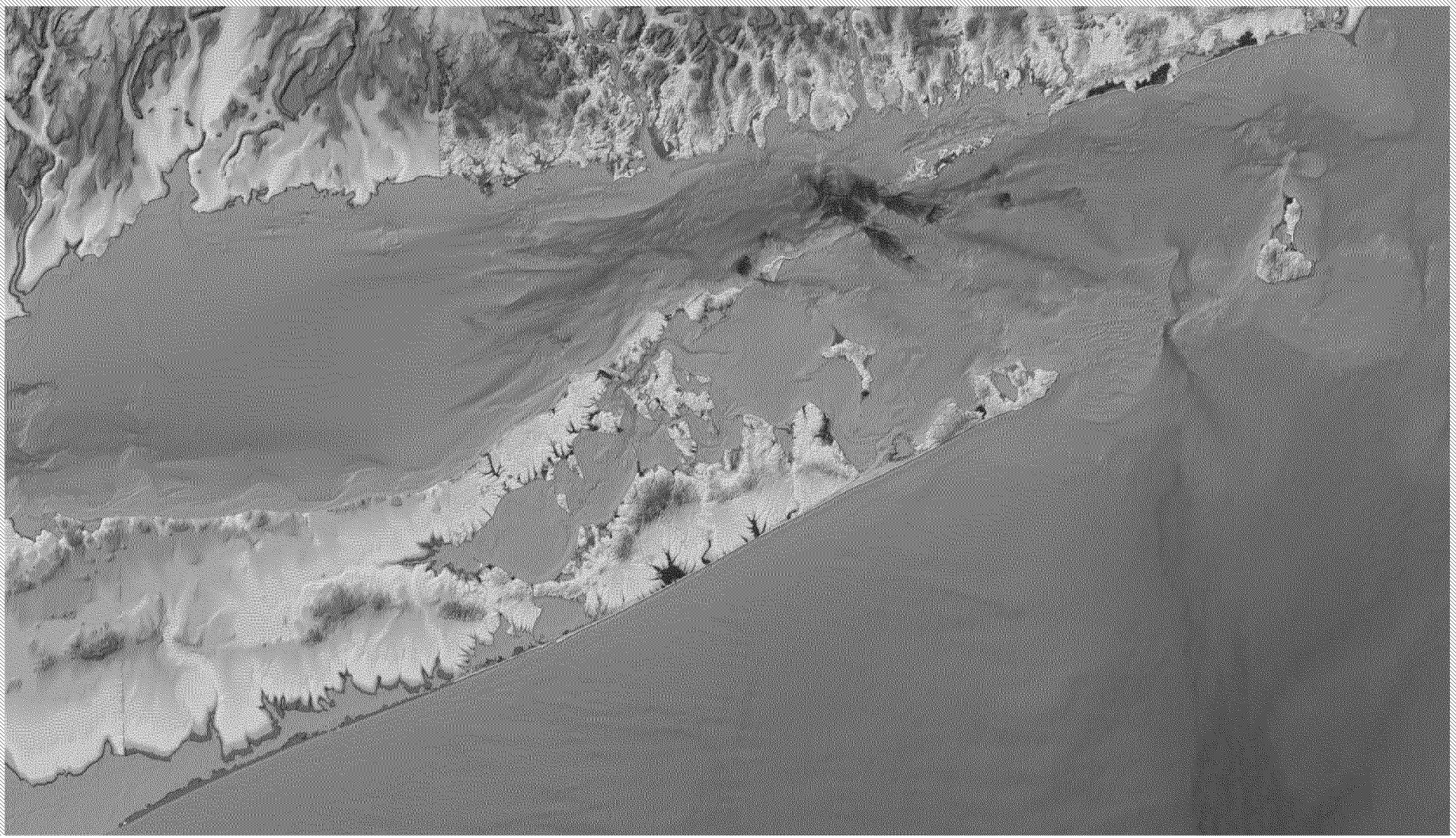
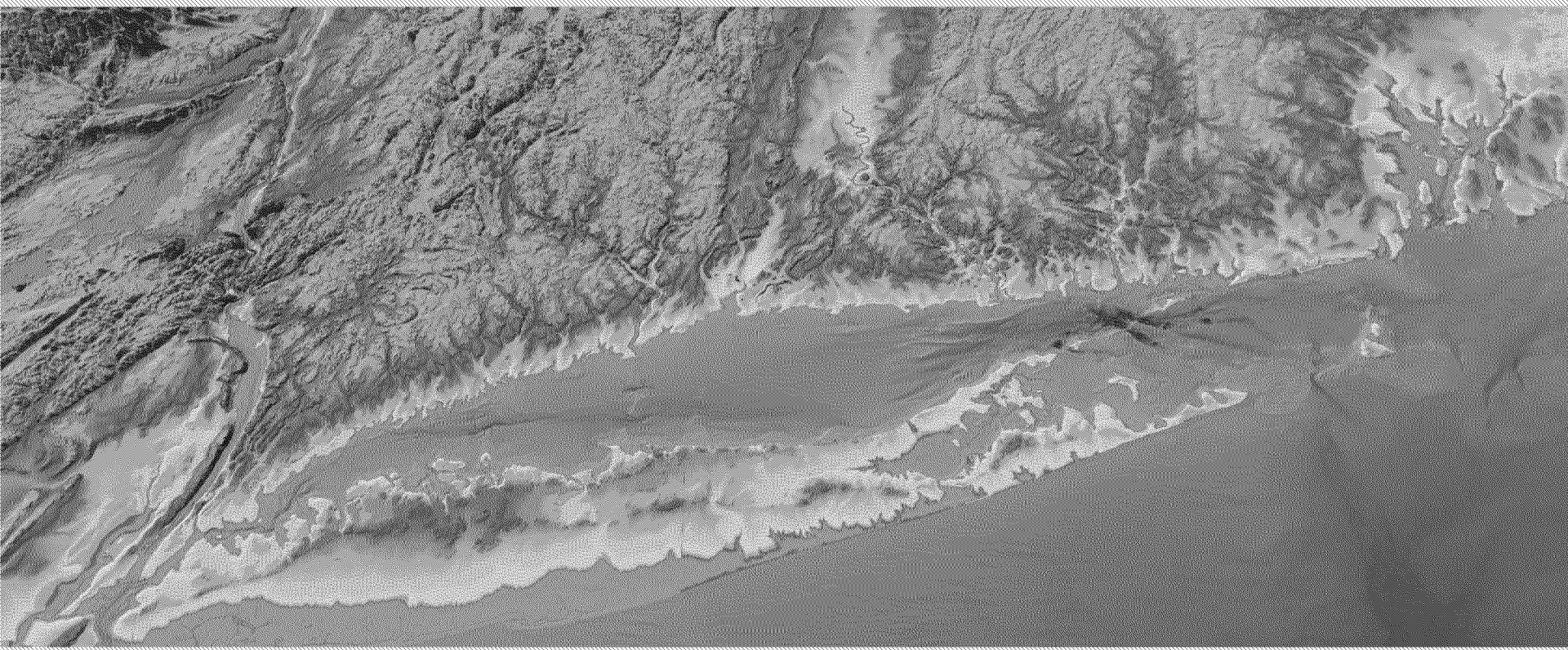
Eastern Long Island Sound SEIS

