ESSENTIAL FISH HABITAT DESIGNATIONS

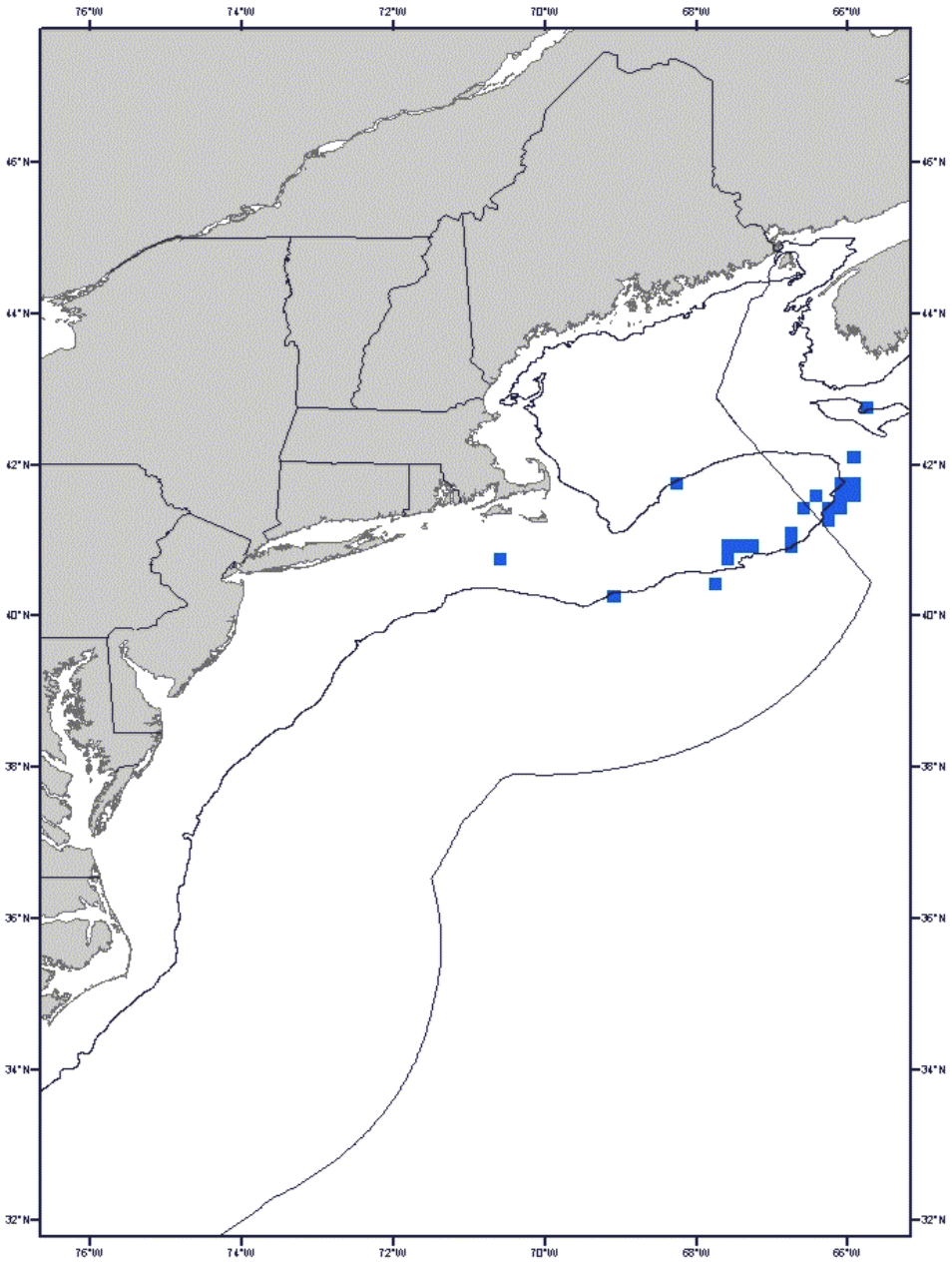
FOR

NEW ENGLAND SKATE COMPLEX

Maps of EFH Designations for 7 Skate Species

Barndoor Skate	Figures 1& 2	Offshore
Clearnose Skate	Figures 3 & 4	Coastal Distribution
Little Skate	Figures 5 & 6	Coastal Distribution
Rosette Skate	Figures 7 & 8	Offshore
Smooth Skate	Figures 9 & 10	Offshore
Thorny Skate	Figures 11 & 12	Coastal in Mass Bay
Winter Skate	Figures 13 & 14	Coastal Distribution

Figure 1 Barndoor Skate EFH Juvenile (100%)



This map represents the designation of EFH for this life history stage based on the areas of highest relative abundance of this species, based on the NMFS trawl survey (1963 - 1999). **Only the shaded squares in U.S. waters represent the EFH designation.** Only bottom habitats with mud, gravel, and sand substrates that occur within the shaded areas in U.S. waters are designated as EFH. This represents 100% of the observed range of this life stage.

Figure 2 Barndoor Skate EFH Adult (100%)

