

RESOURCE SURVEY REPORT
Preliminary Catch Summary
National Marine Fisheries Service
Northeast Fisheries Science Center
Spring Bottom Trawl Survey
Cape Hatteras - Gulf of Maine
March 5 - April 27, 2003

Submitted to: NOAA, NEFSC

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Date: 2003

Resource Survey Report

Bottom Trawl Survey



Cape Hatteras - Gulf of Maine
March 5, 2003 - April 27, 2003
FRV Delaware II

National Marine Fisheries Service
Northeast Fisheries Science Center
Woods Hole, MA 02543

Operations aboard FRV Delaware II



FRV Delaware II



**Winch Control Room
above Net Reel**



FSCS Sampling Location



Trawl Ramp and Gantry



**Catch being sorted
at checker**

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Attached are field notes, station and catch summaries and a series of geographical plots of commercial and recreational important species caught during the Northeast Fisheries Science Center's 2003 spring bottom trawl survey aboard the *FRV DELAWARE II*. Tows were made with a #36 Yankee otter trawl rigged with rollers, 5 fathom legs and 1000 pound polyvalent doors. The cod end and upper belly were lined with 1/2-inch mesh to retain young-of-the-year fish.

Because of the 30-minute tow duration, and random selection of station locations, catches can be light compared with commercial tows. Also, vessel operations are on a 24-hour basis and catches have not been adjusted for day/night differences. Nevertheless, these data can provide fishermen with useful information about the distribution and relative abundance of species inhabiting the survey area (Cape Hatteras to the Gulf of Maine).

In an effort to make this report timely, the data are summarized from unaudited catch files generated from the Fisheries Scientific Computer System (FSCS). Therefore, data records in this report are provisional and subject to change.

For further information contact Russell Brown (508-495-2380) or Linda Despres (508-495-2346), National Marine Fisheries Service, Northeast Fisheries Science Center, 166 Water Street, Woods Hole, MA 02543. To view this report on the Ecosystems Surveys Branch website, go to: http://www.nefsc.noaa.gov/esb/Resource_Survey_Reports.htm

Field Notes

In an effort to share some of the natural history observations made during the spring survey, we have requested that the Chief Scientists on each part of the cruise comment on some of the more interesting catches that were brought aboard the *FRV DELAWARE II*.

Sculpins and Other Spiny Creatures

At Norfolk Canyon (offshore from Chesapeake Bay), we encountered extraordinarily high densities of northern sea robin (*Prionotus carolinus*). A 30-minute tow in the area yielded a catch of 13,770 northern sea robins weighing in excess of 2800 lbs. This was the largest tow of northern sea robins in the last ten years for the spring survey. When the catch was dumped into the sorting checker, it was described as a giant mass of spines and grunting. One of the cruise volunteers asked what the difference between the northern sea robin and longhorn sculpin was, and whether they were related. The answer was, yes, they are taxonomically related. Both species are spiny and vibrate when agitated. When you've handled lots of them, you can actually tell them apart by the noise that they make without looking at the actual fish. On the practical side, the sure way to tell the two species apart is to look down at your hand – if the spines go through the glove and into your hand, it's probably a sea robin, if the spines go through your glove, into your hand, then back out through the other side of your hand, then it's probably a longhorn sculpin!

There are actually several species of sculpin encountered on the survey. We encountered several shorthorn sculpin (*Myoxocephalus scorpius*) at an inshore station off the Scotian Shelf. The shorthorn is the largest western Atlantic member of the sculpin family, and one of the fish sampled exceeded 16 inches in length. This was an unusual catch not because shorthorn sculpin are rare in the Gulf of Maine, but because shorthorns are normally inshore of the area sampled during the survey.

What Was That Bright Red Fish?

Another unusual catch this spring was a red sea raven. The sea raven, *Hemitripterus americanus*, was once considered a sculpin, but has recently been placed in its own taxonomic family (Hemitripterae). Sea ravens are usually varying shades of brown, but also have two very common color morphs. The first color morph is yellow, and this can be bright, solid, almost a startling yellow. This yellow form is most often encountered offshore, especially on Georges Bank. The other, more unusual color morph is red. The red color morph appears to be consistently very close to shore in the Gulf of Maine. Divers from Maine to Massachusetts often report seeing a bright red fish that seems to fit the description of one of the dangerous tropical scorpion fishes. The "bright red" part usually throws ichthyologists off the scent as sea ravens do not normally fit that description. Like the shorthorn sculpins, these red ravens tend to be distributed inshore in shallow waters, and are not normally encountered on our survey. It was a thrill to catch one on the survey, and the fish was saved for our Woods Hole aquarium, where it will be interesting to see whether it retains the red color, as the offshore yellow fish seem to do.

What's That Shad Doing Out There?

There are two species of shad, American (*Alosa sapidissima*) and hickory (*Alosa mediocris*), regularly captured during offshore bottom trawl surveys. A less commonly encountered species is the gizzard shad (*Dorosoma cepedianum*). During the 2003 Spring Bottom Trawl survey, we encountered a single individual off the coast of New York City. This species is one of the largest members of the herring family (up to 20 inches), but is generally smaller than the American shad. The gizzard shad is primarily a freshwater fish, though it occasionally enters brackish waters. The fish was taken near the mouth of the Hudson River which helps explain the unusual catch.

Barndoor Skates Continue to Increase

The dramatic size of the barndoor skates (*Dipturus laevis*) make them a conversation piece whenever they come aboard the ship. Contrary to an influential scientific paper published in Science magazine that proposed that this species was “close to extinction,” our surveys have documented a consistent increase in both their numbers and size range when compared to catches taken during spring surveys 10-20 years ago. Stratified estimates of abundance and biomass from the survey were a critical information source used in the decision not to list barndoor skate under the Endangered Species Act.

	Total # caught	Length range (cm)	Length range (inches)
1973	3	31-90	12-35
1983	1	41	16
1993	5	51-60	20-24
2003	63	19-132	7-52

These skates can grow up to five feet in length, and larger individuals require a significant wrestling effort to sample. Their unusually smooth skin, dark/speckled underside coloration and unique pointed nose make this a species that is easy to identify. Preferring smooth mud or rocky bottom terrain, they can be found in depths up to 100 fathoms as the Georges Bank portion of this survey verified. The majority of the skates were taken at stations on the U.S. side of the Hague line with concentrations in the southeast section of Georges Bank and in the “mud hole” area in waters south of the Great South Channel. Only 3 stations on the Canadian side of the Hague line produced barndoor skate catches.

In addition to indexing the abundance of commercially important fish and shellfish species, Center surveys provide critical information on a number of ecologically important species. Taxonomists in the Center's Ecosystems Survey Branch are always interested in examining unusual specimens encountered by fishermen. Contact John Galbraith if you pull up something that you are interested in learning more about!

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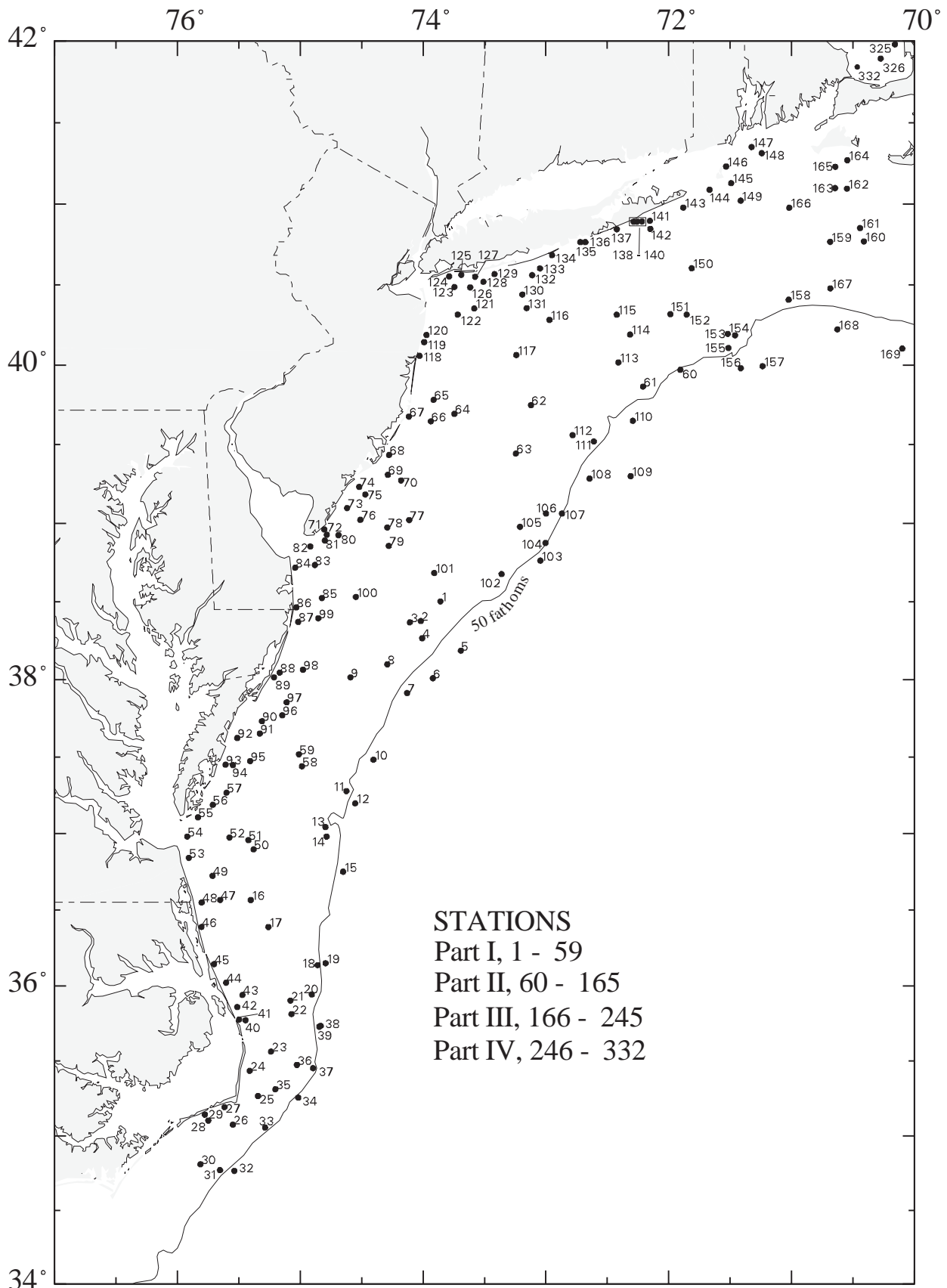


Figure 1. Trawl hauls made from FRV DELAWARE II (03 - 03), during National Marine Fisheries Service, Northeast Fisheries Science Center spring bottom trawl survey, March 5 - April 27, 2003.

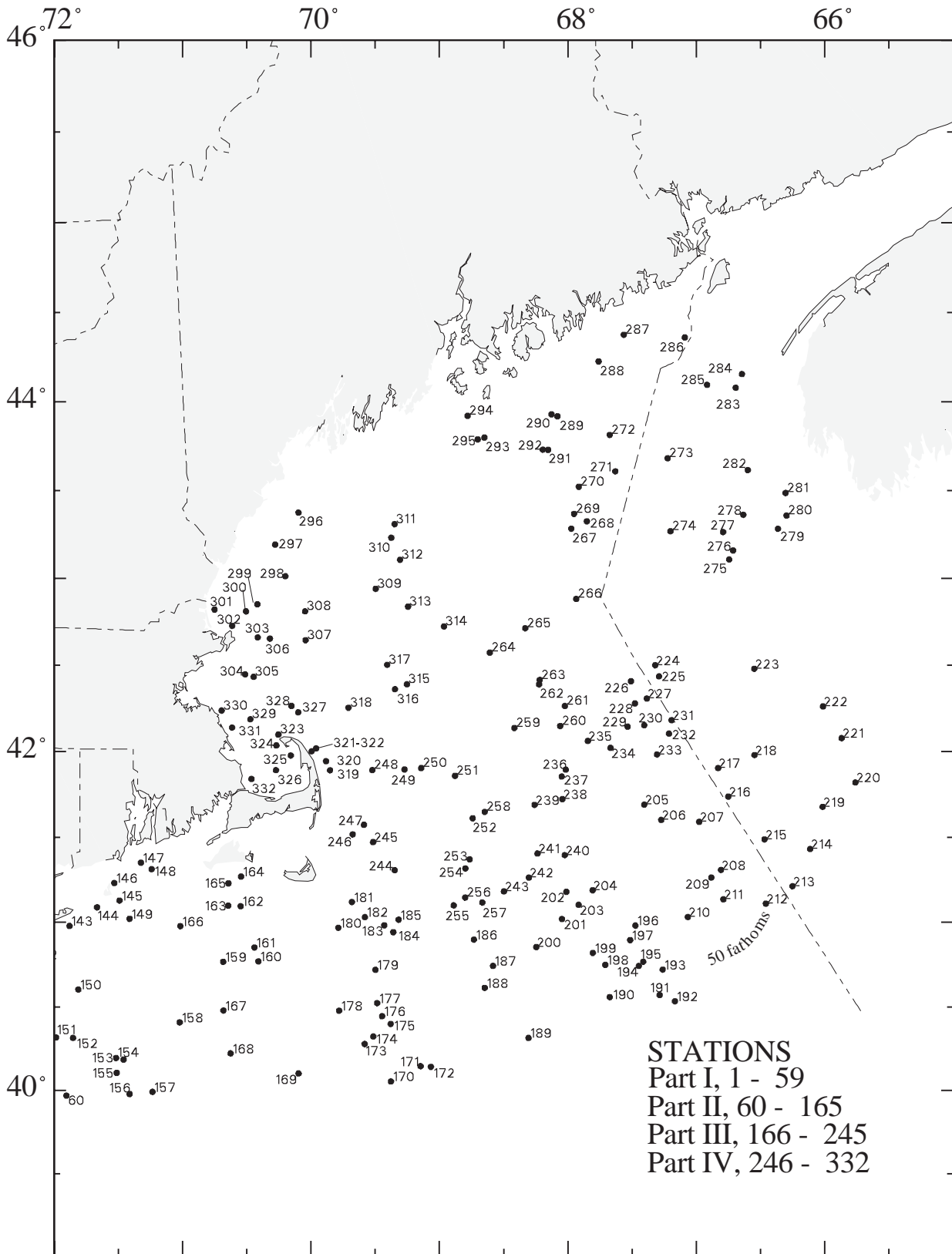


Figure 2. Trawl hauls made from FRV DELAWARE II (03 - 03), during National Marine Fisheries Service, Northeast Fisheries Science Center spring bottom trawl survey, March 5 - April 27, 2003.

NMFS-NEFSC SPRING BOTTOM TRAWL SURVEY
2003 STATION INFORMATION

Station	Date	Time	Lat	Lon	Loran TD's		Course	Bottom Depth (FM)	Temp (F)
0001	MAR-06	1401	3830.1	7351.5	X26703.8	Y42494.6	212	32.0	44.5
0002	MAR-06	1615	3822.6	7401.1	X26748.6	Y42407.9	219	34.2	46.8
0003	MAR-06	1804	3822.1	7406.5	X26777.7	Y42398.1	034	32.3	45.9
0004	MAR-07	0152	3816.0	7400.4	X26736.2	Y42339.3	034	37.7	46.7
0005	MAR-07	0712	3811.2	7341.5	X26627.8	Y42308.3	030	151.5	50.4
0006	MAR-07	1039	3800.5	7355.2	X26690.9	Y42184.6	222	87.5	49.8
0007	MAR-07	1305	3754.8	7407.8	X26750.3	Y42109.4	042	62.1	48.5
0008	MAR-07	1603	3805.9	7417.5	X26815.1	Y42215.3	054	25.4	46.1
0009	MAR-07	1849	3800.9	7435.5	X26901.7	Y42140.3	237	20.8	40.7
0010	MAR-08	0020	3728.9	7424.2	X26802.2	Y41814.1	059	74.4	48.2
0011	MAR-08	0352	3716.7	7437.5	X26849.7	Y41662.1	006	49.8	48.4
0012	MAR-08	0622	3711.9	7433.2	X26824.2	Y41619.4	003	69.4	48.3
0013	MAR-08	0919	3702.6	7447.7	X26878.7	Y41493.3	166	35.8	47.4
0014	MAR-08	1142	3658.8	7447.2	X26871.6	Y41454.9	154	34.7	46.9
0015	MAR-08	1455	3645.1	7439.1	X26820.5	Y41328.9	180	159.9	48.9
0016	MAR-08	1945	3633.9	7524.2	X26996.2	Y41106.2	138	14.8	41.5
0017	MAR-08	2159	3623.3	7515.6	X26947.2	Y41013.7	106	19.1	42.9
0018	MAR-09	0133	3608.2	7451.5	X26834.2	Y40924.5	003	47.3	49.1
0019	MAR-09	0355	3608.9	7447.6	X26819.4	Y40943.1	002	78.2	48.4
0020	MAR-09	0648	3556.5	7454.3	X26833.8	Y40802.2	198	44.8	48.8
0021	MAR-09	1018	3554.1	7504.8	X26871.9	Y40746.9	173	18.9	47.5
0022	MAR-09	1141	3548.7	7504.3	X26864.3	Y40696.2	176	20.2	46.2
0023	MAR-09	1425	3533.8	7514.3	X26886.9	Y40519.5	248	15.6	43.5
0024	MAR-09	1619	3526.1	7524.7	X26916.9	Y40410.9	191	9.8	42.7
0025	MAR-09	1822	3516.0	7520.7	X26892.3	Y40332.1	181	11.5	62.5
0026	MAR-09	2123	3504.5	7533.0	X26923.9	Y40181.6	332	13.1	61.8
0027	MAR-09	2301	3511.6	7537.0	X26945.2	Y40230.0	247	7.7	56.2
0028	MAR-10	0041	3506.2	7544.9	X26966.7	Y40150.0	268	10.7	58.2
0029	MAR-10	0213	3508.5	7546.7	X26975.2	Y40165.1	244	8.2	58.2
0030	MAR-10	0457	3448.5	7548.8	X26961.4	Y39977.9	234	17.5	66.1
0031	MAR-10	0703	3446.2	7539.2	X26927.3	Y39999.0	239	24.1	67.3
0032	MAR-10	0920	3445.9	7532.2	X26903.6	Y40026.0	217	80.1	61.5
0033	MAR-10	1321	3503.3	7517.2	X26868.4	Y40233.1	218	45.7	64.5
0034	MAR-10	1642	3515.4	7501.0	X26821.6	Y40398.8	205	61.0	66.1
0035	MAR-10	1839	3518.7	7512.2	X26864.8	Y40387.3	037	14.5	68.4
0036	MAR-10	2055	3528.4	7501.7	X26835.4	Y40513.5	042	22.1	57.3
0037	MAR-10	2246	3527.1	7453.8	X26805.4	Y40529.2	034	30.6	67.6
0038	MAR-11	0155	3544.0	7450.0	X26805.9	Y40696.7	178	83.7	50.1
0039	MAR-11	0452	3543.7	7450.7	X26808.2	Y40691.1	167	60.7	49.1
0040	MAR-11	0901	3546.3	7526.8	X26946.3	Y40600.8	319	7.4	42.7
0041	MAR-11	1022	3546.5	7529.9	X26958.3	Y40593.5	349	7.7	42.5
0042	MAR-11	1151	3551.5	7530.8	X26967.3	Y40641.6	020	10.9	42.6
0043	MAR-11	1323	3556.3	7528.3	X26963.7	Y40698.1	346	10.1	44.0
0044	MAR-11	1458	3601.2	7536.2	X26999.8	Y40726.1	335	11.8	43.4
0045	MAR-11	1635	3608.6	7542.1	X27031.9	Y40787.5	341	8.5	42.5
0046	MAR-11	1853	3623.3	7548.3	X27076.8	Y40932.1	352	5.5	42.6
0047	MAR-11	2112	3634.0	7539.1	X27056.5	Y41071.4	255	11.2	41.8
0048	MAR-11	2251	3633.0	7548.2	X27091.1	Y41039.5	014	7.7	41.6

