

PMC-ND

(1.08.09.13)

**U.S. DEPARTMENT OF ENERGY  
OFFICE OF ENERGY EFFICIENCY AND RENEWABLE ENERGY  
NEPA DETERMINATION**



RECIPIENT: SMRU Consulting

STATE: WA

PROJECT TITLE: Coastal Acoustic Buoy for Offshore Wind

<b>Funding Opportunity Announcement Number</b>	<b>Procurement Instrument Number</b>	<b>NEPA Control Number</b>	<b>CID Number</b>
DE-FOA-0001924	DE-EE0008732	GFO-0008732-002	G08732

Based on my review of the information concerning the proposed action, as NEPA Compliance Officer (authorized under DOE Policy 451.1), I have made the following determination:

**CX, EA, EIS APPENDIX AND NUMBER:**

Description:

- A9 Information gathering, analysis, and dissemination** Information gathering (including, but not limited to, literature surveys, inventories, site visits, and audits), data analysis (including, but not limited to, computer modeling), document preparation (including, but not limited to, conceptual design, feasibility studies, and analytical energy supply and demand studies), and information dissemination (including, but not limited to, document publication and distribution, and classroom training and informational programs), but not including site characterization or environmental monitoring. (See also B3.1 of appendix B to this subpart.)
- B3.16 Research activities in aquatic environments** Small-scale, temporary surveying, site characterization, and research activities in aquatic environments, limited to: (a) Acquisition of rights-of-way, easements, and temporary use permits; (b) Installation, operation, and removal of passive scientific measurement devices, including, but not limited to, antennae, tide gauges, flow testing equipment for existing wells, weighted hydrophones, salinity measurement devices, and water quality measurement devices; (c) Natural resource inventories, data and sample collection, environmental monitoring, and basic and applied research, excluding (1) large-scale vibratory coring techniques and (2) seismic activities other than passive techniques; and (d) Surveying and mapping. These activities would be conducted in accordance with, where applicable, an approved spill prevention, control, and response plan and would incorporate appropriate control technologies and best management practices. None of the activities listed above would occur within the boundary of an established marine sanctuary or wildlife refuge, a governmentally proposed marine sanctuary or wildlife refuge, or a governmentally recognized area of high biological sensitivity, unless authorized by the agency responsible for such refuge, sanctuary, or area (or after consultation with the responsible agency, if no authorization is required). If the proposed activities would occur outside such refuge, sanctuary, or area and if the activities would have the potential to cause impacts within such refuge, sanctuary, or area, then the responsible agency shall be consulted in order to determine whether authorization is required and whether such activities would have the potential to cause significant impacts on such refuge, sanctuary, or area. Areas of high biological sensitivity include, but are not limited to, areas of known ecological importance, whale and marine mammal mating and calving/pupping areas, and fish and invertebrate spawning and nursery areas recognized as being limited or unique and vulnerable to perturbation; these areas can occur in bays, estuaries, near shore, and far offshore, and may vary seasonally. No permanent facilities or devices would be constructed or installed. Covered actions do not include drilling of resource exploration or extraction wells.
- B3.6 Small-scale research and development, laboratory operations, and pilot projects** Siting, construction, modification, operation, and decommissioning of facilities for smallscale research and development projects; conventional laboratory operations (such as preparation of chemical standards and sample analysis); and small-scale pilot projects (generally less than 2 years) frequently conducted to verify a concept before demonstration actions, provided that construction or modification would be within or contiguous to a previously disturbed or developed area (where active utilities and currently used roads are readily accessible). Not included in this category are demonstration actions, meaning actions that are undertaken at a scale to show whether a technology would be viable on a larger scale and suitable for commercial deployment.

Rationale for determination:

The U.S. Department of Energy (DOE) is proposing to provide funding to SMRU Consulting to develop technology to validate acoustic noise modelling and monitor exclusion zones for North Atlantic right whales (NARW) during offshore wind construction (with an emphasis on pile driving). The objective of the proposed project is to develop a cost-effective and robust system for monitoring and mitigating U.S. offshore wind construction through the use of a Coastal Acoustic Buoy (CAB). This project would be completed over two budget periods (BP) with a go/no-go decision after BP 1.