U.S. EPA Region 1

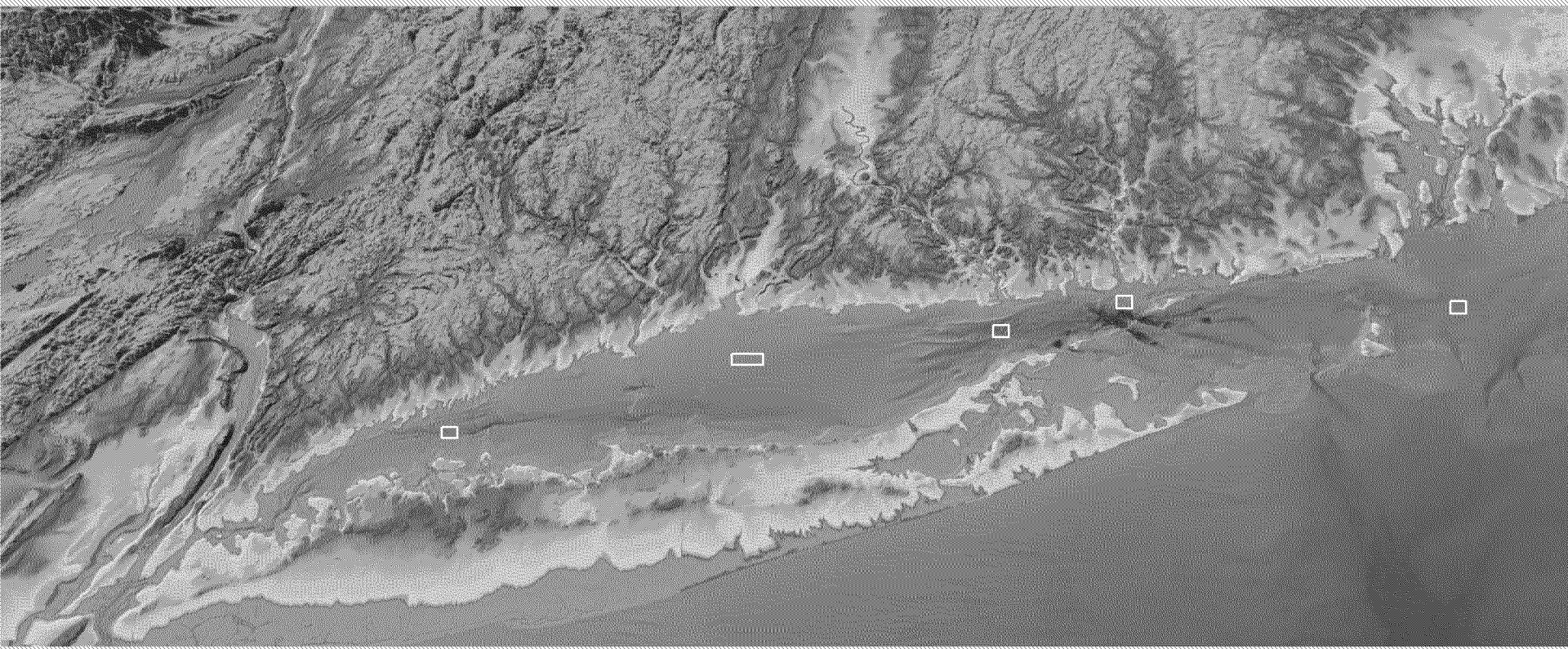
Long Island Sound



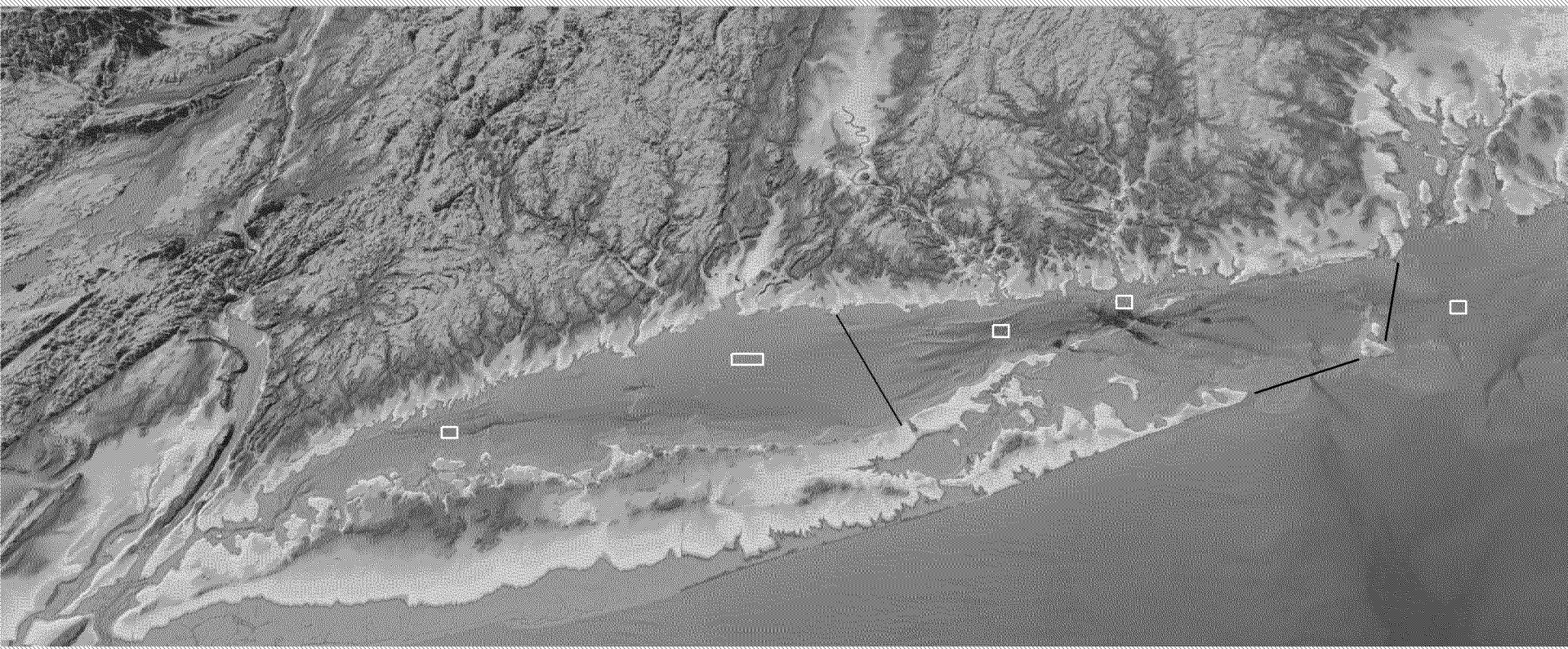
Long Island Sound



Long Island Sound



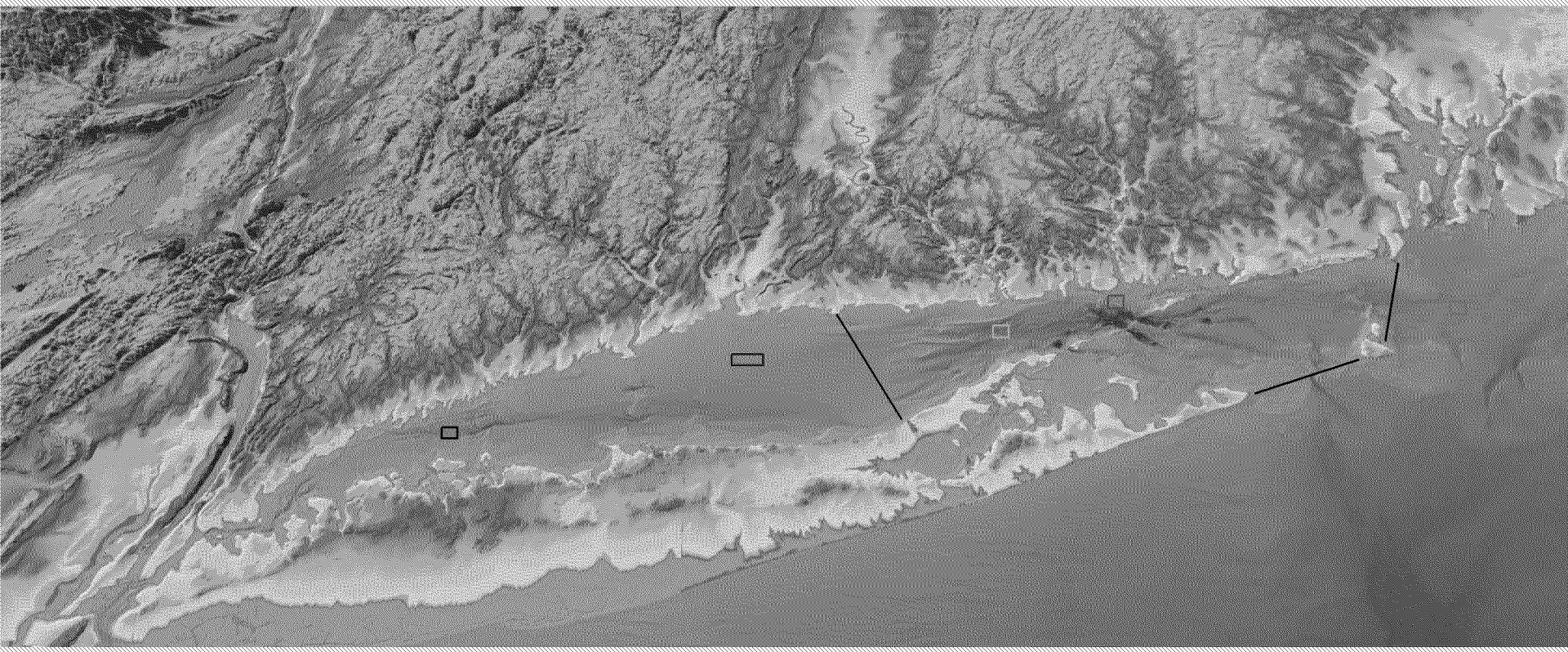
Long Island Sound



Long Island Sound

- Western Long Island Sound Disposal Site
- Central Long Island Sound Disposal Site
- Cornfield Shoals Disposal Site
- New London Disposal Site
- Rhode Island Sound Disposal Site

