Introducing Important Marine Mammal Areas – IMMAs

Unwrapping a new tool for global marine mammal and biodiversity conservation

GOBI Webinar 1: 28.10.2020. 2pm GMT

Erich Hoyt and Giuseppe Notarbartolo di Sciara

Co-chairs, IUCN Marine Mammal Protected Areas Task Force

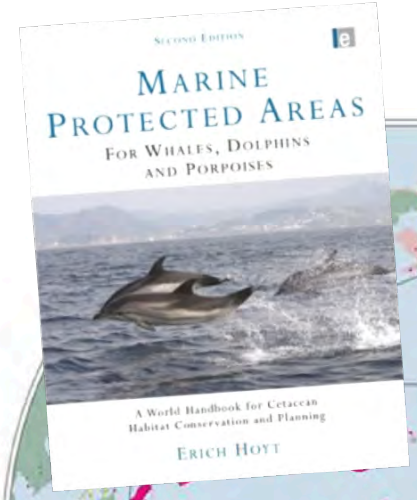
MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

A tool to support 130 marine mammal species and the biodiversity in their ecosystems

IUCN Joint SSC WCPA Marine Mammal Protected Areas Task Force

Are marine mammals adequately protected?



- 600+ (out of 17,000) MPAs have substantial marine mammal content
- no coverage for most species (e.g. beaked whales)
- ad hoc or incidental protection is rule
- political, socioeco-nomic bias
- Tiny % covered

Objectives:

- **Facilitate** collaboration in our community
- **Create** opportunities for cooperation and communication
- **Assist** in achieving MPA targets and agreements
- **Enhance** capacity with new conservation tools

IUCN Task Force co-chairs

Giuseppe Notarbartolo di Sciara

Erich Hoyt

IMMA Secretariat

Task Force Regional Coordinators

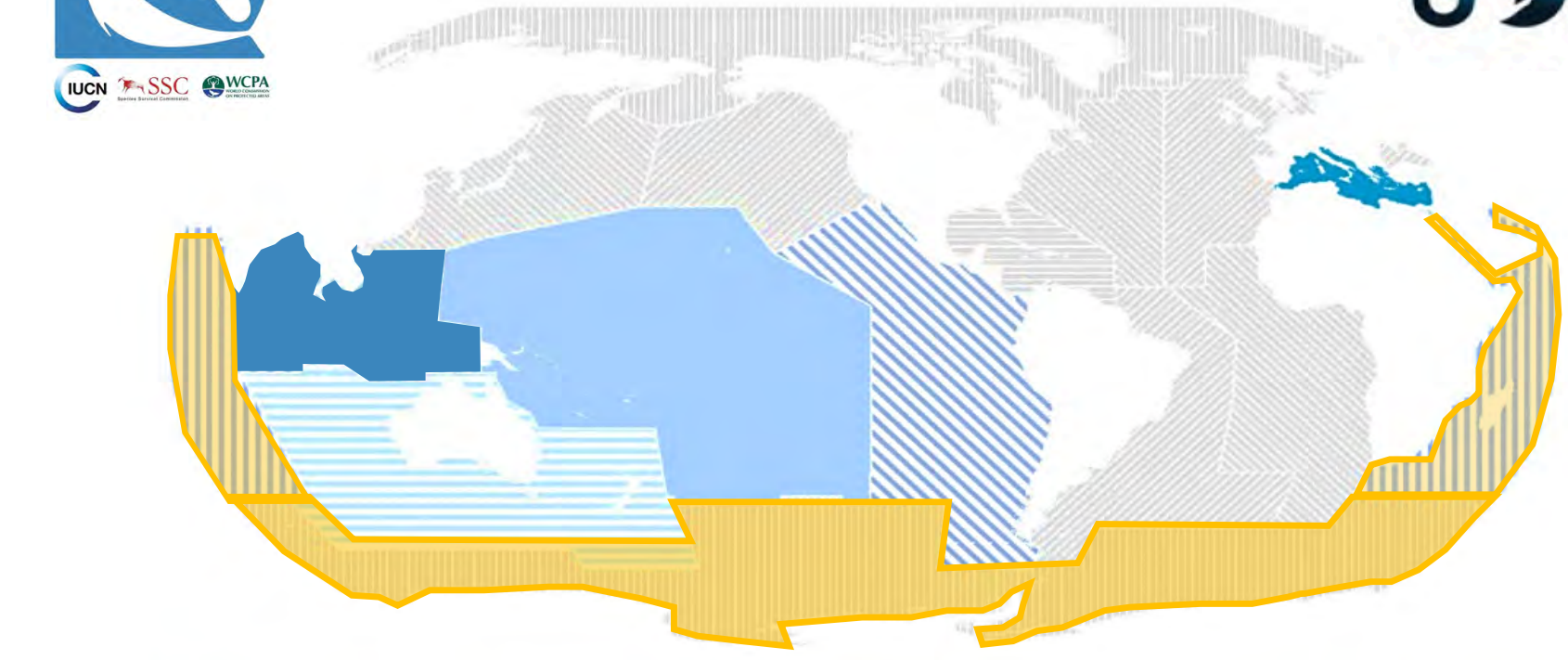
Important Marine Mammal Areas (IMMAs) are a place-based conservation tool identifying:

*"discrete portions of habitat, important for one or more marine mammal species, that have the **potential** to be delineated and managed for conservation".*

IMMAs are **NOT** Marine Protected Areas, and are **NOT** identified on the basis of management considerations.

The identification of IMMAs is an evidence-driven, purely biocentric process based on the application of scientific criteria and on the best available science.

IMMA Work Programme 2016 - 2021



- COMPLETED

- SCHEDULED

- TO BE ARRANGED*

* PRELIMINARY BOUNDARIES PROVIDED FOR SCALE OF INTENDED GLOBAL IMMA EFFORT - THE AREAS YET TO BE ARRANGED MAY CHANGE DURING THE PREPARATORY STAGES OF ANY WORKSHOP TO BE SCHEDULED AND ASSESSED.

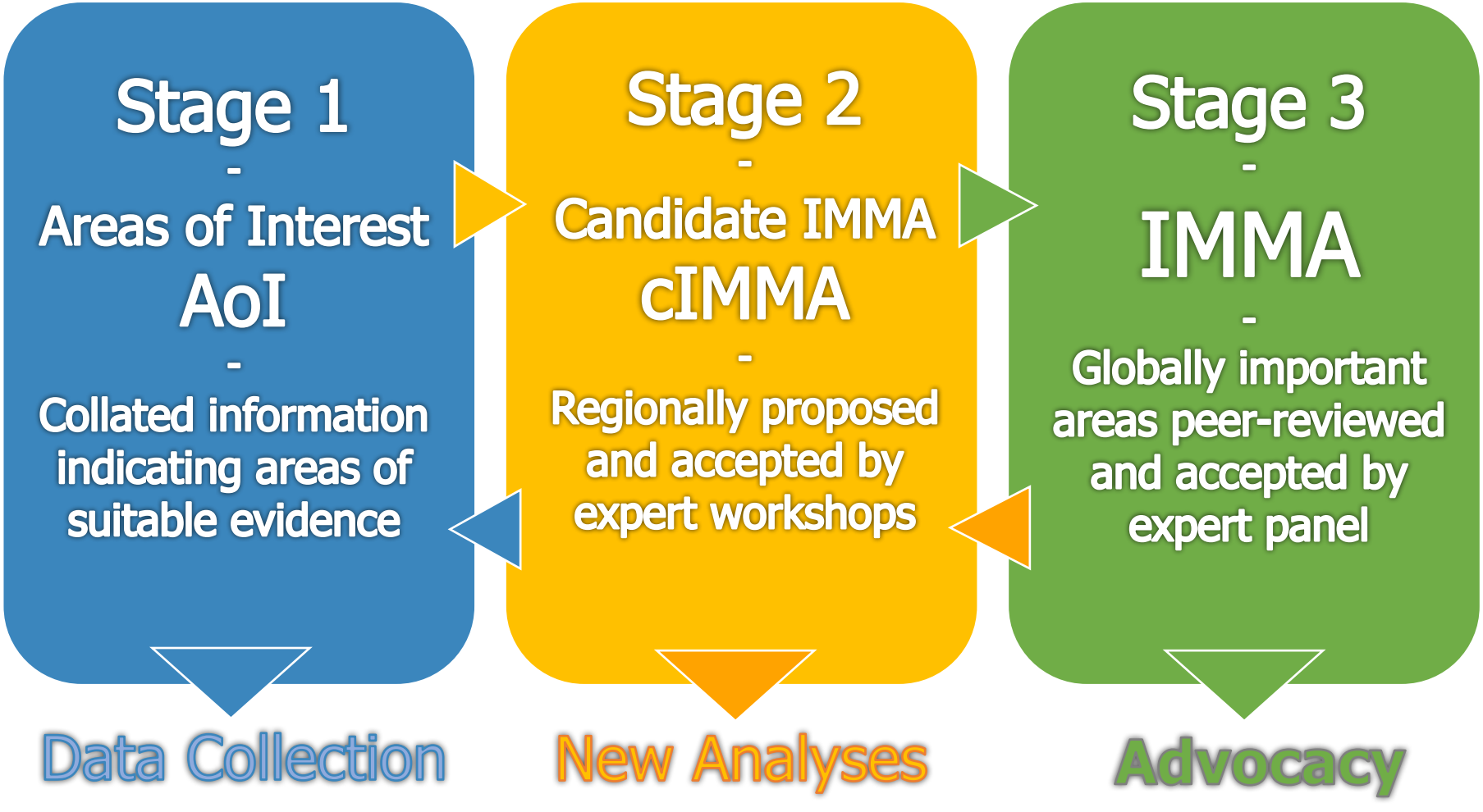
Each workshop follows a predefined process, developed in consultation with the regional marine mammal science and conservation community, to identify **candidate IMMAs (cIMMAs)** on the basis of received proposals for **Areas of Interest (AoI).**

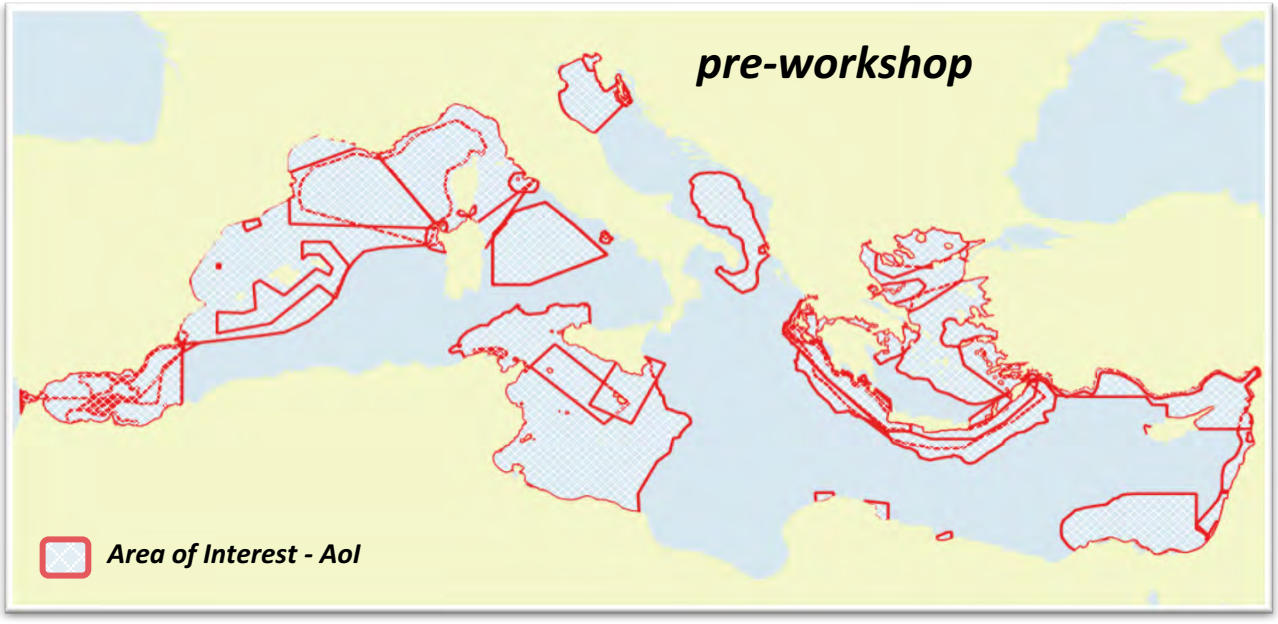
After the workshop, cIMMAs are submitted to **an independent Review Panel of experts**, to verify that the criteria were applied correctly and that cIMMAs were identified on the basis of robust scientific information.

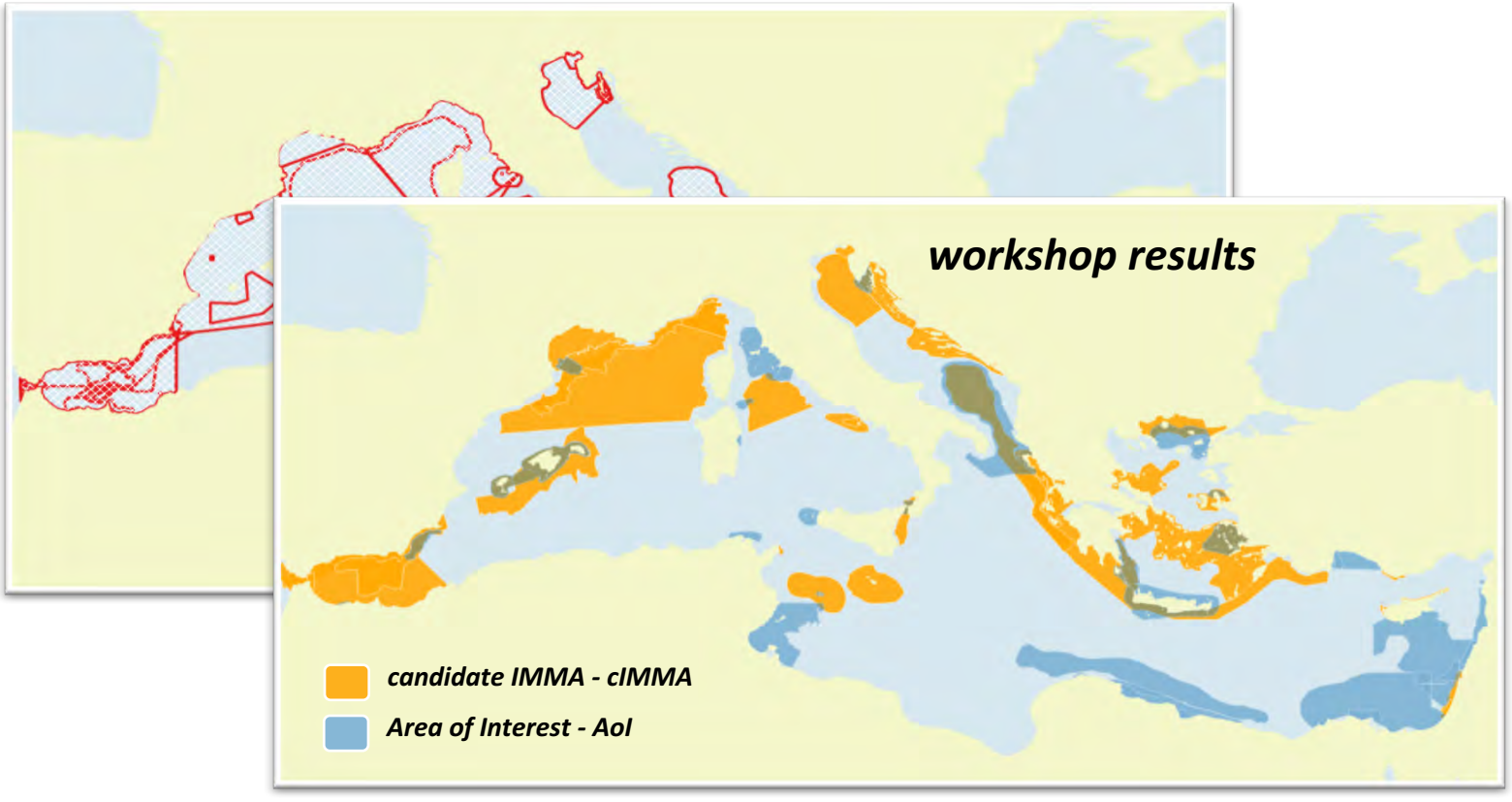
Candidate IMMAs are then converted into IMMAs and are made publicly available online via the IUCN-MMPATF website and dedicated IMMA e-Atlas:

