



MODENERLANDS'25
CA20109 International Conference



Modular Energy Islands for Sustainability and Resilience

Book of Abstracts



Renewable Energy Production in the Mediterranean: Exploring the Potential for Offshore Wind Development

Teresa Simões^{1*}, Maria Tsami², Felix Nieto³ and Nejan Huvaj^{4,5}

¹ Laboratório Nacional de Energia e Geologia (LNEG), Lisbon, Portugal

² Department of Economics, School of Economics and Regional Studies, University of Macedonia, Thessaloniki, Greece

³ Center for Technological Innovation in Construction and Civil Engineering, University of A Coruña, A Coruña, Spain

⁴ Civil Engineering Department, Middle East Technical University, Ankara, Türkiye

⁵ METU Center for Wind Energy (RUZGEM), Ankara, Türkiye

*E-mail: teresa.simoese@lneg.pt

Abstract. This study presents an overview of the current state of the Maritime Spatial Planning among the Mediterranean countries, explores the previous studies on evaluating the offshore wind potential of the Mediterranean region along with the criteria for suitable site selection. Based on a review of the current state of offshore renewable energy, the potential locations offshore wind will be explored for the Mediterranean coastline case study area. The research concludes with a set of critical considerations related to the need for proper synergies establishment among different stakeholders and for cultivating social acceptance and community engagement. The analysis aims to support decision-makers evaluating the potential of the Mediterranean coastal area in supporting the energy transition goal.