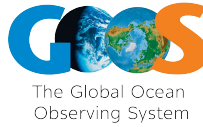


OCG-13 MEETING  
MAY 2022




**OCG**

# **The GOOS Observations Coordination Group**

*David Legler (OCG Chair) and the OCG Executive Committee*

# OCG-13 ETIQUETTE

- Keep your microphone muted unless you are speaking. Please try to use video, unless it presents a problem for bandwidth, so join with your camera on.
  - If you have a question or comment, please use the chat box to type your question/comment or indicate by raising your hand in order to be called upon by the moderator.
  - Please be succinct in both your questions and answers.
  - At the end of each item, please expect to be called upon to ensure all OCG members have had the chance to comment.
  - The sessions will be recorded for the purpose of writing the report, and the recordings deleted afterwards.
  - Could those attendees who are joining as observers please edit their names and note OBS\_ in front of their name, to aid the session moderators.
- 

# OCG-13 FOrMAT

- Tuesday May 31st & - Thursday June 2nd - **18 - 21 pm UTC**
- Wednesday June 1st & Friday June 3rd - **12 - 15 pm UTC**
- [Annotated Agenda](#) at the bottom of the timetable outlines questions and intended outcomes for each session
- Agenda topic, presenter and materials are linked in the Agenda and on the [OCG-13 website](#)
- [OCG-13 Major Actions](#) will be recorded and reviewed daily
- OCG-13 Workshops concluded prior to the OCG-13 meeting
  - Data and metadata
  - Boundary Currents
  - Ocean Observation in the Indian ocean



# WELCOME

- A year of challenges, ingenuity, determination (and a few new worries)
- Observations Coordination Group/GOOS continues its central role in developing an efficient, coordinated, and useful ocean observing system
- Recognition of OCG as a central pillar of GOOS and significant strategic importance
- Authoritative and public GOOS voice with the Report card strengthens, plus public 'news' items are often linked to "OCG" and networks
- UN Decade opening up new connections and opportunities

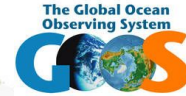


# HIGHLIGHTS 2021-2022



Ocean Observing Co-Design

by The Global Ocean Observing System



- New EEZ Report now published - [link](#)
- We now have searchable '[GOOS endorsed](#)' best practices
- Progress on metadata standards, data mapping, and data flow (Thurs)
- [WMO Data Policy](#) addresses (encourages) more exchange of ocean data
- GOOS request to be considered in WMO GBON (approved by GOOS SC)
- Report Card 2022 - moving cross GOOS (OCG/OceanOPS leading)
- GOOS [Webinar](#) Series initiated
- Increased WMO support for OceanOPS!
- GOOS/MTS (OCG!) Industry dialogues to begin this year (Thurs)
- Boundary Currents (and others) as Co-Design Exemplars



# NEW MEMBER - JULIA

Dr. YU Ting (Julia)

- Chinese secondment for 2 years! Julia will support the GOOS Office and OCG in particular



Dr. Yu Ting (Julia) has joined the IOC/OOS as an Associate Programme Specialist. With a PhD in Physical Oceanography, Dr. YU has extensive experience in marine data and information related projects, mostly in the China and Northwest Pacific Ocean. She is an Associate Researcher at National Marine Data and Information Service (NMDIS) of China, engaging in the study on small scale air-sea interaction, data processing and quality control of ocean data. Furthermore, she has been involved in the international data exchange and management at NMDIS, serving as the focal point of many international/regional nodes, such as the member of NEAR-GOOS Coordinating Committee, Data Manager of ODINWESTPAC, and Teaching Assistant at OTGA RTC/Tianjin. She also once served as the DBCP Vice-Chair (Asia, 2015-2021).

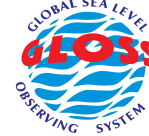
# WELCOME JULIA!

# THE ROLE OF OCG

The Observation Coordination Group (OCG) works to **efficiently operate, maintain, coordinate** and **integrate** a comprehensive *in-situ* global ocean observing system

OCG targets 8 foci for action across the 12 OCG Networks:

1. Requirements
2. Observing Advances
3. Standards and Best Practices
4. Data Management
5. OceanOPS
6. Metrics
7. Environmental Stewardship
8. Capacity Development

