

# Statement of Reasons for a Decision on Controlled Action Under the *Environment Protection and Biodiversity Conservation*Act 1999

I, KIM FARRANT, Assistant Secretary, Department of Climate Change, Energy, the Environment and Water, delegate for the Minister for the Environment and Water, provide the following statement of reasons for my decision of 20 February 2023, under section 75 of the *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act), that the proposed action by Hazelwood Power (the proponent) to rehabilitate the Hazelwood Mine by creating a lake within the mine void and to decommission redundant infrastructure at the Hazelwood Mine, near Morwell, Victoria (EPBC Act referral 2022/09239), is a controlled action under the EPBC Act, for which the controlling provisions are:

- Ramsar wetlands (sections 16 & 17B);
- Listed threatened species and communities (sections 18 & 18A);
- Listed migratory species (sections 20 & 20A); and
- A water resource, in relation to a large coal mining development or coal seam gas development (sections 24D & 24E).

# Legislation

Section 68 (Referral by person proposing to take action) of the EPBC Act relevantly provides:

- 1) A person proposing to take an action that the person thinks may be or is a controlled action must refer the proposal to the Minister for the Minister's decision whether or not the action is a controlled action.
- A person proposing to take an action that the person thinks is not a controlled action may refer the proposal to the Minister for the Minister's decision whether or not the action is a controlled action.

Section 74 (Inviting provision of information on referred proposal) of the EPBC Act relevantly provides:

Inviting other Commonwealth Ministers to provide information

- 1) As soon as practicable after receiving a referral of a proposal to take an action, the Environment Minister must:
  - a) inform any other Minister whom the Environment Minister believes has administrative responsibilities relating to the proposal; and
  - b) invite each other Minister informed to give the Environment Minister within 10 business days information that relates to the proposed action and is relevant to deciding whether or not the proposed action is a controlled action.

Inviting comments from appropriate State or Territory Minister

- 2) As soon as practicable after receiving, from the person proposing to take an action or from a Commonwealth agency, a referral of a proposal to take an action in a State or self-governing Territory, the Environment Minister must, if he or she thinks the action may have an impact on a matter protected by a provision of Division 1 of Part 3 (about matters of national environmental significance):
  - (a) inform the appropriate Minister of the State or Territory; and
  - (b) invite that Minister to give the Environment Minister within 10 business days:
    - (i) comments on whether the proposed action is a controlled action; and
    - (ii) information relevant to deciding which approach would be appropriate to assess the relevant impacts of the action (including if the action could be assessed under a bilateral agreement).

#### Inviting public comment

- 3) As soon as practicable after receiving a referral of a proposal to take an action, the Environment Minister must cause to be published on the internet:
  - (a) the referral; and
  - (b) an invitation for anyone to give the Minister comments within 10 business days (measured in Canberra) on whether the action is a controlled action.

Section 75 (Does the proposed action need approval?) of the EPBC Act relevantly provides:

Is the action a controlled action?

- 1) The Minister must decide:
  - (a) whether the action that is the subject of a proposal referred to the Minister is a controlled action; and
  - (b) which provisions of Part 3 (if any) are controlling provisions for the action.
- 1AA) To avoid doubt, the Minister is not permitted to make a decision under subsection (1) in relation to an action that was the subject of a referral that was not accepted under subsection 74A(1).

Minister must consider public comment

- (1A) In making a decision under subsection (1) about the action, the Minister must consider the comments (if any) received:
  - (a) in response to the invitation under subsection 74(3) for anyone to give the Minister comments on whether the action is a controlled action; and
  - (b) within the period specified in the invitation.

#### Considerations in decision

- 2) If, when the Minister makes a decision under subsection (1), it is relevant for the Minister to consider the impacts of an action:
  - a) the Minister must consider all adverse impacts (if any) the action:
    - (i) has or will have; or
    - (ii) is likely to have;

on the matter protected by each provision of Part 3; and

- b) must not consider any beneficial impacts the action:
  - (i) has or will have; or
  - (ii) is likely to have;

on the matter protected by each provision of Part 3.

#### Timing of decision and designation

5) The Minister must make the decisions under subsection (1) and, if applicable, the designation under subsection (3), within 20 business days after the Minister receives the referral of the proposal to take the action.

## **Background**

#### **Description of the proposed action (including location)**

- 1. The proposed action is to rehabilitate the Hazelwood Mine by creating a lake within the mine void with a relative level of +45 m Australian Height Datum (AHD), and decommission redundant infrastructure at the Hazelwood Mine, near Morwell, Victoria.
  - a. Currently, groundwater underneath the mine void needs to be continually pumped to prevent ground heave, which is caused by the removal of overburden to expose the coal seams.
  - b. The proposed mine lake would provide for ongoing safety and stability of the mine void, remove the requirement for ongoing groundwater pumping into perpetuity, minimise fire risk in the coal seam, and provide opportunities for future land uses.
- 2. The key works include:
  - Filling of the mine void using groundwater, surface water and any other approved water sources.
  - Diverting the already diverted Morwell River into the mine void from the southwest and constructing an outflow to the northeast of the mine void, to direct outflows into the Latrobe River.
  - Final rehabilitation and reprofiling works on the upper mine batters (i.e., above the surface of the proposed mine lake).
  - Final decommissioning and drainage of the Hazelwood Cooling Pond (HCP) and restoration of the natural alignment of Eel Hole Creek.

- Decommissioning remaining redundant infrastructure, such as roads, car parks, buildings, pumphouses on the HCP and the Saline Water Outlet Pipeline.
- Construction and operation of infrastructure necessary to maintain lake depth and water quality following completion of fill.
- Groundwater will be extracted under the proponent's existing groundwater license at a rate of 17-19 GL per year. Bulk surface water has been commercially secured and is anticipated to be available for up to 24.5 GL per year, or under drier conditions, a minimum of approximately 8 GL per year.
- 4. Approximately 650 GL is required to fill the lake to the desired level. Based on the indicative annual volumes likely to be available from these water sources, it is estimated that the filling period is between 10 and 20 years.
- 5. Following completion of filling, the mine lake will be reconnected to the Morwell River. This would involve re-diverting the Morwell River into the mine void in the south-west and constructing an outflow in the north-east of the mine void back into the Morwell River.
- 6. Significant earth works have already been undertaken within the mine under existing approvals. Remaining earthworks include reprofiling coal and overburden batters above the final mine lake level to a geotechnically stable batter profile.

#### Description of the environment

- 7. The project area covers approximately 4,000 ha and is located within the Gippsland Plain Bioregion of Victoria. This bioregion extends east from Melbourne to Lakes Entrance and includes the Mornington Peninsula and South Gippsland.
- 8. The project area reflects its historic use as an open cut coal mine and surrounding agriculture uses. Nevertheless, the project area contains some scattered and isolated patches of remnant native vegetation. The areas of remnant native vegetation vary in condition from good to patches of trees with a completely exotic understory. The site includes areas of pasture which include some mature, hollow-bearing trees.
- 9. There are several watercourses within and surrounding the project area that have been subject to diversions in the past to facilitate mining activities. Eel Hole Creek located to the south of the project area, flows from east to west where it contributes flows to the Morwell River.
- 10. Prior to joining the Morwell River, Eel Hole Creek is dammed to form the HCP, which was previously used for cooling the Hazelwood Power Station, and for storing water from the mine that was accumulated during the mining process. The HCP receives flows from an inlet on the southeast, and an outlet channel releases water back into Eel Hole Creek at the Eel Hole Creek diversion channel, on the northwest side of the HCP.
- 11. The diverted Morwell River is located on the western side of the mine void flowing from south to north, where it contributes flows to the Latrobe River located to the north of the project area. The Latrobe River flows predominately eastward from the project area where it terminates at the Lower Latrobe Wetlands and Lake Wellington, which are two components of the Gippsland Lakes Ramsar site, approximately 50 km downstream.

