UN environment programme

Mediterranean Action Plan
Barcelona Convention

info RAC
INFORMATION AND COMMUNICATION REGIONAL ACTIVITY CENTER

INFO/RAC National Focal Points Meeting

Rome, Italy **7-8 June 2023**

UNEP-MAP Data Policy Annexes

What does the adopted data policy means to us?

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INFO/RAC
National Focal Points Meeting
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Data Policy per Fluxes

- Once we've seen what the Data Policy is like
- Once we've seen the implications for the Contracting Parties of the Barcelona Convention

Continue detailing Data Policy application actions by defining aspects that differentiate mandatory and non-mandatory data fluxes in the UNEP-MAP system

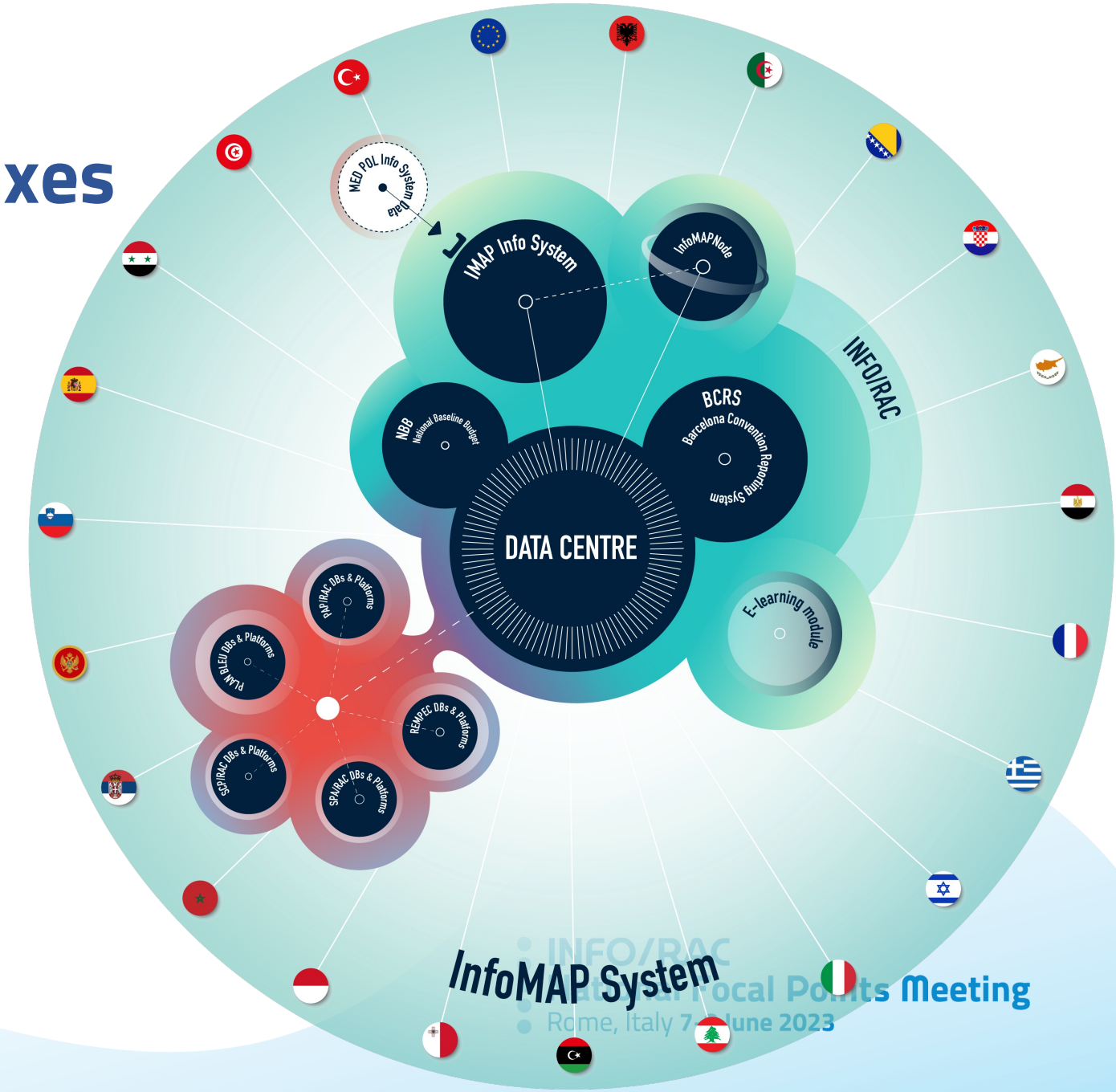
Data Policy per Fluxes

Mandatory:

- BCRS
- NBB
- IMAP

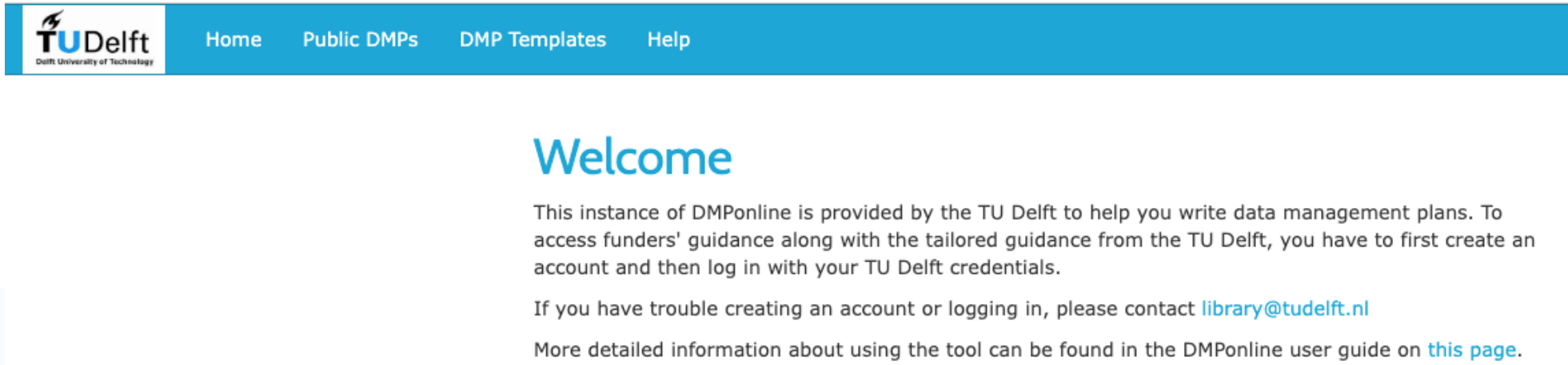
Non-mandatory:

- InfoMAPNode



A common structure among the Annexes

Framed into the FAIR data management principles, we let us inspire from TU Delft (NL) Data Management Plan online app to answer the «right» questions about the specific data workflow



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A common structure among the Annexes

Framed into the FAIR data management principles, we let us inspire from TU Delft (NL) Data Management Plan online app to answer the «right» questions about the specific data workflow

Aims:

- Better characterize fluxes
- Define data sources
- Specify formats, sharing practices, metadata scheme and data usage (licenses and evantual embargo) in line with Data Policy

A common structure among the Annexes

Summary of data management aspects:
Brief description of the structure
- Data types

DM common practices among different access levels
- Data collection
- Data source characterization
- Data formats and quality
- Licenses
- Data embargo periods

Production of metadata and other relevant documentation
Data sharing practices and restrictions
Other products characterization
Data Metric policy:
Workflows for different access levels
Interactions according to granularity and access

BCRS	NBB	IMAP	INODE
y	y	y	y
y	y	y	y
y	y	y	n
y	y	y	y
y	y	y	n
y	y	y	y
y	y	y	n
y	y	y	y
y	y	y	n
y	y	y	y
n	n	y	y
n	n	n	y
y	y	y	y
y	y	y	y
y	y	y	y

A common structure among the Annexes

	BCRS	NBB	IMAP	INODE
Summary of data management aspects:	y	y	y	y
Brief description of the structure	y	y	y	y
Data types	y	y	y	n
DM common practices among different access levels	y	y	y	y
Data collection	y	y	y	n
Data source characterization	y	y	y	y
Data formats and quality	y	y	y	n
Licenses	y	y	y	y
Data embargo periods	y	y	y	n
Production of metadata and other relevant documentation	y	y	y	y
Data sharing practices and restrictions	n	n	y	y
Other products characterization	n	n	n	y
Data Metric policy:	y	y	y	y
Workflows for different access levels	y	y	y	y
Interactions according to granularity and access	y	y	y	y

Flow peculiarity: BCRS

Data types:

BCRS data types are basically two: the XML file as output of the reporting data in the webform and the HTML format for visualizing the data entered in the webform.

