December 16, 2021

Submitted via: http://www.regulations.gov

Amanda Lefton, Director
Tershara Matthews, Chief, Office of Emerging Programs
Bureau of Ocean Energy Management
U.S. Department of the Interior
amanda.lefton@boem.gov
tershara.matthews@boem.gov

Re: BOEM-2021-0077, Call for Information ("Call")
Offshore Wind Leasing in the Gulf of Mexico
86 Fed. Reg. 60,283 (Nov. 1, 2021)

Dear Ms. Lefton and Ms. Matthews:

The National Ocean Industries Association ("NOIA") appreciates the opportunity to provide comments on the above-referenced Call by the Bureau of Ocean Energy Management ("BOEM") for offshore wind leasing in the Gulf of Mexico. An almost 50-year-old organization, NOIA represents all segments of the offshore energy industry. This includes leasing and development of traditional fossil fuels such as oil and gas, primarily in the Gulf of Mexico, but also important new sources of energy like offshore wind. Further, our members include not just energy developers, but also the businesses large and small that do the work of building, supplying, and maintaining these projects. In other words, we represent thousands of blue-collar and white-collar employees stretching from New England to the Gulf Coast and across the nation. In fact, NOIA members have been critical in building out not only the pioneering turbines off the coasts of Northern Europe, but also the limited yet growing number of turbines in U.S. waters.

NOIA *strongly* supports ongoing attempts to build new offshore wind resources in federal waters. That support extends to efforts to pursue offshore wind leasing and development on the Outer Continental Shelf ("OCS") in the Gulf of Mexico. We believe offshore wind projects are vital to the economic growth of this country and efforts to meet climate goals for the 21st century and beyond. According to a recent report co-sponsored by NOIA, we have an over $120 billion[1] market off America's coasts for wind, including in the Gulf of Mexico. As detailed in that report, forecasted potential lease sales in the Gulf of Mexico may raise as much as $282.8 million in auction revenue and yield as much as 2,400 MW of power, assuming at least two awarded leases of sufficiently sized areas in the initial Gulf of Mexico wind lease sale.

[1] *See* American Clean Power Association, et al., *Federal Revenue and Economic Impacts from BOEM Offshore Wind Leasing* (December 2021), https://cleanpower.org/resources/federal-revenue-and-economic-impacts-from-boem-offshore-wind-leasing/.

In leasing and permitting offshore wind in the Gulf of Mexico, however, BOEM should adhere to certain principles. First and foremost, BOEM should preserve an all-of-the above approach to meet America's vast energy needs. The Gulf of Mexico's unique difference from other OCS regions where BOEM has conducted or is considering wind leasing is the presence of and and continued leasing and development of oil and gas. BOEM's pursuit of offshore wind in the Gulf of Mexico should operate in partnership with oil and gas and with other OCS users in the region. Second, as reflected in the questions raised in BOEM's Call, the success of offshore wind in the Gulf of Mexico depends on sufficient federal and state support to render the economics of offshore wind competitive with other energy sources, which will provide flexibility to enable new renewable energy markets and offtakes. Further, the success of the offshore wind industry in the Gulf of Mexico will be fostered by early and sustained partnerships with all offshore energy developers, the federal government, and the states. This is particularly the case due to the Gulf of Mexico's lower overall levels of available wind resource, prevalence of hurricanes, and relatively slower pace of adjacent state-level incentives and mandates for renewable energy, and specifically for offshore wind. The region has strong expertise in offshore energy production and is uniquely suited to transfer that expertise to the offshore wind industry. Third, and relatedly, BOEM's proposed lease terms must be structured to attract robust bidding and best ensure successful wind development in leased areas. These terms must also facilitate critical activities of service operators, supply chain manufacturers, and other offshore wind job creators, in coordination with state and local programs. Finally, our comments herein offer initial responses to specific questions in the Call, though fuller answers will require further research by BOEM and stakeholders and depend on developments over the coming weeks and months. As such, NOIA reserves the right to amend or supplement these comments as warranted, including in response to any Proposed Notice of Sale by BOEM.