12. There are two groundwater aquifers that exist underneath the mine void, the M1 and M2 groundwater aquifers. A series of groundwater pumps depressurise the M1 and M2 groundwater aquifers beneath the mine void and maintain the geotechnical stability of the mine void.

#### Referral, consultation and decision

- 13. A referral was received by the department on 5 July 2022. The action was referred by Hazelwood Power (ABN: 40 924 759 557), who stated in the referral their belief that the proposal is a controlled action for the purposes of the EPBC Act.
- 14. In accordance with section 74(3) of the EPBC Act, the referral was published on the department's website on 5 July 2022, and public comments were invited for a period of 10 business days.
- 15. Also on 5 July 2022, in accordance with section 74(1) of the EPBC Act, comments on the referral were invited for a period of 10 business days from Commonwealth Ministers having administrative responsibilities relating to the proposed action.
- 16. Also on 5 July 2022, in accordance with section 74(2) of the EPBC Act, comments on the referral were invited for a period of 10 business days from relevant State Ministers.
- 17. On 1 August 2022, the department republished the referral, and reconsulted with relevant Ministers due to an error in the original publication that resulted in an incomplete referral being published:
  - a. In accordance with section 74(3) of the EPBC Act, the referral was published on the department's website on 1 August 2022 and public comments were invited for a period of 10 business days (until 15 August 2022).
  - b. Also on 1 August 2022, in accordance with section 74(1) of the EPBC Act, comments on the referral were invited for a period of 10 business days (until 15 August 2022) from the following Commonwealth Ministers having administrative responsibilities relating to the proposed action:
    - Madeleine King MP, Minister for Resources and Northern Australia
    - The Hon Linda Burney MP, Minister for Indigenous Australians
    - The Hon Chris Bowen MP, Minister for Climate Change and Energy
    - Senator the Hon Murray Watt, Minister for Agriculture, Fisheries and Forestry.
  - c. Also on 1 August 2022, in accordance with section 74(2) of the EPBC act, comments on the referral were invited for a period of 10 business days (until 15 August 2022) from the following delegate of the State Minister:
    - Dr Bruce Abernethy, delegated contact for the Victorian Minister for Planning, Ms Lizzie Blandthorn MP.
- 18. On 12 August 2022, I requested additional information from the proponent under section 76(1) and 76(2) of the EPBC Act, to enable me to determine whether the action is a controlled action (such that it must be assessed under the EPBC Act) and, if so, which provisions are controlling provisions, and whether the action is a component of a larger action.

- 19. On 21 September 2022 and 6 October 2022, the proponent provided further information which addressed the additional information request.
- 20. On 20 February 2023, I determined under section 75 of the EPBC Act, that the proposed action was a controlled action. On the same day, I also decided to accept the referral under section 74A of the EPBC Act.

# Evidence or other material on which my findings were based

21. My decision under section 75 of the EPBC Act was based on the referral decision brief prepared by the department (that I signed on 20 February 2023) which had the following attachments:

Attachment A1	Referral main document
Attachment A2	Referral Attachment 1 - Figures
Attachment A3	Referral Attachment 2 - Timeline of key works and approvals
Attachment A4	Referral Attachment 3 - Concept master plan
Attachment A5	Referral Attachment 4 - Preliminary ecology report
Attachment A6	Referral Attachment 5 - Preliminary heritage report
Attachment B	Environmental Reporting Tool (ERT) results, run on 9 December 2022 and covering an area within 5 km of the proposed action
Attachment C1	Comments from Victorian Department of Environment, Land, Water and Planning (DELWP)
Attachment C2	Comments from Geoscience Australia
Attachment C3	Email from DELWP, confirming that the Bilateral agreement can apply to the project
Attachment C4	Comments from National Indigenous Australians Agency
Attachment D1	Comments from Environmental Justice Australia (main document of consolidated comments)
Attachment D2	Comments from Environmental Justice Australia (additional information)
Attachment D3	Consolidated list of public comments including contents of those comments
Attachment D4	Attachment to public comment 36
Attachment D5	Attachment to public comment 1
Attachment E1	Fee schedule without justification
Attachment E2	Fee schedule with justification
Attachment F	Decision notice
Attachment G1	Letter to proponent
Attachment G2	Letter to DELWP
Attachment G3	Letter to Minister for Agriculture, Fisheries and Forestry
Attachment G4	Letter to Minister for Indigenous Australians
Attachment G5	Letter to Minister for Climate Change and Energy
Attachment G6	Letter to Minister for Resources and Northern Australia
Attachment H	Line advice from the Office of Water Science
Attachment I	Line advice from the Commonwealth Environmental Water Office
Attachment J	Gippsland Lakes Ramsar Site ecological character description
Attachment K	Approval decision notice for EPBC 2002/903
Attachment L1	Stop clock letter - Request for additional information
Attachment L2	Additional information provided by proponent 21 September 2022
Attachment L3	Additional information provided by proponent 21 September 2022 – Annexure 1
Attachment L4	Additional information provided by proponent 21 September 2022 – Annexure 2
Attachment L5	Additional information provided by proponent 21 September 2022 – Annexure 3
Attachment L6	Additional information provided by proponent 21 September 2022 – Annexure 4
Attachment L7	Additional information provided by proponent 21 September 2022 – Annexure 5
Attachment L8	Additional information provided by proponent 6 October 2022
Attachment M	ENGIE email of acknowledgement of receipt of EJA submission

#### Information provided by the proponent

- 22. The information provided by the proponent to inform the decision included the referral information (published on the internet on 1 August 2022), and the following:
  - Additional information from the proponent provided on 21 September 2022, consisting of:
    - Details about the groundwater pumping infrastructure used to de-water the mine void to prevent ground heave, block sliding and batter instability.
    - Details about water circulation within the Hazelwood mine.
    - Details of how the Hazelwood Cooling Pond (HCP) has been used in relation to mine operations, and since operational mine closure in March 2017, and how the proponent intends to decommission the HCP.
    - General information about the Hazelwood mine history and operations, and the scope of the referral.
    - A detailed description of previously completed works, including: the demolition of Hazelwood Power Station; removal of redundant mining infrastructure; batter re-profiling and construction of stability surcharges; construction of Morwell River flood diversion infrastructure; and environmental remediation.
    - A detailed description on operationally required activities, including: the dewatering of M1 and M2 aquifers; hydrogeological and geotechnical movement monitoring and reporting; ongoing operation and maintenance of Morwell River flood diversion infrastructure; management of the HCP; and other monitoring and maintenance activities across the Hazelwood site.
    - A detailed discussion of future works, including: filling the Hazelwood Mine void with water; batter re-profiling and surcharge construction works; final decommissioning and drainage of the HCP; decommissioning of remaining redundant infrastructure; construction of interconnection infrastructure between the mine lake and the Morwell River.
    - A list of historical bores at the site, and a table of historic groundwater extraction from the M1 and M2 aquifers.
    - Aerial images of the site with some bore locations, and fire service network engineering plans.
  - Additional information from the proponent provided on 6 October 2022, consisting of an email outlining the following clarification:
    - The historical use of water from the Hazelwood Cooling Pond (HCP) included storing treated mine wastewater which was reused for mine operations.
    - O That decommissioning of operational groundwater pumps used to dewater the M1 and M2 aquifers is not part of the referred action because they are likely to remain in service for at least 10 years following the completion of mine fill, and that the proponent is not seeking approval for bore water decommissioning as part of the referral.