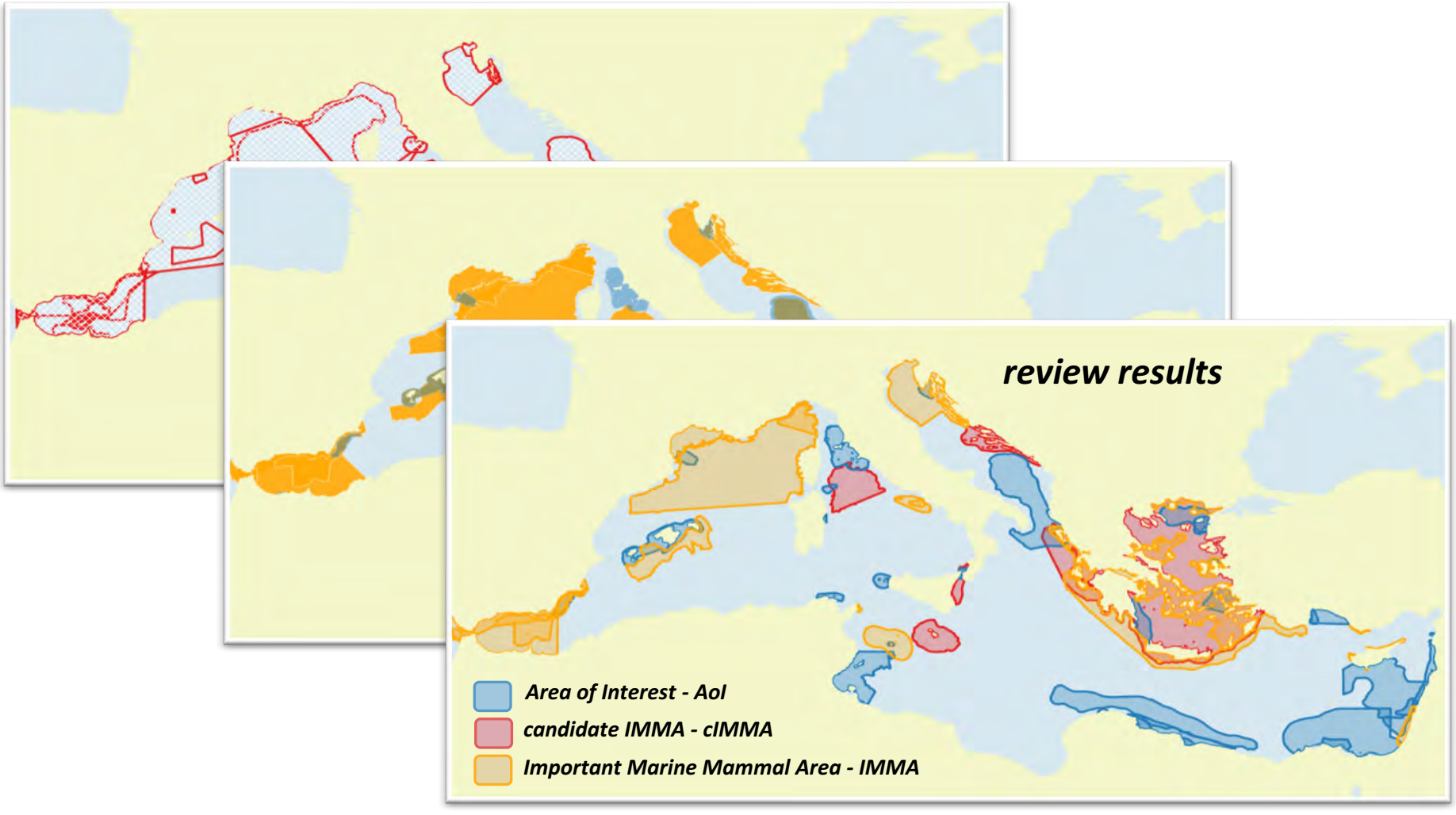
www.marinemammalhabitat.org/imma-eatlas

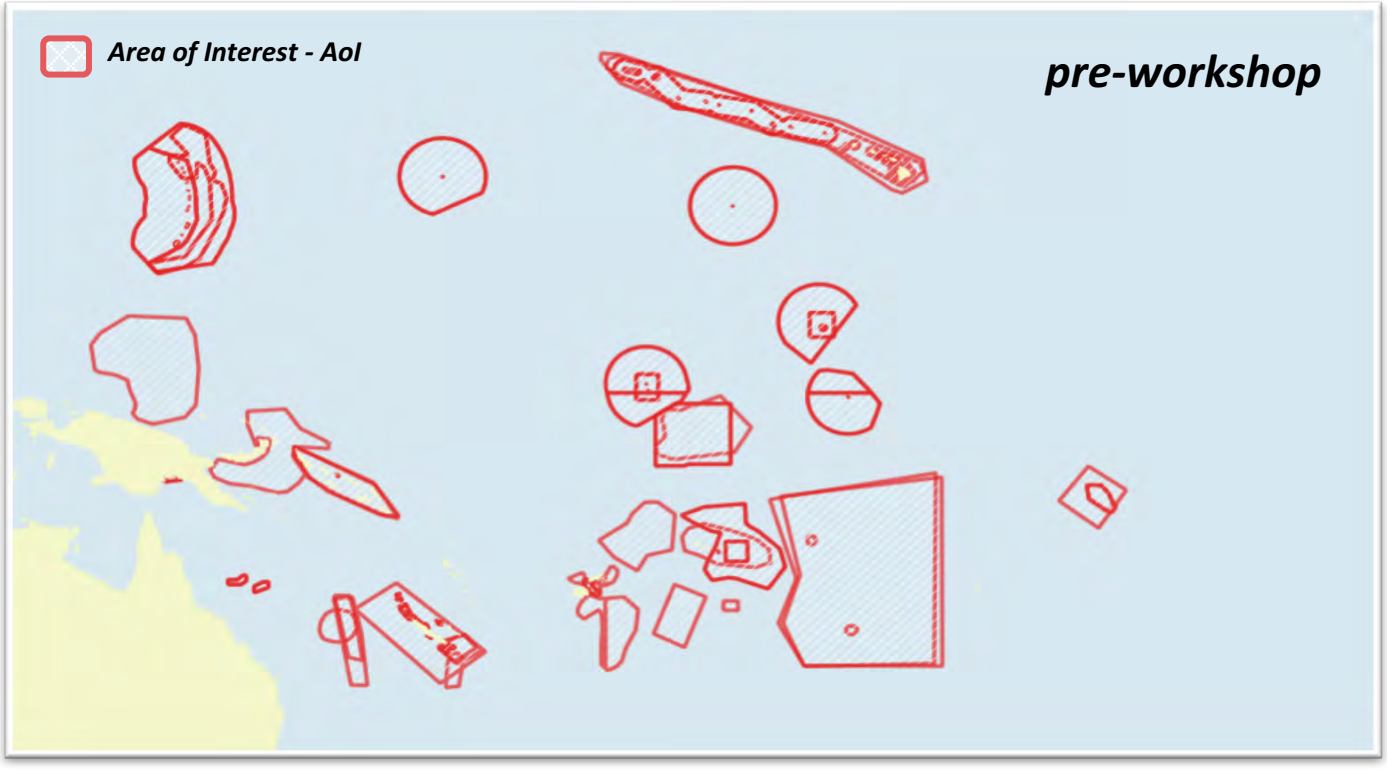
IMMA Identification Process

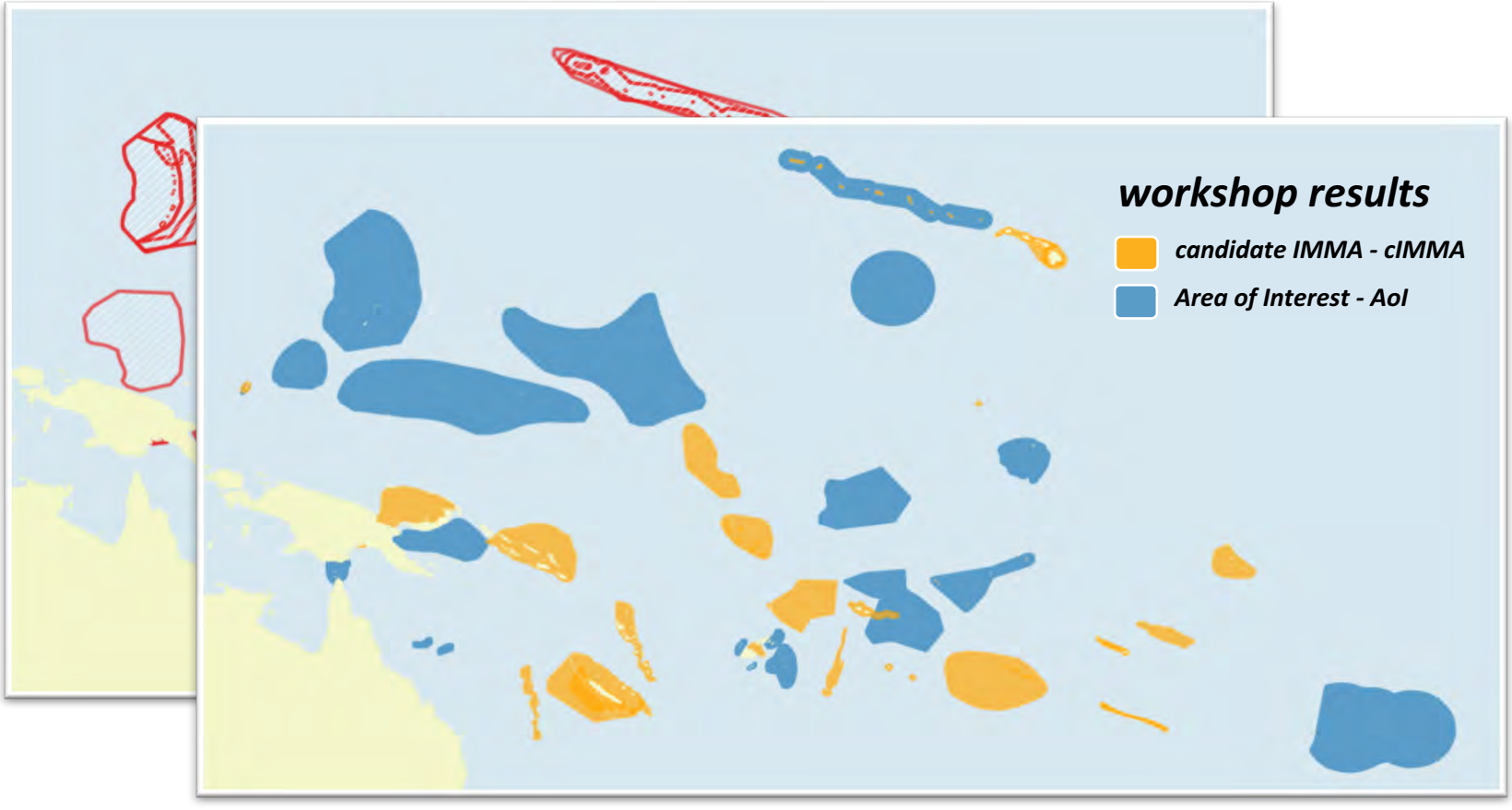


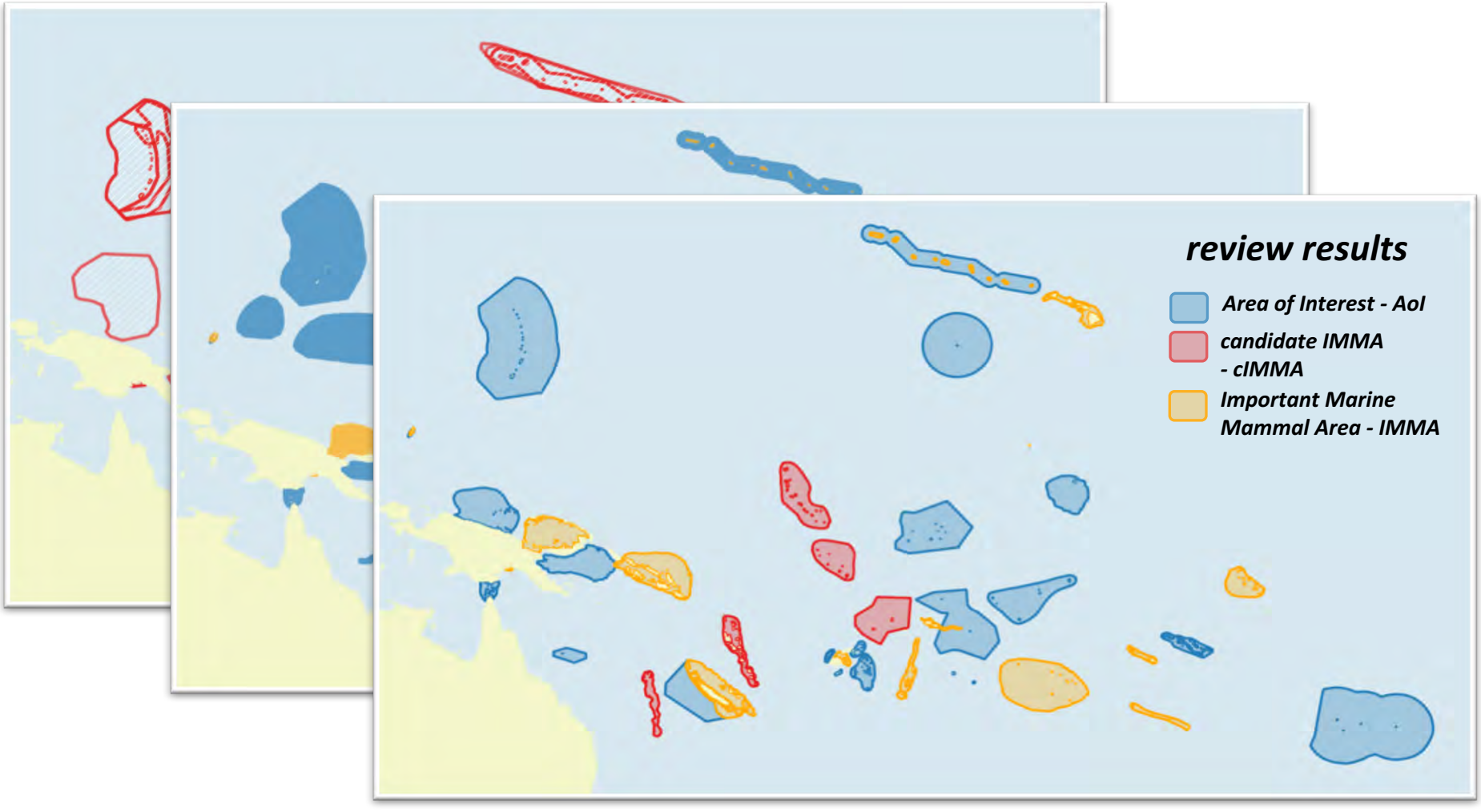

pre-workshop
Area of Interest - AoI

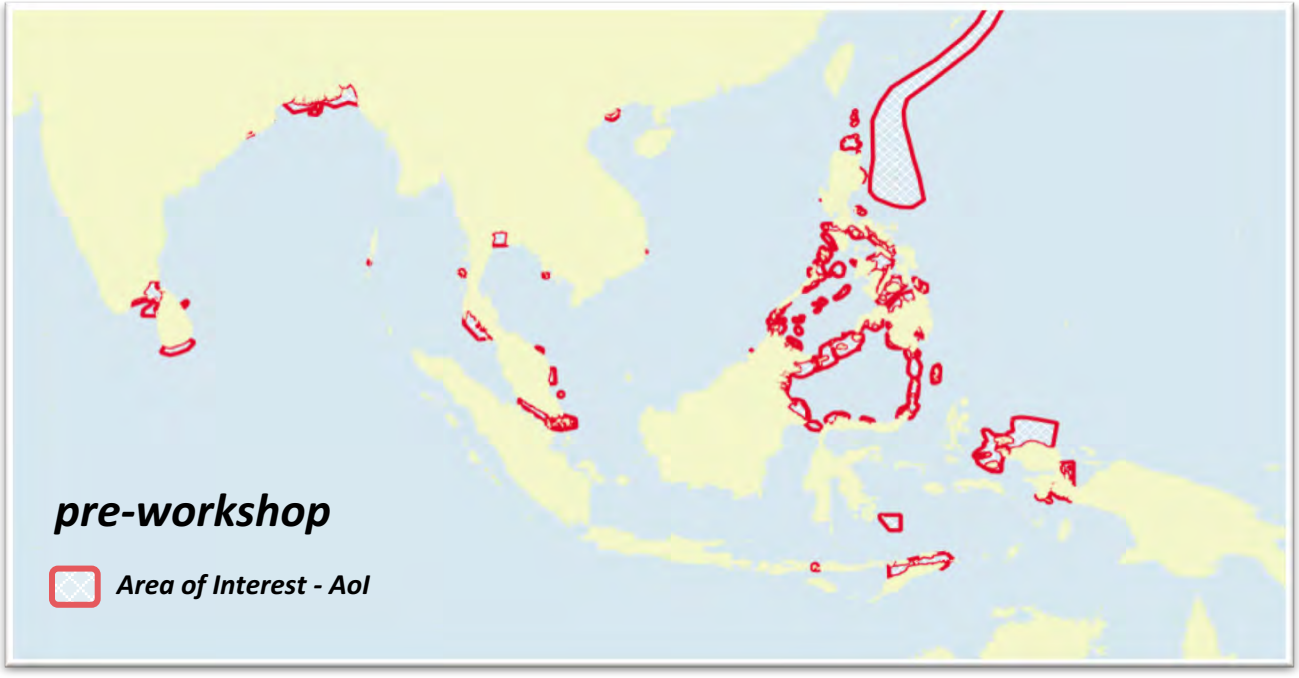

workshop results
candidate IMMA - cIMMA
Area of Interest - AoI

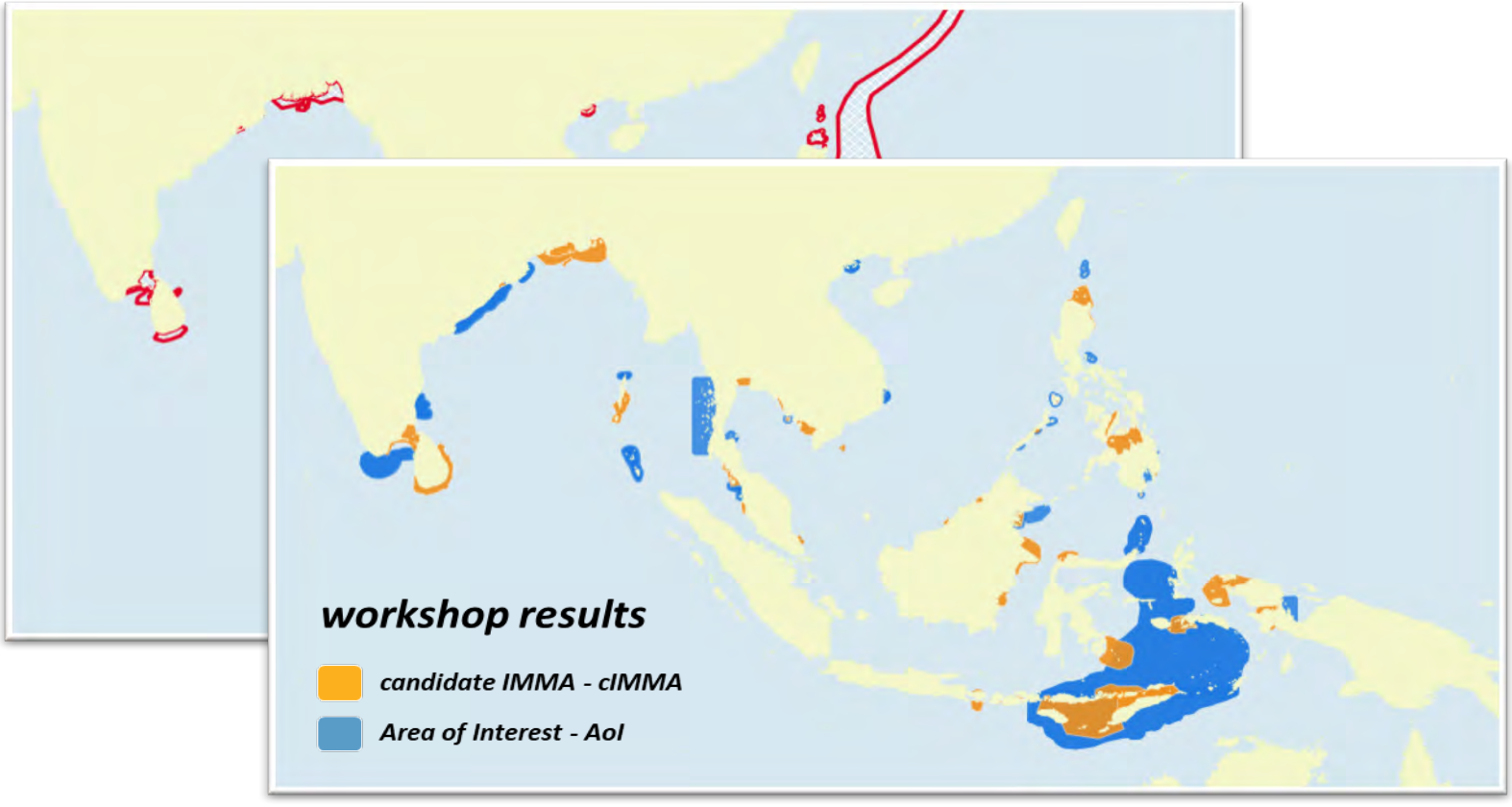

review results
Area of Interest - AoI
candidate IMMA - cIMMA
Important Marine Mammal Area - IMMA

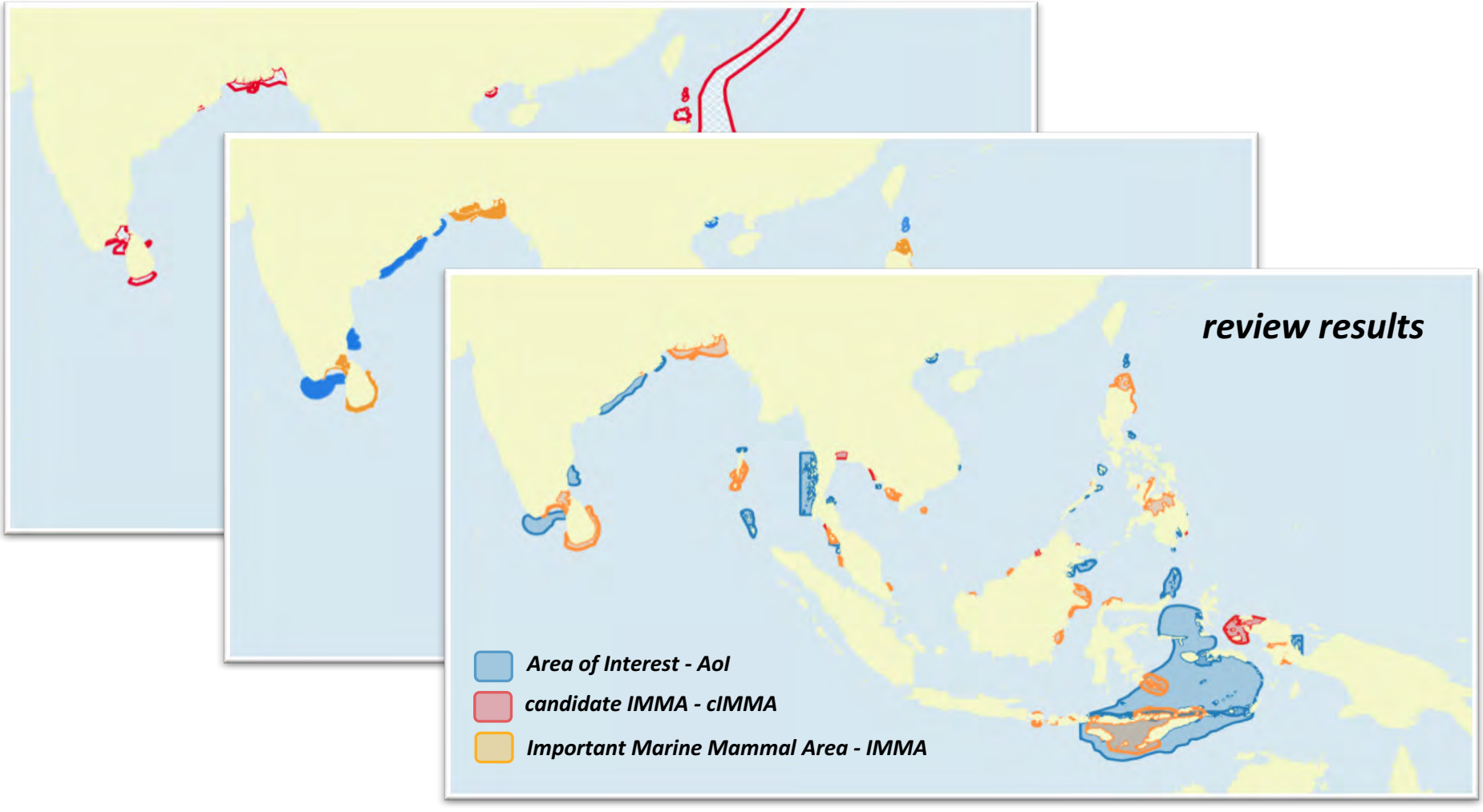

Area of Interest - AoI
pre-workshop

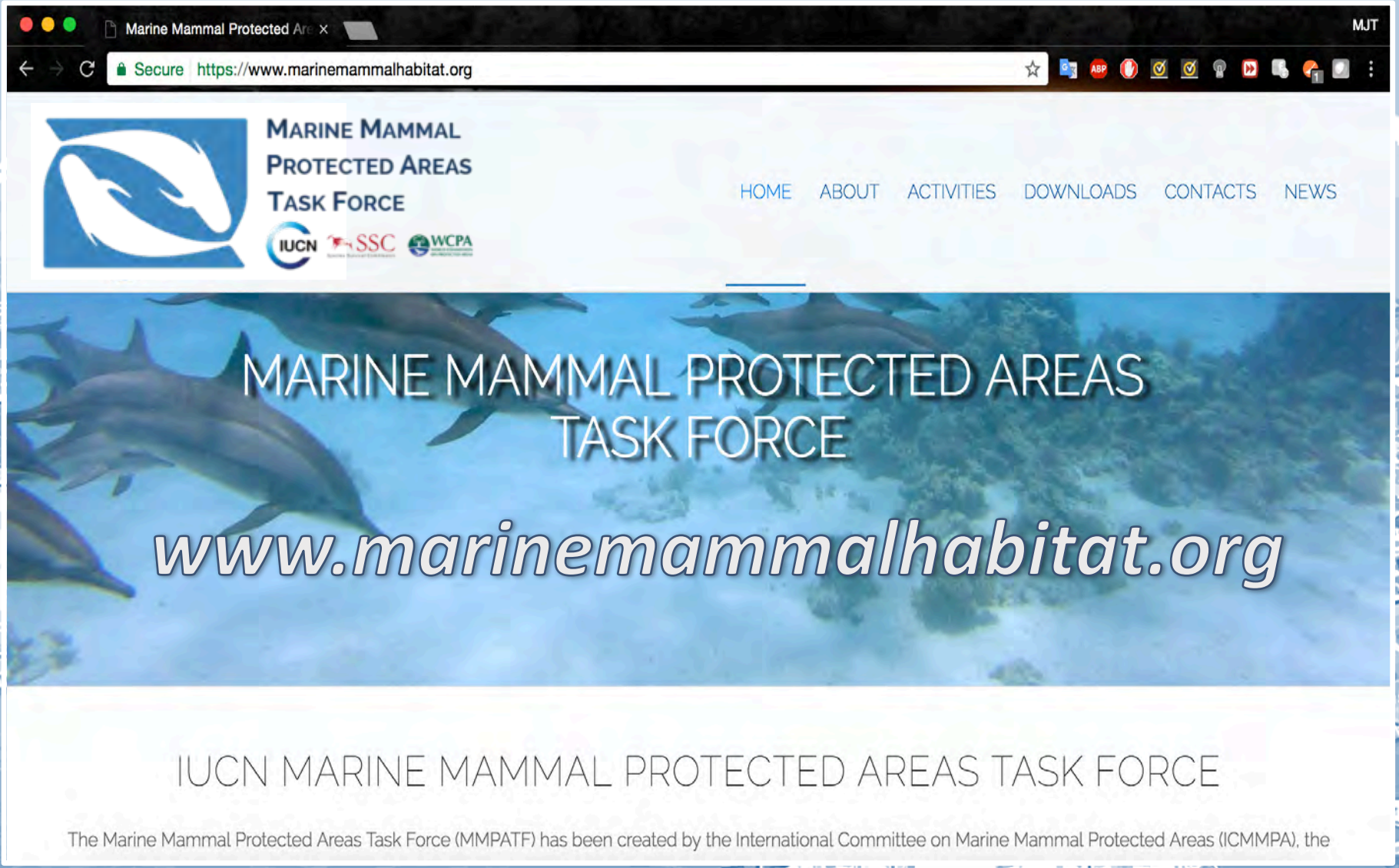

workshop results
candidate IMMA - cIMMA
Area of Interest - AoI


review results
Area of Interest - AoI
candidate IMMA
- cIMMA
Important Marine
Mammal Area - IMMA


pre-workshop
Area of Interest - AoI


workshop results
