

# Ocean Explorations

Sea Perch Construction and Use as  
After School/Summer Enrichment for  
Middle School Students

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Gloucester Maritime Heritage Center



# Gloucester Maritime Heritage Center

*Burnham Brothers Marine Railway*

*GMHC Marine Resource Center*

*Sea Pocket Lab*

*MIT Sea Grant Finfish Hatchery and Education  
Center*

*Northern Gateway to Stellwagen Bank National  
Marine Sanctuary*

*Commercial Diving History Exhibit*

*Live the Past, Learn for the Future*

# Our Mission



- Teach environmental stewardship, marine science and technology, and maritime skills through hands-on education.
- Preserve Gloucester's rich fishing industry history as a platform for learning.

# Our Programs

- Ocean Connections After School Program
- Ocean Explorations After School program
- Marine Science Internships
- Teen Boatbuilding
- Teen Rowing
- Field Trips
- Classroom Outreach Events



# Ocean Explorations (OE)

- 45 hour after school/summer enrichment course for students in grades 6,7,8
- Each student builds a Sea Perch ROV



# OE (Continued)

- Use Sea Perch Manuals
- Lessons on buoyancy, motors, and overview of research methods
- Students work together in small groups



# OE (Continued)

- Conduct a mini research study in Gloucester Harbor using underwater video cameras, plankton nets, hydrophones, and temperature and light sensors
- ROVs are taken home at the end of the course



# OE Students

- 30 students total in 3 sessions this year
- 100% enrollment and waiting lists
- 75% boys and 25% girls
- 50% of students receive scholarships
- Increasing to 15 students/course as of August 2005





# OE Recruitment

- Recruitment through newspaper announcements, local school teachers and guidance staff, and non-profit groups
- Ocean Connections is a feeder program
- OE is appealing to students who are more interested in technology, design, and construction

# OE Support



- Supported through grants and tuition
- Grant funds also support need-based scholarships
- Expect program to become self-supporting over the next year

# Future Goals

- Further develop mentoring program for course alumni
- Develop next level of programming for course alumni looking for new challenges
- Develop ROV mini-study component for field trips



# Thank You

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