



ATSEA PHASE 2

Arafura Timor Seas Ecosystem Action (ATSEA-2)

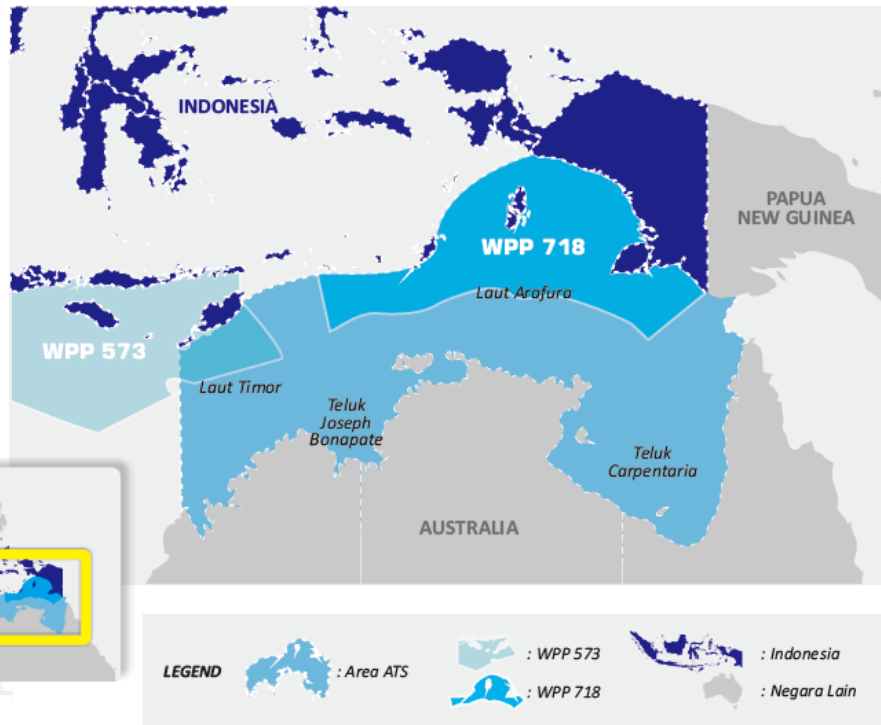
Implementation of the Arafura and Timor Seas Regional and National Strategic Action Programs, Second Phase of the Arafura Timor Seas Ecosystem Action Program (ATSEA-2)

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NPC ATSEA 2 - UNDP

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Arafura and Timor Seas (ATS)

