



Outer Continental Shelf Wind Energy Leasing in the New York Bight

Luke Feinberg
Office of Renewable Energy Programs

April 14, 2021

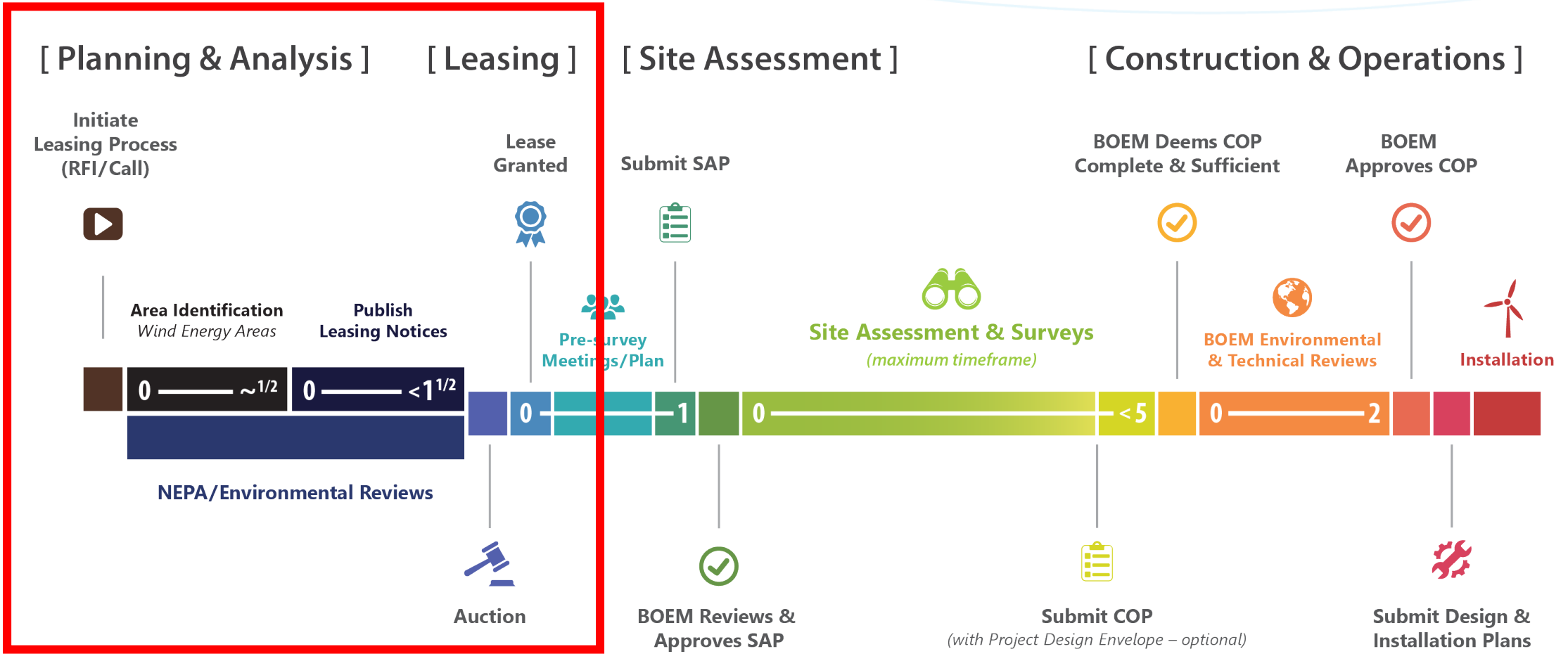


Agenda

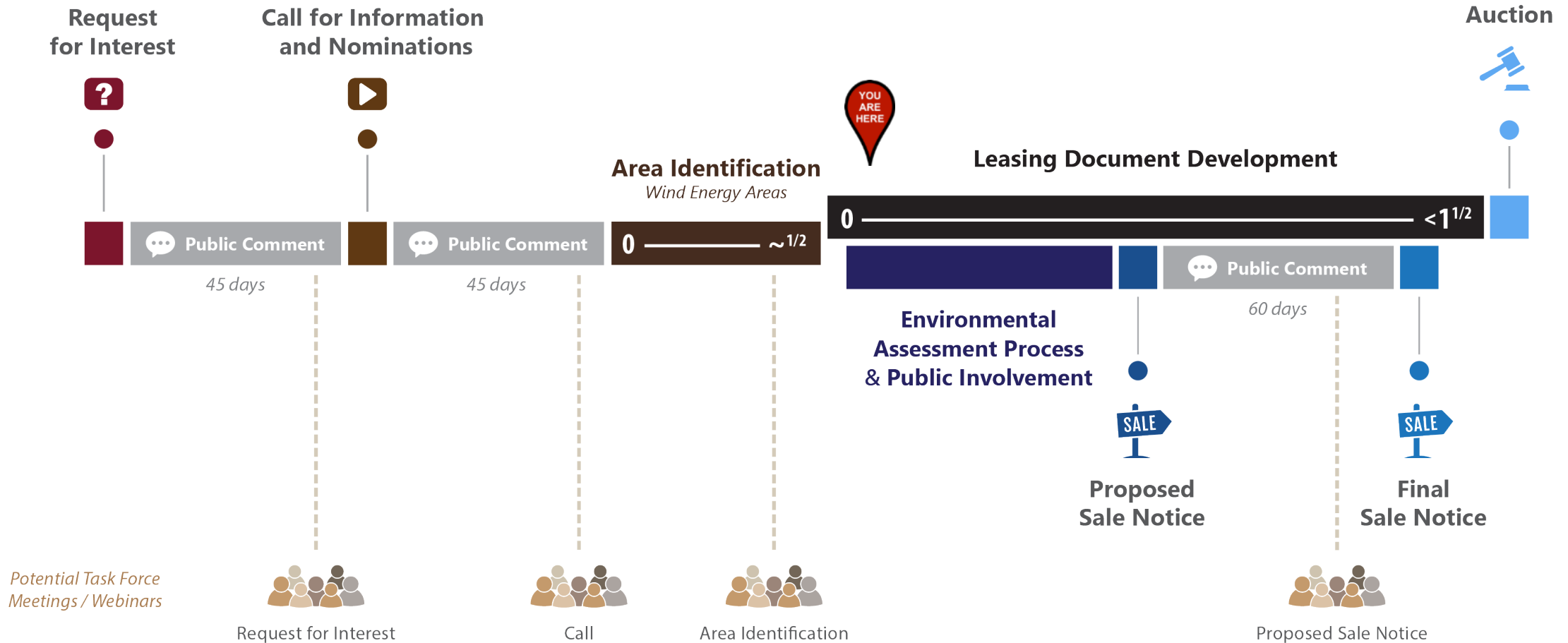
- **BOEM Process**
- **Wind Energy Areas**
- **Proposed Lease Areas**
- **Questions and Conversation**



Renewable Energy Process: From RFI/Call to Operation



Request for Interest to Lease Sale



Call for Information and Nominations

Request comments on:

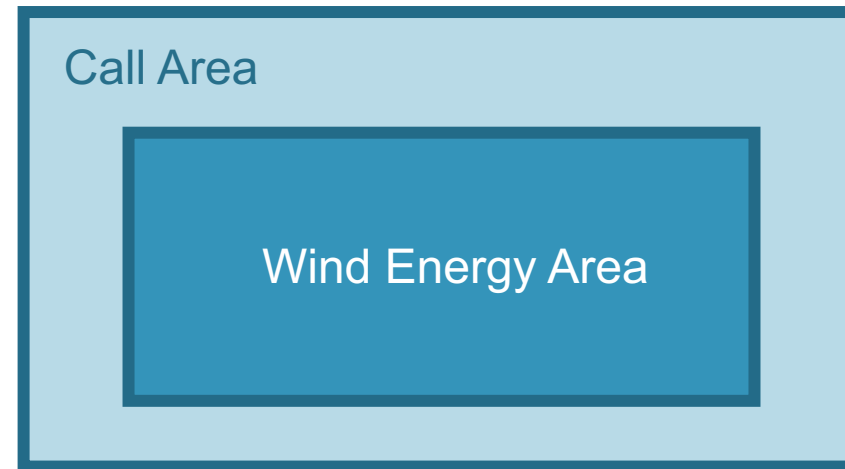
- Areas for special consideration and analysis
- Conditions in the Call Area
- Areas to be considered for leasing