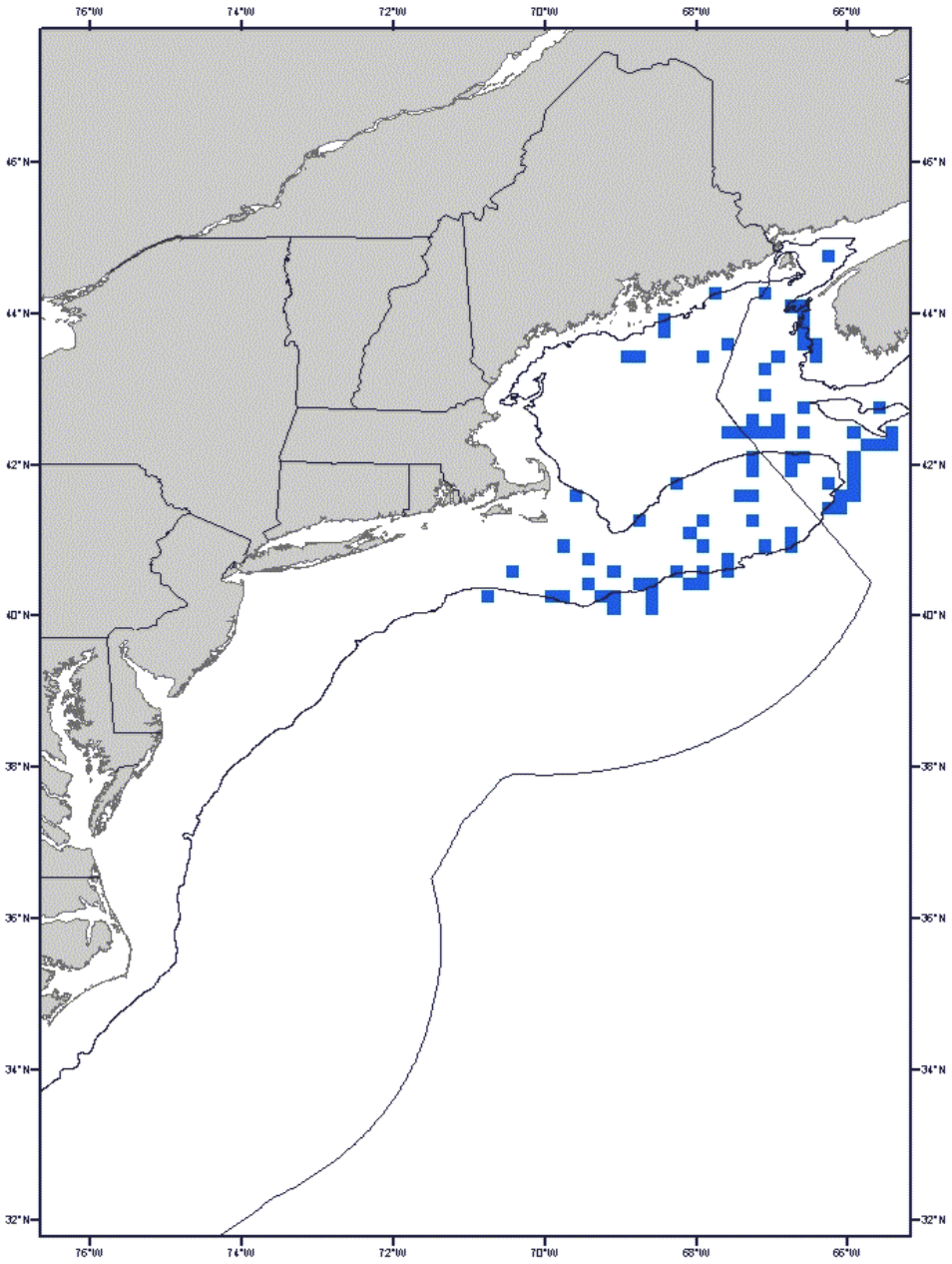


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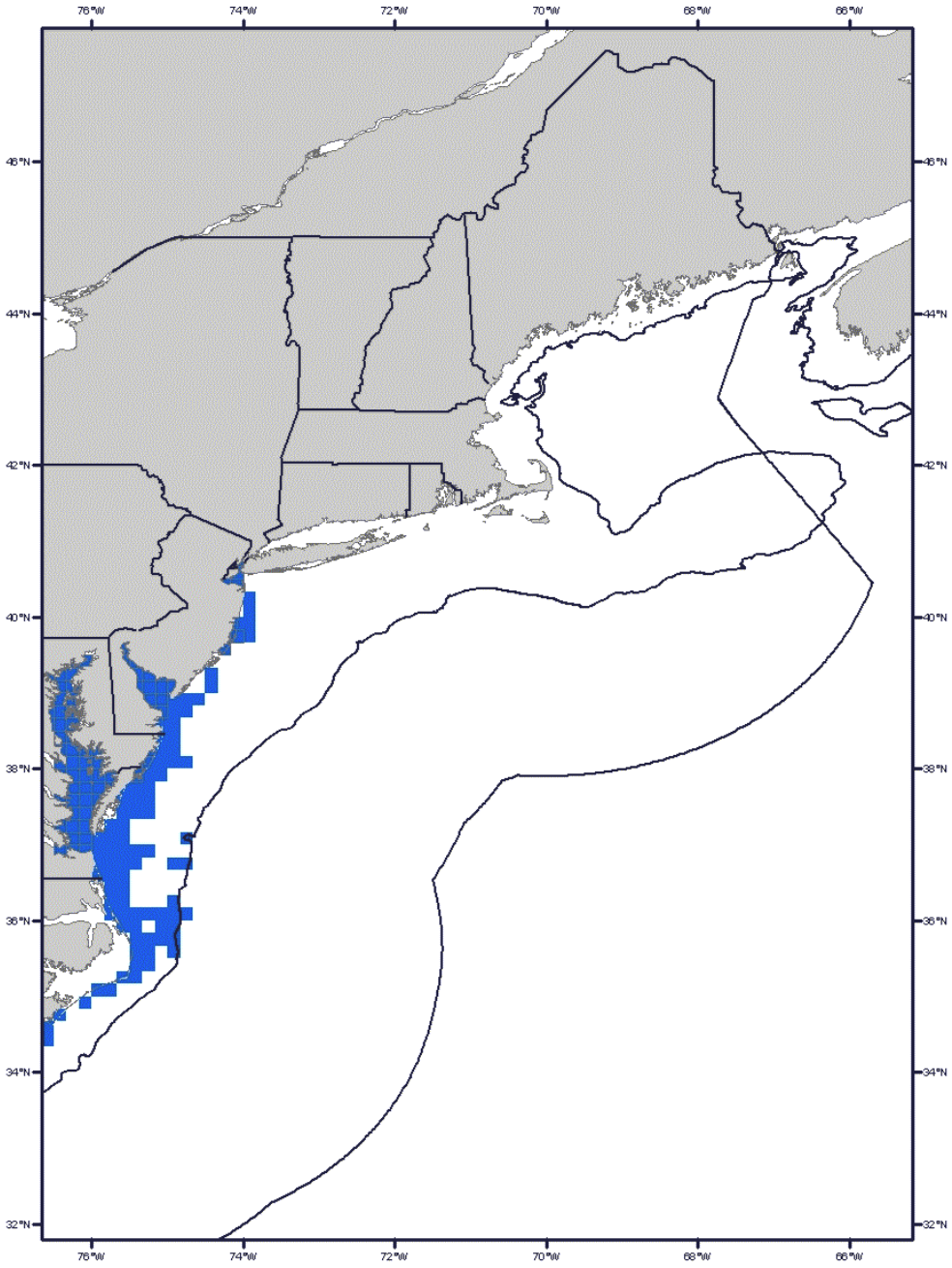
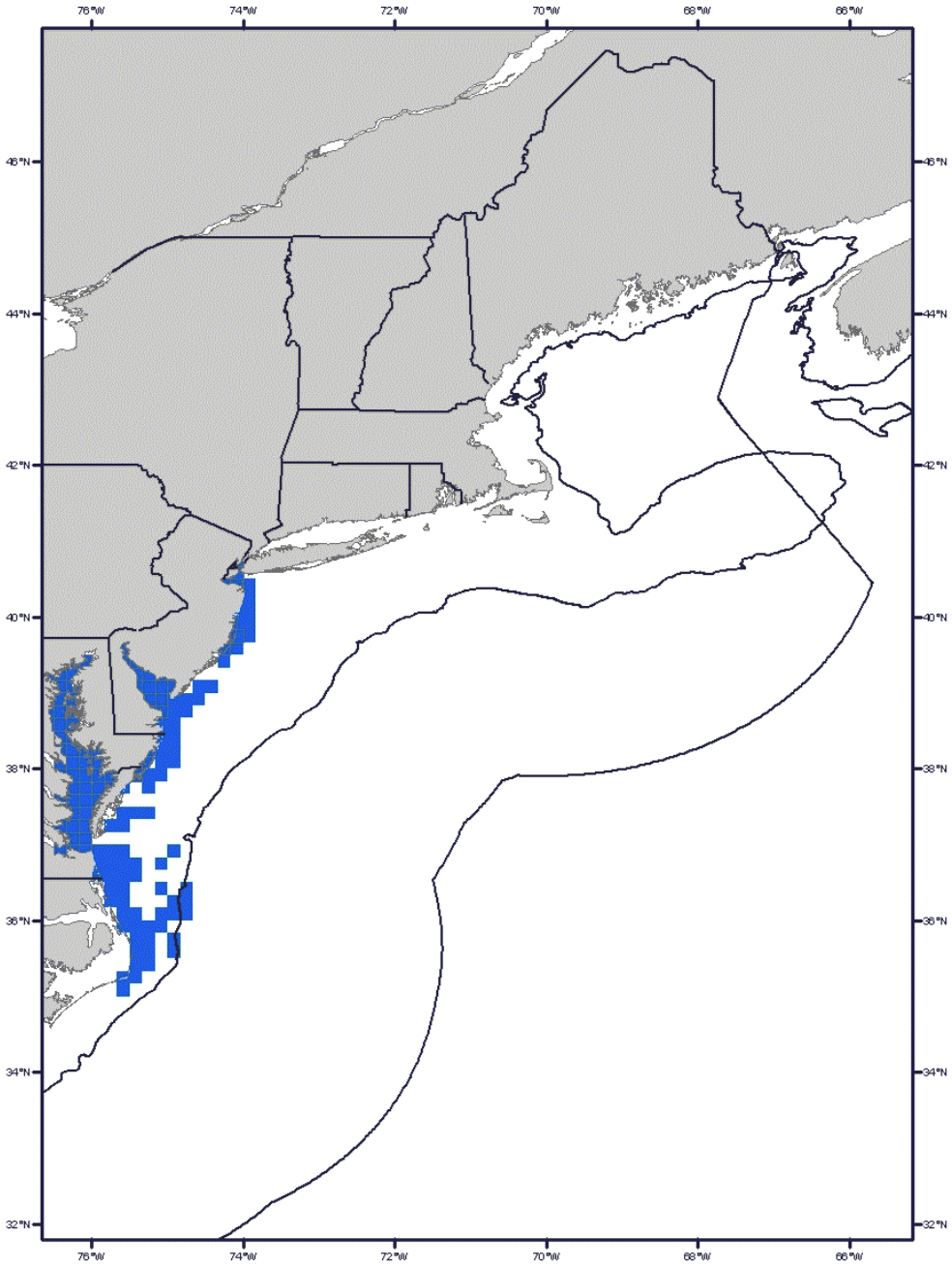
Figure 3 Clearnose Skate EFH Juvenile (90%)



