Naval Surveillance Radar

The SCANTER 6002 radar offers superior multi-role detection and tracking capabilities of small surface targets and of air targets in the near airspace around the vessel. The Surface Surveillance capabilities of the SCANTER 6002 is ideal for search-and-rescue operations and law enforcement tasks, e.g. control of illegal immigration, smugglers, and piracy. Thus, the SCANTER 6002 is a major contributor to the Situational Awareness picture for all types of vessels from Border Police and Patrol Vessels to Frigates.

High Performance Navigation Radar
The SCANTER 6002 radar is fully integrated with various renowned marine navigation display applications, providing enhanced support for safe navigation and collision avoidance beyond the capability of standard navigation radar systems.

The SCANTER 6002 is IMO certified. Hence, the system configuration meets the latest performance standards of the International Maritime Organization and International Electrotechnical Commission (IMO). The SCANTER 6002 provides improved small target detection and automatic environmental adaptation for enhanced detection performance in all weather conditions.

Operational Capabilities

Surface Surveillance
The SCANTER 6002 provides superior surface patrolling capabilities by detecting and tracking small targets from the vessel side and all the way to the radar horizon — delivering uninterrupted, all-weather Surface Surveillance.

Monitoring Near Airspace
The SCANTER 6002 naval surveillance radar provides situational awareness in the lower airspace around own vessel. Aircrafts, including hovering helicopters, are typically detected and tracked to distances well beyond 15 nmi.

Helicopter Control
The SCANTER 6002 enables the vessel to control a helicopter in its short range operations, allowing for landing control on own ship or at remote locations, significantly increasing the operational capabilities of the vessel.

Tactical modes
• LPI radar mode from 0.2 Watt to 350 Watt adjustable by operator
• 16 individually selectable sectors and individually adjustable power to support a restrictive EMCON
• Single scan mode minimizing ESM detection

Product Characteristics

Drone detection & Classification
• Small drone detection
• Tracking & Classification

The advanced digital signal processing combined with antenna characteristics (including high gain and narrow beam) delivers unparalleled spatial resolution.

IFF Integration
The SCANTER 6002 based radar systems can host various IFF interrogators and provide interface via a CMS system, thus supporting a positive identified situational awareness picture.
**Automatic Environmental Adaptation**

To provide a confident domain awareness around own unit, regardless of weather conditions, SCANTER 6002 comes with adaptive suppression of sea and land clutter reducing the load on the operator. The result is a clear, high-resolution situational awareness picture.

**Tracking**

The built-in Embedded Tracker takes advantage of automatic clutter estimation (Terma patent), an Interacting Multiple Models (IMM) track estimation, and Multi-Hypothesis Tracking (MHT) to provide a high-quality situational awareness picture.

**Electronic Counter-Countermeasure**

All SCANTER naval radars come with ECCM (Electronic Counter-CounterMeasure) anti-jamming features for increased platform effectiveness and protection of own platform. Jamming from EW equipment is suppressed by using e.g. low-side-lobe antennas, waveform diversity, pulse compression, reduced power sectors, spread spectrum transmission, interference filtering, and Pulse Repetition Frequency (PRF) staggering.

**Low Life Cycle Cost**

The SCANTER 6002 radar relies on the latest GaN solid state technology to boost performance and reduce maintenance requirements. Line replaceable units are used throughout the family of sensors, ensuring long time sustainment and low life cycle costs. GaN solid state technology provides an MTBF/MTBCF 3 times better than competing technologies.

**Proven Track Record**

Terma has more than 60 years of Surveillance & Mission Systems experience and more than 3,000 radar systems in service worldwide. Navies, Coast Guards, and other high-demanding authorities around the world rely on our high resolution surveillance capabilities for securing the maritime domain and the sea lines of communication.

The built in ET2 tracker tracks both surface and air targets including classification of fixed wing or rotor. Optional Drone classifier available.
Operating in the aerospace, defense, and security sector, Terma supports customers and partners all over the world. With more than 1,600 committed employees globally, we develop and manufacture mission-critical products and solutions that meet rigorous customer requirements.

At Terma, we believe in the premise that creating customer value is not just about strong engineering and manufacturing skills. It is also about being able to apply these skills in the context of our customers’ specific needs. Only through close collaboration and dialog can we deliver a level of partnership and integration unmatched in the industry.

Our business activities, products, and systems include: command and control systems; radar systems; self-protection systems for ships and aircraft; space technology; and advanced aerostructures for the aircraft industry.

Terma has decades of hands-on know-how in supporting and maintaining mission-critical systems in some of the world’s most hostile areas. Terma Support & Services offers through-life support of all our products to maximize operational availability, enhance platform lifetime, and ensure the best possible cost of ownership.

Headquartered in Aarhus, Denmark, Terma has subsidiaries and operations across Europe, in the Middle East, in Asia Pacific as well as a wholly-owned U.S. subsidiary, Terma North America Inc., headquartered in Washington D.C. and with offices in Georgia and Texas.