European Research Area for Climate Services ERA4CS - Transnational Collaborative Research Projects 2016
Topic A - Researching and Advancing Climate Services Development by Advanced co-development with users

User workshop in French Polynesia

Main outputs of the two-days workshop with Polynesian stakeholders

22-23 March 2018, Papeete

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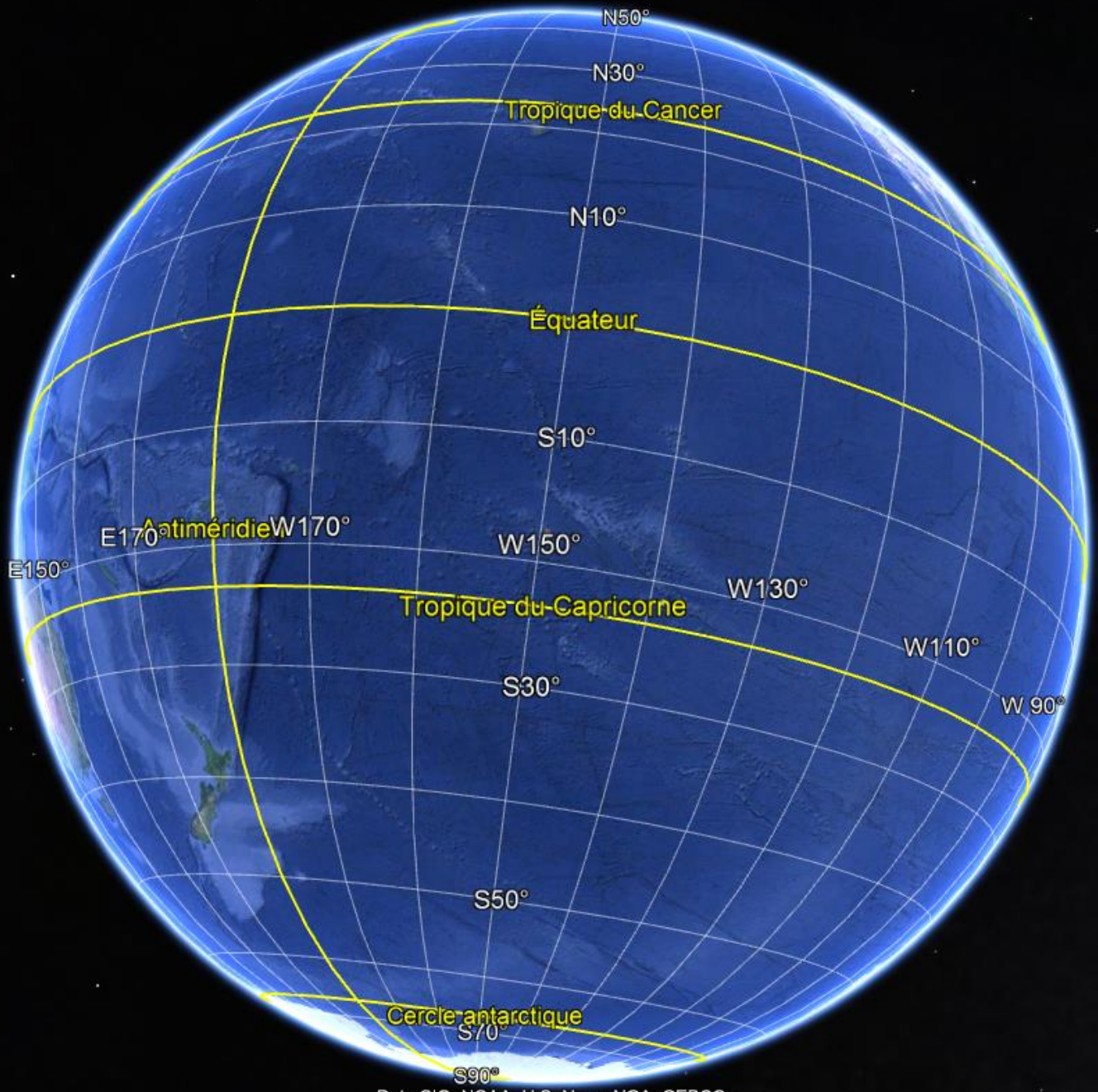