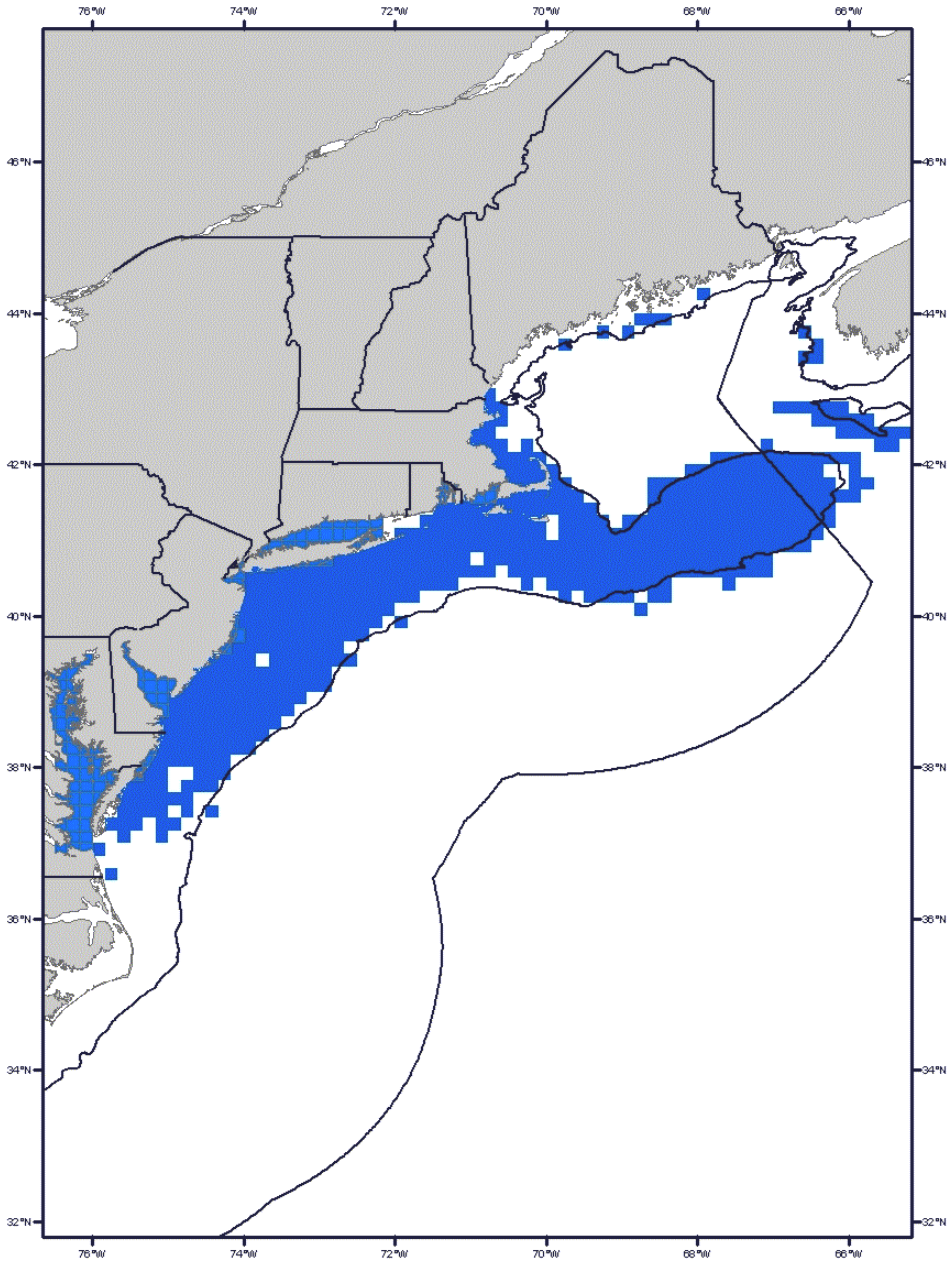
This map represents the designation of EFH for this life history stage based on the areas of highest relative abundance of this species, based on the NMFS trawl survey (1963 - 1999) and ELMR data presented in Table 5. Only habitats with soft bottom, rocky or gravelly substrates that occur within the shaded areas are designated as EFH. This represents 62% of the observed range of this life stage.

Figure 4 Clearnose Skate EFH Adult (90%)