candidate IMMA - cIMMA
Area of Interest - AoI


review results
Area of Interest - AoI
candidate IMMA - cIMMA
Important Marine Mammal Area - IMMA


Marine Mammal Protected Are
MJT
Secure https://www.marinemammalhabitat.org
MARINE MAMMAL PROTECTED AREAS TASK FORCE
IUCN SSC WCPA
HOME ABOUT ACTIVITIES DOWNLOADS CONTACTS NEWS
MARINE MAMMAL PROTECTED AREAS TASK FORCE
www.marinemammalhabitat.org
IUCN MARINE MAMMAL PROTECTED AREAS TASK FORCE
The Marine Mammal Protected Areas Task Force (MMPATF) has been created by the International Committee on Marine Mammal Protected Areas (ICMMPA), the

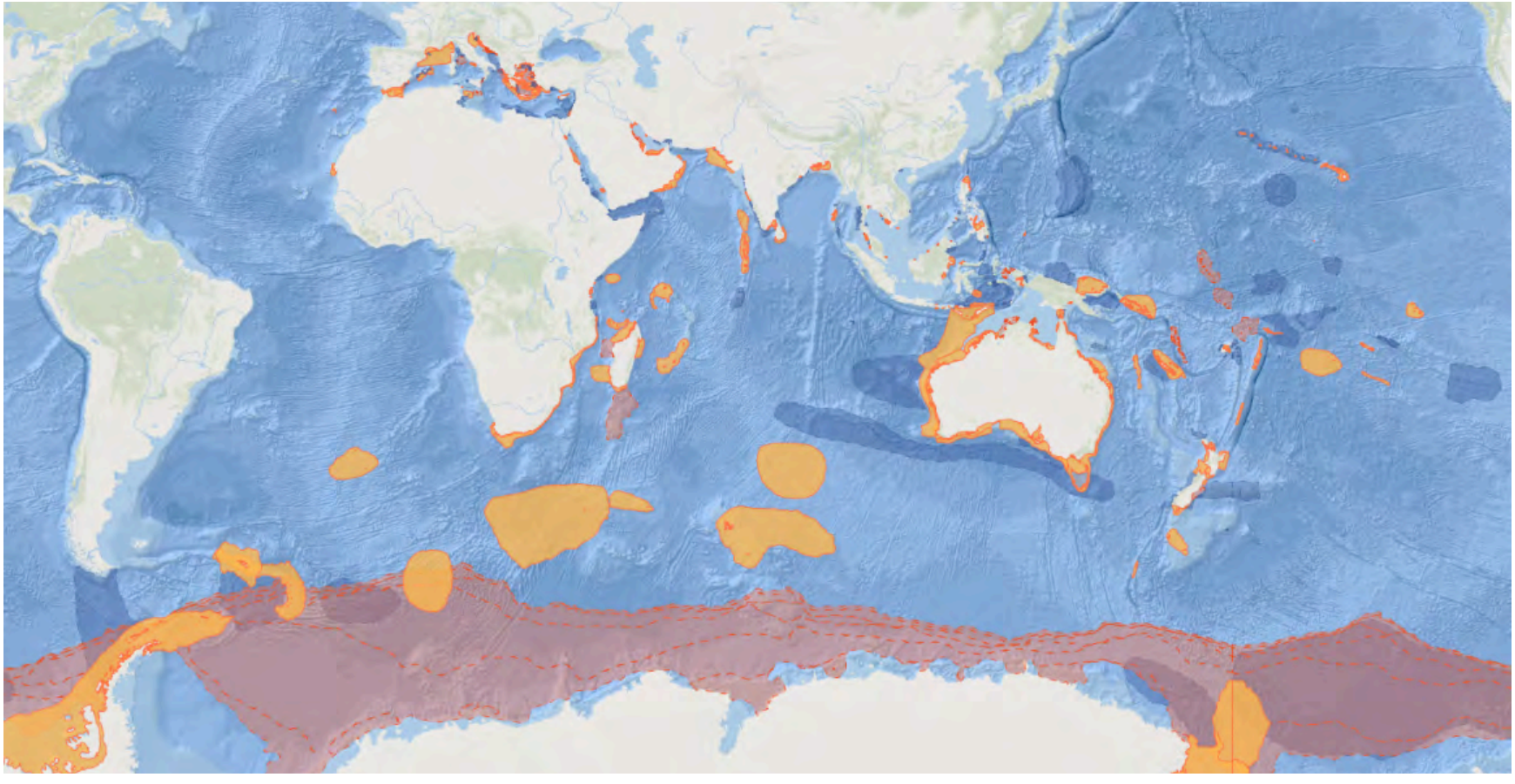
MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

October 2020 Update
159 IMMAs Identified

IMMA e-Atlas

IMMAs cIMMAs AOI



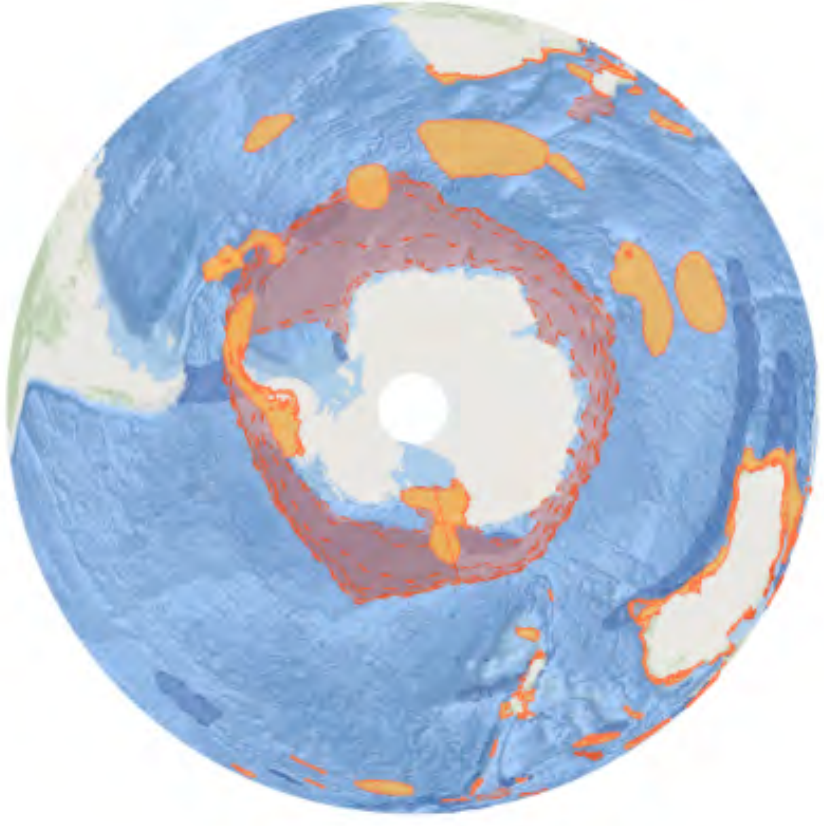
MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

