

CAMAR

Coastal Surveillance System

Guarding Shores, Securing Horizons

CAMAR, a coastal surveillance radar, stands as a meticulously engineered solution to serve a multitude of purposes across various domains. Its design is characterized by robustness, scalability, and adaptability, ensuring its efficacy across different scenarios and environments. At its core lies a multi-layered architecture with FMCW technology approach that provides unparalleled versatility and effectiveness, allowing it to seamlessly integrate into diverse operational frameworks.

Key Features

 GUI-Enabled Status Acquisition and Control

 Automatic Measurement of Coordinates

 Digitalization of Analog Radar Signals

 Simple installation, single power, and network cable connection

 Multi-Sensor Integration for a comprehensive and multi-sensor approach to target tracking and identification

 Long Duration Operation

 Low Probability of Intercept (LPI) through low transmitter power

 Threat Evaluation

Technical Specifications

System			
Radar Type		Frequency Modulation Continuous Wave (FMCW) Low Probability of Intercept (LPI) Radar	
Frequency		X-Band (9400 MHz +- 40 MHz) FM	
Operation Concept		Unmanned Radar	
Scanning Type		Mechanical	
Detection Work Sector		360° in azimuth active sector scan mode available	
Max Detection Distance			
Small Boat Detection Distance		(1 m ² RCS) = 7 km (4 NM)	
Large Boat Detection Distance		(10 m ² RCS) = 12 km (6 NM)	
Large Vessel Detection Distance		(100 m ² RCS) = 30 km (16 NM)	
Resolution		6 meters in range 1° in azimuth	
Peak Power Transmit		10 Watts	
Antenna		Mechanical	
Antenna Type	Slotted Array Waveguide	Period of Rotation	5 seconds per rotation
Polarization	Horizontal	Power Consumption	100 Watts
Antenna Length per Piece	1000 m	Protection	Tropical climate and Sea mist
Antenna Quality	2 pieces (1 Receiver + 1 Transmitter)	Equipment Mass	Up to 40 kg
Gain	30 dBi		