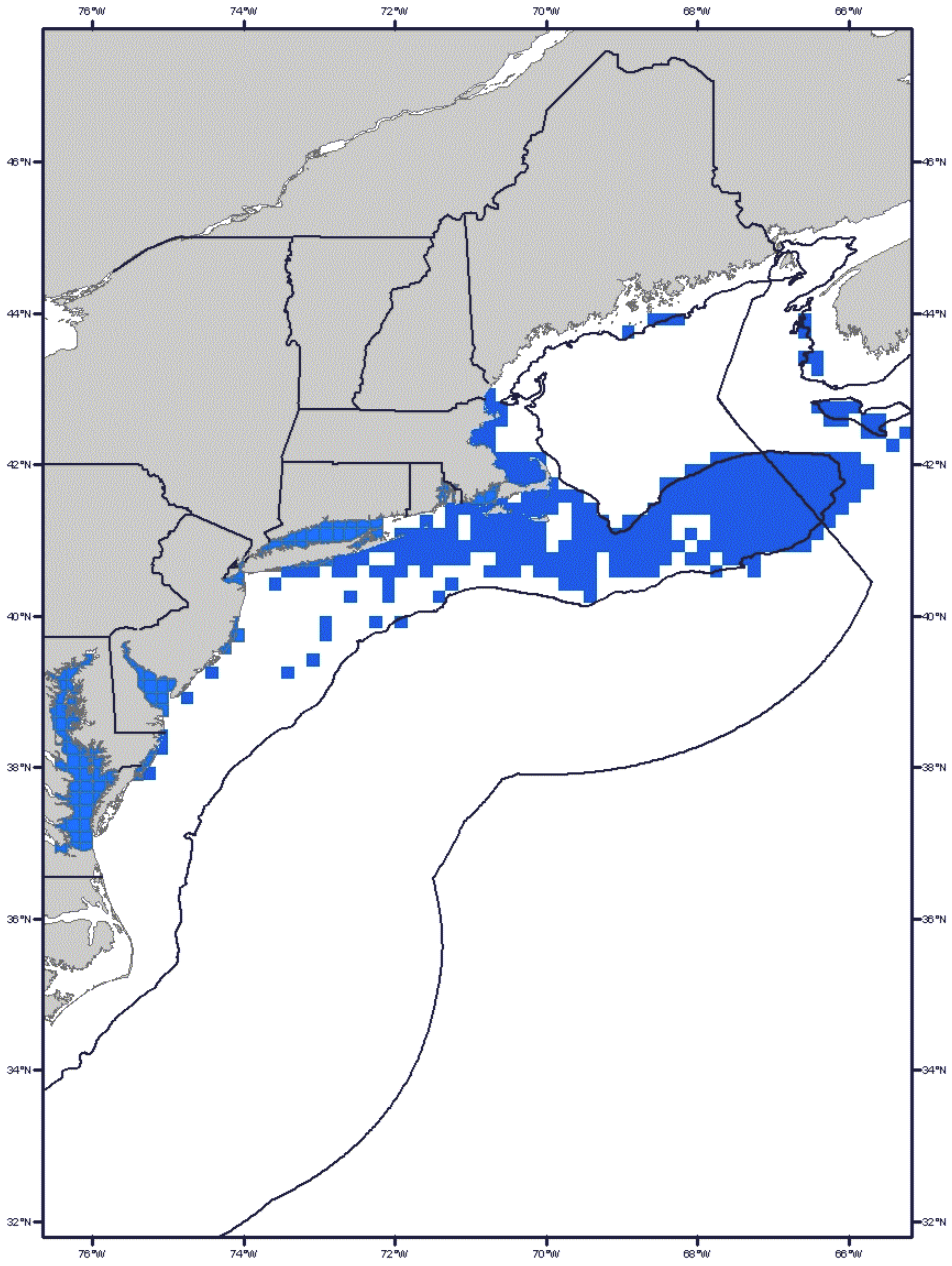
This map represents the designation of EFH for this life history stage based on the areas of highest relative abundance of this species, based on the NMFS trawl survey (1963 - 1999) and ELMR data presented in Table 5. Only habitats with soft bottom, rocky or gravelly substrates that occur within the shaded areas are designated as EFH. This represents 67% of the observed range of this life stage.

Figure 5 Little Skate EFH Juvenile (90%)



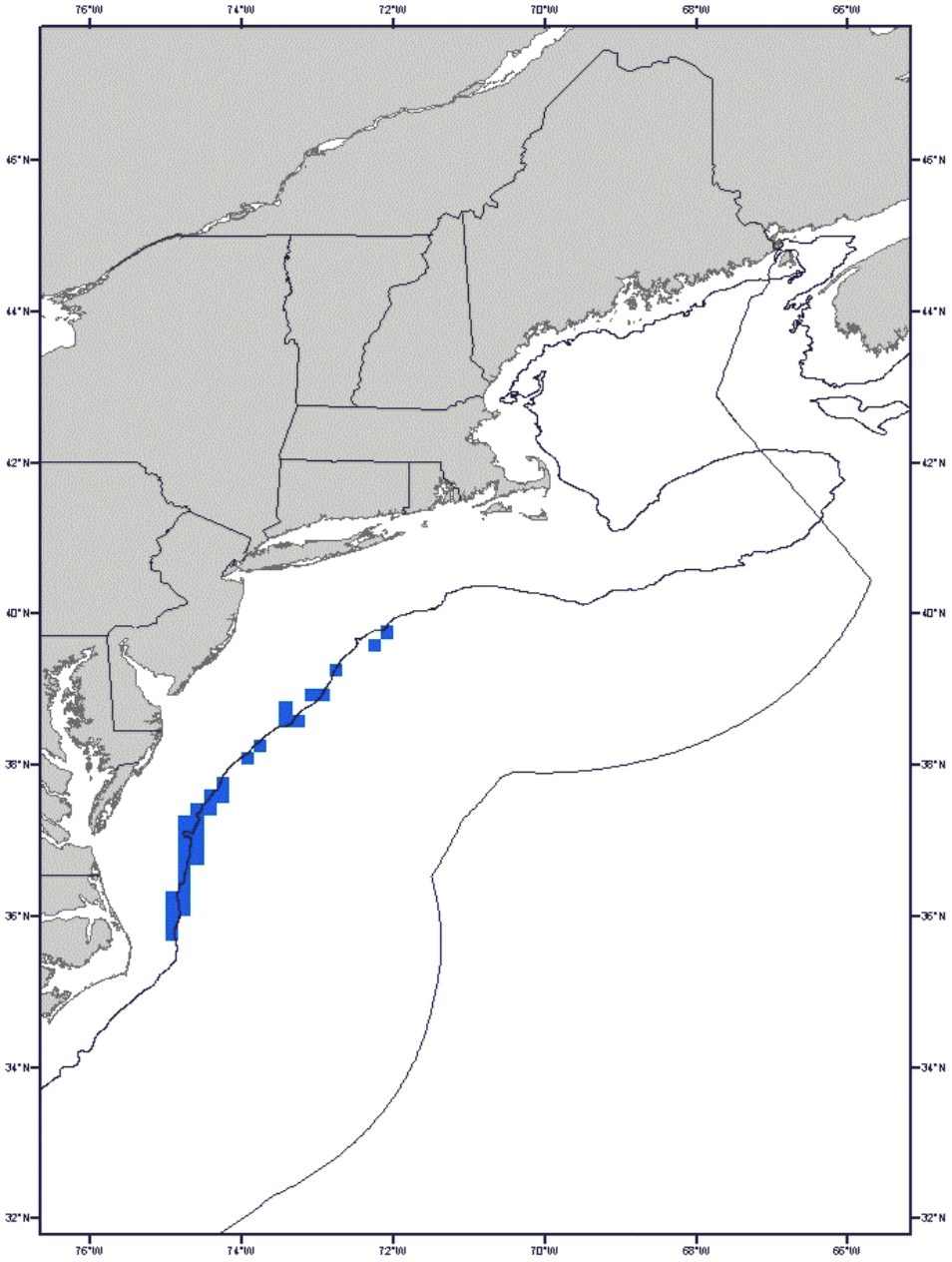
This map represents an option for the designation of EFH for this life history stage based on the areas of highest relative abundance of this species, based on the NMFS trawl survey (1963 - 1999) and ELMR data presented in Table 5. **Only the shaded squares in U.S. waters represent the EFH designation.** Only habitats with sandy, gravelly, or mud substrates that occur within the shaded areas in U.S. waters are designated as EFH. This represents 58% of the observed range of this life stage.