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Station	Date	Time	Lat	Lon	Loran TD's		Course	Bottom Depth (FM)	Temp (F)
0049	MAR-12	0052	3643.5	7542.9	X27086.3	Y41168.8	051	10.1	41.1
0050	MAR-12	0340	3653.9	7522.8	X27019.3	Y41326.8	344	15.6	41.7
0051	MAR-12	0655	3657.5	7525.3	X27035.5	Y41361.6	272	13.9	41.2
0052	MAR-12	0830	3658.5	7534.6	X27076.4	Y41354.6	266	10.9	40.6
0053	MAR-12	1114	3650.5	7554.5	X27145.1	Y41224.5	335	6.3	41.7
0054	MAR-12	1256	3658.9	7555.2	X27163.0	Y41318.9	088	4.4	41.6
0055	MAR-12	1435	3706.4	7550.0	X27155.0	Y41415.1	046	3.6	41.2
0056	MAR-12	1557	3711.3	7542.8	X27133.2	Y41483.7	041	6.0	40.3
0057	MAR-12	1717	3716.0	7536.1	X27112.9	Y41549.7	076	9.8	39.6
0058	MAR-12	2057	3726.3	7459.2	X26964.0	Y41728.5	341	16.4	44.5
0059	MAR-12	2221	3731.0	7500.7	X26978.3	Y41777.5	004	16.1	42.8
0060	MAR-18	0536	3958.2	7154.3	X25982.7	Y43333.9	238	54.4	40.4
0061	MAR-18	0834	3951.9	7212.5	X26115.9	Y43290.4	015	46.8	41.7
0062	MAR-18	1349	3944.8	7307.3	X26508.6	Y43252.7	209	24.9	42.3
0063	MAR-18	1650	3926.5	7314.7	X26539.3	Y43076.9	279	20.8	42.5
0064	MAR-18	2011	3941.6	7344.7	X26769.4	Y43234.4	305	11.5	38.5
0065	MAR-18	2207	3946.8	7354.9	X26851.5	Y43291.8	187	12.8	37.5
0066	MAR-18	2342	3938.8	7356.2	X26843.7	Y43208.4	279	13.1	38.0
0067	MAR-19	0114	3940.5	7406.9	X26920.8	Y43229.7	215	7.4	39.6
0068	MAR-19	0324	3926.0	7416.6	X26952.6	Y43076.2	209	6.0	39.6
0069	MAR-19	0509	3918.5	7417.2	X26939.8	Y42995.3	043	9.8	38.9
0070	MAR-19	0647	3916.3	7410.8	X26894.1	Y42973.0	178	16.4	39.7
0071	MAR-19	1146	3857.7	7448.2	X27081.7	Y42757.1	059	6.3	40.6
0072	MAR-19	1310	3855.7	7447.0	X27070.0	Y42735.5	049	6.0	40.6
0073	MAR-19	1512	3905.9	7437.1	X27034.8	Y42853.0	032	8.7	40.0
0074	MAR-19	2000	3913.9	7431.2	X27017.2	Y42943.0	087	9.0	39.6
0075	MAR-19	2137	3911.0	7428.2	X26992.5	Y42912.3	086	10.4	39.5
0076	MAR-20	0022	3901.4	7430.6	X26986.0	Y42805.7	063	9.0	39.1
0077	MAR-20	0336	3901.3	7406.8	X26840.6	Y42813.5	080	20.2	42.6
0078	MAR-20	0555	3858.4	7417.5	X26900.7	Y42779.2	073	17.5	42.6
0079	MAR-20	0757	3851.4	7416.7	X26883.2	Y42703.9	080	24.1	43.1
0080	MAR-20	1109	3855.5	7441.3	X27036.4	Y42736.4	033	6.6	39.9
0081	MAR-20	1251	3853.5	7448.0	X27070.4	Y42710.1	230	7.4	39.8
0082	MAR-20	1414	3851.2	7455.1	X27105.7	Y42680.2	074	5.2	40.7
0083	MAR-20	1606	3844.1	7452.9	X27076.9	Y42602.3	120	8.5	39.2
0084	MAR-20	1815	3843.1	7502.5	X27127.8	Y42583.7	150	6.6	40.0
0085	MAR-20	2048	3831.5	7449.4	X27030.7	Y42463.1	262	13.1	39.5
0086	MAR-20	2243	3827.8	7501.9	X27090.3	Y42411.5	349	6.0	39.7
0087	MAR-21	0036	3822.2	7501.0	X27073.7	Y42348.9	208	7.1	39.0
0088	MAR-21	0330	3802.7	7510.1	X27080.1	Y42118.5	183	7.1	40.0
0089	MAR-21	0451	3800.9	7512.8	X27090.0	Y42094.5	208	6.0	40.1
0090	MAR-21	0728	3743.9	7518.7	X27085.4	Y41893.7	169	10.7	39.6
0091	MAR-21	0845	3739.1	7519.8	X27081.4	Y41837.9	198	10.1	39.7
0092	MAR-21	1057	3737.3	7530.8	X27129.2	Y41801.5	175	6.8	40.8
0093	MAR-21	1308	3727.0	7536.5	X27135.0	Y41673.7	202	5.2	41.9
0094	MAR-21	1438	3726.8	7532.9	X27118.5	Y41677.9	150	9.0	41.1
0095	MAR-21	1617	3728.4	7524.5	X27083.6	Y41709.5	349	11.5	40.1
0096	MAR-21	1915	3746.1	7508.8	X27042.5	Y41933.5	020	12.8	40.5

NMFS-NEFSC SPRING BOTTOM TRAWL SURVEY
2003 STATION INFORMATION

Station	Date	Time	Lat	Lon	Loran TD's		Course	Bottom Depth (FM)	Temp (F)
0097	MAR-22	0244	3751.2	7506.7	X27041.4	Y41993.1	052	10.9	40.6
0098	MAR-22	0457	3803.8	7458.7	X27025.3	Y42144.9	027	10.9	40.4
0099	MAR-22	0750	3823.6	7451.2	X27024.5	Y42374.4	085	11.2	N/A
0100	MAR-22	1019	3831.9	7432.9	X26940.3	Y42481.0	057	19.1	40.7
0101	MAR-22	1352	3841.0	7354.5	X26735.3	Y42605.9	084	25.4	44.5
0102	MAR-22	1710	3840.6	7321.6	X26539.9	Y42620.3	089	44.6	41.9
0103	MAR-22	2000	3845.8	7302.7	X26429.8	Y42680.4	180	117.6	46.9
0104	MAR-22	2212	3852.5	7300.2	X26417.9	Y42747.0	038	54.4	44.2
0105	MAR-23	0039	3858.7	7312.6	X26499.5	Y42803.3	059	39.9	42.2
0106	MAR-23	0230	3903.7	7259.9	X26422.6	Y42855.0	089	45.7	42.5
0107	MAR-23	0409	3903.8	7252.1	X26372.9	Y42856.6	029	52.8	43.8
0108	MAR-23	0701	3917.0	7238.6	X26290.6	Y42982.9	084	71.4	42.6
0109	MAR-23	1014	3918.0	7218.5	X26159.1	Y42990.2	033	135.3	51.6
0110	MAR-23	1325	3939.0	7217.5	X26150.9	Y43178.4	326	63.7	43.6
0111	MAR-23	1608	3931.1	7236.6	X26281.4	Y43113.1	301	42.7	42.4
0112	MAR-23	1746	3933.5	7246.9	X26354.1	Y43138.0	030	38.0	42.6
0113	MAR-23	2146	4000.9	7224.6	X26207.8	Y43377.6	343	38.3	42.0
0114	MAR-23	2342	4011.4	7218.8	X26169.7	Y43465.1	329	35.3	41.2
0115	MAR-24	0127	4018.8	7225.4	X26226.3	Y43535.3	257	28.4	41.8
0116	MAR-24	0437	4016.9	7258.2	X26484.3	Y43548.4	219	23.2	41.6
0117	MAR-24	0705	4003.7	7314.4	X26588.2	Y43437.9	267	21.9	42.1
0118	MAR-24	1116	4003.4	7401.7	X26939.3	Y43466.2	012	9.0	38.3
0119	MAR-24	1234	4008.6	7359.4	X26935.9	Y43517.8	046	9.6	37.6
0120	MAR-24	1341	4011.2	7358.3	X26934.5	Y43544.3	032	9.3	37.2
0121	MAR-24	1634	4021.2	7335.0	X26781.1	Y43623.4	301	12.8	37.7
0122	MAR-24	1804	4018.9	7343.1	X26838.3	Y43608.4	328	13.7	37.7
0123	MAR-24	1947	4029.2	7344.7	X26877.2	Y43711.3	358	12.3	36.1
0124	MAR-24	2102	4033.1	7347.2	X26907.7	Y43752.9	075	6.8	36.6
0125	MAR-24	2214	4033.7	7341.3	X26862.1	Y43751.9	281	6.3	37.7
0126	MAR-24	2358	4029.0	7337.0	X26815.6	Y43701.5	077	11.8	36.6
0127	MAR-25	0113	4033.0	7334.6	X26806.6	Y43737.2	076	7.1	38.0
0128	MAR-25	0223	4031.1	7330.5	X26769.5	Y43714.4	067	8.7	37.4
0129	MAR-25	0335	4034.0	7325.1	X26732.7	Y43735.4	104	8.5	38.2
0130	MAR-25	0531	4026.4	7311.5	X26606.9	Y43649.2	089	16.7	39.2
0131	MAR-25	0657	4021.3	7309.4	X26579.8	Y43599.7	082	20.0	40.0
0132	MAR-25	0905	4033.6	7306.7	X26582.3	Y43710.3	035	13.9	38.3
0133	MAR-25	1021	4036.1	7302.9	X26556.3	Y43728.7	031	11.5	38.2
0134	MAR-25	1139	4041.0	7257.0	X26517.4	Y43765.3	064	9.3	39.7
0135	MAR-25	1322	4045.9	7243.2	X26410.9	Y43789.5	066	5.2	40.3
0136	MAR-25	1425	4045.9	7240.7	X26390.0	Y43786.5	064	9.0	38.5
0137	MAR-25	1611	4050.7	7225.3	X26267.8	Y43806.3	063	6.8	40.2
0138	MAR-25	1724	4053.4	7217.1	X26201.6	Y43817.4	061	7.9	38.2
0139	MAR-25	1831	4053.5	7215.4	X26186.7	Y43815.8	063	10.4	38.1
0140	MAR-25	1937	4053.6	7213.1	X26166.8	Y43813.0	050	11.5	38.3
0141	MAR-25	2048	4053.8	7209.2	X26133.6	Y43809.4	084	14.8	37.9
0142	MAR-25	2230	4050.8	7209.0	X26127.1	Y43785.4	047	19.1	39.0
0143	MAR-26	0031	4058.7	7152.8	X25998.8	Y43825.9	057	12.6	38.4
0144	MAR-26	0306	4105.3	7140.0	X25896.0	Y43858.1	102	19.7	37.0

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0145	MAR-26	0444	4107.7	7129.5	X25806.5	Y43861.1	256	14.8	37.0
0146	MAR-26	0652	4113.9	7131.9	X25840.5	Y43909.6	052	21.6	36.3
0147	MAR-26	0922	4121.1	7119.5	X25746.0	Y43942.3	097	17.2	35.5
0148	MAR-26	1107	4118.8	7114.5	X25695.3	Y43918.7	208	17.8	36.3
0149	MAR-26	1344	4101.3	7124.8	X25755.5	Y43807.1	171	23.5	37.7
0150	MAR-26	1742	4036.2	7148.7	X25940.6	Y43642.9	214	33.4	39.1
0151	MAR-26	2020	4019.0	7159.1	X26018.7	Y43513.3	090	34.7	40.7
0152	MAR-26	2140	4018.9	7151.2	X25956.4	Y43505.0	102	39.9	40.7
0153	MAR-27	0033	4011.7	7131.1	X25805.4	Y43429.6	018	47.8	39.7
0154	MAR-27	0216	4011.1	7127.5	X25779.5	Y43422.5	013	47.6	39.6
0155	MAR-27	0441	4006.4	7130.8	X25807.2	Y43386.4	148	50.0	39.9
0156	MAR-27	0632	3958.8	7124.7	X25771.7	Y43320.9	052	80.7	51.7
0157	MAR-27	0904	3959.5	7114.1	X25697.8	Y43320.8	079	161.0	50.1
0158	MAR-27	1259	4024.4	7101.4	X25572.1	Y43504.9	071	47.3	39.1
0159	MAR-27	1620	4046.0	7041.1	X25386.6	Y43644.0	074	32.8	37.9
0160	MAR-27	1824	4046.2	7024.6	X25264.9	Y43628.0	344	28.2	38.6
0161	MAR-27	1939	4051.1	7026.4	X25266.1	Y43664.3	343	27.9	38.0
0162	MAR-27	2155	4105.7	7032.8	X25300.8	Y43772.1	275	22.7	35.8
0163	MAR-27	2304	4105.9	7038.7	X25351.9	Y43780.7	019	23.2	36.1
0164	MAR-28	0057	4116.2	7032.7	X25311.1	Y43842.7	241	13.7	38.8
0165	MAR-28	0206	4113.8	7038.6	X25359.5	Y43834.1	253	14.8	36.8
0166	APR-01	1556	4058.7	7101.1	X25545.1	Y43757.6	145	27.6	38.0
0167	APR-01	2029	4028.7	7041.0	X25419.6	Y43518.6	077	41.6	39.8
0168	APR-01	2328	4013.3	7037.6	X25433.9	Y43402.9	101	64.8	51.0
0169	APR-02	0254	4006.1	7005.8	X25285.6	Y43330.0	104	80.9	52.1
0170	APR-02	0802	4003.3	6922.7	W14031.7	Y43287.2	061	55.0	49.7
0171	APR-02	1015	4008.7	6908.8	W13946.1	Y43316.7	042	68.9	51.4
0172	APR-02	1215	4008.5	6904.0	W13923.8	Y43312.6	344	96.5	48.7
0173	APR-02	1754	4016.7	6934.9	W14048.6	Y43384.8	056	41.8	40.7
0174	APR-02	1914	4019.4	6930.9	W14019.2	Y43400.3	055	40.5	40.1
0175	APR-02	2051	4023.9	6922.8	W13962.8	Y43424.7	309	39.9	40.3
0176	APR-02	2231	4026.6	6926.8	W13973.5	Y43445.7	177	36.6	40.4
0177	APR-03	0020	4031.3	6929.1	W13968.6	Y43478.3	252	33.6	40.8
0178	APR-03	0243	4028.6	6946.9	W14069.6	Y43473.6	032	39.1	40.2
0179	APR-03	0546	4043.2	6929.9	W13929.5	Y43556.6	304	24.6	41.5
0180	APR-03	0822	4058.1	6947.2	W13964.2	Y43670.1	032	24.3	41.2
0181	APR-03	1001	4107.2	6940.9	W13894.1	Y43721.8	209	18.9	41.4
0182	APR-03	1139	4101.9	6934.8	W13883.1	Y43681.4	123	19.1	41.6
0183	APR-03	1308	4059.0	6925.8	W13847.0	Y43653.9	026	23.8	41.7
0184	APR-03	1450	4056.5	6921.5	W13834.6	Y43634.6	013	24.6	41.7
0185	APR-03	1613	4101.0	6919.1	W13804.1	Y43659.9	101	27.6	41.2
0186	APR-03	1955	4053.9	6843.9	W13656.3	Y43584.6	150	36.4	41.2
0187	APR-03	2209	4044.6	6835.0	W13651.3	Y43521.0	180	32.3	40.9
0188	APR-04	0023	4036.8	6838.8	W13700.5	Y43476.3	162	34.7	40.4
0189	APR-04	0430	4018.9	6818.4	W13673.6	Y43354.4	058	81.5	50.1
0190	APR-04	0912	4033.4	6740.4	W13449.7	Y43419.7	086	62.9	45.8
0191	APR-04	1228	4034.2	6717.1	W13348.8	Y43411.2	070	70.5	51.5
0192	APR-04	1514	4032.0	6710.0	W13328.8	Y43395.2	048	104.7	52.8

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0193	APR-04	1803	4043.2	6715.7	W13305.6	Y43460.5	059	53.9	42.5
0194	APR-04	2041	4044.5	6726.9	W13346.7	Y43474.3	033	50.0	38.9
0195	APR-04	2213	4046.0	6724.8	W13331.7	Y43481.5	056	50.3	39.2
0196	APR-05	0122	4058.9	6728.4	W13292.0	Y43554.6	059	38.3	39.5
0197	APR-05	0330	4053.8	6730.9	W13324.4	Y43528.1	054	41.3	39.4
0198	APR-05	0650	4045.0	6742.5	W13411.5	Y43486.6	051	38.8	40.1
0199	APR-05	0900	4049.2	6748.3	W13419.2	Y43514.4	054	37.7	40.3
0200	APR-05	1221	4051.3	6814.7	W13529.1	Y43545.6	073	28.4	40.4
0201	APR-05	1424	4101.2	6802.7	W13432.1	Y43593.4	075	27.3	40.6
0202	APR-05	1629	4110.8	6800.7	W13380.7	Y43646.0	103	24.3	40.6
0203	APR-05	1750	4106.2	6755.0	W13375.2	Y43615.6	100	24.9	40.6
0204	APR-05	1955	4111.4	6748.4	W13322.9	Y43638.7	084	24.6	40.2
0205	APR-06	0029	4141.5	6724.3	W13076.5	Y43777.5	121	26.8	39.7
0206	APR-06	0202	4136.1	6716.4	W13069.6	Y43742.6	091	28.4	39.7
0207	APR-06	0421	4135.5	6658.6	W13001.0	Y43723.6	182	34.4	39.0
0208	APR-06	0721	4118.5	6648.5	W13041.2	Y43629.6	255	39.6	39.5
0209	APR-06	0859	4115.9	6653.0	W13071.3	Y43619.1	311	38.5	39.1
0210	APR-06	1210	4101.9	6703.9	W13177.7	Y43553.9	279	38.3	40.4
0211	APR-06	1902	4108.2	6647.3	W13084.1	Y43575.4	287	39.6	39.7
0212	APR-06	2232	4106.6	6627.4	W13015.9	Y43554.4	058	66.2	44.2
0213	APR-07	0225	4112.8	6615.1	W12943.1	Y43577.3	359	145.5	46.6
0214	APR-07	0602	4125.9	6606.8	W12853.7	Y43636.1	281	69.4	44.0
0215	APR-07	0841	4129.3	6628.1	W12913.9	Y43668.3	304	50.0	39.5
0216	APR-07	1121	4144.3	6645.0	W12904.7	Y43756.0	338	36.1	39.1
0217	APR-07	1333	4154.3	6649.8	W12873.0	Y43809.1	119	33.9	39.5
0218	APR-07	1546	4158.8	6632.8	W12785.8	Y43815.3	103	45.7	39.3
0219	APR-07	1924	4140.7	6600.9	W12763.2	Y43702.9	063	54.4	39.8
0220	APR-07	2201	4149.2	6545.6	W12671.3	Y43730.9	336	83.4	46.7
0221	APR-08	0349	4204.7	6552.1	W12615.4	Y43806.9	340	142.2	45.2
0222	APR-08	0650	4215.8	6600.8	W12587.3	Y43864.2	284	138.9	47.1
0223	APR-08	1126	4228.8	6632.9	W12627.8	Y43953.9	088	148.2	45.7
0224	APR-08	1708	4230.0	6719.2	W12798.9	Y44010.1	140	182.1	45.3
0225	APR-08	1942	4226.2	6717.4	W12813.2	Y43989.9	258	188.6	45.1
0226	APR-08	2204	4224.5	6730.5	W12877.1	Y43997.1	102	168.1	45.3
0227	APR-08	2344	4218.5	6723.1	W12879.1	Y43959.7	091	158.6	45.2
0228	APR-09	0229	4216.8	6728.7	W12912.0	Y43957.9	065	155.6	45.4
0229	APR-09	0528	4208.7	6732.0	W12969.7	Y43922.4	094	102.8	43.5
0230	APR-09	0716	4209.2	6724.3	W12934.2	Y43916.4	071	99.8	35.9
0231	APR-09	0916	4211.0	6711.5	W12872.1	Y43911.2	083	96.8	42.0
0232	APR-09	1207	4206.3	6712.7	W12901.8	Y43889.8	269	29.5	40.0
0233	APR-09	1438	4159.0	6718.3	W12962.7	Y43860.0	271	28.2	39.6
0234	APR-09	1701	4201.3	6740.1	W13043.4	Y43894.4	246	39.6	40.4
0235	APR-09	1913	4203.8	6750.7	W13077.8	Y43918.3	245	103.6	44.4
0236	APR-09	2128	4153.7	6801.0	W13176.6	Y43878.4	226	57.4	40.6
0237	APR-09	2320	4151.3	6802.9	W13197.6	Y43867.9	056	47.3	40.5
0238	APR-10	0326	4143.4	6802.6	W13235.6	Y43826.0	089	18.0	39.9
0239	APR-10	0612	4141.4	6815.6	W13306.2	Y43829.1	098	15.9	N/A
0240	APR-10	0916	4123.8	6801.4	W13324.8	Y43718.6	057	19.1	40.0