October 2020 Update
159 IMMAs Identified

IMMA e-Atlas

IMMAs cIMMAs AOI



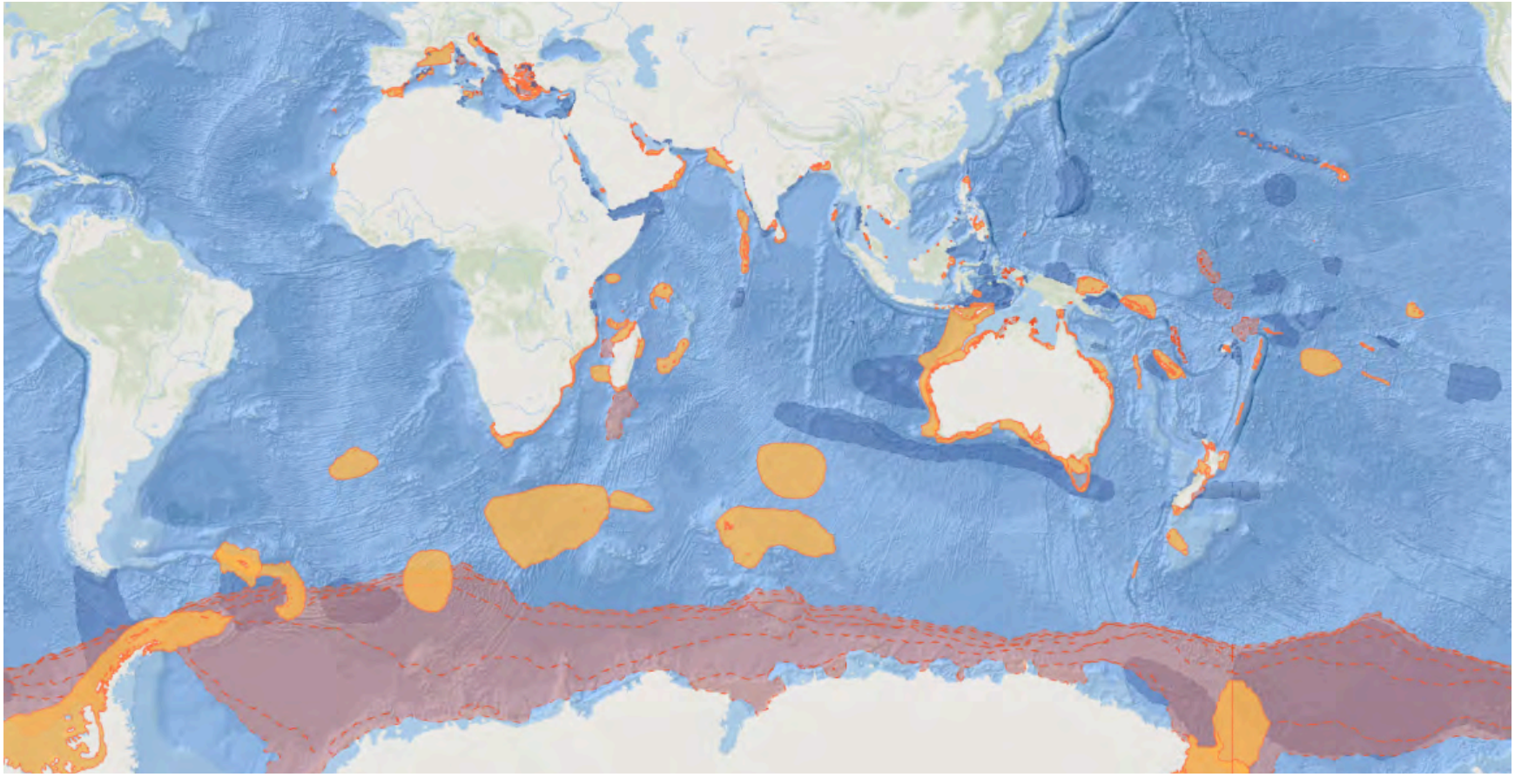
MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

October 2020 Update
159 IMMAs Identified

IMMA e-Atlas

IMMAs cIMMAs AOI



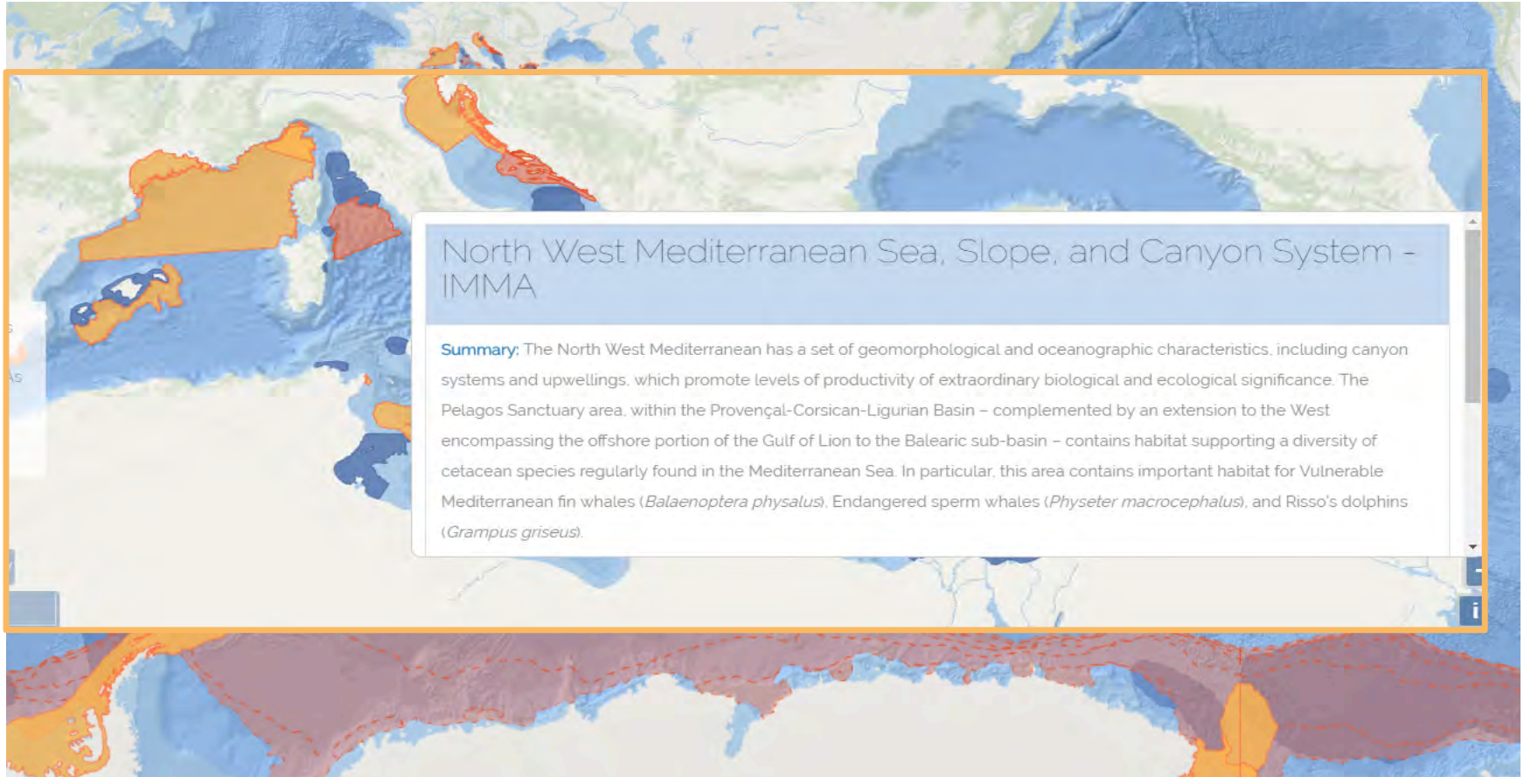
MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

October 2020 Update
159 IMMAs Identified

IMMA e-Atlas

IMMAs cIMMAs AOI



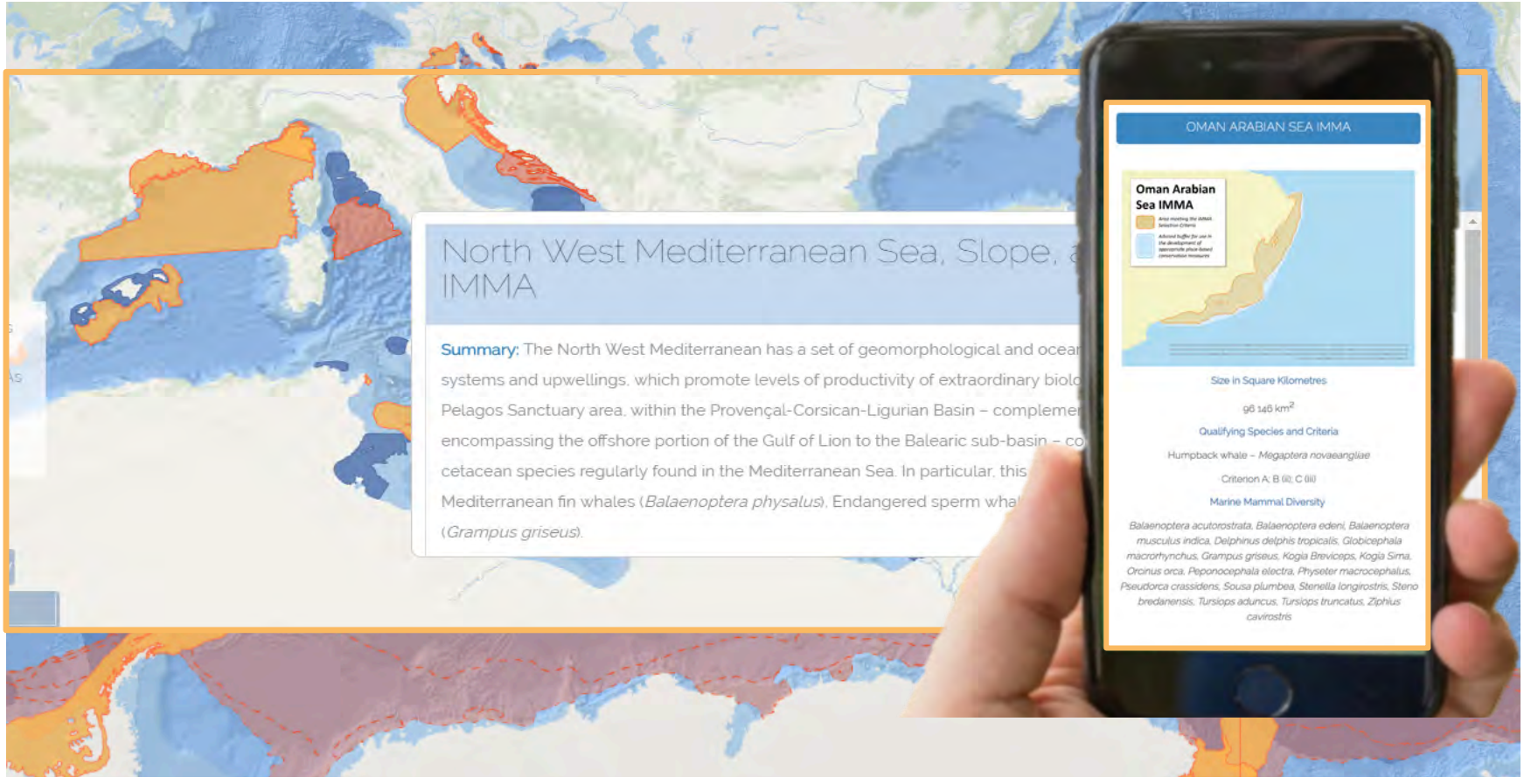
MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

October 2020 Update
159 IMMAs Identified

IMMA e-Atlas

IMMAs cIMMAs AOI



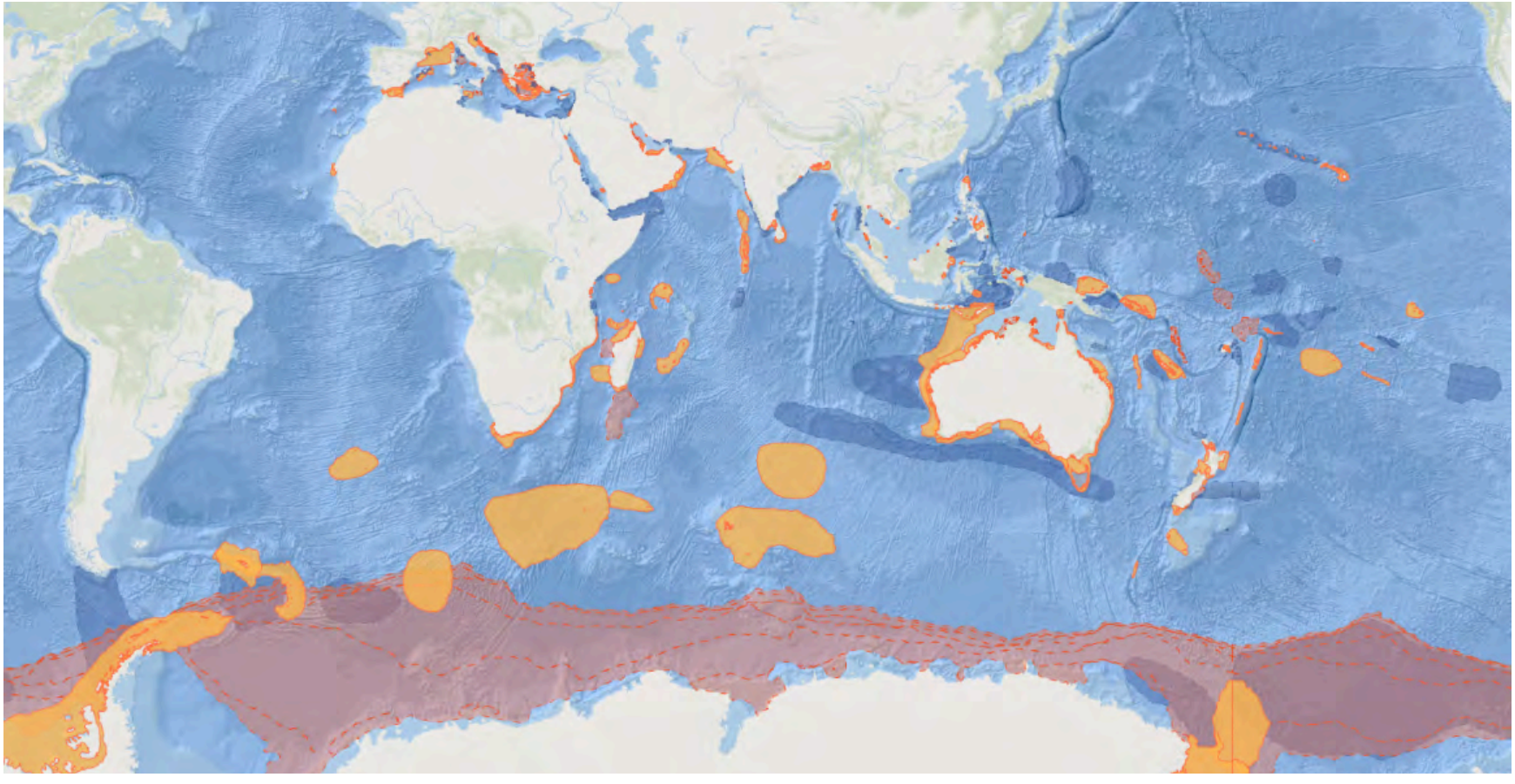
MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

October 2020 Update
159 IMMAs Identified

IMMA e-Atlas

IMMAs cIMMAs AOI



MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

October 2020 Update

159 IMMAs Identified

IMMA e-Atlas

IMMAs cIMMAs AOI

MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

October 2020 Update
159 IMMAs Identified

IMMA e-Atlas

The Sizes of IMMAs

- The total area of all 159 IMMAs combined is 15,672,267 km^2.
- The largest is 2,861,819 km^2 encompassing an area of the Extended Southern Ocean – the Prince Edward Islands and Western Oceanic Waters IMMA – which has habitat for 2 species of fur seals, southern elephant seals and killer whales.
- The smallest is 45 km^2, the Akrotiri IMMA which includes breeding caves for the Mediterranean monk seal.
- 51% of IMMAs are less than 10,000 km^2 in size
- Only 13% of IMMAs have an area greater than 100,000 km^2.

MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

October 2020 Update
159 IMMAs Identified

IMMA e-Atlas

Number of IMMAs, cIMMAs and AoI by Region

REGION	IMMA	CIMMA	AOI
Australia, New Zealand and South East Indian Ocean	31	2	13
African Atlantic	1	0	0
Extended Southern Ocean	13	1	7
Mediterranean	26	7	34
European Atlantic	1	0	0
North East Indian Ocean and South East Asian Seas	30	7	32
Pacific Islands	20	4	19
Western Indian Ocean and Arabian Seas	37	3	23
Grand Total	159	24	128

Important Marine Mammal Areas

Selection Criteria and Identification Process

- 8 Selection Criteria
- 3 Stage Identification Process
- Submission Forms
- Guidance on Boundary Delineation

Criterion A - Species or Population Vulnerability

Criterion B – Distribution and Abundance

- *Sub-criterion B1 – Small an Resident Populations*
- *Sub-criterion B2 – Aggregations*

Criterion C – Key Life Cycle Areas

- *Sub-criterion C1 – Reproductive*
- *Sub-criterion C2 – Feeding*
- *Sub-criterion C3 – Migration*

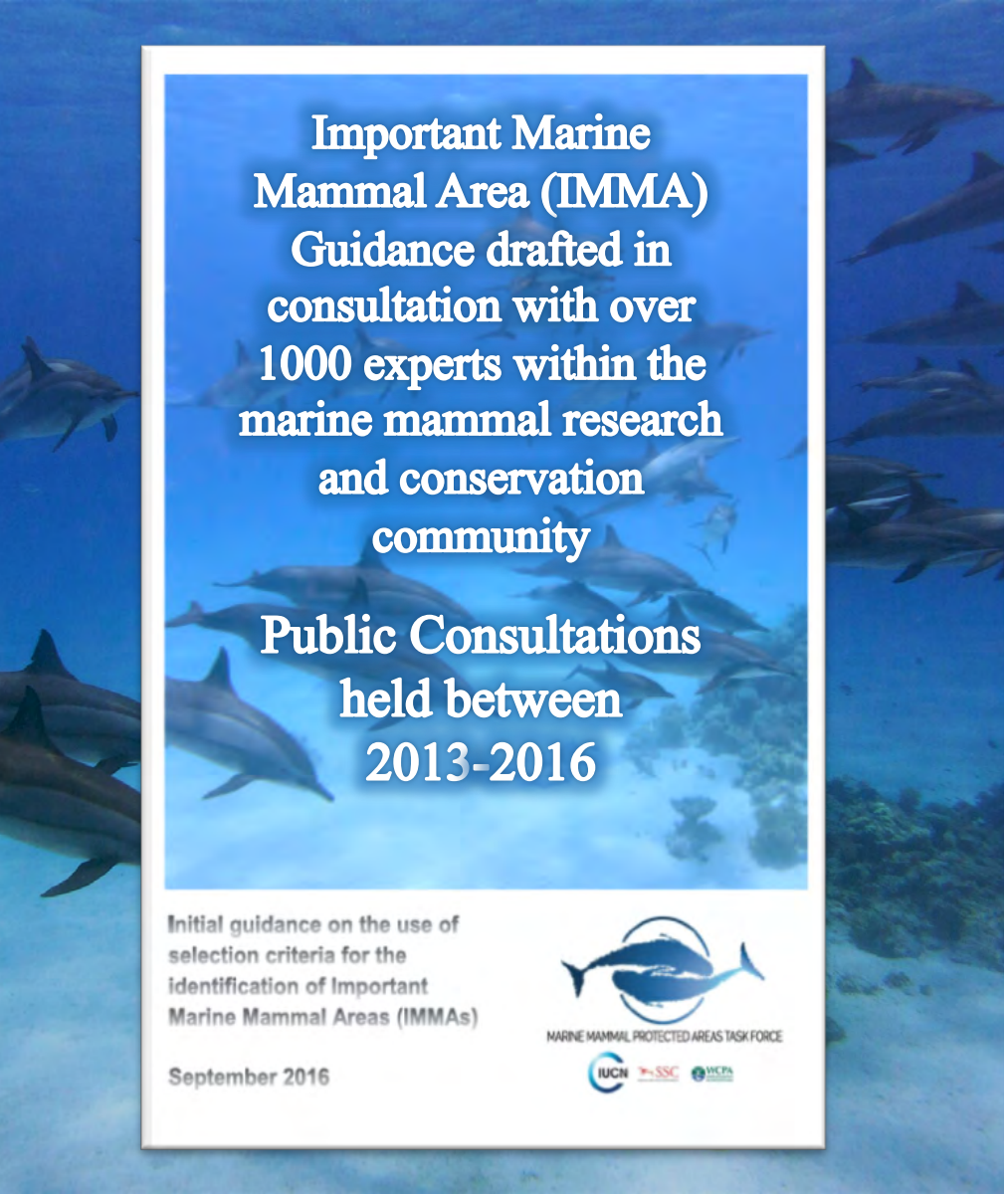
Criterion D – Special Attributes

- *Sub-criterion D1 – Distinctiveness*
- *Sub-criterion D2 – Diversity*

Important Marine Mammal Area (IMMA)

'A discrete portion of habitat, important for one or more marine mammal species, that has the potential to be delineated and managed for conservation'

Identified using an expert-based bio-centric identification process in open consultation with the wider marine mammal knowledge community



Important Marine Mammal Area (IMMA)

'A discrete portion of habitat, important for one or more marine mammal species, that has the potential to be delineated and managed for conservation'

Identified using an expert-based bio-centric identification process in open consultation with the wider marine mammal knowledge community

Alignment of IMMA Criteria with other conservation prioritization classifications:

- **Ecologically or Biologically Important Area – EBSA**
  Convention on Biological Diversity
- **Key Biodiversity Area – KBA**
  IUCN Global Standard
- **Biologically Important Area – BIA**
  U.S.A and Australia
- **Critical Cetacean Habitat – CCH**
  Convention on Migratory Species - ACCOBAMS
- **Wetlands of International Importance**
  RAMSAR Convention

Important Marine Mammal Area (IMMA)

'A discrete portion of habitat, important for one or more marine mammal species, that has the potential to be delineated and managed for conservation'

Identified using an expert-based bio-centric identification process in open consultation with the wider marine mammal knowledge community

Criterion A - Species or Population Vulnerability

Criterion B - Distribution and Abundance

Sub-criterion B1 - Small and Resident Populations

Sub-criterion B2 - Aggregations

Criterion C - Key Life-cycle Activities

Sub-criterion C1 - Reproductive Areas

Sub-criterion C2 - Feeding Areas

Sub-criterion C3 - Migration Areas

Criterion D - Special Attributes

Sub-criterion D1 - Distinctiveness

Sub-criterion D2 - Diversity

MARINE MAMMAL PROTECTED AREAS TASK FORCE

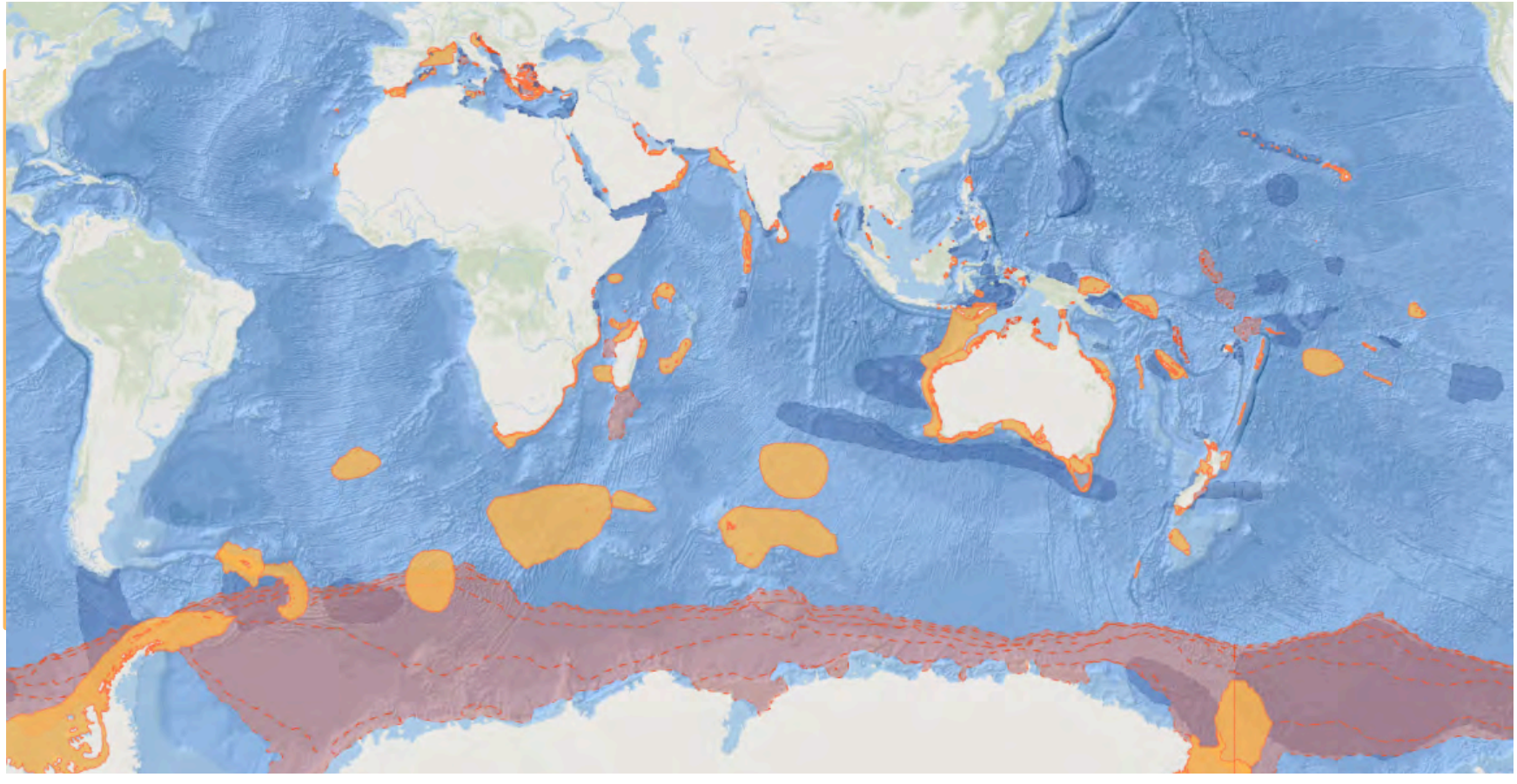
IUCN SSC WCPA

Which criteria were used?

159 IMMAs Identified

IMMA e-Atlas

IMMAs cIMMAs AOI

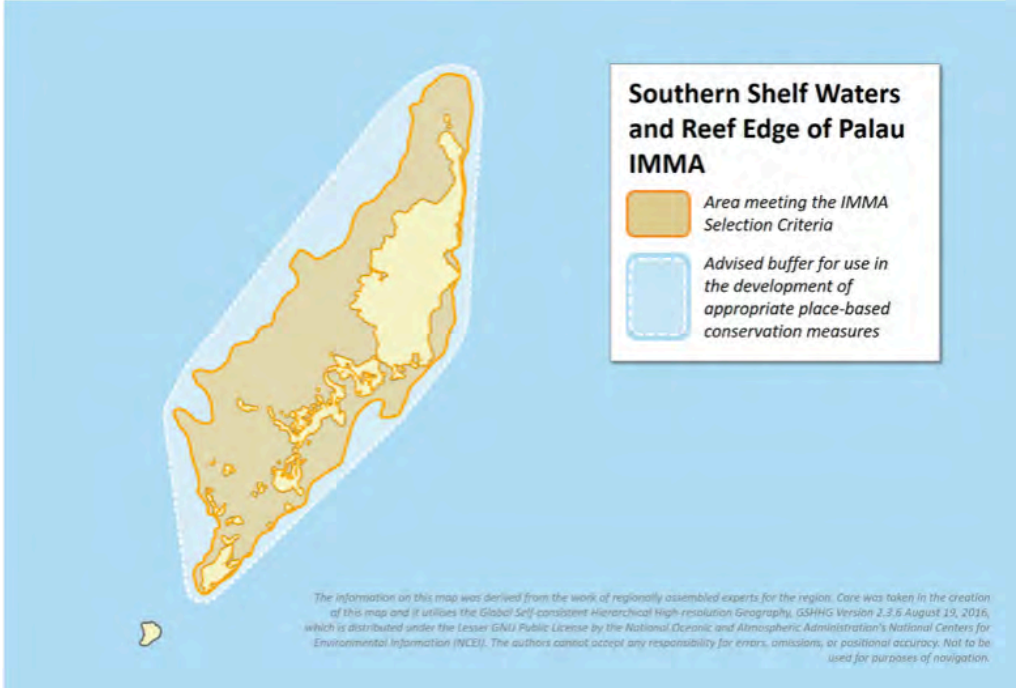


Criterion A - Species or Population Vulnerability

Areas containing habitat important for the survival and recovery of threatened and declining species.

Region: Pacific Islands

Qualifying species: dugong



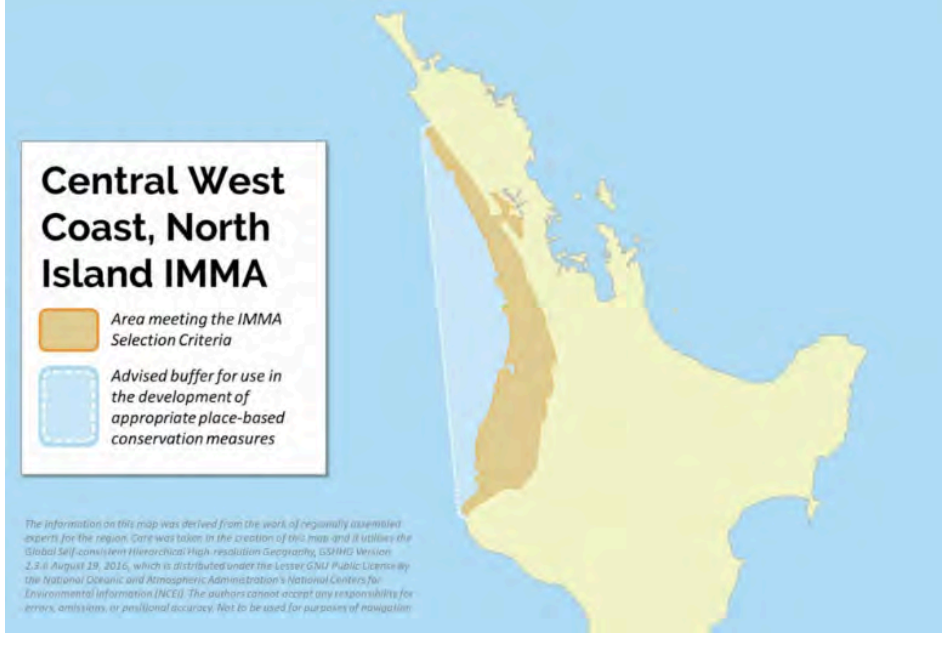
Criterion B - Distribution and Abundance

Sub-criterion B1 - Small and Resident Populations

Areas supporting at least one resident population, containing an important proportion of that species or population, that are occupied consistently

Region: Australia-New Zealand and South East Indian Ocean

Qualifying species: Maui dolphin



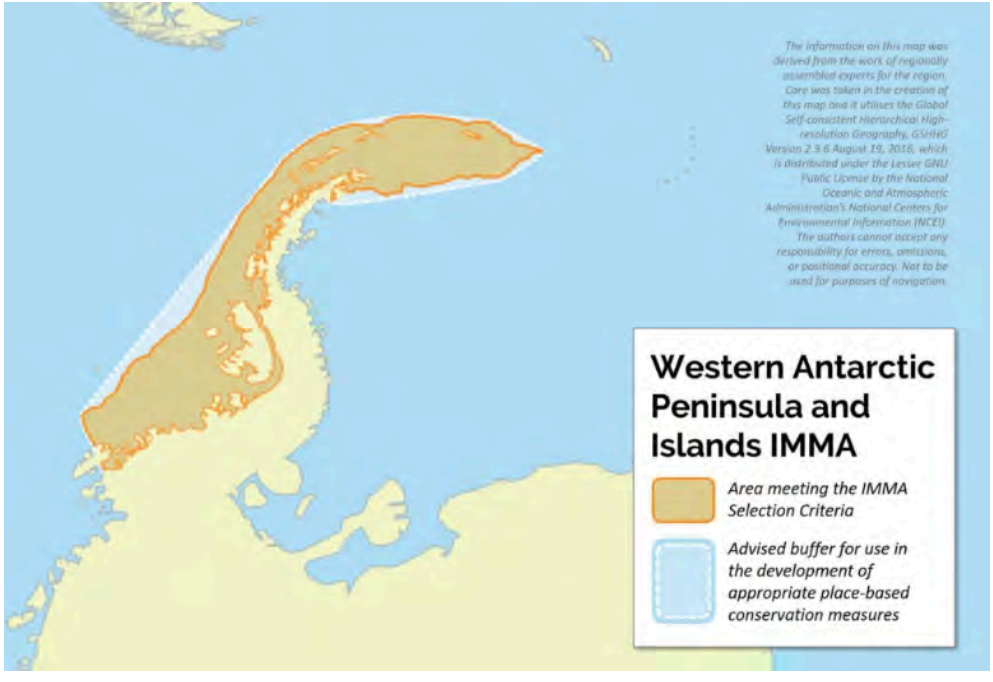
Criterion B - Distribution and Abundance

Sub-criterion B2: Aggregations

Areas with underlying qualities that support important concentrations of a species or population.

