

Interreg Mediterranean



Strategic Project

MED OSMoSIS

Mediterranean governance
for

Strategic Maritime Surveillance and Safety issues

D. Panagopoulos - (Lead Partner - Special Service of European Union
Structural Funds for the Ministry of Maritime Affairs and Insular Policy)
on behalf of **MED OSMoSIS Group**

06-03-2022, Madrid | MED OSMoSIS Group

Objectives & Goals (1/2)

A brief summary of objectives and goals of MEDOSMOSIS

MED OSMoSIS

Duration 35 months (1/11/19-30/9/22)

3.000.000,00 euros - ERDF (85%) for MS & IPA

10 Partners (9 MS, 1 IPA) & associated partners

- a core list of data (maritime navigation maps, urgent nautical information, maritime limits and their standards (IHO)),
- a list of platforms existing in the partnership (to test their availability and interoperability, test the data, including safety and environment)
- Collected or thematically adjusted data in order to support further activities and pilots (Greece – Spain – France– Italy)



Objectives & Goals (2/2)

- Highlight good practices and foster collaborations and synergies among **National, Regional and local Authorities and organizations**
- a **Memorandum of Understanding**
- EU, international or regional regulations, policies & recommendations
(European Cohesion Policy, CISE, IMP, IMS, Blue Growth Economy, EU Climate Change Policy 2030, EU Civil Protection Mechanism, European Green Deal, EUSAIR, PP (2021-2027) etc.)
- Added Value: Institutional capacity, interoperability, synergy establishment & high concentration of observation capabilities
- Recognising main gaps/ needs analysis** : Interoperability, Open and compliant Data, Improvement of surveillance Data exchange, compatible & integrated applications and reliable tools & networks
- ✓ **Architecture** of advanced ICT & satellite systems/technologies and networks for establishment of platforms
- ✓ Increasing the complementarity between actors and systems of Maritime Surveillance
- Main Objectives:
 - Multilevel governmental cooperation, safe roadmap in both bottom up and top down procedures, transnational MoU
 - Exploiting maritime surveillance technologies for rescue, safety & security at transnational level
 - Sustainable alliance for maritime safety & security in the Mediterranean
 - Managing gaps & recognizing opportunities within the integrated maritime surveillance
 - Increasing interoperability and sharing of data
 - Improvement of surveillance capacity (plenitude & reliability of data)

Summary

- ❑ **Studying activities –
Main Results**
- ❑ **Pilot Studies and Actions
– Main Results**
- ❑ **Scheduled Capitalisation
and Transferring events
– project longevity**

Studying activities – Main Result: Data Collection - Data Compilation/Sharing

□ Datasets related to maritime surveillance

Core list of data:

maritime navigation maps, urgent nautical information, maritime limits and their standards, web services

