



Assessing the main threats to marine ecosystem components of the Adriatic – Ionian Region for the implementation of Maritime Spatial Planning

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Marine and coastal ecosystems and the related benefits they provide for humans are threatened by increasing pressures and competing usages. To address these issues, in the last decade, several EU legislations have been formulated to guarantee and promote sustainable use of the sea (e.g. Common Fishery Policy, Marine Strategy Framework Directive, Maritime Spatial Planning). As a first step to implement cross-border Maritime Spatial Planning (MSP) in the Adriatic – Ionian Seas, a review of the main anthropogenic pressures due to maritime activities involving the Adriatic – Ionian Region (AIR) as well as of the most relevant environmental components has been carried out. The main objective of the analysis is to better identify the spatial distribution of human uses of the sea and of the key environmental components and the ecosystem services provided. The analysis of the existing conditions includes a description of the human activities per economic sector, considering type, location, dimension and magnitude of the activity in the AIR and the spatial extent of the main environmental and ecological values present in the AIR. The environmental status has been characterized according to the descriptors proposed by the Marine Strategy Framework Directive (MSFD Directive 2008/56/EC) and the most sensitive ecosystem components in the AIR have been pointed out. A qualitative analysis of the relationships between good environmental status descriptors sensu MSFD and ecosystem services in the AIR has been carried out to provide useful information for the implementation of MSP. Cross-border Maritime Spatial Planning is particularly needed in a semi-enclosed basin such as the Adriatic Sea, hosting very diverse human activities, ranging from fishery to tourism, sand extraction, commercial and passenger transport, oil and gas exploration and exploitation, which may partially overlap and severely threaten ecosystem functioning and the associated services.