Long Island Sound



Western Long Island Sound Disposal Site

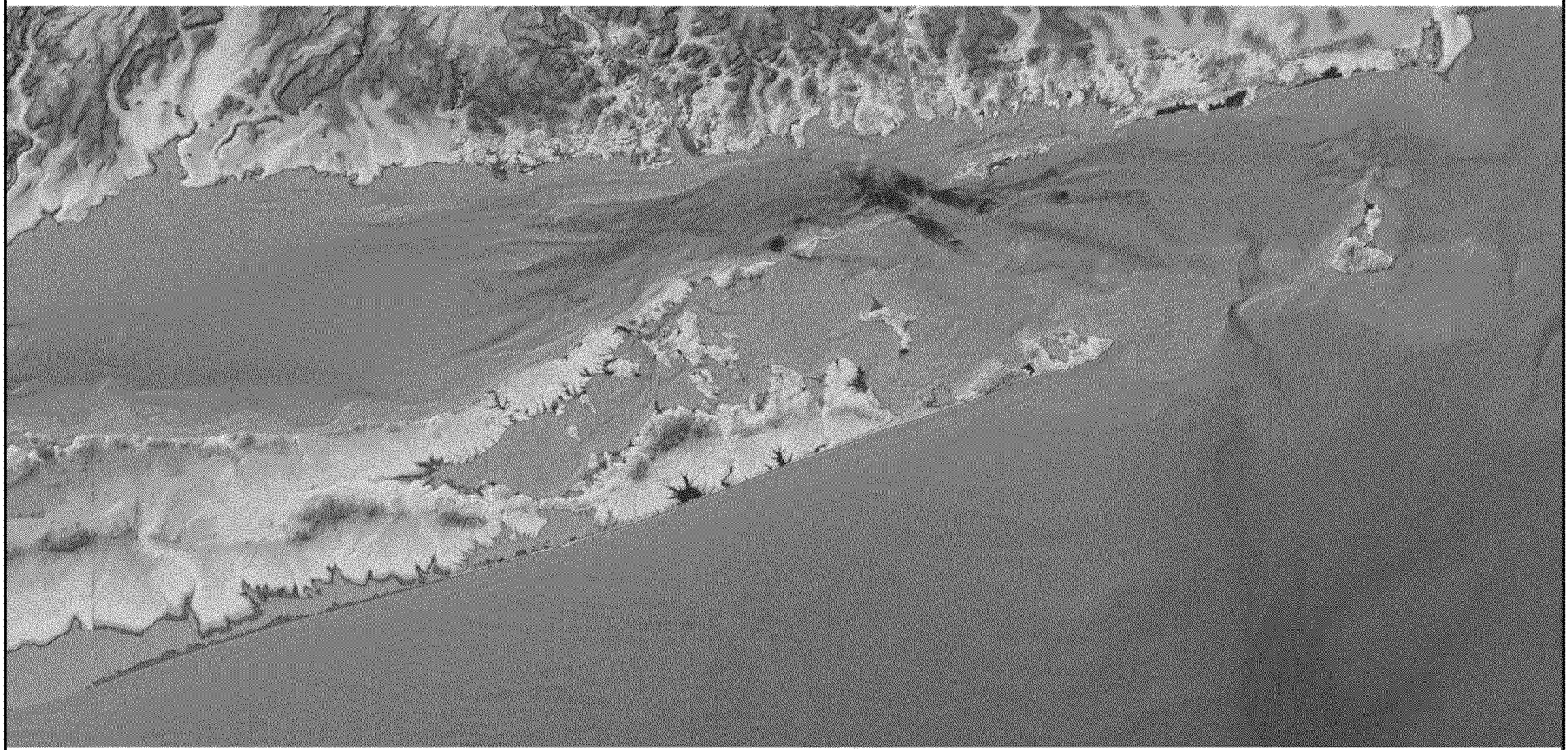
Central Long Island Sound Disposal Site

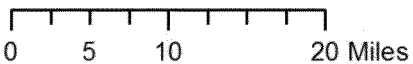
Cornfield Shoals Disposal Site

New London Disposal Site

Rhode Island Sound Disposal Site

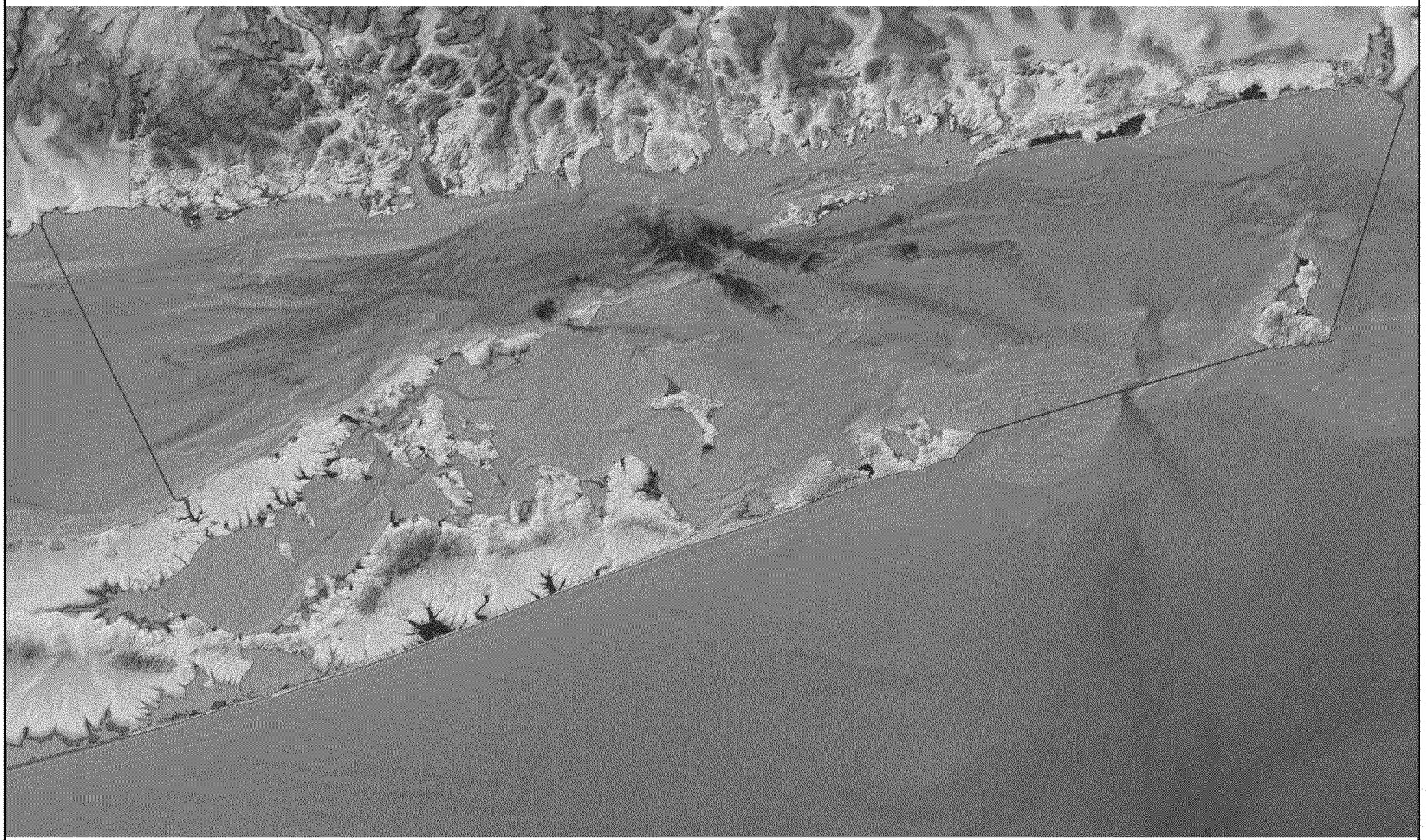
Bathymetry of Eastern Long Island Sound Zone of Siting Feasibility