List of platforms

Thematic data to support pilot activities

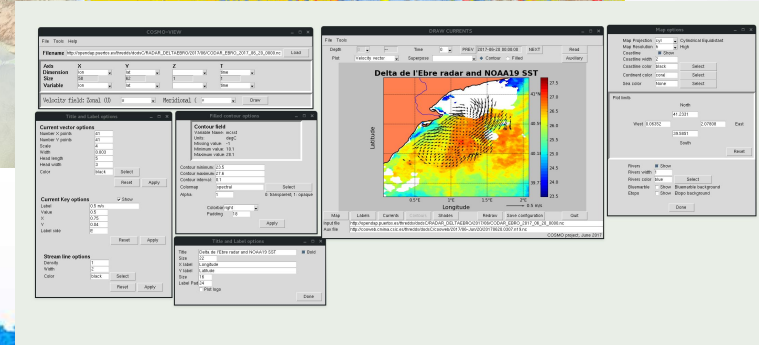
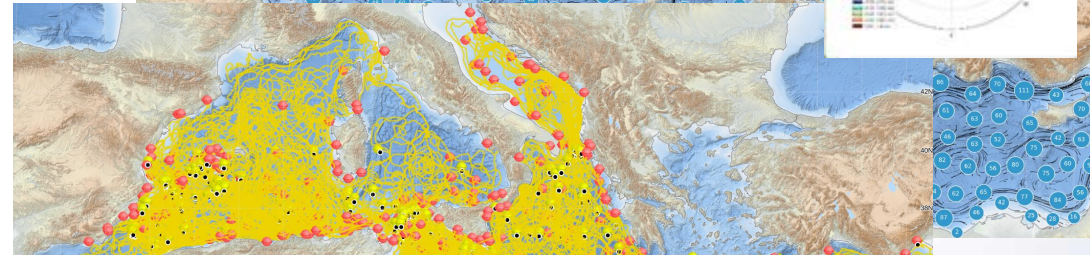
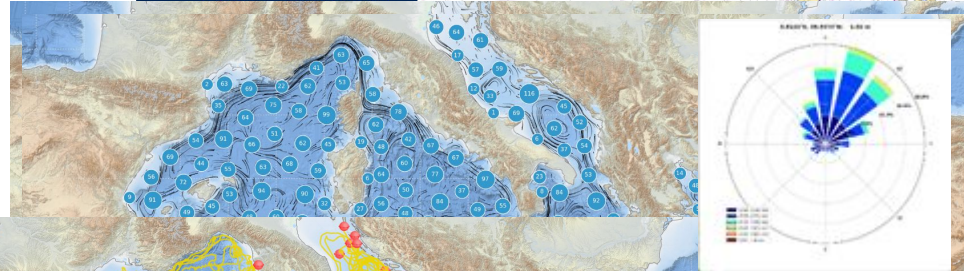
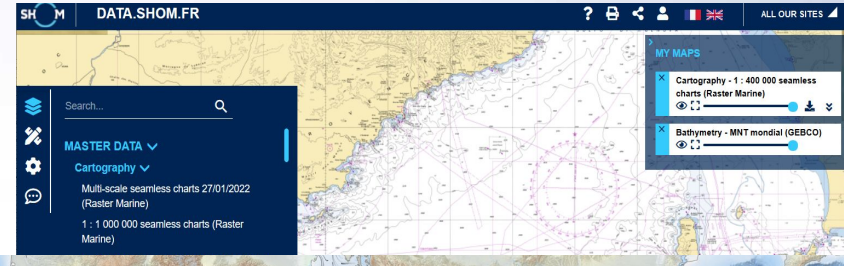
□ Additional Datasets

Climatological Atlas of currents

Drifting objects Database

SAR and Pollution assesement, Ecological Connectivity

□ Tools: COSMO-VIEW, WebGIS Portal



Pilot Studies and Actions – Main Results (1/3)

