

# Acceptance of the Bayu-Undan to Darwin Gas Export Pipeline Environment Plan

Document No: A1114917

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1. On 16 July 2024, I, [REDACTED], Director – Production Environment, delegate of the Chief Executive Officer of NOPSEMA decided, pursuant to regulation 33 of the *Offshore Petroleum and Greenhouse Gas Storage (Environment) Regulations 2023 (Cth) (the Environment Regulations)*, to accept the Bayu-Undan to Darwin Gas Export Pipeline Environment Plan (Document No. 7710-057-EIS-0001, Revision 6, dated 24 June 2024) (**EP**).
2. The EP was submitted by Santos NA Darwin Pipeline Pty Ltd (ACN 093 316 959) (**titleholder**) to enable the titleholder to operate the Bayu-Undan to Darwin gas export pipeline (**the Pipeline**) and undertake preservation and inspection, maintenance, monitoring and repair (**IMMR**) activities within Timor-Leste Licence BU-1-PL (in accordance with the Treaty Between Australia and the Democratic Republic of Timor-Leste Establishing Their Maritime Boundaries in the Timor Sea) and Commonwealth Petroleum Licences WA-8-PL, NT/PL1 (**activity**).
3. The reasons for my decision are set out below. All references to a regulation (**reg**) or a part of a regulation are to the Environment Regulations unless otherwise stated.
4. Relevant terms are defined at **Attachment A** and throughout this document.

## Legislative framework

5. The legislation relevant to my decision is set out in **Attachment B**.

## Background

6. On 15 July 2022, the titleholder submitted an environment plan (Document No. 7710-057-EIS-0001, Revision 3, dated 12/07/2022) to NOPSEMA in accordance with reg 9 of the then-in-force *Offshore Petroleum and Greenhouse Gas Storage (Environment) Regulations 2009 (the 2009 Environment Regulations)*.
7. On 21 July 2022, a provisional decision that the environment plan included material apparently addressing all the provisions of Division 2 of the 2009 Environment Regulations was made, pursuant to reg 9AA of the 2009 Environment Regulations. That same day, NOPSEMA published on its website the information specified in reg 9AB of the 2009 Environment Regulations.
8. Between 18 August 2022 and 7 December 2022, NOPSEMA made three requests for further information pursuant to reg 9A of the 2009 Environment Regulations. The requests for further information outlined areas where further information was required before a decision could be made against the criteria set out in reg 10A of the 2009 Environment Regulations. In response to these requests, the titleholder re-submitted the environment plan incorporating additional information in answer to these requests.
9. In addition to the requests detailed at [8] above, between 14 March 2024 and 16 May 2024, NOPSEMA issued two notices pursuant to reg 33(5) requiring the titleholder to modify and re-submit the environment plan. These notices identified areas where NOPSEMA considered the environment plan did

not meet the criteria in reg 34. In response to these requests, the titleholder re-submitted two revisions to the environment plan.

10. The EP that is the subject of this decision was received on 24 June 2024 (Document No. 7710-057-EIS-0001, Revision 6, dated 24 June 2024).

## Materials

11. The materials which I considered in making this decision are set out in **Attachment C**. Where relevant to the decision, the materials are identified in the reasons below.

## Decision Overview

12. The issue before me was whether the EP should be accepted pursuant to reg 33. If reasonably satisfied that the EP met the 'environment plan acceptance criteria' in reg 34, then I must accept the EP. If not reasonably satisfied that the 'environment plan acceptance criteria' were met, I must decide to:

- a. give the titleholder a further notice and opportunity to resubmit; or
- b. accept the EP in part (for a particular stage of the activity), or subject to limitations or conditions applying to operations for the activity, or both; or
- c. refuse to accept the EP.

13. In making this decision, I took into account and accepted advice and recommendations from NOPSEMA's assessment team.

14. The first matter I considered was whether the EP complied with Division 2, which sets out what must be included in an environment plan. I was satisfied that the EP contained the matters required by Division 2. My reasons for this conclusion are set out at [18] – [43] below.

15. I then noted that I must not accept an environment plan for a petroleum activity under a petroleum title unless I was reasonably satisfied that:

- a. in relation to the petroleum activity, the titleholder is compliant with section 571(2) of the *Offshore Petroleum and Greenhouse Gas Storage Act 2006* (the **OPGGs Act**), supplemented by reg 16, and
- b. the compliance is in a form that is acceptable to NOPSEMA.

16. On review of the titleholder's financial assurance declaration and confirmation forms, I was reasonably satisfied that the titleholder had demonstrated financial assurance in accordance with the requirements of reg 16(1), specifically that the titleholder was compliant with s 571(2) of the OPGGS Act, and that compliance was in a form that I considered to be acceptable.

17. The next matter that I considered was whether or not the EP met the criteria set out in reg 34, being the 'environment plan acceptance criteria'. I was reasonably satisfied that the EP met the environment plan acceptance criteria set out in reg 34. My reasons for that conclusion are set out at [44] – [105] below.

## Findings

### Does the Environment Plan comply with Division 2?

18. Regulation 20 provides, in effect, that regs 21 – 24 set out the required contents of an environment plan. I was satisfied that the EP included the matters prescribed by regs 21 – 24 (for the reasons set out individually below). I was therefore satisfied that reg 20 was met and the EP complied with Division 2.

## Environmental assessment: regulation 21

### Regulation 21(1) - Description of the activity

19. Regulation 21(1) requires that an environment plan contain a comprehensive description of the activity, including the location or locations of the activity, the general details of the construction and layout of any facility that is used in undertaking the activity, an outline of the operational details of the activity and proposed timetables for undertaking the activity, and any additional information relevant to consideration of environmental impacts and risks of the activity.
20. I noted that the EP addressed each of these matters in Section 2 of the EP ('Activity Description'), which included the following information:
- a. a description of the activity, which consists of the operations phase (Section 2.3) of the Pipeline (involving the transportation of dry gas, line-packing the pipeline, and back-feed of gas from the Pipeline to Bayu-Undan Central Processing Platform (**BU CPP**) for power generation), the preservation phase (which commences when back feed of gas is no longer needed at the BU CPP) (Section 2.4), and ongoing IMMR of the pipeline undertaken by vessels during both operations and preservation phases of the activity (Section 2.5);
  - b. the design and layout of the pipeline including the structural design parameters for the pipeline (Section 2.2);
  - c. the location of the activity, which is clearly set out in the EP by high quality maps containing the relevant petroleum pipeline licence and operational area (Section 2.2). The Operational Area (**OA**) where the activity is being conducted is clearly defined as the area extending 500 m from the Pipeline centreline (i.e. 500 m each side of the Pipeline). Water depths in the OA range from approximately 55 m to 134 m; and
  - d. the activities outside of the scope of the EP activities (e.g. pipeline decommissioning, activities authorised and associated with the pipeline administered by the Northern Territory onshore regulator) (see Section 2.8).
21. I also considered that the EP contained a comprehensive description of the activity relevant to the consideration of environmental impacts and the risks of the activity. Key aspects of that description included the following:
- a. a description of the operational activities and associated timetables including that, when the Bayu-Undan (BU) field finishes production, the pipeline would continue to be operated as a supply for power at the BU plant for 6 to 36 months (Section 2.3.4);
  - b. a description of the activities that will be undertaken during the preservation phase (Section 2.6) when the gas is no longer being used for power generation at the BU CPP, with this phase expected to be for a period between 12 and 36 months and early case for this preservation phase ending in Q3 of 2025;
  - c. details of IMMR activities that will occur throughout the operations and preservation phases (Section 2.5);
  - d. routine and non-routine emissions and discharges from the activity, including vessel light (Section 6.5) and acoustic emissions (Section 6.6), vessel discharges - deck drainage, sewage/greywater, food waste, cooling water, bilge water, brine (Section 6.3) and minor IMMR activity discharges such as chemicals and fluids from cleaning, inspection and repair of the Pipeline (Section 6.4); and
  - e. unplanned chemical and hydrocarbon discharges (Section 7.4, 7.5 and 7.6), including a marine diesel spill in a vessel collision scenario.

22. Based on the information contained in Section 2 of the EP (some of which is summarised above), I was reasonably satisfied that the EP contained a comprehensive description of the activity that met the requirements of reg 21(1).

**Regulation 21(2) and (3) - Description of the environment that may be affected**

23. Regulation 21(2) and (3) require, in effect, that an environment plan describe the existing environment that may be affected by the activity, including the relevant values and sensitivities (if any) of that environment.

24. The EP addressed each of these matters in Section 3 and Appendix D. In particular, I noted that the EP described and included the following information:

- a. a thorough description of the physical and biological environment, and details of relevant values and sensitivities, that may be affected by the activity, including under emergency conditions;
- b. the description of the environment has been defined as the spatial boundary for the activity within the OA and the broader environment that may be affected (**EMBA**), which describes the largest spatial extent where unplanned events could have an environmental consequence on the surrounding environment. The EMBA is based on stochastic modelling of the credible worst-case spill scenario;
- c. that the activity or any part of the activity will not be undertaken in any part of a declared World Heritage Property or National Heritage Place, nor a declared *Ramsar* wetland within the meaning of the *Environment Protection and Biodiversity Conservation Act 1999* (Cth) (**EPBC Act**);
- d. identification and description of the values and sensitivities within a 20km buffer around the OA, including:
  - i. that the OA overlaps the Oceanic Shoals Marine Australian Marine Park (**AMP**), the Port Darwin Nationally Important Wetland, and six biologically important areas (**BIAs**) for EPBC Act listed dolphin and turtle species;
  - ii. that the OA intersects with key ecological features (**KEF**) of the Carbonate bank and terrace system of the Van Diemen Rise, Carbonate bank and terrace system of the Sahul Shelf, and the Pinnacles of the Bonaparte Basin (Section 3.2);
  - iii. the presence of listed threatened species, listed threatened ecological communities, and listed migratory species under the EPBC Act, including: 15 threatened and/or migratory fish, shark and ray species; 7 threatened and/or migratory marine reptile species; 10 threatened and/or migratory marine mammal species; 56 threatened and/or migratory shorebird and seabird species; and no listed threatened ecological communities; and
  - iv. the social, economic and cultural features (if any) of the environment within the OA relating to cultural heritage, commercial fisheries, subsidence fisheries, tourism and recreation, commercial shipping, telecommunications, defence, and oil and gas activities. Specifically:
    - A. Five Commonwealth-managed fisheries were identified as overlapping with the OA, including the Northern Prawn Fishery, the Southern Bluefin Tuna Fishery, the Western Skipjack Tuna Fishery, the Western Tuna and Billfish Fishery, and the North West Slop Trawl Fishery;
    - B. Fourteen Northern Territory managed fisheries were identified as overlapping the OA, including the bait Net, bait net restricted, barramundi, coastal line, coastal net, demersal, mud crab, offshore net and line, spanish mackerel, trepang, timor reef, mollusc, finfish, and jigging fisheries;

