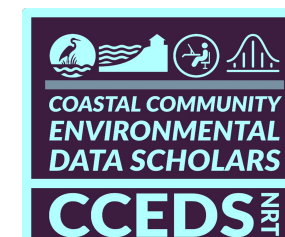


Marine Energy Stakeholder Engagement: Proposing MSP Challenge Board Game Workshops for AMEC Stakeholders

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Beginning in Spring 2025, the AMEC Engagement Team invites stakeholders to learn about ME in the context of the MSP Challenge Board Game.



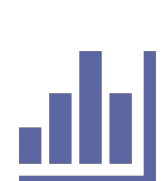
BACKGROUND

The introduction of new ocean uses like **marine energy (ME) acts as a catalyst for marine spatial planning (MSP)** (Flannery et al., 2018) and stakeholder engagement in complex socio-ecological systems requires:

- co-learning in complex socio-ecological systems, and
- two-way communication among decision makers and experts, including local knowledge holders and industry professionals (Cash et al., 2003; Hurlburt & Gupta, 2015).

However, MSP driven by industry may result in the reallocation of ocean space without the input of local communities due one-way communication and lack of knowledge sharing (Flannery et al., 2018; Jones et al., 2016).

Therefore, the Atlantic Marine Energy Center (AMEC) Engagement Team **proposes to engage ME stakeholders in workshops featuring the MSP Challenge Board Game** to promote co-learning and two-way communication about the use of space and integration of ME.



The MSP Challenge Board Game

Serious games aim to **facilitate co-learning and two-way communication among participants**, providing a benefit during the game and potentially improving an individual's knowledge after (Sousa et al., 2022).