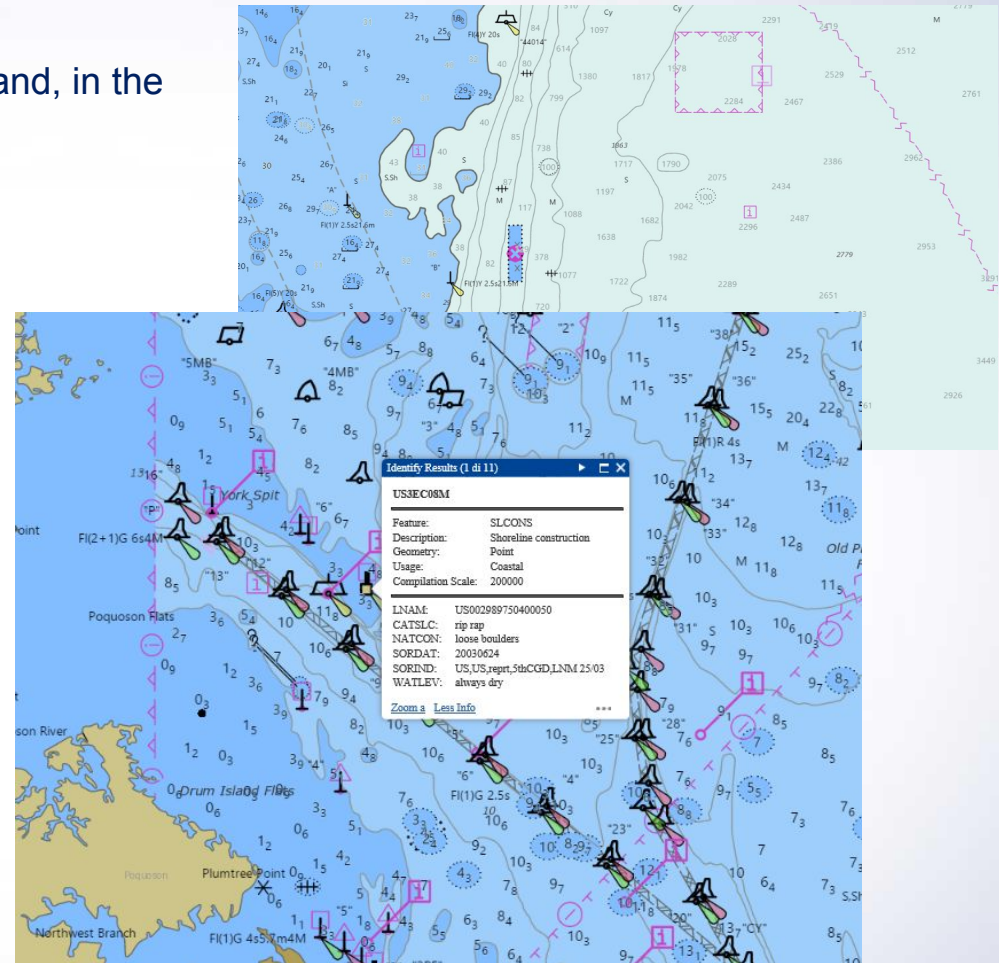
Data Portals

- Web-GIS Interface:**

Nautical charts according IHO S-57 format and, in the future, in the IHO S-100 format.

- S-57 Dataset**

Coast Guard offices
 Port Authorities
 Marine Area Operators
 Oil and/or Gas Companies
 Research Institutes
 National Authorities
 All other stakeholders



Pilot Studies and Actions – Main Results (1/3)

Data Portals



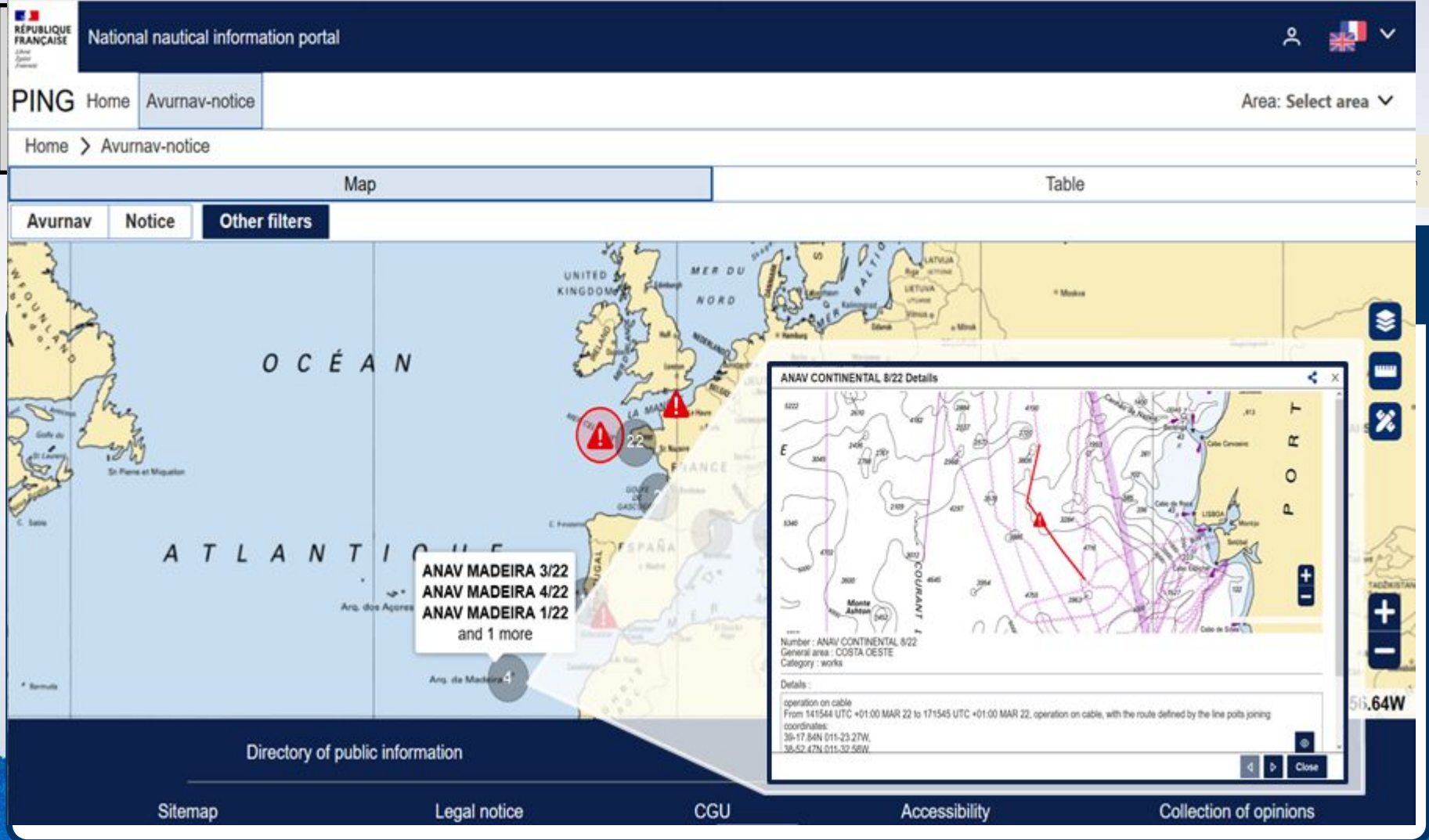
- MSDI (Marine Spatial Data Infrastructure) connected to other WMS, WMTS and/or WCS of National and European Authorities.