Line Advice from within the department

- 23. Line advice attached to the brief and used to inform my decision included the following:
  - Advice from the Office of Water Science (OWS) (dated 21 July 2022), which included:
    - o An overview of the action's impacts on water resources.
    - The outlining of concerns by OWS that much of the presented information remains at a high level and that more detailed analysis and interpretation is required.
    - OWS advising that it had not been able to conduct a detailed review of all the associated technical documents currently available as part of the *Latrobe Valley Regional Rehabilitation Strategy*.
    - OWS noting its surprise that sourcing water from the Wonthaggi desalination plant, only
       100km away, does not appear to have been considered.
    - Discussion on the likely nature and extent of impacts to the hydrology and water quality of nearby water assets.
    - Discussion on the likely nature and extent of impacts to the groundwater hydrology of the surrounding environment.
    - Discussion on the likely nature and extent of impacts to EPBC Act protected matters that rely on nearby water assets for habitat.
  - Advice from the Commonwealth Environmental Water Office (undated), which included:
    - o An overview of the action's impacts on water resources including downstream impacts.
    - A discussion of the location of the site in relation to Ramsar sites including the Gippsland Lakes Ramsar site.
    - A detailed description of the Gippsland Lakes Ramsar site including the criterion that contributed to the listing of the wetland as a Ramsar site.
    - A discussion of whether the there is a real chance or possibility that the proposed action will result in: areas of the wetland being destroyed or substantially modified; a substantial and measurable change in the hydrological regime of the wetland; the habitat or lifecycle of native species dependent upon the wetland being seriously affected; a substantial and measurable change in the physico-chemical status of the wetland; or an invasive species that is harmful to the ecological character of the wetland being established or encouraging the spread of existing invasive species.
    - A conclusion that in the absence of detailed information, including on suitable
      alternatives to the use of freshwater, surface and groundwater impacts and mitigation
      strategies, that there is a real possibility that there will be an adverse impact on the
      ecological character of the Gippsland Lakes Ramsar site as a result of the proposed
      action.

#### Comments from the public

- 24. In making my decision under section 75(1) of the EPBC Act, I was required to consider comments to the Minister (if any) received in response to the invitation under subsection 74(3), and within the period specified in the invitation, on whether the proposed action was a controlled action.
- 25. A total of 36 public submissions were received on the referral during the public comment period. The content and attachments to all public comments were attached to the decision brief.
- 26. The following relevant matters were specifically raised and summarised in the decision brief:
  - Flooding the mine void may have an impact on local climate.
  - The filling of the mine void will have an impact on the local farming economy that depends on the Latrobe Valley River systems.
  - Rehabilitating the mine void by filling it with water is not a responsible option for rehabilitation.
  - Water allocation may be unfairly distributed, and certainty should be provided to other water users that this will not occur.
- 27. A public comment was received from Environmental Justice Australia. The submission outlined the reasons the department should consider the proposed action as integral to coal mining, including:
  - The proponent is required to rehabilitate the Hazelwood Mine under existing obligations imposed by relevant state regulators, including:
    - a. work cannot commence under a mining license unless the licensee has an approved 'work plan', which must include a plan for rehabilitation; and
    - b. rehabilitation of the mine is required under the proponent's current mining license (MIN5004) under the *Mineral Resources* (Sustainable Development) Act 1990 (Vic) in order for the proponent to discharge its liabilities for the site.
- 28. The submission by Environmental Justice Australia also noted that the proposed action is likely to have a significant impact to:
  - Ramsar wetlands (sections 16 & 17B);
  - b. Listed threatened species and communities (sections 18 & 18A);
  - c. A water resource, in relation to coal seam gas development and large coal mining development (sections 24D & 24E); and
  - d. Listed migratory species (sections 20 and 20A).
- 29. I considered all of the public comments in making my decision under sections 75 of the EPBC Act.

#### Comments from Commonwealth Ministers

- 30. Responses were received from the following Commonwealth Ministers or their delegates. The responses were summarised in the decision brief, and also attached to the brief:
  - On 12 August 2022, a response was received from the National Indigenous Australians
    Agency on behalf of the Minister for Indigenous Australians, the Hon Linda Burney MP.
    Matters raised included the development of a Cultural Heritage Management Plan,
    consultation with Traditional Owners, and employment of Indigenous peoples.
  - On 15 August 2022, the department received a response from Geoscience Australia on behalf of Madeleine King MP, Minister for Resources and Northern Australia. The response stated that on the basis of the department's Significant Impact Guidelines 1.3: Coal seam gas and large coal mining development – impacts on water resources (December 2013), the proposed action does not engage the water trigger.
    - I noted that this response did not take into account the new guidance in the
       Significant Impact Guidelines 1.3: Coal seam gas and large coal mining development
       – impacts on water resources (August 2022). I considered relevant information from
       the new guidance in making a decision regarding whether the water trigger was
       engaged.
- 31. No response was received from any other Commonwealth Ministers.

#### Comments from State/Territory Ministers

- 32. On 16 August 2022, the Victorian Department of Environment, Land, Water and Planning responded noting the following:
  - a. The proposed action is likely to have a direct impact to the Gippsland Lakes Ramsar site, given the number of waterways intersecting the project area and contribution of freshwater flows from the Latrobe River.
  - b. The proposed action is highly unlikely to have a significant impact on River Swamp Wallabygrass, Strzelecki Gum, Australasian Bittern, or the Australian Grayling. I noted that this determination by the state on the likely significance of the impact did not take into account downstream impacts.
  - c. The Gippsland Red Gum (Eucalyptus tereticornis subsp. mediana) Grassy Woodland and Associated Native Grassland ecological community, Matted Flax-lily, and Dwarf Galaxias are likely to be significantly impacted, or require further investigation and surveys to determine significance.
  - d. Insufficient information was provided to assess the effectiveness of any proposed avoidance and mitigation measures.
  - e. Further investigation into potential water sources and volumes is required.
  - f. The proposed project is likely to have cumulative impacts that extend regionally and require assessment and consideration in the project design.

- g. The project should take into consideration the effects of the Project on the environmental values of surface water environments and potential changes in water flows and water quality.
- The bilateral agreement can apply for this project. The accredited assessment pathway would be the Environmental Effects Statement under the *Environment Effects Act 1978* (Vic).
- i. Other comments in relation to Indigenous and European cultural heritage were provided, however, were not relevant to my decision.

# Findings on material questions of fact

#### Referral of a larger action

- 33. Before determining whether the proposed action was a controlled action, I considered whether it was a component of a larger action that ENGIE Australia proposed to take, and if so, whether I should decide not to accept the referral of the proposed action pursuant to the discretion under section 74A(1) of the EPBC Act.
- 34. The proponent was not presently seeking approval for the decommissioning of the operational groundwater pumping infrastructure. It was therefore necessary for me to consider whether the proposed action was part of a larger action, which would include decommissioning the groundwater pumping infrastructure and other elements of the mine site decommissioning and rehabilitation.

#### Decommissioning of groundwater pumping infrastructure

- 35. I noted that there are a series of groundwater pumps in the project area that are being used to pump groundwater to depressurise underlying groundwater aquifers to maintain stability of the mine void. Once the water level of the proposed lake is high enough, the pressure of the water on the floor of the lake will be sufficient to maintain the stability of the mine void and therefore end the need for continual groundwater pumping. The proponent stated that the groundwater pumps are likely to remain operational for at least 10 years following the completion of filling the lake:
  - a. as a possible source of future top-up water;
  - b. to enable any future necessary aquifer depressurisation to readily occur; and
  - c. as a possible element of the proponent's aftercare and management plan to be developed and approved under relevant Victorian legislation and regulations.
- 36. I noted that the groundwater pumps will then be decommissioned, and I considered that the filling of the lake would facilitate the decommissioning process. I noted that the proponent is not seeking approval for decommissioning the groundwater pumps and therefore the decommissioning of the groundwater pumps is not part of the proposed action.
- 37. I considered that the proposed action (which is the subject of the current referral) could be considered as a separate action from the decommissioning of the groundwater pumps) because:
  - a. the proposed action can stand-alone;

- the proposed action does not depend on the decommissioning of the groundwater pumps and the decommissioning of groundwater pumps does not depend on the proposed action (the proposed action and the decommissioning of the groundwater pumps are not codependent); and
- c. the groundwater pumps are likely to remain in operation for at least 10 years following completion of filling the lake (a lengthy timeframe between two or more related actions may indicate that they are not components of the same larger action).
- 38. For these reasons, I considered that the decommissioning of the groundwater pumps and the proposed action were separate actions, and were not encompassed by the same larger action.

