

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



RECIPIENT: Pacific Ocean Energy Trust

STATE: OR

PROJECT TITLE : Network Director for the TEAMER Program

Notice of Funding Opportunity Number

Procurement Instrument Number
DE-EE0008895

NEPA Control Number
GFO-0008895-059

CID Number
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:

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 federal funding to the Pacific Ocean Energy Trust (POET) to administer the Testing and Access for Marine Energy Research (TEAMER) program. POET would collaborate with a Technical Board (TB) which would include representatives from DOE, DOE National Laboratories, and National Marine Renewable Energy Centers. The primary objective of TEAMER is to provide marine energy (ME) technology developers access to a network of facilities within the U.S. which provide testing and modeling assistance for ME technologies. Developers would apply for assistance through a competitive process.

Project activities included in this review would be carried out in facilities previously approved for the TEAMER network. Any facility that requests to join the network or modify their existing support capabilities is subject to additional NEPA review in addition to a separate review conducted by POET and the TB. Similarly, any Technical Support Recipients (TSRs) have to be approved for work at one of the approved TEAMER facilities by TEAMER technical board before submitting an EQ1.

For this review, POET has identified twenty-five (25) TSRs to receive support through the TEAMER program:

1. C Power

C Power would receive technical assistance from Cardinal Engineering in Washington, DC. Support activities would include modeling, development of software applications, computational fluid dynamics simulations, identifying the appropriate hydrodynamic modeling approach and software, and development enhanced workflow and opportunities for wave power systems.

2. C Power

C Power would receive technical assistance from OSU- The Wallace Energy Systems & Renewables Facility (WESRF) in Corvallis, OR. Support activities would include supplying the various drives, supplies, and measurement equipment to support the testing, in addition to a research assistant to build and install the necessary testing systems and conduct the testing.

3. Deep Anchor Solutions Inc.

Deep Anchor Solutions Inc. would receive technical assistance from the American Bureau of Shipping in Spring, TX. Support activities would include conducting the New Technology Qualification process, failure-mode assessments, and developing a risk assessment report.

4. Deep Anchor Solutions Inc.

Deep Anchor Solutions Inc. would receive technical assistance from Stress Engineering Services, Inc. in Houston, TX. Support activities would include studying data and developing testing parameters, developing a test matrix for all testing variables, fabricating all test specimens, designing and manufacturing a fatigue fixture plate capable of

applying the desired conditions to the test specimens, manufacturing corrosion coupons, performing corrosion and fatigue testing on samples, and performing statistical analyses.

5. Equinox Ocean Turbines BV

Equinox Ocean Turbines BV would receive technical assistance from Florida Atlantic University in Boca Raton, FL and Environmental Science Associates in Seattle, WA. Support activities would include providing industry expertise, planning future turbine deployments, contributing technical insight, documenting the regulatory context, collecting environmental data, assessing environmental effects, and providing recommendations for initial deployment, post-installation monitoring, and adaptive management.

6. Orbital Marine Power

Orbital Marine Power would receive technical assistance from MarineSitu in Seattle, WA. Support activities would include executing a retrospective "Mock Deployment", analyzing data, performing manual baseline reviews, training object detection models, tracking all operational metrics, and running progressive automation simulations, developing the Monitoring SOP, conducting the error rate quantification, and synthesizing the results into the final reports.

7. Pacific Regional Institute for Marine Energy Discovery (PRIMED)

Pacific Regional Institute for Marine Energy Discovery (PRIMED) would receive technical assistance from MarineSitu in Seattle, WA. Support activities would include remotely supporting monitoring system operations throughout the project period, collecting data, managing and reviewing data, maintaining object detection models, conducting remote training of Wei Wai Kum Guardians for instrument maintenance, and preparing the test plan.

8. Triton Systems Inc

Triton Systems Inc would receive technical assistance from Kelson Marine in Portland, ME. Support activities would include using data to guide adjustments and improvements to the existing WEC-Sim model, improving the PTO model, evaluating multi-body interactions and mooring dynamics, and defining a new mooring system for the wave energy converter (WEC) body alone without the parent buoy alongside.

