

INTRODUCTORY LEVEL



UNDERWATER ROBOTICS & ENGINEERING DESIGN

September 25-26, 2026 | Visit Sheboygan | Sheboygan, WI



ABOUT THE WORKSHOP

The Underwater Robotics and Engineering Design Professional Development workshop focuses on how to teach the engineering design process using underwater robotics. Participants learn the fundamentals of basic ROV building and experience a variety of hands-on science, technology, and engineering design activities that can be integrated into a class or after school program to reinforce foundational knowledge and skills.

Upon completion of the workshop, all participants should feel confident to lead an engineering design activity focused on ROV building using the **Pufferfish ROV Kit** or comparable parts and components.

ABOUT THE ORGANIZERS

The MATE ROV Competition is a **pillar program of the Marine Technology Society (MTS)** that uses remotely operated vehicles (aka underwater robotics) to inspire and challenge students to learn and creatively apply science, technology, engineering, and math (STEM) to solve real-world problems and strengthen their critical thinking, collaboration, entrepreneurship, and innovation.

WHO SHOULD APPLY

Formal and informal educators in **communities around Wisconsin Shipwreck Coast National Marine Sanctuary** who have had introductory exposure to ROV activities or a background teaching science, technology, engineering, or math. Activities presented in this workshop are appropriate for students in grades 5-12 or equivalent, as well as first-year college or university students new to underwater robotics.

The goal is to provide all participants with the knowledge, skills, and experiences that will enable them to implement these activities with students in the classroom, homeschool, or STEM club.

REGISTRATION COST

This **FREE** workshop is sponsored by the MATE ROV Academy and Wisconsin Shipwreck Coast National Marine Sanctuary, through funding by a grant from the **National Science Foundation** to our partners at the **National Center for Autonomous Technologies**.