GULF OF MEXICO ENERGY DEVELOPMENT SHOULD REMAIN BROAD-BASED.

NOIA commends BOEM for issuing its current Call for the Gulf of Mexico. BOEM's prior-issued Request for Interest ("RFI") revealed substantial interest in offshore wind leasing in the Gulf of Mexico, including among NOIA's members. *See* 86 Fed. Reg. 31,339 (June 11, 2021), Docket No. BOEM-2021-0041. At the same time, collaboration will be vital to ensure that *all* energy project developers can thrive in the region, and that in turn the federal government, Gulf states, and the public can benefit from that energy production.

As BOEM recognized in its prior RFI, "potentially conflicting uses" of the Gulf of Mexico include "oil and gas leasing." 86 Fed. Reg. at 31,340. NOIA is concerned that the present Call entirely omits any mention of oil and gas. To the extent this omission conveys that offshore wind and oil and gas operations can co-exist, NOIA generally endorses that concept, particularly where oil and gas development does not require above-sea infrastructure on a given OCS lease. However, if the Call's omission of any mention of oil and gas leases in the Gulf of Mexico is instead intended to reflect a shift away from oil and gas leasing in that region, such a change would be manifestly misguided. To be sure, NOIA is among multiple stakeholders challenging the unlawful moratorium on federal oil and gas leasing.

Specifically, to the extent BOEM intends to offer wind leases in any areas in the Gulf of Mexico already subject to oil and gas leases, rights of way, or rights of use and easement, BOEM must ensure that such rights are subordinate to and compatible with existing rights. Indeed, Section 19 of BOEM's standard OCS oil and gas lease form provides that BOEM may later grant wind leases for OCS areas already leased for oil and gas "except that operations under such [wind] leases or grants shall not unreasonably interfere with or endanger [oil and gas] operations under this lease[.]" Similarly, the issuance of an offshore wind lease does not necessarily preclude oil and gas activities in the same area. As reflected in Section 3 of BOEM's standard OCS renewable energy lease form, BOEM reserves the "right to authorize other uses within the leased area and project easement(s) that will not unreasonably interfere with activities described in an approved SAP and/or COP, pursuant to this lease." Such multiple uses may be particularly appropriate to accommodate a subsea oil and gas pipeline right of way, or to authorize reuse of an idle oil and gas platform for alternative energy uses via a right of use and easement. Transparency on key cable crossing issues at the wind leasing stage will minimize interference issues and provide greater certainty to oil and gas and wind developers alike. Another possible opportunity for co-existence is utilizing offshore wind energy to supply offshore oil and gas platforms with power in lieu of on-lease use of generated oil and gas, akin to the Hywind Tampen project in Norway. Overall, BOEM should liberally consider maximum use of the Gulf of Mexico OCS on a lease-by-lease basis to achieve OCSLA's energy generation purposes critical to the prosperity of the nation.

OFFSHORE WIND HAS WIDE SUPPORT, BUT REQUIRES MORE COMMITMENT AND STUDY TO ENSURE VIABILITY AND COMPETITIVENESS IN THE GULF OF MEXICO.

As in other regions, federal and state support are important to the success of offshore wind in the Gulf of Mexico. And there have been many encouraging steps to date, including BOEM's formation of the Gulf of Mexico Renewable Energy Task Force and its first meeting on June 15, 2021, attended by officials of multiple states including Louisiana. Presently, however, the Gulf states lack the same renewable energy mandates, incentives, and agreements as exist in Atlantic and Pacific coastal states. This should not prove to be an insurmountable impediment to development, but it does require BOEM to work closely with state leaders—as well as follow developments at the federal level—to gauge support for the industry going forward.