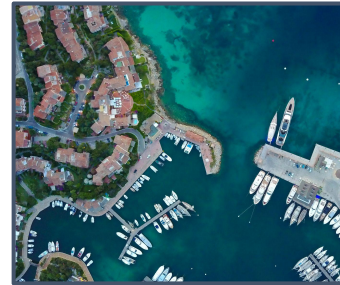


Ocean Gliders



# AIMS OF OCG-13

- Reviewing **intersessional work, highlights** and **next steps** in our 8 foci and network updates and OceanOPS and the 2022 Report Card!
- **Key sessions:**
  - How we work with requirement setting; WMO Rolling Review of Requirements, OOPC, BGC Panel, etc.
  - New networks (horizon scan...are there new communities OCG should be engaging?)
  - Data and Metadata Implementation Strategy
  - OCG, network and GOOS development within the UN Ocean Decade
  - Priorities for developing system-wide capabilities across OCG networks





# Some highlights of intersessional work

# ROUNDTABLES

- EEZ experts meeting report
  - Multi-agency workshop on how networks can carry out systematic ocean observations within UNCLOS in the Exclusive Economic Zones
  - **Outcome:** [EEZ report](#) published, IOC Exec Council in 2 weeks - intersessional work proposed
- WMO Data Policy and GBON
  - AIM: Increase systematic increase in observational data and data products
  - **Outcome:** [WMO Data Policy Resolution](#)
- OCG communications
  - Enhance external/internal communication to raise visibility of our work
  - **Outcome:** Development of OCG Logo (*in progress*) | OCG slide deck (*in progress*) | OCG website updates (*in progress*)
- Cross-network initiative
  - Conversation on coordinated network sensor interaction with vendors
  - **Outcome:** challenges remain,



# GOOS SC AND OCG STRATEGIC DIRECTIONS

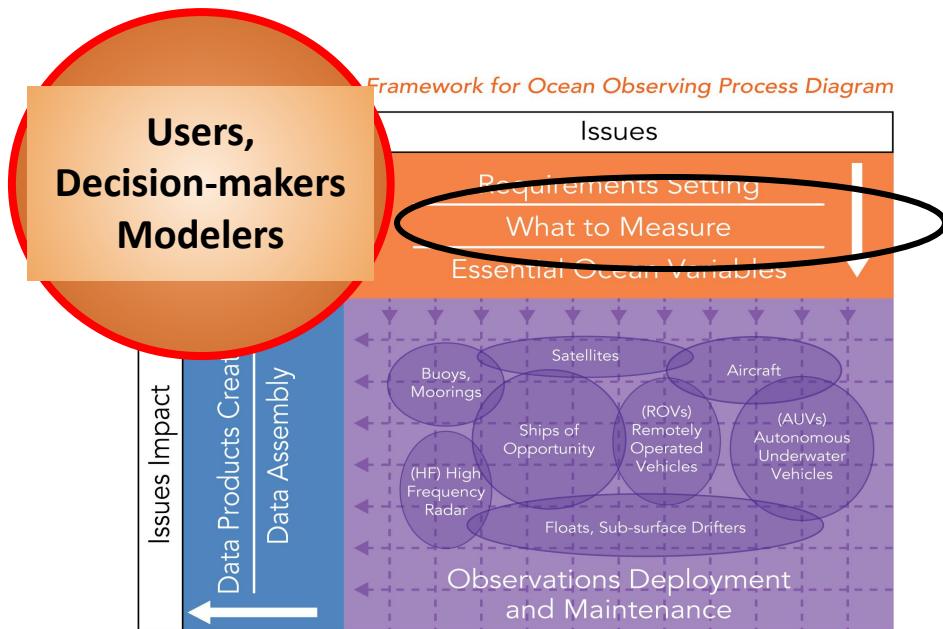
- Engagement with WMO
  - Request from OCG for select networks to become part of GBON
  - Wide swath of engagement/intersections: requirements, data and metadata systems, regulatory materials, etc
  - How does OCG effectively interact with Infrastructure Commission and the SG-00IS
- UN Decade
  - Lots of energy and opportunity
  - Possible Decade Coordination Office within GOOS
- GOOS governance and more
  - Governance Process Task Team: what parts of GOOS should be “governed”?
  - Formation of a cross-GOOS Data Team
  - Development of a GOOS Communication Plan
  - Valuation of ocean observing/engage philanthropic funding



# Some discussion points for the session

# REQUIREMENTS

Framework for Ocean Observing Process Diagram



- GOOS Panels determine requirements for EOVs.
- In practice, OCG observing networks use a variety of “requirements” and needs to guide their implementation.
- **OCG-13 Aims**
  - Discussion on how networks use *requirements*.
  - Identify the requirement “processes” in current use
  - Discuss approaches to increase cross-network use of EOV requirements











# ATTRIBUTES FOR THE NEW NETWORK

## New Networks:

- Smart Cables
- Uncrewed Surface Vehicles (OASIS)
- Ship based time series
- Integrated Marine Debris Observing System (IMDOS)

## OCG-13 Aims

- Update OCG Emerging Networks status.
- Identify candidate Emerging Networks
- Discuss improvements to the OCG Network selection process (e.g. need more formalization?)