DAMOSVision

Eastern Long Island Sound Zone of Siting Feasibility



N

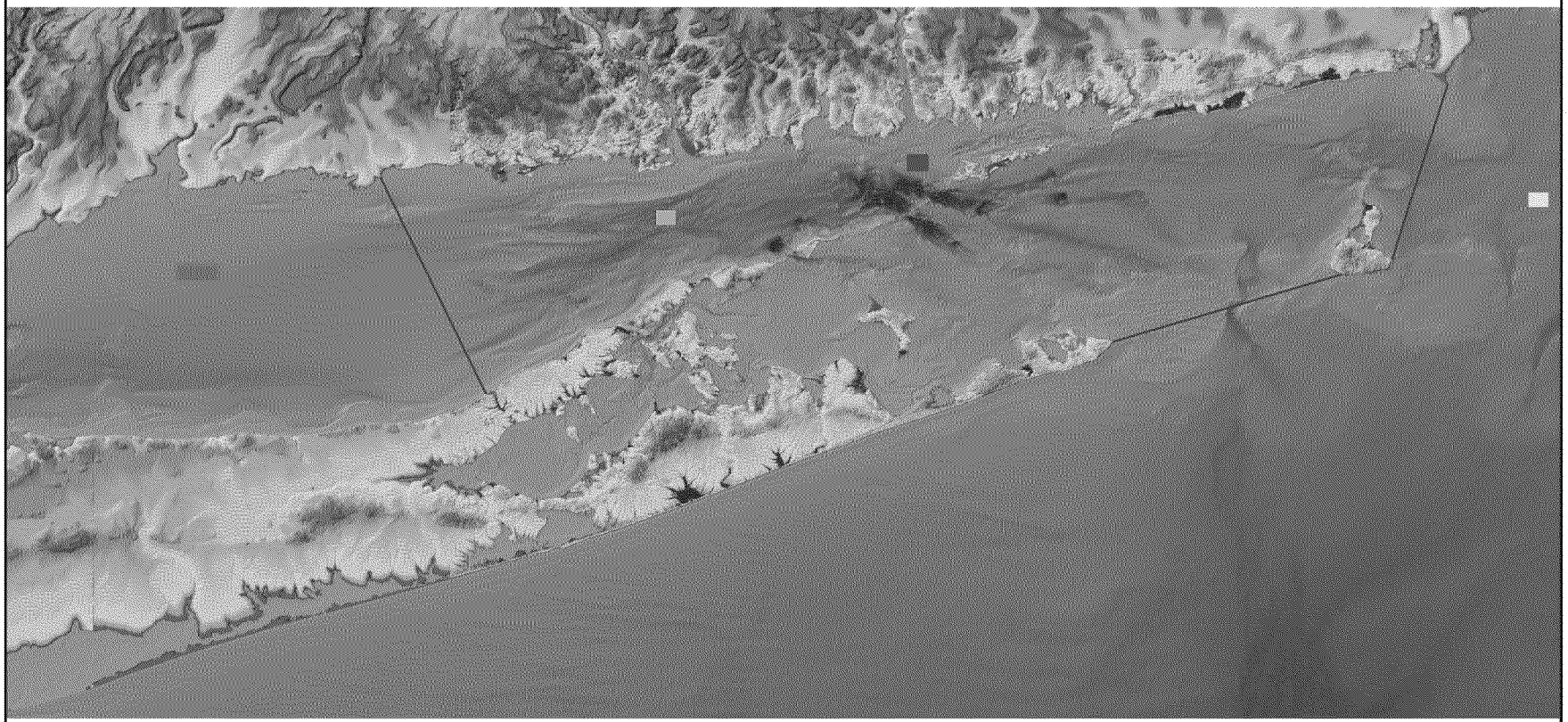
Zone of Siting Feasibility

—— ELIS SEIS

0 5 10 20 Miles

DAMOSVision

Eastern Long Island Sound Zone of Siting Feasibility



Current Disposal Sites in Eastern Long Island Sound and Rhode Island Sound

N

Rhode Island Disposal Site, Current Disposal Site

Cornfield Shoals Disposal Site, Current Disposal Site

Central Long Island Sound Disposal Site, Current Disposal Site

New London Disposal Site, Current Disposal Site

Zone of Siting Feasibility

—— ELIS SEIS

0 5 10 20 Miles

DAMOSVision

Eastern Long Island Sound Zone of Siting Feasibility

Current and Historic Disposal Sites in Eastern Long Island Sound

- Rhode Island Disposal Site, Current Disposal Site
- Central Long Island Sound Disposal Site, Current Disposal Site
- Cornfield Shoals Disposal Site, Current Disposal Site
- New London Disposal Site, Current Disposal Site
- Block Island Sound Disposal Site, Historic Disposal Site
- Clinton Harbor Disposal Site, Historic Disposal Site
- Falkner Island Disposal Site, Historic Disposal Site
- Mattituck Disposal Site, Historic Disposal Site
- Niantic Bay Disposal Site, Historic Disposal Site
- North Dumpling Disposal Site, Historic Disposal Site
- Orient Point Disposal Site, Historic Disposal Site
- Six Mile Reef Disposal Site, Historic Disposal Site
- Stonington Disposal Site, Historic Disposal Site

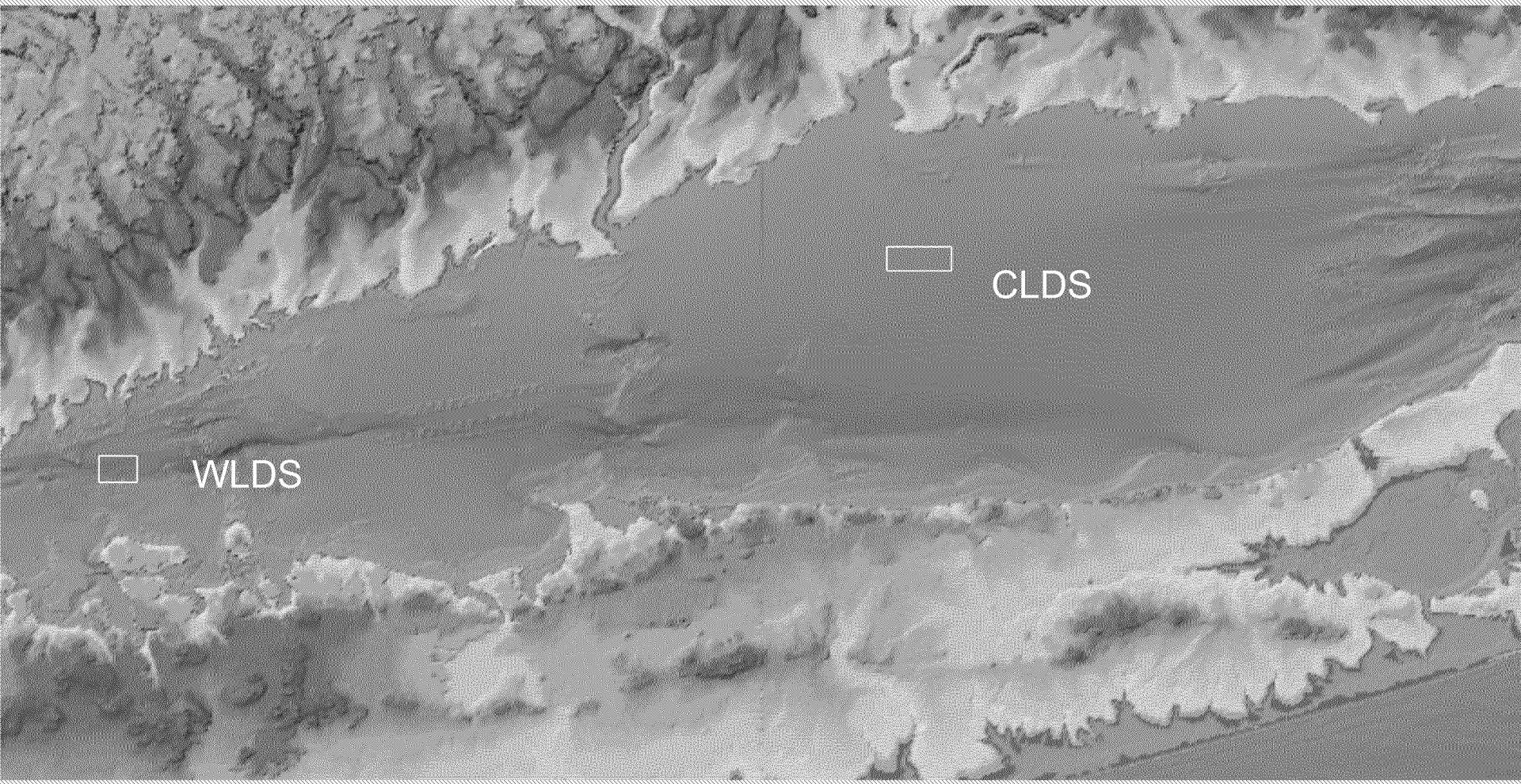
0 5 10 20 Miles

Zone of Siting Feasibility

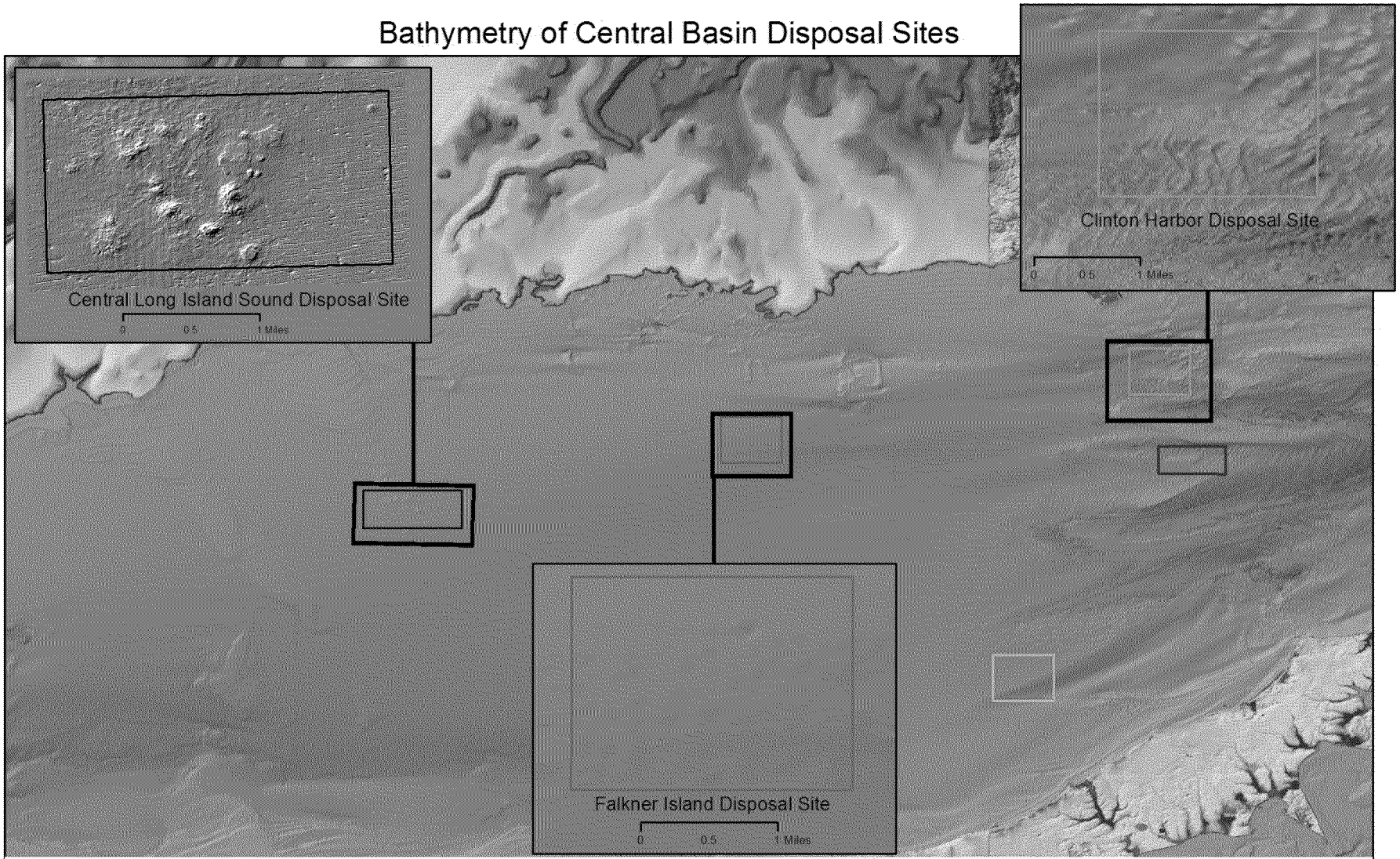
ELIS SEIS

DAMOSVision

Active Disposal Sites



Bathymetry of Central Basin Disposal Sites



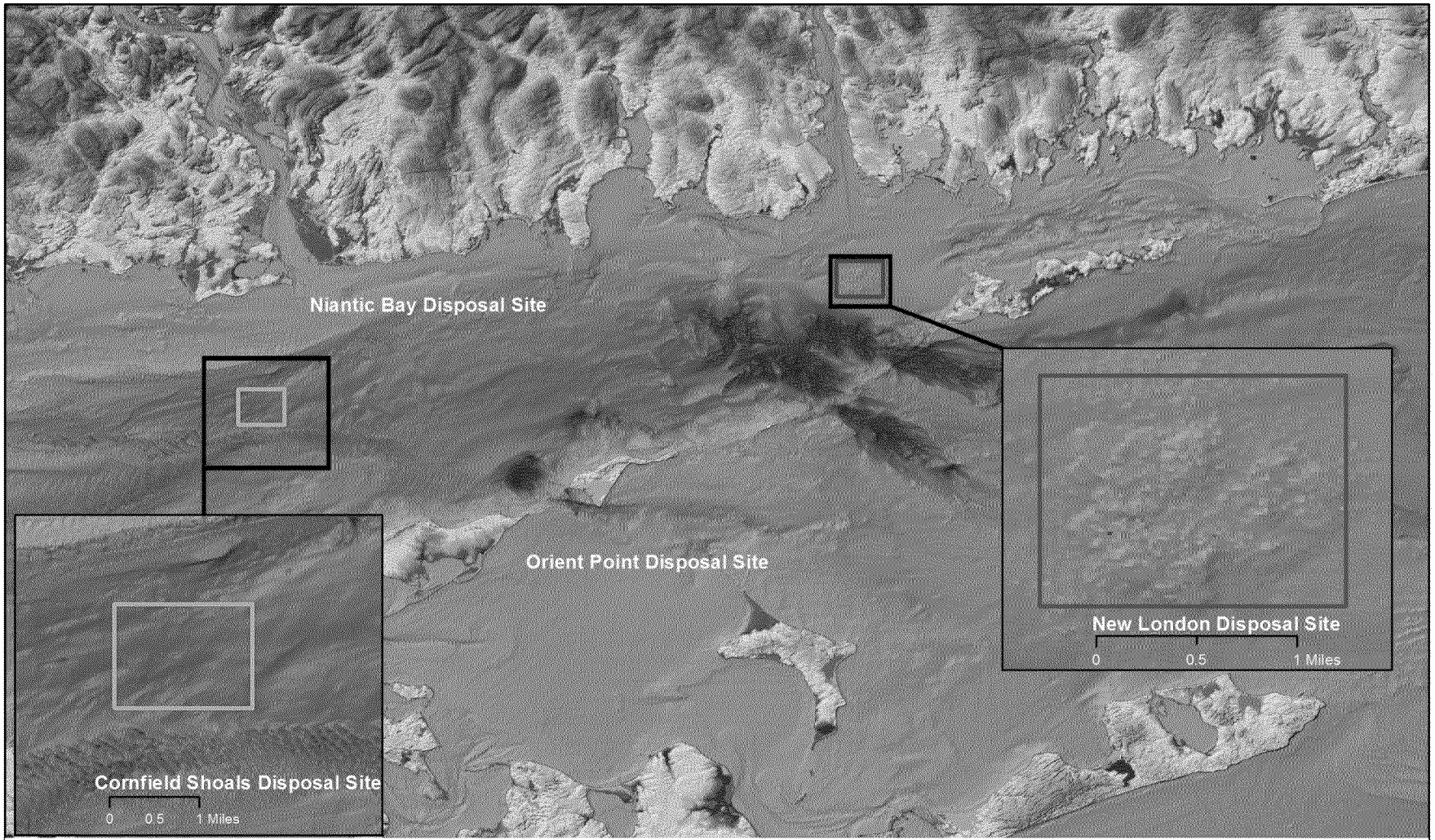
Disposal Sites

0 3 6 12 Miles

- Central Long Island Sound Disposal Site, Current Disposal Site
- Clinton Harbor Disposal Site, Historic Disposal Site
- Falkner Island Disposal Site, Historic Disposal Site
- Mattituck Disposal Site, Historic Disposal Site
- Six Mile Reef Disposal Site, Historic Disposal Site

