

# **Understanding Stakeholders Perception about Offshore Wind Power and Proposing Innovative Frameworks to Enhance Participation in Resource Planning and Development**

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In its latest report, Intergovernmental Panel on Climate Change (IPCC) describes anthropogenic CO<sub>2</sub> emissions from energy supply sources as the leading cause of radiative forcing (IPCC, 2007). Deep reductions from the present emission levels are required to avoid making a permanent commitment to global warming. Large scale renewable energy installations such as offshore wind power can decarbonizes the energy supply at competitive prices. Initial estimates suggest presence of a very large wind resource along the US East coast, enough to meet all the energy demands of the area (Kempton et. al. 2007).

Offshore wind power is a novel ocean use and till date five utility scale projects have been proposed in the country, including a 600 MW installation in Delaware. The placement of stationary structures in the ocean floor is more complicated than a similar enterprise on land. Oceans are a common pool resource (CPR) controlled by the national and state governments, serving a multitude of stakeholders through provision of resources such as fishery, recreation. Previous studies at specific locations indicate that many stakeholders perceive offshore wind turbines will negatively impact some of the existing uses such as commercial and recreational fishing and tourism (Firestone & Kempton 2006). This research proposes to expand on the earlier efforts to:

- Understand stakeholder perceptions about offshore wind power in the Mid-Atlantic Bight.
- And, propose innovative frameworks to enhance stakeholder participation in offshore wind power resource development planning and decision making.

The study proposes to use a three level theoretical framework, adopting from cognitive anthropology, situated rational choice theory and integrated coastal management components to understand stakeholders worldview, perceptions, risk evaluation and underlying motivations for positions on marine renewable energy development in general and offshore wind power in particular. The understanding of stakeholder perception will form the basis for innovative participation and resource management frameworks. It is hoped that this research will enhance the debate on this novel energy medium resulting into policy formulation and resource development practices that balances the economic demands with environmental and social benefits.