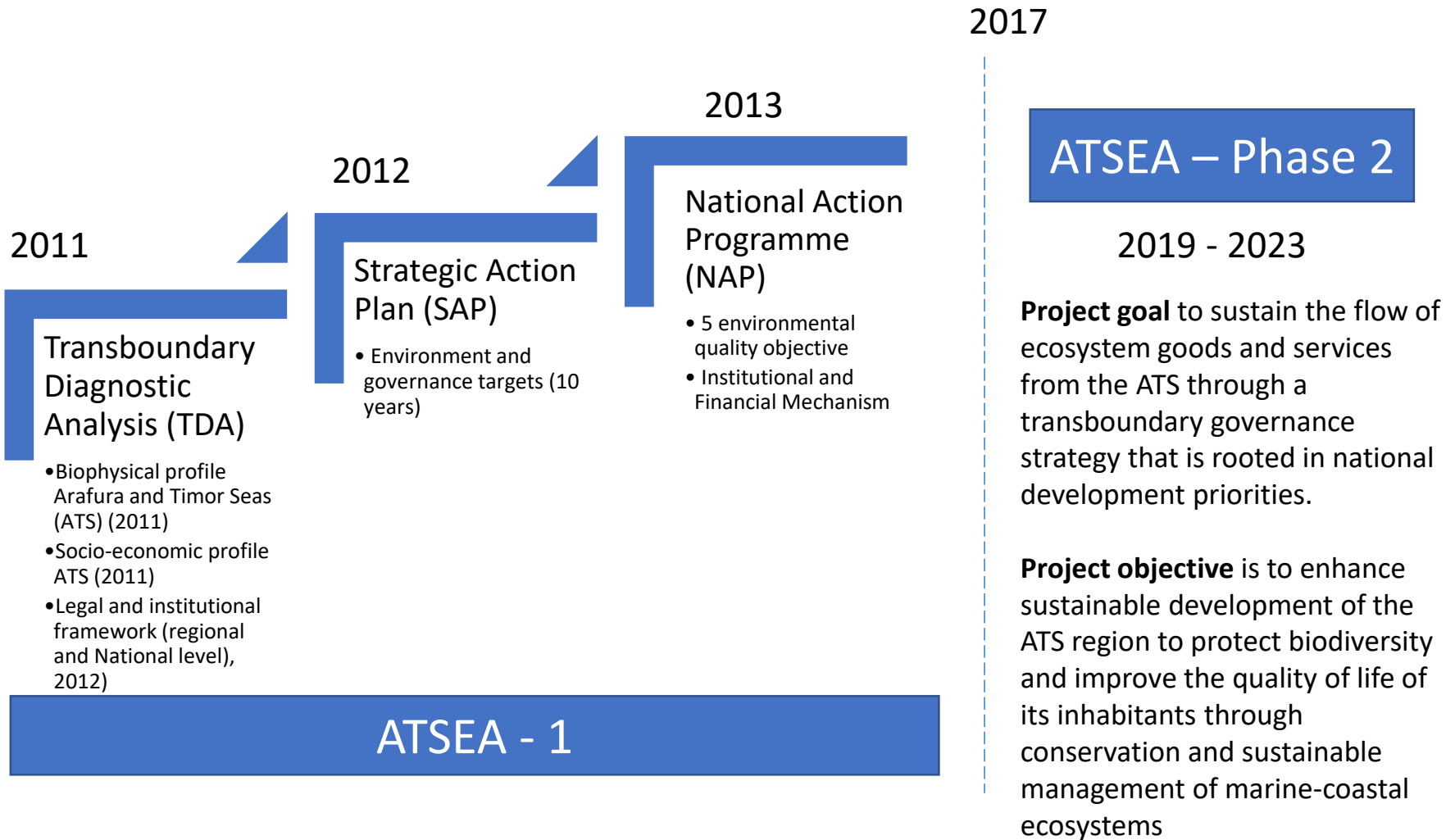


The ATS region is extremely rich in living and non-living marine resources, including major fisheries and oil and gas reserves.

- intersection of the two major Large Marine Ecosystems (LMEs); the Indonesian Seas to the north and northern Australian waters to the south.
- Integral part of the recently names 'Coral Triangle zone'



Background



Issues and Challenges

Priority Environmental Concern	Key Causal Factors	Key impacts
Unsustainable fisheries & decline and loss of living coastal & marine resources	Illegal, unreported and regulated fishing;; unsustainable practices; fisheries bycatch	<ul style="list-style-type: none"> • Depletion of shared transboundary and pelagic fisheries- shark/rays, red and gold band snapper, trepang, prawn/shrimp, tuna (Arafura Sea, Timor Sea) • Over exploitation of coastal fisheries resources – trepang, trochus, coral reef fisheries (Arafura Sea, Timor Leste) • Fisheries bycatch – shrimp/prawn trawling (Arafura Sea), red Snapper (Timor Sea)
Modification, degradation & loss of coastal & marine habitats	Coastal development, bottom trawling, fuel wood (mangroves), dynamite fishing, pollution (sediments)	<ul style="list-style-type: none"> • Decline & loss of soft bottom habitats (bottom trawling)- Arafura Sea • Decline & loss of mangroves- Aru Sea (coastal development) • Decline & loss of seagrasses (Sediments, dieback)
Marine & land based pollution (e.g marine debris, sediment, oil spill)	Coastal development (nutrients, sediments), mining (Sediments, toxicants), land degradation (sediments), oil spills, marine debris	<ul style="list-style-type: none"> • Sediment runoff –mining activities (Aru Sea, Papua) • Toxicants (coastal mining activities) – Aru Sea (And Papua), Kupang, Wetar island • Eutrophication –Aru Sea • Marine debris – Arafura Sea • Oil Spill & impact – Timor Sea, Southern NTT (Montara Oil Spill)