Region: Extended Southern Ocean

Qualifying species: blue, fin, humpback, and killer whales; Antarctic fur seal



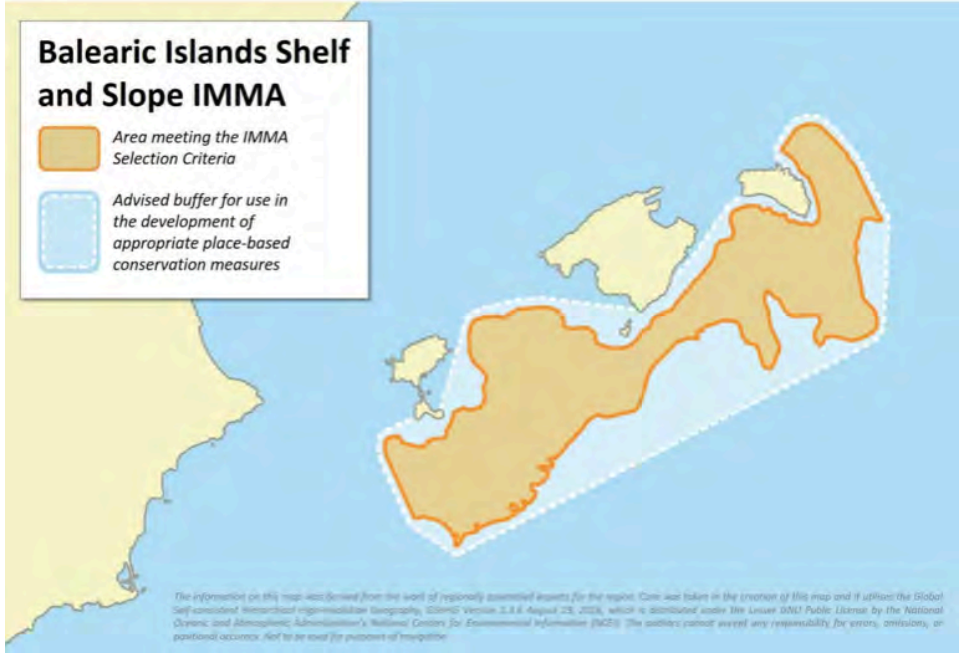
Criterion C - Key Life-cycle Activities

Sub-criterion C1 - Reproductive Areas

Areas that are important for a species or population to mate, give birth, and/or care for young until weaning.

Region: Mediterranean

Qualifying species: sperm whale



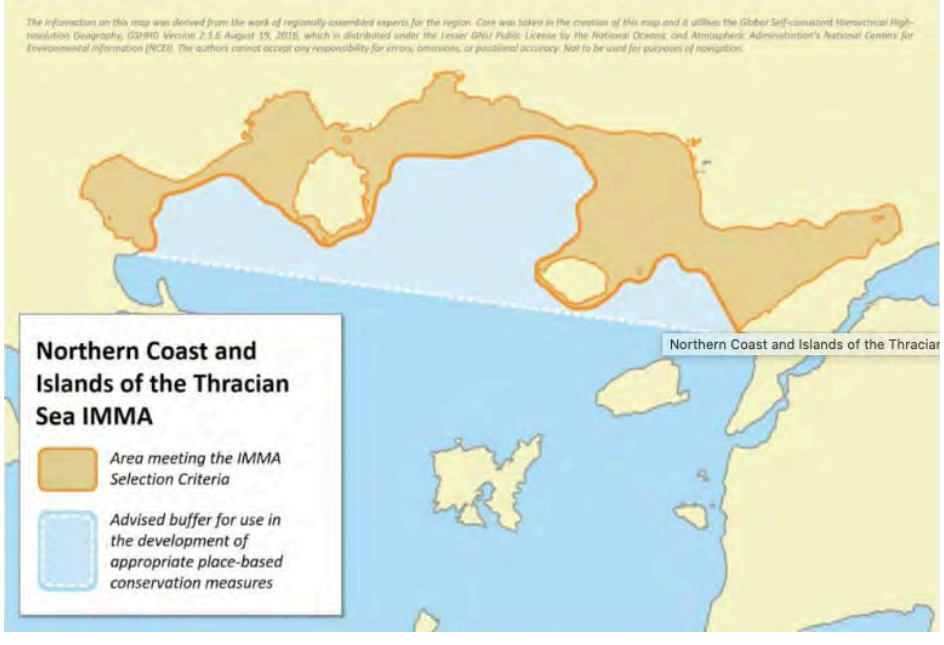
Criterion C - Key Life-cycle Activities

Sub-criterion C2 - Feeding Areas

Areas and conditions that provide an important nutritional base on which a species or population depends.

Region: Mediterranean

Qualifying species: harbour porpoise



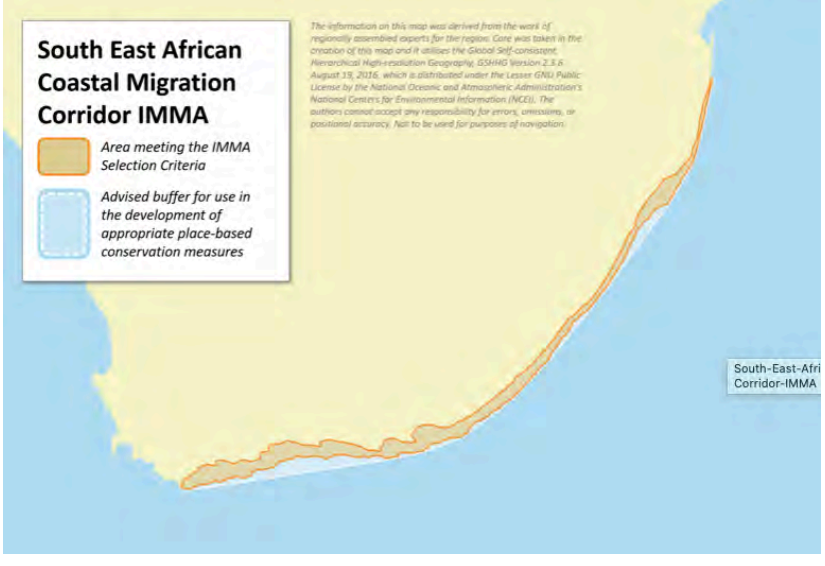
Criterion C - Key Life-cycle Activities

Sub-criterion C3 - Migration Areas

Areas used for important migration or other movements, often connecting distinct life-cycle areas or the different parts of the year-round range of a non-migratory population.

Region: Western Indian Ocean and Arabian Seas

Qualifying species: humpback whale



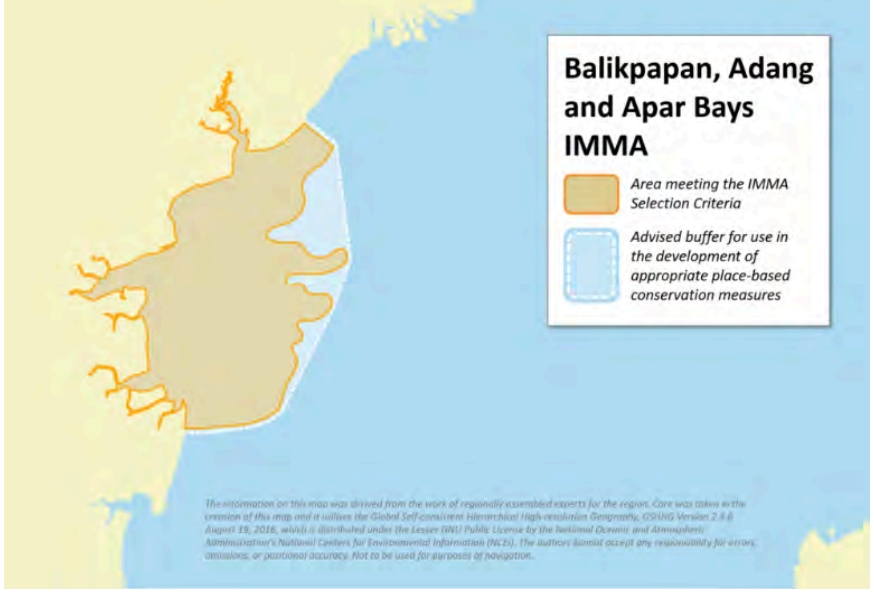
Criterion D - Special Attributes

Sub-criterion D1 - Distinctiveness

Areas which sustain populations with important genetic, behavioural or ecologically distinctive characteristics.

Region: North East Indian Ocean and South East Asian Seas

Qualifying species: Irrawaddy dolphin



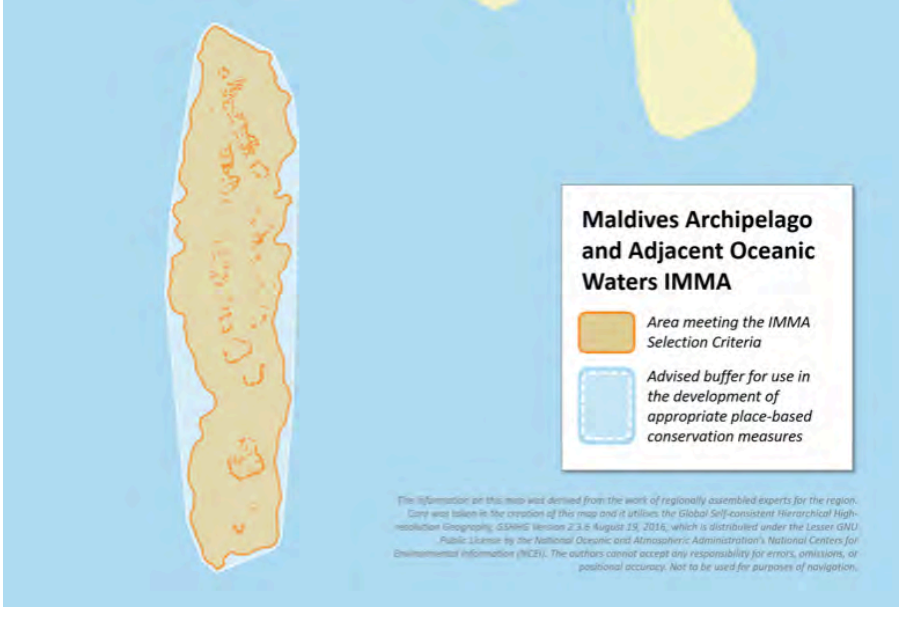
Criterion D - Special Attributes

Sub-criterion D2 - Diversity

Areas containing habitat that supports an important diversity of marine mammal species.

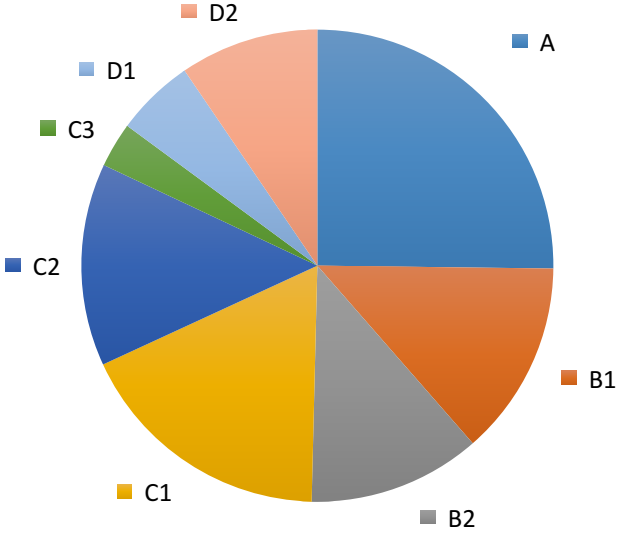
Region: Western Indian Ocean and Arabian Seas

Qualifying species: 22 species of cetaceans



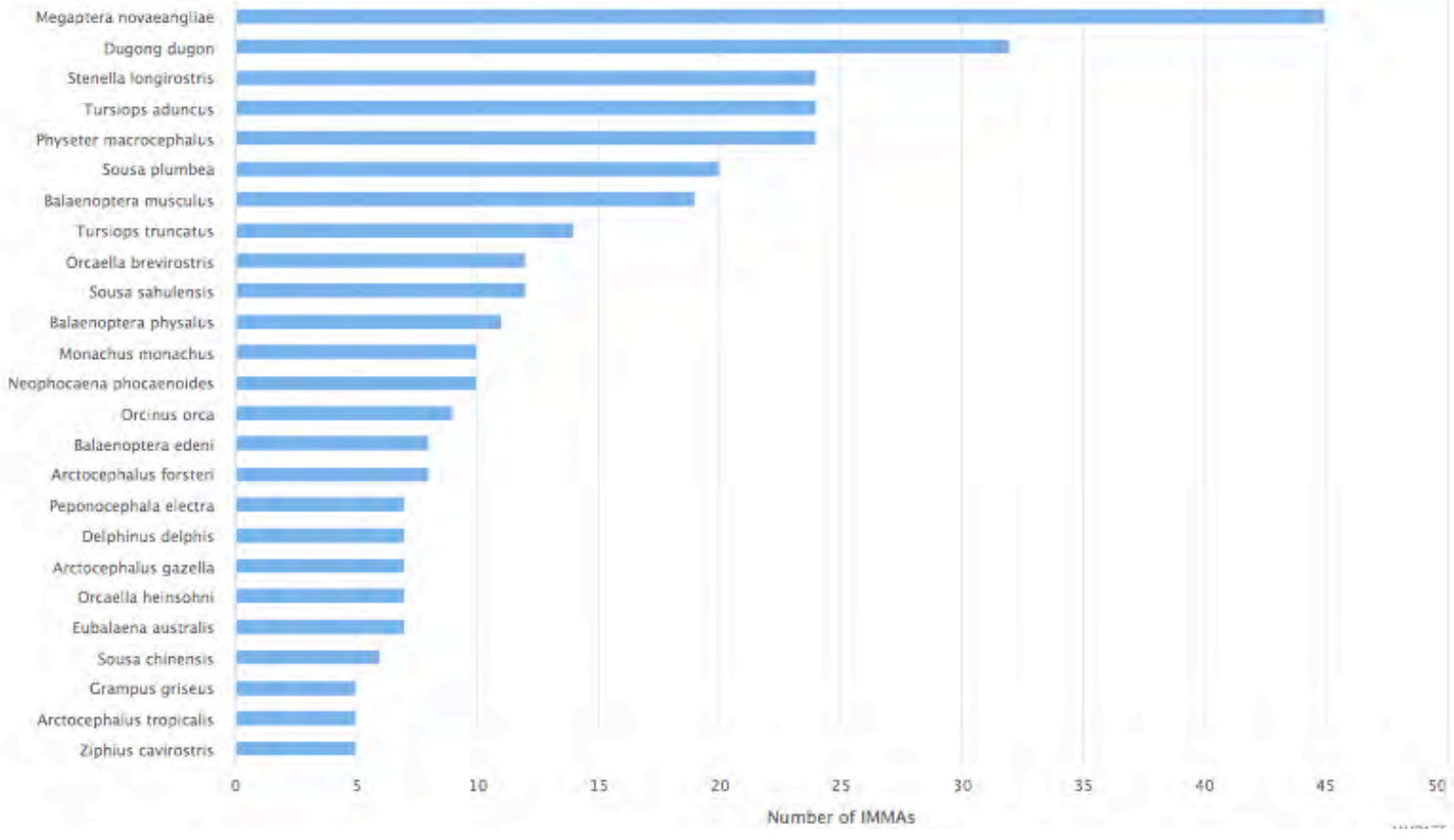
Criteria used to identify IMMAs

Criteria	Species or Population Vulnerability	Distribution or Abundance	Key Life Cycle Attributes	Special Attributes
	A	B	C	D
IMMAs	129	111	132	73
% of Total	29	25	30	16



Note: Many IMMAs have been identified using several criteria.

