

RESOURCE SURVEY REPORT
Catch Summary
NOAA Fisheries Service
Northeast Fisheries Science Center
Autumn Bottom Trawl Survey
Cape Hatteras -Gulf of Maine
1 September – 5 November 2015

Submitted to: NOAA, NEFSC

For further information contact Robert Johnston (508-495-2061),
NOAA Fisheries Service, Northeast Fisheries Science Center, 166 Water
Street, Woods Hole, MA 02543.

Date: 2015

Resource Survey Report

Bottom Trawl Survey



Cape Hatteras – Gulf of Maine

1 September – 5 November 2015

NOAA FSV *Henry B. Bigelow* (FSV 225)

NOAA Fisheries Service
Northeast Fisheries Science Center
Woods Hole, MA 02543



A large catch is dumped into the checker of the
NOAA FSV *Henry B. Bigelow* (FSV 225)



Scientist sort through a catch in
the *Bigelow's* fish lab



Silver hake (*Merluccius bilinearis*) caught in
the Gulf of Maine

Significant Changes to the NEFSC Bottom Trawl Survey

Many significant changes in survey methodology were implemented, beginning with the 2009 Spring Multispecies Bottom Trawl Survey, that have significant implications for the use of these data. Prior to 2009, multispecies bottom trawl surveys were conducted primarily on the NOAA FSV *Albatross IV* and occasionally on the NOAA FSV *Delaware II*. The 2009 survey was conducted using the NOAA FSV *Henry B. Bigelow*, which is equipped with an autotrawl system that balances warp tensions throughout the duration of survey tows.

The bottom trawl system used for sampling has also been changed. Prior to 2009, the survey was conducted with a Yankee 36 bottom trawl and 450-kg euronet polyvalent trawl doors. Beginning in 2009, the survey is being conducted using a 400 x 12, 4-seam bottom trawl designed and extensively tested with the fishing industry, fishery management, and academic stakeholders in conjunction with the Northeast Fisheries Science Center scientists through the mid-Atlantic and New England Trawl Survey Advisory Panel. The net was extensively tested on the FSV *Delaware II* and the FSV *Henry B. Bigelow* prior to being adopted as the standard survey gear. The bottom trawl is fished with 550-kg, 2.2-m Poly-Ice oval trawl doors.

The survey tows speed was decreased from 3.8 knots prior to 2009 to 3.0 knots beginning in 2009. The new tows speed was selected after extensive scope and tows speed trials conducted on both the FSV *Delaware II* and the FSV *Henry B. Bigelow* and consideration of the range of species to be sampled. The tows duration was also changed from 30 minutes (timed from when the winches were locked until they were reengaged) to 20 minutes of actual bottom time (as determined by net monitoring systems). The adjustments to both tows speed and tows duration have resulted in a decrease of average tows distance from 1.9 nautical miles prior to 2009 to an average tows distance of 1.0 nautical miles beginning in 2009. The shorter tows distance allows us to conduct additional tows in areas that are constrained by fixed fishing gear, untrawlable bottom and steep contours along the edge of the continental shelf. While some commercial fishery stakeholders are likely to express concern about the reduction in tows duration, a preliminary analysis of the length frequency data from paired FSV *Albatross IV* and the FSV *Henry B. Bigelow* tows shows few differences in the largest sized fish of each species caught by the vessels.

Station allocation also changed significantly due to an increase in total available vessel time from 48 to 60 sea days and a reduction in inshore sampling by the FSV *Henry B. Bigelow*. At the time that inshore strata in the mid-Atlantic were historically sampled (September to early October), survey results indicate low densities of commercially and recreational species. These areas will continue to be sampled by the Northeast Area Monitoring and Assessment Program (NEAMAP) bottom trawl survey, although later in the year (late September through early October). As a result of station reallocation, station density was increased significantly in offshore strata that have historically

demonstrated higher densities of fish particularly in the mid-Atlantic and southern New England regions.

The Northeast Fisheries Science Center conducted an extensive comparison of the catchability of the FSV *Albatross IV* sampling with the Yankee 36 bottom trawl using historical protocols and the FSV *Henry B. Bigelow* sampling with the 400 x 12, 4-seam bottom trawl with revised protocols. The resulting dataset is one of the most comprehensive ever produced to study the catchability characteristics of a fisheries bottom trawl survey. A preliminary overall result is that the survey conducted by the FSV *Henry B. Bigelow* has significantly higher catch rates for nearly all species except those with very small total body size (e.g. anchovy species). The results of this study were peer reviewed in August 2009 and analytic approaches will be subsequently used to appropriately interpret pre-2009 survey results with 2009 and later results.

Given the changes in vessel, trawling gear, tow speed, tow duration, sample allocation and towing procedures, straight-forward comparisons of catches in this report with fall bottom trawl survey catches in previous Resource Survey Reports are not appropriate without employing statistical approaches that are reviewed and endorsed for stock assessment applications through peer review processes.

Russell Brown, Former Chief
Ecosystems Survey Branch

RESOURCE SURVEY REPORT

Catch Summary

NOAA Fisheries Service
Northeast Fisheries Science Center

Autumn Bottom Trawl Survey
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Attached are station and catch summaries and a series of geographical plots of commercially and recreationally important species caught during the Northeast Fisheries Science Center's (NEFSC) 2015 autumn bottom trawl survey aboard the NOAA FSV *Henry B. Bigelow*. Details regarding standard operating procedures at each tow location can be found in the NEFSC reference document 14-06: [NEFSC Bottom Trawl Survey Protocols for the NOAA Ship Henry B. Bigelow](#).

Because of the 20-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).

The data are now summarized from audited catch files generated from the Fisheries Scientific Computer System (FSCS).

