

## **PACIFIC NORTHWEST LNG - ADDENDUM TO THE ENVIRONMENTAL IMPACT STATEMENT**

Environmental Management Plans  
December 12, 2014

### **24.0 ENVIRONMENTAL MANAGEMENT PLANS**

Draft preliminary Environmental Management Plans (EMPs) have been developed for those plans outlined in the EIS (Sections 24.3 and 24.4). Additional information regarding development of the EMPs is provided below.

#### **24.1 RESPONSES TO THE OUTSTANDING INFORMATION REQUESTS**

##### **24.1.1 Environmental and Operational Management Plans Information Request #1**

###### **24.1.1.1 Government of Canada – Outstanding Information**

Agency: The information requested has not been provided. This information is required as part of the environmental assessment to decrease the potential for environmental degradation during construction and operation, and to clearly define the proponent's ongoing commitment. Each element of the information requested must be provided.

- For each EMP, provide information on specific actions and activities that will be implemented to reduce the likelihood of environmental degradation during construction and operation
- Describe in appropriate detail the best management practices for all EMPs listed in the EIS
- Where standard mitigation measures are planned, describe these measures and reference documents that support their use in similar projects
- Reference all legal and regulatory requirements and applicable guidelines in each EMP presented in the EIS.

###### **24.1.1.2 Response**

A preliminary draft EMP has been developed since submission of the EIS (see Appendix J). The preliminary draft EMP is based on the preliminary project construction schedule and design, applicable legislation and regulations, and relevant standards and guidelines.

PNW LNG continues to advance overall project designs, and the Engineering Procurement Construction and Commissioning (EPCC) Contractor has not yet been selected. These were taken into consideration in the preparation of the EMP. Front end engineering design (FEED) level information has been taken into consideration in developing this EMP. While more advanced engineering information is available compared to what was available at the time of submission of the EIS, the level of detail provided in the preliminary draft EMP is considered appropriate based on the information available to date. PNW LNG will update this preliminary draft EMP once the EPCC Contractor is selected. Additional project-, activity- and site-specific measures will be developed and included through final engineering design and project permitting.

Individual management plans included in the preliminary draft EMP include (in order of presentation):

- Appendix J.1 – EMP Overview
- Appendix J.2 – Project Contact List

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- Appendix J.3 – Monitoring Forms
- Appendix J.4– Air Quality and Greenhouse Gas Management Plan
- Appendix J.5 – Noise, Vibration and Ambient Light Management Plan
- Appendix J.6 – Environmental Emergency Preparedness and Response Plan
- Appendix J.7 – Transportation Management Plan
- Appendix J.8 – Marine and Freshwater Resource Management Plan, including the Marine Mammal Monitoring and Protection Plan
- Appendix J.9 – Vegetation Management Plan
- Appendix J.10 – Waste Management Plan
- Appendix J.11 – Blasting Management Plan
- Appendix J.12 – Marine Pile Installation Management Plan
- Appendix J.13 – Dredging Management Plan
- Appendix J.14 – Accommodation Management Plan
- Appendix J.15 – Archaeological Resources and Heritage Management Plan
- Appendix J.16 – Environmental Monitoring Management Plan.

The preliminary draft EMPs include:

- Information on specific actions and activities that will be implemented to reduce the likelihood of environmental degradation during construction and operations
- A description, in appropriate detail, of the best management practices for all EMPs listed in the EIS
- Where planned, a description of standard mitigation measures and reference documents that support their use in similar projects
- References of all legal and regulatory requirements and applicable guidelines in each EMP presented in the EIS.

This information is provided within each of the individual EMPs. The relevant sections within the EMPs are listed in Table 24-1.

**Table 24-1 Locations of Requested Additional Information within EMPs**

EMP Section	Information on Specific Actions and Activities	Best Management Practices	Standard Mitigation Measures and Reference Documents	Legal and Regulatory Requirements / Guidelines
EMP Overview	Section 2.2 Section 3.1 Section 4.0	Section 5.0	Section 5.0	Section 1.3 Section 2.1 Section 2.2 Section 4.0 Section 6.1
Project Contact List	n/a	n/a	n/a	n/a
Monitoring Forms	n/a	n/a	n/a	Forms
Air Quality and Greenhouse Gas Management Plan	Section 4.0	Section 3.1	Section 3.2 Section 5.0	Section 2.0 Sections 2.1 – 2.7 Section 4.1 – 4.2

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<b>EMP Section</b>	<b>Information on Specific Actions and Activities</b>	<b>Best Management Practices</b>	<b>Standard Mitigation Measures and Reference Documents</b>	<b>Legal and Regulatory Requirements / Guidelines</b>
Noise, Vibration and Ambient Light Management Plan	Section 2.0 Section 3.0	Section 2.0	Section 2.0	Section 1.1
Environmental Emergency Preparedness and Response Plan	Section 1.1 Section 2.1 – 2.2 Section 3.1 – 3.2 Section 4.0 Section 7.0	Section 5.1 – 5.3 Section 6.0 Section 6.1 – 6.4	Section 5.1 – 5.3 Section 6.0 Section 6.1 – 6.4	Section 1.2 Section 7.0 Section 8.0
Transportation Management Plan	Section 2.0 Section 4.0	Section 3.1 – 3.4 Section 4.0	Section 3.1 – 3.4 Section 6.0	Section 1.2 Section 2.0 Section 5.0
Marine and Freshwater Resource Management Plan (including Marine Mammal Monitoring and Protection Plan)	Section 2.0 Section 3.0	Section 1.2	Section 2.1 – 2.2	Section 1.1 Section 3.0
Vegetation Management Plan	Section 2.0 Section 3.0	Section 2.0	Section 2.0	Section 1.1 Section 3.0
Waste Management Plan	Section 2.0 Section 3.0 Section 4.0	Section 2.0 Section 2.1 – 2.3 Section 3.1 – 3.2	Section 2.0 Section 2.1 – 2.3 Section 3.1 – 3.2	Section 1.1 Section 4.0
Blasting Management Plan	Section 2.0 Section 3.0	Section 2.0	Section 2.0 Section 4.0	Section 1.1 Section 3.0 Appendix 1
Marine Pile Installation Management Plan	Section 2.0 Section 3.0	Section 2.0	Section 2.0 Section 4.0	Section 1.1 Section 3.0 Appendix 1
Dredging Management Plan	Section 2.0 Section 3.0	Section 1.2	Section 2.0 Section 4.0	Section 1.1 Section 1.2 Section 3.0
Accommodation Management Plan	Section 2.0 Section 4.0	Section 2.0	Section 3.1 – 3.2	Section 1.2 Section 2.0 Section 4.0
Archaeological Resources and Heritage Management Plan	Section 5.0	Section 4.0	Section 4.0	Section 1.0
Environmental Monitoring Management Plan	Section 3.1 – 3.2 Section 4.1 Section 5.1 – 5.10 Section 6.1	Section 7.0	Section 7.0	Section 2.1 Section 2.2