PMC-ND (1.08.09.13)

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



STATE: OR

RECIPIENT: Pacific Ocean Energy Trust

PROJECT Network Director for the TEAMER Program

 Funding Opportunity Announcement Number
 Procurement Instrument Number
 NEPA Control Number
 CID Number

 DE-EE0008895
 GFO-0008895-006
 GO8895

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:

gathe analy	mation ering, /sis, and emination	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.)
advio assis	Fechnical ce and stance to nizations	Technical advice and planning assistance to international, national, state, and local organizations.
scale resea devel labor	arch and lopment, ratory ations, pilot	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.
scale renev enerç resea	wable gy arch and lopment pilot	Small-scale renewable energy research and development projects and small-scale pilot projects, provided that the projects are located within a previously disturbed or developed area. Covered actions would be in accordance with applicable requirements (such as local land use and zoning requirements) in the proposed project area and would incorporate appropriate control technologies and best management practices.

Rationale for determination:

The U.S. Department of Energy (DOE) is proposing to provide federal funding to the Pacific Ocean Energy Trust (POET) to administer the Testing and Access for Marine Energy Research (TEAMER) program. The primary objective of TEAMER is to provide marine hydrokinetic (MHK) technology developers access to a network of United States based testing facilities which provide testing and modeling expertise. Access would be provided through competitively awarded funds awarded under TEAMER and administered by POET. POET would be advised by a Technical Board which would include representatives from DOE, DOE National Labs, and National Marine Renewable Energy Centers. There would be up to nine funding cycles.

The proposed project would be divided into 4 tasks. DOE previously completed five NEPA reviews for tasks 1, 2, and subtask 3.1 (GFO-0008895-001 CX A9; 11/14/2019) for subtasks 3.2, 3.3.1 to 3.3.9, 3.4 and task 4 (GFO-0008895-002 CX A9, B3.6; 07/22/2020; GFO-0008895-004 CX A9, B3.6; 11/04/2020; GFO-0008895-005 CX A9, B3.6, B3.16, B5.15; 03/30/2021) including the identification of and approval of 27 research facilities to conduct research and testing. And, for specific Technical Support Recipients under subtask 3.3.1 (GFO-0008895-003 CX A9, B3.6; 10/22/2020). This review is for additional proposed research facilities under task 3.2, specifically for 10 additional facilities.

If additional facilities are identified beyond those reviewed in this or previous NEPA determinations. or type of assistance offered by an approved facility is modified, a new NEPA review must be completed regarding those

proposed changes. All facilities identified below could offer information gathering, computer modeling, and data analysis.

The ten testing facilities identified by POET are:

1. Ocean Flow International, LLC (OFI). Work at OFI could include numerical modeling. This work would be limited to information gathering, computer modeling, and data analysis.

2. Cenutrion Group, Ltd. The Centruion Group operates the Seanic Ocean Systems (SOS) test tank. Work could include physical modeling as well as tank testing. The SOS tank is a pre-existing 50 feet by 50 feet by 30 feet deep tank test facility that regularly engages in tank testing.

3. The University of Houston (UH). UH operates the Power Electronics, Microgrids & Subsea Electrical Systems Center (PEMSES). PEMSES operates a testing center which includes dynamometers for testing of electrical equipment. Work at UH could include numerical modeling as well as laboratory scale electrical testing of components and systems.

4. American Bureau of Shipping (ABS). Work at ABS could include engineering and computer modeling. This work would be limited to information gathering, computer modeling, and data analysis.

5. Stress Engineering Services Inc (SES). Work at SES could include engineering and modeling as well as laboratory scale testing. Testing could physical testing, such as stress testing, of systems, components, and materials.

6. AMOG Consulting Inc. Work at AMOG could include engineering and computer modeling. This work would be limited to information gathering, computer modeling, and data analysis.

7. ETA International Inc. Work at ETA cold include engineering and modeling as well as laboratory scale testing. Testing could physical testing, such as stress and tension testing, of systems, components, and materials.

8. Southwest Research Institute (SRI). Work by SRI would include engineering and modeling as well as laboratory scale testing. Testing could physical testing, of systems, components, and materials, chemical testing, pressure and temperature testing, electrical and powertrain testing utilizing a dynamometer, and fluid dynamics testing. Testing could occur at multiple SRI facilities in San Antonio, TX.

9. Evergreen Innovations LLC. Work by Evergreen Innovations would include numerical modeling and control solutions. Evergreen could provide technical assistance during otherwise approved testing of devices or components. This work would be limited to information gathering, computer modeling, technical assistance, and data analysis.

10. Integral Consulting Inc. Integral Consulting would provide numerical modeling and site characterization. This work would be limited to information gathering, computer modeling, technical assistance, and data analysis.

All facilities identified above are preexisting research facilities that regularly engage in the kind of research proposed for this award. No new permits or modifications to facilities would be needed. Existing university, corporate, and Federal health and safety procedures would be followed at all times during all in water work and experiments.

Any work proposed to be conducted at a federal facility may be subject to additional NEPA review by the cognizant federal official and must meet the applicable health and safety requirements of the facility.

NEPA PROVISION

DOE has made a conditional NEPA determination.

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

All tasks are approved, however selection of technical assistance recipients is subject to additional NEPA review.

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

All selections of technical assistance recipients made under Subtask 3.3.1 to 3.3.9 will be subject to additional NEPA review and must receive approval from the Contracting Officer prior to any work being completed on those projects.

Include the following condition in the financial assisstance agreement:

All selections made under Subtask 3.3.1 to 3.3.9 will be subject to additional NEPA review prior to any work being completed on those projects.

All work must be completed by pre-approved facilities identified in subtask 3.2 and listed here or in previous NEPA determinations, and must be the type of work reviewed and approved in the signed NEPA determination(s). Inclusion of additional facilities would require additional NEPA review of those facilities. Approved facilities include:

1. Ocean Flow International, LLC (OFI).

- 2. Cenutrion Group, Ltd.
- 3. The University of Houston (UH).
- 4. American Bureau of Shipping (ABS).
- 5. Stress Engineering Services Inc (SES).
- 6. AMOG Consulting Inc.
- 7. ETA International Inc.
- 8. Southwest Research Institute (SRI).
- 9. Evergreen Innovations LLC.
- 10. Integral Consulting Inc

Notes:

Water Power Technologies Office This NEPA determination does require a tailored NEPA provision. Review completed by Roak Parker, 04/01/2021

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:

Signed By: Roak Parker

Date: 4/1/2021

NEPA Compliance Officer

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 :

Date: