

Supplementary Material

Perceptions of Commercial and Recreational Fishers on the Potential Ecological Impacts of the Block Island Wind Farm (US)

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I. Interview Guide:

Understanding marine resource user response to ecological impacts of offshore wind energy: a case study of the Block Island Wind Farm

This project is a collaboration between URI and RI department of Environmental Management, and funded by Sea Grant. We're looking to hear about the impacts of the offshore wind farm, and the interview will take about an hour. Everything you say to us is confidential, which means it will not identify you.

Main interview

I would like to talk to you first about your overall fishing experience and then talk about your use of the area of the BI Wind Farm area before and after the turbines were put in place.

General Background Fishing Experience Information

- 1. Tell us a little bit about your fishing experience in general.** For instance, how long have you been fishing? When was the last time you went fishing?
- 2. Fish: What types of fish do you typically target?** What type of fishing equipment do you use? Where do you typically go fishing? Why do you go to those places? (to understand who this fisherman is, don't need map).
- 3. Boat: Do you fish from a boat?** Do you own it? For how long have you owned it? How big is the boat? Where do you keep the boat?

Experiences before construction of Block Island Wind Farm

I'm going to ask you a few questions about how you have used the area off the southern coast of Block Island (see map (Figure A.). I am going to ask you about your boating experiences before the wind turbines/structures were in place, during the construction phase, and after the wind farm was completed. Show respondent map of the area off Block Island coast

4. Tell us a little bit about your experience with the area off the southern coast of Block Island (show area on map). (Did you go to that area before any structures were in place (before 2015)? **Approximately how many times have you been to that area? How many times per year did you go to that site before the structures were built?**)

5. **Did you go fishing in that area before any structures were built? In which part of that area did you typically fish?** (respondent should indicate on map) What type of fish did you target before the structures were in place? Why did you target those species? (probe for: to eat/subsistence, to sell, for fun/challenge) Different fish have assembled at different turbines at different times. What are they?

6. I'd like you to think about the first time you heard about the wind farm. Can you remember when you first heard about it? Where did you hear about it? What were your thoughts about the wind farm at that time? Experience with the process? How are is impacted? Do you think that fish run through that area? How much time do you spend avoiding the area? How many days fishing the area before?

Experiences during construction

Foundations of the BIWF were installed in late summer of 2015. The cable was installed in the summer of 2016. In late summer 2016 the turbine towers were installed. It was fully constructed in late summer of 2016, and started operating in December 2016.

7. Did you go to this area while the turbines/structures were being constructed? How did the turbines look when you were there? (*Show visuals of one stage (Figure B) and ask the respondent if they visited during that time—or saw from the land. Or which stage they saw.*) Why did you go there if you didn't fish? Have you been there since?

8. Did you go fishing in the area during construction? Where did you fish [at those times]? What types of changes did you notice during construction? (probe for habitat, types of fish, mammals or birds, boats/users, recreational or commercial fishermen--types of gear they are using, sizes of fish, sounds/vibrations, as a fish aggregating device, etc.) Did you fish on the perimeter of the Safety zone? In what seasons?

Experiences after construction of Block Island Wind Farm

Now I am going to ask you some questions about your experience in that area since the turbines were fully built (since the fall 2016). Show respondent map of the area off Block Island coast (nautical chart with structures).

9. **Have you fished near the turbines/wind farm?** How close have you gotten to the wind turbines when fishing? When was that? (How often?) Why do you fish near the structures/turbines? Did you catch more that day? How did you know there were more? (probe)

10. **What types of changes have you noticed near the wind turbines/structures?** (probe for habitat, types of fish, mammals or birds, boats/users, recreational or commercial fishermen—types of gear they are using, sizes of fish, sounds/vibrations, as a fish aggregating device, EMF, etc.)

11. **What do you think is causing those changes** (in fish, birds, habitat, boats)?

12. **What are your thoughts about those changes? How have they affected your own use** of the area? (probe for changes in fishing sites, changes in fishing gear, changes in times going to site; show map so respondent can indicate changes in spatial use if needed)

13. Have you heard of anyone else seeing changes? What changes have other people noticed?

14. **Do you know where the cable is that brings the wind energy to shore?** Do you fish near the cable? What types of changes have you noticed near the cable? (probe for habitat, types of fish, mammals or birds, boats/users, recreational or commercial fishermen—types of gear they are using, sizes of fish, sounds/vibrations, EMF, etc.) What do you think is causing those changes? How have those changes affected your use of the area?

15. Now that the wind turbines are operational, what do you think of the wind farm now? Have your thoughts about the wind farm changed over the past few years? In what ways?

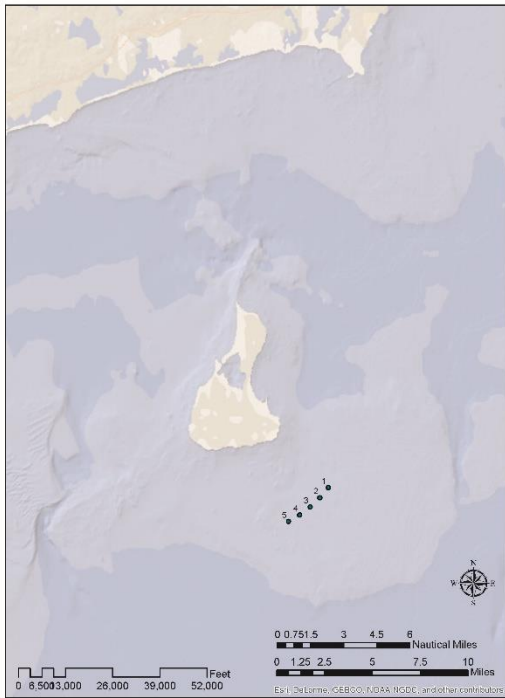


Figure A. Map of the BIWF context.

Before Construction of Wind Turbines

Before Spring 2015
Pre- April 2015

**During Construction:
Pile Driving**

Spring- Fall 2015
April - October 2015

**During Construction:
Cable Laying & Turbine Constr.**

Fall 2015 – Summer 2016
October 2015 – August 2016

After Construction of Wind Turbines

After August 2016
Operating from December 2016

Figure B. Stages of the BIWF.