- C. Four Western Australian State-managed fisheries were identified as overlapping with the OA, including the Northern Demersal Scalefish Managed Fishery, the Mackerel Managed Fishery, the Pearly Oyster Managed Fishery and the Northern Shark Fishery;
  - D. no traditional fishing activities are expected to be present within the OA;
  - E. tourism and recreation activities (including charter boat activities) are likely to be more concentrated within the NT coastal waters section of the OA;
  - F. in addition to the BU CPP, the INPEX Ichthys pipeline is located within the OA (Section 3.2.6.4);
  - G. there are designated commercial shipping fairways and designated military/defence exercise areas that intersect with the OA; and
  - H. no Native Title claims or determinations, or Indigenous Land Use Agreements (**ILUAs**) were identified within the OA. In addition, no Indigenous heritage sites were identified within the OA (Sections 3.2.6 and 3.2.8).
- e. identification and description of the values and sensitivities within the EMBA, including:
- i. the Oceanic Shoals AMP, where in identifying values and sensitivities, the EP had regard to the North Marine Parks Network Management Plan;
  - ii. KEFs of the Carbonate bank and terrace system of the Van Diemen Rise, Carbonate bank and terrace system of the Sahul Shelf, and the Pinnacles of the Bonaparte Basin (Section 3.2);
  - iii. BIAs for EPBC Act listed species, including the foraging BIA for the whale shark, distribution and migration BIAs for the pygmy blue whale, breeding BIAs for the crested tern and lesser frigatebird, foraging BIA for the loggerhead turtle, foraging and inter-nesting BIAs for the flatback turtle, olive ridley turtle and green turtle, and breeding BIAs for various dolphins (Table 3-8);
  - iv. the presence of 124 listed threatened species, listed threatened ecological communities, and listed migratory species under the EPBC Act (Section 3.2.5 and Appendix D); and
  - v. the social, economic and cultural features (if any) of the EMBA relating to commercial fisheries, subsidence fisheries, oil and gas activities, defence activities, commercial shipping, tourism and recreation and cultural heritage. Specifically, and in addition to the matters at paragraphs [24](d.iv.A)-(d.iv.C):
    - A. subsidence Indonesian fishing may be present within the EMBA;
    - B. the Santos-operated Bayu-Undan platform is located within the EMBA;
    - C. the EMBA intersects the North Australian Exercise Area, which is a designated Department of Defence practice area;
    - D. a number of commercial shipping fairways intersect the EMBA;
    - E. tourism and recreation activities (including charter boat activities) may be present within the EMBA; and
    - F. the cultural features of the environment relating to First Nations peoples in the area that may be affected by the activity, including fisheries and resources, sea country values and people, and communities and heritage values (Sections 3.2.6 and 3.2.8).

25. Based on the information contained in Section 3 and Appendix D of the EP (some of which is summarised above), I was reasonably satisfied that the EP met the requirements in reg 21(2) and (3).

### *Regulation 21(4) - Requirements*

26. Regulation 21(4) provides that an environment plan must describe the requirements (including legislative requirements) that apply to an activity and that are relevant to the environmental management of the activity and demonstrate how those requirements will be met. The EP contained a detailed table at Appendix B identifying all requirements including legislative requirements that apply to the activity. Further, various parts of the EP, in particular Section 6 (Planned activity impact assessment) and Section 7 (Unplanned events risk and impact assessment) describe the legislative requirements that apply to the activity and how they are relevant to the environmental management of the activity.
27. The EP also provided information regarding the legislative requirements relating to the maintenance and removal of property in Section 2.7.
28. On the basis of this information, I was reasonably satisfied that the EP met the requirements of reg 21(4).

### *Regulation 21(5) and (6) - Evaluation of environmental impacts and risks*

29. Regulation 21(5) and (6) require that an environment plan include details of the environmental impacts and risks of the activity, an evaluation of those risks appropriate to the nature and scale of the activity (including risks arising directly and indirectly and arising from potential emergency conditions, whether resulting from accident or any other reason), and details of the control measures that will be used to reduce those impacts and risks to as low as reasonably practicable (**ALARP**) and an acceptable level.
30. I noted that Sections 6 and 7 of the EP detailed the environmental impacts and risks (including those arising from potential emergency conditions, whether resulting from accident or any other reason) for the activity. The details of the environmental impacts and risks associated with receptors such as marine sediment, water quality, air quality, ecosystems/habitat, species, and socio-economic environment include:
- a. planned activities (routine and non-routine):
    - i. routine light emissions—external lighting on petroleum activity vessels;
    - ii. routine atmospheric and greenhouse gas (**GHG**) emissions—emissions from operation of vessels (engines, generators, mobile and fixed plant and equipment) and helicopters;
    - iii. routine acoustic emissions—generation of noise from vessels, IMMR activities including remotely operated vehicle (ROV) activities, multibeam eco sounder, side scan sonar and positioning equipment;
    - iv. physical presence—interaction with other marine users; and disturbance to seabed and benthic habitat from IMMR activities and ROV operations; and
    - v. routine and non-routine discharges from vessels—discharges of sewage, grey water, putrescible waste, deck and bilge water, brine and cooling water;
  - b. unplanned activities (accidents, incidents, emergency situations):
    - i. hydrocarbon release from vessel collision;
    - ii. discharge—release of dry natural gas from pipeline, chemicals and hydrocarbons, and hazardous and non-hazardous solid waste/equipment; and
    - iii. physical presence—accidental introduction and establishment of invasive marine pests, and collision with marine fauna.
31. I further noted that the EP also included an evaluation of all the impacts and risks detailed in the EP (including those arising from potential emergency conditions whether resulting from accident or any other reason), whether arising directly or indirectly, appropriate to the nature and scale of each impact



or risk (Sections 6 and 7). The impact and risk analysis process is described in Section 5 and includes assigning a consequence rating (defined in Table 5-2) for all impacts and risks and a likelihood rating (defined in Table 5-3) for unplanned events. Together these were used to categorise planned and unplanned activities into a rating for the acceptability of the impact or risk (as set out in the "risk matrix" at Table 5-4). Section 5.5 contained a description about how the titleholder considers that the impacts and risks will be managed to ALARP.

32. The EP also included details of the control measures that will be used to reduce the impacts and risks of the activity to ALARP and to an acceptable level (Sections 6 and 7). These control measures (see Table 8-2) have been justified through an evaluation which has taken into account additional, alternative or improved controls that could be used.
33. The EP concluded that the impacts and risks generated by the activity and identified in Tables 6-1 and 7-1 had been reduced to ALARP and were acceptable when taking into account the application of control measures and considering the extent, severity, and duration of the impacts and risks.
34. The evaluation also addressed matters of national environmental significance (**MNES**) protected under the EPBC Act, including World Heritage properties, National Heritage properties, *Ramsar* wetlands, listed threatened species and communities, listed migratory species, Commonwealth marine areas, and the Great Barrier Reef Marine Park. The EP's evaluation of the impacts and risks to MNES is well supported, for example:
  - a. the impacts of artificial light emissions (Section 6.5), and other impacts pathways such as physical disturbances (Section 7.3) and underwater emissions (Section 6.6) from undertaking IMMR activities, on marine turtles associated with the activity. The EP references contemporary scientific literature and applicable modelling studies to inform the evaluation, as well as providing predictions of received levels of underwater noise in relation to biologically relevant thresholds; and
  - b. listed threatened and migratory marine turtle species that may potentially be present in the OA. In regard to marine turtle species, the EP identifies several BIAs that overlap with the OA, including the foraging BIA for the loggerhead turtle, and both the foraging and internesting BIAs for the flatback turtle and the olive ridley turtle. No BIAs for cetaceans were identified to overlap with the OA. Relevant recovery plans and conservation advice, including the National Light Pollution Guidelines for Wildlife and the Recovery Plan for Marine turtles in Australia 2017-2027 were considered in the evaluation.
35. Based on the information summarised above, I was reasonably satisfied that the EP met the requirements of reg 21(5) and (6).

#### **Regulation 21(7) - Environmental Performance Outcomes and Standards**

36. Regulation 21(7) provides that an environmental plan must set both environmental performance standards (**EPSs**) for the control measures identified under reg 21(5)(c) and environmental performance outcomes (**EPOs**) for the activity against which the performance of the titleholder in protecting the environment is to be measured, and include measurement criteria that the titleholder will use to determine whether each EPO and EPS is being met. I considered the EPOs, EPSs, and measurement criteria that were set out in Sections 6 and 7 of the EP and was satisfied that:
  - a. the EPOs define the performance outcomes for the management of the environmental aspects of the activity to ensure that environmental impacts and risks will be of an acceptable level. For example, the outcomes include:
    - i. seabed disturbance limited to planned activities and defined locations within the OA (EPO-02);
    - ii. no unplanned objects, emissions or discharges to sea or air (EPO-03);

- iii. no injury or mortality to EPBC Act listed fauna during activities. (EPO-06);
  - iv. no introduction of marine pest species (EPO-07); and
  - v. no loss of containment of hydrocarbon to the marine environment (EPO-08).
- b. the EPSs have been set for control measures that have been identified as necessary to reduce the environmental impacts and risks of the activity to ALARP and acceptable levels. For example, the EPS include that:
- i. the integrity of the Pipeline is maintained consistent with the Pipeline Integrity Management Plan (PIMP, H8S99-057-PRO-0001-1) (BUGEPCM10-EPS-01);
  - ii. vessels comply with the titleholder's Protected Marine Fauna Interaction and Sighting Procedure (EA-91-11-00003), which ensures compliance with Part 8 of the *Environment Protection and Biodiversity Conservation Regulations 2000* (Cth) (EPBC Regulations), which includes controls for minimising the risk of collision with marine fauna (BUGEP-CM16-EPS-01);
  - iii. chemicals potentially discharged to sea are either Chemical Hazard and Risk Management (CHARM) Gold/Silver or non-CHARM D/E rated, are Pose Little or No Risk to the Environment (PLONOR) substances under the United Kingdom Offshore Chemical Notification Scheme, or have a completed risk assessment with only environmentally acceptable products used. The risk assessment process described in the EP states there is a preference for chemicals with a low aquatic toxicity (for example, EC50/LC50 > 100 mg/L), low bioaccumulation potential (for example, Log Pow <3), and that are readily biodegradable (BUGEP-CM15-EPS-01);
  - iv. the Pipeline is operated within a design envelope (including operational data monitoring such as pressure and mass balance) and maintained consistent with the Pipeline operating procedures (BUGEP-CM32-EPS-01);
  - v. Pipeline repairs are carried out consistent with design specifications, including the Offshore Standard for Submarine Pipeline Systems (DNV-OS-F101) (BUGEPCM34-EPS-01); and
  - vi. vessels are managed to low risk in accordance with the Santos Introduced Marine Species Management Plan (IMSMP)(EA-00-RI-10172) prior to movement or transit into or within the invasive marine species management zone, which requires assessment of applicable vessels using the IMSMP risk assessment and the management of immersible equipment to low risk (BUGEP-CM23-EPS-01);
- c. measurement criteria (e.g. records of equipment being present, evidence of compliance with the EPBC Regulations, standards and procedures, evidence of notifications being sent to marine users) are established that will allow the titleholder to determine whether each EPO and EPS is being met for the duration of the activity.