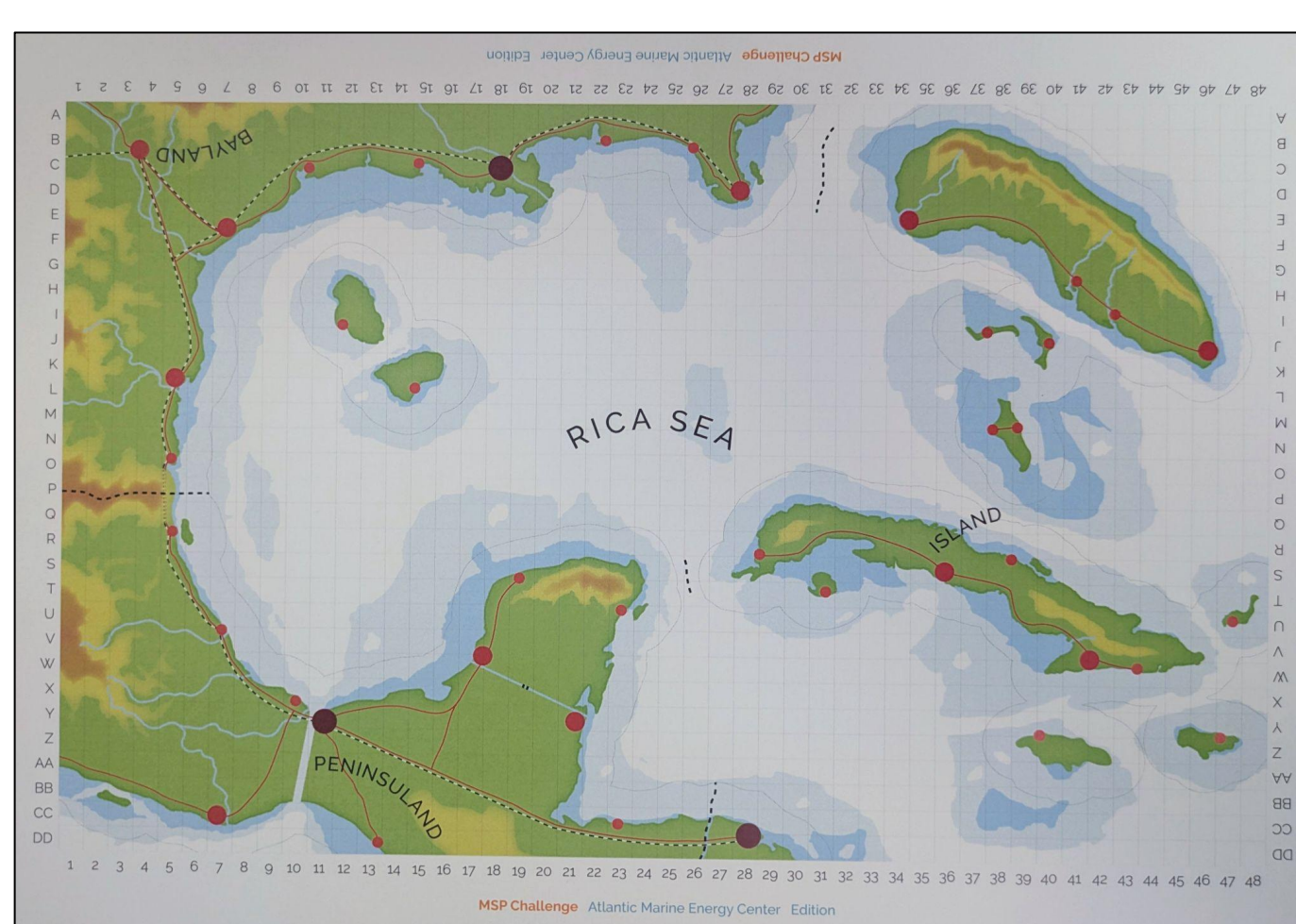


Figure 1: The MSP Challenge Board Game presents a fictionalized seascape shared by three countries: Bayland, Penninsuland, and Island

The MSP Challenge, a serious game, is a tool for stakeholder engagement in the allocation of coastal resources and marine space (Abspoel et al., 2021; Keijser et al., 2018).



Figure 3: Tiles in the MSP Challenge represent different human uses of the ocean, including tourism, marine energy, fishing, and research



OBJECTIVES

Overall, the AMEC Engagement Team seeks to engage ME stakeholders of diverse identities that promotes:

- two-way communication between individuals of different expertise
- co-learning about the uses of space and consideration of ME

The intention of collaboration among stakeholders guides our workshops featuring the MSP Challenge.

Research questions:

- Does the MSP Challenge help AMEC stakeholders learn about ME?
- How do participants interact with ME over the duration of the MSP Challenge?
- What intentions do participants express regarding their future involvement in marine energy activities after engaging with the MSP Challenge?



Figure 2: Players are assigned a role that does not match up to their real-life identity

The MSP Challenge is ideal for the AMEC stakeholder engagement:

- Board game features a fictionalized seascape (Fig. 1) and can be used in any coastal context
- Participants take on roles requiring co-learning (Fig. 2)
- A range of human uses and non-human conditions can be considered (Fig. 3)
- Game components highlight land-sea interface, as well as complex coastal systems (Fig. 4)



Figure 3: The MSP Challenge connects offshore activities like commercial fishing to land using twine to symbolize the route for transporting catch



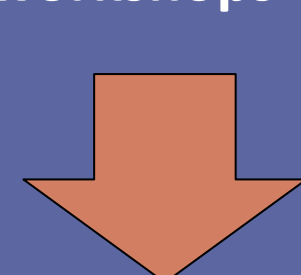
DIVE IN WITH US!

Connect across stakeholder groups and engage with the broader community in our marine energy workshops featuring the MSP Challenge Board Game.

1 Join the AMEC Universe!

Members automatically receive invitations to our workshop events

2 Share your ideas for stakeholders to invite to workshops



- ME sector stakeholders (R&D and government)
- Stakeholders and users of the marine environment where ME may be located



METHODS & ANALYSIS

Surveys:

- pre-and-post game surveys administered through Qualtrics
- Non-parametric analysis, such as a Mann-Whitney U test (Jean et al., 2018)

Focus Groups:

- Immediately after game, approx 60 mins
- Recorded, transcribed, and thematically coded

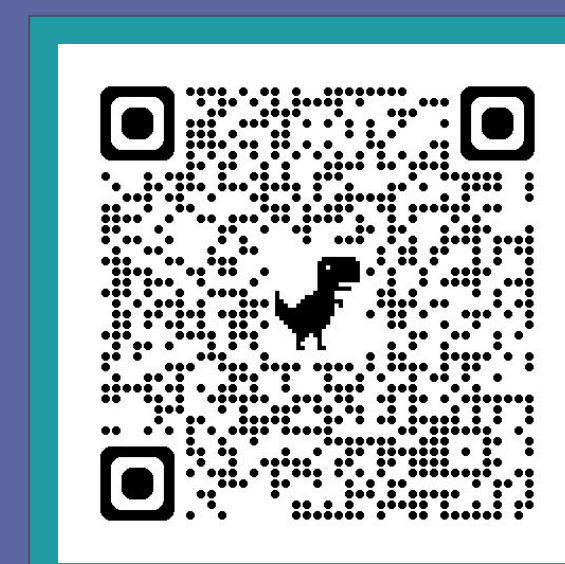
Game Maps:

- Game maps created by individuals and post-play game board, digitized
- Comparative GIS analysis between individual inputs and group output



RECOMMEND A WORKSHOP LOCATION

We need your help! Follow the QR code to recommend locations for AMEC workshops featuring the MSP Challenge Board Game



Examples of locations or partners include:

- Colleges and universities with relationships to coastal communities
- NGO with a volunteer base
- Conferences with a focus on Blue Economy, ME, or MSP
- Annual meeting of any type of ME stakeholder

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