

STARTED AT: 01/04/2023

NAME OF THE PROJECT: GEOSPATIAL INFORMATION NETWORKING TECHNIQUES FOR MARITIME AWARENESS SERVICES

SHORT NAME: MAGINet

PROGRAM: ESA AO 1-11190

DURATION: 18 months



SUMMARY: In the maritime domain, the reliance on Automatic Identification System (AIS) has been a cornerstone for vessel tracking and monitoring. AIS is a mandatory technology for vessels above a certain size, allowing them to transmit key identification and position data. However, this approach has limitations, particularly concerning dark vessels that intentionally disable their AIS transponders, and vessels that are too small to be required to transmit AIS signals. To address this gap and enhance maritime domain awareness, additional geospatial information data (i.e., space-based information) are urgently needed to overcome the current limitations and to provide a more complete maritime situational picture.

Geosystems Hellas (GSH) together with LuxSpace and UniLu-SnT, will create a unique and innovative solution for dark vessel detection, addressing the specific needs and requirements of maritime stakeholders, with a user-centric design and focused on scalability and adaptability. By integrating data from multiple sources, including Earth Observation (EO), Automatic Identification System (AIS) and Radio Frequency (RF), and Machine Learning technologies, MAGINet enhances maritime situational awareness, improves vessel detection accuracy, and supports proactive decision-making.

CONTRACTOR:



SUBCONTRACTORS:



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