37. Based on the information summarised above, I was reasonably satisfied that the EP met the requirements of reg 21(7).

### Implementation strategy for the EP: regulation 22

38. Regulation 22(1) provides that an environment plan must contain an implementation strategy for the activity in accordance with the requirements set out in that regulation. In this regard, I found that the EP includes:
- a. an implementation strategy, set out in Section 8, for the activity in accordance with reg 22(1);
  - b. a description of the environmental management system (EMS) for the activity in Section 8.1 of the EP, including specific measures to be used to ensure that, for the duration of the activity, the environmental impacts and risks of the activity continue to be identified and reduced to a level that is ALARP, control measures described in the EP are effective in reducing the environmental



impacts and risks of the activity to ALARP and an acceptable level, and the EPOs and EPSs are being met. The EP review process and management of change process are described in Sections 8.11.2 and 8.11.3 respectively (reg 22(2));

- c. the establishment of a clear chain of command, setting out the roles and responsibilities of personnel in relation to the implementation, management and review of the EP, including during emergencies or potential emergencies. Section 8.5 outlines the organisational structure for the activity and the roles and responsibilities of key project team members. The chain of command and roles and responsibilities of key personnel involved in spill preparation and response are defined in the Bayu-Undan to Darwin Gas Export Pipeline Oil Pollution Emergency Plan (**the OPEP**) (7710-650-EMP-0006) (reg 22(3));
- d. measures to ensure that each employee or contractor working on, or in connection with, the activity is aware of their responsibilities in relation to the EP, including during emergencies or potential emergencies, and has the appropriate competencies and training. Section 8.6 outlines the measures that are in place for ensuring employee and contractor competency, including the necessary awareness, training and induction requirements to fulfil their duties. The OPEP defines the emergency response training and minimum competency levels of personnel with responsibilities for emergency response, and defines the Source Control IMT structure and capability requirements (reg 22(4));
- e. provision for monitoring, recording, audit, management of non-conformance and review of the titleholder's environmental performance and the implementation strategy to ensure that the EPOs and EPSs in the EP are being met. In particular, Section 8.12 outlines the process for inspections and audits, and management of non-conformance and I considered that these were sufficient (reg 22(5));
- f. provision for monitoring of, and maintaining a quantitative record of, emissions and discharges (whether occurring during normal operations or otherwise), such that the record can be used to assess whether the EPOs and EPSs in the EP are being met. In particular, Table 8-5 outlines the approach to monitoring and record-keeping for emissions and discharges and I considered that these were sufficient (reg 22(6));
- g. at Section 8 of the EP, an outline of the routine reporting obligations to NOPSEMA, including annual environmental performance reporting, in accordance with reg 22(7);
- h. the OPEP, and provision for the updating of the OPEP (reg 22(8)). The OPEP also outlines appropriate arrangements for responding to and monitoring oil pollution and includes:
  - i. the control measures necessary for timely response to an emergency that results or may result in oil pollution (monitor and evaluate, source control for a vessel spill);
  - ii. the arrangements and capability that will be in place, for the duration of the activity, to ensure timely implementation of the control measures including arrangements of ongoing maintenance of response capability;
  - iii. the arrangements and capability that will be in place for monitoring the effectiveness of the control measures and ensuring that the EPSs for the control measures are met; and
  - iv. the arrangements and capability in place for monitoring oil pollution to inform response activities (reg 22(9));
- i. provision (via the OPEP) for monitoring of impacts to the environment from oil pollution and response activities that are appropriate to the nature and scale of the risk of the environmental impacts and risks for the activity and are sufficient to inform any remediation activities (reg 22(10));

- j. arrangements (via the OPEP) that are consistent with the national system for oil pollution preparedness and response (reg 22(11));
- k. arrangements for testing the response arrangements in the OPEP that are appropriate to the response arrangements and to the nature and scale of the risk of oil pollution for the activity (reg 22(12));
- l. arrangements for testing the response arrangements, including a description of the objectives of testing, a proposed schedule of tests mechanisms to examine the effectiveness of response arrangements against the objectives of testing, and mechanisms to address recommendations arising from tests (Section 5.5 of the OPEP) (reg 22(13)). Section 5.5.1, which was the proposed schedule of tests, included testing arrangements at each of the occasions specified in reg 22(14), and I considered that these were sufficient;
- m. provision for appropriate, ongoing consultation during the implementation of the activity with relevant authorities of the Commonwealth, a State or Territory and other relevant interested persons or organisations. In particular, Section 8.13.2 outlines the arrangements for ongoing consultation, all of which I considered appropriate. In particular, I noted that the EP provided a program of ongoing engagement with traditional custodians (Section 8.13.1) (reg 22(15)); and
- n. an implementation strategy that complies with the OPGGS Act, the Environment Regulations and the environmental legislation which were identified in Section 8 and Appendix B of the EP (reg 22(16)).

39. Having regard to the matters I have set out above, I am reasonably satisfied that the EP met the requirements of reg 22.

#### **Details of titleholder and liaison person: regulation 23**

40. I considered Section 1.5 of the EP and found that it included:

- a. details for the titleholder, including name, business address, contact details and Australian Company Number (ACN) (within the meaning of the *Corporations Act 2001*) (reg 23(1));
- b. details for the titleholder's nominated liaison person including name, business address and contact details (reg 23(2)); and
- c. arrangements for notifying NOPSEMA of a change in titleholder, a change in the titleholder's nominated liaison person or a change in the contact details for either the titleholder or the liaison person in Section 1.5.3 (reg 23(3)).

41. I am reasonably satisfied that the EP met the requirements of reg 23.

#### **Other information in the EP: regulation 24**

42. Regulation 24 sets out other information that must be included in an environment plan.

43. I considered the EP and found that it contained:

- a. the titleholder's "Environment, Health & Safety Policy" (Appendix A), as required by reg 24(a);
- b. the information required under reg 24(b)(i), being a report on all consultations under reg 25 of any relevant person by the titleholder (in Section 4, Appendix F, and the Sensitive Information Report part of the EP), including a summary of each response made by a relevant person (Table 4-9). The titleholder has provided a summary of responses received from relevant persons, such that relevant claims or objections can be adequately identified;
- c. an assessment of the merits of any objection or claim about the adverse impact of each activity to which the EP relates raised during relevant persons consultation (see Table 4-9), as required by

reg 24(b)(ii). The titleholder has identified claims and objections raised by relevant persons and assessed the merit of each objection or claim about the adverse impact of the activity described in the EP. Where there was merit to relevant claims or objections regarding the adverse impact of the activity to which the EP relates, the titleholder has considered the claims against the content of the EP to ensure relevant management measures have been included (Table 4-9). The consultation has progressed to resolve objections and claims made by relevant persons as far as reasonably practicable. I considered the titleholder's assessment of merit to objections and claims was reasonable;

- d. a statement of the titleholder's response, to each objection or claim (Table 4-9).;
- e. a copy of the full text of responses by all relevant persons (included in the Sensitive Information Report); and
- f. details of what constitutes reportable incidents in relation to the proposed activity in Section 8.10 of the EP.

## Should the Environment Plan be accepted?

44. As noted at [12] above, under reg 33 NOPSEMA must accept an environment plan if it is reasonably satisfied that the criteria in reg 34 are met.
45. In making my decision on whether an environment plan should be accepted, I was aware that I must consider information that was requested by NOPSEMA and provided by the titleholder pursuant to reg 32. Here, all of this information was contained in the various re-submitted versions of the EP, which resulted in the final version (Revision 6).
46. Against this background (and having considered the materials at **Attachment C**), I made the findings set out below against each criterion in reg 34. On the basis of those findings, I was reasonably satisfied that the EP met the criteria listed in reg 34.

### The EP was appropriate to the nature and scale of the activity: regulation 34(a)

47. I noted that Section 2 of the EP included a description of the scope and bounds of the activity. In particular, the EP provided details of the proposed location, spatial extent, timeframe, and duration of the described activities (see above at [20]).
48. The EP contained a thorough description of the activity components, with those components having the greatest potential to generate impacts and risks to the environment being described in more detail. For example, Section 2.5 provides a comprehensive description of the IMMR components that may be undertaken during the operations and preservation phases of the activity.
49. Section 3 and Appendix D of the EP contained a thorough description of the environment, and appropriately considered relevant values and sensitivities (including matters protected under Part 3 of the EPBC Act). The description of the EMBA includes areas that may be affected by potential emergency conditions in the event of an oil pollution incident which is conservatively defined through stochastic modelling of the worst-case spill scenario.
50. The level of detail included in the EP is appropriately scaled to the nature of the impacts and risks. A greater level of detail is included in the EP on the EMBA by planned operations within the OA, compared with the broader environment that may be exposed to low levels of hydrocarbon (in the unlikely event of a worst-case hydrocarbon release). Specifically, the EP includes:
  - a. a logical process that is applied to identify and describe the matters protected under Part 3 of the EPBC Act that may be present within the EMBA. The EP utilises relevant information to adequately

inform and support the descriptions, such as information available on the Department of Climate Change, Energy, Environment and Water (DCCEEW) website (e.g., plans of management, threat abatement plans, threatened species recovery plans, and marine bioregional plans) (Section 3 and Appendix D). In addition to information available on the DCCEEW website, the EP considered contemporary peer-reviewed literature and quantitative modelling for oil spills; and

- b. a description of the key physical, biological, social, economic and cultural features, values and sensitivities of the environment of the Commonwealth marine area and applies a logical process to identify and describe these features, values and sensitivities of the environment that overlap with the EMBA. The EP utilises relevant references and information sources to adequately inform and support the descriptions, such as contemporary peer-reviewed scientific literature and other authoritative sources (Section 3 and Appendix D).

51. I also noted that a sufficiently robust method, consistent with internationally recognised standard ISO 31000:2018 Risk Management, was applied in the EP for the identification and evaluation of environmental impacts and risks of the activity (Section 5.2). The detail and rigour applied to the impact and risk assessments (in Sections 6 and 7) is commensurate to the magnitude of the impacts and risks related to the activity, and the level of analysis and evaluation is proportionate to the nature and scale of the environmental impacts and risks generated by the activity.

52. I considered that there was a clear demonstration in the EP that the evaluation of impacts and risks informed the selection of suitable control measures appropriate for the nature and scale of the activity to either reduce the consequence/severity or likelihood of environmental impacts and risks.

53. The EP included sufficient information on the legislative requirements that are relevant to the activity (Appendix B). In addition, the environmental impact and risk assessments (Sections 6 and 7) included a description of how the relevant requirements will be met throughout the life of the activity. I noted that a description of how the titleholder will meet the requirements of section 572 of the OPGGS Act was included in the EP. Further information on my reasons about this matter are given in [102].