Issues and Challenges

Priority Environmental Concern	Key Causal Factors	Key impacts
Decline & loss of biodiversity & key marine species	Illegal and unsustainable harvesting, fisheries bycatch (ghostnets, trawling, tuna longlines), habitat loss and climate change	<ul style="list-style-type: none"> • Marine turtles – Aru Sea, Fisheries bycatch, marine debris, tuna longlines) • Dugongs – Aru Seas, Fisheries bycatch, marine debris • Cetacean – ATS (Fisheries bycatch, shipping, seismic activities) • Sharks/rays – ATS, (IUU, fishing unsustainable harvest, fisheries bycatch) • Sea snakes (ATS, Fisheries bycatch) • Seabirds/Shorebirds – ATS (oil and gas industry impacts, fisheries bycatch, illegal and unsustainable harvest)
Impact of Climate Change	Fossil fuel-based global energy consumption, land use, land use change, and forestry	<ul style="list-style-type: none"> • Ocean warming – dynamics of the Indo Pacific Warm Pool, Ocean thermostat • Increased sea temperatures – Northern seas warming impacts on ocean processes, marine biodiversity (particular marine reptiles, corals) • Increased extreme climatic events (cyclonic activities, rainfall, drought) – increase cyclonic frequency & intensity • Sea level rise – coastal flooding, saltwater intrusion, loss of coastal habitat & biodiversity



Background

LONG-TERM SAP OBJECTIVE

To promote sustainable development of the Arafura and Timor Seas region to improve the quality of life of its inhabitants through restoration, conservation and sustainable management of marine and coastal

ECOSYSTEM QUALITY OBJECTIVES

1. Fisheries Component:

Recovering and sustaining fisheries

2. Habitat Component:

Restoring degraded habitats for sustainable provision of ecosystem services

3. Pollution Component:

Reducing land-based and marine sources of pollution

4. Marine Species Component:

Protecting key marine species

5. Climate Change Component:

Adaptation to the impacts of climate change

OPERATIONAL OBJECTIVES

1.1 To promote responsible fishing practices, including combating IUU fishing

1.2. Understand and address the ecological impacts of fisheries

2.1 To strengthen the management of biodiversity, especially ecologically important habitats, including mangroves, coral reefs and seagrass beds

3.1 To prevent and reduce inputs of pollutants from coastal point land sources (wastewater, sewage and industrial) and diffuse sources (land-use)