Operation and closure of the Mine (the larger action)

- 39. I noted that the project area operated as an open cut coal mine from 1949 to 2017, with the original open cut mine pre-dating the EPBC Act and therefore having prior authorisation under section 43A of the EPBC Act.
- 40. I noted that an expansion to the West Field of the coal mine was referred in 2002 (EPBC 2002/903) which was a controlled action for impacts on listed threatened species and was assessed and subsequently approved in 2005.
- 41. I noted that the proponent had been undertaking works under existing approval obligations to begin decommissioning redundant mining and power infrastructure. I noted that since the cessation of mining operations, the following works had been completed:
  - a. Initial stages of rehabilitation works, including batter reprofiling and stabilisation, and decommissioning redundant mine and power infrastructure to prepare for inundation of the mine void. This work was being undertaken in accordance with an approved Work Plan Variation under the *Mineral Resources (Sustainable Development) Act 1990* (Victoria).
  - b. Various clean-up activities associated with Clean Up notices given by the Environment Protection Authority (Victoria).
- 42. I noted that the referral of the proposed action (which is the subject of the current referral) was required because the environmental impacts of filling the mine void was not considered or approved under prior approvals. I noted that it was therefore not an approved activity under either state legislation or the EPBC Act.

Conclusion on proposed action being part of larger action, and acceptance of the referral

- 43. I considered that the proposed action is a component of a larger action being the operation and closure of the mine, consistent with the Policy Statement Staged Development Split referrals: Section 74A of the EPBC Act. I also decided to accept the referral, under section 74A(1) of the EPBC Act.
- 44. Under subsection 74A(4) of the EPBC Act I was required to notify the person who referred the proposal in writing of my decision under subsection 74A(1) and publish in accordance with the regulations (if any), a copy of my decision. As such, I included written notice of the decision to accept the referral in my letter to the proponent.

#### Decision on Part 3 provisions that are controlling provisions

- 45. Under section 75 of the EPBC Act, I was required to decide whether the action that is the subject of the proposal referred is a controlled action, and which provisions of Part 3 (if any) are controlling provisions for the action. In making my decision, I considered all adverse impacts the action has, will have, or is likely to have, on the matter protected by each provision of Part 3. I did not consider any beneficial impacts the action has, will have or is likely to have on the matter protected by each provision of Part 3.
- 46. I decided that there was sufficient information available to make this decision.
- 47. Section 67 of the EPBC Act provides that an action is a controlled action if the taking of the action, without the Minister's approval for the purposes of a provision of Part 3, would be prohibited by the provision (the controlling provision for the action).
- 48. I decided that the proposal is a controlled action, because there are likely to be significant impacts on the following Part 3 protected matters:
  - a. The ecological character of a declared Ramsar wetland (section 16 & section 17B);
  - b. Listed threatened species and communities (section 18 & section 18A);
  - c. Listed migratory species (section 20 & section 20A);
  - d. A water resource, in relation to a large coal mining development or coal seam gas development (section 24D & 24E).
- 49. These impacts are discussed below.

# A water resource, in relation to a large coal mining development or coal seam gas development (ss 24D & 24E)

- 50. I noted that the Significant Impact Guidelines 1.3: Coal seam gas and large coal mining development impacts on water resources (SIG 1.3) (August 2022) states that a 'large coal mining development' (LCM) is defined under section 528 of the EPBC Act as a coal mining activity that has, or is likely to have, a significant impact on water resources (including any impact of associated salt production and/or salinity):
  - a. in its own right; or
  - b. when considered with other developments, whether past, present or reasonably foreseeable developments.
- 51. I noted that SIG 1.3 states that the definition of 'large coal mining development' relates to coal mining activities (including activities that are so closely associated with extracting coal as to be integral to those activities, or without which the relevant extraction could not be undertaken) that have, or are likely to have, significant impacts on a water resource. This means that infrastructure that is an integral part of the extraction of coal is likely to be included in the definition of 'large coal mining development', as are whole-of-life activities (including development, closure and completion activities).
- 52. I used three key matters to inform whether the decommissioning or rehabilitation activities of the proposed action should be characterised as an action that is integral to a LCM development:

- a. the length of the period between the mining operations and the commencement of the decommissioning and rehabilitation activities, including what occurred during that intervening period;
- b. the overall purpose of the decommissioning or rehabilitation activities, with a purpose to restore the project area to what it had been before the mining operations began, being more likely to involve a LCM development than a purpose to transform the land for different purposes now that mining has ceased; and
- whether the decommissioning or rehabilitation activities are the performance of a legal obligation imposed before mining could commence.
- 53. In deciding whether the proposed action is integral to mining, I noted:
  - a. mining ceased in 2017, however, groundwater pumping has continued from the operation of the mine until present;
  - b. the HCP to be decommissioned was used to store water that accumulated or was generated from the mining process;
  - c. the State conditions of approval require decommissioning activities to be completed; and
  - d. the proponent has a legal obligation to rehabilitate the mine void into a safe and stable landform. This legal obligation was imposed on the proponent before mining could commence, under the *Mineral Resources (Sustainable Development) Act 1990* (Vic).

Conclusion on applying the water trigger provisions

54. I considered that the proposed action is integral to mining, and therefore that the proposed action should be considered a LCM for the purposes of sections 24D and 24E of the EPBC Act. Noting my finding that the action can be considered a LCM development, the water trigger provisions could therefore apply. I considered information below on the likely impacts to water resources.

Impacts to water resources

#### Surface water quantity

- 55. I noted that the SIG 1.3 states that a significant impact on the hydrological characteristics of a water resource may occur where there are, as a result of the action, changes in the water quantity, including the timing of variations in water quantity where these changes are of sufficient scale or intensity as to significantly reduce the current or future utility of the water resource for third party uses, including environmental and other public benefit outcomes.
- 56. I noted that the Latrobe River provides an essential source of freshwater to the Gippsland Lakes Ramsar site. I considered advice from the Commonwealth Environmental Water Office which stated that the hydrological regime is specifically identified in the Gippsland Lakes Ecological Character Description as a critical process for the site, contributing significantly to its ecological character through effect on water levels, inundation of soils and the distribution and condition of wetland vegetation and wetland fauna that inhabit them.
- 57. I considered advice from the OWS which stated that the Latrobe River system is already under significant stress from water shortage, and future projections on water availability in the Latrobe River system indicates there will be insufficient water available to meet environmental demands

as well as insufficient water available for the volumes required to meet demands for filling the mine void over 15-20 years. I noted that consequently, the OWS stated that downstream water assets, particularly the Gippsland Lakes will likely be impacted by the reduced availability of freshwater flows from the Latrobe River. Further investigations to assess the potential impacts in more detail and further develop suitable mitigation measures is required.