This is a vital time for the United States' energy and climate future. President Biden came into office with a promise to reduce the carbon-intensity of the American economy and meet our country's goals to avert the worst impacts of climate change. As part of this effort, in the President's first days in office he signed an Executive Order in which he declared a goal of "doubling offshore wind by 2030."[2] Secretary of the Interior Haaland has been equally vocal, for example recently saying, "[T]he demand for offshore wind energy has never been greater. Recent technological advances, falling costs, and tremendous economic potential make offshore wind a promising avenue for diversifying our national energy portfolio, creating good-paying

[2] https://www.whitehouse.gov/briefing-room/presidential-actions/2021/01/27/executive-order-on-tackling-the-climate-crisis-at-home-and-abroad/

union jobs, and tackling climate change...."[3] Quite simply, the goals set by President Biden and Secretary Haaland require auctioning in all proposed lease areas, including in the Gulf of Mexico. There is clear support for offshore wind and an economic opportunity ready to be seized—an opportunity the Gulf is unique in proving its prior ability and current supply-chain capacity to capture.

BOEM's environmental review process for a Gulf of Mexico OCS wind sale, consistent with its prior generated NEPA documents for other OCS wind leases and projects, should also highlight that offshore wind can be undertaken with minimal negative impacts. For example, while there has been no shortage of focus on subjects like marine mammal protection, we remain proud of the notable coordination between developers, their contractors, and the environmental community.[4] Species of concern for East Coast projects, such as the North Atlantic right whale, are far less prevalent in the Gulf of Mexico, whereas other species present in the Gulf of Mexico are well-understood based on decades of offshore energy development experience. Regarding viewshed issues, it has become clear that even fixed-bottom projects can be accomplished without damaging onshore communities. For example, BOEM has concluded that for the Vineyard Wind project that even on a day with excellent visibility "offshore wind projects would appear relatively small to an observer, appearing to be less than 0.1 inch (0.25 centimeter) tall on the horizon."[5] In the Gulf, many offshore oil and gas platforms, including in water depths less than 400 feet, are not discernable from shore. Whether fixed or floating design, we are confident that local concerns can be alleviated, particularly given that by the time Gulf wind projects may be under way we will likely have significant experience with East Coast construction and operations. Likewise, decades of experience have shown that recreational and commercial fishing and energy development can readily co-exist in the Gulf of Mexico. Similar to Gulf of Mexico oil and gas platforms, offshore wind turbine foundations will serve as artificial reefs benefitting fisheries and the fishing community. Proper fairway design, adequate surveys, and active coordination, leveraging strong Gulf of Mexico regional ocean user networks, such as the Gulf of Mexico Alliance and others, will further mitigate potential fishing impacts from offshore wind.

However, there remain Gulf of Mexico region-specific challenges that require attention to foster rapid development of offshore wind relative to other energy sources onshore and offshore. As an initial matter, leases should be sufficiently sized to attract necessary investment. In our recently co-sponsored report[6], we assumed that each lease might cover at least approximately 82,000 acres and enable at least a 1,200 MW envelope of installed wind capacity, based upon recent lease block trends. Whether this holds true or not, we at the very least would recommend against

[3] https://www.doi.gov/pressreleases/secretary-haaland-highlights-tremendous-offshore-wind-opportunities-virginia-governor

[4] https://www.nrdc.org/experts/francine-kershaw/landmark-offshore-wind-agreement-protects-right-whales

[5] https://www.boem.gov/sites/default/files/documents/renewable-energy/Vineyard-Wind-1-Supplement-to-EIS.pdf

[6] American Clean Power Association, et al., *Federal Revenue and Economic Impacts from BOEM Offshore Wind Leasing* (December 2021), https://cleanpower.org/resources/federal-revenue-and-economic-impacts-from-boem-offshore-wind-leasing/.

minimizing lease sizes. Fragmentation of offered lease areas could hamper interest. BOEM also should plan to hold subsequent OCS Gulf of Mexico lease sales, potentially on an area-wide basis, as currently done for oil and gas. Such future sales should sufficiently account for changes in technology, economics, and other relevant factors. Such potential future changes, however, should not delay BOEM's first and subsequent pace of Gulf of Mexico wind lease sales.

The Call's specifically posed questions further touch on challenges particular to the Gulf of Mexico region. Our initial responses are as follows, and we welcome additional discussions with BOEM, Gulf states, and other stakeholders on these important questions.