DAMOSVision

Bathymetry of Eastern Basin Disposal Sites



0 3 6 12 Miles

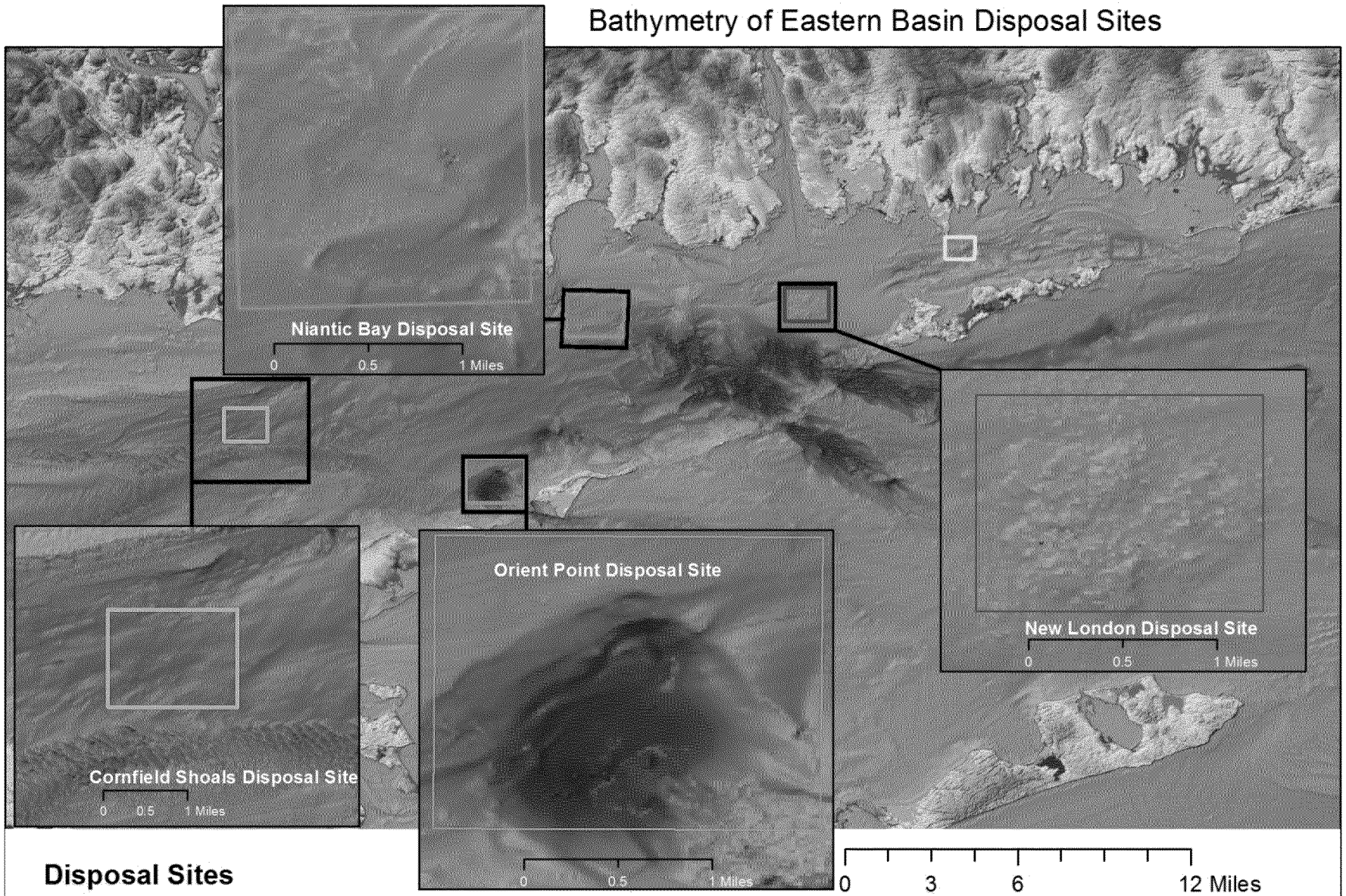
Disposal Sites

Cornfield Shoals Disposal Site, Current Disposal Site

New London Disposal Site, Current Disposal Site

DAMOSVision

Bathymetry of Eastern Basin Disposal Sites

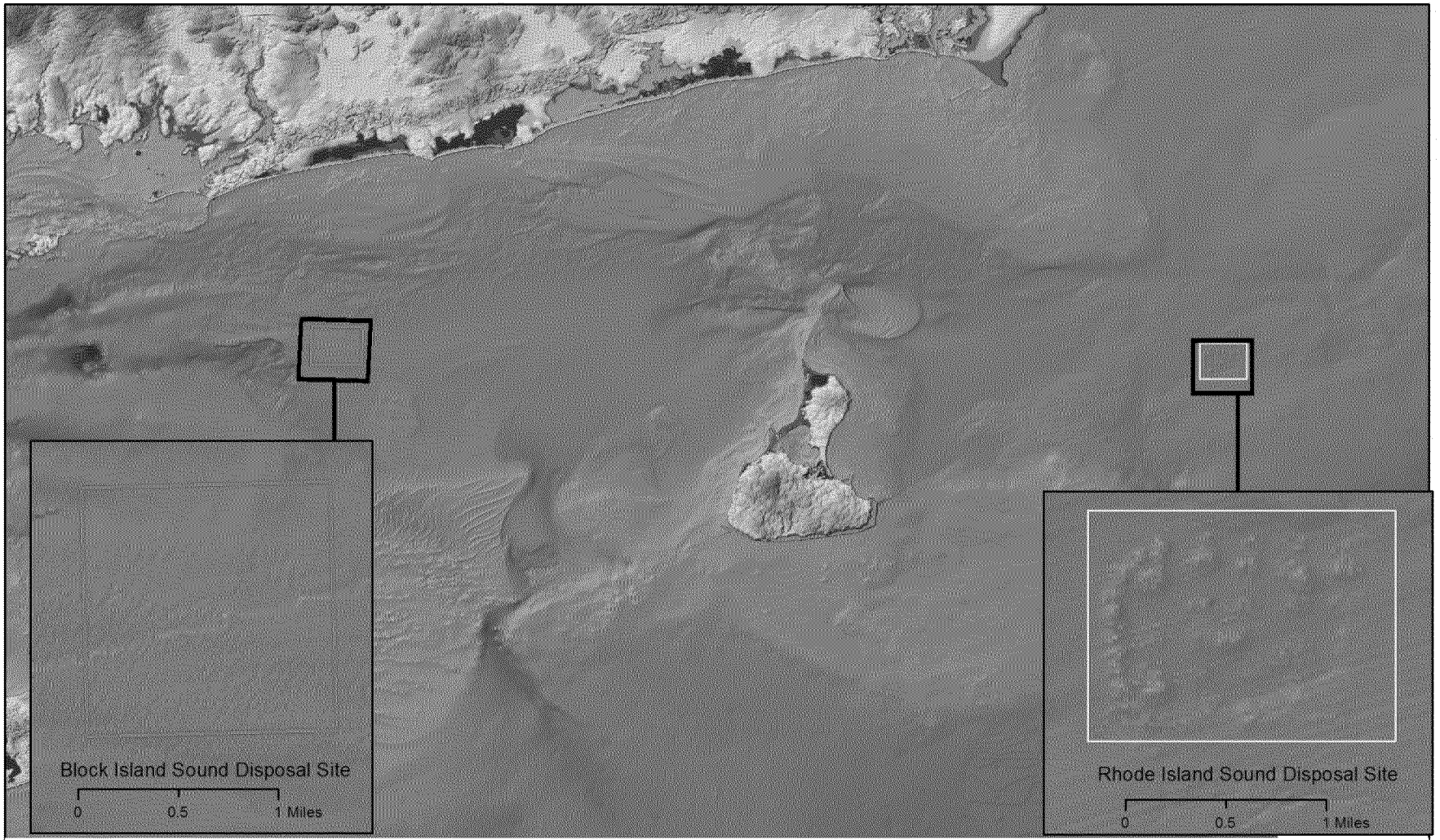


Disposal Sites

- Cornfield Shoals Disposal Site, Current Disposal Site
- New London Disposal Site, Current Disposal Site
- Niantic Bay Disposal Site, Historic Disposal Site
- North Dumpling Disposal Site, Historic Disposal Site
- Orient Point Disposal Site, Historic Disposal Site
- Stonington Disposal Site, Historic Disposal Site