BCRS data are then accompanied by corresponding and valuable metadata.

Data collection:

BCRS support reporting for the data flows related to the Barcelona Convention. It meets the obligations established by each protocol approved by COP.

Data management common practices among different access levels:

Every 2 years the Contracting Parties must submit a new report based on the signature and ratification of the Barcelona Convention for the Protection of the Marine Environment and the Coastal Region of the Mediterranean and its Protocols.

The BCRS, developed by INFO/RAC, ensures availability of latest data and maintenance of long-term series, starting from the 2016-2017 reporting cycle. The scientific validity of the data is ensured by each CP.

Flow peculiarity: BCRS

Data sources (protocols from CPs):

Barcelona Convention
Prevention & Emergency protocol
LBS Protocol
Offshore protocol
Dumping protocol
Hazardous wastes protocol
SPA & BD protocol
ICZM protocol

Data quality:

The National Focal Point of each CP guarantees the quality of transmitted data through the official release procedure.

Data formats and data quality:

BCRS ensures the standardization of the data collected by the CPs through the use of a webform. The webform is consistent with the approved guidelines.

Data entered in BCRS can be downloaded at any time during the reporting activities as a zipped envelope containing 5 files:

- README.txt: contains the documents included in the envelope;
- metadata.txt: descriptive information about the envelope;
- history.txt: log of activities executed since the envelope creation until the moment of the download;
- xml file: data entered in the protocol webform;
- feedbacks.html: now empty, because quality controls have not yet been implemented, but could be implemented in the future.

Flow peculiarity: BCRS

Data licences and data access

According to the Data policy, data "released to public" by the protocol NFP is released as Open Data with the Creative Commons Attribution (CC-BY)

		Data Production	Data Consultation	
		Upload data	Download data not yet "released to public"	Download data "released to public"
CP users	Protocol NFP			
	Protocol user			
MAP Component users	CU			
	INFO/RAC			
	RAC			
MAP Partners				
Anonymous users				

LEGENDA
available
only for CP to which protocol user/NFP belong to
only for CP to which protocol user belong to
not available

Flow peculiarity: NBB

NBB data types are basically three:

- **XML** file as output of the reporting data in the webform
- **HTML** format for visualizing the data entered in the webform
- Geographical part of the dataset (not yet implemented). The geographical part is represented by the **shapefiles** of the Mediterranean Regions in which the loads of pollutants are discharged.

NBB data are then accompanied by corresponding and valuable metadata.

Flow peculiarity: NBB

The NBB is composed of different components for the data flows. Each user, according to its role, has a set of corresponding permissions within the NBB system.

Contracting Party users (two levels):

- MEDPOL NFP (or other NBB user designated by the MEDPOL NFP): users compiling the NBB webform, the metadata field and validating the data entered in NBB.
- MAP Focal Point (or other NBB user designated by the MAP Focal Point): national entities responsible for the public release of the data.

Flow peculiarity: NBB

MAP Component users (different roles):

- Coordination Unit (CU): supervisor of the overall of the NBB system.
- INFO/RAC: administrator of the overall of the NBB system. INFO/RAC protect data and system security. INFO/RAC do not manage the dataset, unless it is required by the owner.
- MED POL: involved in NBB in data aggregation in order to prepare specific evaluation layer or environmental products and quality assurance. They haven't the role to manage data if it isn't required.

Anonymous users: Users that have the possibility to search and view public data.