54. Based on the findings above, I was reasonably satisfied that the EP met the requirements of reg 34(a).

**The EP demonstrated that the environmental impacts and risks of the activity will be reduced to as low as reasonably practicable: regulation 34(b)**

55. The next criterion is that an environmental plan must demonstrate that the environmental impacts and risks of the activity will be reduced to ALARP (reg 34(b)). Focusing on this criterion, I considered the EP and found that:

- a. Section 5 of the EP describes the process applied to evaluate whether impacts and risks are reduced to ALARP. Sections 6 and 7 of the EP present a clear, systematic, and reproducible process for the evaluation of all impacts and risks, which details the control measures to be implemented, including an evaluation of additional potential control measures, and justifies why control measures are either adopted or rejected (with reasoned conclusions) to demonstrate that the environmental impacts and risks of the activity will be reduced to ALARP. The evaluation of the adoption of control measures is based on environmental benefits and the consideration of the feasibility and cost/sacrifice of implementation which I considered to be well-reasoned;
- b. the titleholder applied the environmental risk assessment process (described in Section 5) appropriately for planned aspects of the activity, in particular for higher order hazards associated with the activity, such as light emissions and acoustic (underwater noise) emissions. For such higher order impacts and risks, I accepted that the exploration of alternative, additional, or improved control measures had been undertaken and that the control measures ultimately adopted in the EP demonstrated that environmental impacts will be reduced to ALARP;

- c. unplanned aspects of the activity are described in Section 7 of the EP, including accidental introduction and establishment of invasive marine species, discharge of hazardous and non-hazardous wastes (vessel-based activities), release of dry natural gas from pipeline and collision with marine fauna. These aspects are appropriately described and evaluated such as to give confidence that the control measures selected are appropriate and risks are reduced to ALARP;
- d. the evaluation of impacts and risks has informed the selection of suitable control measures to either reduce the consequence/severity or likelihood of impacts and risks. The control measures outlined in Sections 6 and 7 of the EP are sufficiently detailed to demonstrate that they will be effective in reducing the impacts and risks for the duration of the activity. The level of detail in the ALARP assessment is commensurate to the nature and scale of the potential impacts and risks. For higher order impacts and risks, the exploration of alternative, additional, or improved control measures is evident by the titleholder. The EP demonstrated, through reasoned and supported arguments, that there are no other practical control measures that could reasonably be taken to reduce impacts and risks any further;
- e. the EP considered information gathered from the consultation process (Table 4-14) when demonstrating impacts and risks are, or will be, reduced to ALARP, with each impact and risk in Sections 6 and 7 of the EP addressing the matters raised by relevant persons. For example, advice from the Department of Agriculture, Forestry and Fisheries (DAFF) regarding vessel biosecurity requirements to mitigate the risk of impacts from the activity (notifications, vessel certification, ballast discharge requirements, biofouling) were included as environmental performance standards (EPS BUGEP-CM23). I was satisfied that all the planned and unplanned impacts and risks described in Sections 6 and 7 the EP will be reduced to ALARP based on that evaluation and those control measures that will be implemented;
- f. the potential impacts from the activity to listed threatened and migratory marine turtle species (a MNES) was the focus of a topic assessment during the EP assessment process. I was satisfied that the EP adequately identified and evaluated the potential impacts and risks from the activity to marine turtles. The EP was informed by the likelihood of species presence, distribution, and behaviour within the area that may be affected by light emissions and was supported with peer-reviewed literature. In particular:
  - i. the evaluation of impacts and risks to threatened and migratory marine turtles were informed by applying suitable control measures that are not inconsistent with management measures set out in the Recovery Plan for Marine Turtles 2017-2027 and the National Light Pollution Guidelines for Wildlife 2023; and
  - ii. the EP considered, evaluated, and detailed all reasonable control measures that could reduce impacts to threatened and migratory marine turtles to ALARP [see 55g];
- g. the EP provided substantiated reasons why the adopted controls for protected species will reduce the potential impacts on those species to the point that any additional or alternative control measures would either not be feasible, or involve a cost that would be grossly disproportionate to the benefit that would be achieved. The control measures adopted include that:
  - i. lighting will be used only as required for safe work conditions and navigation and in accordance with Australian maritime requirements for minimum lighting requirements;
  - ii. pre-mobilisation review and planning of lighting on vessels prior to IMMR activities commencing will be undertaken; and
  - iii. a lighting management plan (or equivalent sections within a Project Execution Plan or contractor procedure) will be prepared prior to an IMMR activity.

56. Based on the findings above, I was reasonably satisfied that the EP met the requirements of reg 34(b).

**The EP demonstrated that the environmental impacts and risks of the activity will be of an acceptable level: regulation 34(c)**

57. I considered that the EP demonstrated that the environmental impacts and risks of the activity will be of an acceptable level and therefore satisfied the requirements of reg 34(c). Specifically, I found that:

- a. Sections 6 and 7 of the EP applied a clear, systematic, and reproducible process for demonstrating how environmental risks will be of an acceptable level and the statements and conclusions drawn by the titleholder in the EP were sufficiently supported with scientific literature. The process is commensurate with the nature and scale of the activity and the severity of its impacts and risks with more effort and rigour to evaluations where there is a higher degree of scientific uncertainty in predictions of impacts and risks and/or severity of potential consequence of impacts and risks. For example, the EP explored alternative, additional, or improved control measures to manage light emissions on turtles (Tables 6-9), with the evaluation resulting in standard control measures supported further by additional procedures (e.g., development of a lighting management plan prior to IMMR activities occurring);
- b. Section 5.6 of the EP described the process undertaken by the titleholder to determine acceptable levels of impact and risk for the activity, including through consideration of the principles of Ecological Sustainable Development (ESD). The criteria for demonstrating acceptability are in keeping with NOPSEMA guidance;
- c. The titleholder has implemented the following controls:
  - i. Adoption of EPOs and controls relevant to the activity;
  - ii. Adoption of additional specific controls where required;
  - iii. Consideration of internal/external context and other requirements specific to the activity (including issues raised during relevant persons consultation);
- d. the EP demonstrated that the activity is not likely to have a significant impact on MNES protected under the EPBC Act, including World Heritage properties, National Heritage properties, *Ramsar* wetlands, listed threatened species and communities, listed migratory species, Commonwealth marine areas, and the Great Barrier Reef Marine Park;
- e. the EP included appropriate and accurate content to demonstrate that the proposed activity is not inconsistent with relevant key documents such as recovery plans, conservation advice and management plans, which are outlined in Section 3.2.5.1. An assessment of the activity against the relevant objectives and action areas in these plans was set out in Table 3-10, and this information was applied in the evaluation of impacts and risks. For example, the artificial light evaluation in Section 6.4 demonstrated that the activity will be managed in a manner that is not inconsistent with the recovery plan for marine turtles; and
- f. in relation to planned aspects of the activity (Section 6), predictions were made regarding impacts and risks to the environment that were considered suitably conservative and resulted in the inclusion of appropriate controls, given the nature of the activity. For example, the environmental assessment included consideration of aspects typical for pipeline operation and preservation activities, such as light emissions, acoustic emissions, seabed and benthic habitat disturbance, vessel marine discharges and emissions (i.e., atmospheric and greenhouse gas emissions, sewage, grey water, putrescible waste, deck and bilge water, and brine or cooling water).

58. I considered that the EP demonstrated that the potential impacts and risks from a release of natural dry gas would be of an acceptable level (Section 7.7). This is because:



- a. the EP evaluated the impact and risks of a potential gas release during both the operational and preservation activity phases;
  - b. the pipeline will be managed (during both the operational and preservation phases) under processes and management plans including pipeline operating procedures (e.g., Offshore Standard for Submarine Pipeline Systems - DNV-OSF101), a pipeline integrity management plan (BUGEP-CM10), and the Bayu-Undan Export Pipeline Safety Case (BU/HSE/MAN/010);
  - c. the ongoing inspection of the Pipeline will be conducted in accordance with a risk-based inspection (RBI) schedule (Table 2-5) based on the methods outlined in the titleholder's Pipeline Integrity Management Plan (PIMP, H8-10000001725); and
  - d. pipeline maintenance and repair activities are described (Section 2.5.2) and processes and systems are in place to review and risk assess pipeline inspection results, and undertake management actions in accordance with the titleholder's systems and procedures (e.g., Emergency Repair Management Plan, Operational Risk Management Procedure, Pipeline Integrity Management Plan).
59. In relation to MNES, which were the focus of a topic assessment, I considered that the EP demonstrated that specific impacts (such as injury or significant behavioural disturbance to marine turtles from artificial light) will be of an acceptable level because:
- a. the artificial light evaluation in Section 6.5 of the EP was informed by contemporary peer-reviewed literature and internationally accepted impact evaluation thresholds. The NOPSEMA assessment team considered the literature and impact evaluation thresholds in the EP and was of the view that the literature and the impact evaluation thresholds were applicable and appropriate. I agreed with that view;
  - b. the EP described an appropriate range of control measures to reduce impacts from artificial light to threatened and listed marine turtles to an acceptable level. In particular, the EP included both standard control measures used across industry and additional controls (such as the implementation of a light management plan for the activity) to ensure any potential light impacts to sensitive marine turtle habits (e.g., nesting areas) are managed to acceptable levels prior to IMMR activities commencing; and
  - c. the EP demonstrated that with the implementation of the proposed control measures (see [54.g] above), the activity is not expected to injure or result in biologically significant behavioural disturbance to marine turtles and is not inconsistent with relevant requirements, including the Recovery Plan for Marine Turtles in Australia 2017-2027 or the National Light Pollution Guidelines for Wildlife (DCCEEW 2023).
60. In relation to unplanned aspects of the activity (Section 7), I was satisfied that the EP appropriately considered risks, such as the accidental introduction and establishment of invasive marine species, collision with marine fauna, and unplanned hydrocarbon and chemical releases. Uncertainty was addressed in the evaluation of oil pollution incidents through the application of appropriately conservative stochastic modelling and recognition of assumptions made, and consideration was given to the ability to scale the spill response to address spills of different magnitudes. The evaluation of risks posed by spill scenarios included consideration of potential impacts to the receptors outlined in the description of the environment (Section 3) and informed the selection of spill response options which I considered were reasonable and appropriate.
61. I noted that the EP provided an appropriate evaluation of impacts and risks specific for the nature and location of the activity and relevant environmental receptors. The evaluation was commensurate to the level of impact or risk presented and provides justifiable conclusions that impacts and risks will be

managed to an acceptable level (Sections 6 and 7). The impact and risk evaluations demonstrated that the acceptable level will be met, and that the EPOs will be achieved.

62. Further, information provided during relevant persons consultation was appropriately considered, evaluated, and incorporated into the EP. The titleholder considered information gathered from the consultation process when demonstrating that impacts and risks will be managed to an acceptable level. For example, consultation with a First Nations group (i.e., the Wulna Clan) identified concerns of the potential impacts to whales from vessel interactions. I found that the titleholder provided an appropriate response to the relevant person regarding this concern (summarised in Table 4-14), and that the risk assessment (Section 7.3) provided reasonable control measures for reducing the risk of impacts to whales to an acceptable level.

63. Based on the findings above, I was satisfied that the EP met the requirements of reg 34(c).

**The EP provided for appropriate environmental performance outcomes, environmental performance standards, and measurement criteria: regulation 34(d)**

64. Sections 6 and 7 of the EP contained the EPOs, EPSs and measurement criteria for impacts and risks of the activity.

65. The EP provided appropriate EPOs, which I considered:

- a. were relevant and addressed all the identified environmental impacts and risks for the activity;
- b. when read in conjunction with associated EPSs, established measurable levels for management of environmental aspects of the activity;
- c. when read in conjunction with the relevant environmental impact/risk evaluation and adopted management measures (which I have considered in some detail at [reg 34(b) and (c)] , demonstrated that the environmental impacts and risks will be managed to an acceptable level and as low as reasonably practicable; and
- d. are consistent with the principles of ESD and relevant requirements (such as plans of management, recovery plans, conservation advice and other guidance for matters protected under the EPBC Act), considering items (a) and (b) above.

66. The EP provided appropriate EPSs that:

- a. were clearly linked to control measures for all impacts and risks;
- b. for each control measure, contained statements of performance which clarified how the control measure is to function in order to effectively reduce and mitigate impacts and risks; and
- c. have clear measurement criteria that link to the EPSs and will provide a record that the EPSs have been met.

67. I considered that the EPOs, EPSs, and measurement criteria were clearly linked and complementary of one another. An EPO is included for each environmental aspect which sets out the level of performance required for managing environmental impacts and risks, multiple EPSs state the performance required of relevant control measures, and corresponding measurement criteria are identified to determine whether the EPOs/EPSs are being met.