#### Surface water quality

- 58. I noted that SIG 1.3 states that a significant impact on a water resource may occur where there is a risk that the ability to achieve relevant local or regional water quality objectives would be materially compromised, and as a result the action:
  - a. creates risks to the condition of the natural environment as a result of the change in water quality; or
  - b. causes persistent organic chemicals, heavy metals, salt or other potentially harmful substances to accumulate in the environment.
- 59. I considered advice from OWS which stated that the water quality in the proposed lake will deteriorate over time and be unsuitable for primary, and potentially secondary, contact in approximately 50 years due to interaction with the mine void walls either directly, or through groundwater inflow. During low flow periods, water from the pit lake will constitute the main flow in the Morwell River and strongly influence water quality leading to direct impacts to ecosystems downstream and also ongoing bioaccumulation of contaminants into the Gippsland Lakes Ramsar site.
- 60. I considered advice from OWS which noted that decreased freshwater flow into Lake Wellington increases the risk of seawater ingress. Given the pressure the Gippsland Lakes are under from seawater intrusion, small changes in the surface water regime may have a much larger impact than if the system was in a more natural state. Any increase in salinity due to seawater ingress caused by a further reduction in surface water flow is likely to impact aquatic vegetation and fish breeding cycles.
- 61. I considered a public submission from Environmental Justice Australia which stated the referral does not explicitly state whether the Hazelwood Ash Retention Area (HARA) will be remediated prior to inundation of the mine void. Once the mine void begins to fill with water, there is the potential for the mechanical stability of the HARA to fail, which may lead to geotechnical leaching of coal combustion residuals (CCRs) and other wastes into the mine void and subsequently the surrounding environment. In addition, Perfluoroalkyl and polyfluoroalkyl substances (PFAS) are present within the mine void, and almost any concentration of PFAS released into the environment is likely to exceed applicable regulatory standards. I noted that information on PFAS management can be requested in the assessment, including how it will be managed to meet applicable regulatory standards.

#### Groundwater quality and groundwater quantity

62. I considered advice from OWS which stated that as the proposed mine lake fills, the groundwater regime surrounding the lake will change. When full, the lake will cause backlogging of the groundwater flow regime. This will likely cause salinity issues and impacts on vegetation surrounding the mine void.

63. I noted that due to the lowering of groundwater levels from dewatering the M1 and M2 groundwater aquifers, it is likely that the Morwell River will be disconnected from the groundwater system. When the mine lake is full, this will likely result in a reconnection of the Morwell River and the groundwater system which will potentially provide a mechanism for contaminants to enter the river from within the mine void.

#### Precautionary principle

- 64. I considered the precautionary principle. In doing so, I noted that the action could result in impacts to a range of water resources including the Gippsland Lakes Ramsar site. As such, I assumed that the action could cause serious or irreversible environmental damage to a water resource, from direct impacts to water quality and water quantity locally and downstream.
- 65. I noted that no detailed scientific modelling and analysis had been undertaken to inform the likely changes to the water resources likely to be affected from the proposed action. As a result, there is scientific uncertainty as to the intensity, duration, magnitude and geographic extent of the potential impacts.
- 66. I noted that by making a controlled action decision requiring further assessment, the action cannot proceed until an assessment and approval have been undertaken. Therefore, my decision would not postpone a measure to prevent degradation of the environment and so was consistent with the precautionary principle.

#### Conclusion

- 67. In accordance with SIG 1.3, and applying the precautionary principle, I considered the proposed action is likely to result in an impact on the water quantity and water quality of a surface water and groundwater resource, of sufficient scale and intensity as to reduce the current or future utility of the water resource for third party users, including environmental and other public benefit outcomes, or to create a material risk in such reduction in utility occurring.
- 68. Therefore, I considered that a significant impact to a water resource in relation to a large coal mining development was likely.

#### Ramsar Wetlands (ss 16 & 17B)

Description of the Gippsland Lakes Ramsar site

- 69. I noted that the Gippsland Lakes Ramsar site consists of a group of coastal lagoons and fringing wetlands that support a diversity of wetland types ranging from fresh to brackish to hypersaline. The Gippsland Lakes is a system of lakes and swamplands extending from Sale, eastward to their outlet to the sea at Lakes Entrance. The Gippsland Lakes system is fed by several river systems, the largest of which are the Latrobe, Macalister, Thomson, Avon, Mitchell, Nicholson and Tambo rivers.
- 70. I noted that the ecological values for the site include extensive seagrass beds, fringing vegetation, habitat for resident and migratory waterbirds, diverse and abundant fish, threatened species, and one of only two known populations of the Burrunan Dolphin (*Tursiops australis*).

#### Proposed action

71. I noted that the proposed action will require filling the mine void using groundwater, surface water and any other approved water sources. The Morwell River will be diverted into the mine void. Approximately 17-19 GL of groundwater would be extracted per year, and between 8 to 24.5 GL of surface water will be extracted from the Morwell River per year, over approximately 20 years to reach a depth of approximately +45 m AHD, and a capacity of approximately 650 GL. Due to the large surface area of the proposed lake, it is expected that water will be evaporated during warmer seasons. To account for evaporative losses, water will need to be continuously extracted from the Morwell River to keep the lake at the desired water level and depth.

#### **Potential impacts**

#### Areas of the wetland being destroyed or substantially modified

72. I considered the advice from the Commonwealth Environmental Water Office which stated that no areas of the Gippsland Lakes Ramsar site are likely to be directly destroyed or substantially modified as a direct result of the proposed action.

#### A substantial and measurable change in the hydrological regime of the wetland.

- 73. I noted that, as discussed above under impacts to a water resource in relation to a large coal mining development, I considered that the proposed action will likely result in a change to the regime of freshwater and saltwater flows into the Gippsland Lakes Ramsar site.
- 74. Therefore, I considered that, as a result of the proposed action, a substantial and measurable change in the hydrological regime of the Gippsland Lakes is likely. This conclusion was supported by advice from the Commonwealth Environmental Water Office.

#### A substantial and measurable change in the physico-chemical status of the wetland

- 75. I noted that, as discussed above under impacts to a water resource in relation to a large coal mining development, I considered that the proposed action will likely result in a bioaccumulation of contaminants, and saltwater ingress at Gippsland Lakes Ramsar site.
- 76. Therefore, I considered that a substantial and measurable change in the physico-chemical status of the Gippsland Lakes as a result of the proposed action is likely. This conclusion was supported by advice from the Commonwealth Environmental Water Office.

#### The habitat or lifecycle of native species dependent on the wetland being seriously affected

- 77. I noted that, as discussed above under impacts to a water resource in relation to a large coal mining development, I considered that the proposed action will likely result in reduced freshwater flows and saltwater ingress at the Gippsland Lakes Ramsar site. This will likely disrupt fish breeding cycles and degrade habitat of native aquatic vegetation dependent on the Ramsar site.
- 78. Therefore, I considered it likely that the proposed action will seriously affect the habitat or lifecycle of native species dependent on the wetland. This conclusion was supported by advice from the Commonwealth Environmental Water Office.

An invasive species that is harmful to the ecological character of the wetland being established or encouraging of existing invasive species

79. I considered the advice from the Commonwealth Environmental Water Office which stated that it is unlikely that the proposed action will result in invasive species that are harmful to the ecological character of the Gippsland Lakes being established or encouraged.

#### **Precautionary principle**

- 80. I considered the precautionary principle and noted that the Gippsland Lakes is a Ramsar site, where the threshold for reaching a finding that there are threats of serious or irreversible environmental damage may be low. I also noted that the Gippsland Lakes Ramsar site is already under threat from existing pressures of water availability and water quality, and that any further reduction in freshwater flows and reduced water quality will exacerbate that threat. As such, I assumed that the action could cause serious or irreversible environmental damage to the Gippsland Lakes Ramsar site from directly affecting the water availability and water quality of the rivers that contribute flows to the Ramsar site.
- 81. I also noted that no scientific modelling and detailed analysis has been undertaken on potential changes to the hydrology of the Ramsar site resulting from the proposed action. As a result, there was scientific uncertainty as to the intensity, duration, magnitude and geographic extent of the potential impacts.
- 82. I also noted that by making a controlled action decision requiring further assessment, the action cannot proceed until an assessment and approval have been undertaken. Therefore, my decision would not postpone a measure to prevent degradation of the environment and so was consistent with the precautionary principle.