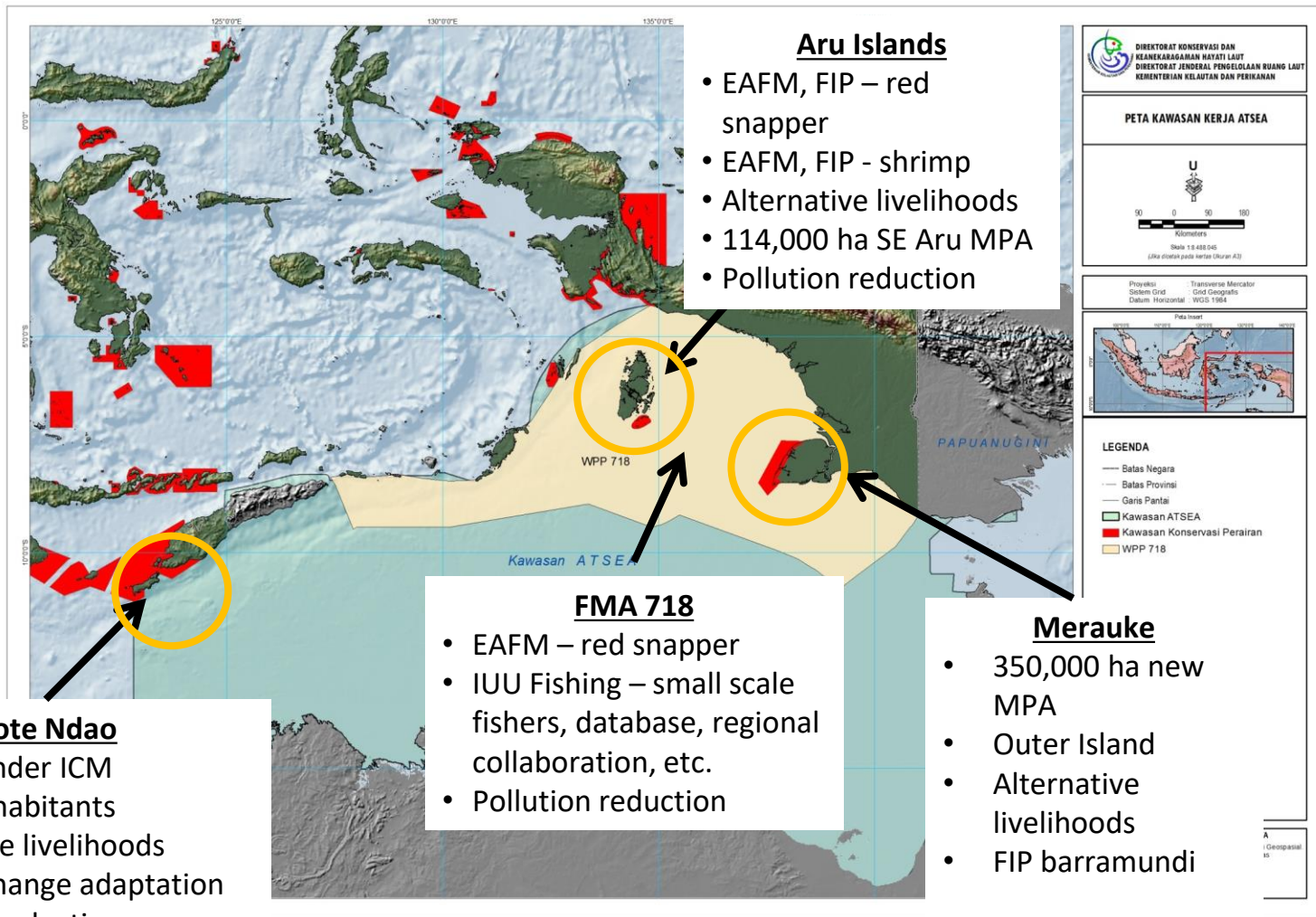
3.2 To prevent and reduce pollution from marine sources (ports and shipping)

4.1 To reverse the decline in threatened and migratory marine species (such as turtles, dugongs, seabirds/ shorebirds, sea snakes, sharks and rays) in the ATS region

5.1 To promote the adaptive capacity and resilience of coastal and marine ecosystems and reduce vulnerability of local communities to climate change



Site Selection



Aru Islands

- EAFM, FIP – red snapper
- EAFM, FIP - shrimp
- Alternative livelihoods
- 114,000 ha SE Aru MPA
- Pollution reduction

DIREKTORAT KONSERVASI DAN KEANEKARAGAMAN HAYATI LAUT
 DIREKTORAT JENDERAL PENGELOLAAN RIANG LAUT
 KEMENTERIAN KELAUTAN DAN PERIKANAN

PETA KAWASAN KERJA ATSEA

U
 0 50 100
 Kilometers
 Skala 1:8.488.045
 (Jika diukur pada kertas ukuran A3)

Proyeksi: Transverse Mercator
 Sistem Grid: Grid Geografis
 Datum: Horizontal
 WGS 1984

Peta Inset

LEGENDA

- Batas Negara
- Batas Provinsi
- Garis Pantai
- Kawasan ATSEA
- Kawasan Konservasi Perairan
- WPP 718

A
 (Geopassat)
 IS

Rote Ndao

- 102 km under ICM
- 86,400 inhabitants
- Alternative livelihoods
- Climate change adaptation
- Pollution reduction

FMA 718

- EAFM – red snapper
- IUU Fishing – small scale fishers, database, regional collaboration, etc.
- Pollution reduction

Merauke

- 350,000 ha new MPA
- Outer Island
- Alternative livelihoods
- FIP barramundi



Challenges

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1. Need regional body or institution that manage to lead the update of SAP objective progress
 2. Regional team are not established yet to support regional delivery
 3. Changing of new Marine and fisheries program priorities after presidential election
 4. Need to refresh and socialize the SAP objective to National and province government
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