• Is development and production of offshore wind energy feasible when compared to the cost of electricity in GOM coastal States?

It can be. Key states in the region do not currently have a Renewable Portfolio Standard ("RPS"), much less a carve-out for offshore wind as exists in some Eastern states. However, as discussed in the following answer local utilities have an interest in renewable energy deployment. Further, projects along the Gulf would be unique in their ability to design for sale into different interconnections, let alone markets. While key markets in the area do already have significant low-cost renewable energy—such as wind in West Texas—Houston is a rapidly growing city with enormous industrial energy demand and is located far from wind operations in the Texas panhandle. Likewise, Louisiana has a large industrial base with significant energy demand, along with state[7] and local officials[8] interested in expanding the use of renewable energy in the state. Together, these are a strong impetus to diversify electricity supply.

• What impetus is necessary for utility companies located along the GOM to purchase offshore wind energy?

One key factor is that critical load centers in the region—such as the city of Houston—are located directly along the coast and further from existing centers for renewable energy (i.e. in West Texas). Further, key utilities in the region have existing pledges to reduce carbon emissions, such as Entergy's to reach net-zero by 2050.[9] However, the fact remains that there is a significant upfront capital cost for offshore wind, as well as a need to navigate the ERCOT or other regional transmission organization ("RTO") or independent system operator ("ISO") requirements and processes. It is also the case though that states without an RPS *may* be initially reluctant to sign a power purchase agreement ("PPA"), often a critical step to warrant the investment of substantial capital in offshore wind projects. This makes it all the more important that federal regulators provide a clear path forward to make these projects straightforward from the standpoint of leasing and permitting.

[7] https://www.theadvocate.com/baton_rouge/news/politics/article_39667680-3cf3-11ec-b4e5-dbb45f190292.html
[8] https://www.nola.com/news/business/article_5297cdc4-b982-11eb-903e-b3ae5b66d433.html
[9] https://www.entergynewsroom.com/news/achieving-net-zero-carbon-emissions-by-2050/

• What could make offshore wind energy development in the GOM more attractive to consumers?

For one, recent polling has shown that American consumers prefer renewable energy resources in general.[10] Secondly, reliability is a key factor. Our understanding is that Gulf of Mexico offshore wind production is generally steady across the whole day, which could more readily contribute to meeting peak demand periods. In a region hit in recent years by severe weather and electric reliability concerns, this could prove invaluable. Ensuring cost competitiveness, added to reliability and other attributes, should help sway consumers.

Close collaboration between stakeholders at the federal, state and local levels, OEMs, and offshore wind developers would allow for investments to build a local supply chain in a way that will maximize the benefits to local consumers over the life of the wind projects, by carefully planning capital investments based on the needs of the projects and local priorities and avoiding redundancies.

• What is the viability, economic or otherwise, of using offshore wind to power green hydrogen production in the GOM?

It largely depends on who the hydrogen customer is. Several European countries see offshore wind as the main source for future large scale hydrogen production (e.g. UK hydrogen strategy, German hydrogen strategy, Netherlands hydrogen strategy). Key conditions include potential for scale with limited environmental impact/land-use, higher capacity factors, and utilization of oil and gas infrastructure. Helped by dedicated public funding, several developments have reached an advanced phase. By contrast, in the Gulf of Mexico while offshore wind for green hydrogen may be an attractive option for industrial users that need hydrogen and desire to be net-zero in carbon emission, blue hydrogen would appear to be particularly promising given the produced amount of natural gas and development of carbon capture and sequestration. We do however recognize the potential for green hydrogen in the area over time and would encourage BOEM to provide flexibility to allow for the development of emerging new technologies as they become more cost competitive in the Gulf of Mexico, consistent with an all-of-the above approach to meeting the region's energy needs.

• What are the most viable locations for offshore wind energy projects in the GOM based on water depth, wind resources, turbine size, distance to port, and interconnection?