Flow peculiarity: IMAP Info System

1. IMAP Info System ensures the standardization of the data collected by the CPs through the Information Standards.

2. The Information Standards are consistent with the Guidelines of the Common Indicators and are approved by the CPs before being implemented in the IMAP Info System

3. For **Common Indicators 15 (Hydrography) and 16 (Coastline),** the file to upload in the IMAP Info System is a zip file containing a shape file with polylines (or polygons) according to the requirements reported in the specific Information Standard (C1 and H1 respectively), that is in Word format.

4. For all the other Common Indicators, the Information Standard is in Excel format and consists of two types of sheets: Data Dictionaries - DDs and Data standards - DSs . The DD sheet explain how to complete the DS sheet with measurement data.

Flow peculiarity: IMAP Info System

IMAP Info System Components

The IMAP Info System is composed of different components for the data flows. Each user, according to its role, has a set of corresponding permissions within the IMAP Info System.

Contracting Party users (three different levels):

1. MAP Focal Point user
2. INFO/RAC National Focal Point user
3. IMAP user

MAP Component users (different roles):

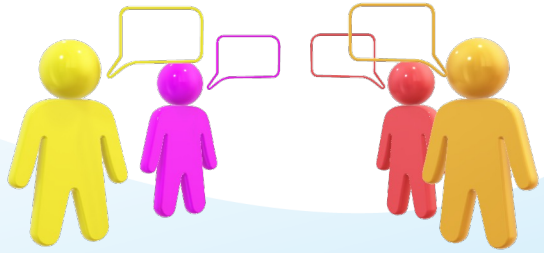
1. Coordination Unit (CU): supervisor of the overall of the IMAP Info System.
2. INFO/RAC: administrator of the overall of the IMAP Info System. INFO/RAC protect data and system security. INFO/RAC do not manage the dataset, unless it is required by the owner.
3. MAP COMPONENTS: They can view a great part of data but doesn't have the role to manage the data if it isn't required.

Anonymous users: Users that have the possibility to search and view public data.

Flow peculiarity: IMAP Info System

Contracting Party users

- **IMAP User Network** is the network of IMAP Users responsible to upload, validate and release monitoring data related to IMAP Common Indicators.
- **IMAP users** consists of Country expert, officially appointed by the **MAP Focal Point** and coordinated by the INFO/RAC NFPs.
- **INFO/RAC NFP**:
  1. Acts as facilitators among INFO/RAC and IMAP users, allowing the sharing and exchange of knowledge and information for data reporting purposes on IMAP Info System.
  2. Collaborates with INFO/RAC providing suggestion and observations to improve Information Standards.
  3. Encourage all national IMAP Users to participate in the Training/Assistance meeting organized by INFO/RAC.



Flow peculiarity: IMAP Info System

IMAP User Network

3-level for IMAP User profiles have been defined, which allow CPs to differentiate the level of responsibility according to the internal national organization on data management.

Level I - Upload: users uploading the monitoring data file and performing the compliance quality check - scientific institutions responsible for data production and elaboration (i.e. monitoring and research institutes).

Level II - Validation: users performing the process of quality control of monitoring data - national institutions responsible for data collection and validation (i.e. Environmental National Agency).

Level III - Official release: users have the duty to confirm the official release - national entities responsible for the official release of the data (i.e. National Focal Point).

