Planning for Offshore Energy Development:

How Marine Spatial Planning Could Improve the Leasing/Permitting Processes for Offshore Wind and Offshore Oil/Natural Gas Development

June 2013



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This white paper was commissioned by the New Venture Fund's (NVF) Fund for Ocean Economic Research (FOER).
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EXECUTIVE SUMMARY[1]

America's Offshore Energy Resources: Opportunities and Realities

At first blush, development of offshore fossil fuels (such as oil and natural gas) and renewable energy (like offshore wind) could not be more different. But when it comes to developing these varied offshore energy resources, they have more in common than initially meets the eye:

- The United States has a huge potential, domestic resource base for both offshore oil/gas and offshore wind.
- Private companies must obtain a complex set of federal government approvals in order to gain access to develop offshore energy resources located in the US Outer Continental Shelf (OCS).
- The Department of the Interior (DOI)/Bureau of Ocean Energy Management's (BOEM) leasing/plan-approval processes are still evolving. Important changes were introduced for oil and gas in the aftermath of the Macondo accident and oil spill in the Gulf of Mexico; similarly, the processes for permitting offshore wind continues to evolve in light of the relative immaturity of the industry in the United States.
- Some areas of the OCS are now off-limits for energy development, either because of congressional or presidential action or the fact that they were not included in the DOI's leasing program for 2012-2017. Most parts of the Atlantic, the Eastern Gulf of Mexico, and Pacific coast areas of the contiguous 48 states are now closed to development of oil and gas resources, and only a few designated Wind Energy Areas in the Northeast/Mid-Atlantic OCS are open for offshore wind development.
- Offshore energy development occurs in a very "busy" context, with energy resources located in areas where there are many other uses of the ocean (including valuable commercial fisheries, military areas, shipping lanes, recreational areas, and sensitive ecological areas).
- Offshore energy development is often controversial, in light of these multiple and overlapping uses.
- The federal leasing/permitting process is extremely complex and less efficient than it could be.
- Ocean energy development requires extreme tenacity because the process is so technically complex, time-consuming, and touched by so many federal and state laws and agencies.
- Typically, offshore energy development communities are not familiar with developments in ocean policy or marine spatial planning, which also may affect development (and vice versa).

The New Venture Fund's (NVF) Fund for Ocean Economic Research (FOER) engaged an Analysis Group team, led by Dr. Susan Tierney, to prepare an independent white paper analyzing the current regulatory environment for developing energy resources located in the ocean waters in the United States. A central issue of interest to FOER was the potential for ocean planning to provide for greater efficiency in the processes governing access to and permitting of energy infrastructure in the ocean without compromising environmental protection. The Analysis Group team examined these and other related issues by researching and analyzing current regulatory frameworks and processes for accessing ocean-based energy resources. For oil and gas development, the focus was on activities in the Gulf of Mexico, where there is a long history of development but where important changes have occurred after the 2010 Macondo accident and oil spill. For offshore wind, the focus was on the Mid-Atlantic region where there is strong interest in resource development. The Analysis Group team collected information from publicly available sources, and conducted interviews with individuals (from the private sector, from government agencies, and from environmental organizations) directly involved in or familiar with the relevant regulatory or planning processes. This paper contains the Analysis Group team's recommendations based on that research, which was completed in December 2012.

[1] Photo credits: Offshore oil rig, http://www.evworld.com/article.cfm?storyid=1153; Ocean photo, John T. Tierney; Offshore wind turbines, http://www.2050publications.com/140000-offshore-wind-turbines-enough-to-supply-one-third-of-us-power-needs-study- concludes/.

Marine Spatial Planning: Understanding What's Happening in the Oceans

Ocean planning, also known as Marine Spatial Planning (MSP) refers to a suite of approaches that provide for understanding, evaluating, assessing, and siting of ocean uses. In simplest terms, MSP involves transparent and open processes for fostering better understanding among stakeholders about what is happening in ocean areas, about what resources and human uses are located where, and about implications of changes in uses of the resources located in the ocean. MSP has been used around the world at the national, regional, and state level. MSP processes had already started in many states and regions of the United States prior to the July 2010 Presidential Executive Order that named MSP as one key component of the National Ocean Policy.

Connecting the Dots between Ocean Planning and Offshore Energy Development

Ocean planning could improve the efficiency of various aspects of the leasing and permitting processes for offshore energy development, even under current regulatory frameworks. This could occur through:

- Improved quality and quantity of location-specific technical information.
- Improved coordination and leveraging of information collection and mapping efforts across federal agencies, across states in regional contexts, and across federal/state efforts.
- Improved access to location-specific information for federal and private-sector decision makers, and for other interested stakeholders (including the states, other ocean industry groups, environmental organizations, and others).
- Improved quality and quantity of public and private participation in determining the disposition of ocean resources by bringing parties together early in the process and identifying issues that need to be addressed when determining whether and how to allow energy development projects.
- Improved efficiency of public and private expenditures devoted to information collection/analysis and project permitting, while reducing regulatory risk.
- Enhanced state/federal cooperation on ocean resource development and protection objectives.
- More proactive and less reactive government decision making.
- Constructive pathways through which the federal government could consider whether, and if so, how to open up particular areas of the OCS for energy development.

Recommendations: Better Planning for Better Permitting/Development of Offshore Energy Resources

Key recommendations for improving the efficiency of permitting with support from ocean planning:

- Convene members of the ocean energy development/ protection communities and those in ocean planning communities to share information and to educate each other on different perspectives.
- Use ocean energy issues to pilot new ocean planning processes of the National Ocean Council.
- Use ocean planning as a predicate to opening up areas of the OCS for offshore energy development, and as a critical pathway toward engaging stakeholders on access issues.
- Use ocean planning processes more formally, in structured and institutionalized manners, to identify ways to streamline and coordinate permitting processes across agencies.
- Use ocean planning to identify and prepare a roadmap to fill gaps in baseline scientific and technical information relevant for permitting of offshore energy facilities.
- Use ocean planning to consider changes in the BOEM wind area leasing process.

Areas for further research and inquiry beyond this study

Useful areas of further analysis include:

- Legal analysis and process roadmap relating to the potential for greater tiering of National Environmental Policy Act (NEPA) environmental reviews for offshore energy leases/development plans (including standards for determining whether, and if so, when and how to allow categorical exemptions from the NEPA process).
- Similarly, legal analyses and roadmaps to allow for tiering of applications and reviews under other statutes (such as Coastal Zone Management Act, Marine Mammal Protection Act).
- A study of best practices and lessons learned from state/regional/federal ocean-planning approaches, especially as applied in permitting contexts.
- Studies identifying ways to develop *quid pro quo* requirements and study protocols that accompany government decisions to allow companies to access off-limit areas for scientific studies and collection of technical data (e.g., seismic studies).