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0241	APR-10	1143	4124.3	6814.2	W13381.3	Y43733.8	195	25.2	40.1
0242	APR-10	1533	4115.8	6818.2	W13438.9	Y43689.9	064	27.1	40.3
0243	APR-10	1747	4111.0	6829.9	W13516.0	Y43673.0	239	30.3	40.5
0244	APR-10	2258	4118.5	6920.9	W13740.6	Y43769.6	005	33.6	39.5
0245	APR-11	0056	4128.3	6931.0	W13751.3	Y43841.0	003	21.6	39.7
0246	APR-15	1509	4131.0	6940.5	W13791.5	Y43869.4	340	14.8	38.8
0247	APR-15	1751	4134.4	6935.3	W13747.5	Y43882.9	106	28.4	39.0
0248	APR-15	2125	4153.5	6931.4	W13636.5	Y43989.6	102	111.5	41.3
0249	APR-15	2332	4153.8	6916.3	W13552.9	Y43970.5	091	113.7	41.3
0250	APR-16	0127	4154.3	6908.5	W13509.0	Y43963.0	255	58.2	41.0
0251	APR-16	0427	4151.6	6852.7	W13439.8	Y43927.6	252	86.1	42.2
0252	APR-16	0749	4136.7	6844.5	W13469.9	Y43835.1	178	80.4	40.9
0253	APR-16	1050	4122.3	6845.9	W13543.9	Y43754.2	217	63.7	41.0
0254	APR-16	1218	4119.1	6847.8	W13568.1	Y43737.7	237	58.5	41.0
0255	APR-16	1442	4106.0	6853.3	W13652.2	Y43666.0	058	43.2	41.4
0256	APR-16	1638	4108.8	6848.0	W13613.7	Y43677.4	065	39.6	41.3
0257	APR-16	1850	4107.1	6839.9	W13581.8	Y43659.5	125	34.2	41.5
0258	APR-16	2300	4138.9	6838.8	W13431.3	Y43841.2	013	84.2	40.9
0259	APR-17	0452	4208.2	6825.0	W13215.1	Y43982.1	017	103.6	43.2
0260	APR-17	0944	4208.9	6803.6	W13109.4	Y43959.5	008	123.3	33.3
0261	APR-17	1159	4215.9	6801.4	W13061.8	Y43991.8	032	104.2	45.6
0262	APR-17	1503	4223.4	6813.5	W13077.4	Y44044.1	003	104.2	44.8
0263	APR-17	1742	4224.9	6813.1	W13067.1	Y44051.2	192	104.7	44.8
0264	APR-17	2116	4234.4	6836.5	W13128.3	Y44129.3	053	114.3	43.0
0265	APR-17	2350	4242.8	6819.9	W12997.6	Y44146.8	068	107.2	45.6
0266	APR-18	0300	4252.9	6756.1	W12825.7	Y44161.3	355	91.9	44.3
0267	APR-18	0659	4317.0	6758.4	W12686.7	Y44270.8	047	130.1	47.2
0268	APR-18	0854	4319.5	6751.1	W12638.0	Y44271.3	304	131.8	45.9
0269	APR-18	1037	4322.0	6757.1	W12648.4	Y44290.5	355	141.1	47.5
0270	APR-18	1300	4331.3	6754.9	W12577.8	Y44325.8	239	134.2	47.6
0271	APR-18	1617	4336.5	6737.8	W12469.4	Y44323.0	244	134.8	47.6
0272	APR-18	1929	4348.9	6740.4	W12396.9	Y44375.4	101	123.6	46.9
0273	APR-18	2249	4340.9	6713.4	W12342.4	Y44307.4	175	90.8	43.1
0274	APR-19	0337	4316.1	6712.1	W12496.7	Y44205.1	061	125.2	46.1
0275	APR-19	0754	4306.4	6644.6	W12454.0	Y44130.8	100	76.0	43.2
0276	APR-19	1326	4309.5	6642.8	W12428.8	Y44141.7	013	64.5	41.9
0277	APR-19	1529	4315.8	6647.5	W12407.1	Y44173.3	052	75.7	42.8
0278	APR-19	1750	4321.7	6638.0	W12338.2	Y44186.0	117	56.3	41.6
0279	APR-19	2201	4316.9	6621.8	W12313.9	Y44147.7	186	33.9	37.5
0280	APR-20	0136	4321.4	6617.8	W12274.2	Y44161.1	030	37.7	36.7
0281	APR-20	0402	4329.1	6618.3	W12229.2	Y44192.2	119	39.4	37.7
0282	APR-20	0736	4336.9	6635.9	W12236.6	Y44243.8	011	64.0	40.8
0283	APR-20	1216	4404.8	6641.5	W12073.9	Y44355.9	079	61.5	39.9
0284	APR-20	1437	4409.4	6638.7	W12034.4	Y44368.8	069	49.8	39.1
0285	APR-20	1721	4405.8	6655.0	W12110.4	Y44376.8	357	94.9	42.7
0286	APR-20	2042	4421.7	6705.3	W12034.7	Y44447.6	155	77.1	39.6
0287	APR-21	0135	4422.6	6733.9	W12131.7	Y44490.5	086	49.5	37.4
0288	APR-21	0411	4413.6	6745.6	W12244.4	Y44475.5	247	65.3	39.3

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0289	APR-21	0733	4355.2	6804.8	W12460.4	Y44435.1	034	102.0	42.2
0290	APR-21	0935	4355.8	6807.6	W12468.6	Y44441.8	060	75.7	39.2
0291	APR-21	1253	4343.8	6809.2	W12559.3	Y44397.3	019	99.0	75.1
0292	APR-21	1450	4343.9	6811.7	W12570.7	Y44401.4	282	110.7	41.3
0293	APR-21	1854	4348.0	6839.0	W12677.6	Y44459.6	242	61.8	37.9
0294	APR-21	2156	4355.3	6846.8	W12667.2	Y44500.9	092	50.9	36.2
0295	APR-22	0750	4347.3	6842.1	W12698.0	Y44462.0	222	59.1	37.7
0296	APR-23	1756	4322.5	7005.8	X25910.9	Y44501.4	050	73.5	38.2
0297	APR-23	2150	4311.5	7016.8	X25901.8	Y44472.1	036	57.7	38.7
0298	APR-24	0041	4300.7	7012.0	X25814.0	Y44411.9	305	91.0	38.1
0299	APR-24	0305	4251.1	7025.1	X25824.0	Y44388.7	223	69.7	38.1
0300	APR-24	0429	4248.6	7030.4	X25838.4	Y44386.0	273	63.2	38.3
0301	APR-24	0625	4249.2	7045.0	X25929.0	Y44417.1	150	17.5	39.1
0302	APR-24	0754	4243.7	7036.8	X25845.8	Y44372.5	125	32.8	38.4
0303	APR-24	1052	4239.6	7024.9	X25752.0	Y44329.5	244	27.3	39.0
0304	APR-24	1325	4226.9	7030.8	X25704.7	Y44271.5	003	31.4	38.4
0305	APR-24	1608	4226.0	7026.8	X25675.4	Y44259.7	320	34.4	38.2
0306	APR-24	1850	4239.2	7019.2	X25718.2	Y44317.2	185	45.1	38.5
0307	APR-24	2122	4238.7	7002.5	X25630.4	Y44285.0	001	61.8	38.6
0308	APR-24	2351	4248.6	7002.8	X25695.0	Y44335.9	174	79.3	38.5
0309	APR-25	0403	4256.4	6929.8	W13288.4	Y44317.5	303	87.2	42.7
0310	APR-25	0713	4313.9	6922.5	W13139.9	Y44386.6	337	94.6	39.7
0311	APR-25	0849	4318.5	6921.0	W13101.8	Y44404.8	036	94.3	39.8
0312	APR-25	1153	4306.3	6918.4	W13163.2	Y44345.5	046	114.8	41.6
0313	APR-25	1454	4250.2	6914.6	W13239.3	Y44263.4	138	79.0	41.1
0314	APR-25	1729	4243.4	6857.8	W13187.6	Y44204.4	200	85.3	41.3
0315	APR-25	2057	4223.4	6915.2	W13393.7	Y44129.5	243	138.6	43.7
0316	APR-25	2237	4221.7	6920.8	W13434.0	Y44128.9	343	133.1	42.1
0317	APR-26	0033	4230.2	6924.4	W13407.9	Y44178.5	304	143.3	42.5
0318	APR-26	0352	4215.3	6942.5	W13590.3	Y44127.5	176	129.9	43.7
0319	APR-26	0710	4153.5	6951.1	W13747.9	Y44017.5	338	33.1	38.7
0320	APR-26	0804	4156.7	6953.0	W13743.4	Y44038.4	334	29.5	38.7
0321	APR-26	0943	4201.1	6957.6	W13748.7	Y44071.3	328	24.1	38.2
0322	APR-26	1154	4200.1	6959.8	W13766.4	Y44068.6	325	11.5	39.4
0323	APR-26	1404	4206.0	7015.3	X25473.1	Y44126.9	076	33.9	37.8
0324	APR-26	1549	4202.2	7016.2	X25451.7	Y44106.3	127	27.6	37.9
0325	APR-26	1735	4158.7	7009.4	X25389.1	Y44075.2	195	16.1	42.7
0326	APR-26	1937	4153.5	7016.4	X25391.8	Y44055.4	309	18.3	40.2
0327	APR-26	2246	4213.7	7006.0	X25478.2	Y44155.8	094	53.6	38.5
0328	APR-27	0125	4215.9	7009.1	X25509.7	Y44173.5	095	42.7	38.2
0329	APR-27	0417	4211.3	7028.4	X25587.4	Y44179.2	282	31.7	37.4
0330	APR-27	0639	4214.3	7041.8	X25694.6	Y44220.1	145	11.8	39.4
0331	APR-27	0823	4208.4	7036.9	X25624.1	Y44177.1	336	13.1	41.4
0332	APR-27	1128	4150.5	7027.8	X25445.3	Y44054.7	349	12.8	42.3

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STATION	SPINY DOGFISH	WINTER SKATE	LITTLE SKATE	ATLANTIC HERRING	SILVER HAKE	ATLANTIC COD	HADDOCK	POLLOCK	WHITE HAKE	RED HAKE	AMERICAN PLAICE	SUMMER FLDR	YELLOWTAIL FLDR	WINTER FLDR	WITCH FLDR	WINDOWPANE FLDR	ATLANTIC MACKEREL	BUTTERFISH	ACADIAN REDFISH	LONGHORN SCULPIN	OCEAN POUT	GOOSEFISH	AMERICAN LOBSTER	LONGFIN SQUID	TOTAL* OTHER	TOTAL ALL	
1	1059	0	0	0	0	0	0	0	0	0	0	17	0	0	0	0	49	0	0	0	0	0	0	8	60	1193	
2	348	0	0	0	0	0	0	0	0	0	0	13	0	0	0	0	1	1	0	0	0	0	0	5	2	370	
3	157	0	6	6	0	0	0	0	0	0	0	24	0	0	0	0	13	0	0	0	0	0	0	5	29	240	
4	27	0	15	4	0	0	0	0	0	0	0	10	0	0	0	0	2	0	0	0	0	0	3	0	5	66	
5	22	0	0	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	22	0	71	19	136	
6	65	0	0	0	0	0	0	0	0	0	0	7	0	0	0	0	0	0	0	0	0	0	0	72	15	159	
7	7	0	0	0	0	0	0	0	0	0	0	18	0	0	0	0	0	0	0	0	0	0	1	37	58	121	
8	904	0	1	10	0	0	0	0	0	0	0	2	0	0	0	0	330	0	0	0	0	0	0	20	15	1282	
9	37	0	185	2	0	0	0	0	0	0	0	3	0	0	0	0	10	0	0	0	0	0	0	0	16	253	
10	2	0	6	0	0	0	0	0	0	0	0	8	0	0	0	0	0	0	0	0	0	0	0	0	62	78	
11	28	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	1	198	228	
12	976	0	0	0	0	0	0	0	0	0	0	4	0	0	0	0	0	3	0	0	0	0	0	85	72	1140	
13	17	0	0	0	0	0	0	0	0	0	0	3	0	0	0	0	1	3	0	0	0	0	0	21	3300	3345	
14	434	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	6	7	0	0	0	0	0	37	24	509	
15	2828	0	0	0	4	0	0	0	6	1	0	0	0	0	2	0	0	0	0	0	0	62	2	0	13	2918	
16	23	18	0	21	0	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	0	1	65	
17	95	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	22	119	
18	2151	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	17	35	2203	
19	1659	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	3	0	0	0	0	0	63	66	1793	
20	4920	0	0	0	0	0	0	0	0	0	0	4	0	0	0	0	0	0	0	0	0	8	0	12	904	5848	
21	992	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	25	0	0	0	0	0	10	61	1090	
22	1214	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	0	0	0	10	0	2	22	1251	
23	154	0	0	0	0	0	0	0	0	0	0	4	0	0	0	0	7	0	0	0	0	0	0	0	67	232	
24	86	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	894	980
25	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	10495	10495
26	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	4	0	0	0	0	0	7	201	214	
27	109	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9	0	0	0	0	0	0	313	431	
28	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	0	0	0	34	0	4	26	67	
29	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	46	0	0	0	0	0	1	653	704	
30	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	2	550	553	
31	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	218	220	
32	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	19	0	19	
33	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	256	256	
34	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
35	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	10	13	24	
36	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	15	16	
37	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	5	355	360	
38	1140	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	0	0	0	13	0	3	5215	6374	
39	1220	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	36	0	18	7520	8796	

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79	49	0	6	1	0	0	0	0	0	0	0	0	0	0	1	0	22	0	0	0	0	0	0	0	0	4	83	
80	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	3	
81	0	0	22	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	54	78	
82	0	9	15	0	0	0	0	0	0	0	0	0	0	1	0	3	0	0	0	0	0	0	0	0	0	0	28	
83	0	12	99	0	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	113	
84	0	23	168	0	0	0	0	0	0	0	0	2	0	0	0	33	0	0	0	0	0	0	0	0	0	3	229	
85	0	20	129	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	150	
86	0	52	109	0	0	0	0	0	0	0	0	1	0	0	0	35	0	0	0	0	0	0	0	0	0	44	241	
87	0	91	85	0	0	0	0	0	0	0	0	0	0	0	0	25	0	0	0	0	0	0	0	0	0	43	244	
88	0	14	82	0	0	0	0	0	0	0	0	0	0	0	0	12	0	0	0	0	0	0	0	0	0	2	110	
89	0	17	89	0	0	0	0	0	0	0	0	2	0	0	0	25	0	0	0	0	0	0	0	0	0	3	136	
90	0	9	44	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	54	
91	0	18	47	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	1	67	
92	0	0	44	0	0	0	0	0	0	0	0	0	0	0	0	5	0	0	0	0	0	0	0	0	0	1	50	
93	0	11	37	0	0	0	0	0	0	0	0	1	0	0	0	4	0	0	0	0	0	0	0	0	0	3	56	
94	0	2	57	0	0	0	0	0	0	0	0	1	0	0	0	2	0	0	0	0	0	0	0	0	0	2	64	
95	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	
96	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
97	8	17	140	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	166	
98	0	10	53	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	1	65	
99	0	0	5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	8	13	
100	82	0	1	0	0	0	0	0	0	0	0	4	0	0	0	1	0	0	0	0	0	0	1	0	0	3	92	
101	703	0	0	6	0	0	0	0	0	0	0	2	0	0	0	0	604	0	0	0	0	3	0	0	7	57	1382	
102	385	0	1	0	0	0	0	0	0	0	0	14	0	0	0	0	38	2	0	0	0	0	0	1	0	3	444	
103	49	0	0	0	0	0	0	0	1	0	0	16	0	0	0	0	0	5	0	0	0	1	0	40	0	48	160	
104	213	0	10	0	1	0	0	0	0	0	0	12	0	0	0	0	3	0	0	0	0	0	0	1	0	147	387	
105	533	0	45	227	0	0	0	0	0	0	0	5	0	0	0	0	19	0	0	0	0	13	0	1	0	64	907	
106	350	0	25	40	2	0	0	0	0	1	0	13	0	0	0	0	6	0	0	0	0	0	0	1	0	219	657	
107	303	0	13	14	1	0	0	0	0	0	0	16	0	0	0	0	9	1	0	0	0	0	0	1	0	29	387	
108	0	0	0	0	0	0	0	0	0	0	0	23	0	0	0	0	6	1	0	0	0	0	0	2	0	25	57	
109	204	0	0	0	0	0	0	0	5	0	0	0	0	0	0	0	0	5	0	0	0	0	3	14	0	27	258	
110	0	0	0	1	1	0	0	0	0	0	0	25	0	0	0	0	3	0	0	0	0	0	0	1	0	7	38	
111	0	0	0	7	1	0	0	0	0	0	0	28	0	0	0	0	170	0	0	0	0	0	0	0	0	19	225	
112	3047	0	4	0	0	0	0	0	0	0	0	0	0	0	0	0	419	0	0	0	0	0	0	0	0	181	3651	
113	3	2	167	15	2	0	0	0	0	0	0	1	0	0	1	0	2	0	0	0	0	2	7	0	0	0	55	257
114	4	0	186	47	0	0	0	0	0	0	0	4	0	0	0	0	4	0	0	0	0	6	0	1	0	0	53	305
115	20	0	192	4	0	0	0	0	0	0	0	1	0	0	0	0	2	0	0	0	19	0	0	0	0	15	253	
116	0	25	195	5	0	0	0	0	0	0	0	1	7	1	0	2	0	0	0	0	12	0	0	0	0	13	261	
117	101	0	3	1	0	0	0	0	0	0	0	1	0	0	0	0	60	0	0	0	0	1	0	0	0	7	174	

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118	0	0	18	1	0	0	0	0	0	0	0	0	0	6	0	0	0	0	0	0	3	0	0	0	1	29
119	0	0	1	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	3
120	0	0	1	3	0	0	0	0	0	0	0	0	0	4	0	0	0	0	0	0	2	0	0	0	0	10
121	0	0	1	0	0	0	0	0	0	0	0	0	1	2	0	0	0	0	0	0	17	0	0	0	0	21
122	0	1	4	4	0	0	0	0	0	0	0	0	0	6	0	0	0	0	0	0	4	0	0	0	0	19
123	0	2	108	0	0	0	0	0	0	0	0	0	0	5	0	0	0	0	0	0	10	0	0	0	0	125
124	0	25	36	0	0	0	0	0	0	0	0	0	0	4	0	3	0	0	0	0	3	0	1	0	4	76
125	0	86	467	0	0	0	0	0	0	0	0	0	0	7	0	4	0	0	0	0	2	0	0	0	6	572
126	0	0	196	0	0	0	0	0	0	0	0	0	0	5	0	0	0	0	0	0	0	0	0	0	3	204
127	0	7	104	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	2	0	0	0	1	115
128	0	36	95	0	0	0	0	0	0	0	0	0	0	8	0	1	0	0	0	0	5	0	0	0	3	148
129	0	16	134	0	0	0	0	0	0	0	0	0	0	7	0	0	0	0	0	0	6	0	0	0	0	163
130	0	0	2	1	0	0	0	0	0	0	0	0	1	2	0	0	0	0	0	0	11	0	0	0	1	18
131	0	0	5	1	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	18	0	0	0	1	26
132	0	0	1	0	0	0	0	0	0	0	0	0	0	8	0	0	0	0	0	0	0	0	0	0	0	9
133	0	0	2	0	0	0	0	0	0	0	0	0	0	8	0	0	0	0	0	0	0	0	0	0	0	10
134	0	1	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	2
135	0	0	20	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	22
136	0	5	1	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	2	10
137	0	0	1	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	2
138	0	0	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	1	0	0	0	0	3
139	0	0	3	0	0	0	0	0	0	0	0	0	0	2	0	3	0	0	0	0	0	0	0	0	0	8
140	0	2	35	0	0	0	0	0	0	0	0	0	0	4	0	1	0	0	0	0	0	0	0	0	0	42
141	0	23	105	0	0	0	0	0	0	0	0	0	1	6	0	0	0	0	0	0	0	0	0	0	0	135
142	0	10	67	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	1	2	0	0	0	82
143	0	51	269	0	0	0	0	0	0	0	0	0	0	3	0	0	0	0	0	0	0	0	1	0	3	327
144	0	27	252	0	0	0	0	0	0	0	0	0	0	8	0	1	0	0	0	8	2	0	0	0	5	303
145	0	4	9	0	0	0	0	0	0	0	0	0	0	4	0	0	0	0	0	0	0	0	0	0	24	41
146	0	0	1	2	0	0	0	0	0	0	0	0	0	4	0	0	0	0	0	3	4	0	0	0	1	15
147	0	0	3	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	25	30
148	0	1	3	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	1	6
149	0	6	0	0	0	15	0	0	0	0	0	2	4	2	0	0	0	0	0	5	408	0	0	0	16	458
150	4	1	3	0	0	0	0	0	0	0	0	17	0	0	0	0	0	0	0	1	7	0	0	0	6	39
151	0	9	72	36	1	0	0	0	0	1	0	6	0	0	0	0	0	0	0	0	0	0	0	0	29	154
152	0	0	11	51	1	0	0	0	0	0	0	10	0	0	0	0	0	0	0	0	1	0	3	0	51	128
153	0	0	5	31	4	0	0	0	0	1	0	3	0	0	0	0	0	0	0	0	0	0	1	0	27	72
154	0	0	3	22	2	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	3	0	0	22	53
155	0	0	1	451	1	0	0	0	0	0	0	11	0	0	0	0	13	0	0	0	0	15	0	0	14	506
156	4	0	0	0	4	0	0	0	0	2	0	58	0	0	0	0	0	2	0	0	0	37	0	16	95	218

NMFS-NEFSC SPRING BOTTOM TRAWL SURVEY
 DELAWARE II MAR 05 - APR 27, 2003
 CATCH WEIGHTS (POUNDS) OF IMPORTANT SPECIES BY HAUL

STATION	SPINY DOGFISH	WINTER SKATE	LITTLE SKATE	ATLANTIC HERRING	SILVER HAKE	ATLANTIC COD	HADDOCK	POLLOCK	WHITE HAKE	RED HAKE	AMERICAN PLAICE	SUMMER FLDR	YELLOWTAIL FLDR	WINTER FLDR	WITCH FLDR	WINDOWPANE FLDR	ATLANTIC MACKEREL	BUTTERFISH	ACADIAN REDFISH	LONGHORN SCULPIN	OCEAN POUT	GOOSEFISH	AMERICAN LOBSTER	LONGFIN SQUID	TOTAL* OTHER	TOTAL ALL	
157	3	0	0	0	7	0	0	0	11	6	0	0	0	0	2	0	0	0	0	0	0	91	34	0	13	167	
158	0	0	0	3	1	0	0	0	0	0	0	6	0	0	0	0	46	0	0	0	1	0	0	0	0	14	71
159	13	0	0	3	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	1	1	18	0	0	16	53	
160	0	57	209	8	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	15	0	0	0	0	10	299	
161	0	20	126	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	2	0	0	1	0	4	154	
162	0	1	5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	9	
163	0	18	70	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	2	91	
164	0	0	5	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	1	8
165	0	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	4
166	32	7	1	2	0	0	0	0	0	0	0	0	2	1	0	0	0	0	0	4	3	0	0	0	5	57	
167	28	12	0	0	1	0	0	0	0	0	0	13	0	0	0	6	0	0	0	0	0	1	0	0	4	65	
168	7	0	0	14	0	0	0	0	0	1	0	34	0	0	0	0	2	10	0	0	0	14	0	1	86	169	
169	8	0	0	0	0	0	0	0	0	0	0	32	0	0	0	0	0	277	0	0	0	0	0	8	22	347	
170	10	39	0	3	5	0	0	0	0	0	0	8	0	0	0	0	1	2	0	0	0	13	0	1	30	112	
171	23	44	0	1	2	0	0	0	0	4	0	18	0	0	1	0	3	4	0	0	1	29	0	2	115	247	
172	20403	0	0	0	2	0	0	28	7	0	0	8	0	0	0	0	0	0	0	0	0	5	5	1	91	20550	
173	16	7	0	95	0	0	0	0	0	0	0	1	0	0	0	0	13	0	0	0	1	0	0	0	1	134	
174	20	41	24	154	1	0	0	0	0	0	0	0	0	0	0	3	0	0	0	0	0	13	0	0	6	262	
175	9	135	33	0	1	0	0	0	0	0	0	0	2	1	2	5	0	0	0	4	0	0	0	0	4	196	
176	4	6	7	0	1	0	0	0	0	0	0	0	1	1	0	2	0	0	0	3	0	0	0	0	10	35	
177	34	36	26	0	0	0	0	0	0	0	0	0	5	0	0	0	0	0	0	6	0	0	0	0	7	114	
178	61	58	6	0	1	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	1	0	0	3	131	
179	0	0	28	0	0	0	0	0	0	0	0	0	0	1	0	1	0	0	0	24	0	0	0	0	0	54	
180	0	0	0	0	0	1	0	0	0	0	0	0	0	2	0	0	0	0	0	4	0	0	0	0	5	12	
181	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	1	0	0	0	0	5	7	
182	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	15	16	
183	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	9	0	0	0	0	2	12	
184	0	0	0	0	0	4	0	1	0	0	0	0	0	3	0	0	0	0	0	55	3	0	1	0	9	76	
185	0	0	0	12	0	8	0	7	0	0	0	0	0	2	0	0	0	0	0	11	1	0	1	0	8	50	
186	4	10	68	1	0	0	0	0	0	0	0	0	1	0	0	1	0	0	0	2	0	0	1	0	1	89	
187	4	15	15	0	0	0	15	0	0	0	0	0	0	0	0	3	0	0	0	0	0	0	0	0	0	52	
188	0	40	35	0	0	0	0	0	0	0	0	0	2	1	0	16	0	0	0	1	0	0	0	0	0	95	
189	12	28	6	3	9	0	0	0	0	17	0	12	0	0	0	0	0	0	0	0	0	27	0	1	123	238	
190	32	0	0	1	3	0	0	0	0	0	0	4	0	0	0	0	4	1	0	0	0	0	0	0	1	46	
191	641	0	1	0	3	0	0	0	0	13	0	30	0	0	0	0	7	0	0	0	0	0	0	4	25	724	
192	2	0	0	0	14	0	0	0	0	26	0	0	0	0	0	0	0	1	0	0	0	4	0	3	106	156	
193	5	0	0	0	2	9	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	7	23	
194	0	0	38	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	1	4	10	0	0	3	57	
195	0	4	167	0	0	12	0	0	0	0	0	0	0	0	0	0	0	0	0	2	9	0	0	0	16	210	

NMFS-NEFSC SPRING BOTTOM TRAWL SURVEY
 DELAWARE II MAR 05 - APR 27, 2003
 CATCH WEIGHTS (POUNDS) OF IMPORTANT SPECIES BY HAUL

STATION	SPINY DOGFISH	WINTER SKATE	LITTLE SKATE	ATLANTIC HERRING	SILVER HAKE	ATLANTIC COD	HADDOCK	POLLOCK	WHITE HAKE	RED HAKE	AMERICAN PLAICE	SUMMER FLDR	YELLOWTAIL FLDR	WINTER FLDR	WITCH FLDR	WINDOWPANE FLDR	ATLANTIC MACKEREL	BUTTERFISH	ACADIAN REDFISH	LONGHORN SCULPIN	OCEAN POUT	GOOSEFISH	AMERICAN LOBSTER	LONGFIN SQUID	TOTAL* OTHER	TOTAL ALL	
196	0	387	80	0	0	14	4	0	0	0	0	0	8	0	0	21	0	0	0	27	14	0	2	0	2	559	
197	0	0	52	0	0	10	0	0	0	0	1	0	6	0	0	1	0	0	0	24	12	0	0	0	9	115	
198	6	0	0	0	0	89	1	0	0	0	0	0	0	0	0	0	0	0	0	0	4	0	0	0	11	111	
199	0	0	0	0	0	0	35	0	0	0	2	0	0	0	0	0	0	0	0	1	0	0	0	0	3	41	
200	11	2	6	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	4	0	0	0	0	0	24	
201	0	10	4	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	1	0	0	0	0	0	16	
202	0	1	6	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	8	
203	0	0	1	0	0	0	0	0	0	0	1	0	0	0	0	3	0	0	0	4	0	0	0	0	0	9	
204	4	2	17	0	0	4	0	0	0	0	1	0	0	0	0	18	0	0	0	7	0	0	0	0	0	53	
205	0	19	107	0	0	24	0	0	0	0	1	0	1	42	0	5	0	0	0	45	0	0	0	0	5	249	
206	4	70	103	0	0	0	37	0	0	0	4	0	1	0	0	8	0	0	0	56	1	0	0	0	0	284	
207	0	85	43	0	0	0	40	0	0	0	4	0	15	0	0	8	0	0	0	61	2	0	0	0	0	258	
208	47	0	1	0	0	0	107	0	0	0	3	0	28	15	0	0	0	0	0	19	5	0	0	0	32	257	
209	63	0	4	1	0	34	44	0	0	0	1	0	10	0	0	0	0	0	0	24	4	0	0	0	20	205	
210	0	10	0	0	0	14	18	0	0	0	0	0	12	0	0	0	0	0	0	19	6	0	0	0	22	101	
211	8	44	24	0	1	7	1	0	0	0	0	0	17	0	0	11	0	0	0	8	1	0	0	0	67	189	
212	340	0	11	5	7	11	1	0	0	8	0	0	0	0	0	0	8	0	0	0	0	0	0	0	10	401	
213	20	0	2	0	17	0	0	0	19	11	0	0	0	0	3	0	0	0	1	0	0	0	109	0	30	212	
214	48	9	2	13	11	12	12	0	0	1	0	0	3	0	1	0	1	0	0	0	0	0	0	0	17	130	
215	7	7	0	0	0	23	140	0	0	0	0	0	84	5	0	0	0	0	0	12	8	0	0	0	8	294	
216	0	4	4	0	0	0	31	0	0	0	0	0	7	0	0	0	0	0	0	10	0	0	0	0	0	56	
217	0	0	1	1	0	275	382	0	0	0	0	0	10	1	0	0	0	0	0	28	0	0	0	0	5	703	
218	6	2	15	0	0	4	63	0	0	0	3	0	249	38	0	0	0	0	0	29	0	0	3	0	13	425	
219	33	25	21	0	0	36	683	0	0	0	0	0	183	9	0	0	0	0	0	11	0	17	0	0	42	1060	
220	71	12	4	1	0	0	3	34	12	0	0	0	3	0	0	0	0	0	0	1	0	0	3	0	8	152	
221	156	0	0	0	0	13	0	0	11	0	0	0	0	0	0	0	0	0	1	0	0	0	33	0	3	217	
222	85	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	86	
223	151	0	0	0	0	26	9	0	20	3	0	0	0	0	0	0	0	0	0	0	0	0	12	0	10	231	
224	10	0	0	0	59	0	0	0	69	1	0	0	0	0	7	0	0	0	4	0	0	39	4	0	151	344	
225	191	0	0	0	59	0	0	0	53	0	0	0	0	0	4	0	0	0	0	0	0	45	25	0	161	538	
226	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
227	165	0	0	0	3	9	4	0	41	3	0	0	0	0	0	0	0	0	0	0	0	0	18	0	27	270	
228	16	0	0	0	2	0	0	0	7	8	0	0	0	0	1	0	0	0	0	0	0	0	83	0	13	130	
229	111	0	1	0	2	46	8	0	0	0	0	0	0	0	3	0	0	0	0	0	0	1	10	0	11	193	
230	17	0	0	0	2	0	4	0	0	1	20	0	0	0	1	0	0	0	0	0	0	0	0	0	3	48	
231	6	0	0	0	1	93	2	23	0	3	26	0	0	0	5	0	0	0	0	0	4	3	14	0	28	208	
232	0	9	3	0	0	102	401	26	0	0	0	0	1	4	0	0	0	0	0	2	10	0	6	0	134	698	
233	0	0	5	0	0	6	24	0	0	0	0	0	0	0	0	0	0	0	0	139	4	0	0	0	26	204	
234	6	4	1	0	2	0	0	0	0	0	1	2	4	7	0	5	0	0	0	21	0	0	0	0	1	54	

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 DELAWARE II MAR 05 - APR 27, 2003
 CATCH WEIGHTS (POUNDS) OF IMPORTANT SPECIES BY HAUL

STATION	SPINY DOGFISH	WINTER SKATE	LITTLE SKATE	ATLANTIC HERRING	SILVER HAKE	ATLANTIC COD	HADDOCK	POLLOCK	WHITE HAKE	RED HAKE	AMERICAN PLAICE	SUMMER FLDR	YELLOWTAIL FLDR	WINTER FLDR	WITCH FLDR	WINDOWPANE FLDR	ATLANTIC MACKEREL	BUTTERFISH	ACADIAN REDFISH	LONGHORN SCULPIN	OCEAN POUT	GOOSEFISH	AMERICAN LOBSTER	LONGFIN SQUID	TOTAL* OTHER	TOTAL ALL	
235	89	0	0	0	25	9	3	0	0	6	0	0	0	0	1	0	0	0	0	0	0	1	7	0	5	146	
236	736	93	13	0	6	12	0	0	0	1	2	0	0	0	1	0	0	0	0	2	0	0	0	0	7	873	
237	858	216	47	0	5	27	0	0	0	0	3	0	2	0	0	5	0	0	0	6	0	1	0	0	20	1190	
238	0	38	226	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	2	0	0	11	0	8	286	
239	0	0	3	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	2	0	0	0	0	0	0	6
240	0	0	6	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	1	10	
241	0	0	3	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	7	4	0	0	0	3	18	
242	9	5	7	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	0	0	1	0	8	33	
243	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2
244	0	8	0	1	0	0	0	0	0	0	1	0	0	9	0	0	0	0	0	10	0	0	0	0	4	33	
245	0	10	29	2	0	16	0	2	0	0	0	0	0	8	0	0	0	0	0	28	3	0	33	0	65	196	
246	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	3	4	
247	5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4	0	0	0	0	16	25	
248	19	0	0	0	1	0	0	0	0	3	4	0	0	0	2	0	0	0	10	0	0	0	6	0	4	49	
249	14	130	0	0	1	0	4	0	10	6	1	0	0	0	5	0	0	0	1	0	0	11	0	0	34	217	
250	8	0	0	0	1	0	0	5	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	3	18	
251	66	61	0	1	12	0	0	0	0	11	0	0	0	0	12	0	0	0	60	0	0	6	0	0	7	236	
252	0	13	0	1	7	0	0	0	0	1	1	0	0	0	1	0	0	0	0	0	10	0	0	0	8	42	
253	7	0	0	0	2	7	133	0	0	1	4	0	1	0	0	0	0	0	0	1	14	0	12	0	27	209	
254	16	0	0	2	0	0	35	0	0	0	1	0	2	0	0	0	0	0	0	0	0	0	0	0	14	70	
255	19	0	1	0	0	0	12	0	0	0	0	0	2	0	0	0	0	0	0	2	0	0	3	0	2	41	
256	22	0	2	2	0	17	1128	0	0	0	0	0	2	0	0	0	0	0	0	2	5	0	10	0	32	1222	
257	0	0	81	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	1	0	0	0	0	4	87	
258	6	0	1	1	14	0	0	0	1	5	1	0	0	0	0	0	0	0	0	0	0	0	3	0	29	61	
259	32	0	0	0	3	11	0	11	0	4	2	0	0	0	3	0	0	0	0	0	0	4	0	0	5	75	
260	0	0	0	0	16	0	0	0	2	8	0	0	0	0	0	0	0	0	0	0	0	19	4	0	11	60	
261	312	0	0	0	15	4	6	0	0	5	0	0	0	0	4	0	0	0	283	0	0	0	0	0	14	643	
262	10	0	0	0	0	0	0	0	11	1	0	0	0	0	1	0	0	0	29	0	0	0	5	0	1	58	
263	21	0	0	0	4	0	8	0	10	4	0	0	0	0	6	0	0	0	861	0	0	0	2	0	6	922	
264	22	0	0	0	7	0	1	26	4	3	1	0	0	0	0	0	0	0	0	0	0	32	0	0	2	98	
265	34	0	0	0	6	0	0	0	41	4	3	0	0	0	2	0	0	0	78	0	0	0	3	0	19	190	
266	67	0	0	0	1	0	3	11	0	1	0	0	0	0	7	0	0	0	38	0	0	0	0	0	15	143	
267	33	0	0	0	12	0	0	0	20	2	4	0	0	0	5	0	0	0	0	0	0	6	2	0	5	89	
268	8	0	0	0	2	0	0	2	42	4	1	0	0	0	7	0	0	0	1	0	0	0	5	0	15	87	
269	2	0	0	0	12	0	0	0	85	6	2	0	0	0	0	0	0	0	0	0	0	11	0	0	10	128	
270	7	0	0	0	5	0	0	0	50	8	5	0	0	0	2	0	0	0	5	0	0	10	10	0	5	107	
271	27	0	0	0	8	0	0	0	63	1	0	0	0	0	1	0	0	0	1	0	0	0	4	0	5	110	
272	1	0	0	1	14	0	3	0	74	7	3	0	0	0	5	0	0	0	0	0	0	0	0	0	5	113	
273	7	0	0	1	7	9	2	15	12	3	1	0	0	0	14	0	0	0	0	0	0	5	0	0	10	86	