For further information contact Robert Johnston (508-495-2061), NOAA Fisheries Service, Northeast Fisheries Science Center, 166 Water Street, Woods Hole, MA 02543. To view this report, go to the Ecosystems Surveys Branch website at:

<http://www.nefsc.noaa.gov/esb>

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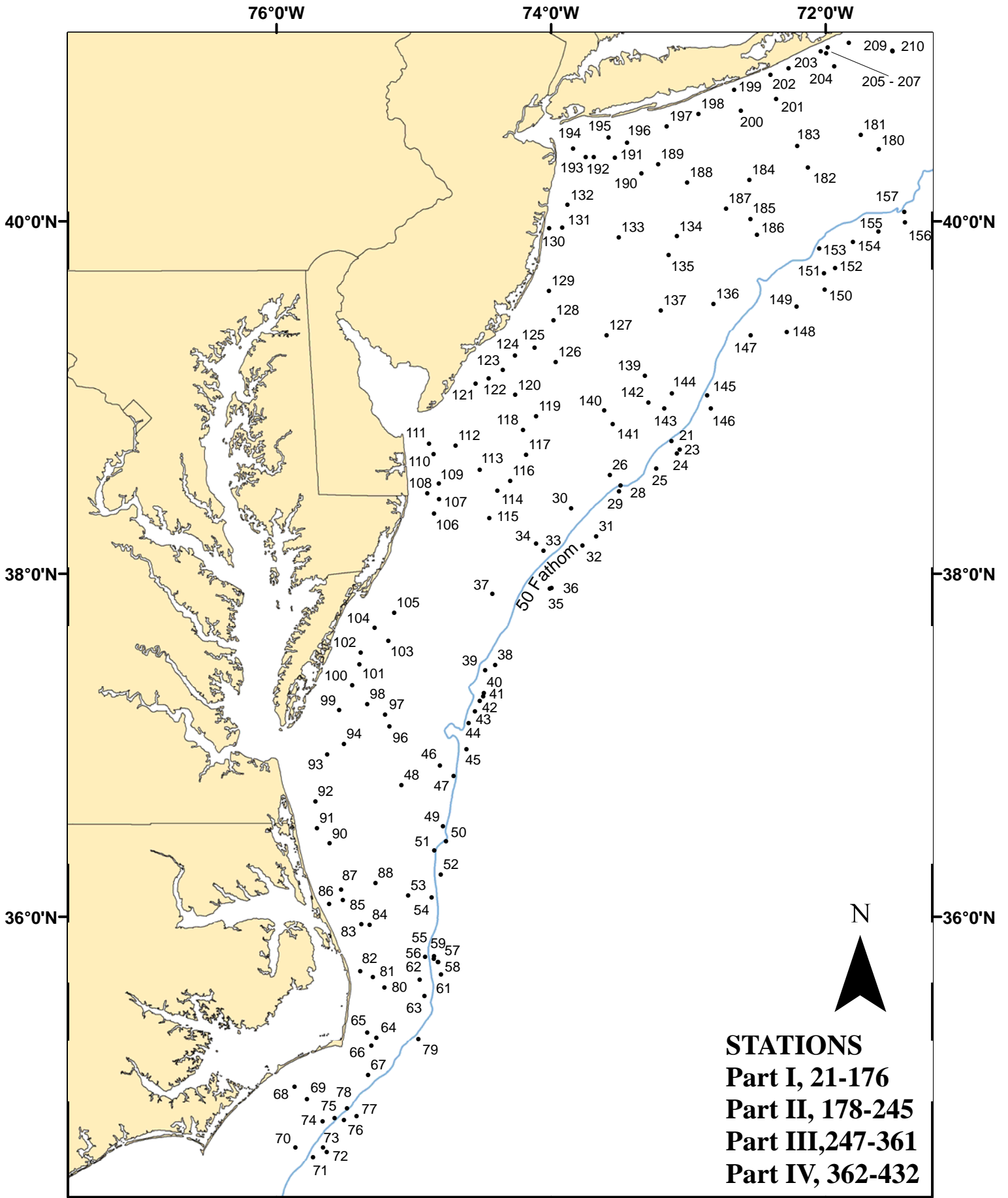


Figure 1. Trawl hauls made from NOAA FSV *Henry B. Bigelow*, during NOAA Fisheries Service, Northeast Fisheries Center's autumn bottom trawl survey, 1 September - 5 November 2015

