DATA BUOY COOPERATION PANEL (DBCP)

FORMAT FOR NATIONAL REPORTS ON CURRENT AND PLANNED BUOY PROGRAMMES

Country	Portugal
Year	2022

Please Identify your Programme's Major Opportunities and Challenges/Risks during the upcoming year and how DBCP can most effectively assist your Programme.

1. CURRENT PROGRAMME:

Please Identify your Programme's Major Opportunities and Challenges/Risks during the upcoming year and how DBCP may assist your Programme.

Agency or programme	National Network - Moored Buoys	
Number and type of buoys	(a) deployed during the year	Annual maintenance to 13 Moored Buoys;
	(b) operational as of 31 August	13 Moored Buoys: - 5 Fugro Oceanor; - 8 Datawell;
	(c) reporting on GTS as of 31 August	9 Moored Buoys: - 5 Fugro Oceanor; - 4 Datawell;
Purpose of programme	(a) operational	[X]
(check/uncheck boxes using	(b) met / ocean research	[X]
[_] or [x] as appropriate)	(c) developmental	[X]
Main deployment areas	North Atlantic	
Vandalism incidents	(a) Number of incidents: 0	

Agency or programme	Instituto Hidrográfico – Drifters	
Number and type of buoys	(a) deployed during the year	- 25 SVP-B for E-SURFMAR;
	(b) operational as of 31 August	33
	(c) reporting on GTS as of 31 August	33
Purpose of programme	(a) operational	[X]
(check/uncheck boxes using	(b) met / ocean research	[]
[_] or [x] as appropriate)	(c) developmental	[]
Main deployment areas	North Atlantic	
Vandalism incidents	(a) Number of incidents: 0	

2. PLANNED PROGRAMMES:

Agency or programme National Network - Moored Buoys		
Number and type of buoys	planned for deployment in the next 12 months	Annual maintenance to 15 moored buoys:
Purpose of programme	(a) operational	[X]
(check/uncheck boxes using	(b) met / ocean research	[X]
[_] or [x] as appropriate)	(c) developmental	[X]
Main deployment areas	North Atlantic	

Agency or programme	Instituto Hidrográfico - Drifters	
Number and type of buoys	planned for deployment in the next 12	25 SVP-B for
	months	E-SURFMAR
Purpose of programme	(a) operational	[X]
(check/uncheck boxes using	(b) met / ocean research	[]
[_] or [x] as appropriate)	(c) developmental	[]
Main deployment areas	North Atlantic	

3. TECHNICAL DEVELOPMENTS:

(a) Buoy design	•	Moored buoy: Fugro Oceanor Wavescan and Datawell Directional Waverider;
(b) Instrumentation	•	Buoys equipped with wave sense, meteorological and sea surface temperature sensors, ADCP (currents), Ocean Sound (Hydrophones)

4. PUBLICATIONS (on programme plans, technical developments, QC reports, etc.):

Ref	Title	Type¹
1	Satellite-derived sea surface salinity for the Portuguese coast – evaluation of SMOS BEC L4 product B. Biguino, E. Olmedo, A. Ferreira, N. Zacarias, L. Lamas, L. Favareto, C. Palma, C. Borges, A. Teles-Machado, J. Dias, P. Castellanos, A. C. Brito	7
2	On the importance of sustained glider observations to study the ocean dynamics L. Lamas, I. Martins, J. Vitorino, C. Barrera	2
3	Towards a validation service of Sentinel-3 data using in-situ data collected by the MONIZEE system L. Lamas, I. Martins, R. Esteves, P. Nunes	7
4	Water column suspended sediment concentrations in the Western and Southern Portuguese shelf under winter conditions R. Santos, A. Oliveira, A. I. Santos, N. Zacarias, A. Mateus	6

¹: Types of publications: (1) Implementation, (2) Operations, (3) Instrumentation, (4) Quality Management, (5) Data Management, (6) Data collection and/or location, (7) Data use, (8) Other

5	Aquaculture planning – determination of biological and physico-	7
	offshore aquaculture M. Mosqueira, A. Pombo, C. Borges, N. Zacarias R. Esteves A. Brito, C. Palma	
	Zacalias, R. Esleves, A. Dillo, C. Failla	

5. ADDITIONAL COMMENTS:

(a) Quality of buoy data	 Real time quality control, recommendation for in-situ data from EuroGOOs; Data in delay mode is validated by Instituto Hidrográfico;
(b) Communications	 Datawell buoy: VHF Fugro Oceanor Wavescan: IRIDIUM
(c) Buoy lifetimes	
(d) Data Accessibility ²	 GTS Instituto Hidrográfico: <u>http://www.hidrografico.pt/;</u> <u>https://geomar.hidrografico.pt/;</u> Azores University: <u>http://www.climaat.angra.uac.pt/;</u> Madeira Harbour: <u>http://www.apram.pt/;</u> EMODNET: <u>http://www.emodnet-physics.eu</u> COPERNICUS: <u>http://www.marineinsitu.eu/dashboard/</u>
(e) New Observations ³	 Expand the Ocean noise observation; install long range current profiler; install YSI-EXOII Coastal Surface Water Quality parameters sonde
(f) GFCS and WIGOS ⁴	•
(g) Additional Requirements ⁵	•
(h) DBCP Linkages ⁶	•
(i) Contribution to UN Decade and UN SDGs ⁷	The monitoring programs and collected observations that were reported above clearly contribute to the mission and specific objectives of the UN Decade, specifically by maintaining a permanent capacity to monitor the Portuguese ocean areas (with particular emphasis to the coastal ocean) – thus, contributing to Increase understanding of present and future ocean states and expand global observations (UN Decade Objective 2) – by articulating with other European partners and international community in the development and implementation of new methodologies and new technologies to better observe, understand and predict the conditions in those areas (ex. JERICO-RI, JONAS,) – and by this means contributing to an increased understanding to assess and predict the interactions between all components of the ocean (UN Decade Objective 3).

² How does the international community access the ocean observing data provided by your Organization

³ What new ocean observations does your Organization plan to make in the upcoming year (i.e. new parameters, expanding geographic scope, filling spatial or latency gaps)?

⁴ How do your Organization's observations contribute to the WMO's Integrated Global Observing System (WIGOS) and/or Global Framework for Climate Services (GFCS)?

⁵ What additional requirements (other than climate) does your organization have that are currently not adequately addressed by the DBCP?

⁶ How would your organization benefit from DBCP's closer linkages to the Global Ocean Observing System(GOOS), Data Management and Modelling Communities?

⁷How do your ocean observing networks contributing to the UN decade on Ocean Science and UN Sustainable Development Gloas .

	They also clearly contribute to the objectives of the Sustainable Development Goals 13 (Climate Actions) and 14 (Life Below Water), providing unique and invaluable information about the evolution of conditions on the marine waters and interface sea- atmosphere which is key to develop scientific understanding on long term variability and climate change processes, to assess impacts of those processes and to validate model predictions and success of mitigation measures.
(j) Other (i.e. Impact of COVID19 on observing systems and mitigation efforts)	• • •

<u>Note</u>: It is recommended that this form is filled in electronically and returned also electronically to the Secretariat. A template of the form can be downloaded from the following SharePoint site: <u>https://wmoomm.sharepoint.com/:w:/s/wmocpdb/EQ1z8KndbxREkzE6RH4NFkkBDdvOItne740</u> <u>P8f4voMMSbg?e=pgru6r</u>