

# WEkEO-DIAS



## About

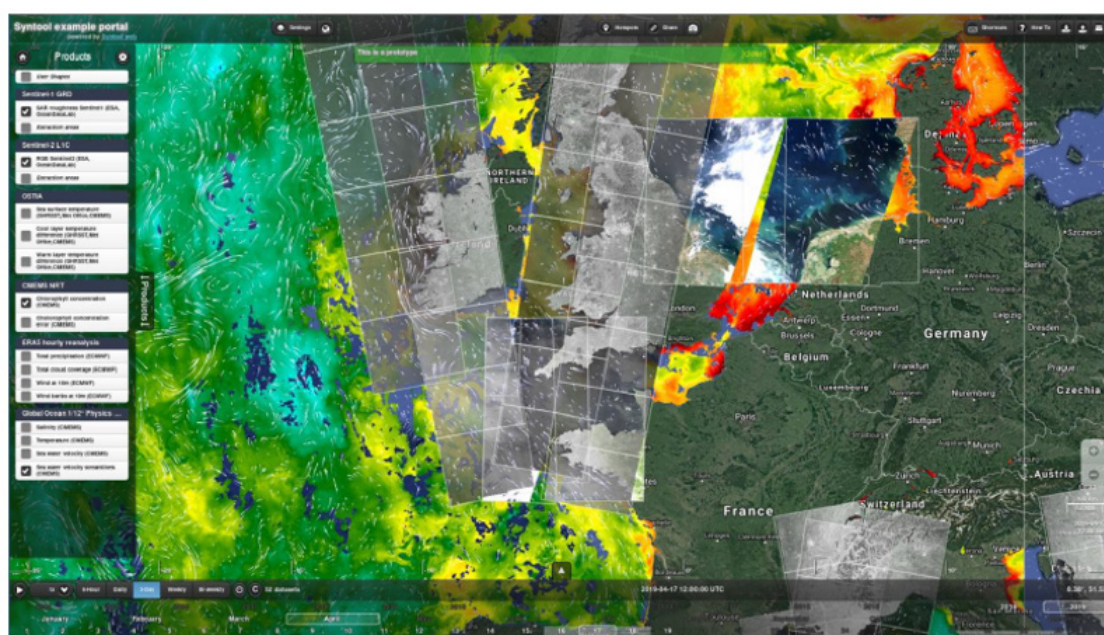
WEkEO is one of the 5 Copernicus DIAS (Data and Information Access Services). The overarching objective of DIAS is to enhance access to Copernicus data and information for further use in an efficient computing environment implementing the paradigm of “bringing the user to the data”, as one condition for unlocking the potential value of Copernicus for innovation, science, new business, implementation of public policies and economic growth.

Considering the well-structured user communities and the strong relationship existing between EUMETSAT, Mercator-Océan and ECMWF, Copernicus ClimateChange Service, the organisations have joined their efforts to implement one instance of DIAS in partnership, namely WEkEO. WEkEO is the service for marine environmental data, virtual environments for data processing, and skilled user support. WEkEO has a public and free part for discovery and access to data and data products, while it also has a commercial part with various analysis applications and cloud space.

## Coverage

The Harmonized Data Access (HAD) provides a single access protocol (REST API) whereby scaling and evolution of codes are made easy. This way, it provides easy & fast access to subsetting attributes in hundreds of datasets from different Copernicus sources and allows uniform access to the whole WEkEO catalogue, including subsetting and downloading functionalities. The HAD provides discovery and access to:

- ➔ All the Sentinel satellite data sets: S1, S2, S3 Marine, S3 Land, S5P
- ➔ Main Copernicus Service Data products from:
  - ➔ Copernicus Marine Service:
  - ➔ CMEMS Copernicus Atmospheric Service: CAMS
  - ➔ Copernicus Climate Service: C3S
  - ➔ Copernicus Land Service: CLMS



Example of data aggregation from WEkEO

## Function in Blue-Cloud:

- ➞ Multi-Source viewer (free access): Viewer able to present Satellite Imagery, in-situ data, and model-based data. Capability to handle information from different height and depth layers, and information in changing in time (past-present-future), from model. Data discovery is enabled by the connection of the viewer to WEkEO Catalogue, enabling browsing and selection of datasets and their associated metadata.
- ➞ Access to information pages (free access): Tutorials, wiki, forums.
- ➞ Access to the WEkEO helpdesk (free access).
- ➞ Access to Jupyter Notebooks (free access): provide computing resources and a virtual environment for launching processing on data.
- ➞ Build and deploy your own front office and hosted processing (with subscription).
- ➞ Access to VM catalogue with preinstalled applications and optimized networking to the data storage layer (with subscription).
- ➞ Access to additional storage and cloud services for hosting your data and making it available to your tenants or to a wider audience through tailored means (with subscription).
- ➞ Access to Morpheus cloud management interfaces and manage all your tenants (with subscription).

URL: [www.wekeo.eu](http://www.wekeo.eu)

Partners involved: Mercator Ocean