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Trident Warrior: Advancing Future Capabilities Through Fleet Experimentation

"This event consists of more than 60 experimental initiatives covering a broad range of surface, air and submarine warfare areas. This is the ninth year in the series of experiments, and Trident Warrior 2011 (TW11) will continue enhancing the rich history of the series."

– Vice Adm. Daniel Holloway, commander, U.S. 2nd Fleet

Today's wars are waged in space, at sea, on land and in cyberspace. To maintain an advantage over adversaries in these domains, the U.S. Navy must continually evaluate its maritime capabilities and concepts of operation. The primary goal of the Trident Warrior experiment is to improve information dominance capabilities, maritime warfighting policies and procedures and interoperability between U.S. and coalition partners.

Validating Future Technologies in a Maritime Operating Environment

- During multiple [planning](#) conferences, the scope of data collection is refined by identifying experimentation initiatives. Targeted objectives are developed, against which data will be measured and analyzed.
- In the execution phase, TW11 puts emerging technologies to the test in an operational environment to ensure they perform as expected where it matters most to Sailors and Marines: at sea. [TW11](#) provides an organized venue for [fleet experimentation](#), streamlining and simplifying the process for partners to gain access to fleet assets.
- During an underway experimentation period, TW11 will temporarily deploy advanced capabilities on ships to collect real-world performance data and feedback from fleet users. Insights gained from data collected during the experiment will lead to recommendations to U.S. Navy decision makers regarding future capability investments for the fleet. TW11 is directed by [U.S. Fleet Forces Command](#) (USFF) and sponsored by U.S. 2nd Fleet (C2F) and U.S. 5th Fleet (C5F).

Developing and Improving Tactics, Techniques and Procedures

- In addition to experimenting with new technologies, the agenda includes developing and implementing improvements to tactics, techniques and procedures (TTPs) to aid maritime forces, encompassing all aspects of the modern warfare spectrum – air, land, sea, and cyber.
- Experimental initiatives for technologies and TTPs span a wide range of focus areas including: command and control; intelligence, surveillance, and reconnaissance; electronic warfare; networks; coalition interoperability; information operations; fires; cross-domain solutions; information transport; maritime domain awareness; and coalition communications.

Fostering [Partnerships](#) to Maintain the Information Advantage

- TW11 includes participants from USFF; C2F and C5F; program executive offices; U.S. Navy systems commands; the Naval Postgraduate School; academic and industry partners; as well as multiple ships and aircraft from the U.S. Navy and Air Force.
- Multinational participants include Australia, Canada, New Zealand, the United Kingdom and France.

Key Messages

- TW11 provides an organized and streamlined venue for experimenting with fleet assets.
- TW11 accelerates the introduction of new and improved capabilities, technologies and TTPs to the fleet.
- Incorporating an organized process allows TW11 to provide measurable and relevant results for warfighters.

Facts and Figures

- TW11 includes two numbered fleets, seven ships, 12 aircraft, numerous supporting surface craft and more than 12,000 military and civilian personnel in six countries.
- Since 2003, Trident Warrior has provided experiment support for more than 600 program of record initiatives, non-programs of record and 110 validated and improved TTPs.