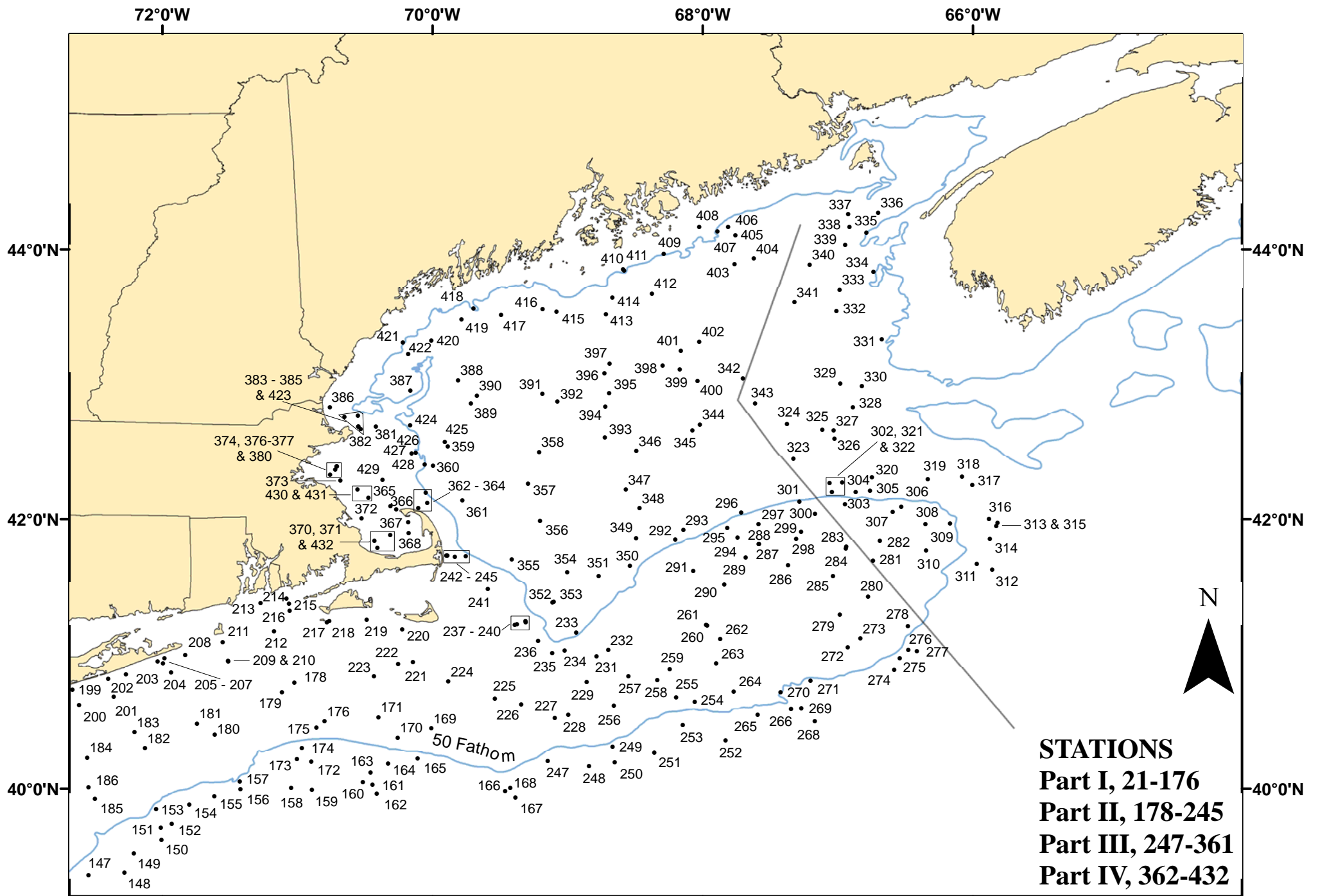


Figure 2. Trawl hauls made from NOAA FSV *Henry B. Bigelow*, during NOAA Fisheries Service, Northeast Fisheries Center's spring bottom trawl survey, 1 September - 5 November 2015

NOAA Fisheries Service AUTUMN BOTTOM TRAWL SURVEY
2015 STATION INFORMATION

Station*	Date	Time	Lat	Lon	Loran		Course	Bottom	Temp (F)
					TD's	(FM)		Depth	
0021	Sep-02	0451	3845.5	7307.4	X26458.1	Y42675.2	216	64.0	56.8
0023	Sep-02	0730	3842.7	7303.7	X26434.6	Y42650.0	216	123.0	51.5
0024	Sep-02	0945	3841.3	7305.0	X26441.1	Y42635.5	219	131.0	51.3
0025	Sep-02	1150	3836.2	7314.0	X26491.5	Y42580.5	190	82.0	
0026	Sep-02	1429	3834.0	7334.2	X26608.1	Y42545.8	214	37.7	47.8
0028	Sep-02	1618	3830.4	7329.6	X26578.1	Y42513.2	215	68.6	
0029	Sep-02	1817	3828.3	7330.3	X26580.3	Y42491.8	169	183.5	
0030	Sep-02	2224	3822.6	7351.2	X26693.2	Y42417.0	226	39.6	51.2
0031	Sep-03	0106	3813.0	7340.2	X26622.1	Y42327.8	214	173.3	46.9
0032	Sep-03	0247	3809.7	7346.2	X26652.1	Y42288.8	219	68.1	54.9
0033	Sep-03	0512	3808.1	7403.3	X26742.4	Y42253.8	012	41.8	53.8
0034	Sep-03	0649	3810.4	7406.5	X26762.4	Y42274.9	223	40.5	48.1
0035	Sep-03	0926	3755.0	7400.5	X26712.9	Y42120.6	220	99.8	53.0
0036	Sep-03	1056	3755.0	7359.7	X26708.9	Y42122.2	043	113.7	52.9
0037	Sep-03	1412	3753.1	7425.7	X26840.0	Y42068.6	224	33.6	44.0
0038	Sep-03	1726	3728.5	7424.4	X26802.6	Y41809.4	204	70.0	
0039	Sep-03	2013	3726.7	7428.8	X26821.2	Y41783.1	336	167.3	49.7
0040	Sep-03	2343	3718.6	7429.3	X26814.3	Y41697.5	186	128.5	52.7
0041	Sep-04	0101	3717.6	7429.6	X26814.4	Y41686.2	011	118.7	52.7
0042	Sep-04	0229	3715.9	7431.1	X26819.4	Y41666.0	192	86.9	54.4
0043	Sep-04	0353	3712.3	7433.3	X26825.1	Y41623.7	194	70.3	54.0
0044	Sep-04	0519	3708.2	7436.0	X26832.8	Y41575.6	196	55.8	54.4
0045	Sep-04	0826	3659.1	7437.0	X26826.7	Y41478.8	353	171.7	
0046	Sep-04	1041	3653.3	7448.6	X26871.1	Y41393.5	189	30.6	48.6
0047	Sep-04	1223	3649.7	7442.5	X26840.7	Y41369.1	190	49.2	55.3
0048	Sep-04	1514	3646.5	7505.4	X26934.9	Y41284.6	176	16.7	54.6
0049	Sep-04	1816	3631.9	7447.2	X26840.8	Y41174.5	199	45.9	54.0
0050	Sep-04	1950	3626.7	7445.9	X26829.9	Y41125.6	193	162.1	
0051	Sep-04	2128	3623.5	7451.0	X26847.8	Y41080.0	204	38.5	54.2
0052	Sep-04	2319	3615.0	7448.2	X26827.5	Y41001.9	192	61.2	56.8
0053	Sep-05	0136	3607.6	7502.5	X26876.8	Y40888.3	220	22.4	64.1
0054	Sep-05	0337	3606.9	7452.2	X26835.7	Y40909.8	195	47.0	58.0
0055	Sep-05	0654	3545.9	7451.2	X26811.9	Y40710.5	349	84.5	
0056	Sep-05	0812	3545.7	7455.1	X26826.5	Y40696.3	165	37.7	65.3
0057	Sep-05	0935	3545.0	7451.2	X26811.1	Y40702.4	152	62.9	57.6
0058	Sep-05	1053	3544.0	7449.4	X26803.3	Y40698.1	349	150.4	
0059	Sep-05	1245	3544.0	7449.3	X26803.1	Y40698.2	344	154.2	
0061	Sep-05	1650	3539.5	7448.1	X26794.7	Y40660.4	133	115.1	53.2
0062	Sep-05	1840	3537.8	7457.4	X26828.0	Y40614.1	201	27.9	62.5
0063	Sep-05	2008	3531.8	7455.3	X26815.1	Y40565.9	204	25.4	64.9
0064	Sep-05	2309	3517.0	7516.3	X26877.7	Y40357.0	183	15.0	80.4
0065	Sep-06	0028	3518.8	7520.3	X26893.6	Y40359.4	292	14.2	78.3
0066	Sep-06	0211	3514.1	7518.5	X26883.0	Y40322.4	197	14.5	80.9
0067	Sep-06	0438	3503.6	7519.9	X26878.0	Y40225.2	036	36.9	73.9
0068	Sep-06	0833	3459.3	7552.1	X26983.6	Y40059.0	124	13.1	82.2
0069	Sep-06	0956	3455.0	7546.7	X26960.8	Y40042.4	193	13.9	81.8
0070	Sep-06	1224	3437.5	7551.8	X26960.0	Y39874.2	055	25.4	74.5
0071	Sep-06	1425	3434.0	7543.9	X26931.1	Y39880.7	046	76.6	62.1
0072	Sep-06	1610	3436.0	7538.0	X26913.5	Y39922.5	039	164.3	50.5
0073	Sep-06	1748	3437.5	7539.6	X26920.4	Y39927.4	028	87.8	59.8
0074	Sep-06	1932	3446.9	7539.8	X26929.9	Y40002.2	043	26.2	75.6
0075	Sep-06	2049	3448.2	7534.6	X26913.7	Y40034.8	031	32.8	72.7
0076	Sep-06	2224	3447.4	7530.5	X26899.1	Y40046.1	033	85.3	60.7
0077	Sep-07	0046	3448.9	7525.0	X26881.9	Y40080.6	221	179.6	48.0

