



Watermark Coal Project— Frequently Asked Questions

How will water resources be protected?

The project has been approved under national environmental law subject to 18 of the strictest conditions in Australian history, which fully implement the advice of the Independent Expert Scientific Committee on Coal Seam Gas and Large Coal Mining Development (IESC).

The Australian Government's conditions protect water resources by ensuring that:

- the Commonwealth Environment Minister can stop the mine operation if impacts are greater than those approved (*Australian Government condition 5c*)
- the mine does not have a bigger impact than predicted in modelling (*Australian Government condition 2; NSW condition 25 (Schedule 3)*)
- water cannot be released into the environment from the mine (*Australian government condition 2; NSW condition 24 (Schedule 3)*)
- the mine has enough water and licences to cover the maximum amount of water that may be needed to operate the mine (*Australian Government condition 2; NSW conditions 21, 22 (Schedule 3)*)
- there is comprehensive monitoring and reporting on groundwater so that any unforeseen impacts are identified early and fixed before any farmer is affected (*Australian Government conditions 2, 5; NSW condition 26c(iv) (Schedule 3)*)
- a secure water supply is immediately provided to landowners if any agricultural water supply is affected by the mine (*Australian Government condition 2; NSW condition 23 (Schedule 3)*)
- the community can raise any concerns about the mine's operation through a Community Consultative Committee (*Australian Government conditions 2, 5f; NSW condition 6 (Schedule 5)*)
- work cannot begin on the southern mining pit for at least a decade. It must first be proven that the groundwater predictions are correct, using over a decade of real information (*Australian Government conditions 2, 7; NSW condition 27 (Schedule 3)*)
- ecosystems that rely on groundwater are protected (*Australian Government condition 5e*)
- water from the mine does not enter the surrounding environment after mining is complete (*Australian Government conditions 2, 8a, 8b; NSW condition 53 (Schedule 3)*).

How do you know the modelling is right?

A panel of the nation's best water experts (the IESC), as well as four other expert reviewers, have reviewed the water modelling. They have all said that the modelling is robust and can be relied on to predict any impacts on water. They also said actual impacts on groundwater are likely to be smaller than what has been predicted.

Even so, the approval puts strict conditions in place to make sure that no unexpected impacts occur. These include monitoring to improve models and update predictions over the life of the project (*Australian Government conditions 2, 5, 6, 7*).

How will monitoring ensure water resources are protected?

Sites close to the mining pits will be scientifically monitored for impacts, to ensure early detection of any differences between what has been predicted and approved, and what happens as the mine operates.

The Water Management Plan will set out different trigger levels, which if reached, require immediate response from the mine operators (*Australian Government condition 5c*):

1. **Investigation trigger**—investigate the cause of the issue.
2. **Corrective action trigger**—rectify the issue and prevent any further impacts.
3. **Cease work trigger**—an **absolute limit on water drawdown** which cannot be exceeded. If this limit is reached, the Commonwealth Environment Minister can direct the mine to stop all activities that are contributing to the problem (*Australian Government conditions 2, 5, 6, 7*).

Will the mine take water from agriculture?

No. Most of the water used by the mine is from deep aquifers, which are not suitable for agriculture. Only a small portion of the mine's water will come from aquifers which are used for agriculture.

The total water use for the mine is less than 0.09 per cent of available groundwater in the region, of which only an average of 33 megalitres per year—less than one agricultural bore—will be drawn from water suitable for agriculture.

Farmers have worked hard to reduce water use in the Namoi and ensure there is enough available for a sustainable industry and a healthy environment, through the Namoi Water Sharing Plan. This project will not affect these savings or rely on any water available through the community's hard work and investment.

The strict approval conditions will ensure that impacts on groundwater are not any greater than predicted.

If there is an unforeseen impact resulting in any of the mine operations affecting a farmer's water supply, the mine must immediately provide an alternative water supply to the farmer (*Australian Government condition 2; NSW Condition 23 (Schedule3)*).

Will the mine impact on salinity?

The IESC has advised that the mine will have a negligible impact on salinity across the region. The approval conditions require that there are no significant impacts to salinity at a local scale and that any changes to salinity are measured during mining.

The mine's predicted impact on salinity must be updated every three years to ensure that this remains the case (*Australian Government condition 2; NSW condition 26 (Schedule 3)*).

What about cumulative impacts from other mines?

The Australian Government is funding a Bioregional Assessment of the Namoi region to better understand cumulative impacts on water from coal mines and coal seam gas operations. The assessment, which includes 13 separate reports, is being prepared by CSIRO, the Department of the Environment, the Bureau of Meteorology and Geoscience Australia. So far, four reports have been completed and this information has been used to inform the assessment and approval conditions of this project. These are publicly available at www.bioregionalassessments.gov.au/bioregions/nic.shtml

Mining cannot start in the southern mining pit until the predicted impacts on groundwater have been updated with more than 10 years of actual groundwater data (*Australian Government conditions 2, 7; NSW condition 27 (Schedule 3)*), as well as the findings of all of the reports from the Bioregional Assessment. A verification report must be approved by the Commonwealth Environment Minister. If the impacts are predicted to be bigger than those approved, mining cannot start in this area.