DOE previously completed one NEPA review for tasks 1-6 in BP1 (GFO-0007823-001 CX A9 and B5.15, 07/02/2019). This review is for the remainder of BP1, tasks 7-9.

In Task 7 SMRU would conduct in water tests of the CAB. The CAB is a passive acoustic buoy. Test would occur in ocean waters off the coast of Washington, both in San Juan County waters and off the Olympic Coast. Tests would involve deploying the CAB from a boat at up to three locations in both the San Juan County waters and the Olympic Coast (six total locations) and playing call back of NARW calls from different locations around the CAB. The calls would be within a range of 50 to 200 Hz. Tests would occur over a maximum of 14 days total, with playback calls spread out over a four hour period each day. SMRU would be testing the CAB to correctly identify NARW calls, and to correctly identify the location from where the calls are originating, including direction and distance from the CAB. While there are marine mammals, including whale species, in the ocean waters of Washington there are no NARW, as the NARW is an Atlantic Ocean species. Thus the playback call would not be a replica of an existing call found in the specific ocean environment.

In spring of 2020 SMRU contacted the National Marine Fisheries Service headquarters office in Silver Spring, as well as the local office in Seattle and discussed the proposed project. Through coordination with the Silver Spring office SMRU and NMFS identified appropriate protocols and best management practices for the proposed research. These include:

1. No less than 24 hours before planned playbacks, reach out to fellow researchers and whale enthusiasts to determine if Southern Resident killer whales (SRKW) or humpback whales have been spotted recently in the vicinity of the planned playbacks. Maintain contact with researchers throughout the period of playbacks to be notified of any local sightings.
2. After deploying the acoustic buoys, monitor the acoustic detections in real time for a minimum of 30 minutes prior to playbacks to ensure that cetaceans are not present in the playback area.
3. During the minimum of 30 minutes of acoustic monitoring, a minimum of 1 trained marine mammal observer will be scanning the playback area with binoculars and naked eyes to ensure no cetaceans are present.
4. If cetaceans are determined to be in the playback area by either the wider network, passive acoustic monitoring, or marine mammal observer, the playbacks will be postponed until cetaceans have not been detected in the playback area for at least 30 minutes.
5. Monitoring for marine mammals will continue throughout the playbacks. If cetaceans are detected during playbacks, playbacks will cease immediately.
6. SMRU must compile a notification list of acoustic researchers conducting research in the area.
7. SMRU must provide all other researchers with the dates, times, and locations of the proposed playbacks.

In addition, SMRU was advised that if they follow the protocols they would not need a permit under the Marine Mammal Protection Act.

On May 15, 2020 DOE discussed the proposed research and proposed protocols with the NMFS Seattle office. The office did not express any concerns regarding impacts from the proposed research to marine mammals or Endangered Species Act listed species or habitats, as long as SMRU followed the agreed upon protocols. As such, DOE finds that the proposed testing in the state of Washington would have no effect on ESA listed species and/or any critical habitat.

In Task 8 SMRU would analyze results of testing and conduct updates to the CAB software.

In Task 9 SMRU would undertake preparation for proposed East Coast trials. This would include developing an east coast specific test plan, obtaining any necessary permits for east coast testing, and preparing a biological evaluation for any east coast testing.

Work in Task 8 and 9 would be limited to information gathering, data analysis, and software programming.

In BP2, SMRU would conduct an effectiveness trial on the east coast. There is not enough information at this time to review the proposed east coast trials. SMRU will need to provide a test plan and Biological Evaluation prior to NEPA review of BP2 tasks. BP2 tasks are prohibited and will undergo additional NEPA review by DOE when additional details are available.

## NEPA PROVISION

DOE has made a conditional NEPA determination.