Pilot Studies and Actions – Main Results (2/3)

Navigation Warning

S-124 API Nav Warnings: Web production & diffusion



National nautical information portal

Home > Avurnav-notice

Area: Select area

Map Table

Avurnav Notice Other filters

ANAV MADEIRA 3/22
ANAV MADEIRA 4/22
ANAV MADEIRA 1/22
and 1 more

ANAV CONTINENTAL 8/22 Details

Number : ANAV CONTINENTAL 8/22
General area : COSTA CESTE
Category : works

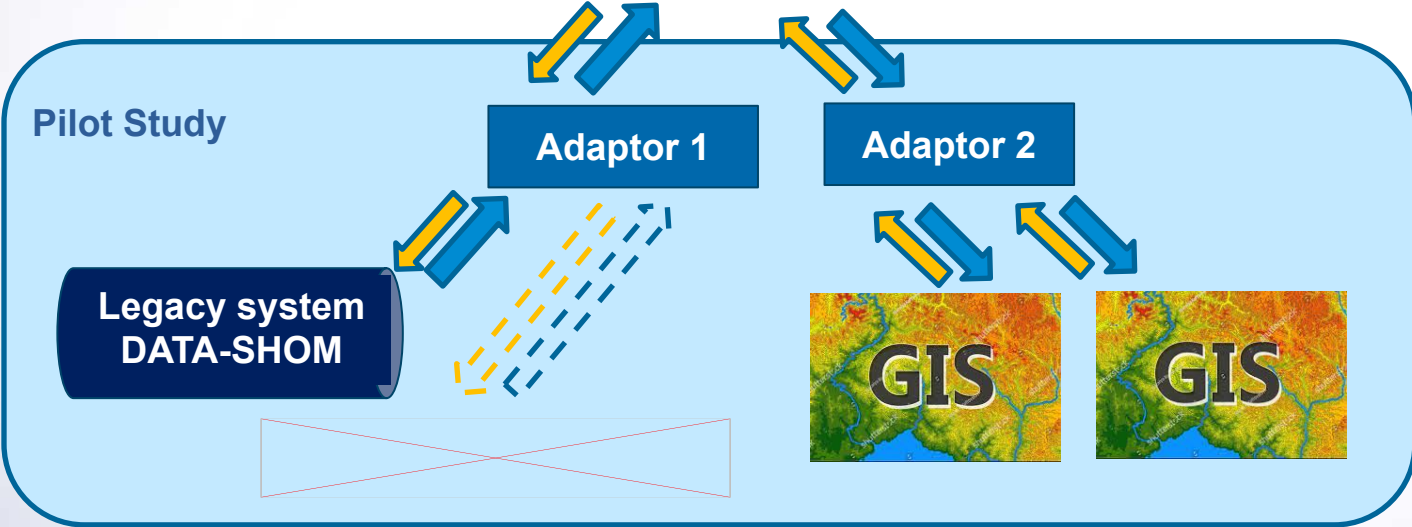
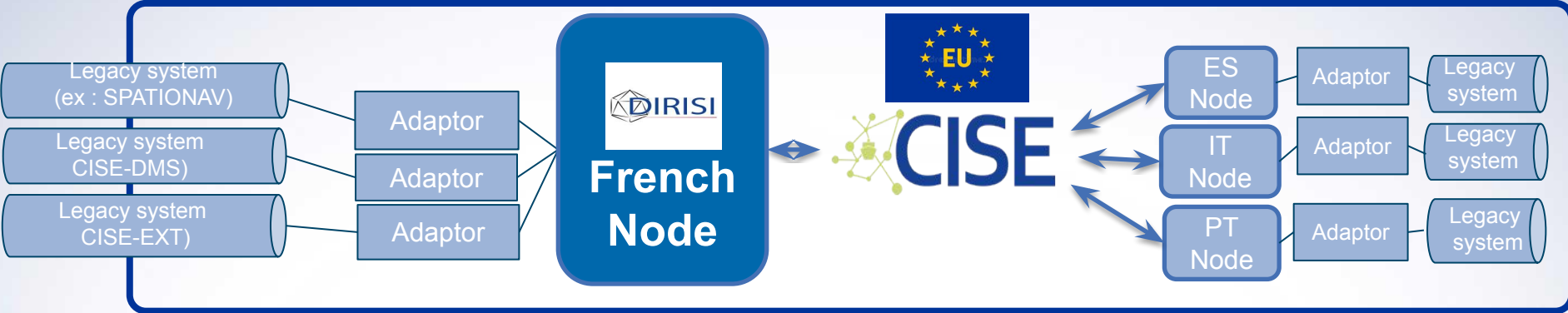
Details:
operation on cable
From 141544 UTC +01:00 MAR 22 to 171545 UTC +01:00 MAR 22, operation on cable, with the route defined by the line points joining coordinates:
38-17.84N 015-23.27W,
38-52.47N 015-37.58W