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					TD's	(FM)		Depth	
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0078	Sep-07	0224	3451.6	7529.2	X26898.7	Y40085.8	041	54.1	67.0
0079	Sep-07	0726	3516.5	7458.0	X26811.8	Y40420.3	219	135.3	53.1
0080	Sep-07	1037	3534.9	7512.8	X26882.4	Y40535.8	001	17.0	77.1
0081	Sep-07	1201	3538.6	7517.9	X26904.9	Y40554.0	307	14.5	78.4
0082	Sep-07	1313	3540.6	7523.3	X26927.2	Y40555.9	341	15.9	78.7
0083	Sep-07	1536	3557.4	7522.9	X26944.6	Y40725.0	005	15.6	77.1
0084	Sep-07	1702	3557.1	7519.3	X26930.5	Y40733.3	022	15.3	75.7
0085	Sep-07	1925	3605.9	7531.0	X26985.9	Y40790.1	235	15.3	77.8
0086	Sep-07	2038	3604.5	7537.0	X27006.8	Y40758.2	341	12.8	78.1
0087	Sep-07	2159	3609.6	7531.7	X26993.3	Y40827.1	030	14.8	77.9
0088	Sep-08	0024	3612.0	7516.7	X26938.0	Y40892.8	018	19.1	65.1
0090	Sep-08	0558	3626.0	7536.8	X27035.5	Y40989.7	323	14.5	77.9
0091	Sep-08	0725	3631.4	7542.3	X27065.2	Y41035.5	332	12.6	77.6
0092	Sep-08	0904	3640.7	7543.0	X27082.4	Y41137.8	007	11.8	76.6
0093	Sep-08	1224	3657.1	7537.9	X27087.8	Y41332.0	020	11.8	77.9
0094	Sep-08	1402	3700.9	7530.5	X27062.8	Y41389.1	308	14.2	75.9
0096	Sep-08	1745	3706.9	7510.6	X26986.3	Y41494.6	258	19.7	59.4
0097	Sep-08	1905	3711.0	7512.5	X27000.7	Y41536.6	319	15.0	61.9
0098	Sep-08	2041	3714.9	7520.3	X27041.5	Y41565.0	231	17.2	66.1
0099	Sep-08	2237	3712.8	7532.6	X27092.1	Y41519.8	024	12.3	77.5
0100	Sep-09	0020	3721.4	7526.9	X27081.9	Y41626.7	038	14.8	77.3
0101	Sep-09	0152	3728.7	7523.8	X27080.8	Y41713.8	019	12.0	69.4
0102	Sep-09	0313	3732.8	7523.2	X27085.8	Y41762.0	088	12.6	75.2
0103	Sep-09	0508	3736.7	7511.1	X27036.6	Y41824.7	354	16.7	68.0
0104	Sep-09	0650	3741.3	7517.0	X27072.7	Y41866.9	042	12.6	76.4
0105	Sep-09	0822	3746.5	7508.6	X27041.9	Y41937.4	047	13.4	67.8
0106	Sep-09	1323	3820.7	7451.2	X27018.6	Y42341.4	221	12.3	75.5
0107	Sep-09	1558	3825.8	7449.0	X27016.8	Y42400.1	348	13.7	60.5
0108	Sep-09	1727	3827.7	7454.1	X27048.2	Y42417.6	037	11.8	61.7
0109	Sep-09	1914	3831.1	7449.0	X27027.8	Y42459.3	339	15.6	58.7
0110	Sep-09	2121	3841.0	7451.3	X27061.5	Y42568.8	316	13.4	65.6
0111	Sep-09	2238	3844.7	7453.3	X27080.8	Y42608.6	072	9.0	67.9
0112	Sep-10	0011	3844.0	7441.7	X27014.0	Y42608.9	082	14.2	60.0
0113	Sep-10	0212	3835.7	7431.1	X26937.6	Y42524.5	210	19.1	49.9
0114	Sep-10	0413	3828.7	7423.5	X26882.4	Y42453.9	010	27.1	48.7
0115	Sep-10	0645	3819.3	7427.0	X26886.1	Y42349.0	010	20.8	49.6
0116	Sep-10	0853	3831.9	7417.9	X26856.3	Y42493.6	051	25.4	48.0
0117	Sep-10	1041	3840.9	7410.8	X26830.5	Y42594.5	038	25.2	48.7
0118	Sep-10	1225	3849.3	7412.2	X26852.7	Y42683.5	005	23.0	49.9
0119	Sep-10	1356	3854.0	7406.5	X26826.6	Y42736.9	041	23.0	48.9
0120	Sep-11	1044	3901.3	7415.6	X26895.0	Y42810.4	030	16.4	55.3
0121	Sep-11	1303	3905.1	7432.9	X27008.2	Y42846.5	052	11.5	66.3
0122	Sep-11	1558	3906.9	7427.2	X26977.3	Y42867.7	059	12.8	56.9
0123	Sep-11	1736	3909.9	7421.1	X26945.7	Y42901.5	068	12.8	63.6
0124	Sep-11	1900	3914.6	7415.8	X26922.7	Y42954.3	066	12.6	64.5
0125	Sep-11	2026	3917.3	7407.1	X26873.0	Y42984.1	036	14.5	59.3
0126	Sep-11	2212	3912.5	7358.0	X26805.1	Y42934.4	044	17.0	57.2
0127	Sep-12	0918	3921.6	7335.7	X26674.5	Y43029.9	012	23.8	52.0
0128	Sep-12	1155	3926.6	7358.9	X26837.2	Y43082.1	007	13.4	61.1
0129	Sep-12	1339	3936.6	7400.9	X26871.3	Y43187.1	020	12.6	61.2
0130	Sep-12	1649	3957.7	7400.8	X26918.3	Y43406.5	346	12.3	73.6
0131	Sep-12	1825	3957.9	7355.0	X26877.5	Y43405.8	036	13.4	61.7
0132	Sep-12	2006	4005.5	7352.8	X26879.1	Y43482.3	101	13.9	62.0
0133	Sep-12	2253	3954.6	7330.3	X26690.8	Y43358.9	107	22.4	52.3

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					TD's	(FM)		Depth	
0134	Sep-13	0145	3954.9	7305.0	X26504.9	Y43347.8	137	37.5	47.8
0135	Sep-13	0325	3948.7	7308.6	X26523.0	Y43290.6		27.3	47.8
0136	Sep-13	0639	3932.2	7249.0	X26367.7	Y43126.2	254	37.2	47.3
0137	Sep-13	0904	3929.9	7312.0	X26524.9	Y43109.1	223	22.1	50.2
0139	Sep-13	1204	3907.8	7319.0	X26547.9	Y42892.1	221	33.4	47.4
0140	Sep-13	1440	3856.0	7336.7	X26646.6	Y42768.7	241	27.6	50.2
0141	Sep-13	1652	3851.5	7333.0	X26618.9	Y42724.2	052	33.1	47.6
0142	Sep-13	1853	3858.7	7317.5	X26529.7	Y42802.3	043	37.7	51.8
0143	Sep-13	2030	3856.6	7310.5	X26484.3	Y42783.5	046	45.9	55.0
0144	Sep-13	2202	3901.9	7307.1	X26467.2	Y42835.5	045	41.6	52.2
0145	Sep-14	0014	3901.2	7251.7	X26369.5	Y42832.6	024	60.1	56.6
0146	Sep-14	0244	3856.7	7250.1	X26357.7	Y42789.9	058	177.2	
0147	Sep-14	0643	3921.6	7232.7	X26252.7	Y43024.4	045	71.9	55.8
0148	Sep-14	0902	3922.8	7216.9	X26147.6	Y43033.2	024	110.5	54.8
0149	Sep-14	1039	3931.4	7212.7	X26118.4	Y43109.2	027	83.9	55.1
0150	Sep-14	1330	3937.1	7200.4	X26033.3	Y43156.1	218	143.5	52.9
0151	Sep-14	1547	3942.5	7200.6	X26033.2	Y43203.4	206	89.4	56.2
0152	Sep-14	1745	3944.2	7155.8	X25998.8	Y43216.0	221	109.1	55.6
0153	Sep-14	1951	3950.9	7202.7	X26045.5	Y43277.0	357	55.8	56.1
0154	Sep-14	2201	3953.0	7148.0	X25939.9	Y43286.5	051	88.3	55.4
0155	Sep-15	0004	3956.6	7136.8	X25858.5	Y43310.6	277	65.6	55.9
0156	Sep-15	0231	3959.7	7125.3	X25774.4	Y43329.2	236	68.1	56.9
0157	Sep-15	0402	4003.1	7125.6	X25773.4	Y43356.3	064	52.8	57.8
0158	Sep-15	0821	4000.3	7102.8	X25621.6	Y43320.3	250	172.5	49.2
0159	Sep-15	1036	3959.6	7053.5	X25563.6	Y43309.1	086	171.4	49.1
0160	Sep-15	1330	4003.0	7031.0	X25421.9	Y43321.8	235	114.3	53.2
0161	Sep-15	1543	4001.7	7026.7	X25402.1	Y43309.6	162	139.4	52.4
0162	Sep-15	1821	3957.7	7024.8	X25402.7	Y43279.2	071	196.3	49.5
0163	Sep-15	2027	4007.2	7027.6	X25391.6	Y43351.1	070	66.7	60.2
0164	Sep-15	2157	4011.2	7019.7	X25338.1	Y43375.1	093	61.8	59.7
0165	Sep-15	2354	4013.4	7006.6	X25266.2	Y43382.4	097	54.7	55.3
0166	Sep-16	0345	3958.9	6927.8	W14070.6	Y43260.1	121	64.8	55.8
0167	Sep-16	0653	3956.0	6923.2	W14057.6	Y43238.0	256	157.8	
0168	Sep-16	0926	4000.4	6925.4	W14054.4	Y43269.0	272	58.5	55.7
0169	Sep-16	1349	4026.8	7000.5	X25193.9	Y43472.1	261	40.7	54.6
0170	Sep-16	1546	4022.6	7015.5	X25280.6	Y43454.3	254	45.1	
0171	Sep-16	1732	4031.8	7024.0	X25301.6	Y43526.0	281	35.8	
0172	Sep-16	2057	4012.1	7053.8	X25540.9	Y43405.5	262	72.2	
0173	Sep-16	2204	4013.2	7100.2	X25581.8	Y43418.1	251	70.0	
0174	Sep-16	2337	4018.1	7058.0	X25558.3	Y43454.2	071	58.5	
0175	Sep-17	0123	4027.0	7051.6	X25497.6	Y43515.9	294	45.4	
0176	Sep-17	0244	4030.0	7047.9	X25465.5	Y43534.5	087	42.1	
0178	Sep-23	1556	4047.3	7101.4	X25548.2	Y43675.7	235	32.3	52.8
0179	Sep-23	1729	4042.9	7106.9	X25595.8	Y43649.3	277	32.8	52.9
0180	Sep-23	2110	4024.1	7136.7	X25842.0	Y43534.6	279	43.7	53.5
0181	Sep-23	2304	4029.0	7144.6	X25904.7	Y43580.7	207	39.1	52.2
0182	Sep-24	0146	4017.9	7207.7	X26085.7	Y43511.5	292	34.4	52.4
0183	Sep-24	0332	4025.2	7212.4	X26127.5	Y43577.5	326	33.1	52.1
0184	Sep-24	0659	4013.8	7233.3	X26284.4	Y43498.3	244	31.2	51.3
0185	Sep-24	0914	4000.6	7232.8	X26269.5	Y43380.3	167	35.5	51.5
0186	Sep-24	1044	3955.5	7230.0	X26245.3	Y43332.1	220	35.8	51.5
0187	Sep-24	1257	4004.3	7243.5	X26354.3	Y43421.1	264	32.0	50.8
0188	Sep-24	1512	4013.0	7300.5	X26496.2	Y43514.4	302	25.2	53.3
0189	Sep-24	1656	4019.0	7313.2	X26605.7	Y43582.1	278	20.2	58.9