Figure 6 Little Skate EFH Adult (90%)



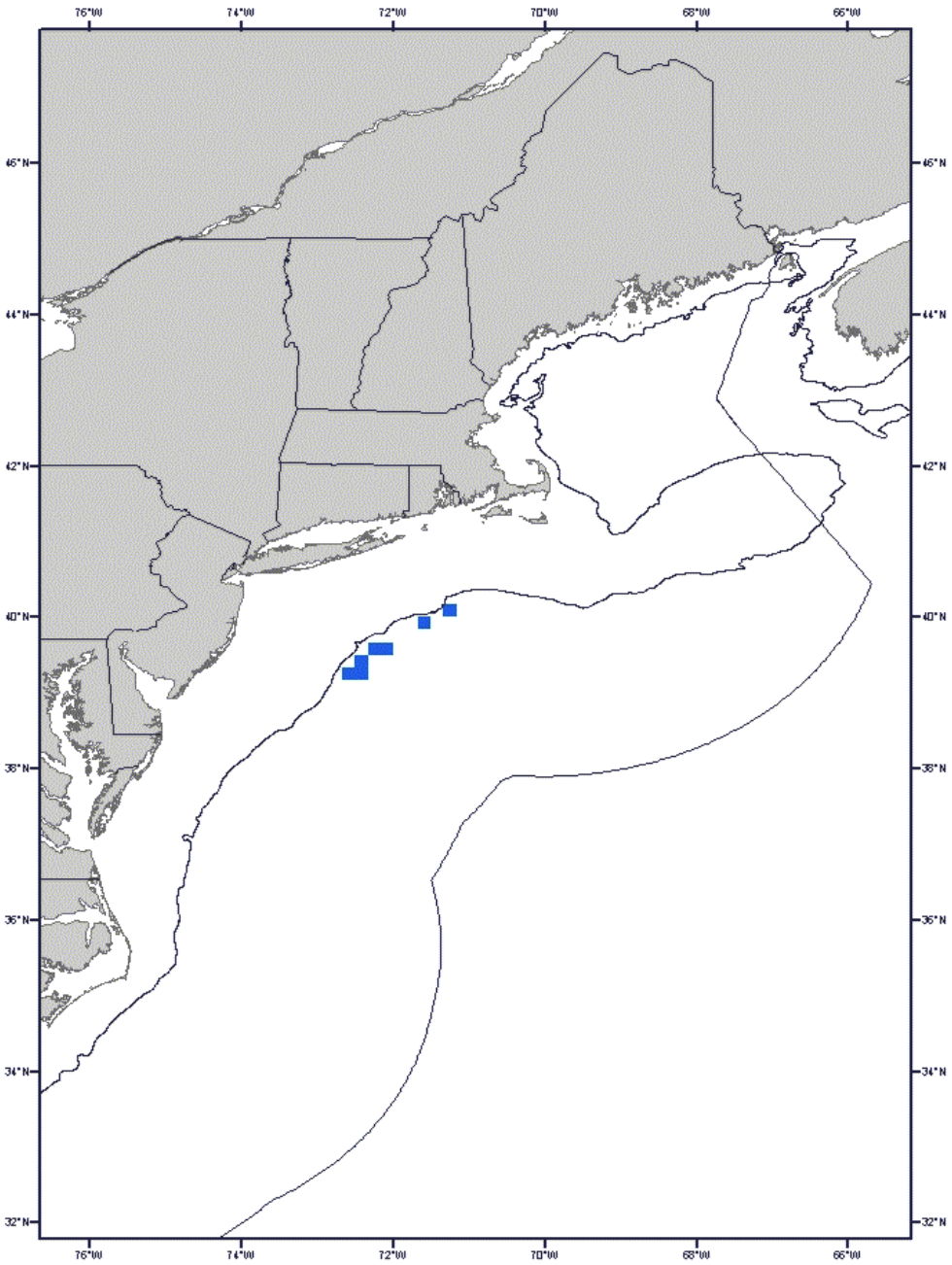
This map represents an option for the designation of EFH for this life history stage based on the areas of highest relative abundance of this species, based on the NMFS trawl survey (1963 - 1999) and ELMR data presented in Table 5. **Only the shaded squares in U.S. waters represent the EFH designation.** Only habitats with sandy, gravelly, or mud substrates that occur within the shaded areas in U.S. waters are designated as EFH. This represents 57% of the observed range of this life stage.

Figure 7 Rosette Skate EFH Juvenile (90%)



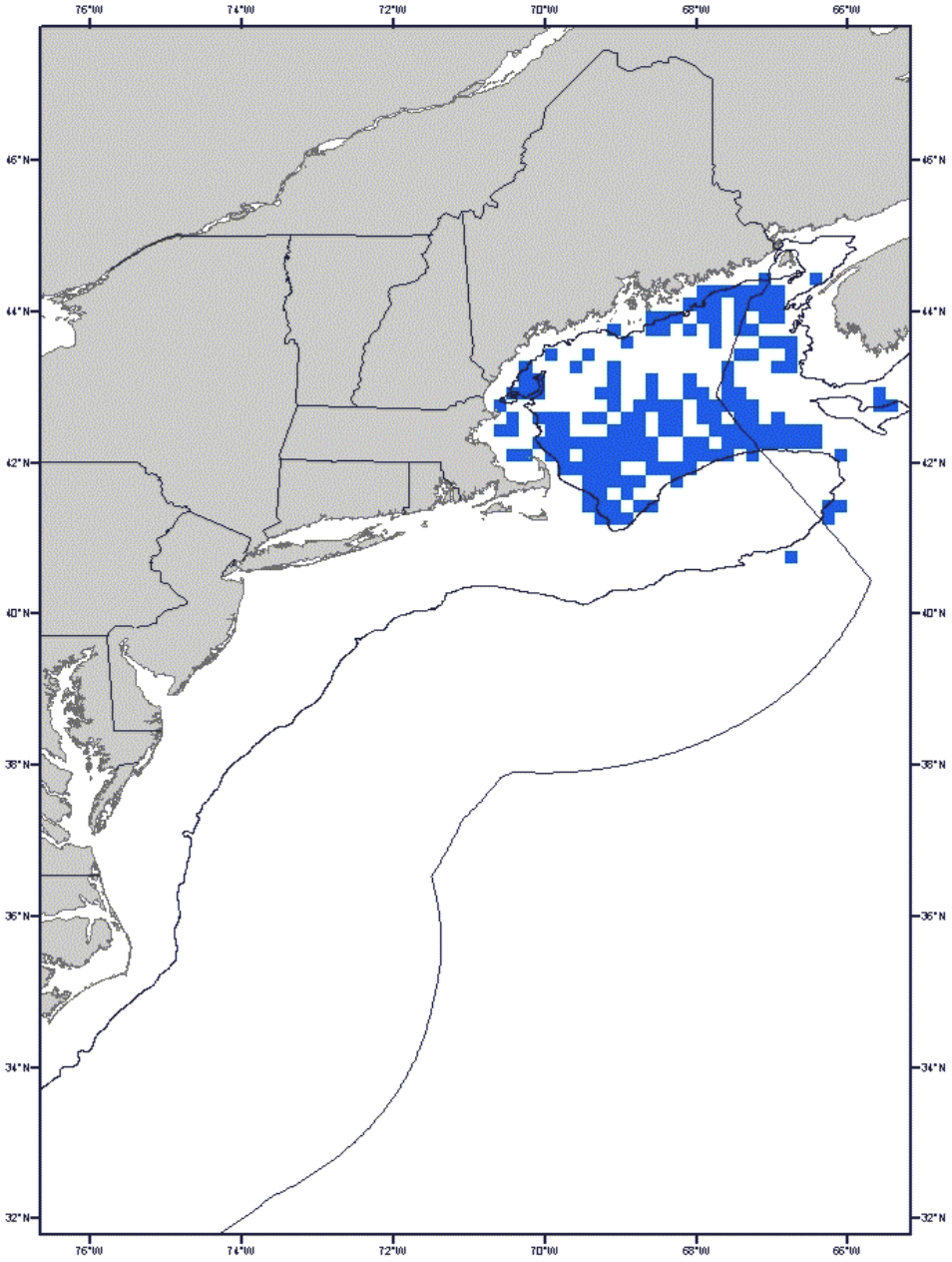
This map represents the designation of EFH for this life history stage based on the areas of highest relative abundance of this species, based on the NMFS trawl survey (1963 - 1999). Only habitats with a soft substrate, including sand/mud bottoms, mud with echinoid and ophuiroid fragments, and shell and pteropod ooze that occur within the shaded areas are designated as EFH. This represents 63% of the observed range of this life stage.