DAMOSVision

Bathymetry of Block Island and Rhode Island Sound Disposal Sites



Disposal Sites

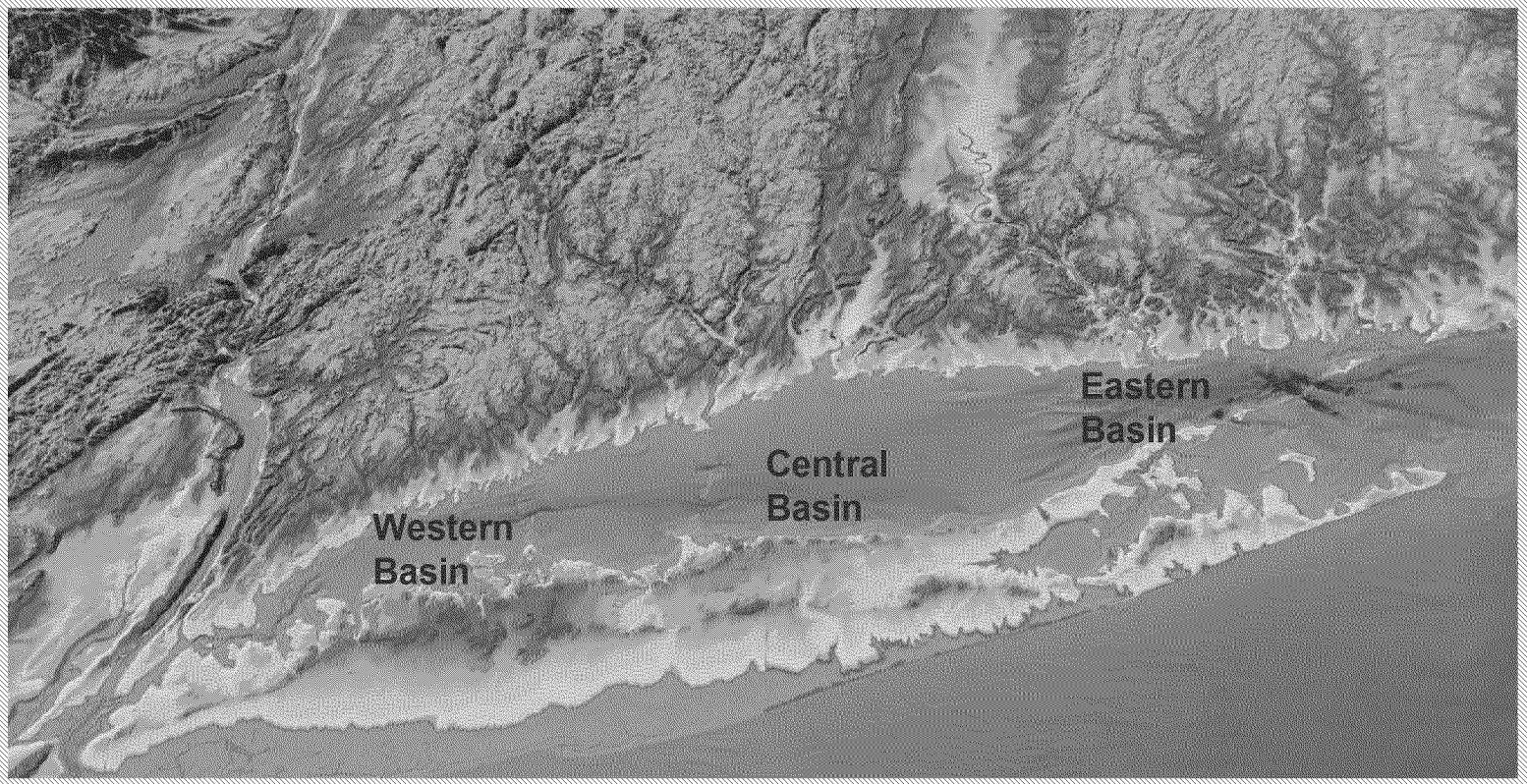
Block Island Sound Disposal Site, Historic Disposal Site

Rhode Island Disposal Site, Current Disposal Site

DAMOSVision

Long Island Sound

Long Island Sound is an estuary with an ESE-WNW axis and distinctly different margins. The northern margin has extensive bedrock and glacial deposits drained by river systems that extend as much as 655 km north and discharge fine sediment into small harbors. The southern margin is a glacial moraine with rocky shoreline and very small drainage basins that discharge sand.