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Station*	Date	Time	Lat	Lon	Loran		Course	Bottom	Temp (F)
					TD's	(FM)		Depth	
0190	Sep-24	1826	4016.0	7320.5	X26657.3	Y43560.6	321	19.7	58.3
0191	Sep-24	2031	4021.2	7332.1	X26758.4	Y43620.6	285	13.4	66.5
0192	Sep-24	2154	4021.5	7341.3	X26831.1	Y43632.6	277	13.9	65.0
0193	Sep-24	2301	4021.5	7344.8	X26858.2	Y43636.2	139	13.7	70.3
0194	Sep-25	0035	4024.3	7350.3	X26908.0	Y43668.9	355	13.9	68.6
0195	Sep-25	0320	4028.0	7334.9	X26796.5	Y43689.5	082	13.9	68.8
0196	Sep-25	0524	4026.3	7326.8	X26728.6	Y43664.9	113	14.5	69.5
0197	Sep-25	0800	4031.7	7309.4	X26600.3	Y43695.8	094	15.0	68.7
0198	Sep-25	1013	4035.9	7255.5	X26495.1	Y43717.9	052	16.4	68.1
0199	Sep-25	1239	4043.9	7239.9	X26379.7	Y43768.8	055	15.0	67.7
0200	Sep-25	1441	4037.0	7237.0	X26343.2	Y43705.5	095	20.8	67.9
0201	Sep-25	1655	4040.8	7221.6	X26220.6	Y43719.5	072	23.2	59.5
0202	Sep-25	1833	4048.9	7224.0	X26253.6	Y43789.8	070	14.2	67.5
0203	Sep-25	1952	4051.0	7216.1	X26189.2	Y43796.0	079	16.7	67.8
0204	Sep-25	2209	4051.7	7156.1	X26017.6	Y43775.7	097	19.7	58.9
0205	Sep-25	2342	4055.9	7159.7	X26054.6	Y43813.4	071	15.3	67.0
0206	Sep-26	0106	4056.7	7202.0	X26076.1	Y43822.4	061	13.9	67.1
0207	Sep-26	0209	4058.0	7159.0	X26051.7	Y43828.7	079	13.4	67.3
0208	Sep-26	0344	4059.5	7149.8	X25973.7	Y43827.4	233	15.0	66.1
0209	Sep-26	0652	4056.7	7130.7	X25802.4	Y43780.8	354	29.8	56.4
0210	Sep-26	0951	4056.9	7130.8	X25803.3	Y43782.6	182	29.3	56.4
0211	Sep-26	1218	4105.3	7133.2	X25835.9	Y43848.6	149	14.5	66.6
0212	Sep-26	1537	4110.2	7110.4	X25640.2	Y43851.9	316	22.1	
0213	Sep-26	1743	4122.7	7116.4	X25722.8	Y43948.6	112	16.4	65.5
0214	Sep-26	1934	4124.8	7104.9	X25625.1	Y43945.5	087	11.8	65.7
0215	Sep-26	2026	4122.5	7103.8	X25608.4	Y43928.3	264	14.8	65.7
0216	Sep-26	2235	4119.3	7103.4	X25596.4	Y43906.0		17.5	64.9
0217	Sep-27	0137	4114.2	7047.0	X25436.0	Y43847.7	034	14.2	64.7
0218	Sep-27	0229	4114.7	7045.8	X25427.2	Y43850.2	047	14.5	64.7
0219	Sep-27	0452	4115.2	7029.2	X25277.6	Y43831.3	280	16.4	62.0
0220	Sep-27	1121	4111.0	7013.5	X25131.1	Y43783.5	288	13.9	63.1
0221	Sep-27	1416	4056.3	7008.7	X25130.1	Y43680.4	281	13.7	64.0
0222	Sep-27	1531	4055.6	7015.3	X25175.1	Y43683.1	312	20.5	63.1
0223	Sep-27	1727	4050.1	7026.0	X25265.0	Y43657.1	122	28.4	60.0
0224	Sep-27	2129	4047.7	6953.0	W14034.2	Y43607.0	031	18.3	64.0
0225	Sep-28	0009	4040.1	6932.3	W13953.3	Y43538.9	062	24.9	61.7
0226	Sep-28	0311	4037.5	6920.6	W13902.5	Y43512.4	076	29.3	60.9
0227	Sep-28	0554	4031.5	6905.8	W13850.7	Y43462.5	303	43.2	56.0
0228	Sep-28	0746	4032.9	6859.8	W13816.1	Y43467.0	087	40.5	55.1
0229	Sep-28	1205	4047.4	6851.5	W13719.8	Y43551.2	303	36.1	64.6
0231	Sep-28	1704	4058.9	6847.2	W13651.8	Y43617.3	093	39.1	62.0
0232	Sep-28	1912	4101.7	6842.0	W13614.7	Y43629.5	176	36.4	62.2
0233	Sep-28	2208	4109.5	6856.2	W13651.6	Y43689.7	181	56.0	50.9
0234	Sep-29	0133	4101.4	6901.3	W13711.6	Y43645.8	349	44.0	62.8
0235	Sep-29	0338	4100.5	6906.9	W13743.6	Y43645.1	006	39.9	62.9
0236	Sep-29	0547	4105.7	6913.1	W13753.9	Y43683.0	341	30.1	49.9
0237	Sep-29	0811	4112.9	6923.4	W13777.6	Y43738.2	152	26.0	50.3
0238	Sep-29	1125	4113.2	6922.5	W13771.6	Y43739.0	192	27.3	53.3
0239	Sep-29	1410	4114.2	6918.6	W13746.9	Y43740.9	238	33.6	46.3
0240	Sep-29	1455	4114.8	6918.7	W13744.8	Y43744.5	332	33.4	46.3
0241	Sep-29	1805	4128.9	6935.4	W13772.8	Y43850.2	107	17.2	51.5
0242	Sep-29	2127	4143.5	6945.3	W13761.9	Y43950.0	122	44.8	47.2
0243	Sep-30	0012	4143.2	6950.1	W13789.9	Y43955.4	162	20.8	48.9
0244	Sep-30	0459	4143.8	6953.4	W13805.9	Y43963.5	160	10.1	55.5