Directory of public information


Sitemap Legal notice CGU Accessibility Collection of opinions


Pilot Studies and Actions – Main Results (2/3)

Participation to CISE Network



DIRISI Joint Directorate of Infrastructure Networks and Information Systems -French Armed Forces

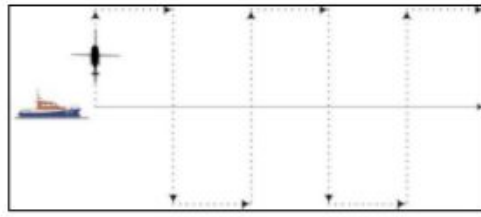
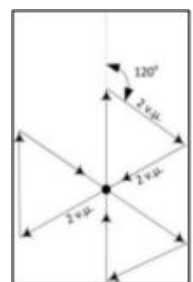
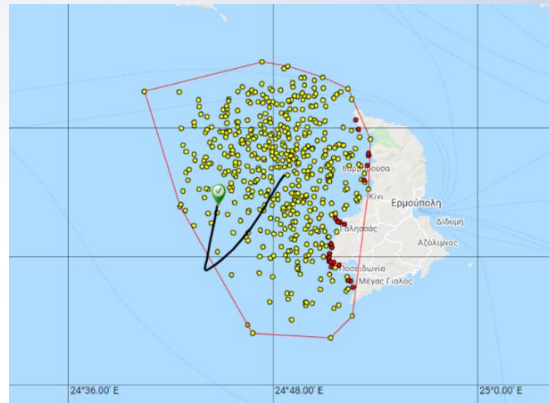
 Data flows

 Data request

Pilot Studies and Actions – Main Results (3/3)