Figure 8 Rosette Skate EFH Adult (90%)



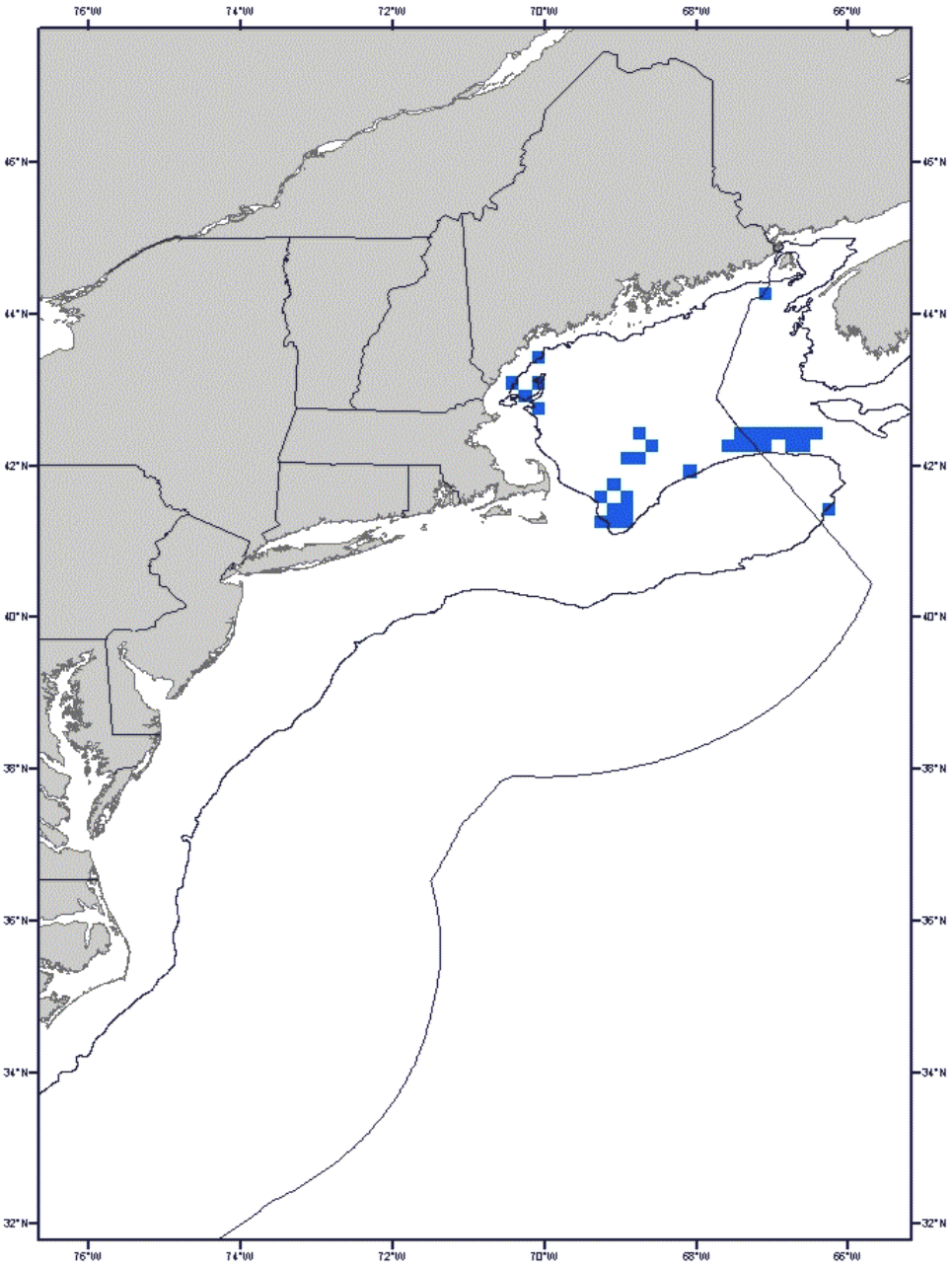
This map represents the designation of EFH for this life history stage based on the areas of highest relative abundance of this species, based on the NMFS trawl survey (1963 - 1999). Only habitats with a soft substrate, including sand/mud bottoms, mud with echinoid and ophuiroid fragments, and shell and pteropod ooze that occur within the shaded areas are designated as EFH. This represents 70% of the observed range of this life stage.

Figure 9 Smooth Skate EFH Juvenile (90%)



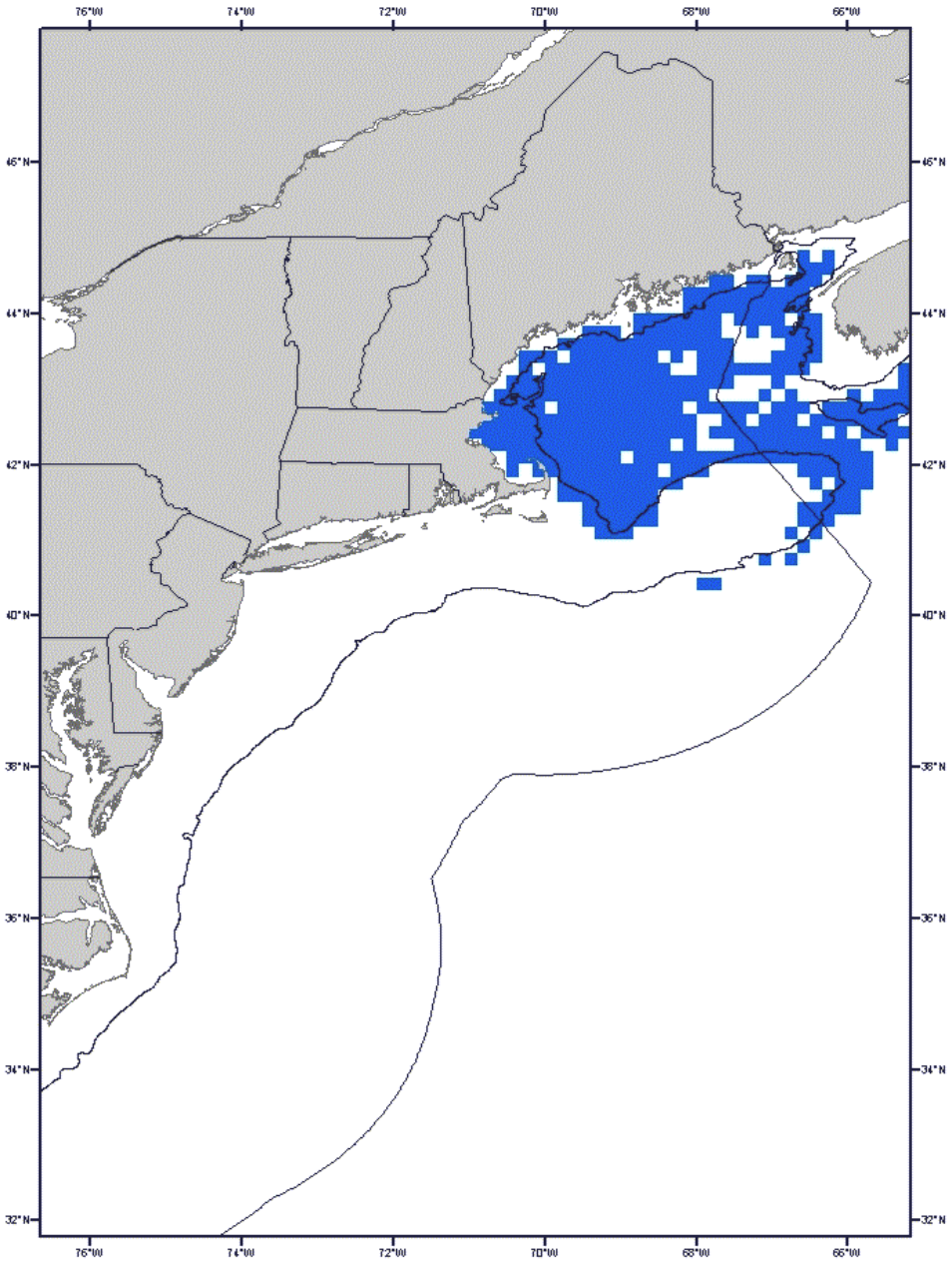
This map represents the designation of EFH for this life history stage based on the areas of highest relative abundance of this species, based on the NMFS trawl survey (1963 - 1999). **Only the shaded squares in U.S. waters represent the EFH designation.** Only habitats with a substrate of soft mud and also on sand, broken shells, gravel and pebbles that occur within the shaded areas in U.S. waters are designated as EFH. This represents 63% of the observed range of this life stage.