Call Area



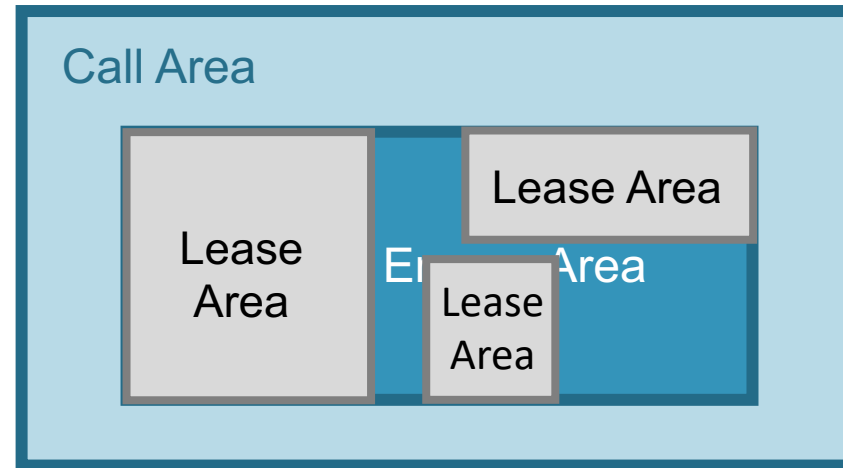
Wind Energy Area

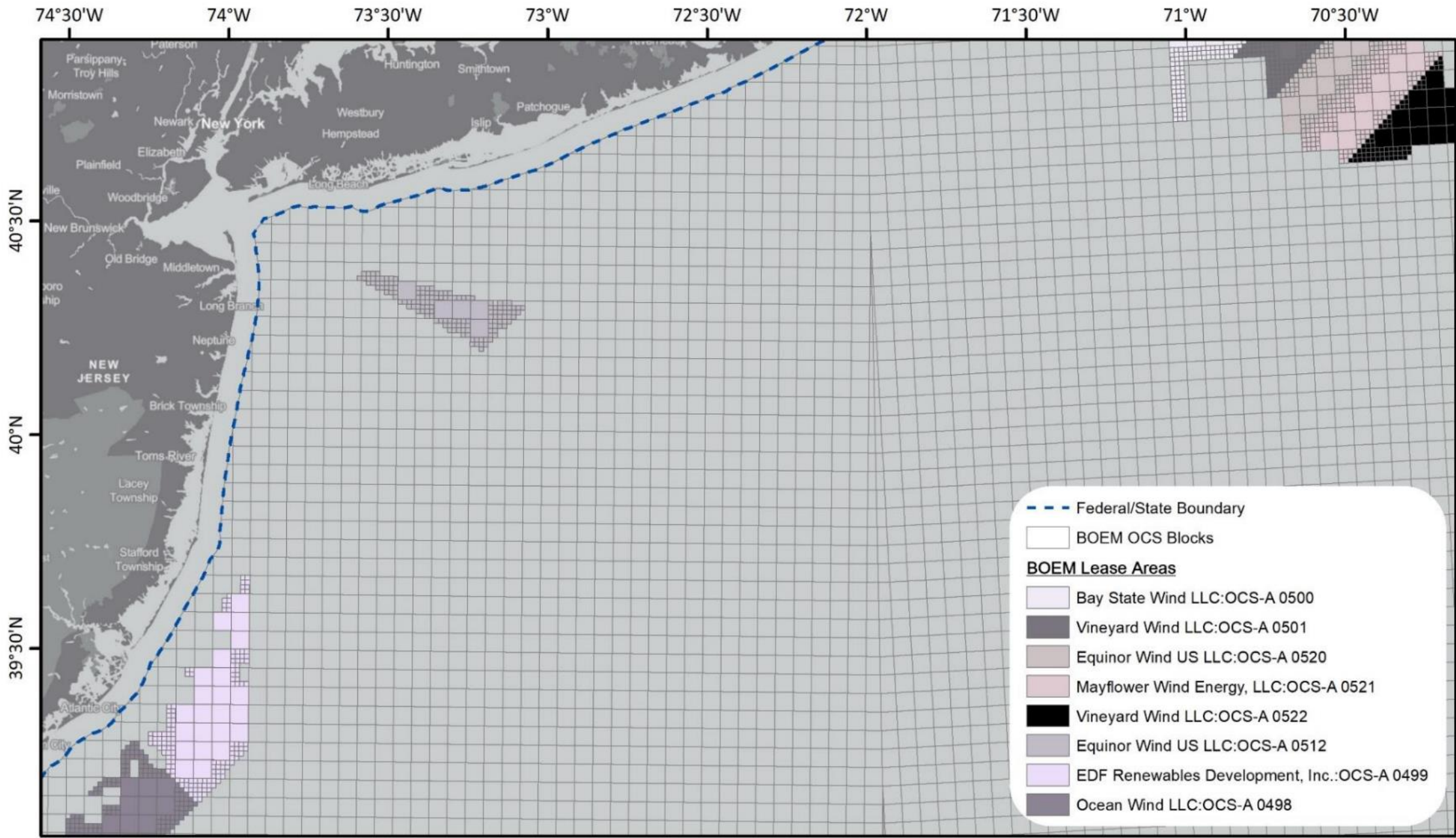
- A portion of the Outer Continental Shelf (OCS) identified by BOEM for NEPA analysis (Environmental Assessment)
- The basis for a Lease Area

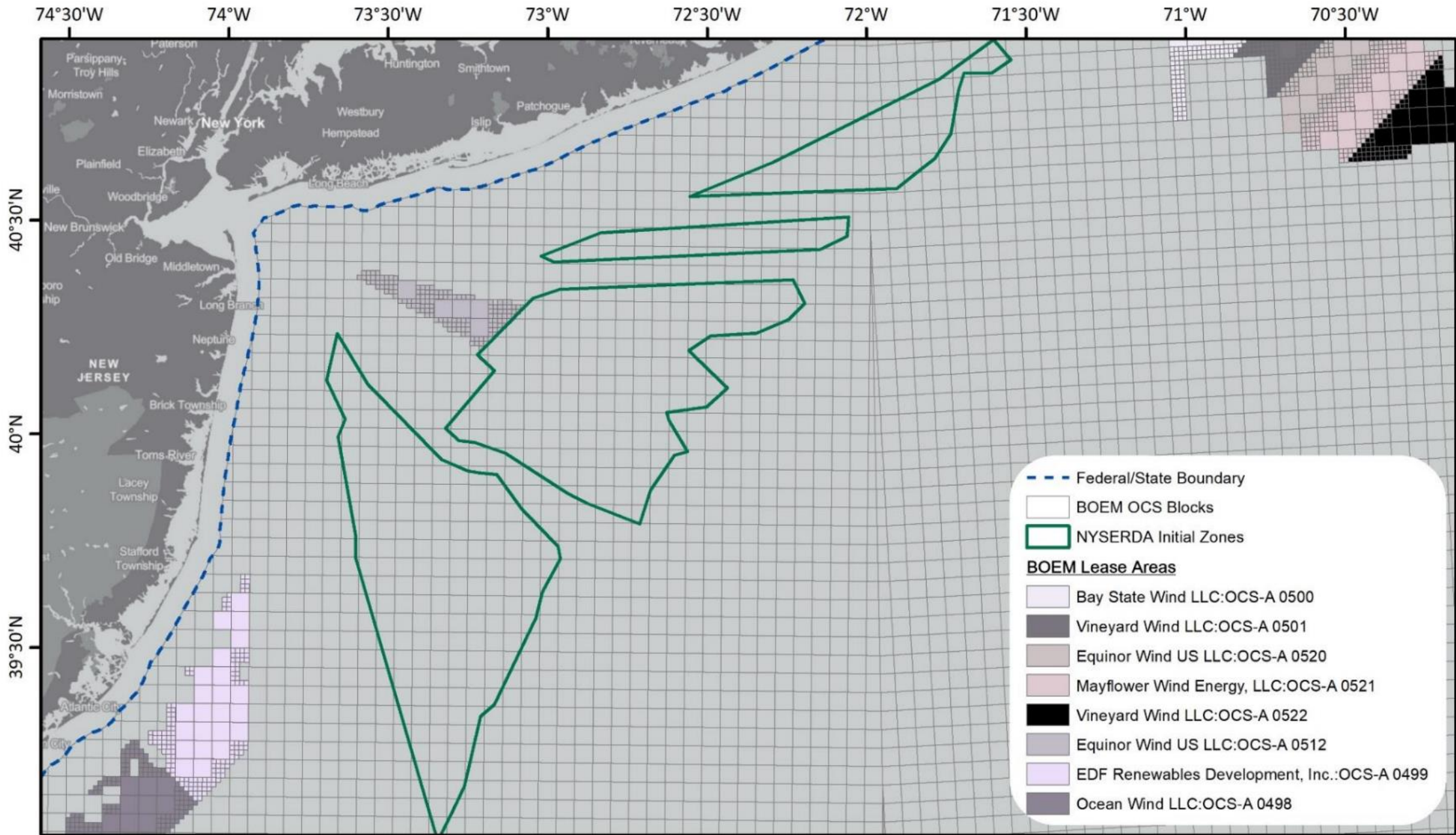


Lease Areas

- Wind Energy Areas have the potential for further division into Lease Areas







- - - Federal/State Boundary
- BOEM OCS Blocks
- NYSERDA Initial Zones

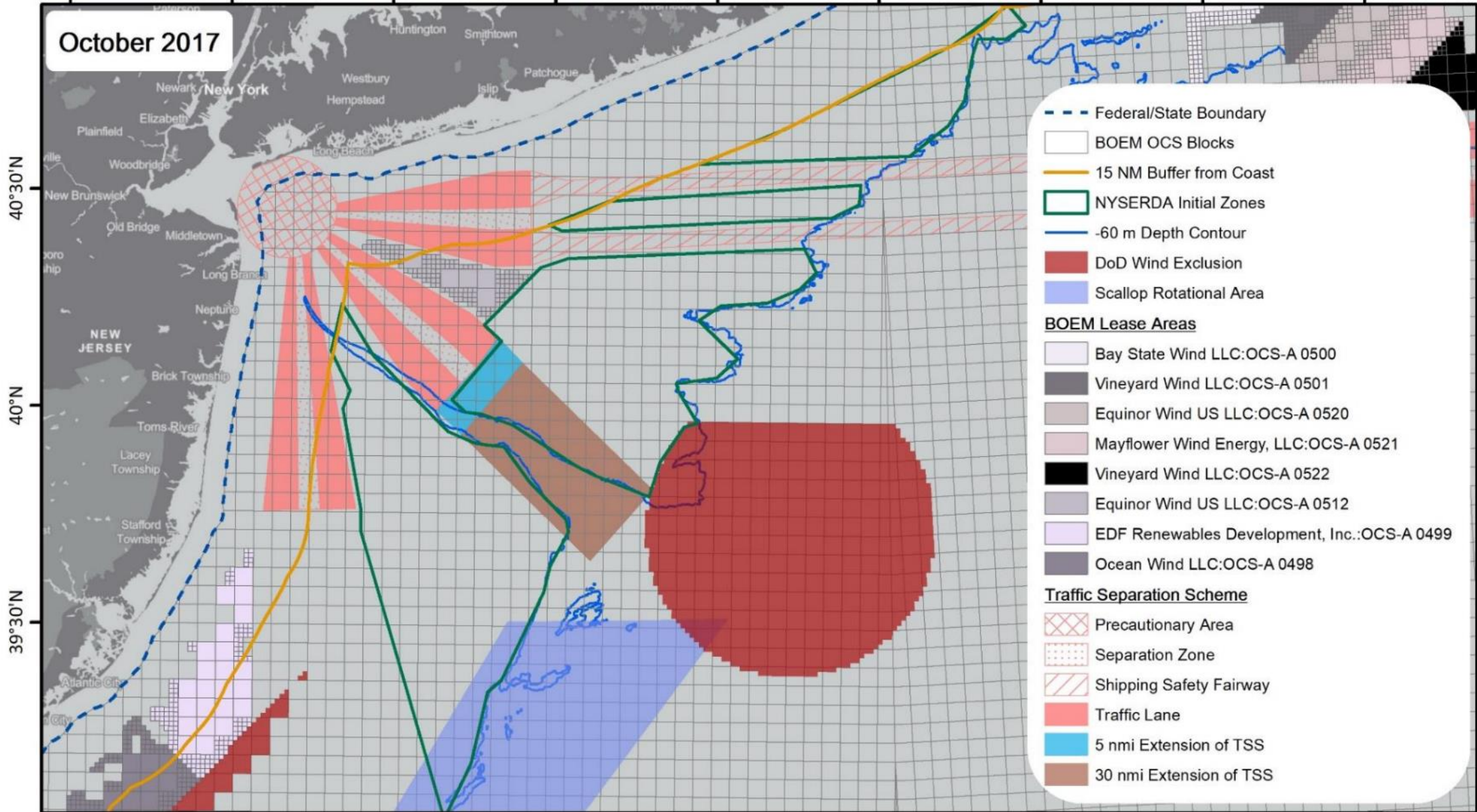
BOEM Lease Areas

- Bay State Wind LLC:OCS-A 0500
- Vineyard Wind LLC:OCS-A 0501
- Equinor Wind US LLC:OCS-A 0520
- Mayflower Wind Energy, LLC:OCS-A 0521
- Vineyard Wind LLC:OCS-A 0522
- Equinor Wind US LLC:OCS-A 0512
- EDF Renewables Development, Inc.:OCS-A 0499
- Ocean Wind LLC:OCS-A 0498



74°30'W 74°W 73°30'W 73°W 72°30'W 72°W 71°30'W 71°W 70°30'W

October 2017



- - - Federal/State Boundary
- BOEM OCS Blocks
- 15 NM Buffer from Coast
- NYSERDA Initial Zones
- -60 m Depth Contour
- DoD Wind Exclusion
- Scallop Rotational Area

BOEM Lease Areas

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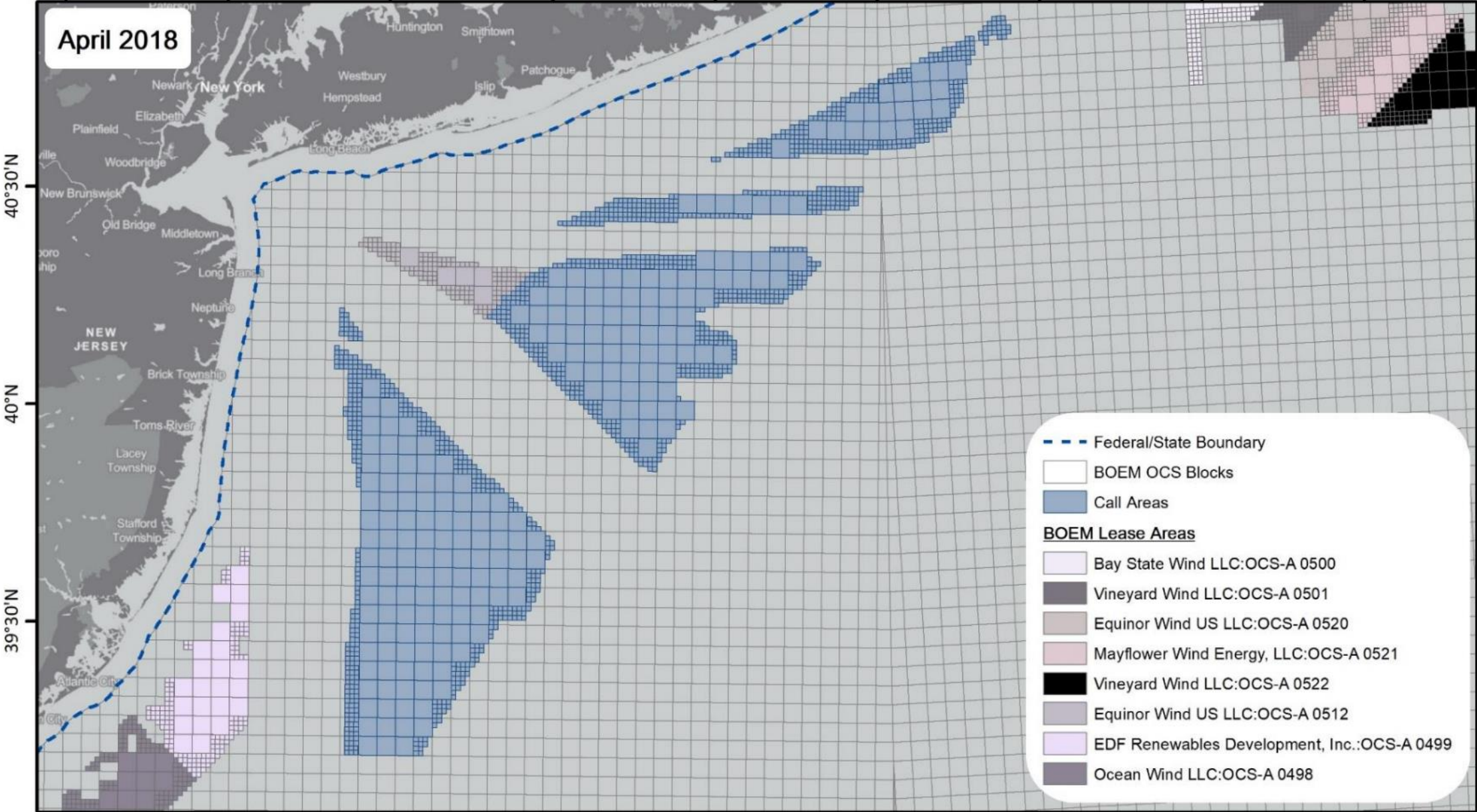
Traffic Separation Scheme

- ▨ Precautionary Area
- ▨ Separation Zone
- ▨ Shipping Safety Fairway
- Traffic Lane
- 5 nmi Extension of TSS
- 30 nmi Extension of TSS



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April 2018

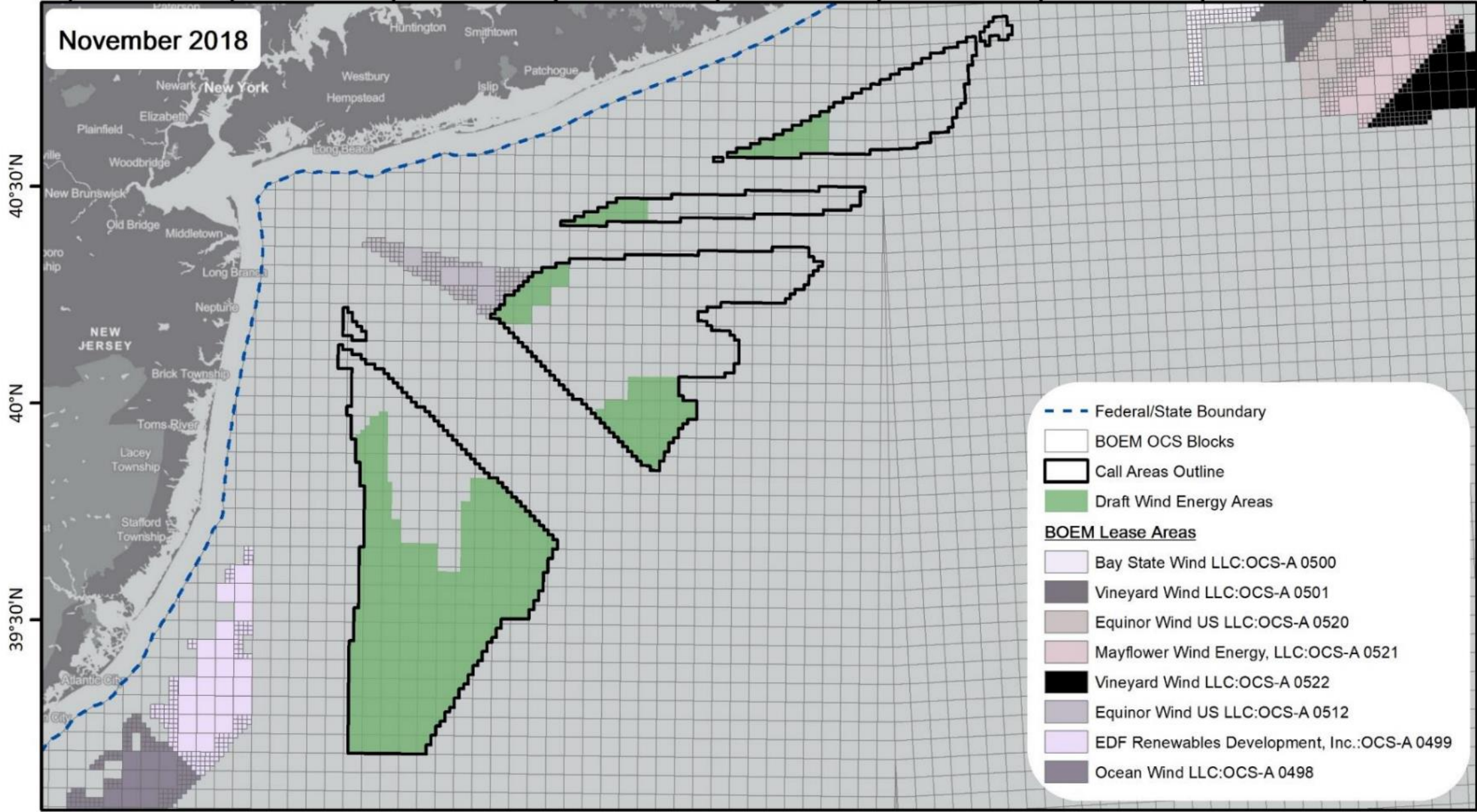


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- Call Areas
- BOEM Lease Areas**
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November 2018