Search and Rescue Activities

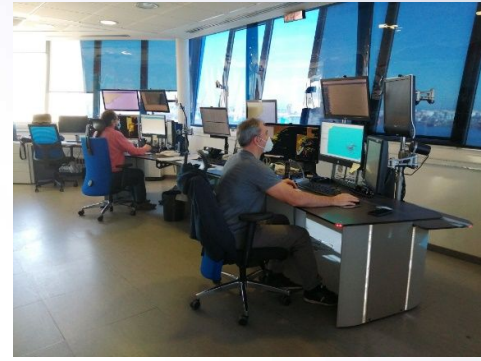
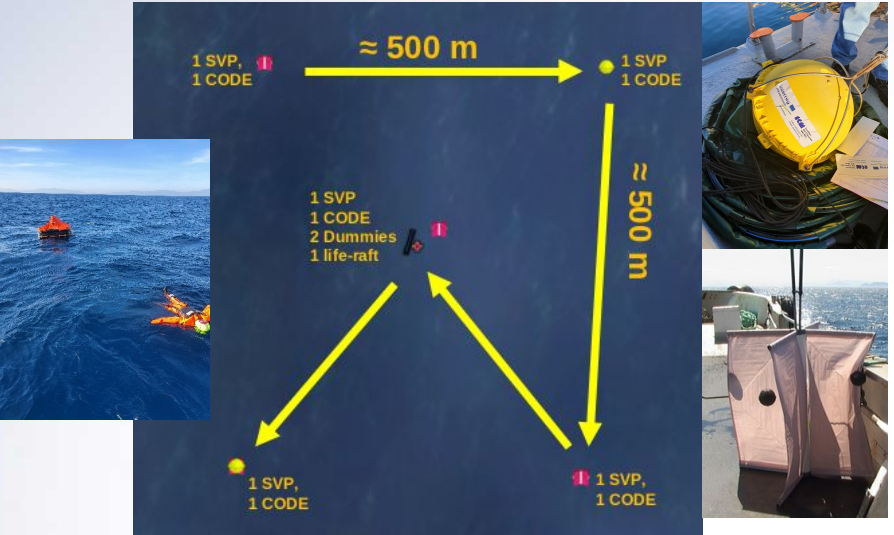
- Integration of SAR tools (drift modeling, search planning) into webGIS operational platform
- To assess and compare the effectiveness of different available standalone software
- To correlate data from other sources (T-AIS, S-AIS, LRIT, VMS) to enrich decision-making process during SAR operations
- Integration of meteorological and oceanographic data
- To enhance personnel’s expertise through training exercise & pilot experiments
- To improve collaboration with external organizations



Pilot Studies and Actions – Main Results (3/3)

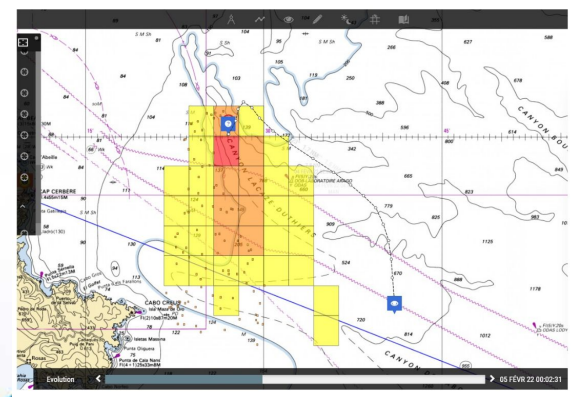
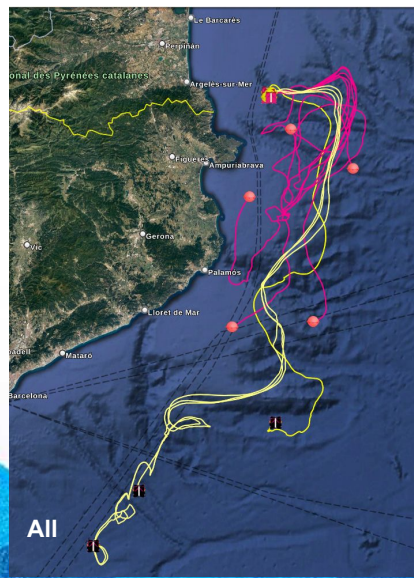
SAR Exercise 02/2022

Design and Strategy



Main Results

Operational Forecasting from French Prefecture Maritime



Training & Events regarding Pilot Studies and Tools introduced/developed through the project

