

SPINY DOGFISH

Stock Status – Viable – The Transboundary Resource Assessment Committee (TRAC) conducted a peer-reviewed benchmark stock assessment for spiny dogfish in January 2010. Although the TRAC was unable to agree upon a revised assessment model they were able to accept a newly defined biomass target of 159,288 mt, based on analysis of information in the TRAC assessment. The results of this most recent stock assessment for spiny dogfish have resulted in the determination that the stock is considered rebuilt for the purpose of U.S. management. The information from this assessment will be utilized to set the specifications for the 2010/2011 spiny dogfish fishery.

Average Commercial Landings 2000-2009 and Value – 582,803 lbs. / \$89,740

2009 Commercial Landings and Value – 1,416,362 lbs. / \$212,165 (quota managed)

Average Recreational Landings 2000-2009 – 5,800 lbs

Status of Fisheries Management Plan (FMP) – In North Carolina, spiny dogfish are currently included in the Interjurisdictional FMP, which defers to Atlantic States Marine Fisheries Commission (ASMFC)/Mid-Atlantic Fisheries Management Council (MAFMC)/New England Fishery Management Council (NEFMC) FMP compliance requirements. Spiny dogfish are currently managed under the joint MAFMC and NEFMC FMP in federal waters (3-200 miles) and the ASMFC Spiny Dogfish Interstate FMP in state waters (0-3 miles). The ASMFC Spiny Dogfish Board established a 12,000,000-lb. quota for the 2009/2010 fishing year. Under Addendum II, the quota will be allocated with 58% to states from Maine through Connecticut, 26% to New York through Virginia, and 16% to North Carolina. A 15,000,000 lb. quota has been established for 2010/2011 fishing year (May 1 - April 30) with a 3,000-lb. trip limit.

Research and Data Needs – Discard mortality estimates, recreational harvest data; at-sea observer data; commercial fishery sampling, aging, and genetic studies

Current Regulations – Spiny dogfish are quota managed species with harvest periods and trip limits.

Harvest Season – The North Carolina commercial fishery occurs in the winter, from December – April, when the fishery is active.

Size and Age at Maturity – Males: 23 inches total length (TL)/8 years; Females: 31 inches TL/12 years. Age at maturity estimates vary due to different aging techniques.

Historical and Current Maximum Age – Males: 35 years; Females: 40 years. Some estimates from the Pacific Ocean studies suggest a maximum age of 95 years. Historical ages are variable due to different aging techniques used. Annual formation of rings on the second dorsal spine is not directly validated for estimating age for northwest Atlantic fish.

Juvenile Abundance Index 2000-2009 – Unknown, **2009** – Unknown

Habits and Habitats – Spiny dogfish are found on both sides of the Atlantic and Pacific oceans in temperate and subarctic waters. In the northwest Atlantic, they range from Labrador to Florida, but are most abundant from Nova Scotia to Cape Hatteras. They migrate seasonally, moving into North Carolina waters in the winter, then moving north in the spring. The preferred water temperature is 45° to 55° F. The spiny dogfish is a relatively long-lived, slow-growing animal reaching a maximum size of approximately four feet. The spiny dogfish gives birth to live pups. The gestation period is approximately 22 months with 2 to 15 pups produced (average 6). Fecundity increases with fish length.

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