Flow peculiarity: InfoMAPNode

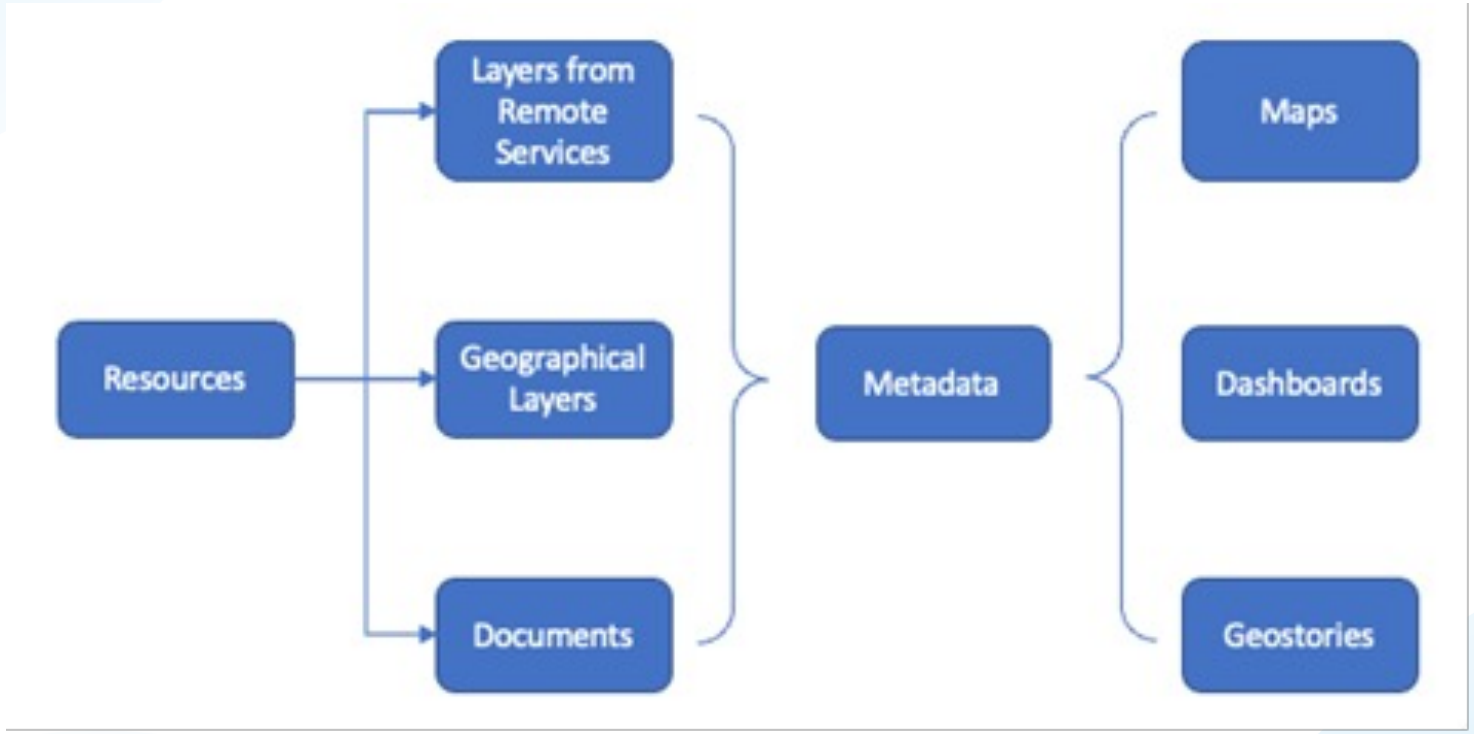
User access

- **Contracting Party users**: InfoMAPNode is set up to provide free and accessible spatial data infrastructure for CPs, that can use it for National purpose, allowing to create map using spatial information from different sources and supporting decision makers and public authorities.
- **MAP Component users:** Users which are staff of MAP Secretariat and Component; The subdivision is the following:
  - CU, other RACs and MAP Components
  - INFO/RAC as the administrator of InfoMAP Node.
- **Stakeholders**: stakeholders are a group of or single users that need (for different reasons) to access MAP data. I

Inside a group of users referring to the same CP there could be different access levels after the competence of the user.

Flow peculiarity: InfoMAPNode

Workflows and products in InfoMAPNode



Flow peculiarity: InfoMAPNode

Metadata compilation

Metadata compilation could be pursued in InfoMAPNode both via a form to be filled in and a guided procedure evidencing required and optional parameters required for an adequate level of metadatation (compliant with ISO 19155 standard) are:

- Dataset title
- Abstract (dataset description)
- Category
- Eventual group
- Free-text keywords
- Language
- License
- Attribution
- Regions
- Data quality statement
- Restrictions
- Other constraints

Flow peculiarity: InfoMAPNode

Data sharing practices and restriction

Five levels of action are foreseen for different users:

- None: the dataset is not visible to the specific user.
- View: the user can view the dataset.
- Download: the user can view and download the dataset.
- Edit: the user can view, download and edit an existing dataset.
- Manage: the user can view, download, edit and manage (upload and delete) a dataset.

Thanks for the attention!

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Questions

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