Figure 10 Smooth Skate EFH Adult (90%)



This map represents the designation of EFH for this life history stage based on the areas of highest relative abundance of this species, based on the NMFS trawl survey (1963 - 1999). **Only the shaded squares in U.S. waters represent the EFH designation.** Only habitats with a substrate of soft mud and also on sand, broken shells, gravel and pebbles that occur within the shaded areas in U.S. waters are designated as EFH. This represents 70% of the observed range of this life stage.

Figure 11 Thorny Skate EFH Juvenile (90%)



This map represents the designation of EFH for this life history stage based on the areas of highest relative abundance of this species, based on the NMFS trawl survey (1963 - 1999). **Only the shaded squares in U.S. waters represent the EFH designation.** Only habitats with a substrate of sand, gravel, broken shell, pebbles, and soft mud that occur within the shaded areas in U.S. waters are designated as EFH. This option represents 66% of the observed range of this life stage.

Figure 12 Thorny Skate EFH Adult (90%)

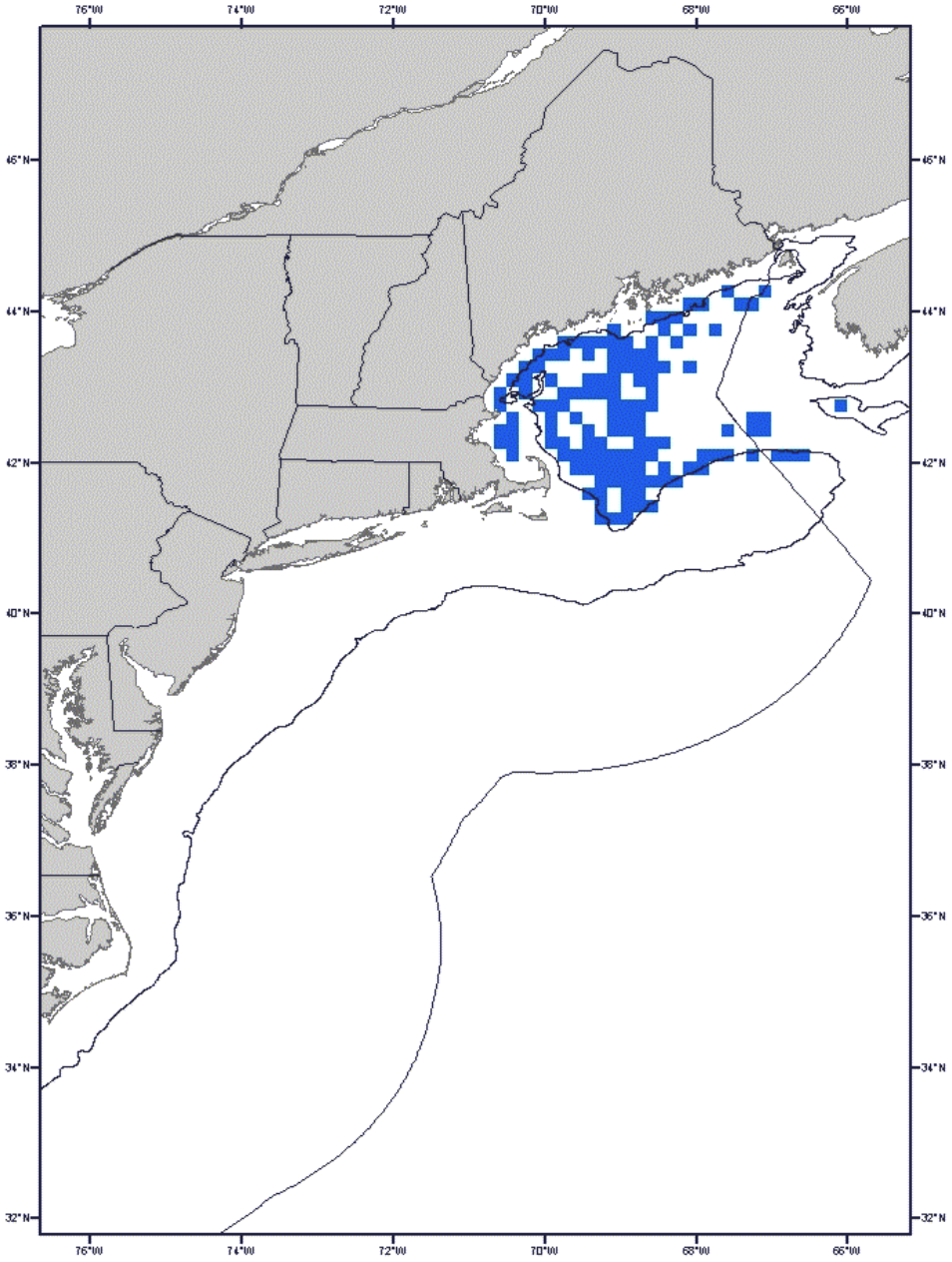