68. The OPEP contained EPOs, EPSs, and measurement criteria for response preparedness and implementation..

69. Based on the findings above, I was reasonably satisfied that the EP met the requirements of reg 34(d).

## **The EP included an appropriate implementation strategy and monitoring, recording and reporting arrangements: regulation 34(e)**

70. Regulation 34(e) requires that an environment plan include an appropriate implementation strategy and monitoring, recording and reporting arrangements.
71. In considering the EP, I noted that the implementation strategy outlined in Section 8 provided a range of systems, practices, and processes (outlined in further detail below) which I was satisfied provided for all impacts and risks to be reduced to ALARP and acceptable levels for the duration of the activity.
72. I was satisfied that the management of change process was adequately described in Section 8.11.2 and was appropriate because:
- management of changes relevant to the scope of the activity will be managed in accordance with reg 39;
  - the titleholder has established internal management of change procedures that it will follow when assessing changes to the activity. The procedure determines whether a revision of the EP is required and whether that revision is to be submitted to NOPSEMA for consideration;
  - changes will be risk-assessed to determine the significance of any potential new environmental impacts or risks not provided for in the EP; and
  - it provided a reasonable description of the titleholder's learning and knowledge-sharing processes.
73. Section 8.1 of the EP described the titleholder's environmental management system, the Santos Management System. I was satisfied that this was appropriate as the system provided a structured framework of documentation (compass and policies, expectations, processes and procedures, and guidelines) that set common expectations governing how all employees and contractors will work.
74. I was satisfied that the EP (Section 8.6) included appropriate training and competency requirements relevant to the EP with all personnel on the project vessels required to be competent to perform assigned positions. The induction covered the Health, Safety and Environment requirements and environmental information specific to the activity location including environmental sensitivities, activities with highest risk, EP commitments, incident reporting and notifications, management of change process and oil pollution emergency response. Overall, appropriate commitment was made in the EP to training to ensure that all employees and contractors have suitable competencies.
75. The key roles and responsibilities of personnel involved in the implementation, management, and review of the EP were appropriately outlined in Section 8.5 and Table 8-3 and the roles and responsibilities for personnel involved in oil spill preparation and response were outlined clearly in Section 5.2 of the OPEP.
76. Further, I considered that the OPEP included appropriate arrangements that are suitable, given the spill scenarios presented, and addressed each of the EP content requirements in reg 22 (for reasons I have given above at [38]-[39]). I particularly noted that, the OPEP:
- detailed the oil pollution response control measures that will be used to reduce the impacts and risks of the activity to ALARP and an acceptable level, the arrangements for responding to and monitoring oil pollution to inform response activities, the arrangements for updating and testing the oil pollution response arrangements and control measures, and provided for the monitoring of impacts to the environment from oil pollution and response activities; and
  - contained a First Strike Plan that provided the oil pollution arrangements and control measures in an operational deployment context.
77. I acknowledged the monitoring, recording, and reporting arrangements described in Section 8.10, and that these included routine internal and external reporting requirements and incident reporting

arrangements. I considered that these arrangements were adequate and appropriate. I noted that the information collected via those arrangements will:

- a. be based on the EPOs, controls, standards, and measurement criteria in the EP (which I considered to be suitable for the activity); and
- b. include environmental discharges reports that record volumes of planned and unplanned discharges to marine environment and atmosphere.

78. The EP also provided for appropriate auditing, review, and management of non-conformances of the titleholder's environmental performance and the implementation strategy (Section 8.12). Non-conformances will be entered into an incident management system and assigned corrective actions that will be monitored and closed out in a timely manner.

79. The EP provided for the implementation of ongoing consultation arrangements in Section 8.13, with planned notifications to relevant persons outlined in Section 8.10.1. I considered that these arrangements were appropriate because the titleholder:

- a. has committed to continue to update First Nations relevant persons on a quarterly basis through quarterly written activity updates via land councils and Aboriginal Corporations;
- b. will provide a mechanism to subscribe to its website which can be utilised by relevant persons and those interested in the activity to remain up-to-date on the activity. Quarterly updates on the activity will be provided on the titleholder's website; and
- c. during the life of the EP, will continue to accept, assess, and respond to post-acceptance consultation feedback.

80. Based on the findings above, I was satisfied that the EP met the requirements of reg 34(e).

**The EP does not involve the activity, or part of the activity, other than arrangement for environmental monitoring or for responding to an emergency, being undertaken in any part of a declared World Heritage Property within the meaning of the EPBC Act: regulation 34(f)**

81. As stated above at [20], I was satisfied that the EP clearly describes the boundaries of the activity (Section 2 and 3), which demonstrates that no part of the activity will be undertaken in any part of a World Heritage Property within the meaning of the EPBC Act.

82. In those circumstances, I was satisfied that the EP met the requirements of reg 34(f).

**The EP demonstrated that the titleholder has carried out the consultations required by Division 3, and the measures (if any) that are adopted because of the consultations are appropriate: regulation 34(g)**

83. Regulation 34(g) has two components which an environment plan must demonstrate:

- a. First, that consultation has occurred in accordance with Division 3. Division 3 requires that the titleholder consult with each 'relevant person' as defined in reg 25(1), and imposes certain requirements for how that consultation is to occur (as specified in reg 25(2)-(4)); and
- b. Second, that the measures (if any) that the titleholder has adopted, or proposes to adopt, because of the consultations are appropriate.

84. The OPGGS Act and Environment Regulations do not define what constitutes 'consultation' for the purposes of reg 25. However, there must first be identification of the relevant persons to be consulted, followed by consultation, the purpose of which is to ensure that the titleholder has ascertained, understood, and addressed all the environmental impacts and risks that might arise from its proposed activity.

85. Whether the steps and actions taken by a titleholder amount to 'consultation' will vary depending upon the particular circumstances and must reflect the characteristics of the relevant persons affected by the titleholder's proposed activity. However, consultation does not require every opportunity to be afforded. It also does not mean that, where those being consulted do not consider they have been properly consulted, 'consultation' has not been carried out. Overall, I must be reasonably satisfied that consultation undertaken was appropriate and adapted to the nature of the relevant persons, and that reasonable opportunity to participate in the preparation of the EP was given.
86. In determining whether the consultation requirements set by reg 34(g) had been met, I had regard to the content of the EP. In particular, I considered the titleholder's consultation methodology in Section 4, Appendix F and the Sensitive Information Report part of the EP.
87. I found that Section 4 of the EP provided descriptions of the consultation process and the rationale used to determine who was a relevant person and how to consult with relevant persons. These descriptions included the approach to providing sufficient information to allow the relevant person to make an informed assessment of the possible consequences of the activity on their functions, interests, or activities and to allow the relevant person a reasonable period of time to engage in the consultation process.
88. I found that the EP described a clear process for the identification and broad capture of relevant persons in accordance with reg 25(1). This is because:
- a. the process (outlined in Section 4.5) included reference to multiple sources of information, such as publicly available materials (e.g., management plans for AMPs, and DAFF Fisheries Status Reports), review of databases and registers (e.g., commercial fishing catch and effort data), and published guidance (e.g., AFMA consultation guidance);
  - b. the process included consideration of published guidance developed by relevant persons detailing their functions, interests, or activities and how and when they wish to be consulted on activities. For example, the titleholder referred to guidance published by Western Australian Fishing Industry Council (WAFIC) in relation to consultation with commercial fishing licence holders in WA-managed fisheries;
  - c. the process provided for the identification of relevant persons within all the categories of relevant persons defined by reg 25 (1)(a)–(e). The relevant person identification methodology for a suitable range of categories was presented in Table 4-3 and Table 4-5;
  - d. the process provided for the terms, "functions," "interests," and "activities" for the purpose of identifying relevant persons under reg 25 to be interpreted and applied broadly by the titleholder in a manner consistent with the interpretation of those terms in NOPSEMA's 'Consultation in the course of preparing an environment plan guideline' (N-04750-GL2086). A description of the functions, interests, or activities of those persons or organisations identified as relevant persons under reg 25 was included in Table 4-6;
  - e. the process (in Section 4.5.9, and Tables 4-7 and 4-8) included details and evidence of the steps taken by the titleholder to create awareness of the activity and the consultation process and to encourage potentially relevant persons that the titleholder may not be aware of to make themselves known to the titleholder. The steps taken by the titleholder included advertising in national, state, and relevant local newspapers, geotargeted social media campaigns, community information sessions, and community reference group information sessions;
  - f. the process detailed how the titleholder made an assessment to determine whether an individual or organisation that has self-identified as a relevant person was or was not a relevant person for the purposes of reg 25, having regard to each person's stated functions, interests, and activities (Section 4.5.2);

- g. the EP clearly identified who was a relevant person and the category set out in reg 25 that the person fell within. Relevant persons identified in the EP included, but were not limited to:
  - i. government departments / agencies (marine, environment, and industry);
  - ii. commercial fisheries and peak representative bodies;
  - iii. recreational marine users and peak representative bodies;
  - iv. other titleholders and operators;
  - v. peak industry representative bodies and associations;
  - vi. Traditional Custodians and First Nations nominated representative corporations;
  - vii. local government and recognised local community reference/liaison groups or organisations;
  - viii. other non-government groups or organisations; and
  - ix. research institutes and local conservation groups or organisations; and
- h. The process included additional details on how the titleholder's process identified First Nations relevant persons, including through engagement with relevant government authorities and First Nations representative bodies (Section 4.5.3).

89. I considered that the nature of the activity, description of the environment, and the possible impacts and risks of the activity were appropriately taken into account by the titleholder in determining whether the activity may be relevant to authorities and Departments under regulation 25(a), (b) and (c), or determining whose functions, interests, and activities may be affected under regulation 25(d). This is because the titleholder considered:

- a. the nature and scale of the activity and the possible impacts and risks of the activity when determining who to consult with (Sections 2, 6, and 7); and
- b. all the known environmental values and sensitivities in the EMBA by the planned and unplanned impacts and risks of the activity when determining relevant persons (Section 4.5).