Will the project impact on the Murray-Darling Basin?

No. The mine's water must be licensed by the NSW Government, like any other water user. In NSW water is managed under the NSW *Water Management Act 2000* and NSW *Water Act 1912*. Water sharing plans are used to manage surface and groundwater and set long term average annual extraction limits.

Will the mine impact on the Great Artesian Basin?

The IESC has confirmed that there won't be any impacts from the mine on groundwater in the Great Artesian Basin.

How will biodiversity be protected?

More than 7000 hectares of native vegetation will be protected to compensate for impacts on native species and habitat clearing (*Australian Government conditions 1, 9; NSW conditions 28, 29, 30, 33, 34 (Schedule 3)*). In addition, once mining is finished, the site must be rehabilitated to restore the woodlands (*NSW condition 28 (Schedule 3)*).

All potential impacts on native species have been thoroughly assessed. Wherever possible, impacts to the environment have been avoided or reduced. Where impacts cannot be avoided, strict conditions have been put in place. The amount of land clearing on the site has been strictly limited and will only happen when it is needed (*Australian Government condition 3*).

A Biodiversity Management Plan must be prepared and approved by the Minister before any work can begin. The plan must outline measures to protect biodiversity and control weeds and feral animals (*Australian Government condition 4*).

Did the Australian Government assessment consider Koalas?

Under environmental law, the NSW Government has full authority to consider non-EPBC listed species, including Koalas, which were not a nationally-listed species when the Commonwealth assessment started. This assessment has been done to the full extent of the law and these species are protected (*NSW conditions 31, 32, 35, 36*).

How will we know conditions are being met?

Compliance and enforcement officers from the Australian Government Department of the Environment will closely monitor operation of the mine to ensure the conditions of approval are met.

What are the next steps?

Further steps are required before mining can start. The NSW Government must consider whether to issue a mining lease under the NSW *Mining Act 1992*. The Commonwealth Environment Minister must first approve the following plans:

- A **Water Management Plan** which will set out rigorous monitoring and annual reporting requirements to determine the actual impacts on water and what needs to be done if there are any differences between predicted and actual results (*Australian Government condition 5*).
- A **Water Impact Verification Report** which requires more than a decade of monitoring results to confirm that the impacts of mining in the southern area are no greater than those predicted. This report will also consider the cumulative impacts on water resources from other projects and industries in the region. If the data shows impacts would be greater than originally predicted, mining cannot commence in the southern area (*Australian Government condition 7*).
- A **Rehabilitation Management Plan** which sets out how the mine will be rehabilitated into a safe, stable and non-polluting site. It will detail how native vegetation will be re-established and how water that may accumulate in the final pit, which will remain open, will be prevented from entering the surrounding environment (*Australian Government condition 8*).

What role does the Australian Government play in approving the project?

Different levels of government play different roles in making decisions about projects. The **role of the Australian Government** is to make decisions on nationally protected matters, such as threatened species and impacts on water resources from large coal mining development. The NSW Government has a broader role and makes decisions on a wider range of environmental issues including noise and dust, water use and licensing, impacts on Aboriginal sites, visual impacts, and impacts to agricultural land.

The *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act) is the Australian Government's key piece of environmental legislation.

Under the EPBC Act, the Australian Government makes decisions about nationally protected matters. The Australian Government's approval of this mine focussed in particular on:

- protection of water resources from large coal mining development
- nationally protected plants and animals
- nationally protected migratory species.

How has this project been assessed?

The project was assessed using a rigorous assessment process under national environmental law—the *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act).

This assessment was based on the best available scientific information, including two sets of advice from the IESC, ensuring that potential impacts on water resources were completely understood. Importantly, all of the IESC's advice has been fully implemented in the approval conditions.

How has the community been engaged during the assessment?

Community feedback has informed the assessment and approval conditions for the project. Both the NSW and the Australian governments have engaged with the community and sought comment on the project throughout the assessment:

- November 2011—the EPBC referral was published for public comment—32 submissions were received.
- February – April 2013—during the NSW assessment process, submissions were sought on the Environmental Impact Statement for two months, and 133 submissions were received.
- December 2014—the NSW Planning Assessment Commission held a meeting in Gunnedah, NSW, to hear public views. A total of 58 speakers presented at the meeting.

The Commonwealth Environment Minister visited the Liverpool Plains in February 2015 and listened to community concerns, including those of farmers and Indigenous leaders. He considered those concerns as he made his decision, specifically seeking independent expert advice about any impact the project would have on the region's critically important agricultural water supply.

What is the Watermark Coal Project?

The Watermark Coal Project is an open-cut coal mine located approximately 3 kilometres west of Breeza and 25 kilometres south-east of Gunnedah in New South Wales. The project is located on ridge country around Mt Watermark above (but not on) the black soil plains.

How many jobs will be created?

The project will deliver \$1.3 billion to the Australian economy each year through construction of local infrastructure and purchasing mining equipment, and directly employ up to 600 people. Most of the benefits will flow to the local economy, including a boost of \$902 million in annual regional output or business turnover.

© Commonwealth of Australia, 2015.



This fact sheet is licensed by Commonwealth of Australia under a Creative Commons Attribution 4.0 Australia licence.