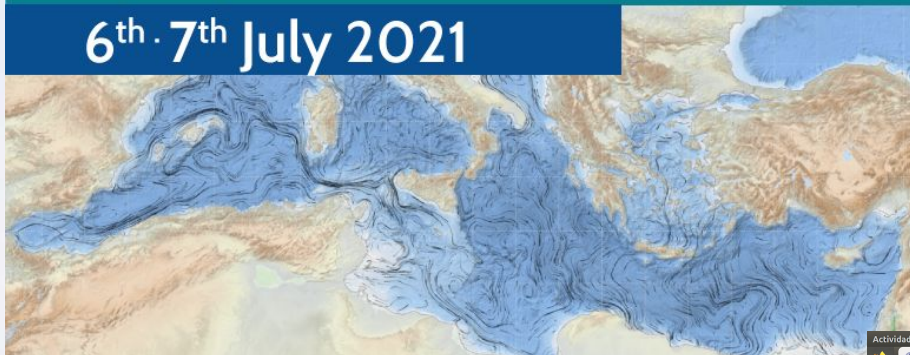


Project co-financed by the European Regional Development Fund



COSMO VIEW for Maritime Surveillance

6th - 7th July 2021



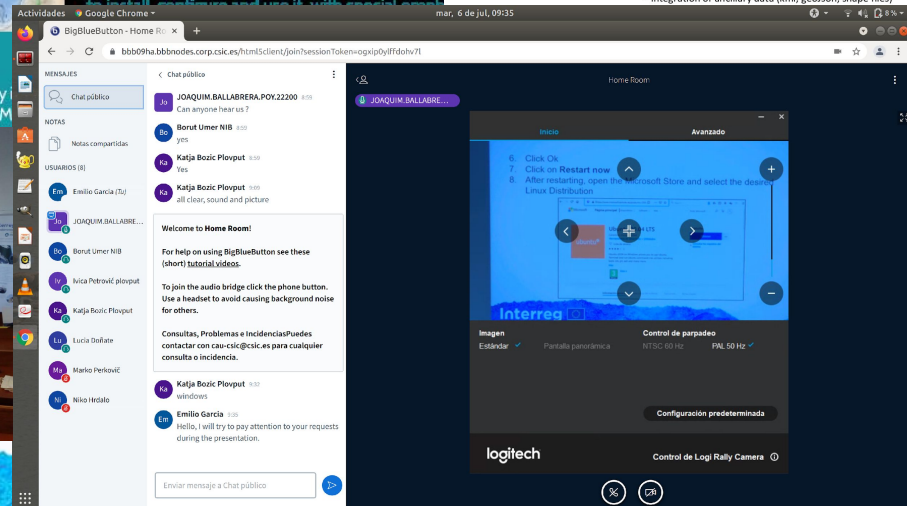
The COSMO-VIEW is an open source interactive tool developed in Python conceived to work with able to access multiple sources of data both local and remote. It pays particular attention to ocean velocity fields with the purpose of providing a first assessment on many ocean forecasting products (e.g. Copernicus marine observations (e.g. satellite images, radar met-ocean buoys), its open source character facilitates data service (WMS, WFS) and/or in most usual geotools (GeoJSON, csv files). The various GUI interfaces serve to compute single or cloud-particle trajectories, differences among different products. COSMO-VIEW offline provided the data is saved locally. In this tool, you can install the application and use it with special ease.

DAY 1 Morning	
9:00 - 9:15	Welcome Installation (step by step): Linux and Windows - Overview Internal Structure Configuration: - Copernicus access - Remote Services - Ancillary files
DAY 1 Afternoon	
	Mapping capabilities Velocity products - Display capabilities - Local versus Remote data - Multiple datasets - Custom Datasets Generic Tools: - Scalar data (e.g. satellite data) - Custom Data
DAY 2 Morning	
10:15 - 13:00	Tools SAR: - Working with trajectories - Particle tracking simulations Miscelanea: - Movie Creation - Integration of ancillary data (kml, geotools, shape files)

Training objective:

The main objective of the training is to introduce the COSMO VIEW tool developed by the ICM-CSIC mainly in the framework of the COSMO project (Ocean Currents and Safety in the Marine Environment) and MEDOSMOSIS (ref 6119) project.

The training course is free of charge.



