

POSTER-STUDENT PRESENTATION

Topic/submission theme: Marine Biodiversity and Threatened Marine Species

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Title: Spatial distribution of seagrass beds between Ifaty and Mangily (Ranobe Bay South West of Madagascar)

Seagrass meadows are poorly studied and little known in Madagascar, we meet them on the northwest and southwest coasts of Madagascar. In 2016, (April-June), a study on « the spatial distribution of seagrass beds between Ifaty and Mangily (Ranobe Bay South West of Madagascar) were made. This study aims to define the characteristics and the areal extents of seagrass meadows between Ifaty and Mangily. This was done by the analysis of satellite imagery for the mapping and field survey. During this study, eight species of seagrass were identified: *Halophila ovalis*, *Thalassia hemprichii*, *Syringodium isoetifolium*, *Halodule uninervis*, *Halodule wrightii*, *Cymodocea serrulata*, *Cymodocea rotundata* and *Thalassodendron ciliatum*. The meadows formed by these species can be monospecific, mixed and with algae with a general recovery rate between 0 and 50% corresponding to a herbarium arranged in patch. The specific composition and their distribution varies depending on the substrate and the depth. All species except *Thalassodendron ciliatum* are found on a muddy substrate and in shallow areas. The analysis of satellite image between Ifaty and Mangily has made it possible to map the seagrass meadows occupying 106,105Ha. Classified according to their density, the sparse seagrasses dominate with a surface of 48,062 Ha then those which are dense (40,988 Ha), and finally those which are moderately dense (17,055 Ha). Taking into account the good ecological status of these beds and their vulnerability, it is necessary to establish a management to preserve these ecosystems.

Keywords: seagrass, distribution, mapping, Ifaty, Mangily