90. I considered the content of Section 4 and Appendix F and the Sensitive Information Report part of the EP and found that the titleholder's approach to the provision of sufficient information allowed the relevant persons to make informed assessments of the possible consequences of the activity on their functions, interests, or activities and that a reasonable period for the consultation was provided. I formed this view because:

- a. the titleholder sufficiently informed relevant persons of the purpose of consultation, including advising relevant persons of the titleholder's obligations for consultation. This included sharing the reasons for the consultation and providing a copy of NOPSEMA's 'Consultation on offshore petroleum environment plans' Brochure as part of the consultation;
- b. the titleholder provided relevant persons with sufficient information to allow the relevant person to make an informed assessment of the possible consequences of the activity on their functions, interests, or activities, in accordance with reg 25(2). This is because:
  - i. the EP (Section 4.5.5) included a description of the approach to provision of sufficient information that considered the functions, interests, or activities of relevant persons and the impacts and risks that may affect them;
  - ii. the titleholder tailored the information to suit the needs of the different types of relevant persons and provided information in a form which I was satisfied was readily accessible and appropriate for the relevant persons being consulted, including an Information Booklet, presentations, verbal briefings including community sessions with interpretation services present, graphics and videos (Section 4.5.6);
  - iii. the titleholder considered views of relevant persons as to what constitutes sufficient information and has considered requests for additional information. The titleholder responded to all requests made, including through provision of additional information in relation to impacts and risks of



the activity. For example, additional information was provided to the Wilderness Society, the Environment Centre NT (ECNT), Autoridade Nacional do Petróleo (ANP), and the Northern Prawn Fishing Industry (NPFI); and

- iv. the consultation material provided sufficient information about the environment and impacts on the environment to allow relevant persons to make an informed assessment of the possible consequences of the activity on their functions, interests, or activities. The consultation material included detailed consultation information sheets, bespoke (plain English) consultation information sheet targeting First Nations groups, activity emails, newspaper advertisements, and custom PowerPoint presentations for meetings;
  - c. I also considered that the titleholder allowed relevant persons a reasonable period for the consultation, in accordance with reg 25(3). This is because:
    - i. consultation with relevant persons commenced in September 2023 (Table 4-9) and continued throughout the course of preparing the EP, providing sufficient time for relevant persons to consider the information provided and make an informed response. I noted that the consultation process provided various opportunities for relevant persons to be identified or to self-identify and engage in the consultation process;
    - ii. the EP (Section 4.5.7) described the approach taken to determining a reasonable period for consultation that was based on consideration of the relevant person's particular circumstances and included consideration of the nature, scale, and complexity of the activity, as well as the extent and severity of potential impacts and risks on each relevant person's functions, interests, or activities;
    - iii. the process for relevant persons consultation provided for the titleholder to take into account any availability and accessibility issues of relevant persons. For example, representatives of the titleholder travelled to regional locations to meet relevant persons, with the titleholder hosting community information sessions with First Nations groups (e.g. Marrikawuyanga, Yimpinari, Wulirankuwu, Mantiyupwi, Jikilaruwu and Malawu);
    - iv. the titleholder considered relevant persons' views of what constitutes a reasonable period for consultation and considered requests for additional time by relevant persons. Additional time was provided where reasonable requests were made, such as to the Department of Defence (Table 4-9); and
    - v. the titleholder addressed all responses from relevant persons at the date of EP submission to NOPSEMA. The manner in which the titleholder addressed responses was summarised in the EP for all relevant persons (Table 4-9). For the most part, this involved the titleholder preparing and sending written correspondences (letters or email) to the relevant persons addressing their response(s). In some cases, records were provided indicating that a phone call had been returned or a meeting organised and held. Records of any written responses were also included in the Sensitive Information Report; and
  - d. the titleholder informed relevant persons that they may request that particular information provided during consultation not be published. Information subject to such a request was not published, in accordance with reg 25(4). The titleholder consistently provided these notifications through the information sheets, in specific written correspondence, and at meetings.
91. Having considered the detailed description of the consultation process in the EP, for reasons set out at [87]-[90] above, I considered that the approach adopted by the titleholder for identifying relevant persons was appropriate. I also considered that the titleholder provided sufficient information which allowed for relevant persons to participate in informed consultation. Further, given the period of time afforded by the titleholder for consultation and the evidence of engagements with relevant persons,

including multiple opportunities for the relevant persons to provide information to the titleholder, I accepted that a reasonable period for the consultation was given.

92. I found that information gathered through the consultation process was incorporated into the EP and effectively informed the identification of environmental values and sensitivities to ensure impacts and risks are reduced to ALARP and acceptable levels. This is because the information provided by relevant persons throughout the consultation process assisted the titleholder to ascertain, understand, and address all of the environmental impacts and risks that might arise from its proposed activity. For example, information provided during consultation with the NPFI regarding Sawfish values informed the description of the environment (Section 3) and was considered in the evaluation of environmental impacts and risks in the risk assessment in Sections 6 and 7.
93. I considered that the titleholder's assessment of the merit of, and all responses to, objections and claims were reasonable and supported, and the measures adopted (if any) because of the consultation were appropriate. This is because:
- a. the titleholder's assessment and its responses made cross-references to records where applicable. Where claims or objections regarding the adverse impact of the activity were raised, relevant to the activity to which the EP relates, the titleholder considered the claims against the content of the EP to ensure relevant management measures were included. The consultation progressed to resolve objections and claims made by relevant persons as far as reasonably practicable; and
  - b. in some cases, the titleholder's assessment of the merits of objections and claims resulted in the adoption of control measures to demonstrate that impacts and risks will be reduced to ALARP and acceptable levels. For example, anti-collision measure evaluation requirement control measures identified through consultation with AMSA were included in the EP (Table 7-16);
94. I found that the EP included a report on all consultations under reg 25 of any relevant person by the titleholder in accordance with reg 24(b). In particular, I noted that:
- a. The NOPSEMA assessment team reviewed the full text records to verify the accuracy of the summary of the consultation in Table 4-9. I accepted advice that the summary adequately reflected the responses received from relevant persons, such that relevant claims or objections could be adequately identified;
  - b. the EP (Section 4, Table 4-9) contained an assessment of the merits of any objection or claim raised during relevant persons consultation. The titleholder identified claims and objections raised by relevant persons and assessed the merit of each objection or claim about the adverse impact of the activity described in the EP. The assessment of merit subsequently informed the titleholder's response or proposed response to the relevant person's objection or claim. The report contains a statement of the titleholder's response, or proposed response, if any, to each objection or claim. Where there was a claim or objection identified, the titleholder provided a response which I considered adequate to each objection or claim that has been raised;
  - c. a number of objections and claims were made relating to the activity and future plans for the Pipeline. Where concerns were raised, including in relation to the Pipeline preservation period, Pipeline integrity, Pipeline monitoring and gas release impacts, the titleholder provided further details including in relation to on the Pipeline preservation process, the existing established pipeline integrity monitoring procedures including the risk-based pipeline inspection frequency, and an overview of the natural gas release risks and dispersion process. Various relevant persons, such as The Wilderness Society, the Northern Land Council and the Environment Centre of NT requested information on planning for Pipeline decommissioning. The titleholder provided responses to these relevant persons with information such as the completion of technical and scientific studies and the required approvals for the Pipeline decommissioning phase, I consider the responses to the decommissioning claims and objections were appropriate, as the titleholder acknowledged these concerns and their response was

that decommissioning activities will be considered under a decommissioning environment plan. My reasons relating to s572 of the OPGGS Act are set out at [102] below; and

- d. a copy of the full text of any response by a relevant person was included in the Sensitive Information Report part of the EP.

95. I also noted that the titleholder tailored their approach to First Nations consultation to assess the possible consequence of the proposed activity on their functions, interests, or activities. My consideration of the titleholders' application of this approach is below at [96]-[97].

96. The EP described a clear process for the identification and broad capture of First Nations relevant persons in accordance with reg 25(1). This is because:

- a. the titleholder's methodology, as identified in the EP, was consistent with the purpose and intention behind reg 25, NOPSEMA's guideline on Consultation in the course of preparing an environment plan (12 May 2023), and Federal Court authority on the interpretation of this provision, such as *Santos NA Barossa Pty Ltd v Tipakalippa* [2022] FCAFC 193; (2022) 296 FCR 124, namely, to ensure that the titleholder had 'ascertained, understood and addressed all the environmental impacts and risks that might arise from its proposed activity';
- b. the process for relevant person identification provided for the capture of First Nations representative groups by identifying and consulting with all relevant groups within or adjacent to the EMBA as relevant persons as defined by existing systems of recognition provided under native title or cultural heritage legislation, marine park management plans, or identification by other First Nations groups or entities (Section 4.5.3);
- c. the identification of First Nations relevant persons was informed appropriately by the operational aspects of the activity and the associated impacts and risks, including the highly unlikely scenario of a worst-case oil pollution event (i.e., marine diesel spill from vessel collision). The titleholder considered the conservatism of the oil spill modelling, the remote likelihood of the event occurring and the control measures that would be implemented in the event of a spill, when determining whether the functions, interests, or activities of First Nations relevant persons would be affected;
- d. the process (Section 4.5.3) clearly identified that First Nations groups, such as Native Title Representative Bodies (NTRBs), Prescribed Body Corporates (PBCs), groups who may be parties to Indigenous Protected Areas, or named in ILUAs may be relevant persons with a function that may be affected by the activities in the EP (Table 4-6);
- e. the process enabled First Nations individuals to self-identify as relevant persons in response to widely distributed public notices in national and local newspapers, targeted regional advertising, and community engagement opportunities (Section 4.5.3, Tables 4-7 and 4-8); and
- f. the First Nations people/groups identified as relevant persons for this EP (Table 4-6) consisted of five representative organisations (the Larrakia Nation Aboriginal Corporation, the Northern Land Council, the Tiwi Island Clan Groups, the Tiwi Land Council and the Wickham Point Deed Reference Group) and five consultative committees and clan groups (the Mulurryud Consultative Committee, the Rak Badjalarr, the Daly River / Port Keats FNCC, the Wuluna clan, and the Agalda clan). No other First Nations groups made themselves known to the titleholder and/or self-identified as a relevant person.

97. In reviewing the consultation summary report (Section 4) and records provided in the Sensitive Information Report ('consultation records') relating to consultation with First Nation relevant persons, I found that:

- a. the consultation undertaken by the titleholder provided for the identification and consultation with those persons and organisations who were reasonably capable of being ascertained. Consultation for the activity commenced in September 2023 and has continued throughout the course of preparing the EP, allowing multiple opportunities and sufficient time for relevant persons to engage;
  - b. consultation was undertaken in a manner that accommodated for the provision of sufficient information (such as holding bespoke community meetings, providing customised information sheets, slide packs, phone conversations, newspaper and social media advertisements) and reasonable requests for resources and material to support effective consultation has been met. This included communication, notification, and confirmation of measures adopted as result of consultation with First Nations relevant persons;
  - c. the consultation process considered availability and accessibility issues of relevant persons and made provision for travelling to regional locations to meet with relevant persons. For example, representatives of the titleholder travelled to the Tiwi Islands to identify and meet potentially relevant persons at widely advertised meetings;
  - d. First Nations relevant persons or groups consulted for this activity were also requested to help identify other First Nations relevant persons who hold communal cultural interests that may be affected by the activity, or to provide advice on the appropriate means to identify and consult with these individuals and/or groups;
  - e. the consultation process considered the established and ongoing operational presence of the titleholder in the area for some decades, and previous consultation undertaken for this and other activities in the region;
  - f. an iterative, targeted, repeated, and reasonable effort was made to engage with specific persons or groups of relevant persons in order to elicit a response and engage with the process; and
  - g. Section 4.6 and Appendix F of the EP provided the titleholder's assessment of the merit of, and all responses to, objections and claims. No specific objection or concern regarding the proposed activity, that had not been reasonably responded to, addressed or incorporated into the EP as a result of the consultation process remained outstanding.
98. Having regard to the matters set out at [96] – [97] above, I found that the EP demonstrated that the titleholder carried out consultation with First Nations relevant persons in an effective manner, providing sufficient information to allow the relevant persons to make an informed assessment of the possible consequences of the activity on their functions, interests, or activities, a reasonable period for the consultation. The titleholder assessed and responded to objections and claims.
99. Accordingly, for the reasons set out above, I was reasonably satisfied that consultation as per the requirements of reg 34(g), insofar as they relate to First Nations (individuals and/or groups/entities) was satisfied.
100. Further, I noted the ongoing consultation commitment in the EP (Section 8.13). I considered this was an appropriate measure which would ensure that any future feedback, objections, or claims which may arise from relevant persons would be assessed and reported.
101. Overall, I was reasonably satisfied that reg 34(g) was met.