9. University of Washington Applied Physics Laboratory

University of Washington Applied Physics Laboratory would receive technical assistance from MarineSitu in Seattle, WA. Support activities would include providing and developing software to manage data and transmit turbine operational state to the AMP computer, testing all hardware and software, reviewing optical camera and sonar data software, evaluating detection model efficacy, and reporting.

10. MARE

MARE would receive technical assistance from the University of Washington Applied Physics Laboratory in Seattle, WA. Support activities would include coordinating with PNNL to perform pressure testing of the 3D printed electronics housings, analyzing data, and converting final tested pressure or failure pressure to approximate ocean depth.

11. Carnegie Clean Energy Limited

Carnegie Clean Energy Limited would receive technical assistance from Kelson Marine Co. in Portland, ME. Support activities would include performing metocean analyses to develop Design Load Conditions, developing hydro-structural dynamic model of the fish pen array with controllable WEC models integrated and at different conditions, and developing a simulation tool to repeat simulations with altered metocean and control approaches.

12. National Taiwan Ocean University[AC1.1]

National Taiwan Ocean University would receive technical assistance from the American Bureau of Shipping in Spring, TX. Support activities would include defining critical design conditions and events for the WEC system, evaluating the WEC under critical design conditions using computational fluid dynamics and finite element analysis, and enhancing the structural design if necessary.

13. PacWave (Oregon State University)

PacWave (Oregon State University) would receive technical assistance from 3U Technologies LLC in Conroe, TX. Support activities would include assembling data sets, collating marine data, performing engineering analyses and modeling to develop a dynamic cable solution, working with vendors, and assessing production and testing backlog.

14. Oregon State University

Oregon State University would engage their Large Wave Flume facility to prepare, install, calibrate, and test the required instruments with the wave machine and process collected data.

15. IoT Bearings LLC

IoT Bearings LLC would receive technical assistance from University of Washington in Seattle, WA. Support activities would include adapting existing experimental test rigs to incorporate samples and sensors, adjusting axial positions, testing bearing and sensor performance, analyzing load cell data, reporting, and completing a post-access questionnaire.

16. Ocean Motion Technologies, Inc.

Ocean Motion Technologies, Inc. would receive technical assistance from Oregon State University's O.H. Hinsdale Wave Research Laboratory in Corvallis, OR. Support activities would include accessing the Directional Wave Basin, operating the wavemaker and estimating and quantifying S-WEC power performance under repeatable sea states.

17. Ocean Power Technologies, Inc.

Ocean Power Technologies, Inc. would receive technical assistance from the Stevens Institute of Technology Davidson Laboratory. Support activities would include providing wave-tank access and technical expertise, generating waves and deploying instrumentation to collect data, deploying strain and load sensors, delivering data, and model validation.

18. University of Massachusetts Amherst

University of Massachusetts Amherst would engage their Ocean Resources and Renewable Energy Laboratory Current Flume facility to design a scaled model, calibrate the environment, conduct tests, and analyze data.

19. Blue Lotus Energy Corporation

Blue Lotus Energy Corporation would receive technical assistance from Braid Theory in San Pedro, CA. Support activities would include commercialization support focusing on continuity, market entry strategy, and commercial-technical alignment, as well as developing a capital readiness framework, providing business development, and administrative organization.

20. Drift Marine Systems

Drift Marine Systems would receive technical assistance from VentureWell in Hadley, MA and Rare Innovation in Littleton, CO. Support activities from VentureWell would include business development, commercialization, financial modeling, price analysis, and product readiness coaching. Support activities from Rare Innovation would include branding strategy and development, website development, market validation, and commercialization.

21. Sitkana

Sitkana would receive technical assistance from VentureWell in Hadley, MA and Rare Innovation in Littleton, CO. Support activities from VentureWell would include business development, commercialization, financial modeling, price analysis, and product readiness coaching. Support activities from Rare Innovation would include branding strategy and development, website development, market validation, and commercialization.

22. University of Connecticut

University of Connecticut would receive technical assistance from the OpenSeas Technology Innovation Hub at Old Dominion University in Norfolk, VA. Support activities would include leading commercialization, market identification, business model development, TRL and ARL assessment, reporting, and preliminary market sizing.

