The MITRE BlueTech Lab is a state-of-the-art, all-weather maritime test facility and collaborative laboratory for innovators and researchers to advance marine technology, strengthen climate resilience, and increase national security and safety.

Testing marine technologies at sea is expensive and difficult. Conducting in-water testing prior to launching costly at-sea experiments radically reduces risk. And sharing access to resources reduces costs and increases agility.

MITRE’s BlueTech Lab is a testing facility that enables the regional BlueTech innovation community to rapidly prototype new technology quickly and safely.

Featuring one of the largest and longest tanks in the region (106’ x 40’ x 18’), with a capacity of 575,000 gallons—the BlueTech Lab’s test tank accommodates the use of unmanned undersea and surface vehicles in a large, controlled space and provides the ability to test communication and acoustic sensing systems at lower transmission frequencies and larger signal pulse-widths than other facilities.
The MITRE BlueTech Lab’s test tank is open for use by research and industry partners today, and the enhanced lab facility will be completed by late 2022.

What We Do
Research and development, testing, rapid prototyping, and workforce development in acoustic sensing, acoustic communications, unmanned underwater vehicles, maritime autonomy, and climate science.

BlueTech Lab Capabilities
- Two-ton overhead gantry crane
- Trolley crane over tank to enable precise characterization of hydrophone beam patterns
- Integrated camera localization system for object localization
- Data recording and measurement systems
- Real-time collaboration and information sharing available via the Networked Experimentation, Research, and Virtualization Environment (NERVE®)
- Ability to enable unclassified or classified research (up to Collateral Secret)

Featuring the longest and one of the largest tanks in the region

106’ long
40’ wide
18’ deep
575,000 gallon capacity

For more information about using or connecting to the MITRE BlueTech lab, contact bluetech@mitre.org.

MITRE’s mission-driven teams are dedicated to solving problems for a safer world. Through our public-private partnerships and federally funded R&D centers, we work across government and in partnership with industry to tackle challenges to the safety, stability, and well-being of our nation.