#### Conclusion

83. Based on the information in the referral, the advice provided from the OWS and the Commonwealth Environmental Water Office, the Ecological Character Description for the Gippsland Lakes, and applying the precautionary principle, I considered that the proposed action is likely to adversely impact on the ecological character of the Gippsland Lakes Ramsar site.

Therefore, I considered the proposed action is likely to have a significant impact on the Gippsland Lakes Ramsar site.

#### Other Ramsar wetlands

84. I considered advice from the Commonwealth Environmental Water Office which stated that no information has been provided about potential impacts to other nearby Ramsar sites, the Corner Inlet and Western Port Ramsar sites. I noted that this should be considered in the assessment, particularly in relation to groundwater connectivity.

#### Listed threatened species and communities (ss 18 and 18A)

85. I considered advice from the OWS on the likely nature and extent of potential impacts of the proposed action on threatened species and communities. OWS noted that desktop studies indicated there was the potential for threatened species and ecological communities to occur within the project area which may be directly or indirectly impacted by the proposed action. Further site investigations are required to be able to fully understand the potential impacts.

86. I noted that the department's Environment Reporting Tool (ERT) identified 35 species and 1 ecological community that may occur within 5 km of the proposed action. Based on the location of the action and the likely habitat present in the area of the proposed action, I considered that impacts may potentially arise in relation to the following matters.

Gippsland Red Gum (Eucalyptus tereticornis subsp. mediana) Grassy Woodland and Associated Native Grassland – Critically Endangered

- 87. I considered information from the *Approved Conservation Advice for Gippsland Red Gum* (Eucalyptus tereticornis *subsp.* mediana) *Grassy Woodland and Associated Native Grassland* which states that the ecological community is a eucalypt woodland ecological community dominated by Gippsland Red Gum (*Eucalyptus tereticornis* subsp. *mediana*) and ground layer dominated by grasses or grass-like plants. This ecological community is endemic to Victoria and restricted to the eastern Gippsland Plain between the Strzelecki Ranges and the Tambo River valley. Threats to the species include vegetation clearance, fragmentation of remnants, management regimes (fire, grazing, mowing) that are inappropriate to specific grassland or grassy woodland requirements, weed invasion, pest animals, infrastructure and maintenance works, and rural tree dieback.
- 88. I noted that the project area contains some aspects that correspond to the ecological community, in particular, the presence of Gippsland Red Gums. The referral stated that these trees are believed to be planted, so it is unlikely that the ecological community is present. However, spring surveys would be conducted to confirm absence, or presence and extent of this ecological community.
- 89. I noted that, as discussed above under impacts to a water resource in relation to a large coal mining development, I considered that the proposed action will likely result in a change to the groundwater flow regime of the project area. I considered this will likely cause salinity issues and impacts on vegetation surrounding the mine void.
- 90. I considered the proponent's avoidance and mitigation measures which stated that if spring surveys determined that the ecological community is present, the extent of the community will be mapped and protected with no-go zones. All works will be focused on disturbed and generally unvegetated areas.
- 91. I took into account the department's EPBC Act Policy Statement 1.1 Significant Impact Guidelines Matters of National Environmental Significance, and I considered that there was a real chance or possibility that the proposed action will result in adversely affecting habitat critical to the survival of the ecological community. Therefore, I considered that a significant impact to the Gippsland Red Gum (Eucalyptus tereticornis subsp. mediana) Grassy Woodland and Associated Native Grassland ecological community was likely.

<u>River Swamp Wallaby-grass (Amphibromus fluitans) – Vulnerable and Strzelecki Gum (Eucalyptus strzeleckii) – Vulnerable</u>

92. I noted that River Swamp Wallaby-grass (*Amphibromus fluitans*) is an aquatic species that occurs in southern NSW, Victoria, South Australia and Tasmania. In southern Victoria, it is known from several localities in south Gippsland. The species has been recorded in natural and man-made waterbodies such as swamps and dams, and requires fluctuating water levels. Threats to the

- species includes grazing and trampling by livestock, hydrological changes, and weed encroachment.
- 93. I noted that the Strzelecki Gum (*Eucalyptus strzeleckii*) is a member of the swamp gum group endemic to the Strzelecki Ranges in Gippsland, Victoria. The species favours a range of sites including ridges, slopes and along the banks of streams, but particularly in foothills and flats. Threats include grazing and trampling by livestock, weed encroachment, habitat loss and changes to hydrology.
- 94. I noted that there are records of the Strzelecki Gum within the project area, and the project area offers some suitable habitat for River Swamp Wallaby-grass around waterbodies with fluctuating water levels. Further targeted surveys are required to confirm the extent of the Strzelecki Gum population present, and to confirm the absence, or presence and extent of River Swamp Wallaby-grass.
- 95. I noted that, as discussed above under impacts to a water resource in relation to a large coal mining development, I consider that the proposed action will likely result in a change to the groundwater flow regime of the project area. This would likely cause salinity issues and impacts on vegetation surrounding the mine void.
- 96. I noted that the referral stated that once additional surveys have been completed, areas of habitat for these species will be protected with no-go zones, and habitat will be enhanced.
- 97. I took into account the EPBC Act Policy Statement 1.1 Significant Impact Guidelines Matters of National Environmental Significance, and I considered that there is a real chance or possibility that the proposed action will result in the reduction of the area of occupancy of an important population of these two species. Therefore, I considered a significant impact to the Strzelecki Gum and River Swamp Wallaby-grass was likely.

## <u>Dwarf Galaxias (Galaxiella pusilla) – Vulnerable and</u> Australian Grayling (*Prototroctes maraena*) – Vulnerable

- 98. I noted that the Dwarf Galaxias (*Galaxiella pusilla*) is a freshwater fish endemic to south-eastern Australia, where it occurs in Tasmania, South Australia and Victoria. It is likely that the species has suffered a significant decline in abundance due to habitat changes to shallow freshwater wetlands, especially wetland drainage. Remaining populations are fragmented and patchy. Threats include wetland drainage, climate change, habitat damage through grazing and lack of regeneration, predation and competition with feral fish.
- 99. I noted that the Australian Grayling (*Prototroctes maraena*) was historically known to occur in coastal catchments greater than 200 m above sea level, generally in freshwater, estuarine and marine reaches of waterways in south-eastern Australia along New South Wales, Victoria, Tasmania and South Australia. Australian Grayling generally migrates downstream to the lower freshwater reaches of rivers to spawn, however, this is dependent on specific hydrological cues such as water velocity and temperature. Threats include barriers to passage restricting upstream and downstream movement, change of hydrology, sedimentation and water quality and competition or predation by feral fish.
- 100. I noted that there are areas of suitable habitat for the Dwarf Galaxias in the project area within Eel Hole Creek and Wilderness Creek, however the precise location of suitable habitat within the

- impacted area is unknown. Both species are known to occur within the Gippsland Lakes. The Australian Grayling is known to occur within the Latrobe River, contiguous with the Morwell River which is proposed to be diverted into the mine void. Further surveys and investigations are required to determine presence and extent of habitat for both species.
- 101. As discussed above under impacts to a water resource in relation to a large coal mining development, I consider that the proposed action will likely result in reduced water availability and water quality of the river systems surrounding the mine void. This will likely have an impact on habitat quality and habitat availability for these species.
- 102. I noted that a waterway ecological restoration plan for all watercourses and wetlands within the project area will be implemented during the proposed action. Habitats will be restored with prioritisation given to restoring fish passage through the project area.
- 103. I took into account the EPBC Act Policy Statement 1.1 Significant Impact Guidelines Matters of National Environmental Significance, and I considered that there is a real chance or possibility that the proposed action will result in habitat for important populations of these two species being adversely affected. Therefore, I considered that a significant impact to the Dwarf Galaxias and Australian Grayling was likely.

