

# COLLABORATIVE LAND-SEA INTEGRATION PLATFORM

## Multi-Actor Lab 5 – Danube's Mouths – Black Sea

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### **COASTAL-RURAL SCOPE & CHALLENGES**













### LAND-SEA INTERACTIONS (QUALITATIVE ANALYSIS)

MAL 5



#### COASTAL CILAND-SEA SYSTEM (QUANTITATIVE ANALYSIS)

Model's scope - To explore alternative scenarios to improve the quality of life and sustainability within Danube Delta Biosphere reserve and its marine waters (Black Sea) as one of the most impacted area along the Romanian littoral.

Transition to intensive aquaculture – increasing productivity and allocated areas

• Designs the **impact** that increasing productivity in the fish farm sector has on the **water quality** 

### Transition to eco-farming

 The agriculture model considers the increasing farmers' welfare through their cooperation sharing their assets and integrated production that ensures sustainable agriculture by adjusting agricultural practices and the use of alternatives over time, considering new knowledge and new methods.

Transition to slow tourism

• This model focused the number of tourists, which influenced the tourism **development**, but also the tourism **decline**.



Lazar et al., 2022, under review

## COASTAL LAND-SEA SYSTEM (QUANTITATIVE ANALYSIS)

Model's scope - To explore alternative scenarios to improve the quality of life and sustainability within Danube Delta Biosphere reserve and its marine waters (Black Sea) as one of the most impacted area along the Romanian littoral.

- The integrated model was designed to examine the cumulative impacts of individual sectoral development in different socio-economic and climate change scenarios and environment management interventions.
- Whilst the three models differ in problem scope, they are linked to the project's main objective by the impact of developing each activity on the water quality.
- Designed as strategic policy tools with a long-time horizon of decades to address the sustainable development of the Danube Delta which is a dual challenge - to protect its unique natural and cultural assets and meeting the aspirations of the inhabitants to improve their living conditions and seek better economic opportunities.



Lazar et al., 2022, under review



### **ROAD MAPS / POLICY RECOMMENDATIONS**

D. Increasing knowledge, awareness and action on environmental pressures to reduce river pollution

C. Strengthen the productivity and profitability of **aquaculture** based on environmental performances

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A. Increasing the sustainability of *agriculture* and promoting the integration of producers in the agri-food sector in the value chain



- Priorities To use the methodology in the typical decision-making process for Danube Delta sustainability - defining the problem, gathering information, identifying alternatives.
- **Opportunities** To apply COASTAL methodology in other types of **land-sea interactions** actions MSP, ICZM.
- Challenges To continue. Let's apply the "snowball" method in the case of policymakers, too. We could not reach everyone, but we can try ; transforme the methodology into a strategic tool.
- Expectations To facilitate stakeholders meetings for choosing among the alternatives, and reviewing/monitoring the results.









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