23. Vortex Hydro Power LLC

Vortex Hydro Power LLC would receive technical assistance from Rare Innovation in Littleton, CO. Support activities would include bridging the gap between technical performance and market adoption, guiding stakeholder engagement, validating market needs, influencing commercialization pathways, evaluating go-to-market approaches, translating technical capabilities into commercial offerings, and providing a commercialization roadmap.

24. Wave Water Works

Wave Water Works would receive technical assistance from the OpenSeas Technology Innovation Hub at Old Dominion University in Norfolk, VA. Support activities would include providing expertise in the commercialization of technology, running work sessions with team members, creating a business model, creating future strategies, and conducting independent research and analysis.

25. University of Washington

University of Washington would receive technical assistance from Oregon State University in Corvallis, OR. Support activities would include testing article compatibility in the Directional Wave Basin, assisting in hardware changes throughout testing, and running the wave maker during wave excitation experiments.

If additional TSRs are identified beyond those reviewed in this or previous determinations, or if the type of assistance offered by an approved facility is modified, additional NEPA reviews must be completed regarding those proposed changes.

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.

All project work would follow institutional health and safety policies including mandatory employee training, the use

personal protective equipment, adherence to safety protocols, regular safety audits, and risk assessments. Additionally, all applicable federal, state, and local health, safety, and environmental regulations would be adhered to.

All project-related activities would consist of desktop efforts or would occur in purpose-built facilities. No modification of existing facilities, ground disturbances, changes in use of facilities or outdoor equipment installations would occur. No additional permits, licenses, or authorizations would be required for these efforts. DOE does not anticipate any impacts to resources of concern due to the proposed project activities.

Consistent with DOE's current NEPA Implementing Procedures, project activities that are administrative and routine in nature are exempt from NEPA review.

NEPA PROVISION

DOE has made a conditional NEPA determination.

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

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 additional facilities, new activities, and Technical Support Recipients (TSRs) are subject to additional NEPA review. The following TSRs are approved to receive technical support for activities proposed in the applications that were part of this review:

1. C Power
2. C power
3. Deep Anchor Solutions Inc.
4. Deep Anchor Solutions Inc.
5. Equinox Ocean Turbines BV
6. Orbital Marine Power
7. Pacific Regional Institute for Marine Energy Discovery (PRIMED)
8. Triton Systems Inc
9. University of Washington Applied Physics Laboratory
10. MARE
11. Carnegie Clean Energy Limited
12. National Taiwan Ocean University
13. PacWave (Oregon State University)
14. Oregon State University
15. IoT Bearings LLC
16. Ocean Motion Technologies, Inc.
17. Ocean Power Technologies, Inc.
18. University of Massachusetts Amherst
19. Blue Lotus Energy Corporation
20. Drift Marine Systems
21. Sitkana
22. University of Connecticut
23. Vortex Hydro Power LLC
24. Wave Water Works
25. University of Washington

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

Selections of additional facilities, new activities, and TSRs. Such additions are subject to additional NEPA review. All technical support activities must be completed by pre-approved facilities and must be the type of work that a signed NEPA Determination applies to.

Notes:

Water Power Technologies Office (WPTO)
NEPA review completed by Alex Colling on 7/7/2026.

FOR CATEGORICAL EXCLUSION DETERMINATIONS

The proposal fits within a class of actions that is listed in Appendix B to 10 CFR Part 1021 or Appendix B and C of DOE's NEPA Implementing Procedures (June 30, 2025). To fit within the classes of actions listed in Appendix B to 10CFR Part 1021, or Appendix B of DOE's NEPA Implementing Procedures, a proposal must satisfy the conditions that are integral elements of the classes of actions in Appendix B of both 10 CFR Part 1021 and DOE's NEPA Implementing Procedures.

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.

DOE has determined that work to be carried out outside of the United States, its territories and possessions is exempt from further review pursuant to Section 5.1.1 of the DOE Final Guidelines for Implementation of Executive Order 12114; "Environmental Effects Abroad of Major Federal Actions."

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: **Kristin Kerwin**
NEPA Compliance Officer

Date: 7/13/2026

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: _____