<u>Curlew Sandpiper (Calidris ferruginea) – Critically Endangered; Migratory and Eastern Curlew (Numenius madagascariensis) – Critically Endangered; Migratory </u>

- 104. I noted that the Curlew Sandpiper (*Calidris ferruginea*) is a migratory shorebird that occurs widespread in Victoria in coastal bays and inlets, coastal wetlands and sometimes inland wetlands. The species does not breed in Australia, however foraging and roosting occurs on intertidal mudflats and coastal areas, such as estuaries, bays, inlets and lagoons in both fresh and brackish waters.
- 105. I noted that the Eastern Curlew (*Numenius madagascariensis*) is a migratory shorebird with strongholds at Corner Inlet, Western Port Bay and other locations scattered along the Victorian coast. The species does not breed in Australia, however, during the non-breeding season the species is most commonly associated with sheltered coasts, especially estuaries, bays, harbours, inlets and coastal lagoons, with large intertidal mudflats or sandflats, often with beds of seagrass.
- 106. I noted that the Curlew Sandpiper and Eastern Curlew are known to occur in large numbers at the Gippsland Lakes Ramsar site, where they feed and roost during the non-breeding season. I noted that, according to the EPBC Act Policy Statement 3.21: Industry guidelines for avoiding, assessing and mitigating impacts on EPBC Act listed migratory shorebird species, the Gippsland Lakes Ramsar site is recognised as internationally important habitat for migratory shorebirds, as it regularly supports more than 20,000 waterbirds. Therefore, I considered that the Gippsland Lakes Ramsar site is habitat critical to the survival of these species.
- 107. I considered the department's *EPBC Act Policy Statement 1.1 Significant Impact Guidelines Matters of National Environmental Significance* which states that an action is likely to have a significant impact on a critically endangered species if there is a real chance or possibility that it will adversely affect habitat critical to the survival of the species.

- 108. I noted that, as discussed above under impacts to a water resource in relation to a large coal mining development, I considered that the proposed action will likely result in a change to the hydrological regime of the Gippsland Lakes Ramsar site. This hydrological process influences habitat structure and conditions for the species that utilise the Ramsar site, and a change in this hydrological regime has the potential to degrade habitat.
- 109. Based on the advice from the Commonwealth Environmental Water Office, and the department's policy guidance in the *EPBC Act Policy Statement 1.1 Significant Impact Guidelines Matters of National Environmental Significance*, I considered that there is a real chance or possibility that the proposed action would result in adversely affecting habitat critical to the survival of these species. Therefore, I considered that the proposed action is likely to have a significant impact on the critically endangered Curlew Sandpiper and the Eastern Curlew.

#### Other listed threatened species

- 110. On the basis of all the information available to me (including the ERT, which suggests the presence of the following species or communities in the area of the proposal), and without further detailed assessment of potential impacts, I considered that there was a real chance or possibility that project activities would significantly impact on the following:
  - a. Australasian Bittern (Botaurus poiciloptilus) Endangered
  - b. Growling Grass Frog (Litoria raniformis) Vulnerable
  - c. Green and Golden Bell Frog (Litoria aurea) Vulnerable
  - d. Australian Painted Snipe (Rostratula australis) Endangered
  - e. Dwarf Kerrawang (Rulingia prostrata) Endangered
  - f. Fairy Tern (Sterna nereis nereis) Vulnerable
  - g. Swamp Everlasting (Xerochrysum palustre) Vulnerable
  - h. Metallic Sun-orchid (Thelymitra epipactoides) Endangered
  - i. Matted Flax-lily (Dianella amoena) Endangered
  - j. Great Knot (Calidris tenuirostris) Critically Endangered; Migratory
  - k. Maroon Leek-orchid (Prasophyllum frenchii) Endangered
  - I. Thick-lip Spider-orchid (Caladenia tessellata) Vulnerable
  - m. Regent Honeyeater (Anthochaera phyrgia) Critically Endangered

#### Precautionary principle

111. I considered the precautionary principle in the application of ss 18 and 18A. In doing so, I noted that the species discussed above are listed threatened species and acknowledged that the threshold for reaching a finding that there are threats of serious or irreversible environmental damage may be low. As such, I assumed that the action could cause serious or irreversible environmental damage to these species.

- 112. I also noted that no scientific modelling and analysis has been undertaken to inform potential impacts to foraging habitat for these species. As a result, there is scientific uncertainty as to the intensity, duration, magnitude and geographic extent of the potential impacts.
- 113. I also noted that by making a controlled action decision requiring further assessment, the action cannot proceed until an assessment and approval have been undertaken. Therefore, my decision was not postponing a measure to prevent degradation of the environment and so was consistent with the precautionary principle.

#### Conclusion

114. For the reasons outlined above, I considered sections 18 and 18A are controlling provisions for the proposed action.

#### Listed migratory species (ss 20 and 20A)

115. I noted that although the project area contains little to no habitat for listed migratory species, I considered the likely downstream impacts on the Gippsland Lakes Ramsar site, which is known habitat to several migratory species discussed below.

<u>Sharp-tailed Sandpiper (Calidris acuminata) – Migratory; Marine and</u> <u>Red-necked Stint – (Calidris ruficollis) – Migratory; Marine</u>

- 116. I noted that the Sharp-tailed Sandpiper is a small migratory shorebird that spends the non-breeding season in Australia. Most of the population migrates to the south-east of Australia where they are widespread inland and in coastal locations, both in freshwater and saline habitats.
- 117. I noted that the Red-necked Stint is a small migratory shorebird that spends winter in Australia. It is distributed along most of the Australian coastline with large densities on the Victorian and Tasmanian coasts.
- 118. I considered the EPBC Act Policy Statement 3.21: Industry guidelines for avoiding, assessing and mitigating impacts on EPBC Act listed migratory shorebird species which states that habitat should be considered as internationally important for migratory shorebirds if that habitat supports 1% of the individuals in a population of a species or subspecies of waterbird. I noted that the Ecological Character Description for the Gippsland Lakes states that both species have been recorded at the Gippsland Lakes Ramsar site at counts that are above the threshold limit of 1% of their respective populations. Therefore, I considered that the Gippsland Lakes Ramsar site is important habitat for the Sharp-tailed Sandpiper and the Red-necked Stint.
- 119. I considered the EPBC Act Policy Statement 3.21: Industry guidelines for avoiding, assessing and mitigating impacts on EPBC Act listed migratory shorebird species which states that degradation of habitat that leads to a substantial reduction in migratory shorebird numbers is likely to have a significant impact on a migratory species.
- 120. I noted that, as discussed above under impacts to a water resource in relation to a large coal mining development, I considered that the proposed action will likely result in a change to the hydrological regime of the Gippsland Lakes Ramsar site. This hydrological process influences habitat structure and conditions for the species that utilise the Ramsar site, and a change in this hydrological regime has the potential to degrade the habitat that the Ramsar site provides.

121. Based on the advice from the Commonwealth Environmental Water Office, and the department's policy guidance in the Significant Impact Guidelines and the EPBC Act Policy Statement 3.21: Industry guidelines for avoiding, assessing and mitigating impacts on EPBC Act listed migratory shorebird species, I considered that there is a real chance or possibility that the proposed action will result in change to the hydrological regime of important habitat for a migratory species, leading to a substantial reduction in migratory shorebird numbers. Therefore, I considered that the proposed action is likely to have a significant impact on the migratory Sharp-tailed Sandpiper and the Red-necked Stint.

#### Other listed migratory species

- 122. On the basis of all the information available to me (including the ERT, which suggests the presence of the following species in the area likely to be impacted the proposal), and without further detailed assessment of potential impacts, I considered that there was a real chance or possibility that project activities would significantly impact on the following:
  - a. Common Sandpiper (Actitis hypoleucos) Migratory; Marine
  - b. Pectoral Sandpiper (Calidris melanotos) Migratory; Marine
  - c. Latham's Snipe (Gallinago hardwickii) Migratory; Marine
  - d. Common Greenshank (*Tringa nebularia*) Migratory; Marine
  - e. Eastern Osprey (Pandion haliaetus) Migratory; Marine
  - f. Great Knot (Calidris tenuirostris) Critically Endangered; Migratory; Marine
  - g. Curlew Sandpiper (Calidris ferruginea) Critically Endangered; Migratory
  - h. Eastern Curlew (Numenius madagascariensis) Critically Endangered; Migratory
  - i. Little Tern (Sterna albifrons) Migratory; Marine

#### Conclusion

123. For the reasons outlined above, I considered that sections 20 and 20A are controlling provisions for the proposed action.

#### Protected matters that are not controlling provisions:

World Heritage properties	The ERT did not identify any World Heritage properties located within or
(ss 12 & 15A)	adjacent to the proposed action area.
	Further, given the information contained in the referral documentation,
	the nature and scale of the proposed action and its potential impacts,
	and the distance to World Heritage properties, the proposed action is
	unlikely to have a significant impact on World Heritage properties.
	For these reasons I considered that sections 12 and 15A are not
	controlling provisions for the proposed action.
National Heritage places	The ERT did not identify any National Heritage places located within or
(ss 15B & 15C)	adjacent to the proposed action area.
	Further, given the information contained in the referral documentation,
	the nature and scale of the proposed action and its potential impacts,

	and the distance to National Heritage places, the proposed action is unlikely to have a significant impact on National Heritage places. For these reasons I considered that sections 15B and 15C are not controlling provisions for the proposed action.
Commonwealth marine environment (ss 23 & 24A)	The proposed action does not occur in a Commonwealth marine area.  Further, given the information contained in the referral documentation, the nature and scale of the proposed action and its potential impacts, and the distance to a Commonwealth marine area, the proposed action is
	unlikely to have a significant impact on the environment in a  Commonwealth marine area.
	For these reasons I considered that sections 23 and 24A are not controlling provisions for the proposed action.
Commonwealth action (s 28)	The referring party is not a Commonwealth agency. For this reason, I considered that section 28 is not a controlling provision for the proposed action.
Commonwealth land (ss 26 & 27A)	The proposed action is not being undertaken on Commonwealth land. Further, given the information contained in the referral documentation, the nature and scale of the proposed action and its potential impacts, and the distance to Commonwealth land, the proposed action is unlikely to have a significant impact on the environment on Commonwealth land. For these reasons I considered that sections 26 and 27A are not controlling provisions for the proposed action.
Nuclear action (ss 21 & 22A)	The proposed action does not meet the definition of a nuclear action as defined in the EPBC Act. For this reason, I considered that sections 21 and 22A are not controlling provisions for the proposed action.
Great Barrier Reef Marine Park (ss 24B & 24C)	The proposed action is not being undertaken in the Great Barrier Reef Marine Park.  Further, given the information contained in the referral documentation, the nature and scale of the proposed action and its potential impacts, and the distance to the Great Barrier Reef Marine Park, the proposed action is unlikely to have a significant impact on the Great Barrier Reef Marine Park.  For these reasons I considered that sections 24B and 24C are not controlling provisions for the proposed action.
Commonwealth Heritage places overseas (ss 27B & 27C)	The proposed action is not located overseas. For this reason I considered that sections 27B and 27C are not controlling provisions for the proposed action.

#### Other matters for decision-making:

Significant impact guidelines

124. In making my decision, I reviewed the information in the referral against the *EPBC Act Policy*Statement 1.1 Significant Impact Guidelines – Matters of National Environmental Significance
(December 2013) and other relevant material. While this material is not binding or exhaustive,

the factors identified were considered by me to be adequate for decision-making in the circumstances of this referral. Adequate information in relation to the significant impact guidelines was available for my decision-making for this referral decision.

#### Precautionary Principle

- 125. In making my decision under section 75 of the EPBC Act, I considered the precautionary principle (section 391), to the extent I could do so consistently with the other provisions of the EPBC Act. The precautionary principle is that a lack of full scientific certainty should not be used as a reason for postponing a measure to prevent degradation of the environment where there are threats of serious or irreversible environmental damage.
- 126. The precautionary principle has been taken into account by considering:
  - a. If there are threats of serious or irreversible environmental damage to each protected matter, and
  - b. where there is a lack of full scientific certainty as to the nature or scope of the threat of this damage.
- 127. In light of the findings above that the proposed action will impact listed threated species, declared Ramsar wetland, listed migratory species and water resources in relation to a large coal mining development, I considered that there is the threat of serious or irreversible environmental damage.
- 128. Further, there is a lack of scientific certainty as to the full scope of impacts to all matters, which has been considered and discussed for each species. As such, the precautionary principle should be applied.
- 129. I noted that by making the action a controlled action requiring further assessment, the action cannot proceed until an assessment and approval have been undertaken. Therefore, this decision did not postpone a measure to prevent degradation of the environment and so is consistent with the precautionary principle.
- 130. In relation to the other protected matters which I decided are not controlling provisions, I did not consider that there are threats of serious or irreversible environmental damage and therefore the precautionary principle does not require further consideration to those matters. This conclusion was based on the available information including the referral documentation, survey data, desktop analysis and relevant databases and information sources.

#### **Bioregional Plans**

131. In accordance with section 176(5), I considered bioregional plan/s in making any decision under the Act to which the plan is relevant, noting that there was no bioregional plan in place that was relevant to my decision.

#### Management Plans for Commonwealth Reserves

132. In accordance with section 362(2), the Commonwealth or a Commonwealth agency must not perform its functions or exercise its powers in relation to a Commonwealth reserve inconsistently with a management plan that is in operation for the reserve.

133. There was no Commonwealth reserve management plan in place that was relevant to my decision.

#### Procedural fairness

- 134. I considered that the obligation to provide procedural fairness may have arisen in relation to making a controlled action decision for the purposes of the water trigger. In this case, I decided that some of the activities of the proposed action are integral to a large coal mine development. I decided that it was necessary to give the proponent a reasonable opportunity to respond to the public submission from Environmental Justice Australia, and any other adverse information that is credible, relevant and significant to the decision.
- 135. On 21 December 2022, I provided the proponent the public submission from Environmental Justice Australia to ensure my obligation to provide procedural fairness to the proponent was met. On 24 January 2023, the proponent acknowledged receipt of the submission and did not provide a response to the submission.

#### Cost Recovery

136. A fee schedule was sent to the person taking the action including an invoice for Stage 1, seeking fees prior to the commencement of any further activity.

#### Reasons for decision

- 137. I considered that the quality and quantity of information before me was adequate for me to make a decision under sections 75 and 77A of the EPBC Act.
- 138. In making my decision, I took into account the information provided in the decision brief and its attachments, including the referral, public comments received, and submissions from relevant Commonwealth and State Ministers, as well as the matters required to be taken into account under sections 75(1A) and 75(2) of the EPBC Act.
- 139. In making my decision, I took account of the precautionary principle as required by section 391 of the EPBC Act.
- 140. I noted that there were no relevant management plans for Commonwealth reserves to consider under section 362(2) of the EPBC Act.

- 141. In view of my findings, I considered that the proposed action was likely to have a significant impact on matters protected by Part 3 of the EPBC Act. I therefore decided on 20 February 2023, under sections 75 and 77A of the EPBC Act, that the proposed action is a controlled action, due to likely significant impacts to:
  - a. A water resource in relation to a large coal mining development or coal seam gas development (ss 24D & 24E)
  - b. Ramsar wetlands (ss 16 & 17B)
  - c. Threatened species and communities (ss 18 & 18A)
  - d. Migratory species (ss 20 & 20A)

#### Signed

name and position	Kim Farrant Branch Head
	Environment Assessments (Vic, Tas) and Post Approvals Branch
signature	Carleman
date of decision	5 April 2023