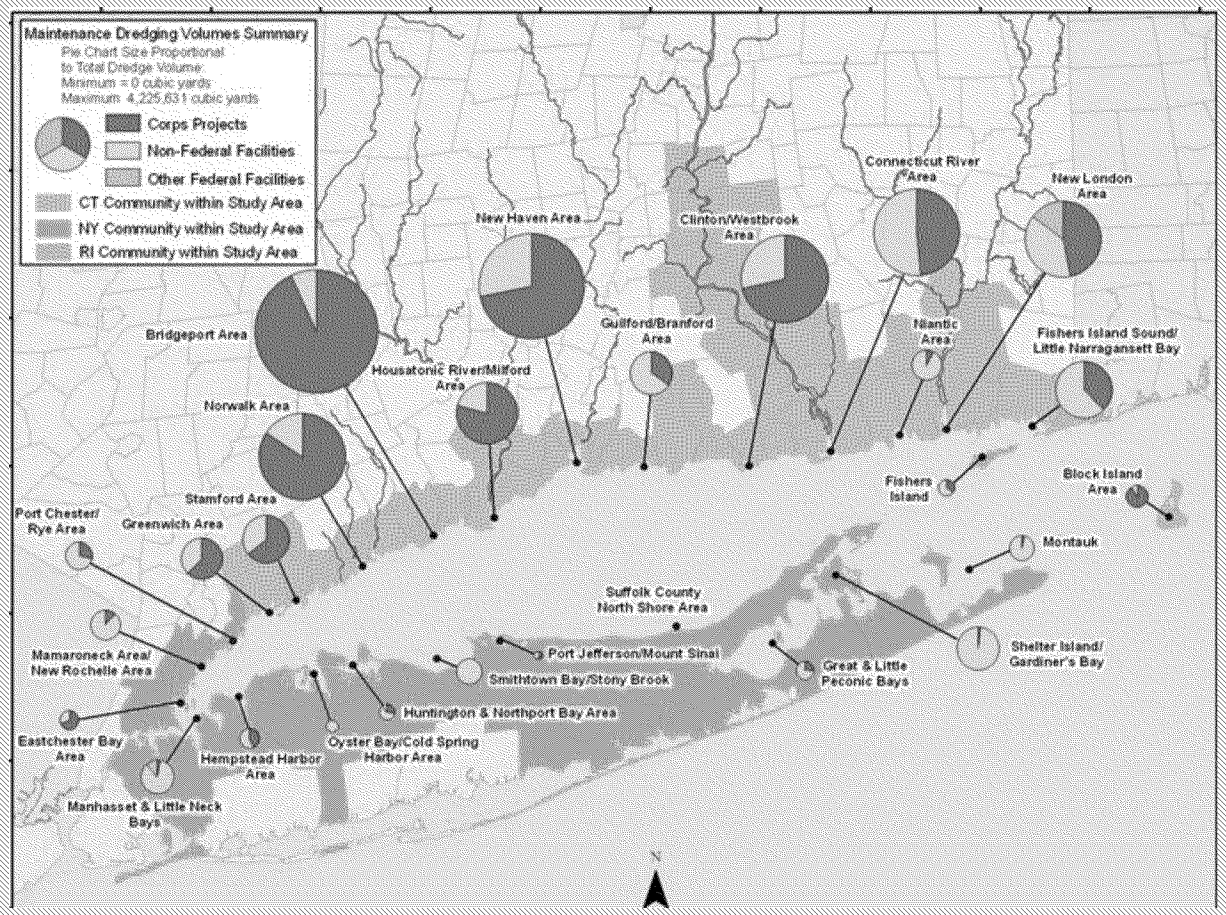
The complex geological history of the Sound has left three distinct basins separated by shallow ridges or sills. Each basis contains several important commercial ports and many small harbors that support commercial fishing and recreational boating.

Long Island Sound Dredging Needs

The region is expected to dredge over 38 million cy of harbor sediments in the next 30 years

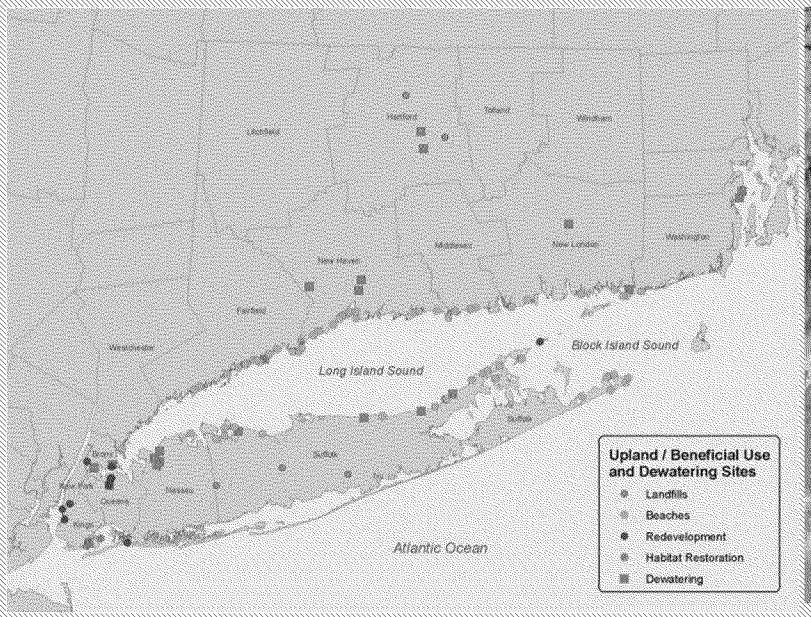
The majority of the sediments are from Corps Projects located in Connecticut on the northern shore of the Sound.

Much smaller volumes of largely non-federal projects are projected for the coast of Long Island, New York

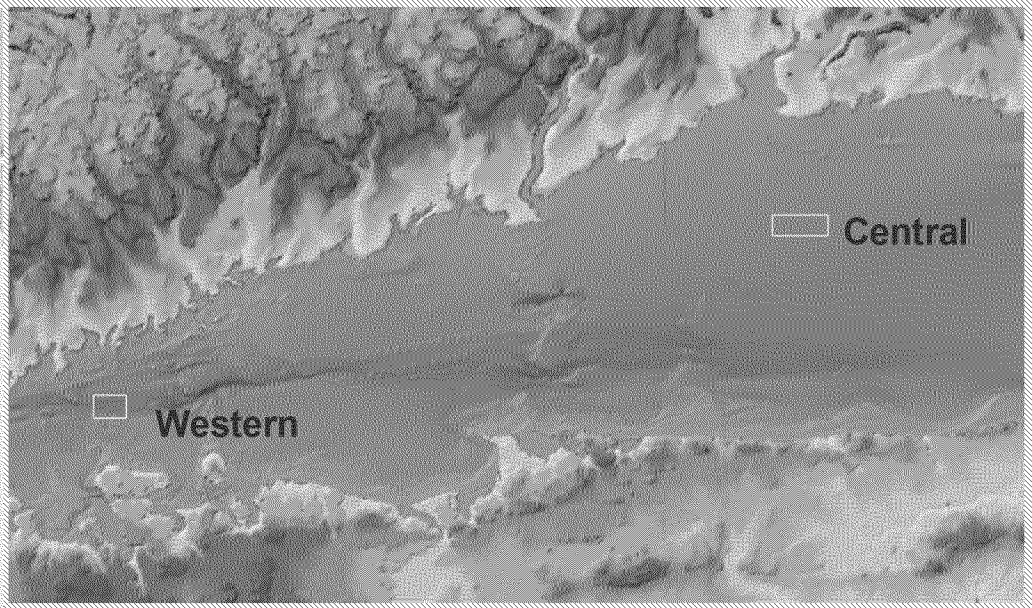


Dredged Material Management

Placement alternatives will be defined through a regional Dredged Material Management Plan (DMMP) including upland, nearshore, beneficial use and aquatic placement.



Upland, Beneficial Use and Dewatering Sites Considered



Ocean Dredged Material Disposal Sites

Existing Data

LIS EIS

- Site Surveys
- Physical Oceanography
- Triad: chemistry, biology, toxicity

DAMOS

- NLDS – 10 surveys since 1990: bathy, physical oceanography, benthic biology, chemistry
- CSDS – 3 surveys since 1990: bathy, sediment transport
- RISDS – 4 surveys since 2000: bathy, benthic biology, lobster abundance, plume tracking

EPA

- Sidescan data of potential sites in Eastern Basin
- Sediment profile imaging of potential sites

Public Process