Data SIO, NOAA, U.S. Navy, NGA, GEBCO
Image Landsat / Copernicus
Image IBCAO

Google Earth

French Polynesia

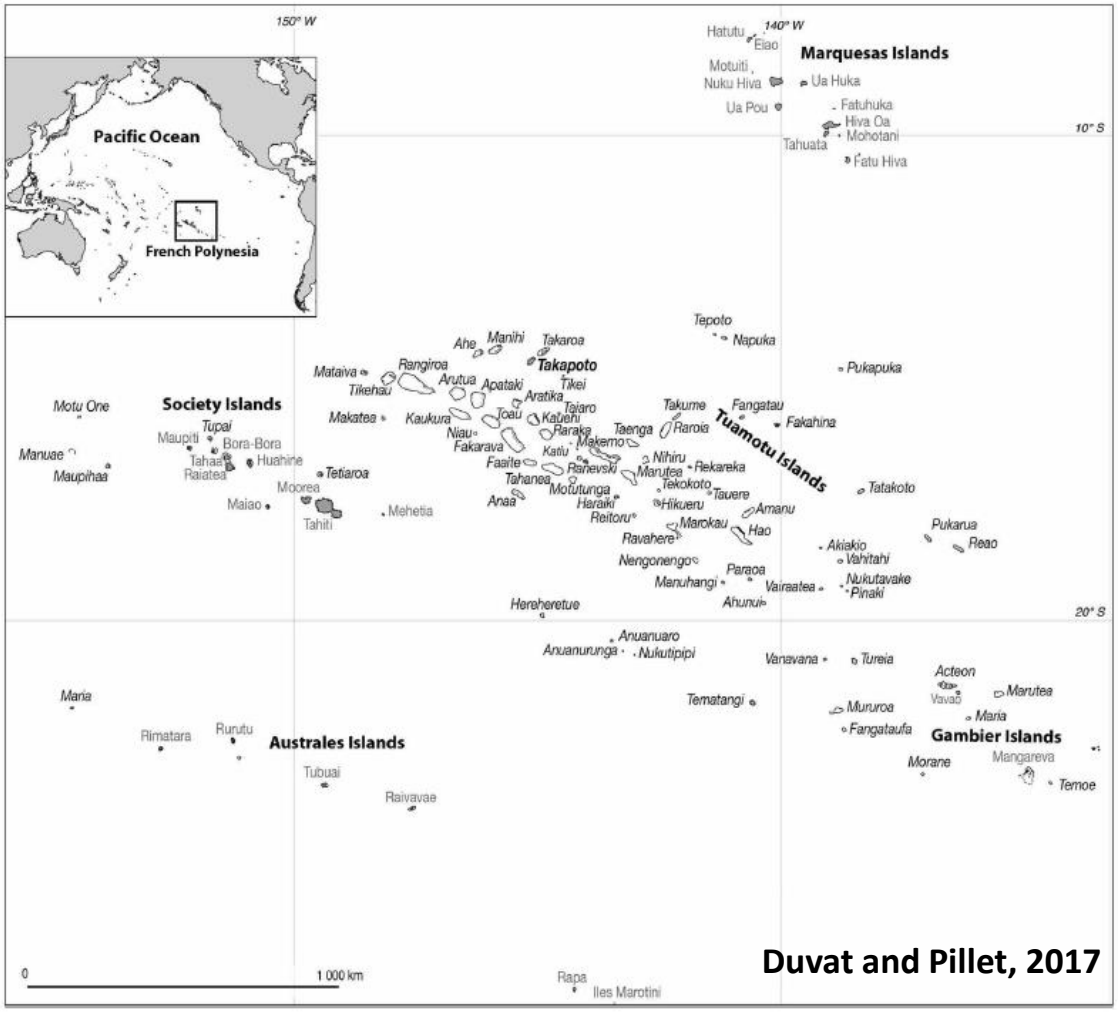
- 277,000 habitants
  - 170,000 in Tahiti
  - 16,000 in the Tuamotus
- 4200 km^2 of land over 2,5M km^2
- 118 islands in 5 archipellagoes