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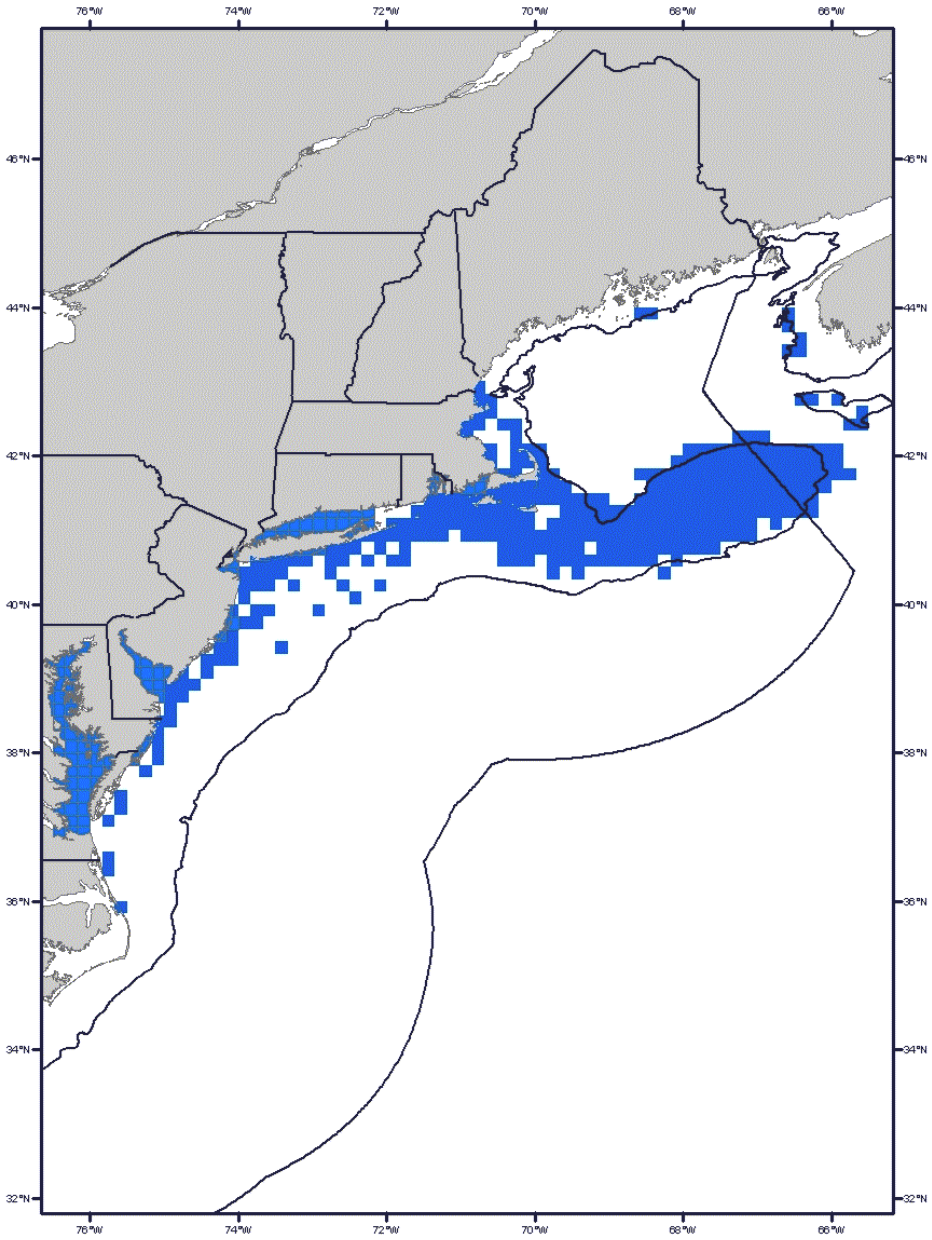
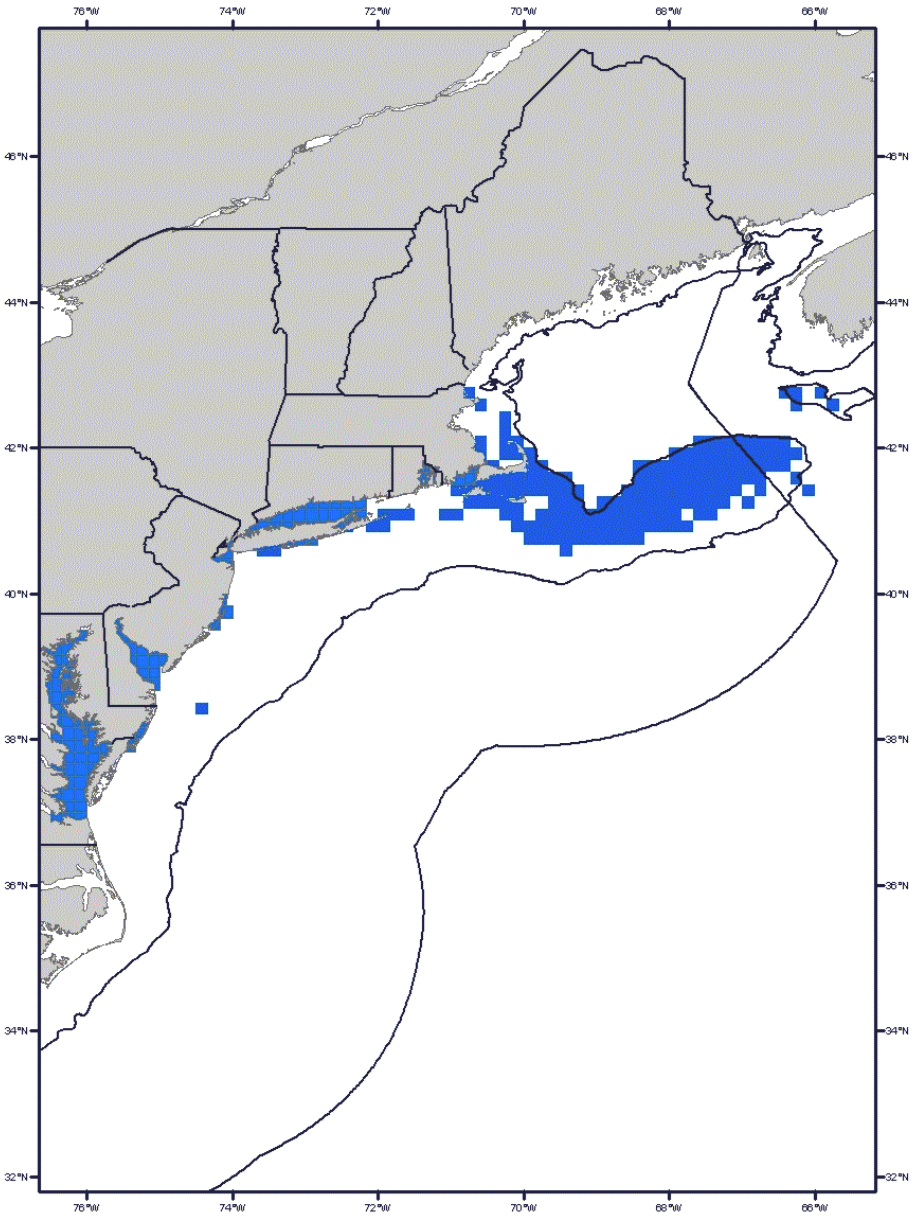
Figure 13 Winter Skate EFH Juvenile (90%)



This map represents the designation of EFH for this life history stage based on the areas of highest relative abundance of this species, based on the NMFS trawl survey (1963 - 1999) and ELMR data presented in Table 5. **Only the shaded squares in U.S. waters represent the EFH designation.** Only habitats with a substrate of sand and gravel or mud that occur within the shaded areas in U.S. waters are designated as EFH. This represents 48% of the observed range of this life stage.

Figure 14 Winter Skate EFH Adult (90%)



This map represents the designation of EFH for this life history stage based on the areas of highest relative abundance of this species, based on the NMFS trawl survey (1963 - 1999) and ELMR data presented in Table 5. **Only the shaded squares in U.S. waters represent the EFH designation.** Only habitats with a substrate of sand and gravel or mud that occur within the shaded areas in U.S. waters would be designated as EFH. This represents 44% of the observed range of this life stage