## Comoros Annex I. Areas of concern

From version: Fouad\_MEDA comoros - English 'small'

# 2.3 Marine and Coastal Geology and Geomorphology

Coastal Erosion
Mining Operations (Use of Minerals)

# 2.5 Physical Oceanography

## 2.5.2 Tidal regime and waves:

Storm surges, flooding, extreme waves

#### 2.5.3 Sea level change

Small developing island states such as the Union of Comoros are facing serious problems such as climate change causing a rise in sea level and thus compromising their ability to implement effectively the Millennium's Development Goals. The Comoros are experiencing a very serious rise in sea level. Within a 20 year period nearly 30 to 40 meters of land were taken by the sea in many places such as Mitsamiouli in Grande Comoro, Sambia, Nioumachoi Fomboni in Mohéli, and the Ouani area near the airport, and Mirontsi and Domoni in Anjouan.

There are no official and reliable data sources measuring the state of encroachment of the sea in the Comoros other than the observations made and photographs. Data such as mapping the coast of the Comoros might give an effective assessment of the level of encroachment of the sea.

#### 2.5.4 Ocean Temperatures:

Coral bleaching, Fish mortality, Loss of colour, and hence value in seaweed products.

# 2.7 Coastal zone and continental shelf

### 2.7.1 Description and extent of coastal and marine habitats

- Bleaching,
- Acidification,
- Destructive fishing methods e.g. Dynamite fishing, IUU fishing (Illegal, Unreported and Unregulated), trawling
  - Coral mining
  - Sand mining
  - Seaweed clearing / beach cleaning
  - Urban expansion
  - Nutrient loading

### 2.7.2 Productivity of the coastal zone (corals, mangroves, seagrass beds)

- Overharvesting
- Unsustainable mangrove harvesting
- Pollution
- Sedimentation
- Sea level change
- Ecosystem health
- Extraction of natural coastal materials for construction (corals, sand, pebbles),
- Certain destructive fishing techniques (dynamite fishing, plant poison such as Tephrosia and fishing on foot at low tide),
- Erosion of the catchment area bringing lots of soil,
- Pollution associated with coastal urbanization (deposits of household garbage and urban waste as well as hydrocarbons),
- Business or tourism related activities (coral and shell trade/traffic)
- bleaching linked to the rise in water temperature caused by climate disturbances

# 2.9 Macrofauna (state of biological knowledge)

## 2.9.2 Fishing and Fisheries Resources

- Exotics
- Pollution (refer to 2.9.5)
- Destructive fishing methods e.g. trawling, dynamite fishing
- Effects of aquaculture
- Habitat destruction

On land and at sea due to human interaction other than fishing activities In Comoros, fisheries are not well developed; threats on marine turtles are mostly due to coastal human activities. Habitat destruction by sand and stone sampling on nesting beaches for construction, discharge of ground water on marine turtles habitats (coral reefs, seagrasses, beaches) due to deforestation and local communities poaching are the most important pressures. Despite large sensitizing programs, environmental teachings at school and coastguards or community surveys, poaching of green turtle for its meat and eggs is still current. A traditional trade for turtle meat is still active between Anjouan and Moheli and compound most of the sampling that we estimate to several hundreds a year in particular during the nesting peak on Nioumachoi Islets or isolated beaches. Local initiative and understanding of Itsamia's village population are so high that the whole community fight actively against poaching.

Few data are available on fisheries in Comoros and offshore fisheries can not be actively controlled because of lacks in capacity to observe fisheries as EU fisheries or foreign licensed fisheries. Nets are used only on the coastline near the coral reefs and damage lots of coral area, reducing resources and probably capturing some turtles.