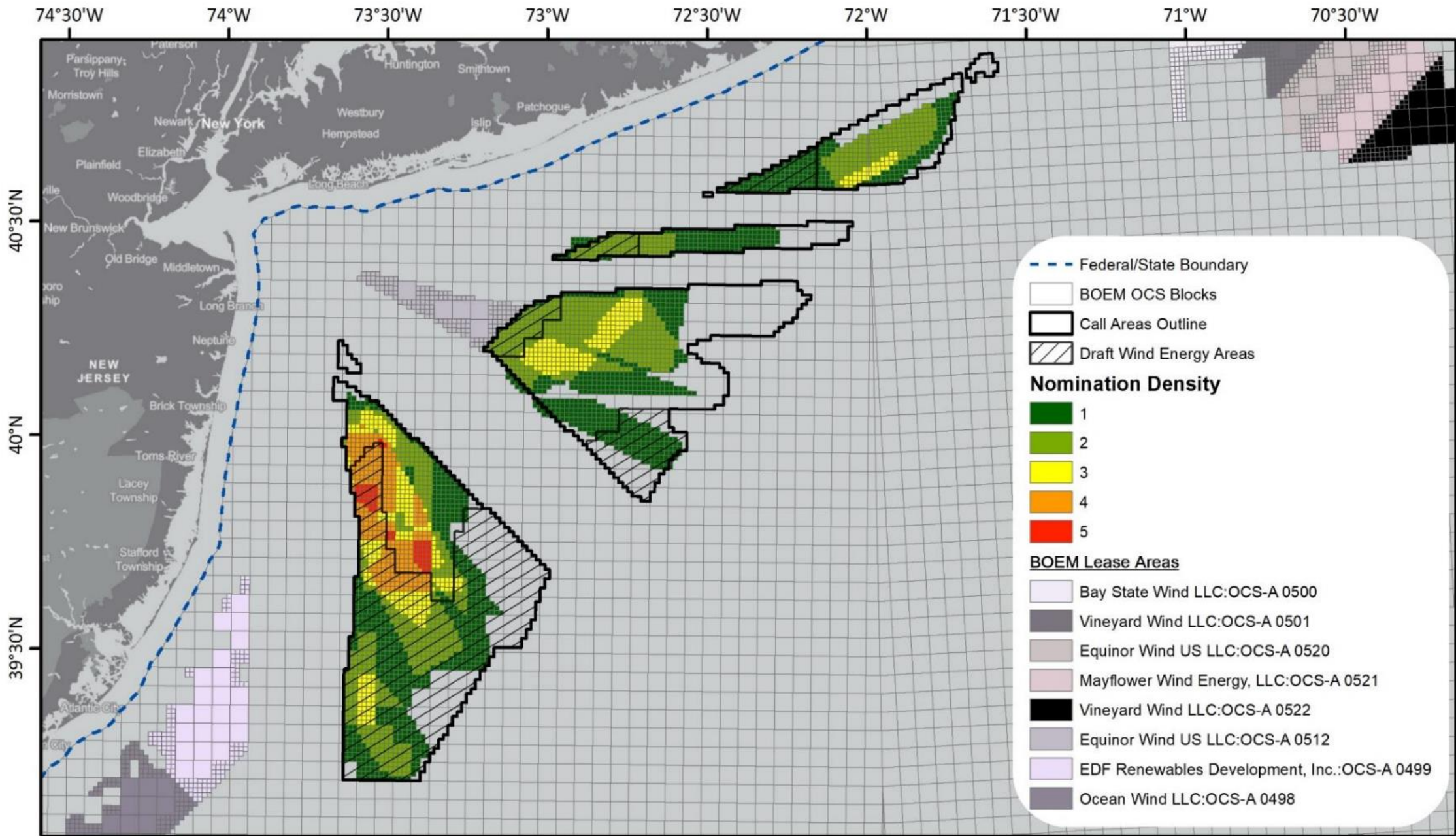


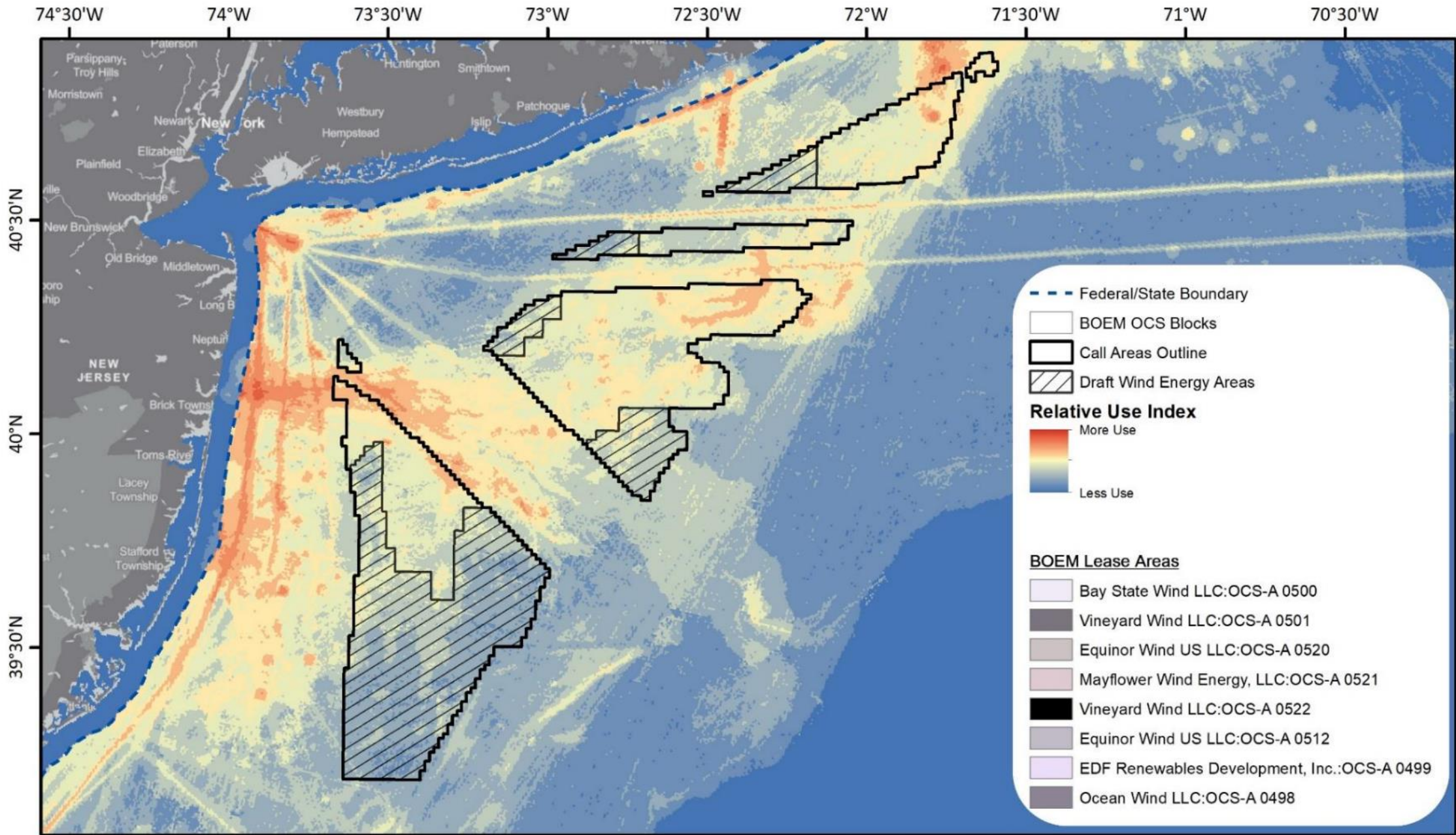
- - - Federal/State Boundary
- BOEM OCS Blocks
- Call Areas Outline
- Draft Wind Energy Areas