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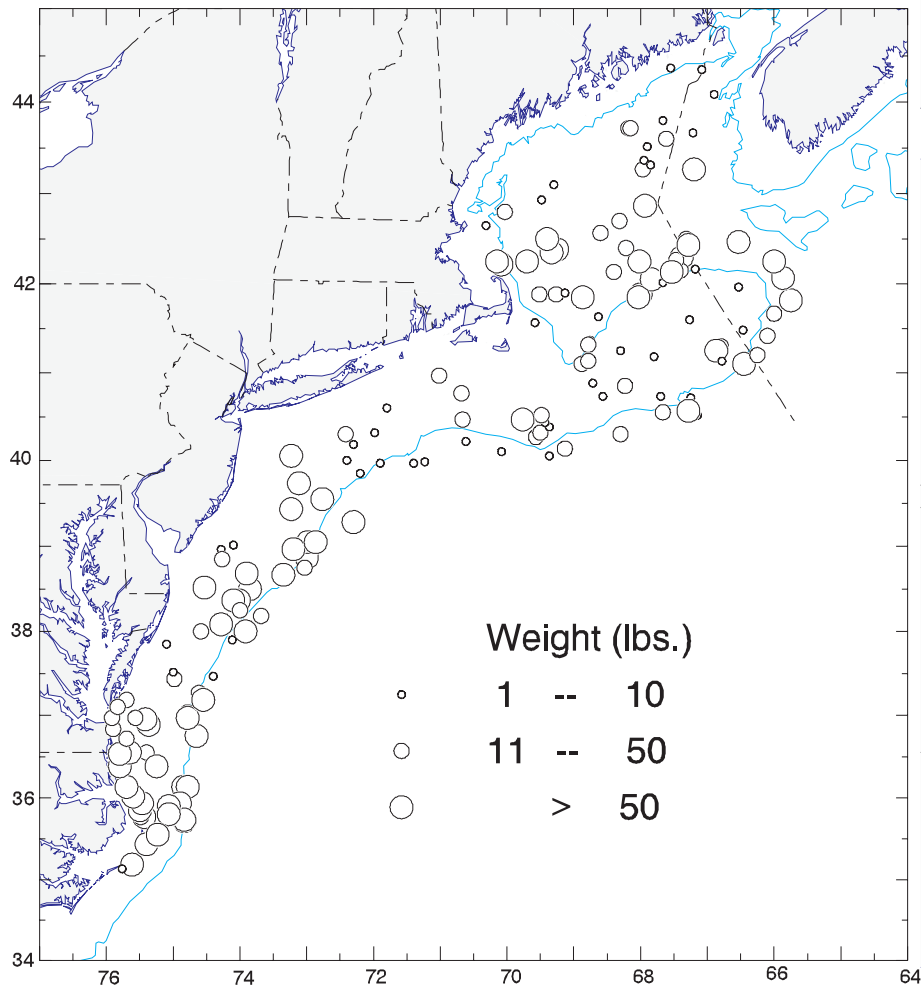
STATION	SPINY DOGFISH	WINTER SKATE	LITTLE SKATE	ATLANTIC HERRING	SILVER HAKE	ATLANTIC COD	HADDOCK	POLLOCK	WHITE HAKE	RED HAKE	AMERICAN PLAICE	SUMMER FLDR	YELLOWTAIL FLDR	WINTER FLDR	WITCH FLDR	WINDOWPANE FLDR	ATLANTIC MACKEREL	BUTTERFISH	ACADIAN REDFISH	LONGHORN SCULPIN	OCEAN POUT	GOOSEFISH	AMERICAN LOBSTER	LONGFIN SQUID	TOTAL* OTHER	TOTAL ALL	
274	107	0	0	0	4	0	3	0	22	4	4	0	0	0	3	0	0	0	0	0	0	6	12	0	6	171	
275	0	0	0	7	0	0	198	5	0	0	0	0	3	44	0	0	0	0	0	1	0	0	12	0	5	275	
276	0	0	0	4	0	4	117	0	0	0	0	0	3	42	0	0	0	0	0	4	0	0	3	0	6	183	
277	0	8	0	1	3	0	27	1	0	0	9	0	0	1	6	0	0	0	0	1	1	5	0	0	6	69	
278	0	0	0	13	1	0	7	0	0	0	5	0	0	19	1	0	0	0	0	9	0	0	38	0	23	116	
279	0	1	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	1	0	0	4	
280	0	0	2	0	0	0	0	0	0	0	0	0	0	5	0	0	0	0	0	6	0	0	20	0	96	129	
281	0	0	0	0	0	1	0	0	0	0	0	0	0	22	0	0	0	0	0	14	0	0	12	0	114	163	
282	0	1	0	1	0	1	48	0	0	0	1	0	1	5	0	0	0	0	0	3	0	0	8	0	12	81	
283	0	0	0	0	0	2	22	0	0	0	1	0	0	22	0	0	0	0	0	8	0	0	33	0	129	217	
284	0	6	0	0	0	1	3	0	0	0	0	0	0	4	0	0	0	0	0	2	0	0	8	0	37	61	
285	6	0	0	1	3	16	6	8	3	5	0	0	0	0	8	0	0	0	31	1	0	0	1	0	17	106	
286	6	0	0	0	1	31	0	0	45	1	1	0	0	5	6	0	0	0	1	1	0	0	4	0	22	124	
287	4	0	1	2	0	3	0	0	1	0	0	0	0	3	0	0	0	0	0	7	0	0	28	0	32	81	
288	0	0	0	2	1	0	0	0	2	0	7	0	0	1	0	2	0	0	0	3	0	0	0	0	0	24	42
289	0	0	0	0	38	0	0	0	3	0	2	0	0	0	1	0	0	0	0	0	0	0	0	0	12	56	
290	0	0	0	0	1	4	1	10	0	0	0	0	0	0	0	0	0	0	2	9	0	0	14	0	15	56	
291	18	0	0	1	6	0	0	0	9	1	3	0	0	0	1	0	0	0	0	0	0	0	6	0	7	52	
292	17	0	0	0	4	1	0	2	11	3	13	0	0	0	3	0	0	0	93	0	0	0	6	0	3	156	
293	0	0	6	6	0	2	0	0	1	0	1	0	0	0	1	0	0	0	0	9	0	0	14	0	11	51	
294	0	0	0	11	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	3	0	0	26	0	15	56	
295	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
296	0	0	0	0	5	16	13	0	0	0	14	0	1	0	0	0	0	0	0	0	0	0	0	0	35	84	
297	0	8	4	0	14	0	0	0	1	2	11	0	2	2	0	0	0	0	1	0	0	1	10	0	21	77	
298	0	0	0	0	2	0	0	0	0	3	17	0	0	0	17	0	0	0	42	0	0	0	0	0	30	111	
299	0	0	0	0	1	0	4	0	0	1	17	0	6	0	2	0	0	0	1	0	0	2	0	0	47	81	
300	0	0	0	0	3	1229	26	0	0	1	14	0	0	0	1	0	0	0	1	0	0	2	0	22	1299		
301	0	0	0	206	0	0	0	0	0	0	0	0	5	7	0	0	0	0	0	264	0	0	4	0	14	500	
302	0	0	2	134	7	4	0	0	0	0	10	0	16	4	0	0	0	0	0	56	18	0	32	0	27	310	
303	0	0	0	2	0	194	11	7	0	0	1	0	18	74	0	0	0	0	0	140	50	0	1	0	34	532	
304	0	0	0	1	0	193	72	0	0	1	11	0	26	56	0	0	0	0	0	23	47	0	4	0	15	449	
305	0	0	0	1	1	201	199	0	0	2	30	0	53	21	0	0	0	0	5	39	39	0	3	0	22	616	
306	7	0	0	0	1	65	34	1	0	0	10	0	0	0	0	0	0	0	2	4	0	0	0	0	33	157	
307	0	0	0	0	0	122	2	0	0	1	3	0	0	0	0	0	0	0	2	2	0	0	19	0	31	182	
308	21	0	0	0	11	290	0	15	0	4	12	0	0	0	0	0	0	0	48	0	0	1	9	0	22	433	
309	10	0	0	0	29	0	0	0	0	1	6	0	0	0	6	0	0	0	1278	0	0	0	6	0	13	1349	
310	0	0	0	0	6	0	0	0	1	3	10	0	0	0	19	0	0	0	0	0	3	7	12	0	10	71	
311	0	0	0	4	13	7	2	0	0	2	3	0	0	0	5	0	0	0	0	0	0	0	4	0	16	56	
312	7	0	0	0	2	0	0	0	1	1	15	0	0	0	11	0	0	0	1	0	12	0	0	0	7	57	

NMFS-NEFSC SPRING BOTTOM TRAWL SURVEY
 DELAWARE II MAR 05 - APR 27, 2003
 CATCH WEIGHTS (POUNDS) OF IMPORTANT SPECIES BY HAUL

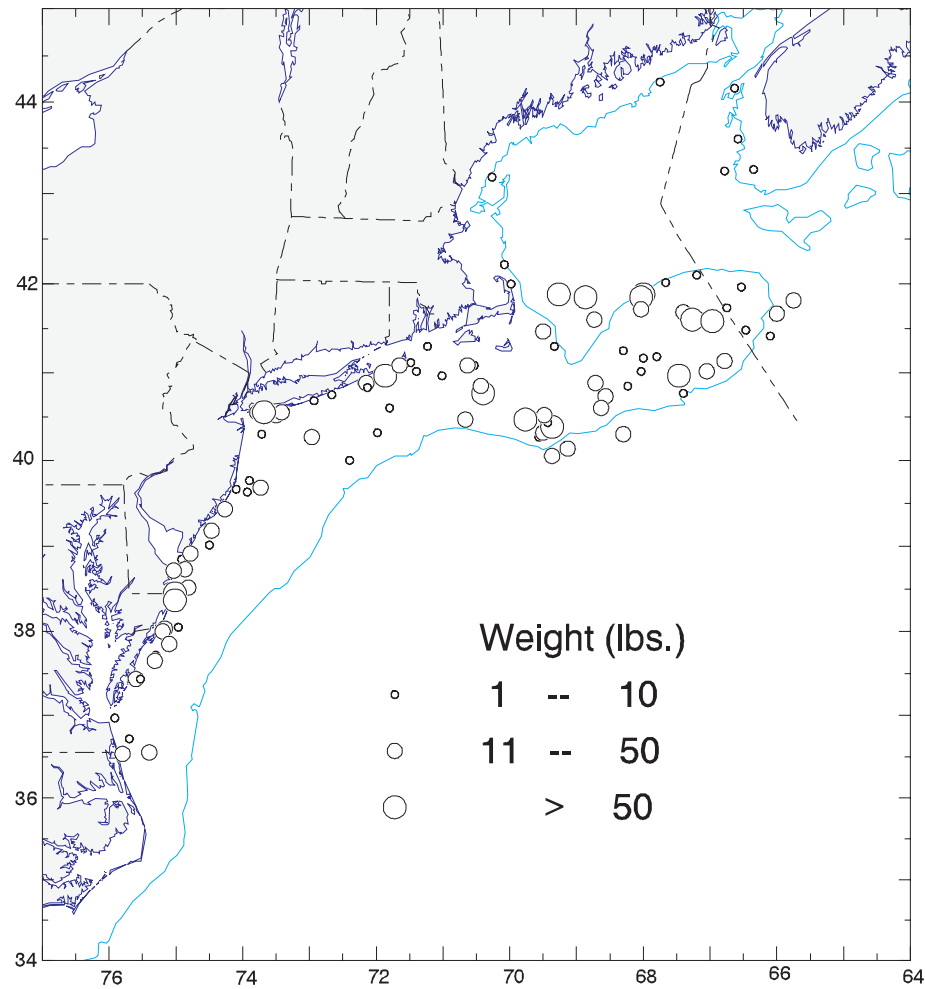
STATION	SPINY DOGFISH	WINTER SKATE	LITTLE SKATE	ATLANTIC HERRING	SILVER HAKE	ATLANTIC COD	HADDOCK	POLLOCK	WHITE HAKE	RED HAKE	AMERICAN PLAICE	SUMMER FLDR	YELLOWTAIL FLDR	WINTER FLDR	WITCH FLDR	WINDOWPANE FLDR	ATLANTIC MACKEREL	BUTTERFISH	ACADIAN REDFISH	LONGHORN SCULPIN	OCEAN POUT	GOOSEFISH	AMERICAN LOBSTER	LONGFIN SQUID	TOTAL* OTHER	TOTAL ALL
313	0	0	0	0	34	0	4	0	2	5	5	0	0	0	6	0	0	0	101	0	0	11	0	0	34	202
314	0	0	0	0	25	12	4	0	1	10	5	0	0	0	10	0	0	0	718	0	0	43	2	0	22	852
315	109	0	0	2	4	0	6	27	44	2	0	0	0	0	0	0	0	0	0	0	0	32	0	0	10	236
316	96	0	0	0	10	0	0	0	40	2	4	0	0	0	0	0	0	0	1	0	0	12	0	0	1	166
317	113	0	0	0	6	0	0	0	25	6	6	0	0	0	0	0	0	0	0	0	0	6	0	0	3	165
318	239	0	0	1	5	0	0	41	11	6	1	0	0	0	0	0	0	0	0	0	0	5	0	0	1	310
319	0	0	0	44	2	82	0	0	0	0	0	0	1	15	0	0	0	0	0	0	28	28	0	0	102	302
320	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
321	0	0	0	0	0	4	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	5
322	0	4	0	0	0	15	0	0	0	0	0	0	0	26	0	1	0	0	0	54	15	0	3	0	14	132
323	0	0	0	12	0	10	0	0	0	1	5	0	6	122	0	0	0	0	0	53	70	0	4	0	9	292
324	0	0	3	7	1	0	0	0	0	1	0	0	4	35	0	0	0	0	0	23	12	0	6	0	8	100
325	0	0	5	8	0	0	0	0	0	0	0	0	0	9	0	1	0	0	0	4	0	0	4	0	2	33
326	0	0	30	3	0	0	0	0	0	0	0	0	2	2	0	0	0	0	0	2	0	0	8	0	3	50
327	162	1	0	0	2	99	68	0	0	4	7	0	0	2	0	0	0	0	2	4	2	0	9	0	27	389
328	205	0	0	0	2	494	274	0	0	3	3	0	0	3	0	0	0	0	0	11	5	0	5	0	24	1029
329	0	0	0	5	0	15	0	0	0	1	11	0	6	3	0	0	0	0	0	1	1	0	10	0	7	60
330	0	0	0	22	0	17	0	0	0	0	0	0	1	18	0	0	0	0	0	2	0	0	3	0	5	68
331	0	0	0	8	0	11	0	0	0	0	0	0	1	15	0	0	0	0	0	11	0	0	4	0	8	58
332	0	0	8	0	0	0	0	0	0	0	0	0	0	4	0	0	0	0	0	36	0	0	2	0	1	51
TOTAL	56654	2673	7271	2109	681	4159	4558	308	910	285	388	613	836	898	223	365	2422	424	3703	1628	1016	858	916	645	38591	133134

* "Total other" in southern areas are comprised primarily of Smooth Dogfish, Northern Searobin and Croaker

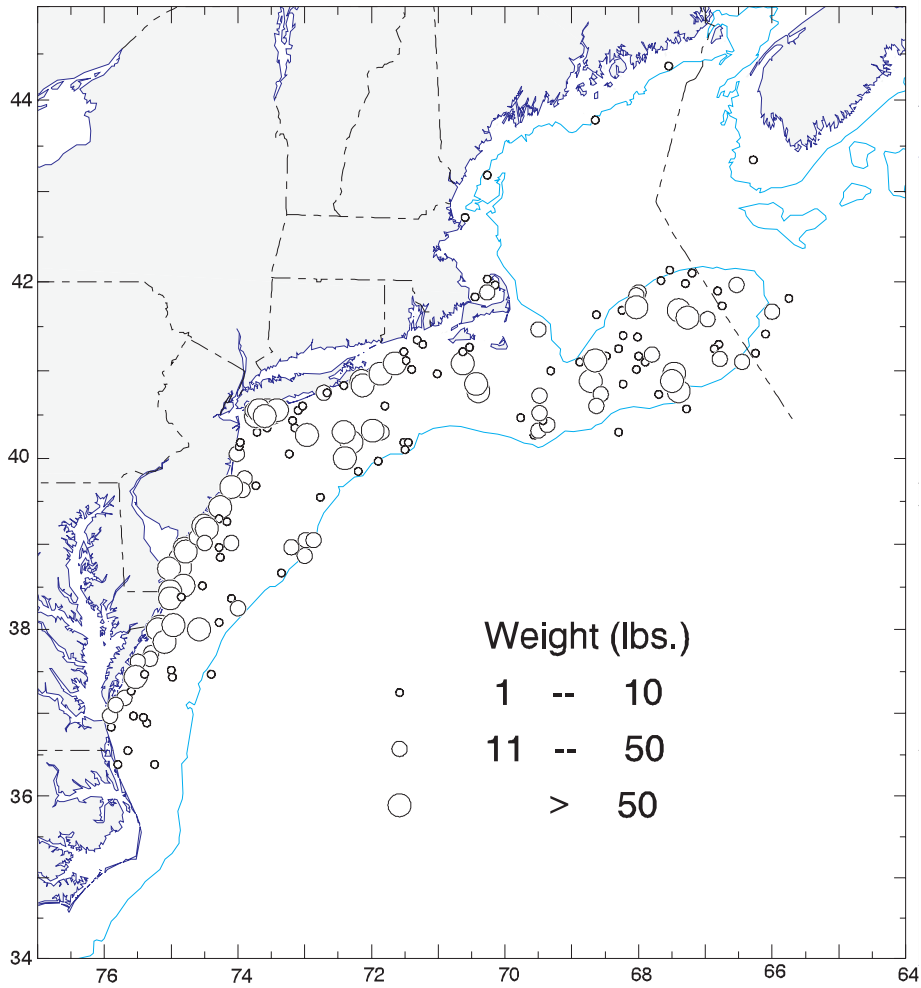
SPINY DOGFISH
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