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Station*	Date	Time	Lat	Lon	Loran		Course	Bottom	Temp (F)
					TD's	(FM)		Depth	
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0245	Sep-30	0702	4143.8	6953.9	W13808.9	Y43964.2	189	8.5	57.8
0247	Oct-07	2348	4012.3	6908.9	W13934.4	Y43340.1	042	59.1	56.3
0248	Oct-08	0225	4010.2	6850.5	W13853.7	Y43316.8	071	80.9	56.0
0249	Oct-08	0443	4018.7	6840.0	W13774.2	Y43364.9	091	55.8	57.9
0250	Oct-08	0654	4011.7	6839.1	W13794.9	Y43320.9	068	83.4	55.5
0251	Oct-08	1153	4016.1	6821.5	W13698.2	Y43339.0	068	88.6	55.4
0252	Oct-08	1552	4021.4	6749.8	W13537.5	Y43354.9	137	106.4	54.4
0253	Oct-08	1938	4028.2	6808.9	W13595.1	Y43405.4	157	190.3	
0254	Oct-08	2213	4038.7	6803.5	W13529.8	Y43464.2	312	47.6	61.4
0255	Oct-08	2345	4040.7	6811.8	W13559.1	Y43481.4	241	43.2	62.0
0256	Oct-09	0234	4036.9	6839.5	W13703.2	Y43477.4	057	34.2	69.0
0257	Oct-09	0514	4050.0	6833.0	W13620.1	Y43552.2	126	32.3	63.1
0258	Oct-09	0712	4048.5	6820.2	W13566.0	Y43533.4	223	31.2	64.4
0259	Oct-09	0859	4053.1	6814.6	W13520.8	Y43556.4	102	27.9	65.0
0260	Oct-09	1238	4112.6	6758.0	W13360.2	Y43653.7	305	28.2	61.7
0261	Oct-09	1413	4112.8	6758.5	W13361.5	Y43655.3	313	26.8	61.7
0262	Oct-09	1656	4106.7	6752.2	W13360.9	Y43615.9	201	27.6	61.4
0263	Oct-09	1859	4055.7	6754.0	W13416.3	Y43555.8	247	33.1	68.1
0264	Oct-09	2327	4043.2	6746.2	W13434.6	Y43479.1	210	39.9	59.5
0265	Oct-10	0532	4032.9	6735.7	W13431.3	Y43414.2	279	64.2	58.3
0266	Oct-10	0842	4035.4	6720.7	W13359.0	Y43419.7	036	57.4	59.8
0268	Oct-10	1203	4030.0	6710.3	W13337.8	Y43384.7	082	156.1	55.4
0269	Oct-10	1503	4035.8	6716.2	W13338.5	Y43419.8	055	63.4	59.9
0270	Oct-10	1724	4042.9	6725.4	W13347.6	Y43464.2	005	51.1	59.0
0271	Oct-10	1930	4048.1	6712.1	W13270.5	Y43485.0	004	52.5	55.8
0272	Oct-10	2207	4102.8	6655.6	W13140.5	Y43553.1	048	39.4	54.9
0273	Oct-10	2330	4106.9	6650.0	W13100.2	Y43570.6	049	39.6	56.0
0274	Oct-11	0256	4052.9	6635.0	W13104.1	Y43488.5	048	147.9	49.8
0275	Oct-11	0445	4058.0	6632.5	W13073.2	Y43513.0	225	66.2	55.8
0276	Oct-11	0657	4101.8	6628.7	W13041.9	Y43530.7	029	66.4	55.7
0277	Oct-11	0937	4101.3	6624.9	W13030.4	Y43525.6	022	184.5	46.7
0278	Oct-11	1139	4112.4	6628.9	W12995.1	Y43584.6	311	51.4	51.5
0279	Oct-11	1503	4117.4	6659.1	W13088.2	Y43631.9	014	36.6	56.8
0280	Oct-11	1708	4125.3	6646.5	W13002.1	Y43662.6	351	42.7	53.8
0281	Oct-11	2034	4141.5	6644.3	W12916.1	Y43741.5	034	39.9	58.3
0282	Oct-11	2234	4150.3	6641.3	W12860.9	Y43781.8	191	38.5	56.2
0283	Oct-12	0137	4147.8	6656.3	W12931.0	Y43783.1	173	35.0	57.0
0284	Oct-12	0209	4147.0	6656.5	W12936.0	Y43779.2	351	34.7	57.0
0285	Oct-12	0437	4134.5	6702.2	W13019.8	Y43721.7	304	33.6	59.8
0286	Oct-12	0725	4139.5	6722.1	W13076.6	Y43765.4	149	27.1	61.4
0287	Oct-12	1000	4148.9	6735.0	W13085.4	Y43825.9	180	27.6	60.5
0288	Oct-12	1057	4148.8	6735.1	W13086.4	Y43825.5	168	26.8	60.5
0289	Oct-12	1250	4142.9	6741.0	W13141.1	Y43801.0	332	23.2	61.7
0290	Oct-12	1701	4131.0	6750.4	W13241.1	Y43747.1	045	21.6	62.4
0291	Oct-12	2102	4137.0	6804.2	W13274.4	Y43793.4	158	21.6	62.1
0292	Oct-12	2358	4150.8	6812.2	W13243.7	Y43875.5	065	90.2	43.1
0293	Oct-13	0145	4155.1	6808.6	W13205.3	Y43894.1	220	108.3	47.3
0294	Oct-13	0445	4151.8	6744.6	W13112.3	Y43850.8	259	20.2	59.6
0295	Oct-13	0720	4156.0	6749.1	W13110.9	Y43877.2	236	32.3	
0296	Oct-13	0933	4202.8	6742.9	W13047.9	Y43905.0	232	90.8	45.4
0297	Oct-13	1244	4157.8	6735.2	W13040.5	Y43871.7	277	24.9	60.3
0298	Oct-13	1529	4151.2	6718.5	W13003.8	Y43820.9	273	26.0	60.4
0299	Oct-13	1837	4154.4	6716.3	W12978.3	Y43834.9	154	28.2	59.9
0300	Oct-13	2319	4202.2	6710.1	W12912.4	Y43867.3	277	29.0	59.1