Governance context

- French autonomous overseas territory: local government, French High Commission and State services established locally and a local assembly

Scientific community established locally:

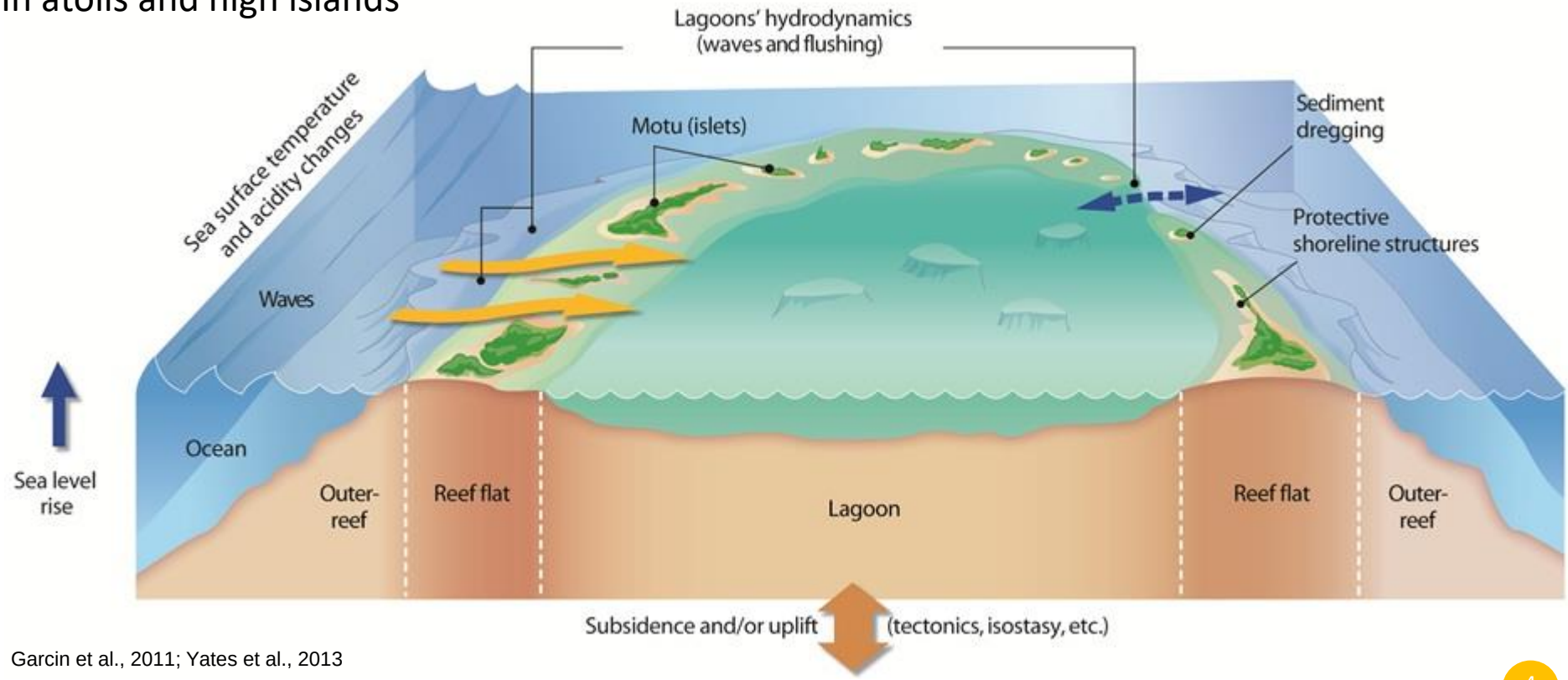
- Coral ecosystems, land ecosystems, geodesists… in the university of French Polynesia, institutes established locally or with a local antenna (Criobe, Ifremer, SHOM, BRGM…) and local companies (e.g., Creocean…)