OCG Network Attributes	
	Global in scale
	Observes one or more EOVs or ECVs
	Observations are sustained
	Community of Practice
	Maintains network mission and targets
	Delivers data that are free, open, and available in a timely manner
	Ensures metadata quality and delivery
	Develops and follows Standards and Best Practices
	Undertakes capacity development and technology transfer
	Environmental stewardship awareness

# DATA AND METADATA

## Mapping the Network Data flows

- Completed initial data flow maps
- Soon to be available through GOOS OCG pages

## OCG Data Recommendations and Implementation Strategy

- Developed recommendations based upon data mappings
- Recommendations will be the basis of the OCG data implementation strategy (in development)

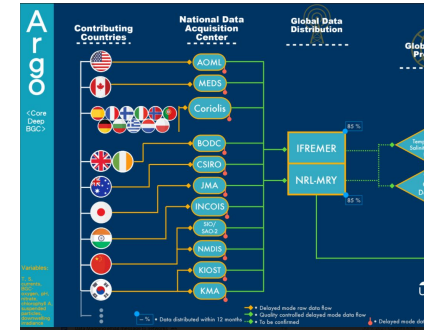
## OCG Data active across global community, including:

- Interactions with IODE on data exchange policy, ODIS steering group
- Involved with UN Decade Data Coordination Group
- Active in WMO WIS 2.0 data exchange experiments

## OCG-13 AIMS

- Next steps in the process?
- Intended outcomes of an OCG data implementation strategy?

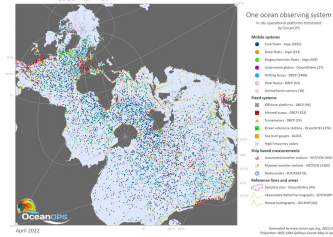
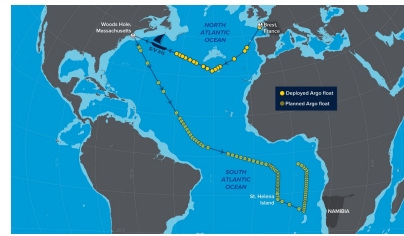
**Goal:** Identify gaps and areas of needed enhancement to move OCG data and metadata services towards high level FAIR compliance.



Network	Data Team	Real Time Data exchange	Uniform Metadata Content (Compliance with OceanOPS requirements)	Metadata Delivery to OceanOPS requirements)	Has Global Repository (on GOOS)	FAIR
Argo	Y	Y	Y	Y	Y	Y
DCBP	Y	Y	In process	Some automatic, most manual	Y	Y
Drifters and Polar Buoys	Y	Y	In process	Some automatic, most manual	Y	Y
Moored	Y	Y	Y	Manual	N	Y
Tsunameters	Y	Y	Y	Manual	N	Y
OceanSITES - Long-term time series	Y	N/A	Y	Manual	Y	In p
ISO-SHIP	Y	Some RT data	In process	Manual	Some ODIS activities	In p
GLOSS	Y	Some RT data	Y	Manual	Y	Y
SOT	Y	Y	Y	Manual	Y	Y
VOS	Y	Most data getting ODS	In process	Manual	Y	Y
SOOP	Y	Y	In process	Manual	N	Y
ASAP	Y	Y	In process	Manual	N	Y
Emerging Networks						
ANIBOS	Y	Some ODS	Y	Manual	N	Y
HF Radar	Y	THEODOS	Y	N	Y	Y
Ocean Gliders	Y	Some ODS	Y	Some instrument metadata	N	In p



# OCEANOPS



## 2021-2025 Strategic Plan (~30% complete)

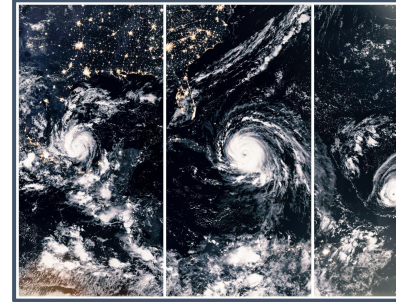
- Team restructured and stabilized ( 4 “new” hiring at WMO in the last few months ... !)
- Progress on monitoring capacity (useful during pandemics), including Report Card
- Progress on metadata with networks (SOT e.g.), including emerging (HF, AniBOS e.g.)
- Progress on API, metadata standard, WMO/WIGOS ids machine based allocation
- Progress on operations (Atlantic charter, basin coordination, MFP/IRSO R/V cruise plans)
- Launching of UN decade Odyssey project (unlock potential of private sphere and citizens)