Qualifying marine mammal species used to satisfy the IMMA criteria (only species listed as qualifying species more than 4 times are shown)



IMMA Identification Process

Pre-Workshop:

- Collection of Area of Interest (AoI), Inventory of Knowledge / Data Appraisal Forms (DAF) – Knowledge Assessments

IMMA Identification Process

Pre-Workshop:

- Collection of Area of Interest (AoI), Inventory of Knowledge / Data Appraisal Forms (DAF) – Knowledge Assessments

IMMA Identification Process

Pre-Workshop:

- Collection of Area of Interest (AoI), Inventory of Knowledge / Data Appraisal Forms (DAF) – Knowledge Assessments

During the Expert Workshop:

- Review of AoI Submissions
- Assignment of cIMMA writing groups
- Drafting of cIMMA Submissions (template)
  Agreement on final cIMMA list

IMMA Identification Process

Pre-Workshop:

- Collection of Area of Interest (AoI), Inventory of Knowledge / Data Appraisal Forms (DAF) – Knowledge Assessments

During the Expert Workshop:

- Review of AoI Submissions
- Assignment of cIMMA writing groups
- Drafting of cIMMA Submissions (template)
  Agreement on final cIMMA list

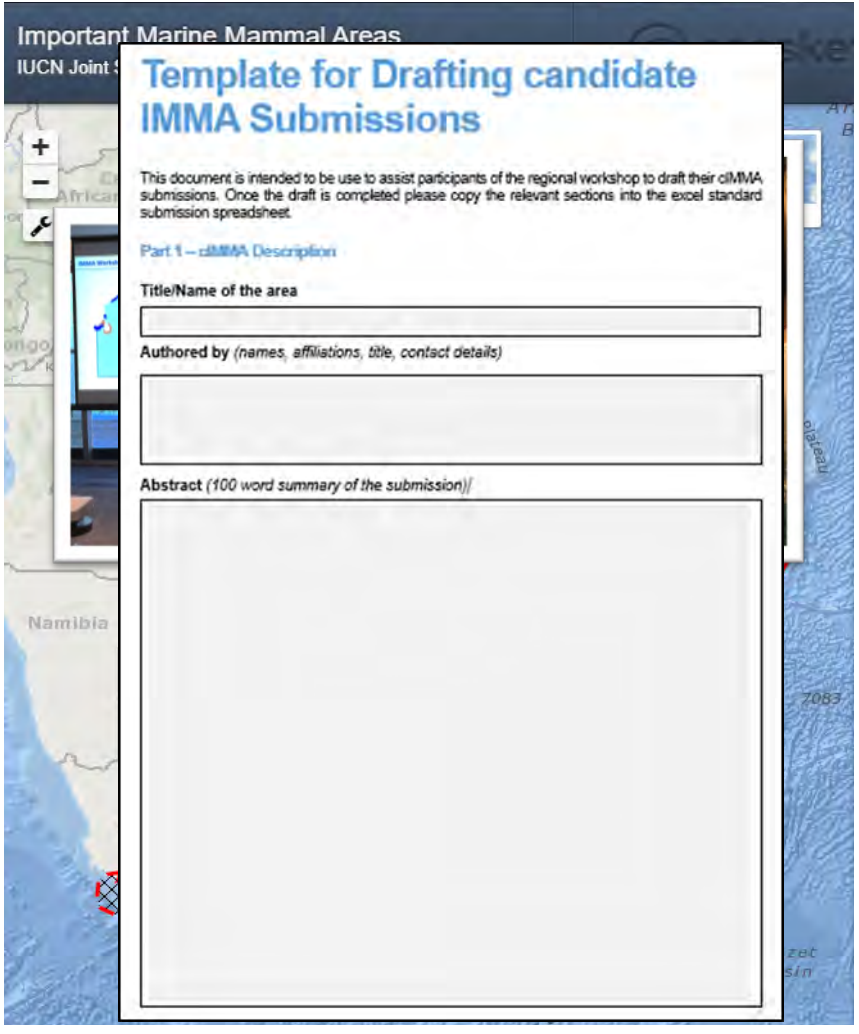
IMMA Identification Process

Pre-Workshop:

- Collection of Area of Interest (AoI), Inventory of Knowledge / Data Appraisal Forms (DAF) – Knowledge Assessments

During the Expert Workshop:

- Review of AoI Submissions
- Assignment of cIMMA writing groups
- Drafting of cIMMA Submissions (template)
  Agreement on final cIMMA list



IMMA Identification Process

Pre-Workshop:

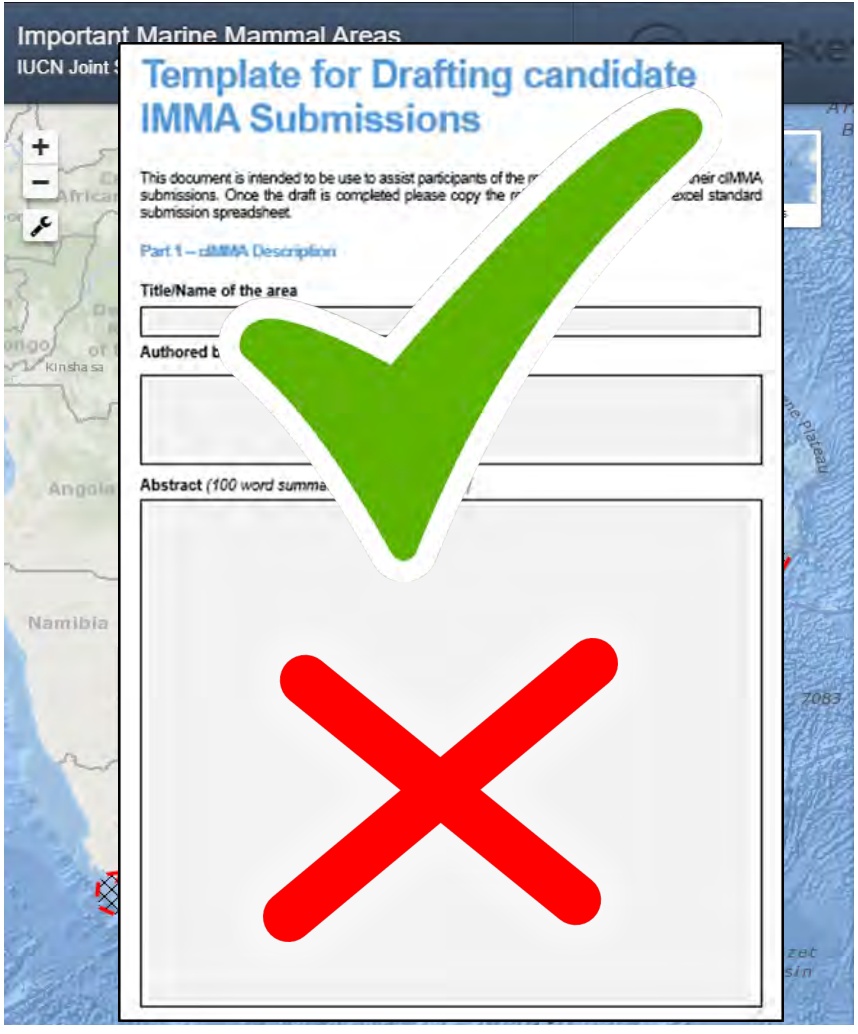
- Collection of Area of Interest (AoI), Inventory of Knowledge / Data Appraisal Forms (DAF) – Knowledge Assessments

During the Expert Workshop:

- Review of AoI Submissions
- Assignment of cIMMA writing groups
- Drafting of cIMMA Submissions (template) Agreement on final cIMMA list

After Expert Workshop:

- Independent review of cIMMA Confirmation of IMMA status
- OR Request for necessary corrections
- OR Request for additional research



IMMA Identification Process

cIMMA Title:

[Brief name that describes the area within the cIMMA]

Point(s) of Contacts

[Name, Affiliation/Organization, Contact Email]

[Name, Affiliation/Organization, Contact Email]

[Name, Affiliation/Organization, Contact Email]

Abstract

[Brief summary of the cIMMA description and qualifying selection criteria 200 words maximum]

Summary Table of cIMMA species

ID	Scientific Name	Common Name	Population/Sub-population Name	IUCN Status	IMMA Selection Criteria Met (x)						
					A	Bi	Bii	Ci	Cii	Ciii	Di	Dii

cIMMA Map

[simple boundary map of the cIMMA location]

Description of cIMMA

[Description and references to supporting information about the cIMMA location i.e. country, geographic locality]

[Description and references to supporting information about the marine mammal species occurring within the cIMMA]

[Description and references to supporting information about why the area meets the IMMA selection criteria and should be considered as a cIMMA]

Criterion A – Species or Population Vulnerability

[Detailed description for meeting the above criterion – only required if the area meets the above criterion]

Criterion Bi - Small and Resident Populations

[Detailed description for meeting the above criterion – only required if the area meets the above criterion]

Part 1 - cIMMA Description

- *Title/Name of the area*
- *Abstract*
- *Summary Table*
- *cIMMA Boundary Map*
- *Description*

Part 2 - Criterion A
Part 3 - Criterion B1
Part 4 - Criterion B2
Part 5 - Criterion C1
Part 6 - Criterion C2
Part 7 - Criterion C3
Part 8 - Criterion D1
Part 9 - Criterion D2

Part 10 - References
Part 11 - Maps and Figures
Part 12 - Species List

Guidance on IMMA Delineation

The following hierarchical recommendations are made to help rank the scenarios by which candidate IMMA boundaries can be confidently drawn.

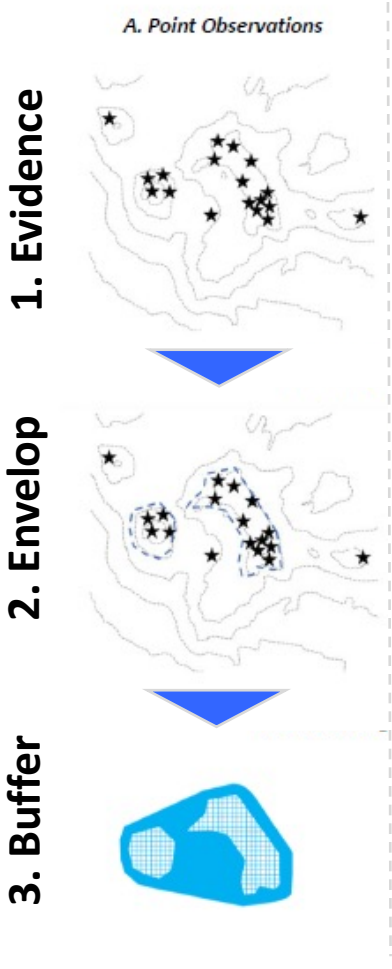
I. features which are spatially stable, supported by directly observed evidence.

II. features which are spatially stable but rely on modelled evidence.

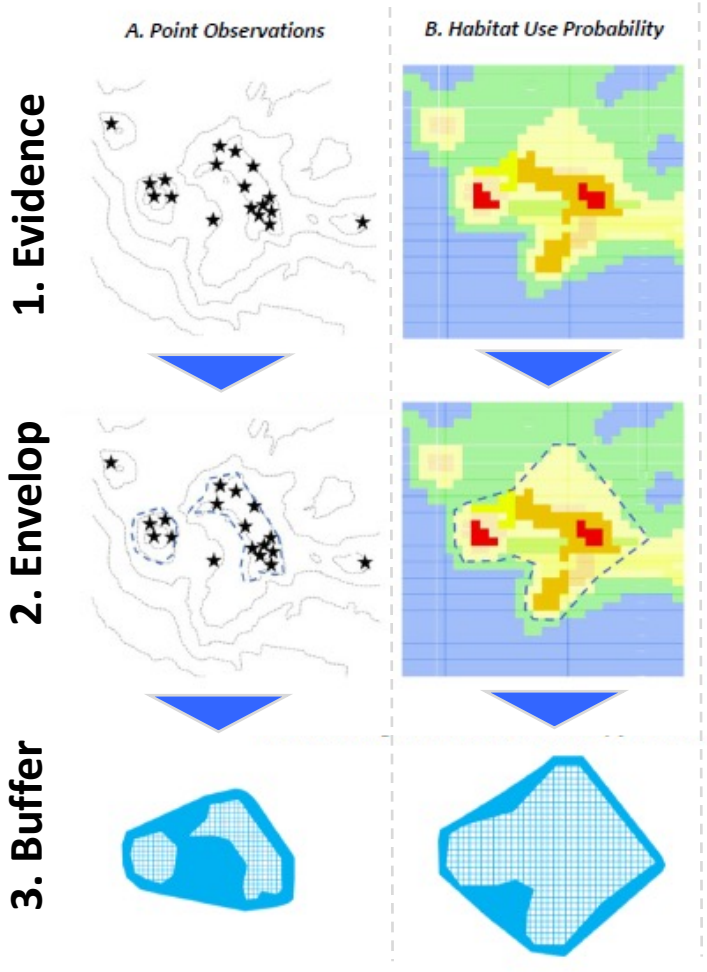
III. features that are not spatially fixed/dynamic supported by directly observed evidence.

IV. features that are not spatially fixed/dynamic and rely on modelled evidence.

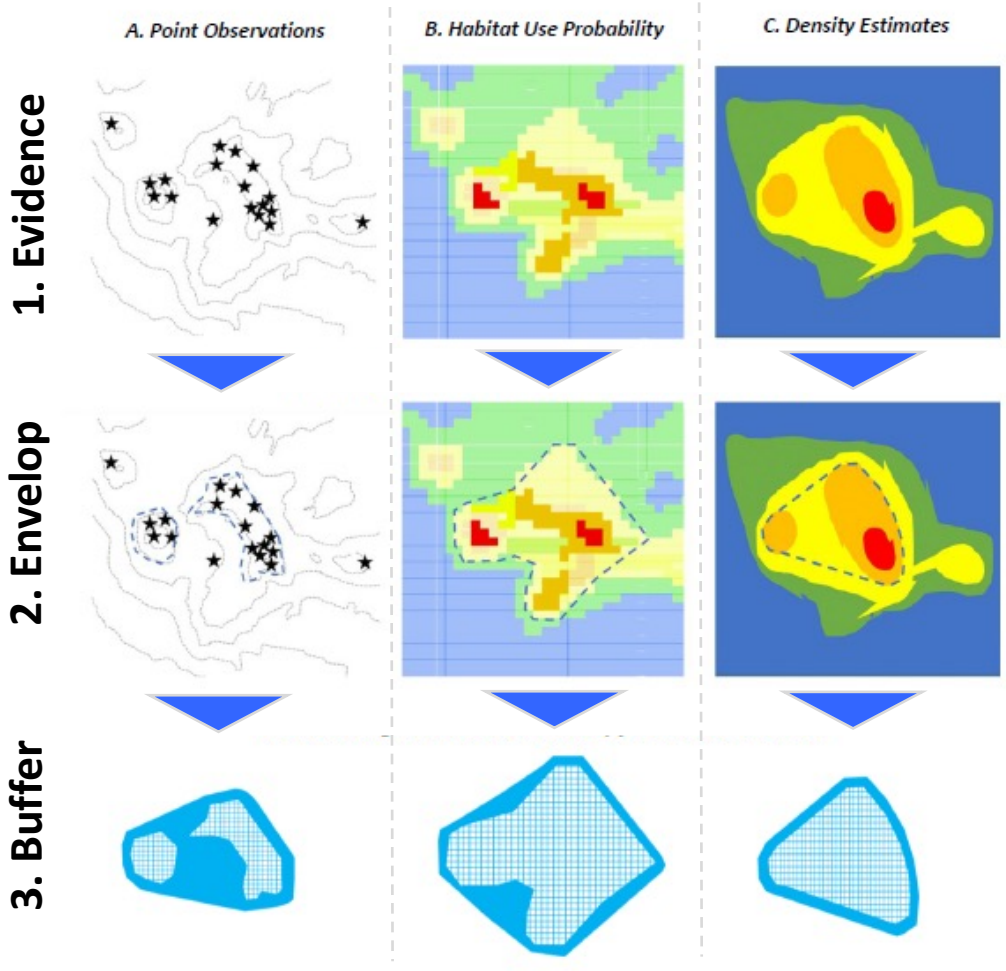
Guidance on IMMA Delineation



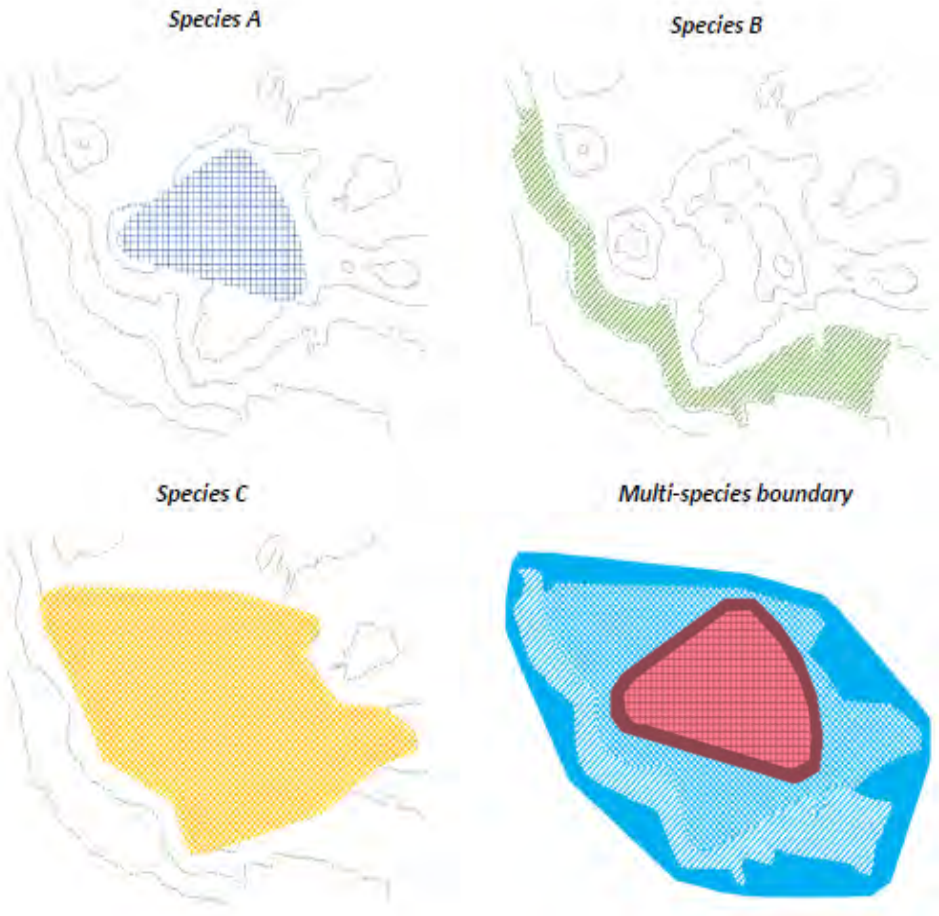
Guidance on IMMA Delineation



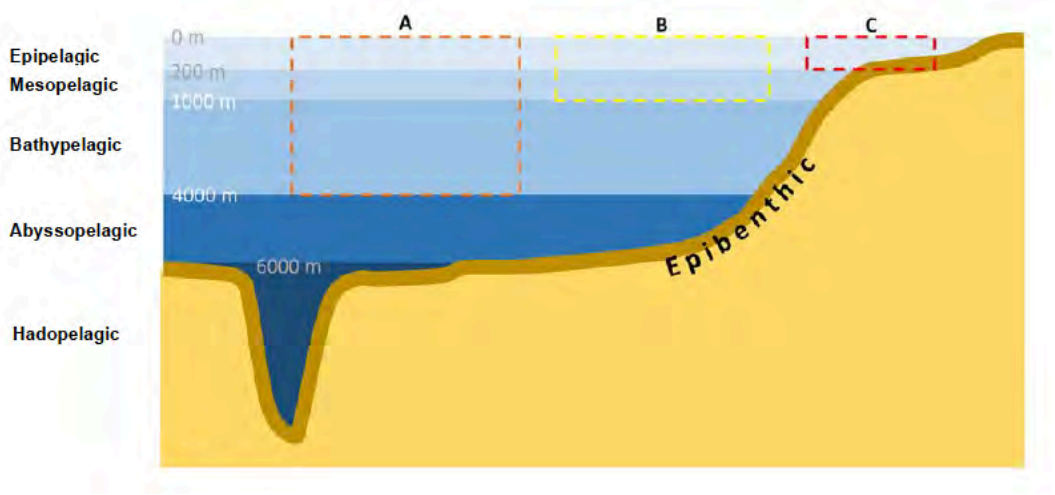
Guidance on IMMA Delineation



Guidance on IMMA Delineation



Guidance on IMMA Delineation



A. cIMMA for a deep-diving species expected to utilise the 0m-4000m of the water column;
B. cIMMA containing a diversity of near-surface and shallow-diving species observed to use the 0m-1000m of the water column;
C. cIMMA for a shelf restricted species known to utilise both the 0m-200m of the water column and the shelf Epibenthic zone (i.e. forage in sea bottom sediments).