Issues related to sea level rise

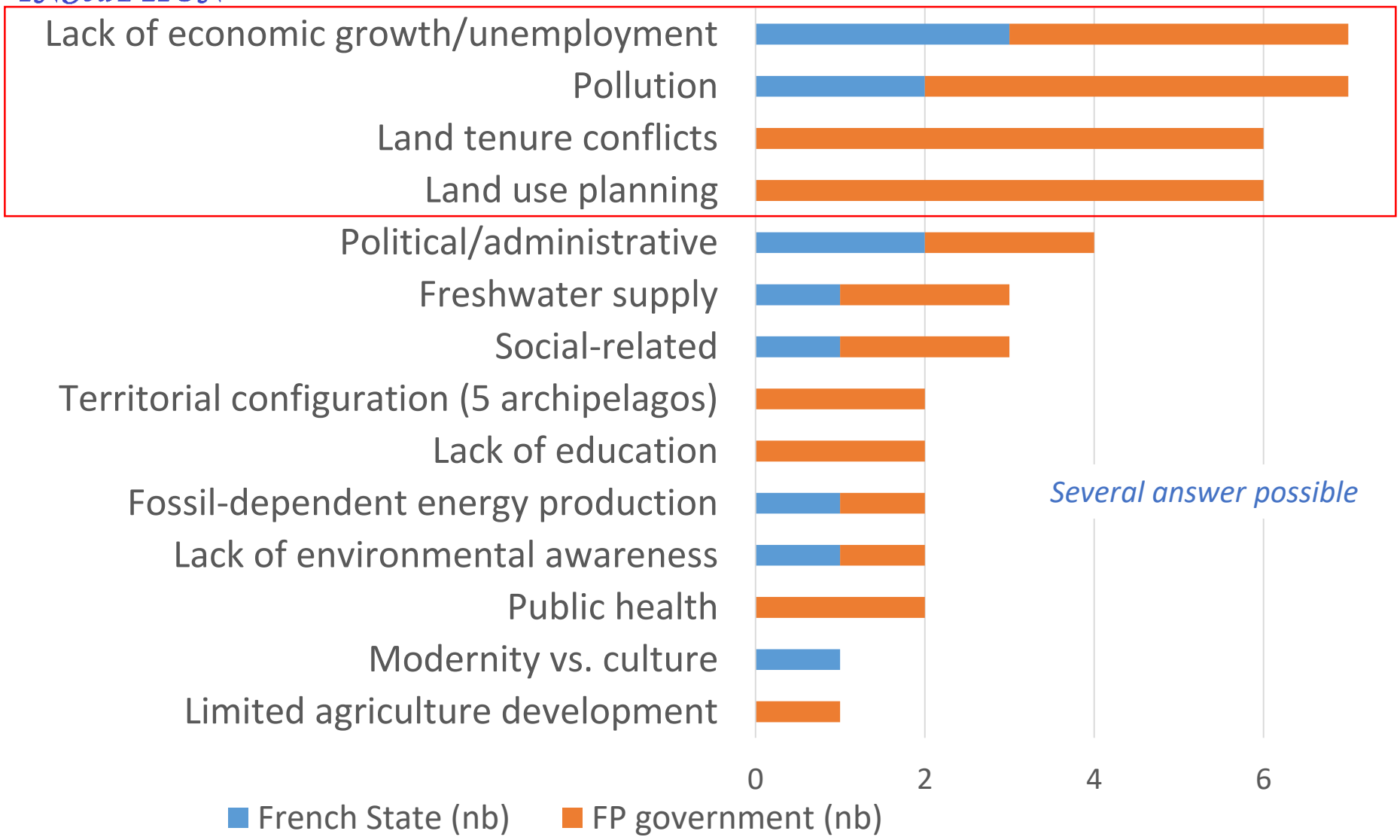
- Flooding: cyclones, seasonal waves, lagoon flushing
- Erosion and shoreline change
- Groundwater resources

In atolls and high islands



Garcin et al., 2011; Yates et al., 2013

Results from interviews: issues in French Polynesia



Several answer possible

Climate change is not perceived a major problem yet, despite interest in science information

Terorotua et al., forth.