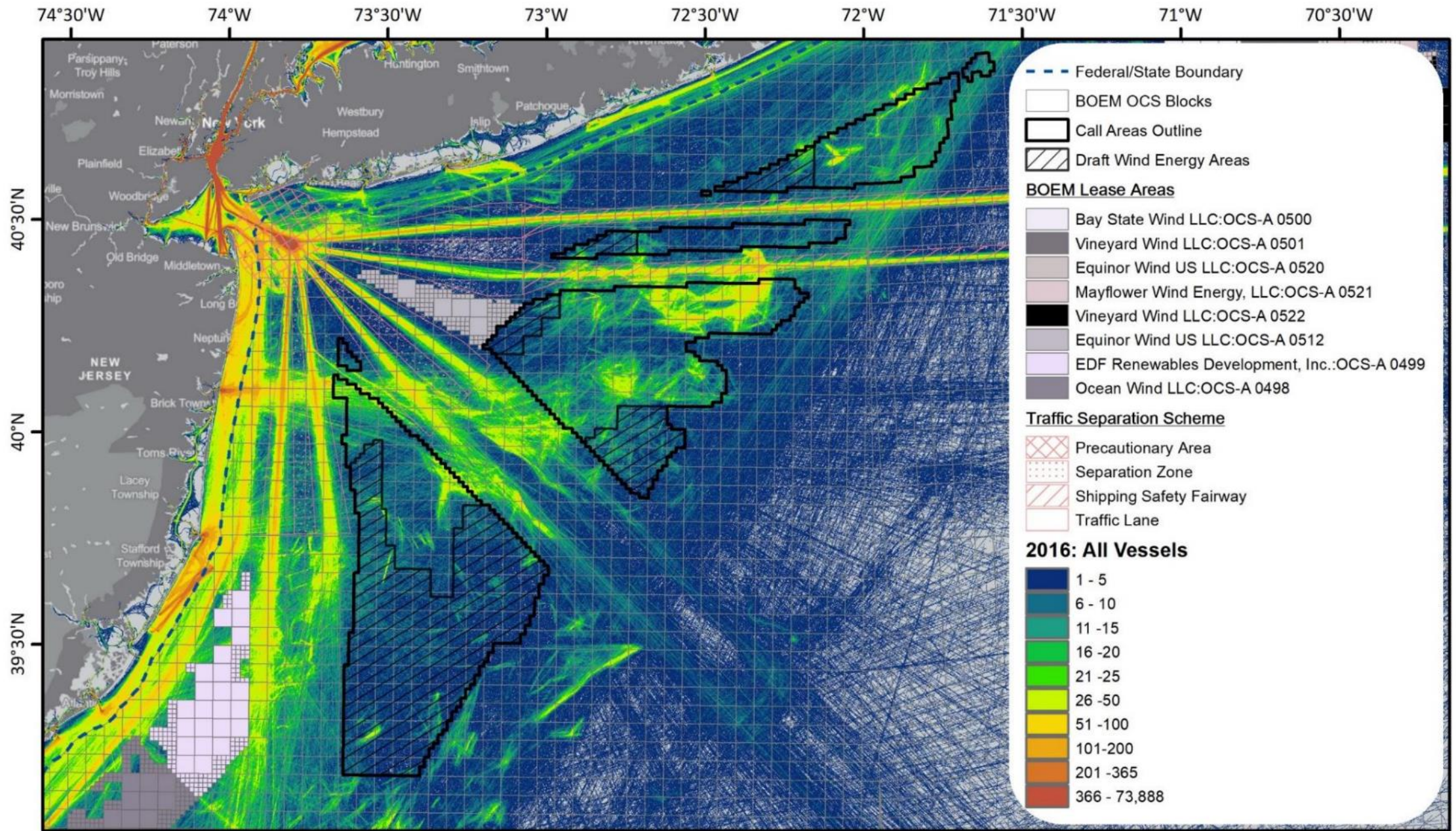
BOEM Lease Areas

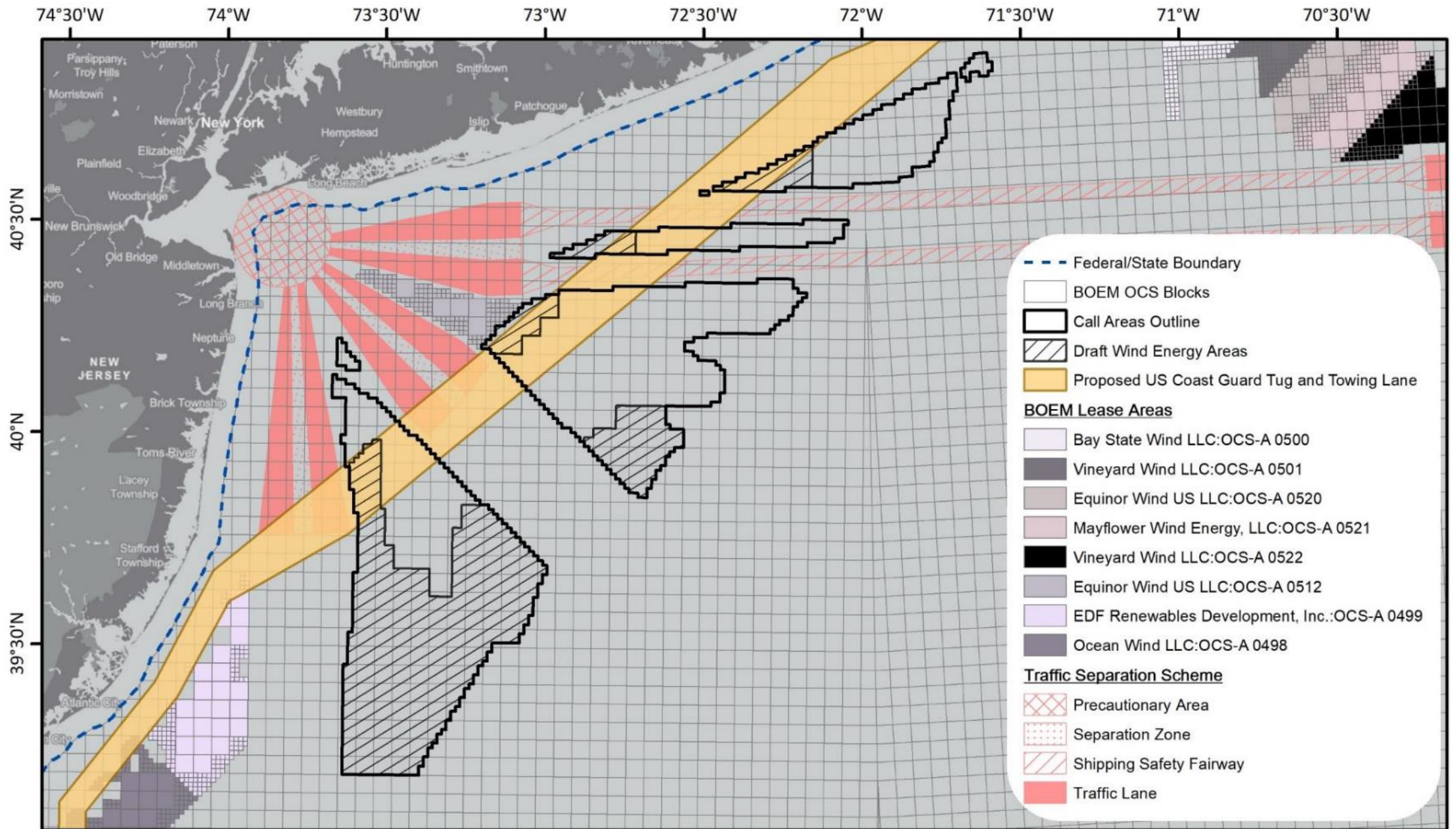
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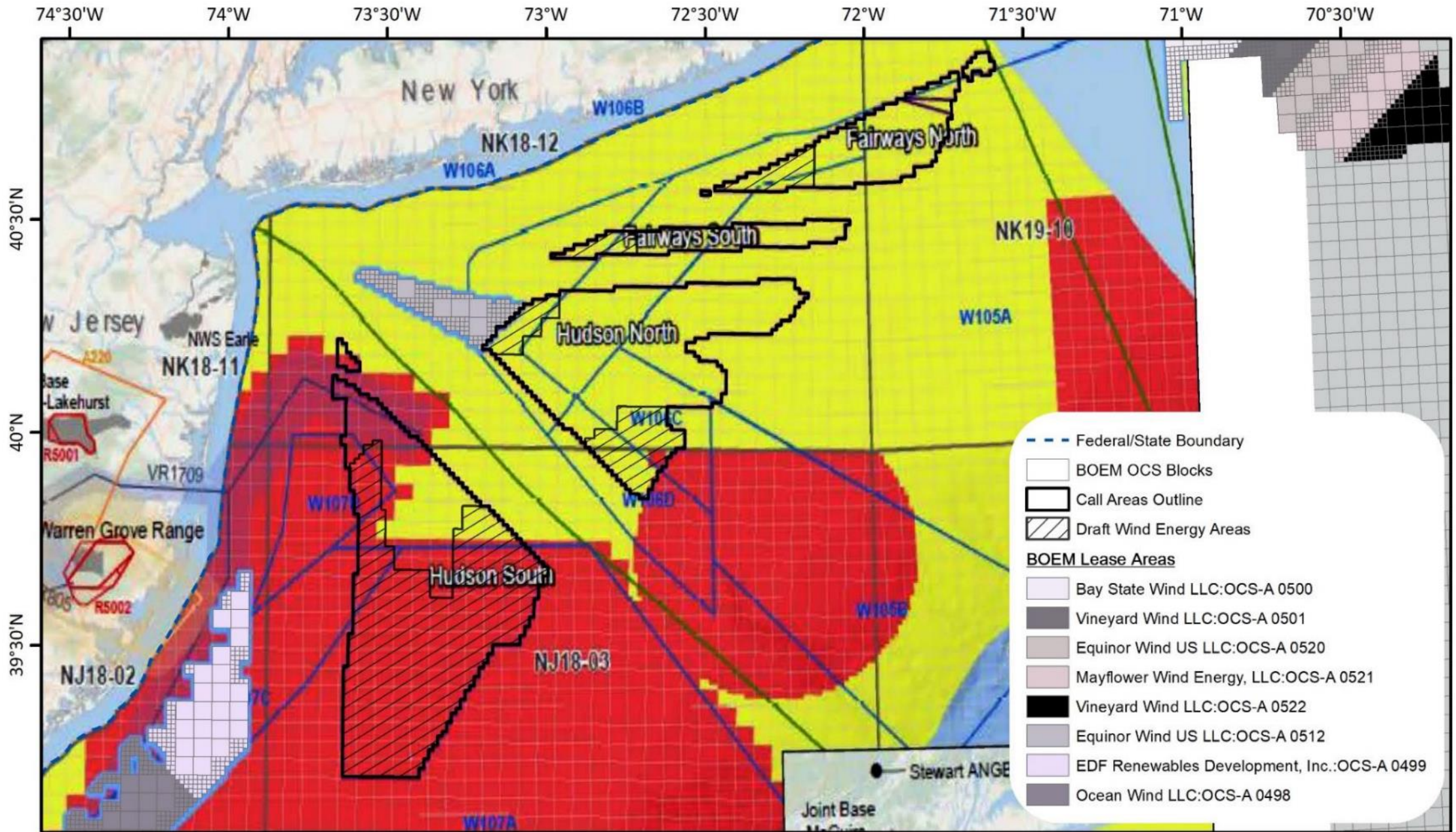






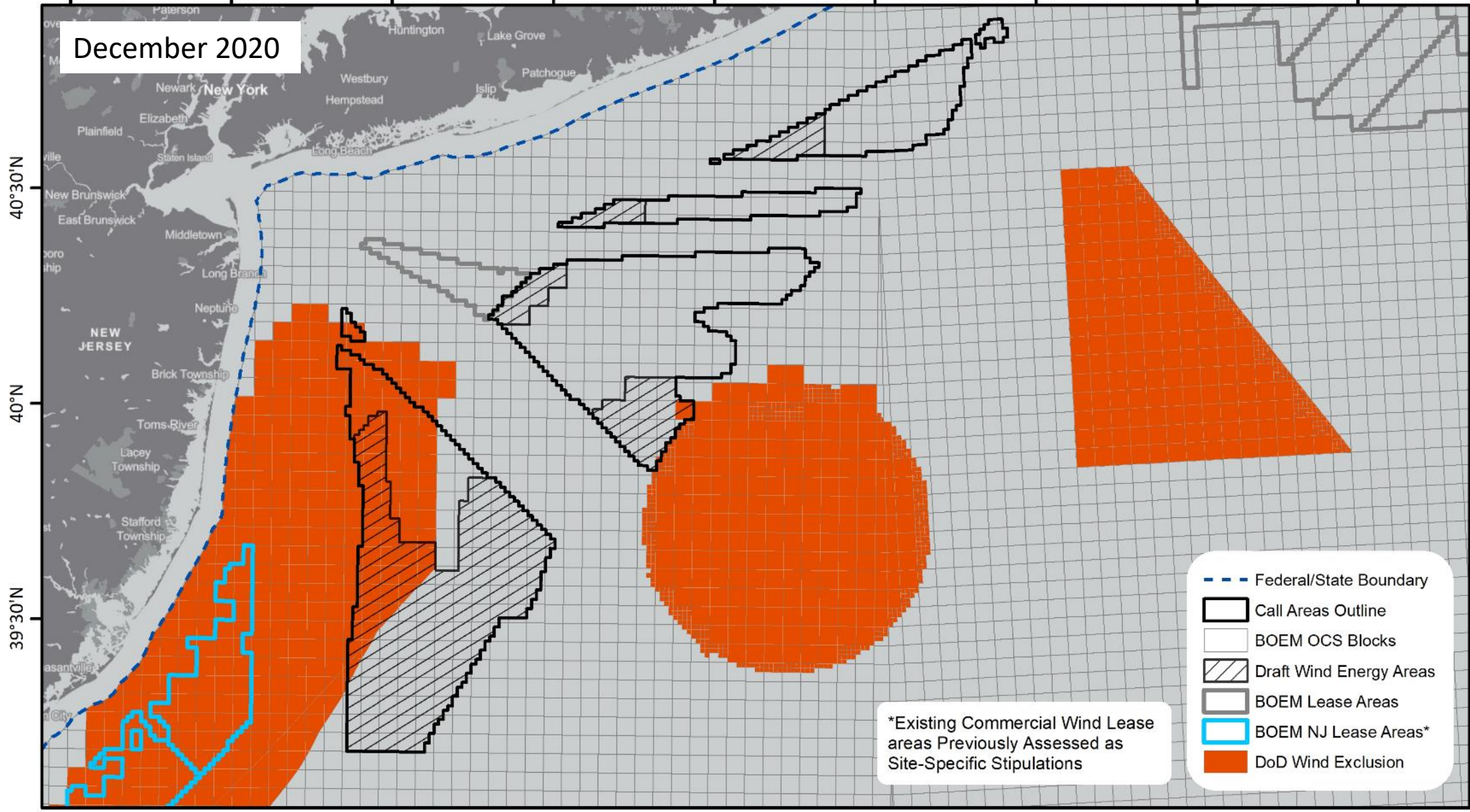






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December 2020



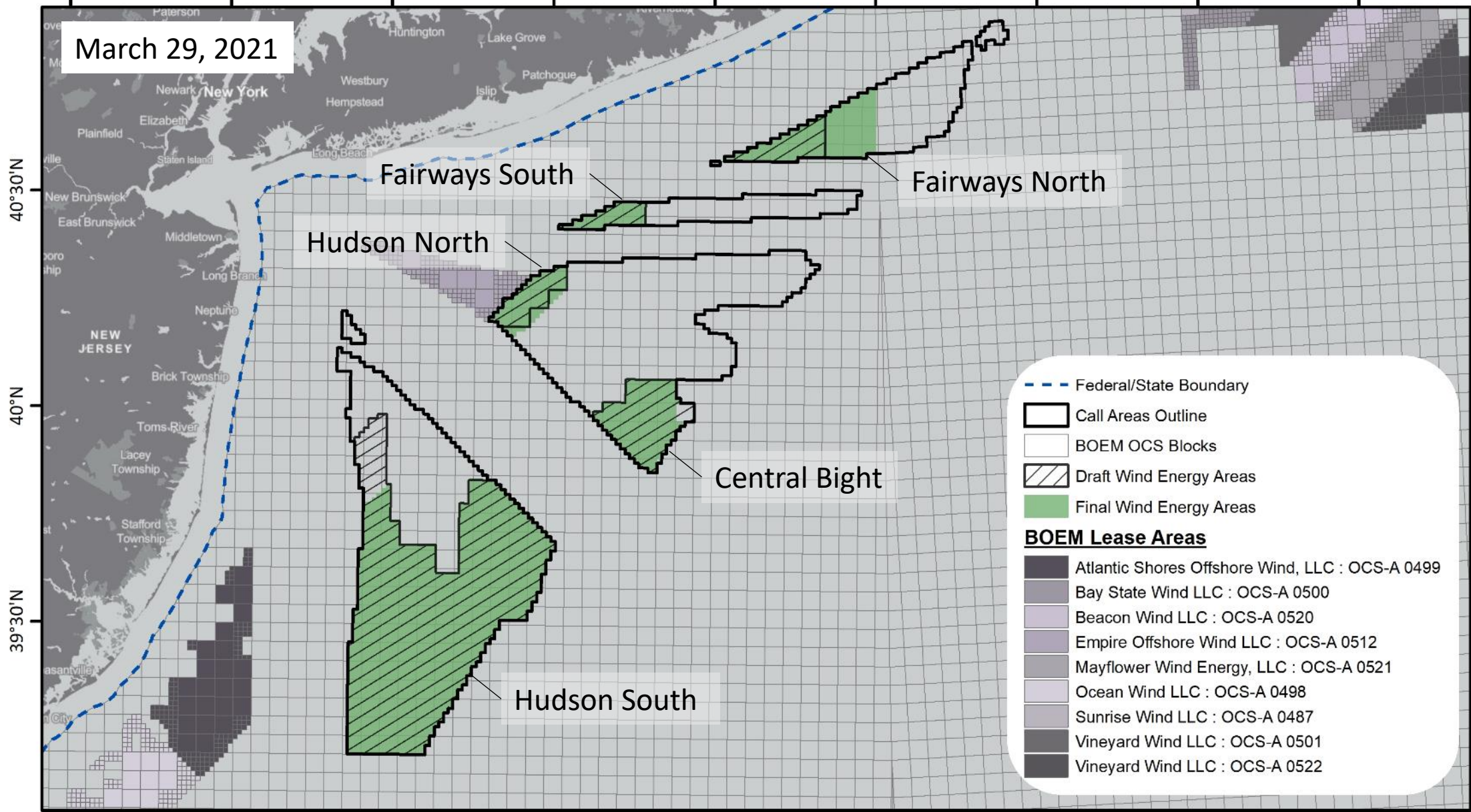
*Existing Commercial Wind Lease areas Previously Assessed as Site-Specific Stipulations

- - - Federal/State Boundary
- Call Areas Outline
- BOEM OCS Blocks
- Draft Wind Energy Areas
- BOEM Lease Areas
- BOEM NJ Lease Areas*
- DoD Wind Exclusion



74°30'W 74°W 73°30'W 73°W 72°30'W 72°W 71°30'W 71°W 70°30'W

March 29, 2021



- - - Federal/State Boundary
 [Outline] Call Areas Outline
 [White Box] BOEM OCS Blocks
 [Hatched Box] Draft Wind Energy Areas
 [Green Box] Final Wind Energy Areas

BOEM Lease Areas

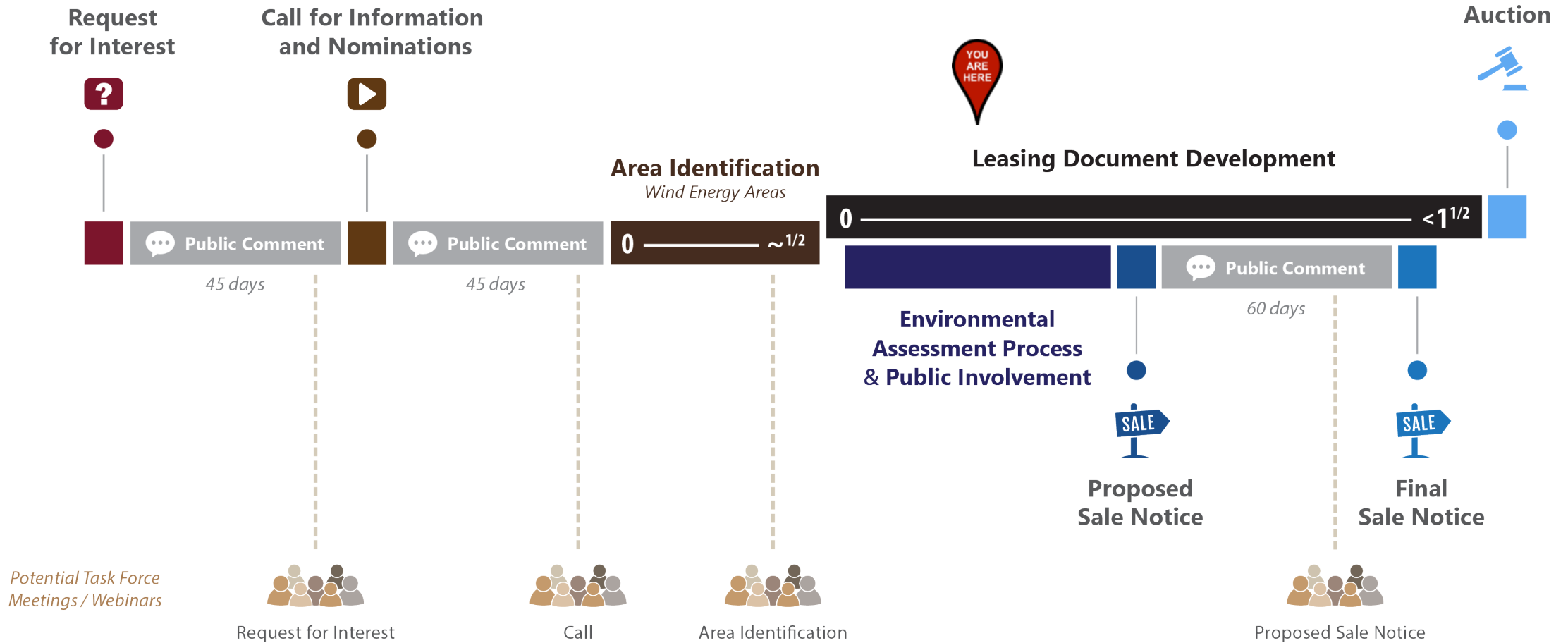
- [Dark Grey Box] Atlantic Shores Offshore Wind, LLC : OCS-A 0499
- [Medium Grey Box] Bay State Wind LLC : OCS-A 0500
- [Light Grey Box] Beacon Wind LLC : OCS-A 0520
- [Purple Box] Empire Offshore Wind LLC : OCS-A 0512
- [Dark Purple Box] Mayflower Wind Energy, LLC : OCS-A 0521
- [Light Purple Box] Ocean Wind LLC : OCS-A 0498
- [Medium Purple Box] Sunrise Wind LLC : OCS-A 0487
- [Dark Purple Box] Vineyard Wind LLC : OCS-A 0501
- [Darkest Purple Box] Vineyard Wind LLC : OCS-A 0522



Pause for Poll

- **Click the link in the chat**

Request for Interest to Lease Sale



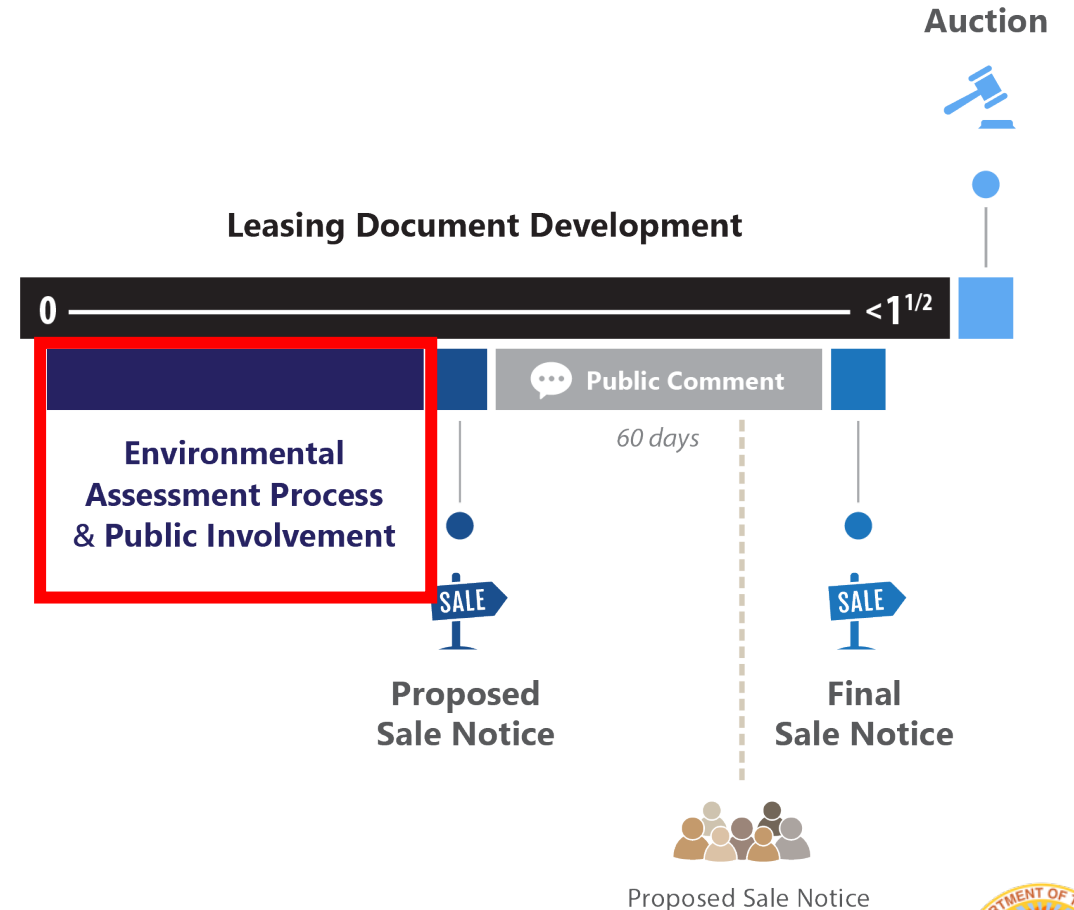
Environmental Assessment

Assesses Environmental Effects Associated with Leasing

- Site Characterization Activities
 - biological, geological, geotechnical, and archaeological surveys
- Site Assessment Activities
 - meteorological and oceanographic buoy deployment

Comment Period ends April 28, 2021

- Docket No. BOEM-2021-0021
- Builds upon prior EA's completed in the Region



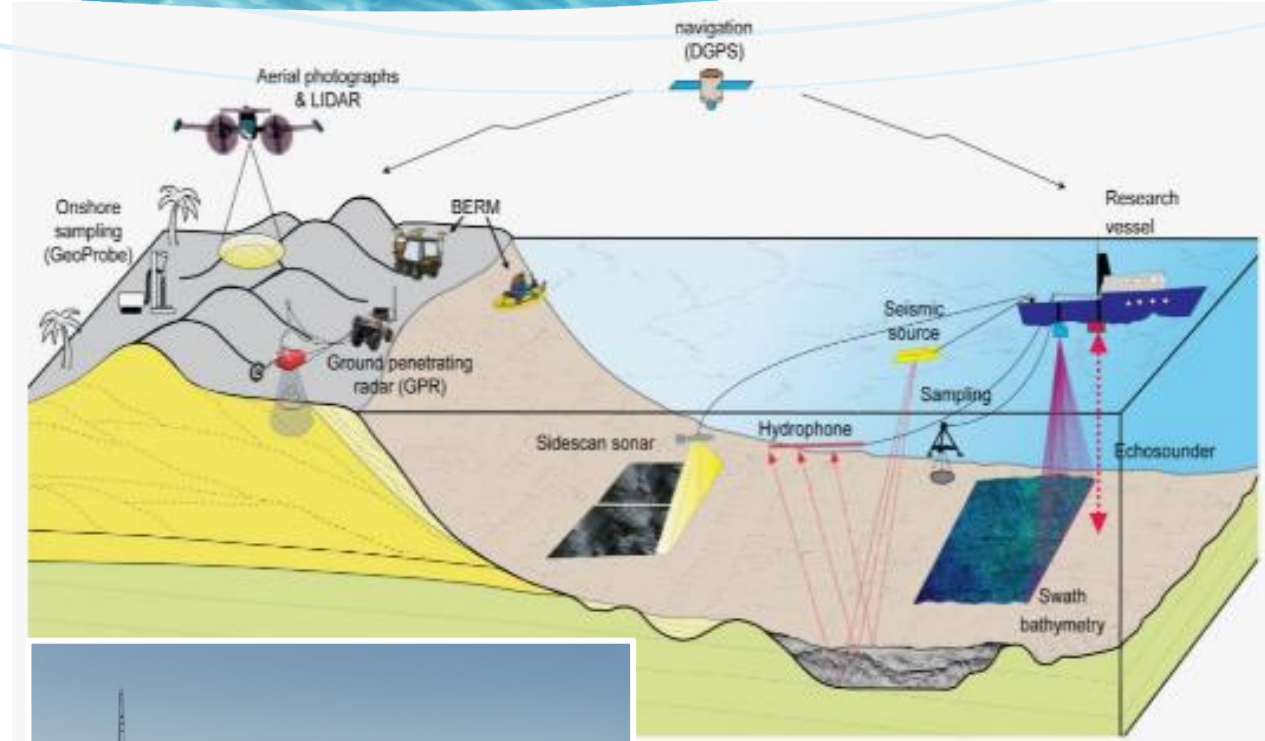
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Proposed Sale Notice

What is in a PSN?