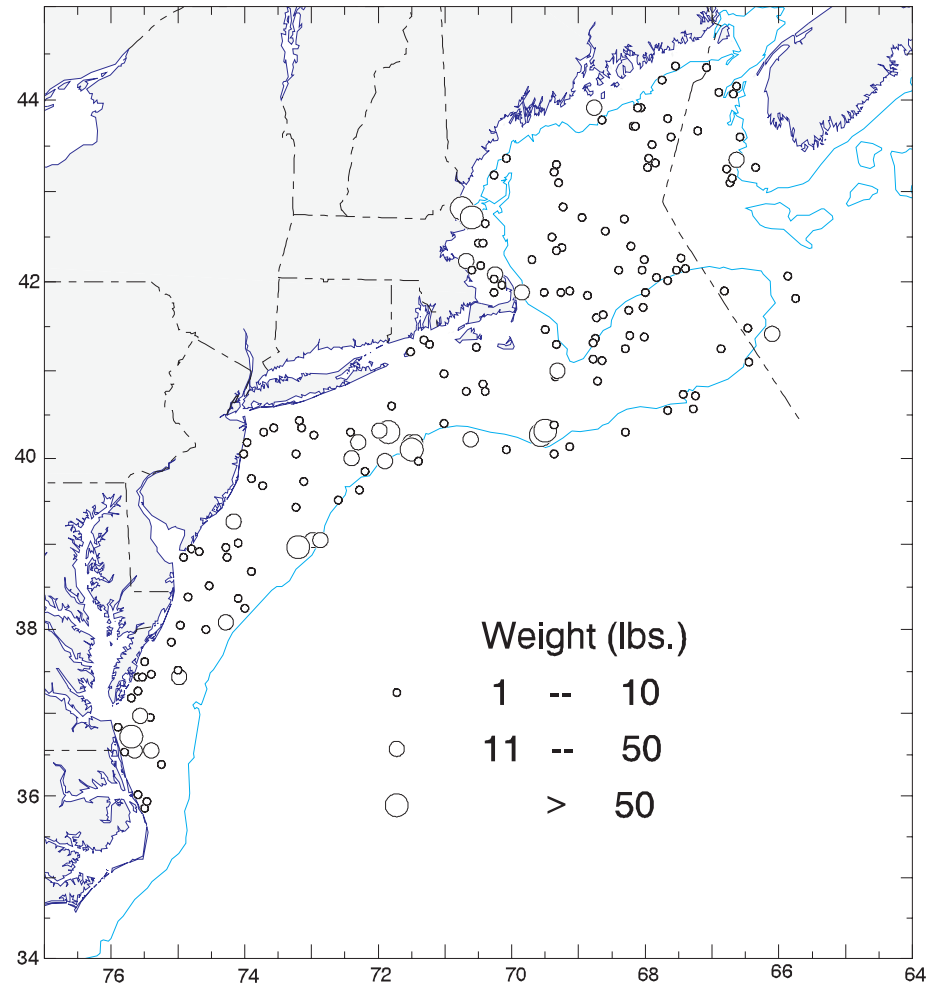
WINTER SKATE
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



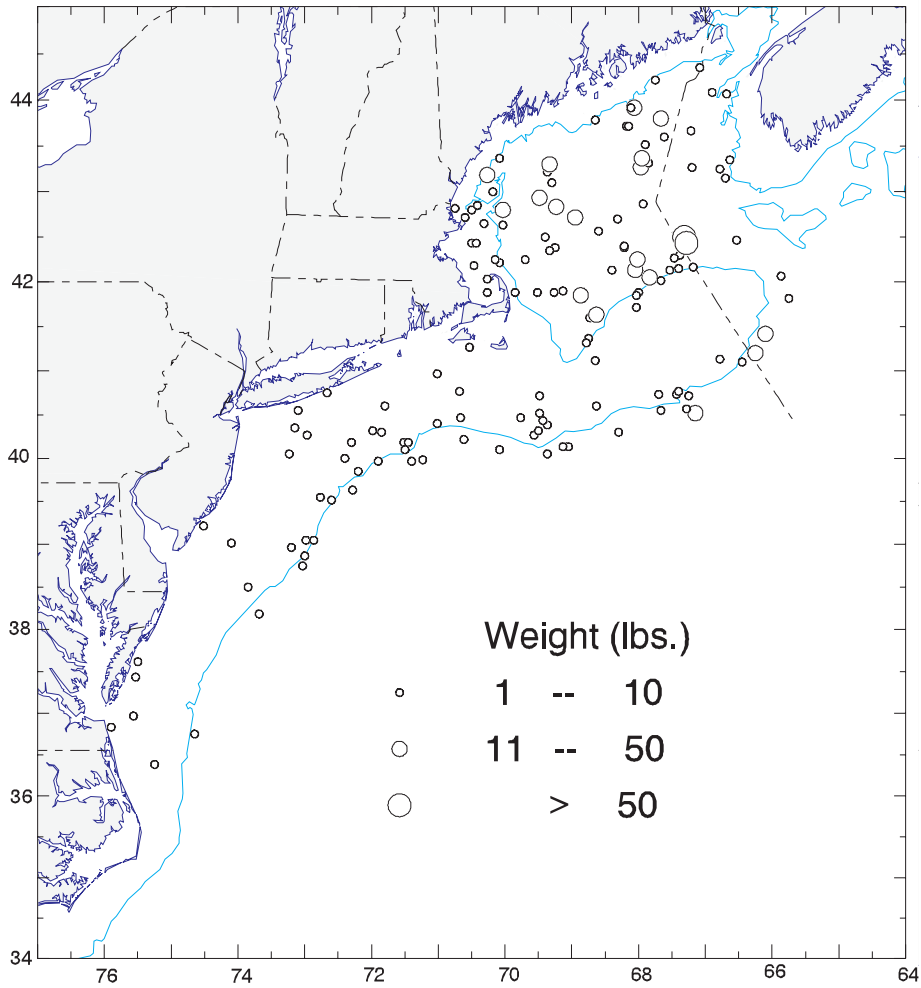
LITTLE SKATE
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



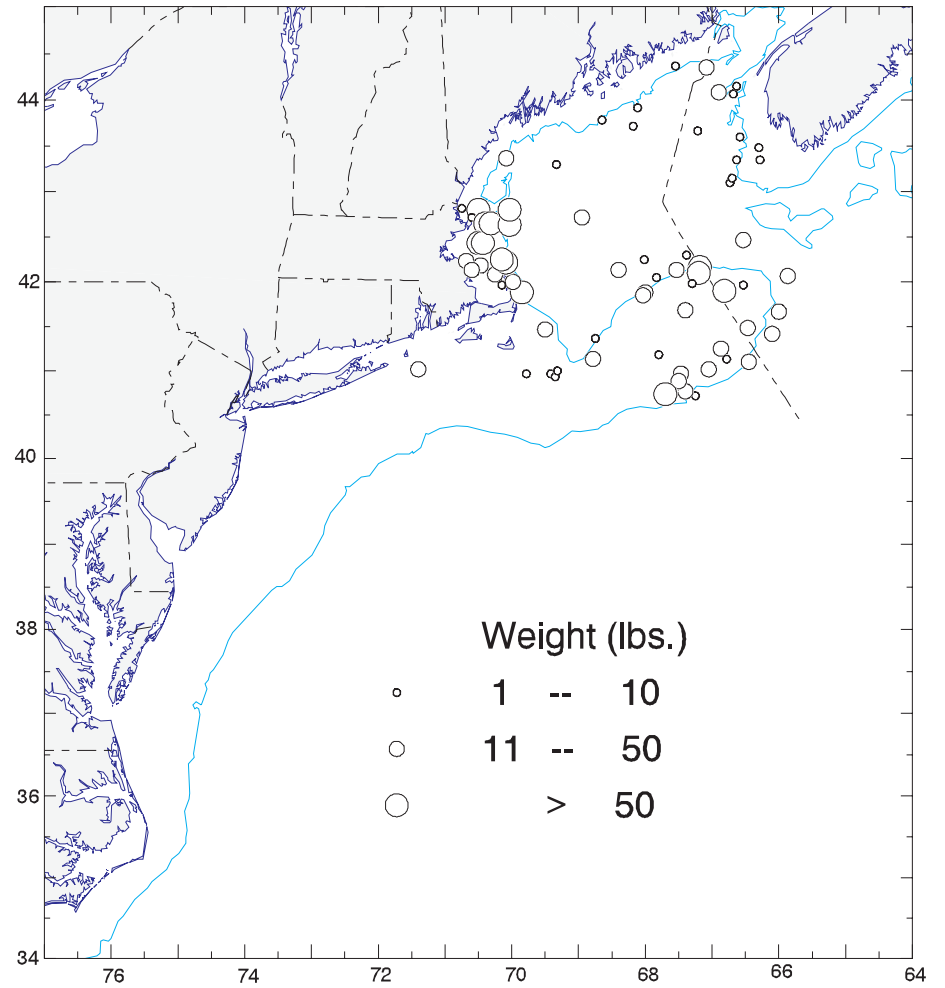
ATLANTIC HERRING
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



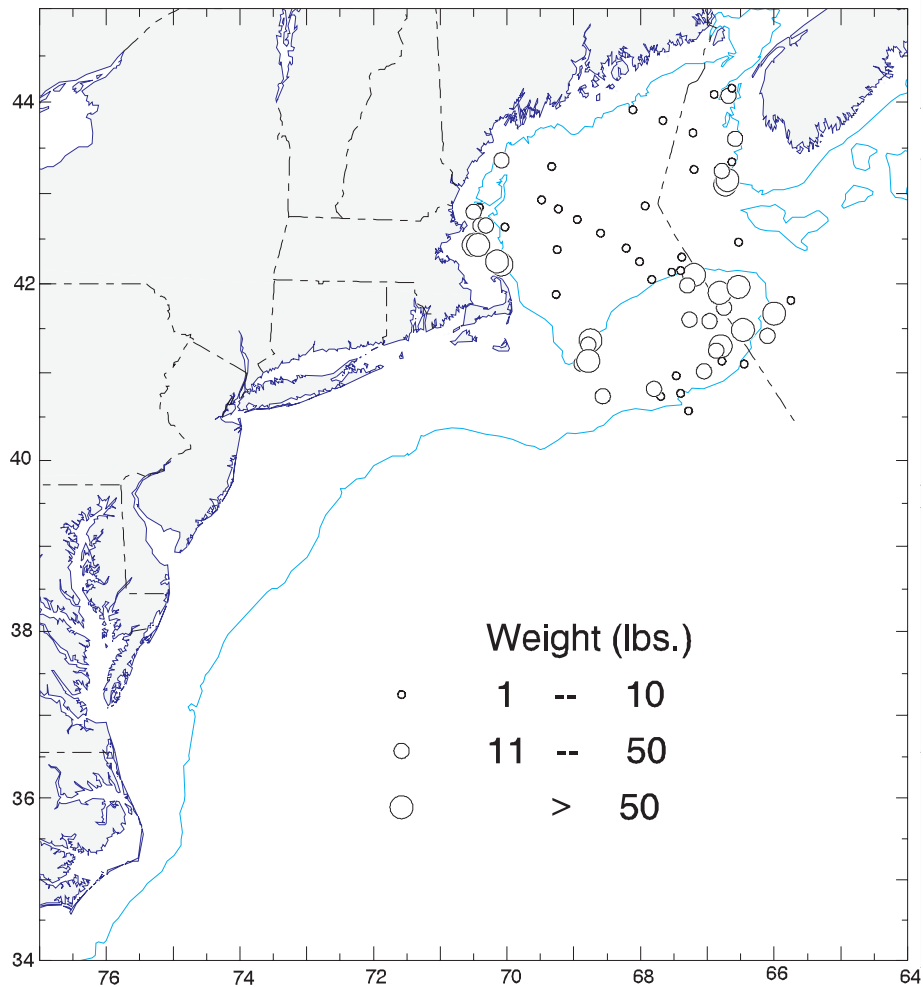
SILVER HAKE
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



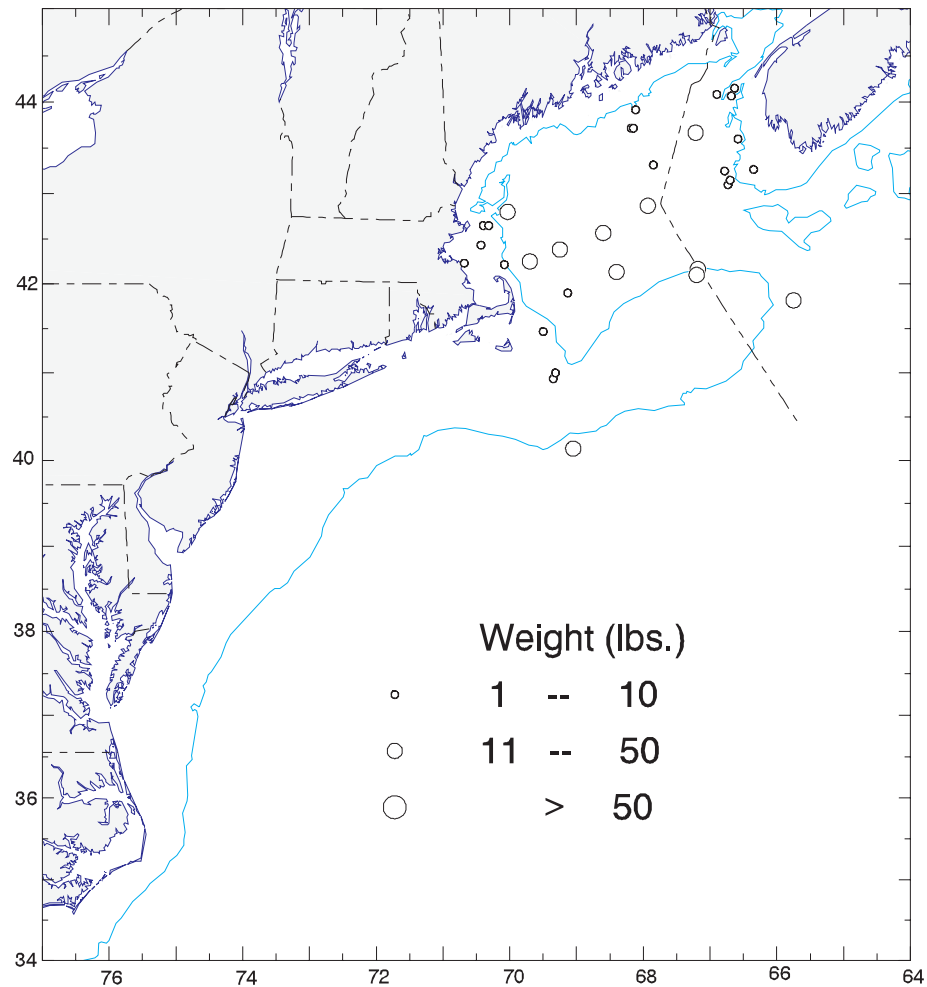
ATLANTIC COD
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



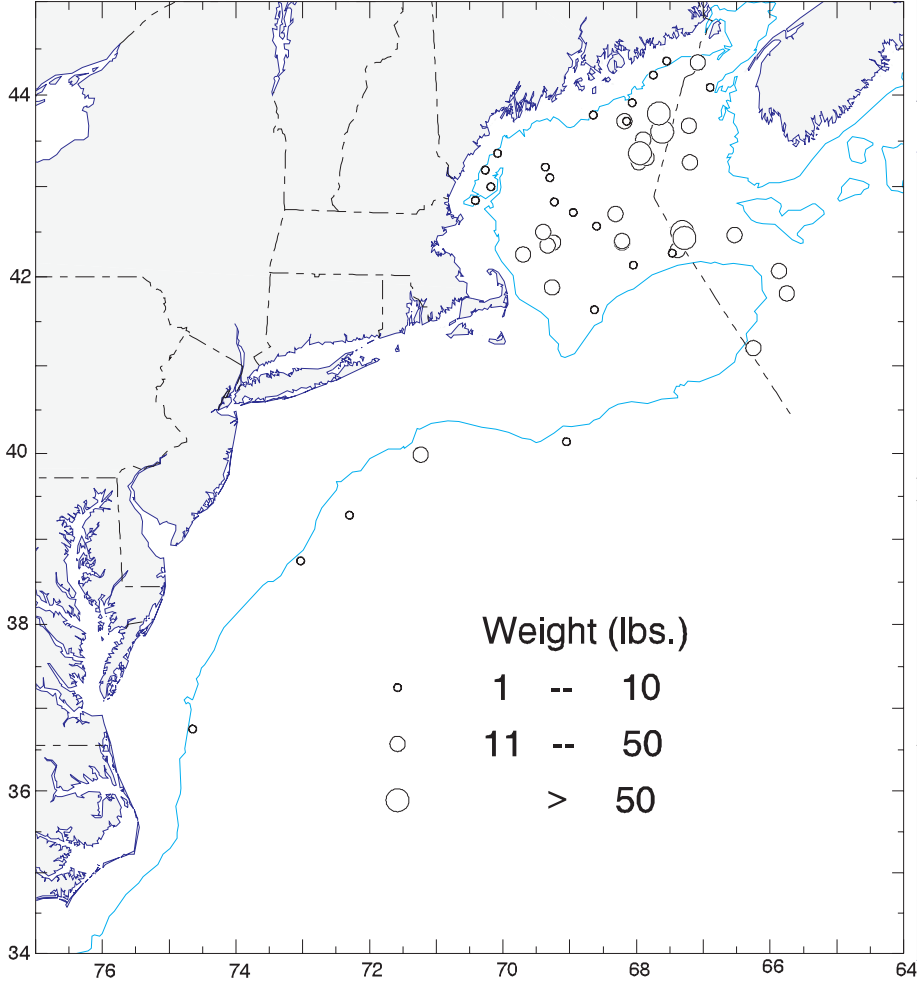
HADDOCK
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



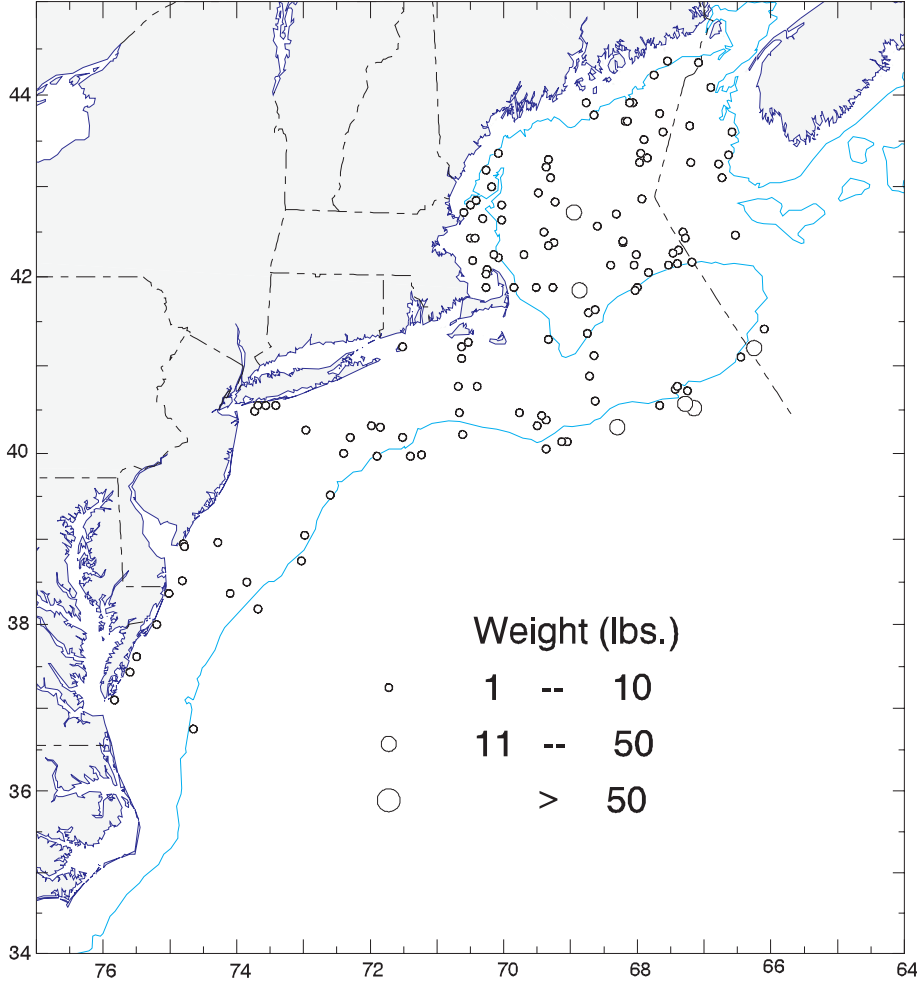
POLLOCK
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



