conditions and therefore contain deep standing water levels. This, along with the presence of relatively steep topography, and absence of groundwater seeps / discharges to the current quarry floor (which is currently at the level of the proposed quarry floor), indicates that minimal impact is expected on groundwater.

Groundwater Recommendations:

1) Should any unforeseen groundwater discharges from the quarry face of floor become evident over time, a licence shall be obtained to cover the volume of potential discharge.

2) A groundwater management plan shall be developed to manage the potential dewatering impacts, if any, on the alluvium (and subsequent reliant surface water features) adjacent to the proposed quarry extent, as a result of the final quarry floor being below the reported water level in the alluvium. This plan shall set out a monitoring regime with a minimum of 3 monitoring bores with automatic water level recording instrumentation, and identify;

- a methodology for determining threshold water level criteria,
- contingency measures should there be a breach of thresholds, and
- Reporting.

Surface Water Management:

Currently, dirty water within the works area, the pit floor and the stockpiled areas discharges to a sediment basin, which then overflows to the main sediment basin on the site. Three smaller basins capture runoff from the site office, weighbridges, wash plant and other outbuildings. These basins discharge to the main sediment basin on the site.

The main sediment basin will be increased to enable the containment of increased runoff due to the increased footprint of the quarry. Apart from this the management of surface water on the site appears to remain the same as the current operations.

The EIS outlines a number of potential impacts to surface water as a result of the project including potential contamination from a chemical spillage, increased runoff volumes, erosion and sedimentation issues and potential water quality issues, including increased TP and TN concentrations.

Section 5.2.4 of the EIS outlines a number of mitigation measures to manage the potential impacts on surface water identified as a result of the project expansion such as erosion and sediment control measures, bunded areas for cleaning and maintenance, the capture of dirty water in sediment basins and surface water monitoring. The Office of Water considers these proposed mitigation measures should be incorporated into the conditions of consent, if the project is approved.

For further information please contact Christie Jackson, Water Regulation Officer (Tamworth) on 02 6701 9652 or at christie.jackson@dpi.nsw.gov.au.

Yours sincerely



Kristian Holz

Policy, Legislation and Innovation