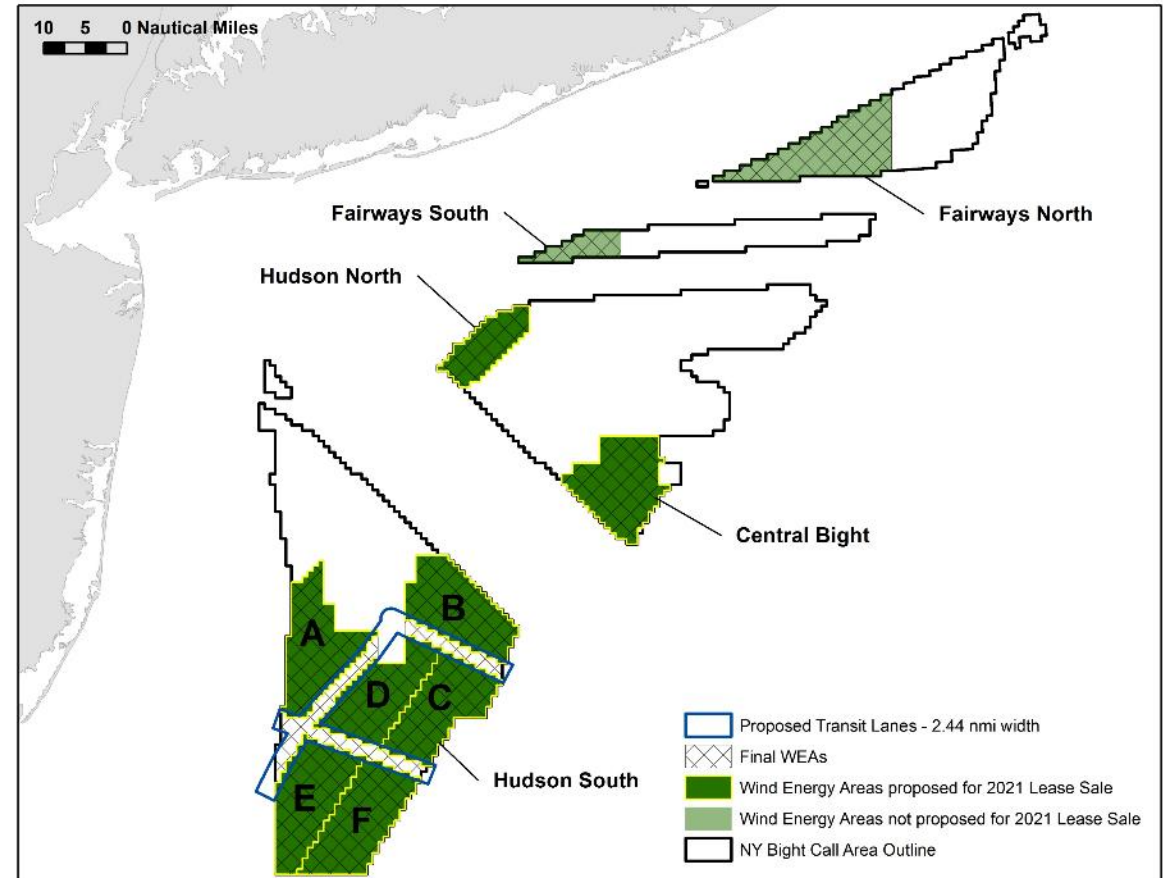
- Area for leasing
- Fiscal terms
- Auction details and format
- Proposed lease terms
- Last opportunity to submit company qualification materials
 - Legal
 - Technical
 - Financial
- Nonmonetary factors

Auction Seminar for potential bidders



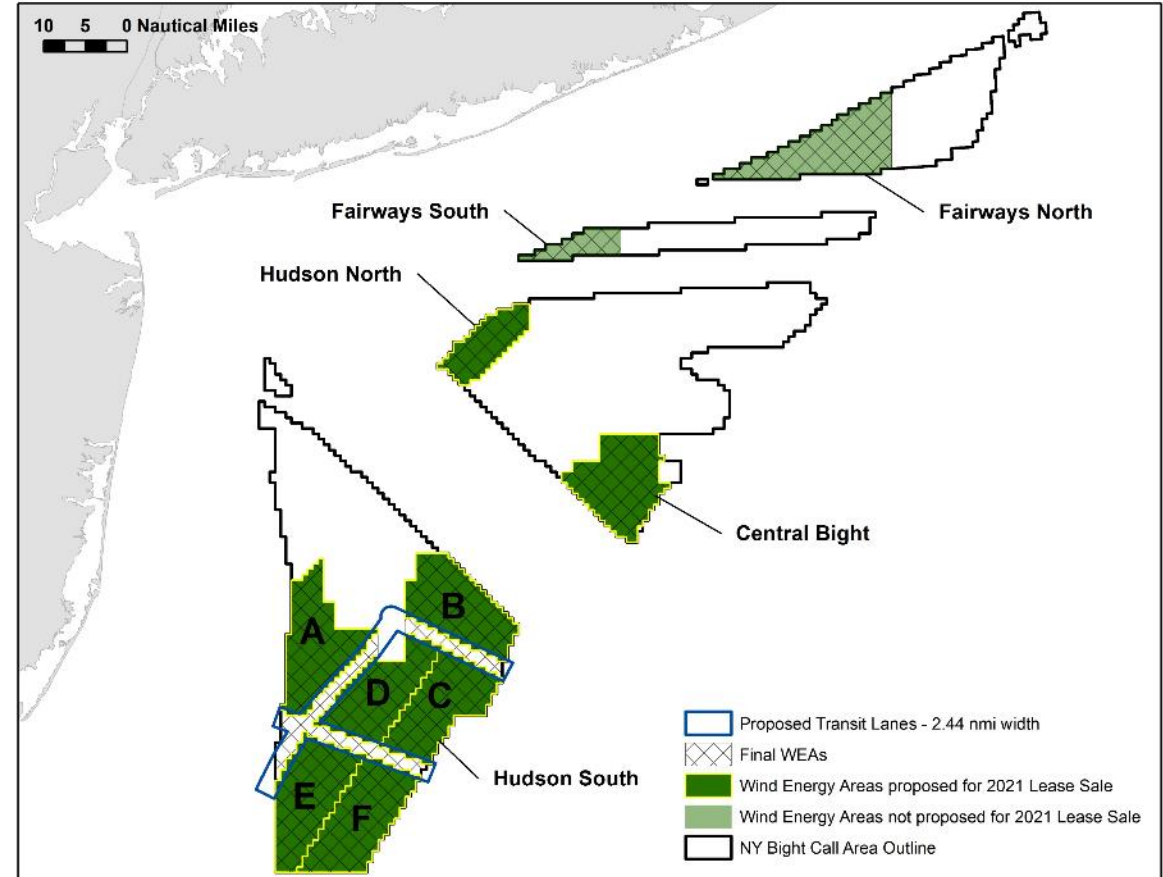
Proposed Lease Areas

- Represents a balance between existing users and emerging industry
- Eight areas
 - 627,000 acres
 - 7.6+ GW, conservatively
 - ~2.7 million homes powered
- Fairways North and South
 - Not considered for leasing, in part, due to maritime traffic, proposed fairway, commercial fisheries, commercial viability



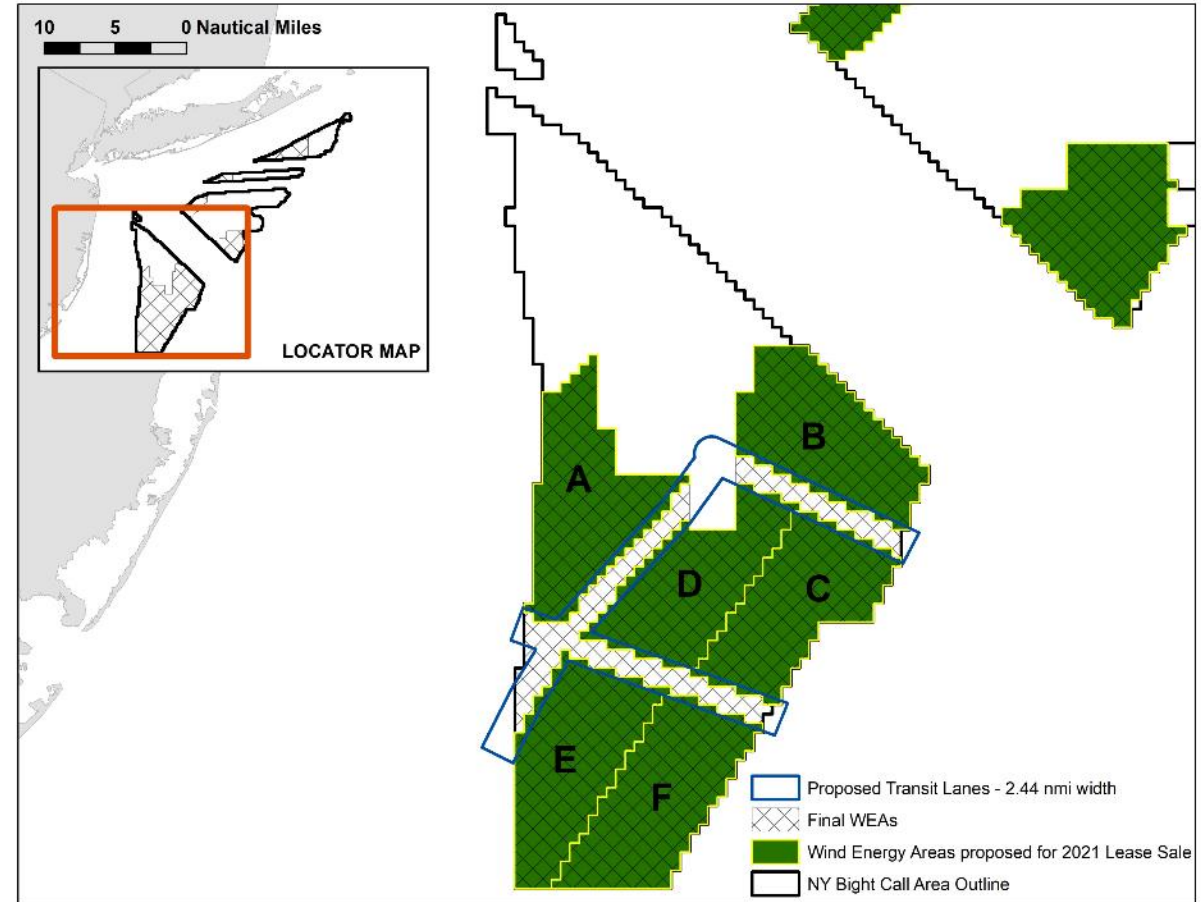
Proposed Lease Areas: Hudson North and HS-A

- **Aware of outstanding conflicts**
 - Hudson North – USCG Proposed Tug Tow Lane
 - HS-A – DOD Activities
- **BOEM looks forward to working with the Task Force to identify a path forward.**