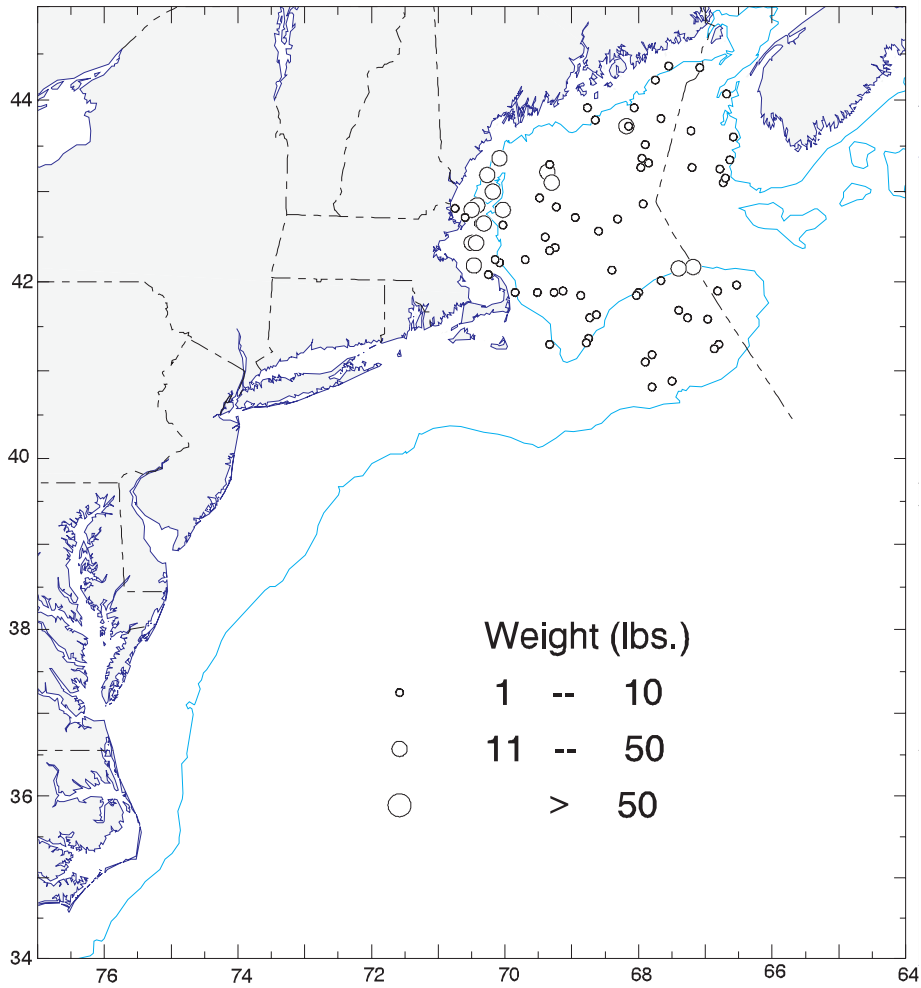
WHITE HAKE
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



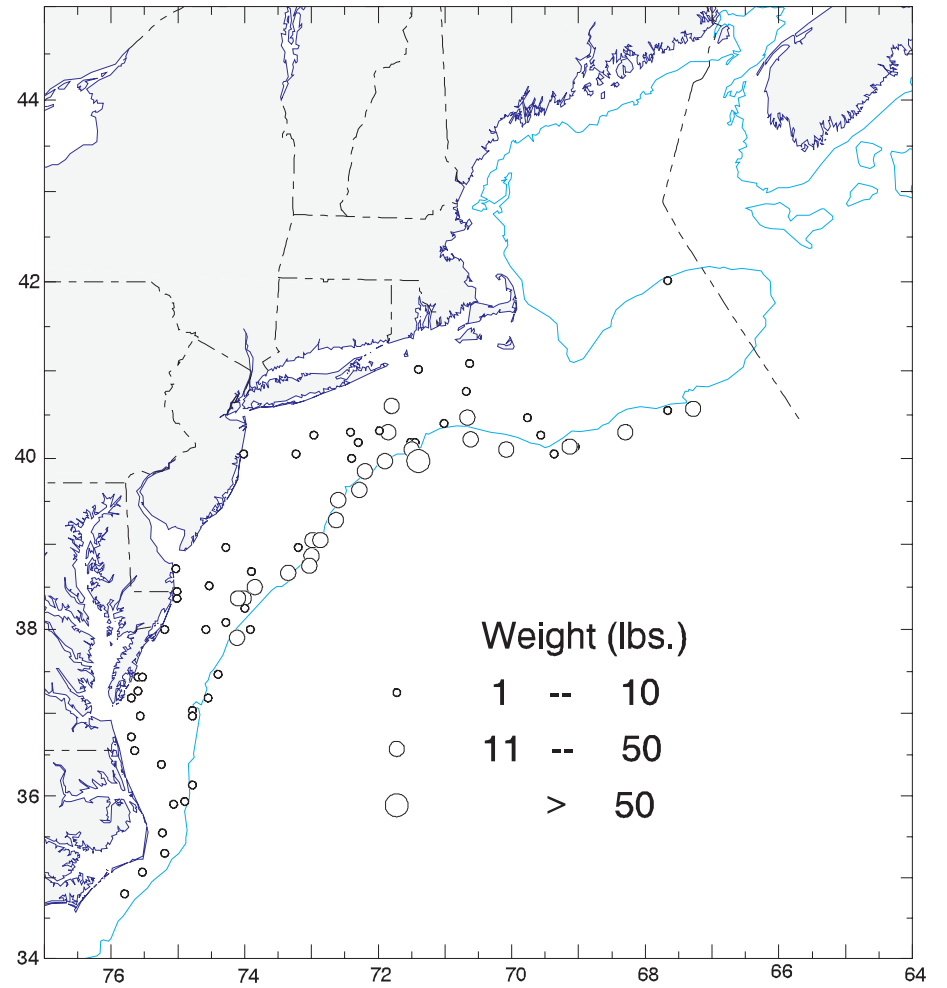
RED HAKE
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



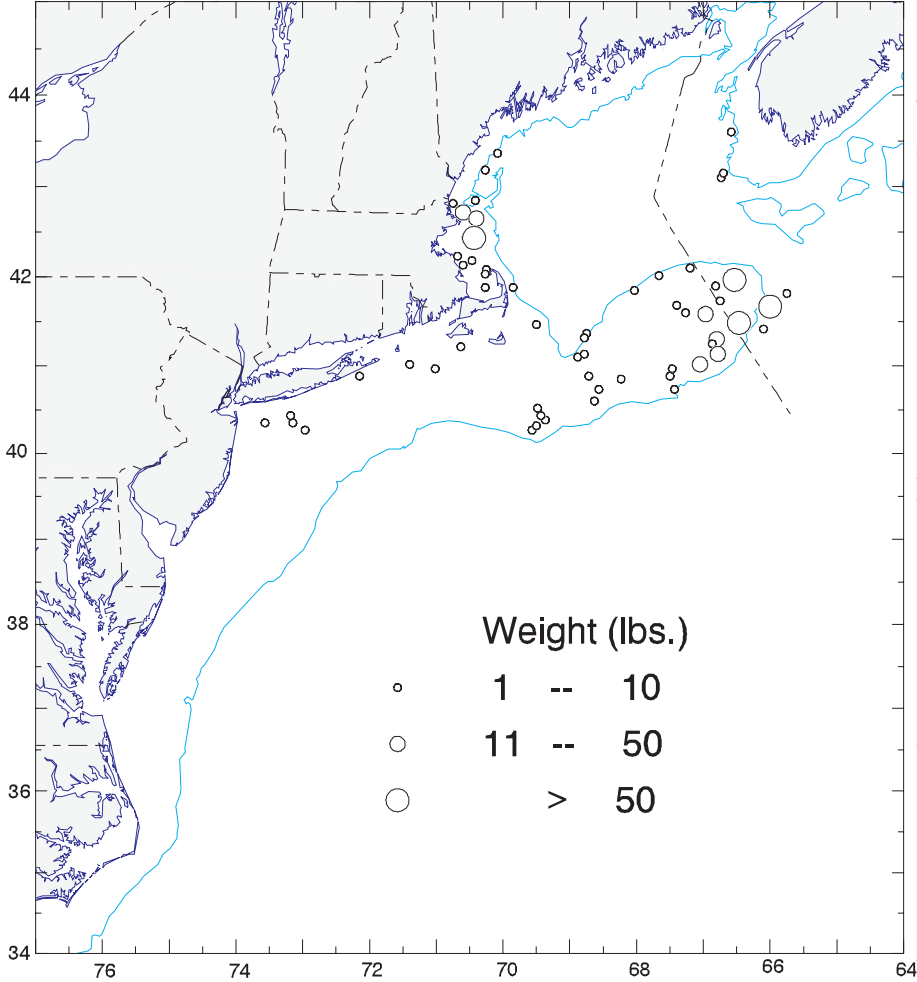
AMERICAN PLAICE
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



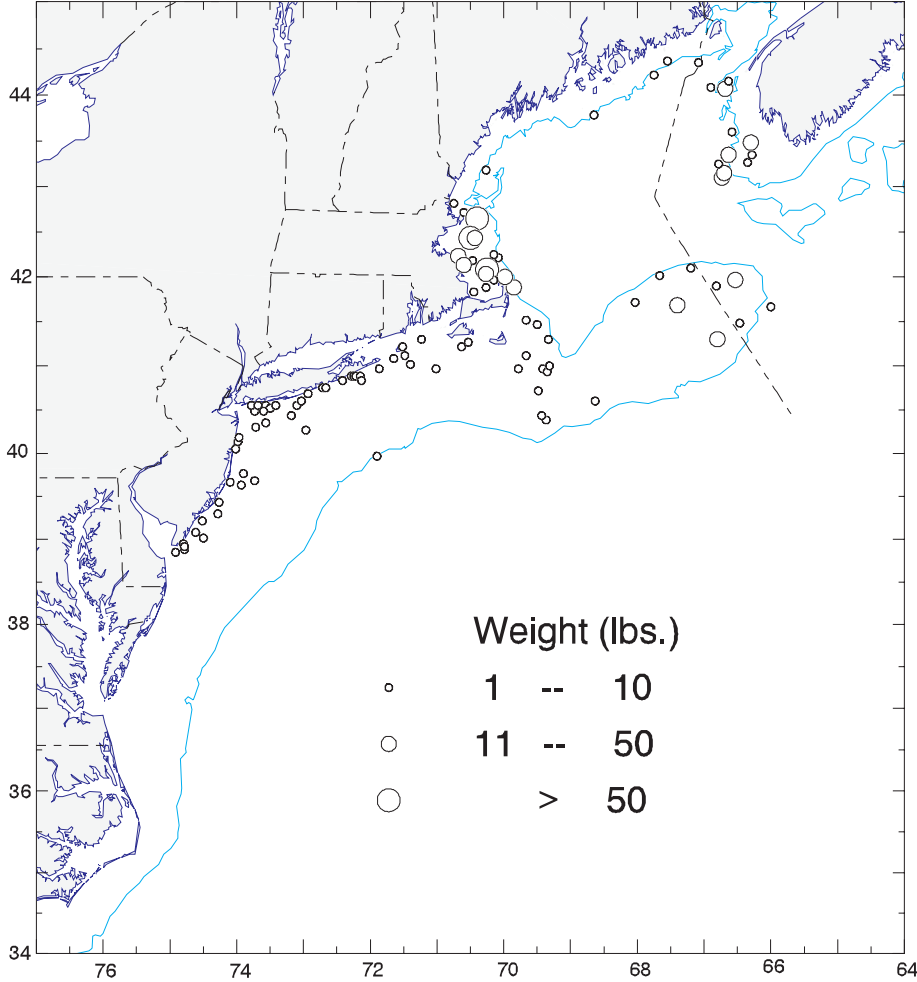
SUMMER FLOUNDER
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



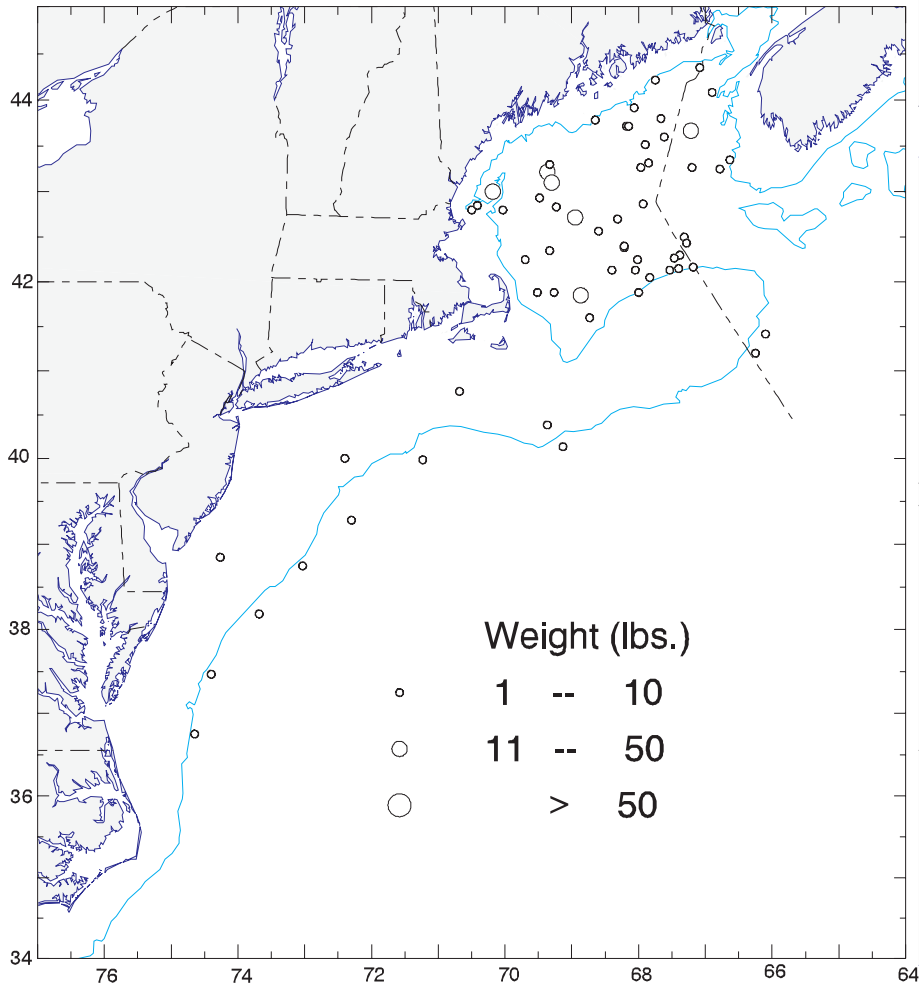
YELLOWTAIL FLOUNDER
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



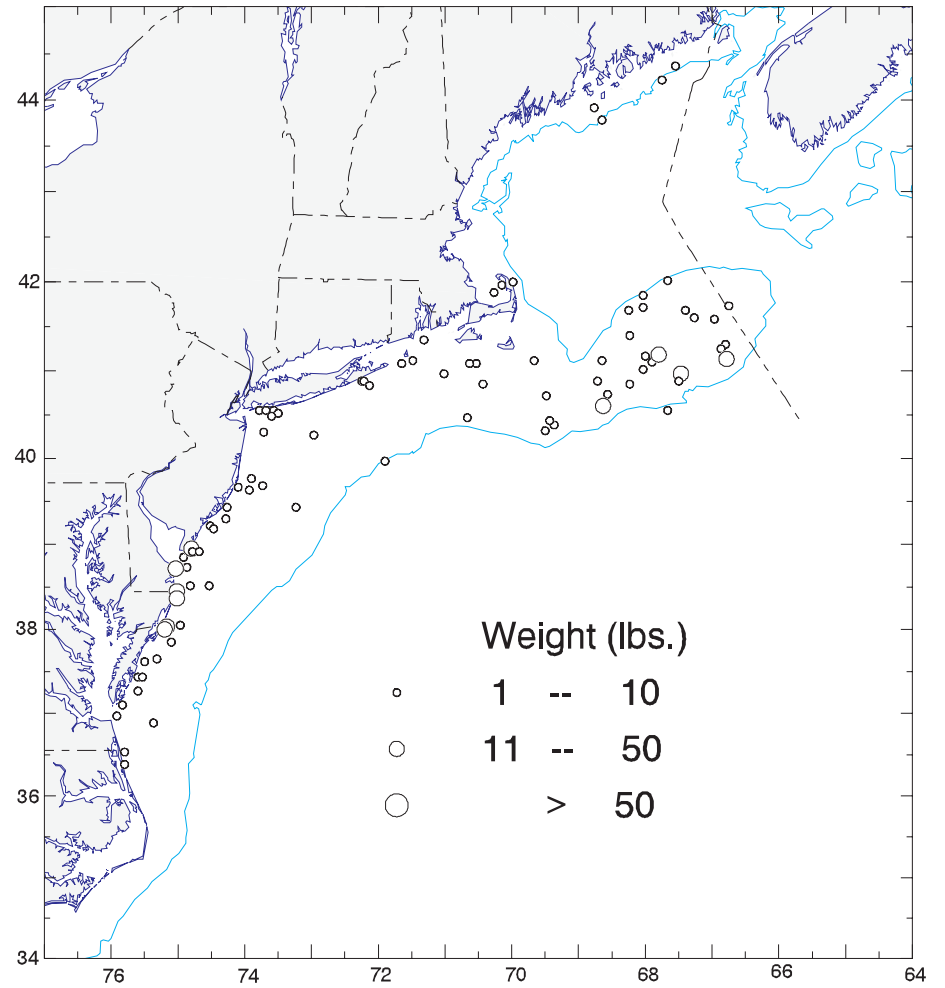
WINTER FLOUNDER
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



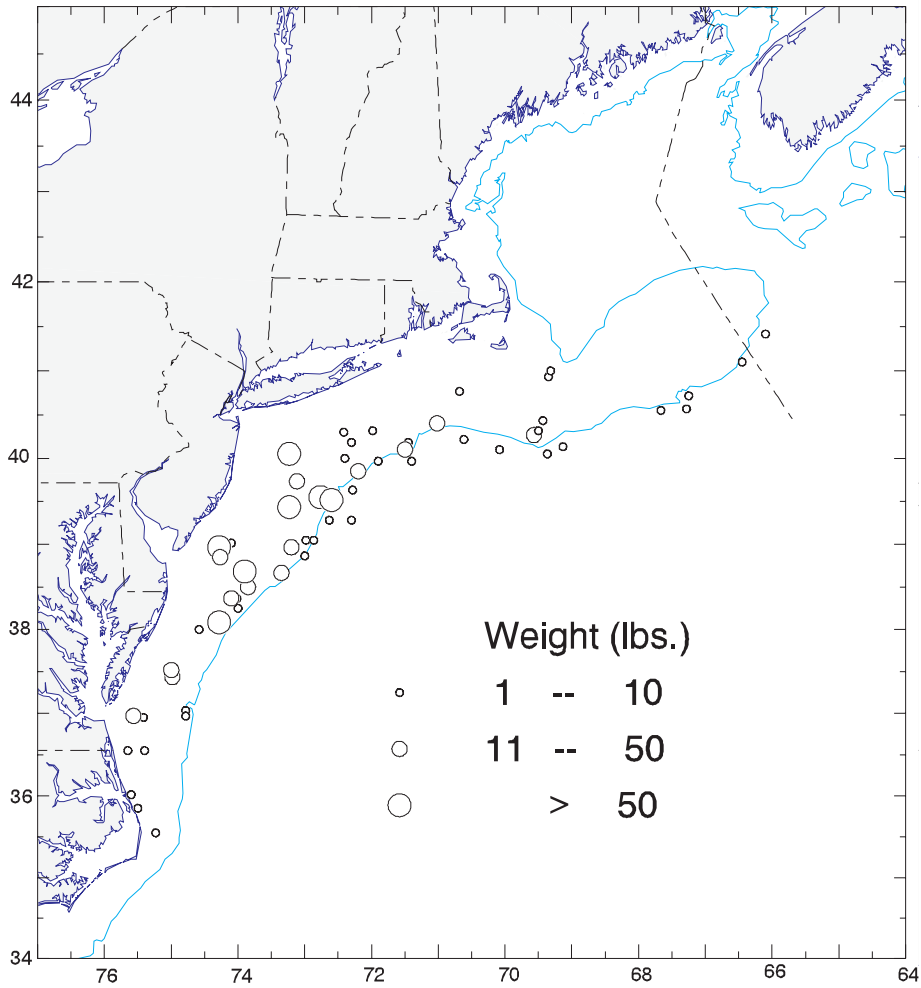
WITCH FLOUNDER
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