## The EP complies with the OPGGS Act, the Environment Regulations and any other regulations made under the OPGGS Act: regulation 34(h)

102. I was satisfied that the EP complied with the OPGGS Act and the Environment Regulations. In particular, I considered s572 of the OPGGS Act and that:
- a. the EP included provision for IMMR activities during the operations and preservation phases (Sections 2.5 and 2.7.8) to ensure that the Pipeline will be maintained in good condition and repair and can be removed when no longer in use, consistent with section 572(2) and (3) of the OPGGS Act;
  - b. the EP included a plan for decommissioning, including a set of objectives, a range of technical and environmental studies that have been undertaken to date (Sections 2.7.5 and 2.7.7), and a schedule for decommissioning (Table 2-17). The titleholder has also committed to submission of a decommissioning EP in 2025 (Section 2.7.6). During the period of this activity, the titleholder has committed to undertaking further engineering and scientific studies for decommissioning the Pipeline during the life of the EP (Section 2.7.7). I accepted that decommissioning activities will be the subject of a further environment plan and was satisfied the EP included appropriate planning to ensure that it would be able to comply with s 572(3) of the OPGGS Act;
  - c. while the EP described a preservation phase for the pipeline, the EP also stated that the titleholder will ensure that all property will be decommissioned to the approved end-state as soon as reasonably practicable and no later than 5 years from the production system permanently ceasing production (i.e., once operations activities stop and pipeline preservation activities begin). This is expected to be no later than Q3 of 2030. I noted that this decommissioning timeframe was consistent with the 5-year decommissioning target for pipelines and other infrastructure which is described in NOPSEMA's Decommissioning Compliance Strategy 2024-2029; and
  - d. the EP provided information on possible future phases of the Pipeline after the preservation phase ends (Section 2.6). However, as noted above decommissioning activities, and Carbon Capture Sequestration (CCS), are not included in the scope of activities described in this EP. The EP includes a commitment that planning for decommissioning will continue, and I noted that such planning is consistent with NOPSEMA's Decommissioning and Compliance Strategy 2024-2029.
103. Having regard to the matters set out at [102](a-d), I was satisfied that the EP demonstrated compliance with the titleholder's obligations under section 572 of the OPGGS Act.
104. Consultation with relevant persons (Section 4) informed the titleholder in its obligations under section 280 of the OPGGS Act to ensure that the proposed activity will not interfere with navigation, fishing, conservation of resources of the sea and seabed, other offshore electricity infrastructure and petroleum activities, and the enjoyment of native title rights and interests (within the meaning of the *Native Title Act 1993*) to a greater extent than is necessary for the reasonable exercise of the titleholder's rights and obligations.
105. For the reasons set out above at [19] – [42], I was satisfied that the EP addressed the content requirements of Environment Regulations.
106. Based on the above, I was reasonably satisfied that the EP met the requirements of reg 34(h).

## Other considerations

### Principles of ecological sustainable development (ESD)

107. The Environment Regulations provide that their object is to ensure that any activity or greenhouse gas activity carried out in an offshore area is carried out in a manner consistent with the principles of ESD

set out in section 3A of the EPBC Act. I considered that the EP was consistent with the principles of ESD, because:

- a. Decision-making processes should effectively integrate both long-term and short-term economic, environmental, social and equitable considerations - The EP included the titleholder's evaluation of the socio-economic, cultural and ecological features of the EMBA by the activity and consultation with relevant persons which demonstrates an integrated approach to considering all environmental features, including relevant social, cultural and economic features that make up the definition of environment under reg 5. Further, the EP included an evaluation of the potential impacts and risks of the activity on cultural heritage, commercial fisheries, traditional fisheries, tourism and recreation, commercial shipping, oil and gas activities and defence activities. I considered that the EP demonstrated that both long term and short term economic, environment, social and equitable considerations had been considered and addressed.
- b. If there are threats of serious or irreversible environmental damage, lack of full scientific certainty should not be used as a reason for postponing measures to prevent environmental degradation - The EP detailed the titleholder's evaluation of environmental impacts and risks, the reasons and evidence in support of how the impacts and risks will be of an acceptable level and included suitable approaches for addressing scientific uncertainty associated with predictions of environmental impacts and risks. The EP also included measures for continuing to identify and manage impacts and risks during the life of the activity. Consideration was also given in the EP to the effectiveness of management measures in ensuring the activity will not result in serious or irreversible environmental harm, specifically, it was noted that the activity will not have a significant impact on a MNES and will not result in serious or irreversible environmental damage.
- c. That the present generation should ensure that the health, diversity, and productivity of the environment is maintained or enhanced for the benefit of future generations - The EP identified appropriate measures to minimise the environmental impacts and risks of the activity. The titleholder applied a mitigation hierarchy, such that where avoidance was not possible, control measures were adopted to ensure impacts and risks are managed to ALARP and an acceptable level.
- d. The conservation of biological diversity and ecological integrity should be a fundamental consideration in decision-making - The EP included the titleholder's evaluation of environmental impacts and risks to the biodiversity and ecological values of the Commonwealth marine area, including EPBC Act listed threatened and/or migratory species, and the EPOs defined in the EP. I noted that the titleholder defined acceptable levels of impact and risk for biodiversity and ecological values at levels that are below the significant impact criteria (defined in Significant Impact Guidelines 1.1 – Matters of National Environmental Significance) for matters protected under Part 3 of the EPBC Act. There is evidence in the EP that the titleholder undertook a robust evaluation of environmental impacts and risks using appropriate impact assessment tools (such as light studies and oil spill modelling) to provide the basis for assessing higher order impacts and risks and demonstrating that impacts and risks will be managed at or below the acceptable level. The EP also contained an assessment against relevant requirements of statutory instruments to demonstrate that the activity would not be inconsistent with these instruments (such as the National Light Pollution Guidelines for Wildlife and the Recovery Plan for Marine turtles in Australia 2017-2027). I considered that the environmental impact and risk evaluations and EPOs in the EP collectively demonstrated that the activity will be managed such that impacts and risks to biological diversity and the ecological integrity of the Commonwealth marine area will be of an acceptable level; and I concluded that the activity will not have a significant impact on MNES protected under the EPBC Act;
- e. Improved valuation, pricing and incentive mechanisms should be promoted (the 'valuation principle') - The titleholder is required to bear the costs relating to environmental management of



the activity, to ensure that environmental impacts and risks are managed to ALARP and to an acceptable level. I considered that the onus is on the titleholder to protect ecological services and capital associated with the EMBA of the activity, and to the extent that the valuation principle is relevant for an individual activity, the EP demonstrated compliance with Australian government legislation and policy requirements relating to environmental management.

### **The Program: protected matters under Part 3 of the EPBC Act**

108. The Program endorsed under section 146 of the EPBC Act outlines the environmental management authorisation process for offshore petroleum and greenhouse gas activities administered by NOPSEMA and requires NOPSEMA to comply with Program responsibilities and commitments.
109. In implementing the Program, NOPSEMA conducts assessments of EPs against the requirements of the Program, which includes meeting the acceptance criteria and content requirements under the Environment Regulations. Specific Program commitments relating to protected matters under Part 3 of the EPBC Act are outlined in Table 2 of the Program report and must be applied during decision-making with respect to offshore projects and activities.
110. I considered matters protected under Part 3 of the EPBC Act, including listed threatened and migratory species and the Commonwealth marine area, and was reasonably satisfied that the activity under the EP met the requirements of the Program on the basis that:
- a. the activity will not result in unacceptable impacts on listed threatened species and is not inconsistent with relevant recovery plans and threat abatement plans for listed threatened species. I note my reasons above (see [54] and [58]), where I considered these documents when determining the acceptability of the EP where impacts to listed threatened species may arise;
  - b. there are control measures in place to ensure that impacts to the Commonwealth marine area will be of an acceptable level, having regard to relevant policy documents, gazettal instruments, bioregional plans, wildlife conservation plans, plans of management and EPBC Act guidance documents on the DCCEEW website (see my reasons at [54], [56] and [58]); and
  - c. there are control measures in place to ensure that the activity will not result in unacceptable impacts to a migratory species or an area of important habitat for a migratory species, having regard to relevant policy documents, wildlife conservation plans and guidelines on the DCCEEW website (see my reasons at [54], [56] and [58]).

### **The Program: cumulative environmental impacts**

111. In the context of the Program, cumulative impacts refer to the direct and indirect impacts of a number of different petroleum activity actions that may influence the natural environment or other users within a locality or region, which when considered together, have a greater impact on the offshore marine environment than each action or influence considered individually.
112. In the context of NOPSEMA's Decision Making Guidelines for offshore petroleum activities, cumulative environmental impacts are successive, additive, or synergistic impacts of collectively significant activities or projects with material impacts on the environment that have the potential to accumulate over temporal and spatial scales.
113. I considered the potential for cumulative environmental impacts to the Commonwealth marine area as required by the Program. I was satisfied that, due to the nature and scale of the activity (short duration of vessel-based activities for IMMR and preservation), the potential cumulative impact, the receptors at risk, the water depth (55m to 120 m), and the proximity to land based receptors, that cumulative impacts were of an acceptable level.

## Conclusion

114. For the reasons set out above, I was reasonably satisfied that the EP met the environment plan acceptance criteria in reg 34. Accordingly, I accepted the EP.

Signed:



**Director – Production Environment**

## Appendix A: Relevant terms

115. In this statement of reasons, the words and phrases have the following meaning:
- a. The *Offshore Petroleum and Greenhouse Gas Storage Act 2006* (Cth) is referred to as the OPGGS Act.
  - b. The National Offshore Petroleum Safety and Environmental Management Authority is referred to as NOPSEMA.
  - c. The *Offshore Petroleum and Greenhouse Gas Storage (Environment) Regulations 2023* (Cth) are referred to as the Environment Regulations.
  - d. The *Offshore Petroleum and Greenhouse Gas Storage (Environment) Regulations 2009* (Cth) are referred to as the 2009 Environment Regulations.
  - e. The Environment Plan (EP) means the Bayu-Undan to Darwin Gas Export Pipeline Environment Plan (Document No: 7710-057-EIS-0001, Revision 6, dated 24 June 2024).
  - f. The *Environment Protection and Biodiversity Conservation Act 1999* (Cth) is referred to as the EPBC Act.
  - g. The *Environment Protection and Biodiversity Conservation Regulations 2000* (Cth) are referred to as the EPBC Regulations.
  - h. The titleholder means Santos NA Darwin Pipeline Pty Ltd (ACN 093 316 959).
  - i. The term 'activity' means the operation and preservation of the Bayu-Undan to Darwin gas export.
  - j. The term 'environment' means:
    - i. ecosystems and their constituent parts, including people and communities; and
    - ii. natural and physical resources; and
    - iii. the qualities and characteristics of locations, places and areas; and
    - iv. the heritage value of places; and includes
    - v. the social, economic and cultural features of the matters mentioned in paragraphs (i), (ii), (iii) and (iv).
  - k. The term 'environmental impact' means any change to the environment, whether adverse or beneficial, that wholly or partially results from an activity.
  - l. The term 'control measure' means a system, an item of equipment, a person or a procedure, that is used as a basis for managing environmental impacts and risks.
  - m. The term 'environmental management system' includes the responsibilities, practices, processes and resources used to manage the environmental aspects of an activity.
  - n. The term 'environmental performance' means the performance of a titleholder in relation to the environmental performance outcomes and standards mentioned in an environment plan.
  - o. The term 'environmental performance outcome' (EPO) means a measurable level of performance required for the management of environmental aspects of an activity to ensure that environmental impacts and risks will be of an acceptable level.
  - p. The term 'environmental performance standard' (EPS) means a statement of the performance required of a control measure.