The NEPA Determination applies to the following Topic Areas, Budget Periods, and/or tasks:

### Budget Period 1 - All Tasks

The NEPA Determination does not apply to the following Topic Area, Budget Periods, and/or tasks:

Budget Period 2 - All Tasks

Include the following condition in the financial assistance agreement:

1. No less than 24 hours before planned playbacks, reach out to fellow researchers and whale enthusiasts to determine if Southern Resident killer whales (SRKW) or humpback whales have been spotted recently in the vicinity of the planned playbacks. Maintain contact with researchers throughout the period of playbacks to be notified of any local sightings.
2. After deploying the acoustic buoys, monitor the acoustic detections in real time for a minimum of 30 minutes prior to playbacks to ensure that cetaceans are not present in the playback area.
3. During the minimum of 30 minutes of acoustic monitoring, a minimum of 1 trained marine mammal observer will be scanning the playback area with binoculars and naked eyes to ensure no cetaceans are present.
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5. Monitoring for marine mammals will continue throughout the playbacks. If cetaceans are detected during playbacks, playbacks will cease immediately.
6. SMRU must compile a notification list of acoustic researchers conducting research in the area.
7. SMRU must provide all other researchers with the dates, times, and locations of the proposed playbacks.

Notes:

Wind Energy Technology Office  
 This NEPA determination does require a tailored NEPA provision.  
 Review completed by Roak Parker, 6/1/2020

**FOR CATEGORICAL EXCLUSION DETERMINATIONS**

The proposed action (or the part of the proposal defined in the Rationale above) fits within a class of actions that is listed in Appendix A or B to 10 CFR Part 1021, Subpart D. To fit within the classes of actions listed in 10 CFR Part 1021, Subpart D, Appendix B, a proposal must be one that would not: (1) threaten a violation of applicable statutory, regulatory, or permit requirements for environment, safety, and health, or similar requirements of DOE or Executive Orders; (2) require siting and construction or major expansion of waste storage, disposal, recovery, or treatment facilities (including incinerators), but the proposal may include categorically excluded waste storage, disposal, recovery, or treatment actions or facilities; (3) disturb hazardous substances, pollutants, contaminants, or CERCLA-excluded petroleum and natural gas products that preexist in the environment such that there would be uncontrolled or unpermitted releases; (4) have the potential to cause significant impacts on environmentally sensitive resources, including, but not limited to, those listed in paragraph B(4) of 10 CFR Part 1021, Subpart D, Appendix B; (5) involve genetically engineered organisms, synthetic biology, governmentally designated noxious weeds, or invasive species, unless the proposed activity would be contained or confined in a manner designed and operated to prevent unauthorized release into the environment and conducted in accordance with applicable requirements, such as those listed in paragraph B(5) of 10 CFR Part 1021, Subpart D, Appendix B.

There are no extraordinary circumstances related to the proposed action that may affect the significance of the environmental effects of the proposal.

The proposed action has not been segmented to meet the definition of a categorical exclusion. This proposal is not connected to other actions with potentially significant impacts (40 CFR 1508.25(a)(1)), is not related to other actions with individually insignificant but cumulatively significant impacts (40 CFR 1508.27(b)(7)), and is not precluded by 40 CFR 1506.1 or 10 CFR 1021.211 concerning limitations on actions during preparation of an environmental impact statement.

A portion of the proposed action is categorically excluded from further NEPA review. The NEPA Provision identifies Topic Areas, Budget Periods, tasks, and/or subtasks that are subject to additional NEPA review.

**SIGNATURE OF THIS MEMORANDUM CONSTITUTES A RECORD OF THIS DECISION.**

NEPA Compliance Officer Signature: \_\_\_\_\_

 Electronically Signed By: **Roak Parker**  
 \_\_\_\_\_  
 NEPA Compliance Officer

Date: 6/1/2020

**FIELD OFFICE MANAGER DETERMINATION**

Field Office Manager review not required

Field Office Manager review required

**BASED ON MY REVIEW I CONCUR WITH THE DETERMINATION OF THE NCO :**

Field Office Manager's Signature: \_\_\_\_\_  
Field Office Manager

Date: \_\_\_\_\_