The Call Area is narrower than the RFI Area, largely excluding areas east of the Mississippi River and with water depths exceeding 400 feet. NOIA supports this area for BOEM's initial Gulf of Mexico wind lease sale, though BOEM should consider expanding this area based on receipt of specific nominations, results of the sale, and advances in technology including floating turbines. Based on economic modeling from NREL late 2020, the Texas coast would provide the lowest levelized cost of energy ("LCOE") due to a combination of relatively higher wind speeds

[10] https://www.pewresearch.org/science/2019/11/25/u-s-public-views-on-climate-and-energy/

and shallow water. While none of the potential sites is projected to have a lower LCOE than the local avoided cost of energy, the Port Arthur and Port Isabel areas are estimated to come closest and have LCOEs within $5-10/MWh of the local cost of energy. NOIA does not presently have a basis to disagree with these results, but more analysis is warranted to identify the optimal location of wind energy leases, and BOEM should work with developers to ensure receipt of nominations reflecting those locations. BOEM should also consider whether areas with the ability to feed into multiple states, markets, and interconnects would be attractive in the marketplace.

GULF OF MEXICO OCS WIND LEASES SHOULD MAXIMIZE FLEXIBILITY AND MINIMIZE BURDENS ON LESSEES AND CONTRACTORS.

We understand Interior is working with significant acreage and seeking ways to potentially lease it in a way that is equitable. We applaud these efforts and recognize that the Department is particularly interested in building up the domestic supply chain and helping bring jobs to long-disenfranchised communities. The majority of NOIA's members are in the service and supply industries—rather than large operators and developers—and we know that many of them are doing their due diligence to find ways to invest in communities in the Gulf of Mexico. Thus, BOEM's Call has the potential to trigger the creation of significant jobs across the supply chain and benefit local communities as well.

Looking forward, we would caution, however, that it may not be appropriate to put conditions on leases *requiring* certain types of local investment. Quite simply, we feel that such requirements at the pre-leasing stage would create undue burdens on stakeholders, would be difficult to coordinate and plan as companies examine ways to deploy capital and target investments, and would drain planning resources from companies that may not secure a bid anyway. This is particularly important knowing that the Biden Administration is already looking at ways to spur domestic manufacturing.[11]

Further, our members are navigating the potential of state and local requirement rules already. Developers and their partners in the service and supply side are making decisions on how best to invest ahead of what will prove to be a trans-regional opportunity. Some equipment will be made at existing facilities along the Gulf Coast that have historically served the oil and gas industry with a diverse workforce. As business decisions are being made, flexibility and *certainty* of a project pipeline are the best ways to attract investment. Letting our members know that leases are coming, and that a reasonable pipeline for reviewing and (possibly) approving Construction and Operations Permits will follow, will provide the certainty to attract capital and invest in facilities.

We would also continue to caution about the outlook for prescriptive requirements on spacing for transit of vessels. We know that there are reasonable approaches to allowing the transit of fishing, shipping, or recreational vessels through turbine areas. To the extent the Department is

[11] https://www.whitehouse.gov/briefing-room/statements-releases/2021/03/29/fact-sheet-biden-administration-jumpstarts-offshore-wind-energy-projects-to-create-jobs/

examining designated spacing or separation within lease areas or between individual leases, the distancing should be as consistent as possible and use existing terminology and standards to avoid undue confusion. The Department should focus on coordinating with the U.S. Coast Guard to ensure that these fairways have workable guidelines for vessel transit and have clear and consistent aids to navigation. However, we continue to believe that corridors between leases and lanes within lease areas are not—and should not be mandated as—a one-size-fits-all-regions matter.

CONCLUSION

In sum, offshore wind leasing in the Gulf of Mexico offers enormous economic and environmental benefits and is necessary to meet renewable energy goals. We encourage the Department to quickly move forward with wind leasing in the region, while retaining the important role of other energy sources, affording sufficient incentives, and avoiding unnecessary restrictions on offshore wind development.

Very respectfully,

Erik Milito
President
National Ocean Industries Association

//Submitted Electronically