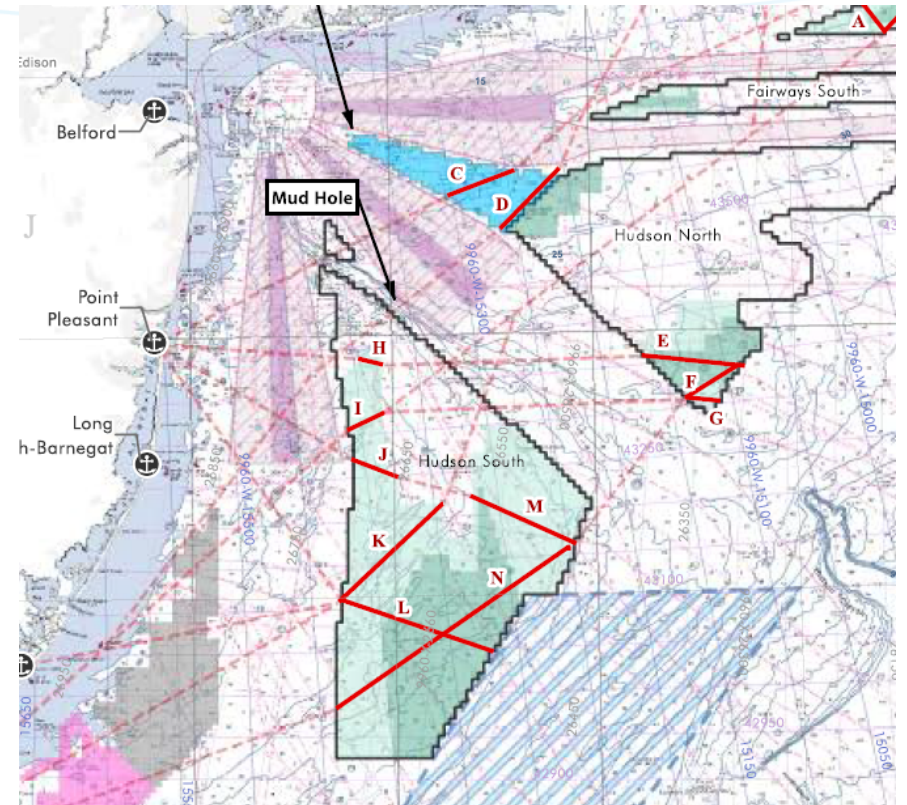
Hudson South

- **Hudson South was subdivided so each area:**
 - is of roughly equal commercial viability and size;
 - includes transit lanes to account for vessel traffic patterns, fisheries, and DoD concerns;
 - is laid out in a manner to reduce wake effect; and
 - facilitates fair return to the government pursuant to the Outer Continental Shelf Lands Act.



Hudson South: Transit Lanes

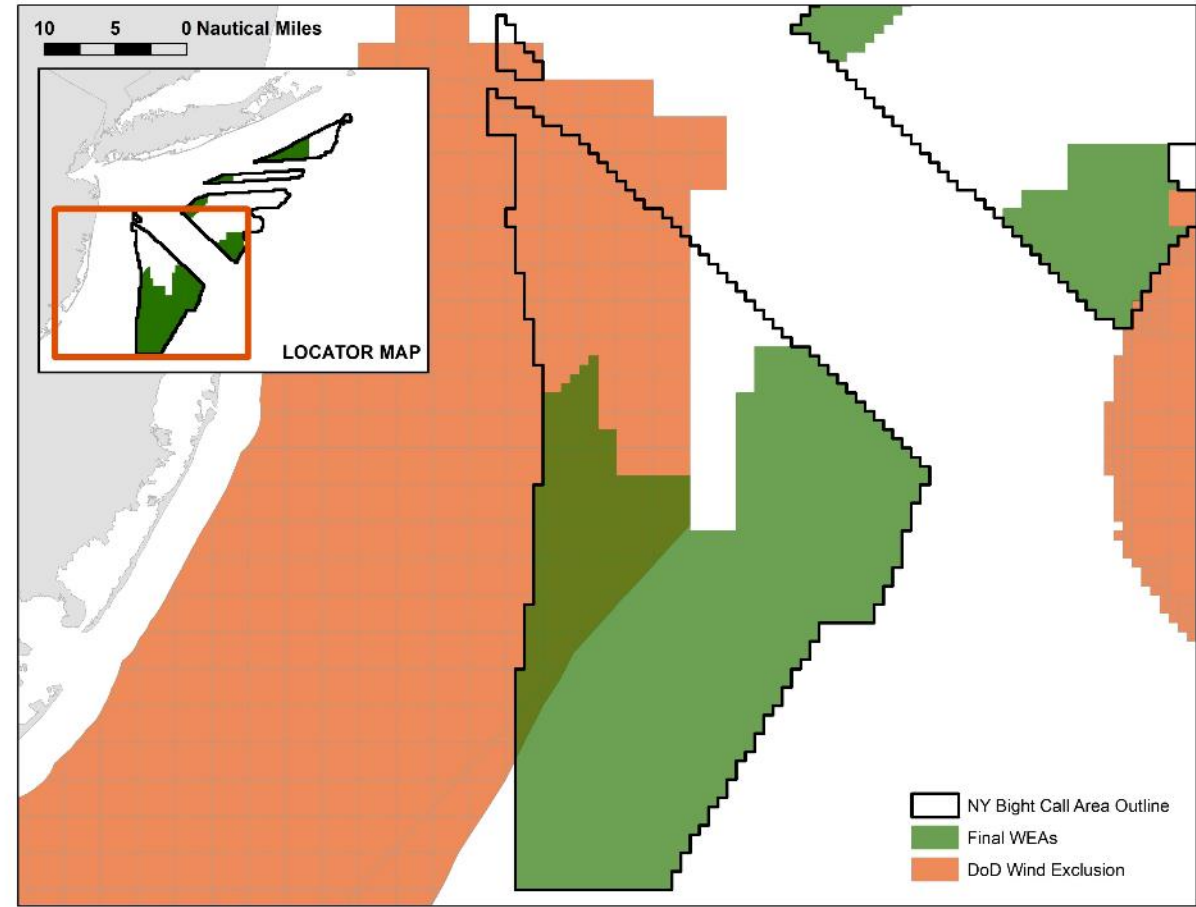
- **NYSERDA, NYSDEC, and RODA Workshop and Outreach Summary**
 - June 2020
- **Transit Lanes Width**
 - 2.44 nmi wide
 - Permanent International Association of Navigation Congress (PIANC)
 - Areas of overlap – no surface occupancy



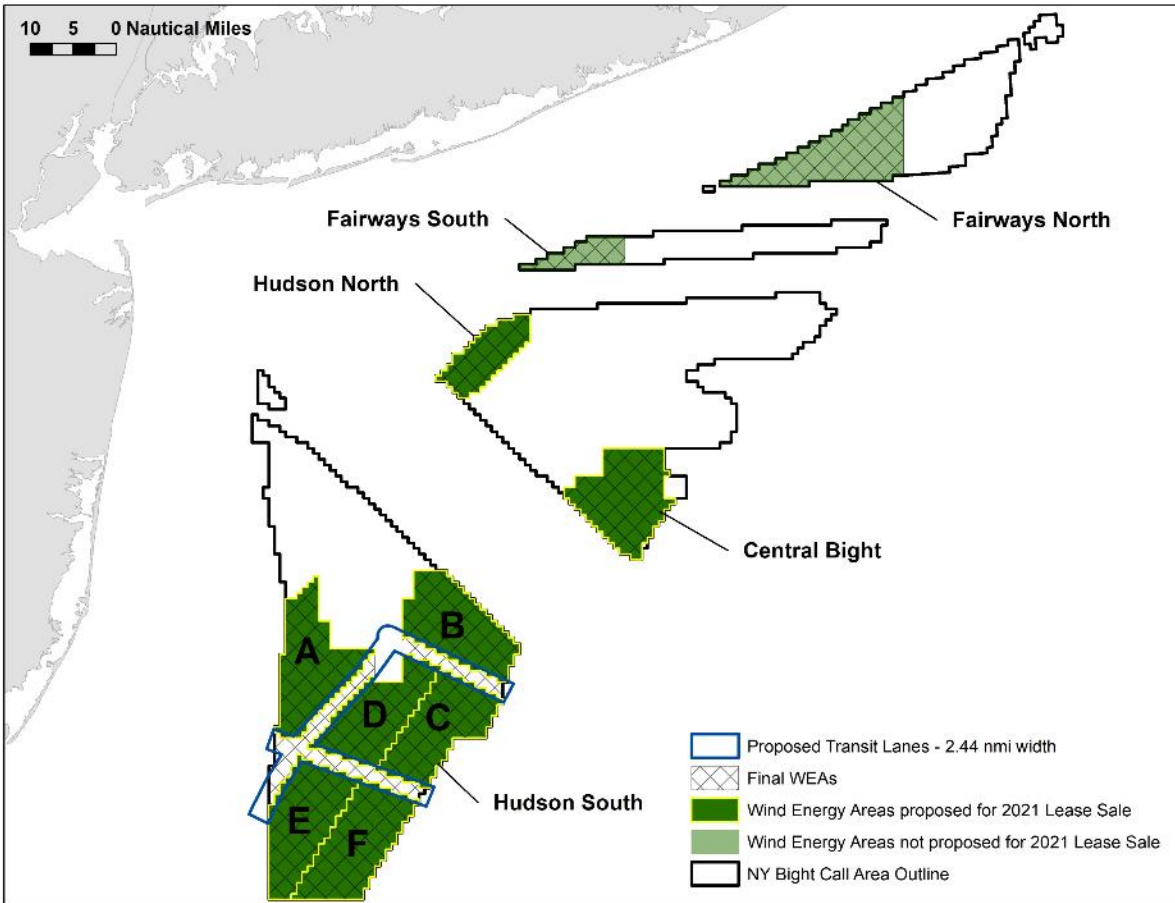
Hudson South: DOD

- **DoD overlap**

- Working to understand training activities and determine if there is an opportunity for co-existence
- Transit lane aligned with border



Proposed Lease Areas: By the Numbers



Lease Area	Acres	Installation Capacity (MW) ¹	Homes powered ²	Power Production (MWh/yr) ³
Central Bight	84,688	1,028	359,857	3,602,678
Hudson North	43,056	523	182,954	1,831,628
HS-A	85,755	1,041	182,954	3,648,088
HS-B	84,332	1,024	358,344	3,587,533
HS-C	80,062	972	340,200	3,405,885
HS-D	76,504	929	325,081	3,254,525
HS-E	85,044	1,032	361,369	3,617,822
HS-F	87,890	1,067	373,462	3,738,893
Total	627,331	7,616	2,665,659	26,687,052

¹ Megawatts (MW) based upon 3MW/sqkm. Note this energy density conversion ratio is conservative, BOEM is reviewing COPs for projects with twice the energy density used here.

² Based upon 350 homes per MW

³ Megawatt hours per year (MWh/yr) Formula = Capacity (MW) * 8760 (hrs/yr) * 0.4 (capacity factor)

New York Bight Milestones

Milestone	Action	Target Date
Environmental Assessment	NOA Draft EA	July 2021
	30-Day Comment Period	July-August 2021
	NOA Final EA/FONSI	September 2021
Proposed Sale Notice	Publish PSN	June 2021
	60-Day Comment Period	June - August 2021
Final Sale Notice	Publish FSN	Fall 2021
	Minimum 30-Day Waiting Period	
Lease Sale	Sale Date	Late 2021 or Early 2022

Questions for Task Force Consideration

1. Number, size, orientation, and location of the proposed lease areas

- which lease areas, if any, should be prioritized for inclusion, or exclusion, from this lease sale and/or future lease sales
- Alternative subdivisions

2. Transit Corridors

- Reflections on proposed transit corridors

BOEM

Bureau of Ocean Energy
Management

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