## Challenges & Opportunities

- Resources slowly shrinking => Focus on core mission & prepare for fund raising
- Needs support from Networks (**resources, metadata, implementation targets**)
- Opportunities in Europe (triggered by Eurosea, EuroGOOS/EOOS)

# CROSS-NETWORK ACTIVITIES: GOALS OVER THE NEXT 5 YEARS?

- Review and revise engagement with GOOS Panels towards requirements setting, identifying gaps, etc. Co-Design for the future?
- Cross-network enhancement of observing capacity...? - surface carbon, oasis, boundary currents - how to work together on extending the observing system
- Manufacturer engagement (e.g. sensor problems, ongoing monitoring of sensor quality)
- Data strategy; improving data services (e.g. cloud services and access), reduced friction in data flow
- Support for the new initiatives under the Ocean Decade - Ocean Observing Co-Design, Observing Together, CoastPredict - aim to be transformative, but how engage to transform and do 'the day job...'?
- Developing better tools to help us track implementation and data use
- Supporting maturity levels in more networks



# THIS WEEK AND THE WAY AHEAD:

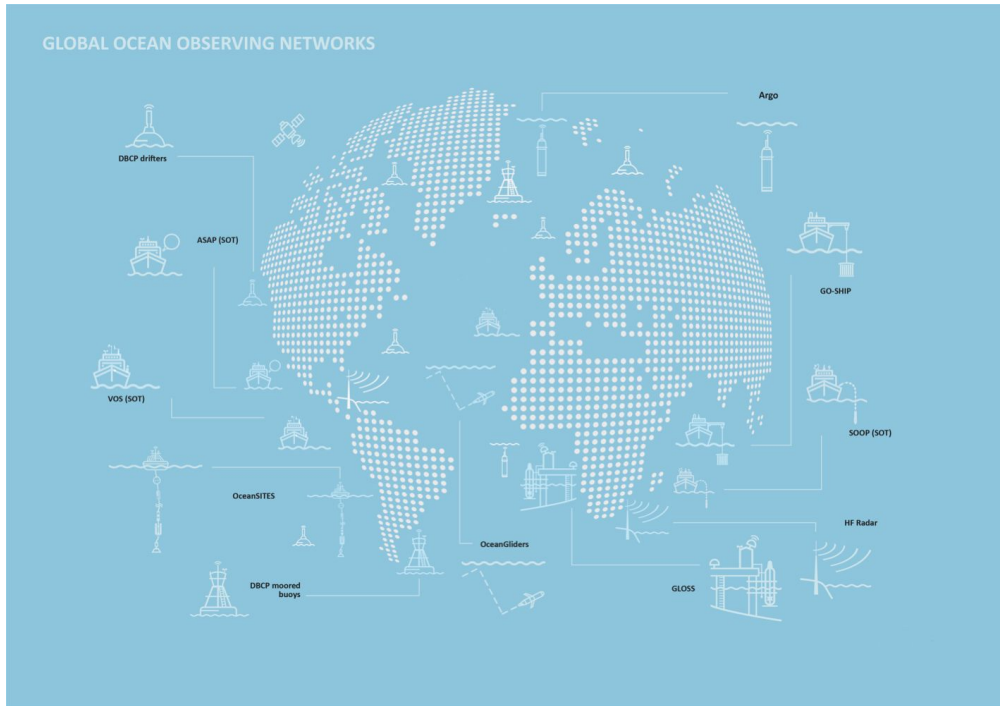
- Celebrate successes!
- Core business surrounding our foci remains critical.
- Significant opportunities for OCG and its networks!
- Clear cross network dialogue on new opportunities, and our OCG foci priorities, also in identifying barriers to implementation
- Help in communicating with/engaging with other groups in these communities
- OCG, networks and the Ocean Decade - efficiently expanding the ocean observing system
- Meeting in person in 2023?? Where? Volunteers?





The Global Ocean  
Observing System

Спасибо  
Thank you  
Gracias  
Merci  
谢谢  
شُكْرًا



WORLD  
METEOROLOGICAL  
ORGANIZATION



United Nations  
Environment Programme



International  
Science Council