2nd user workshop: 22-23rd March 2018

2 days

50 participants

30 different institutions or departments represented (State or Territory)

1 plenary session

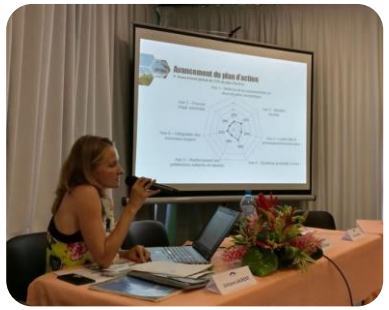
1 round table discussion

2 thematic workshops

Organization by the project team *made up of members of Créocéan-La Rochelle, UMR LIENSs (Univ. La Rochelle-CNRS), BRGM-Orléans,* ***with strong support from local agencies in Polynesia*** *in Créocéan-Pacifique and BRGM- Tahiti.*

10 Coastal Climate Services

→ *to better identify the* ***needs for scientific information*** *and to* ***define tailor-made climate services for coastal adaptation*** *in French Polynesia*



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Coastal climate services co-designed with workshop participants

Report

http://inseaption.eu/

Coastal climate services co-designed with workshop participants

→ *As an outcome of the workshop, 10 coastal climate services were co-designed:*

CCS 1
Sustainable development goals: performance indicators

CCS 2
Access to adaptation finance

CCS 3
Critical infrastructures and sea-level rise (airports and ports)

CCS 4
Professional training and new jobs

CCS 5
Erosion of recreational beaches

CCS 6
Habitability of low-lying atoll reef island (water resources and other vital resources, coastal risks, economic activities…)

CCS 7
Nature-based and Polynesian culture-based solutions

CCS 8
Participatory science to support the observation of impacts

CCS 9
Co-construction and sharing of knowledge (schools, associations, inhabitants)

CCS 10
Promote sustainable aggregate mining practices

For each CCS: a leader/facilitator, major proposals, and key partners have been identified

Conclusions

Some needs are already well formalized
(e.g., critical infrastructures, training)

Other needs are emerging, and require further interactions with users
(habitability, nature based solutions…)

INSeaPTION works on both type of needs, either with a stronger focus on physical science or interactions with users

INSeaPTION

Mauruuru ! Thank you!

Polynesia case study:

LIENSs
UMR 7266
LIttoral ENvironnement et Sociétés

creocean
Environnement & océanographie

Géosciences pour une Terre durable
brgm

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Review of the main challenges highlighted by stakeholders

What are the barriers but also the tracks for the construction of relevant climate services?

Data needs

→ at different time scales,
→ to identify elements related to climate change in the short as well as in the longer term

+ Needs for further works on:

→ Events of high frequency / low amplitude and their impacts:
→ Strategy with regard to cyclonic risks

+ Finance and costs of sustainable development and adaptation

→ today, climate change is not a financial opportunity in French Polynesia (vs. Maldives, and other territories): could explain the weak mobilization on this subject?

→ Better access (knowledge) to adaptation finance could help to increase interest

+ Education and awareness is needed in the area of sea level rise and climate change

Concerns from critical infrastructures (airports and harbours)

Ecosystems and nature-based solutions, rather than costly engineering solutions

+ Needs in collaborations to ensure the quality of climate services rendered: manage the complementarities of the people/stakeholders involved!

Needs for better coordination of research and observations (Climate Energy Plan in particular), scientists and adaptation actors