Guidance on IMMA Delineation

The following **'Primary'** currencies of information are considered most suitable for use in the assessment of the selection criteria for the identification of IMMA:

P-I	***abundance of animals***
P-II	***probability of occurrence***
P-III	***observed sightings***
P-IV	***area of occupancy***
P-V	***extent of suitable habitat***
P-VI	***range***

In addition, the following **'Secondary'** currencies of information are also considered useful for supporting the identification of IMMA:

S-I	***records of key life-cycle behaviour (habitat utilization)***
S-II	***measures of distinctiveness (separation)***
S-III	***indices of diversity***

MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

October 2020 Update
159 IMMAs Identified

Next step after Identification:

Implementation

IMMA identification on its own means little if there is no implementation!

Key point is that if you make a tool then you need to show people what it's good for and how to use it.

Fortunately, the need for marine mammal data in an accessible form is appreciated by many conservation processes at the local, national and regional level.

Still, there are huge gaps and a big part of our future role, along with monitoring and revising, is selling the IMMAs so that they get utilised.

Marine Conservation and Management Initiatives using products of IMMA Process

- Convention on Biological Diversity Ecologically or Biologically Significant Areas (**EBSAs**);
- Marine Spatial Planning (**MSP**) and management of any human activity at sea (e.g., *shipping, fishing, industrial and scientific exploration*);
- the design, adaptive management, monitoring and review of Marine Protected Areas (**MPAs**) and MPA Networks;
- Key Biodiversity Areas (**KBAs**) identified via the IUCN Standard;
- Navy conduct related to sonar testing;
- **IMO's** Particularly Sensitive Sea Areas (**PSSAs**) and other designations;
- International Whaling Commission IWC.

Marine Conservation and Management Initiatives using products of IMMA Process

- Convention on Biological Diversity Ecologically or Biologically Significant Areas (**EBSAs**);
- Marine Spatial Planning (**MSP**) and management of any human activity at sea (e.g., *shipping, fishing, industrial and scientific exploration*);
- the design, adaptive management, monitoring and review of Marine Protected Areas (**MPAs**) and MPA Networks;
- Key Biodiversity Areas (**KBAs**) identified via the IUCN Standard;
- Navy conduct related to sonar testing;
- **IMO's** Particularly Sensitive Sea Areas (**PSSAs**) and other designations;
- International Whaling Commission IWC.

CMS Resolution 12.13 (2017) acknowledges the IMMA criteria and process, requests Parties and invites Range States to identify specific areas where the identification of IMMAs could be beneficial

Marine Conservation and Management Initiatives using products of IMMA Process

- Convention on Biological Diversity Ecologically or Biologically Significant Areas (**EBSAs**);
- Marine Spatial Planning (**MSP**) and management of any human activity at sea (e.g., *shipping, fishing, industrial and scientific exploration*);
- the design, adaptive management, monitoring and review of Marine Protected Areas (**MPAs**) and MPA Networks;
- Key Biodiversity Areas (**KBAs**) identified via the IUCN Standard;
- Navy conduct related to sonar testing;
- **IMO's** Particularly Sensitive Sea Areas (**PSSAs**) and other designations;
- International Whaling Commission IWC.

Follow-up

- CBD **EBSAs** to include IMMA layers in future revision of EBSA process.
- Marine Spatial Planning (**MSP**) and management of any human activity at sea (e.g., *shipping, fishing, industrial and scientific exploration*);
- Proposed **MPAs** in Vietnam, Bangladesh and other countries are using IMMA information; MPA Network planning in new EU-SE Asia project will use IMMAs for network design.
- About 30 Key Biodiversity Areas (**KBAs**) have been identified in IMMA workshops.
- The **US Navy** has used IMMAs to indicate where they will avoid testing low frequency sonar.
- The **IWC** has adopted IMMAs to identify shipstrike issues and will work with **IMO** to help in identifying speed and lane restrictions

MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

Making IMMAs Accessible

IMMA e-Atlas

IMMAs cIMMAs AOI

IMMAS SEARCHABLE DATABASE

IMMAs e-Atlas

Filter results

Status | Region | Title | Criteria | Qualifying Species | Supporting Species

Location

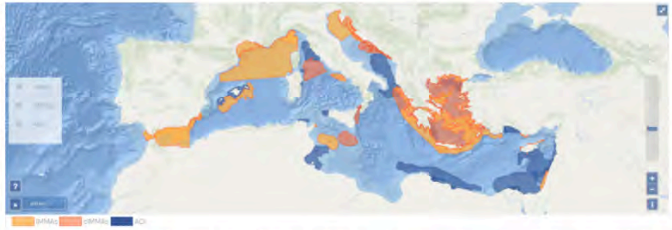
Columns Excel CSV PDF

STATUS	REGION	TITLE	DETAILS	CRITERIA	QUALIFYIN_ SPECIES	SUPPORTI_ SPECIES	LOCATION
Status	Region	Title	Details	Criteria	Qualifying Species	Supporting Species	Location
IMMA	African Atlantic	Cabo Blanco IMMA	Read full IMMA summary	A; Bii; Ci	Monachus monachus	-	Mauritania; Western Sahara
IMMA	Australia, New Zealand and Southeast Indian Ocean	Australian East Coast Migration Corridor IMMA	Read full IMMA summary	Ciii; Di	Megaptera novaeangliae; Balaenoptera acutorostrata	Orcaella heinsohni; Sousa sahulensis; Dugong dugon; Stenella longirostris	Australia

MARINE MAMMAL PROTECTED AREAS TASK FORCE

HOME | IMMAS | IMMA E-ATLAS | TASK FORCE | DOWNLOADS | CONTACTS | NEWS

IMMA SPATIAL LAYER DOWNLOAD



The IUCN Joint SSC/WCPA Marine Mammal Protected Areas Task Force or 'IUCN-MMPATF' maintains the complete spatial dataset of Important Marine Mammal Areas (IMMA) around the world. These areas have been assessed by regional experts and were further assessed by a panel of independent reviewers.

The IMMA spatial dataset compiled by the IUCN-MMPATF is made publically available by request under a User Licence Agreement for non-commercial use in a GIS compatible Shapefile (.shp) format to use in GIS mapping software. Please note that we do not provide shapefiles for cIMMAs or AOIs.

Full terms of use, including citation guidance and caveats, the definition of non-commercial use and commercial use, are available from the User Licence Agreement download button below.

IMMA Layer User Licence Agreement

A metadata description of the IMMA spatial dataset is also available for download from the button below. This metadata document describes the content within the most current version of the dataset made available by request and the information and spatial extent contained within the IMMA layer.

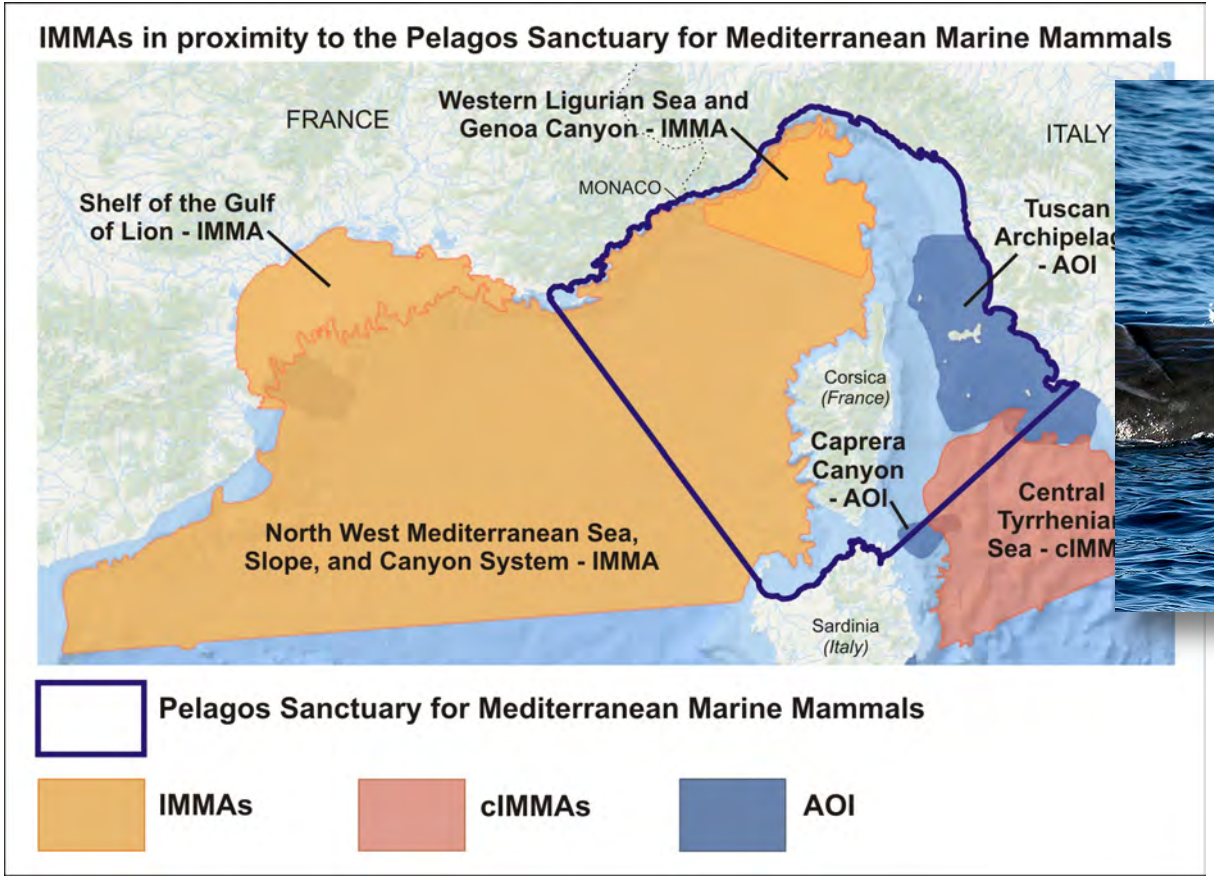
IMMA Layer Metadata Description

To make a request to download the IMMA Layer in either a GIS compatible Shapefile (.shp) or Google Earth compatible Keyhole Markup Language Zipped file (.kmz) please complete the following Contact Form. We shall endeavour to send you the requested files as soon as we can although for some enquiries this may take longer due to the nature of the request

MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

Rethinking an MPA post-IMMA



MARINE MAMMAL PROTECTED AREAS TASK FORCE

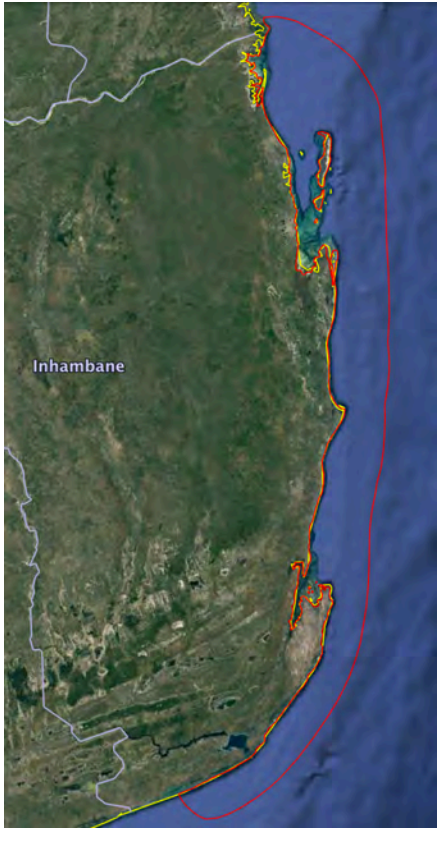
IUCN SSC WCPA

Bazaruto Marine Park + Bazaruto Archipelago to Inhambane Bay IMMA

MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

Bazaruto Archipelago to Inhambane Bay IMMA



IMMA Resubmission Template

IMMA Title: Bazaruto Archipelago to Inhambane Bay

Point(s) of Contacts:

Vic Cockcroft, Nelson Mandela University. South Africa. vic@dugongs.org

Ken Findlay, Cape Peninsula University of Technology, South Africa. findlayk@cput.ac.za

Almeida Guissamulo, University of Eduardo Mondlane, Maputo. Mozambique. aguissas@gmail.com

SECTION 1. Summary for IMMA e-Atlas Pop-up Box

There has been a dramatic decline in dugongs in the Western Indian Ocean since the 1960s. Ten and 6 dugongs were counted off Kenya in the mid 1990s (Cockcroft, 1995; Komora, 1996; Wamukoya *et al.*, 1995; Marsh, *et al.*, 2002; Cockcroft *et al.*, 1994). Similar declines were noted for Tanzania, the Mascerine Islands (Cockcroft & Young, 1998; Muir *et al.*, 2003;) and Mozambique (Cockcroft & Young 1998). Based on boat, aerial and questionnaire surveys conducted from 1991/97 Cockcroft *et al.*, (1994) suggested that the Bazaruto Archipelago supported the last viable WIO population. Comprehensive aerial surveys of the Archipelago in 2007/2008 (Findlay *et al.*, 2011) estimated a population of between 250 and 350 individuals. Recent aerial, acoustic and questionnaire surveys off East African 'hot spots' suggest that dugongs are all but extirpated from the East African region, other than in the Bazaruto Archipelago (Cockcroft *et al.*, 2018).

SECTION 2. Information for IMMA Summary Box

Common Name	Scientific Name	IMMA Selection Criteria Met (x)							
		A	Bi	Bii	Ci	Cii	Ciii	Di	Dii*
Dugong	*Dugong dugon*	x	x						

MARINE MAMMAL PROTECTED AREAS TASK FORCE

IUCN SSC WCPA

IMMA Future Directions

- IMMAs give international scientific recognition to contribute to local or national protection efforts
- IMMAs with baseline studies can then be used to monitor against threats to cetaceans, ship strike, noise, climate change
- IMMAs will play a role in the United Nations BBNJ process helping to close data gaps in the high seas (e.g., using satellite images to detect whales, e-DNA, acoustics plus modelling, etc.)
- Northern hemisphere IMMA Workshops under discussion for 2022-2023; other regions to follow
- Monitoring and review of IMMAs and AoI needed regularly and in regions at least every 10 years.
- Selling and implementing the IMMA tool and integrating with other conservation tools.

Question and Answer Session

GOBI

TETHYS since 1986

IUCN SSC Species Survival Commission WCPA World Commission on Protected Areas

WDC

Federal Ministry for the Environment, Nature Conservation, Building and Nuclear Safety
INTERNATIONAL CLIMATE INITIATIVE (IKI)

MAVA FONDATION POUR LA NATURE

OFB OFFICE FRANÇAIS DE LA BIODIVERSITÉ

Animal Welfare Institute

SCAR

PACIFIC LIFE FOUNDATION

NRDC

ocean care

Introducing Important Marine Mammal Areas – IMMAs

Unwrapping a new tool for global marine mammal and biodiversity conservation

GOBI Webinar 1: 28.10.2020. 2pm GMT

http://gobi.org/resources/webinars/

Erich Hoyt and Giuseppe Notarbartolo di Sciara

Co-chairs, IUCN Marine Mammal Protected Areas Task Force