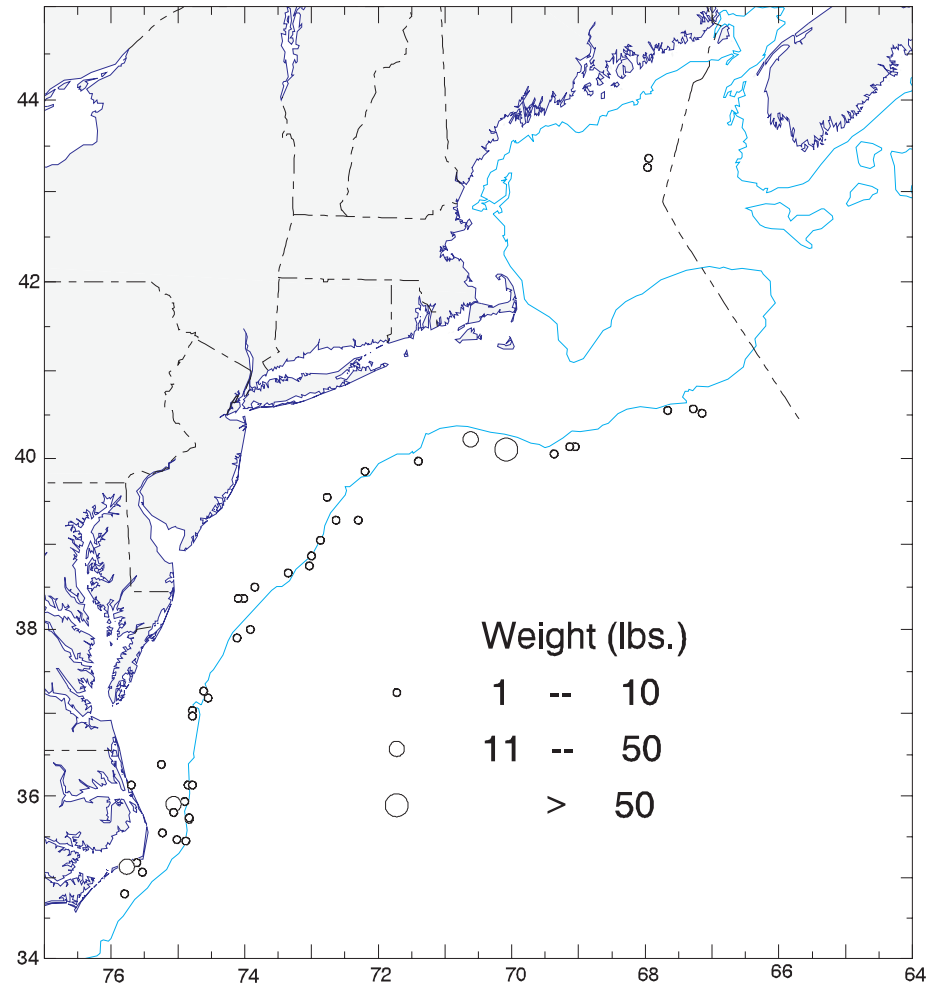
WINDOWPANE FLOUNDER
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



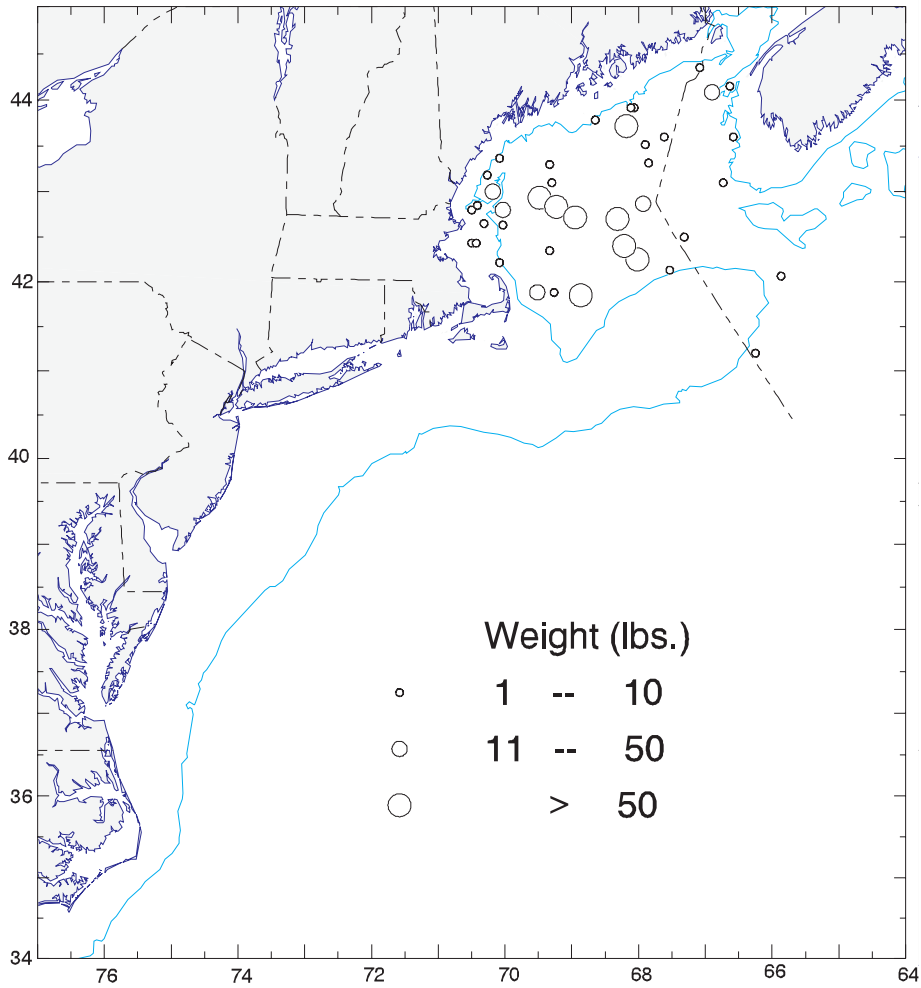
ATLANTIC MACKEREL
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



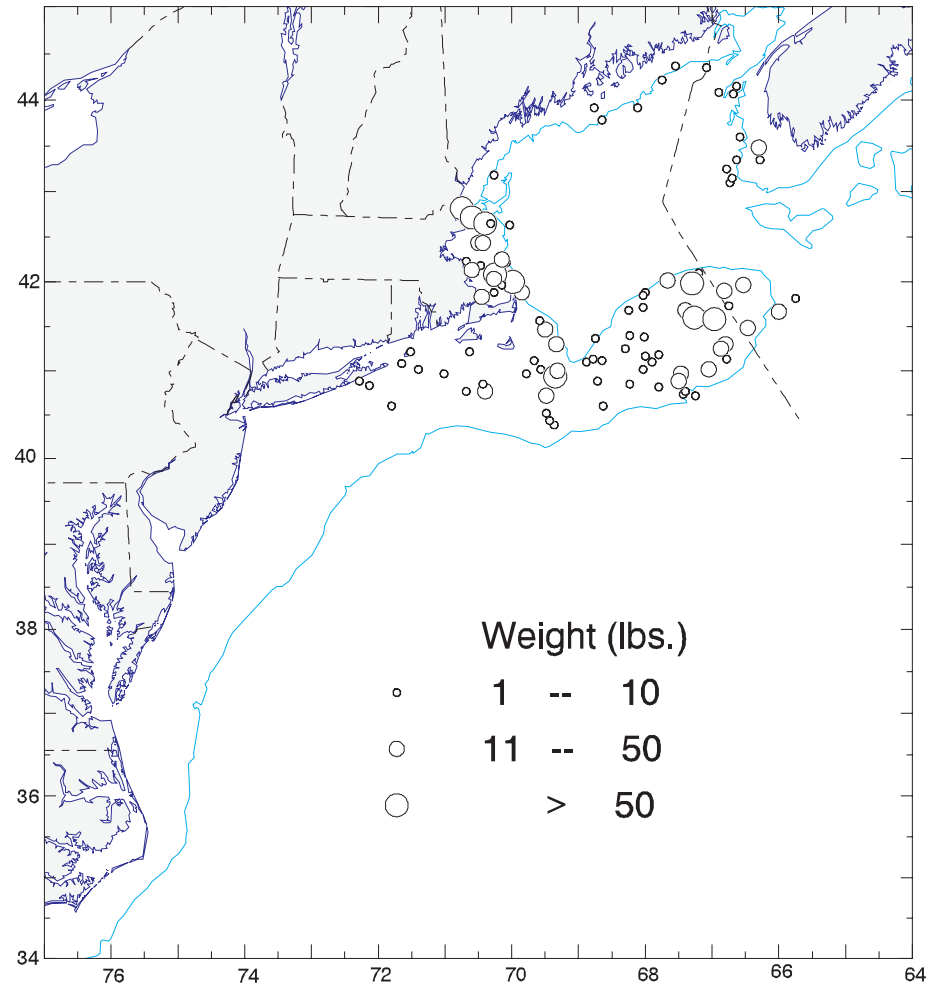
BUTTERFISH
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



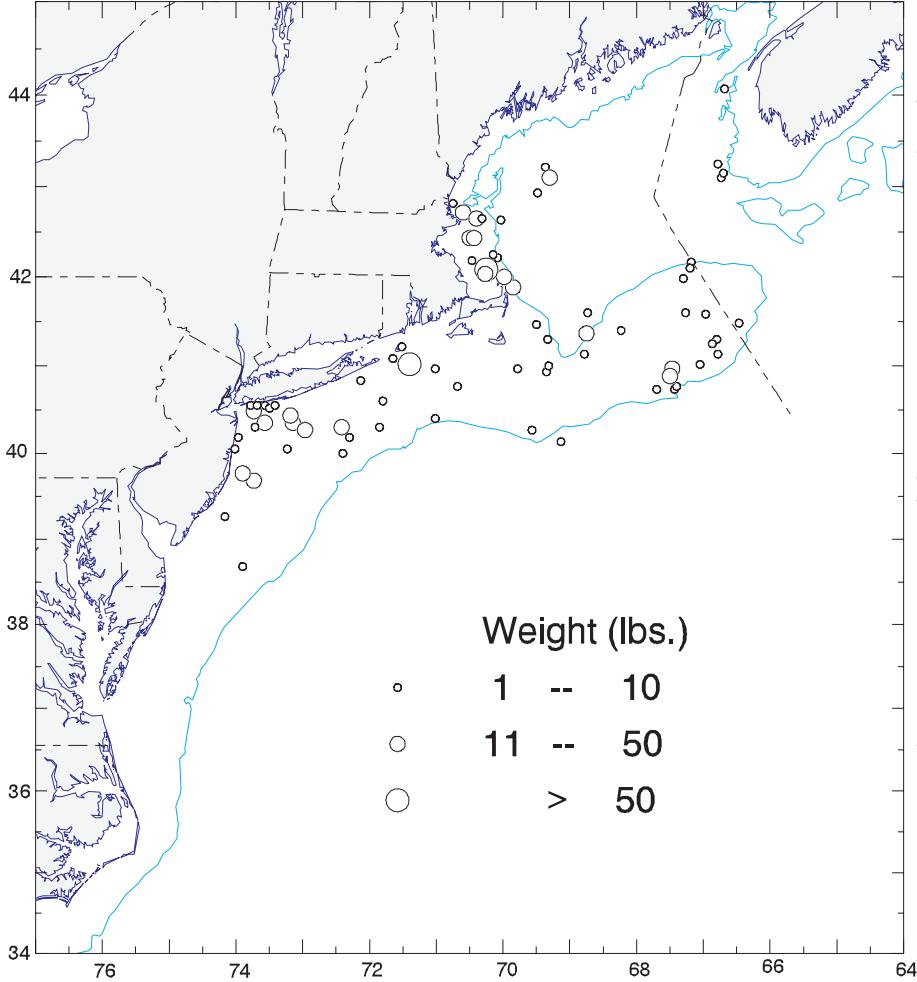
ACADIAN REDFISH
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



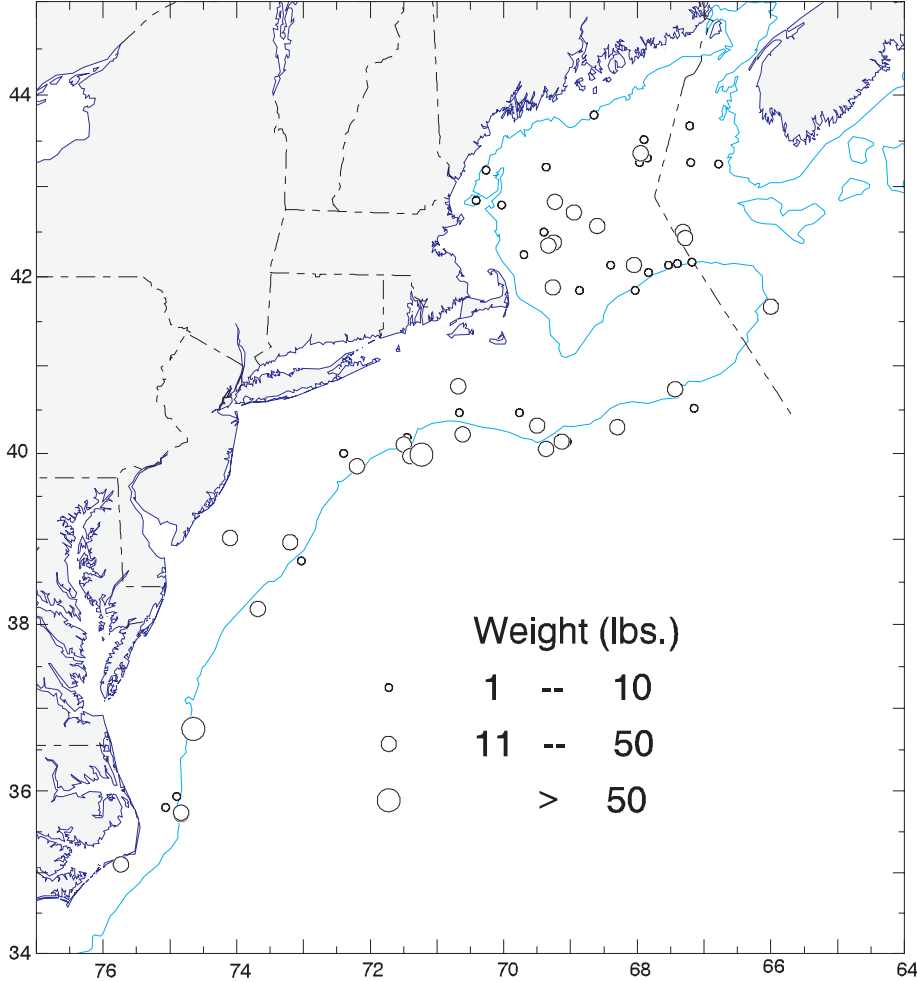
LONGHORN SCULPIN
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



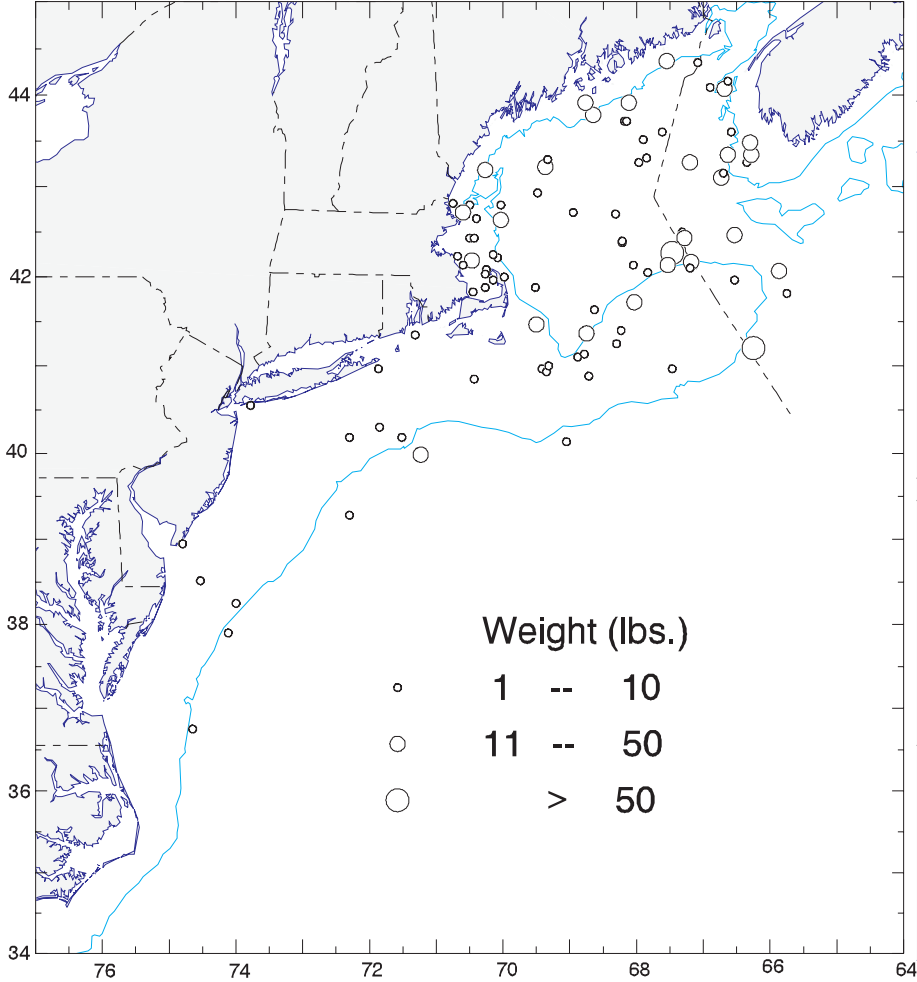
OCEAN POUT
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



GOOSEFISH
NEFSC Bottom Trawl Survey
MAR 05 - APR 27, 2003



AMERICAN LOBSTER
 NEFSC Bottom Trawl Survey
 MAR 05 - APR 27, 2003



LONGFIN SQUID
 NEFSC Bottom Trawl Survey
 MAR 05 - APR 27, 2003