- q. The term 'principles of ecologically sustainable development' (ESD) means the principles of ESD set out in section 3A of the EPBC Act.
  - r. The term 'relevant person' has the meaning provided under regulation 25 of the Environment Regulations.
  - s. The term 'Operational Area' (OA) is taken to be the operational area for the activity as defined in Section 2.1 of the EP.
  - t. The *Program Report – Strategic Assessment of the environmental management authorisation process for petroleum and greenhouse gas storage activities administered by the National Offshore Petroleum Safety and Environmental Management Authority under the Offshore Petroleum and Greenhouse Gas Storage Act 2006* that was endorsed on 7 February 2014, is referred to as the Program.
  - u. The term 'as low as reasonably practicable' is referred to as 'ALARP'.
116. Terms used in this Statement of Reasons which are defined in the Environment Regulations or the OPGGS Act have the same meaning as under the Environment Regulations or OPGGS Act.

## Appendix B: Legislative framework

117. The Environment Regulations provide that:

- a. Before commencing a petroleum activity<sup>1</sup>, a titleholder must submit an EP for the petroleum activity to the Regulator (reg 26(1)).
- b. A petroleum activity means any operation or works in an offshore area carried out for the purpose of (a) exercising a right conferred on a petroleum titleholder under the OPGGS Act by a petroleum title; or (b) discharging an obligation imposed on a petroleum titleholder by the OPGGS Act or a legislative instrument under the OPGGS Act (reg 5).
- c. An EP for a petroleum activity that is, or is part of, an offshore project may only be submitted if the Regulator has accepted an OPP that includes that activity or if the Environment Minister has made a decision or granted approval under the EPBC Act relating to an action that is equivalent or includes that activity (reg 26(3)).
- d. If a titleholder submits an EP, the Regulator may request the titleholder to provide further written information about any matter required by the Environment Regulations to be included in the EP (reg 32).
- e. If a titleholder receives a request under regulation 32, they must provide the information requested by incorporating the information into the EP and resubmitting the EP within the period specified or within a longer period agreed to by the Regulator.
- f. If the EP is resubmitted under reg 32, the Regulator must have regard to that further information in making the decision under reg 33.
- g. Within 30 days after the day the Regulator publishes the EP (reg 28) if the Regulator is:
  - i. reasonably satisfied that the EP meets the criteria set out in reg 34, the Regulator must accept the EP (reg 33(1)(a));
  - ii. not reasonably satisfied that the EP meets the criteria set out in reg 34, the Regulator must give the titleholder notice in writing (reg 33(5)); or
  - iii. if the Regulator is unable to make a decision on the EP within the 30 day period, the Regulator must give the titleholder notice in writing and set out a proposed timetable for consideration of the EP (reg 33(3)(b)).
- h. A notice to a titleholder under reg 33(5) must:
  - i. state that the Regulator is not reasonably satisfied that the EP submitted by the titleholder meets the acceptance criteria set out in reg 34;
  - ii. identify the criteria set out in reg 34 about which the Regulator is not reasonably satisfied; and
  - iii. set a date by which the titleholder may resubmit the EP.
- i. Pursuant to reg 16, NOPSEMA must not accept an environment plan unless it is reasonably satisfied that the titleholder is compliant with section 571(2) of the OPGGS Act in relation to the petroleum activity, and the compliance is in a form that is acceptable to NOPSEMA.

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<sup>1</sup> Petroleum activity is defined under regulation 4 of the Environment Regulations.

- j. Regulation 34 provides the acceptance criteria the Regulator must consider in determining whether to accept an EP, and includes that the plan:
    - i. is appropriate for the nature and scale of the activity;
    - ii. demonstrates that the environmental impacts and risks of the activity will be reduced to ALARP;
    - iii. demonstrates that the environmental impacts and risks of the activity will be of an acceptable level;
    - iv. provides for appropriate environmental performance outcomes (EPOs), environmental performance standards (EPSs) and measurement criteria;
    - v. includes an appropriate implementation strategy and monitoring, recording and reporting arrangements;
    - vi. does not involve the activity or part of the activity, other than arrangements for environmental monitoring or for responding to an emergency, being undertaken in any part of a declared World Heritage property within the meaning of the EPBC Act;
    - vii. demonstrates that:
      - A. the titleholder has carried out the consultation required by Division 3; and
      - B. the measures (if any) that the titleholder has adopted, or proposes to adopt, because of the consultation are appropriate; and
    - viii. complies with the OPGGS Act and the Environment Regulations.
  - k. Regulation 33(10)(a)(ii) provides that the Regulator may accept the plan subject to limitations or conditions applying to operations for the activity.
118. The Environment Regulations provides for the authorisation of a petroleum activity, but does not authorise an oil spill, which is considered for risk evaluation and contingency planning in the EP only. Section 569 of the OPGGS Act places obligations on petroleum titleholders to control the flow and prevent the escape of petroleum within the permit area, lease area or licence area.
119. The Environment Regulations impose a duty on the titleholder to demonstrate to NOPSEMA in the EP that a proposed activity will be carried out in a manner:
- a. consistent with the principles of ecological sustainable development set in section 3A of the EPBC Act; and
  - b. by which impacts and risks of the activity will be reduced to as low as reasonably practicable (ALARP) and acceptable levels.



## Appendix C: Key materials considered in making the decision

120. In making this decision, NOPSEMA considered the documents making up the EP submission in accordance with legislative requirements and NOPSEMA's policies and procedures. The key material that NOPSEMA had regard to in making this decision included, but was not limited to:

- a. the EP, comprising:
  - i. Bayu-Undan to Darwin Gas Export Pipeline Environment Plan (Document No. 7710-057-EIS-0001, Revision 6, dated 24 June 2024);
  - ii. Bayu-Undan to Darwin Gas Export Pipeline Oil Pollution Emergency Plan (Document No. 7710-650-EMP-0006, Revision 4, dated 24 January 2024); and
  - iii. Sensitive Information Report Bayu Undan Gas Export Pipeline S4 (Document No. not provided, no date);
- b. the legislative framework relevant to environment plan assessments, including:
  - i. the OPGGS Act;
  - ii. the Environment Regulations; and
  - iii. the Program;<sup>2</sup>
- c. NOPSEMA Environment plan assessment policies, guidelines and guidance:
  - i. NOPSEMA Assessment policy (N-04000-PL0050);
  - ii. NOPSEMA Environment plan assessment policy (N-04750-PL1347);
  - iii. NOPSEMA Financial assurance for petroleum titles policy (N-04730-PL1780);
  - iv. NOPSEMA Section 572 Maintenance and removal of property regulatory policy (N-00500-PL1903);
  - v. NOPSEMA Managing gender-restricted information (draft) (N-04750-PL2098);
  - vi. NOPSEMA Financial assurance for petroleum titles guideline (N-04730-GL1381);
  - vii. NOPSEMA Environment plan decision making guideline (N-04750-GL1721);
  - viii. NOPSEMA Consultation in the course of preparing an Environment Plan guideline (N-04750-GL2086);
  - ix. NOPSEMA Environment plan content requirements guidance note (N-04750-GN1344);
  - x. NOPSEMA Making submissions to NOPSEMA guideline (N-04000-GL0225);
  - xi. NOPSEMA Petroleum activities and Australian marine parks guidance note (N-04750-GN1785);
  - xii. NOPSEMA Consultation with Commonwealth agencies with responsibilities in the marine area guideline (N-06800-GL1887);
  - xiii. NOPSEMA Oil pollution risk management guidance note (N-04750-GN1488);

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<sup>2</sup> <https://www.environment.gov.au/protection/assessments/strategic/offshore-petroleum-greenhouse-gas>

- xiv. NOPSEMA Operational and scientific monitoring programs information paper (N-04750-IP1349);
  - xv. NOPSEMA Acoustic impact evaluation and management information paper (N-04750-IP1765);
  - xvi. NOPSEMA Petroleum activity guidance note (N-04750-GN1343);
  - xvii. NOPSEMA Source control planning and procedures information paper (N-04750-IP1979);
  - xviii. NOPSEMA Environmental bulletin — oil spill modelling (April 2019);
  - xix. NOPSEMA Blue Whale Conservation Management Plan – Frequently asked questions (November 2021); and
  - xx. NOPSEMA Consultation on offshore petroleum environment plans brochure (May 2023);
- d. procedures:
- i. NOPSEMA Environment plan assessment standard operating procedure (N-04750-SOP1369); and
- e. other relevant documents and records:
- i. NOPSEMA's assessment team notes regarding assessment of how the EP met the acceptance criteria set out in regulation 34 of the Environment Regulations;
  - ii. NOPSEMA's Decommissioning Compliance Strategy 2024-2029
  - iii. Published consultation guidance by relevant persons:
    - A. Australian Fisheries Management Authority, Petroleum industry consultation with the commercial fishing industry, available at: <https://www.afma.gov.au/petroleum-industry-consultation-commercial-fishing-industry>;
    - B. Department of Agriculture, Fisheries and Forestry (DAFF), Fisheries and the environment – Offshore Petroleum and Fisheries, available at: <https://www.agriculture.gov.au/agriculture-land/fisheries/environment/opgga>;
    - C. Department of Climate Change, Energy, the Environment and Water, Interim Engaging with First Nations People and Communities on Assessments and Approvals under the *Environment Protection and Biodiversity Conservation Act 1999* (2023);
    - D. WA Department of Fisheries, Guidance statement for oil and gas industry consultation with the Department of Fisheries, Fisheries Occasional Publication No. 113, July 2013;
    - E. WA Department of Transport, Offshore Petroleum Industry Guidance Note, Marine Oil Pollution: Response and Consultation Arrangements, July 2020; and
    - F. Western Australian Fishing Industry Council, Consultation approach for unplanned events, available at: <https://www.wafic.org.au/what-we-do/access-sustainability/oil-gas/consultation-approach-for-unplanned-events/>;
  - iv. relevant published, peer-reviewed scientific literature, including the scientific literature cited in the EP;
  - v. relevant policies, plans of management, recovery plans, conservation advice and other guidance for matters protected under the EPBC Act, including, but not limited to:
    - A. Department of the Environment, Water, Heritage and the Arts, Significant Impact Guidelines 1.1 – Matters of National Environmental Significance, EPBC Act Policy Statement (2013);

- B. Department of Sustainability, Environment, Water, Population and Communities, 'Indirect consequences' of an action: Section 527E of the EPBC Act, EPBC Act Policy Statement (2013);
  - C. Department of the Environment and Energy, National Light Pollution Guidelines for Wildlife Including Marine Turtles, Seabirds and Migratory Shorebirds (2020);
  - D. Commonwealth of Australia, Recovery Plan for Marine Turtles in Australia 2017–2027 (2017);
  - E. Commonwealth of Australia, Conservation Management Plan for the Blue Whale 2015–2025 (2015);
  - F. Department of Agriculture, Water and the Environment, Guidance on key terms within the Blue Whale Conservation Management Plan (2021);
  - G. Commonwealth of Australia, Threat Abatement Plan for the impacts of marine debris on the vertebrate wildlife of Australia's coasts and oceans (2018);
  - H. Commonwealth of Australia, Wildlife Conservation Plan for Seabirds (2020);
  - I. Department of Sustainability, Environment, Water, Population and Communities, Marine Bioregional Plan for the North-west Marine Region (2012); and
  - J. Director of National Parks, North-west Marine Parks Network Management Plan (2018);
- vi. relevant legislative requirements that apply to the activity and are relevant to the environmental management of the activity, as cited; and
- vii. relevant Federal Court of Australia authority, as cited.