Training & Events regarding Pilot Studies and Tools introduced/developed through the project



Cross border Online Workshop (Zoom Multilingual)

France-Italy-Monaco: Interaction between
Maritime Spatial Planning & Maritime surveillance

3rd February 2022 - 9.30AM (CET)

Agenda

France

ORSEC plan in the Mediterranean – Mediterranean Maritime Prefecture – Antoine Ertcheid
MEDOSMoSIS Pilot study: PING Navigation Warnings S-124 API - Shom- Yves Le Franc

Italy

Organisation of Maritime surveillance activities – Guardia Costiera
CF (CP) Tommaso Pisino
MEDOSMoSIS Pilot study: UP Navigation Charts update application
Hydrographic Institute - Cap. Nunziante Langelotto



The solution: Data aggregation (2/2)



International Efforts

- Interoperability of national systems
- Cooperation among Agencies (international cooperating bodies address this issue as required, eg. EU Directives, IMO resolutions, etc.)
- Standardization - Exchange protocols/formats (standards are evolving to promote interoperability and common procedures for data manipulation)
- Validity of data (services vs static exchange of data)
- Confidentiality concerns and obstacles (more difficult to overcome)

Examples

- INSPIRE – Infrastructure for spatial information
- Maritime Spatial Planning (MSP)
- EMSA digital services catalogue, most importantly SEG Platform



Capitalisation & Transferring

Regional Stakeholder events

Jornada per a la Governança Marítima a la Mediterrània: Informació i Eines. Barcelona 17/06/2021

MSP & Maritime security and surveillance in the Mediterranean, France-Italy-Monaco Telematic, 03/02/2022

European Stakeholder events

Studying maritime surveillance data in the Mediterranean MEDOSMOSIS workshop, Telematic, 20/01/2022

Scheduled Capitalisation and Transferring events – future results – project longevity



- **Four (4) Events for capitalization and Transferring with their corresponding reports**
- **Memorandum of Understanding**
- **Two (2) Policy Recommendations produced on Maritime Surveillance based on the project's achieved know-how**
- **A Med OSMoSIS forum-blogspot to interact with actors in Maritime Surveillance**



Communication & Outreach

NEWSLETTER 2+2

BLOG: <https://med-osmosis.blogspot.com/>

61 tweets: <https://twitter.com/medosmosis>

Retweeted por ti
MED OSMoSIS @MedOs... · 6h :
The pilot study in Spanish and French waters is underway! Our partners from the Institute of Marine Sciences - CSIC are testing solutions for Search and Rescue operations in transborder locations.

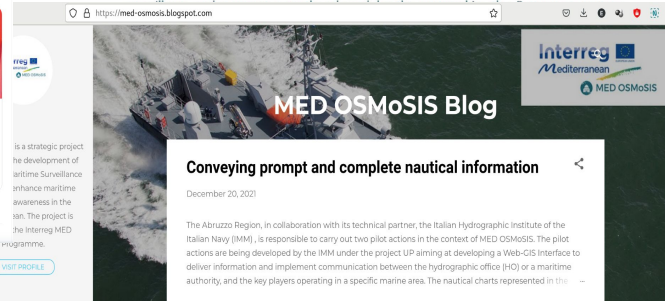
#MadeInMED #Governance #MEDOSMoSIS



Save the date:
Studying maritime surveillance data in the Mediterranean

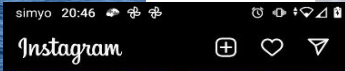
The MED OSMoSIS project, funded by the Interreg MED programme, promotes the implementation of improved governance at sea and data exchange among different Member States in the Mediterranean.

In the context of this project, following a survey conducted on the field of maritime



Website and Social media
MED OSMoSIS Project Website
MED OSMoSIS Twitter

Archive
Report Abuse



**THANK you
for your attention**



The MED OSMoSIS Group

(Emilio-Armelle-Stratos-Athina-Camillo-Christos-Laura-Lari-Clara-Pablo-Katja-Jose-Paola-Lorenzo-Maria...

...Fabio-Corine-Carlos-Eric-Adeline-Gaidic-Martina-Miguel-Ivica-Andrej-Milena-Ivana-Pedro-Dimitra-Alexis-Cincia-Gasper-Ivica-Marijan-Ana-Jure...

Helena-Pedro-Andrej-Pasquale-Ruiz-Jose Manuel-Fotini-Sotiris-Tina-Francesco-Irene-Dimitrios)