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					TD's			Depth (FM)	
0301	Oct-14	0124	4207.8	6717.1	W12911.5	Y43901.9	270	48.9	49.0
0302	Oct-14	0401	4211.9	6702.7	W12831.5	Y43906.4	285	103.9	48.4
0303	Oct-14	0600	4206.7	6656.8	W12835.8	Y43875.8	333	36.4	49.8
0304	Oct-14	0751	4212.1	6652.0	W12789.1	Y43896.4	089	115.6	48.5
0305	Oct-14	0941	4212.6	6645.7	W12762.1	Y43892.5	085	122.5	48.5
0306	Oct-14	1231	4205.3	6631.8	W12749.2	Y43844.9	329	45.7	50.0
0307	Oct-14	1420	4203.3	6635.7	W12773.5	Y43839.1	049	43.5	53.2
0308	Oct-14	1700	4157.8	6621.1	W12748.8	Y43800.0	329	47.6	52.9
0309	Oct-14	1907	4157.9	6610.1	W12710.1	Y43791.0	090	50.6	51.2
0310	Oct-14	2241	4146.1	6620.8	W12806.1	Y43744.3	206	44.8	52.2
0311	Oct-15	0126	4139.9	6558.2	W12757.9	Y43697.0	202	55.0	47.4
0312	Oct-15	0446	4137.5	6551.4	W12746.5	Y43680.6	028	146.5	
0313	Oct-15	0712	4151.2	6552.4	W12683.8	Y43745.3	017	68.4	47.6
0314	Oct-15	0915	4156.8	6549.7	W12647.2	Y43768.8	120	97.3	48.4
0315	Oct-15	1107	4158.3	6549.1	W12637.8	Y43775.1	138	108.5	47.6
0316	Oct-15	1308	4200.2	6552.9	W12640.9	Y43786.9	131	100.9	
0317	Oct-15	1807	4215.3	6600.3	W12588.0	Y43861.7	023	135.3	47.1
0318	Oct-15	2147	4218.8	6604.8	W12584.9	Y43881.5	195	147.6	49.0
0319	Oct-16	0021	4217.9	6620.1	W12641.4	Y43891.8	195	134.5	48.3
0320	Oct-16	0430	4218.6	6644.8	W12726.7	Y43919.6	199	160.5	47.9
0321	Oct-16	0731	4216.5	6658.1	W12789.2	Y43923.2	085	152.8	48.1
0322	Oct-16	0932	4216.1	6703.7	W12813.0	Y43927.4	273	146.0	48.1
0323	Oct-16	1249	4226.9	6719.7	W12818.3	Y43996.1	247	186.2	48.3
0324	Oct-16	1655	4242.5	6722.5	W12741.8	Y44071.2	317	114.8	48.5
0325	Oct-16	1956	4239.8	6706.9	W12694.3	Y44040.5	238	151.2	48.3
0326	Oct-16	2215	4235.7	6701.5	W12696.2	Y44015.8	119	166.8	48.1
0327	Oct-17	0035	4239.3	6701.8	W12676.8	Y44032.8	110	155.0	48.4
0328	Oct-17	0410	4249.6	6653.3	W12585.1	Y44068.8	334	108.5	49.1
0329	Oct-17	0907	4300.2	6658.9	W12543.7	Y44121.3	062	98.2	
0330	Oct-17	1121	4259.1	6649.3	W12514.7	Y44105.2	239	92.4	
0331	Oct-17	1535	4320.2	6640.4	W12355.9	Y44182.5	352	59.9	51.5
0332	Oct-17	1924	4332.6	6700.7	W12349.5	Y44257.7	155	115.6	50.1
0333	Oct-17	2253	4342.0	6659.2	W12283.0	Y44293.0		86.9	
0334	Oct-18	0138	4350.1	6644.1	W12179.1	Y44304.5	174	74.6	51.3
0335	Oct-18	0525	4407.5	6647.3	W12073.5	Y44373.2	182	79.0	50.8
0336	Oct-18	0831	4416.4	6642.0	W11997.6	Y44398.0	098	102.0	50.8
0337	Oct-18	1103	4415.7	6655.4	W12043.7	Y44413.1	242	94.3	50.1
0338	Oct-18	1250	4410.1	6654.8	W12080.5	Y44392.2	175	96.0	50.2
0339	Oct-18	1447	4402.0	6656.7	W12141.8	Y44365.4	220	94.3	50.2
0340	Oct-18	1730	4353.2	6712.4	W12256.7	Y44353.6	343	84.2	49.9
0341	Oct-18	2054	4336.6	6719.2	W12393.7	Y44297.9	005	117.6	49.3
0342	Oct-19	0206	4302.5	6742.1	W12705.1	Y44185.8	271	106.4	45.5
0343	Oct-19	0450	4251.3	6736.8	W12749.4	Y44129.1	220	124.7	48.5
0344	Oct-19	0839	4242.1	6801.3	W12913.7	Y44118.2	088	97.3	47.8
0345	Oct-19	1101	4239.6	6804.5	W12943.4	Y44110.7	312	111.0	47.1
0346	Oct-19	1459	4230.3	6829.5	W13116.7	Y44099.3		120.3	47.3
0347	Oct-19	1816	4213.2	6834.1	W13234.1	Y44019.1	011	100.1	42.2
0348	Oct-19	2108	4204.8	6828.1	W13248.2	Y43968.1	319	98.4	42.6
0349	Oct-20	0018	4151.3	6829.6	W13325.0	Y43898.3	039	110.2	46.4
0350	Oct-20	0325	4139.1	6832.3	W13398.1	Y43835.0	299	93.2	43.6
0351	Oct-20	0548	4134.7	6846.2	W13488.5	Y43825.5	272	84.5	43.5
0352	Oct-20	0902	4123.1	6906.2	W13643.0	Y43781.1	239	86.4	43.4
0353	Oct-20	1019	4122.8	6906.8	W13647.6	Y43779.8	231	87.2	43.4
0354	Oct-20	1322	4136.3	6900.2	W13552.0	Y43851.0	199	79.8	43.0

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0355	Oct-20	1716	4142.1	6924.7	W13654.6	Y43914.7	210	89.7	42.3
0356	Oct-20	2044	4159.1	6912.2	W13504.4	Y43994.7	185	117.0	42.2
0357	Oct-20	2356	4215.8	6917.6	W13448.2	Y44092.6	177	115.9	44.0
0358	Oct-21	0251	4229.8	6912.7	W13345.2	Y44158.6	202	127.7	44.5
0359	Oct-21	0717	4232.2	6953.1	W13562.6	Y44235.3	183	105.0	43.9
0360	Oct-21	0912	4223.7	6959.8	W13647.6	Y44200.7	182	106.4	43.5
0361	Oct-21	1209	4208.4	6946.7	W13649.8	Y44096.0	004	92.1	42.8
0362	Oct-28	0114	4211.7	7003.0	X25449.4	Y44139.8	170	59.1	
0363	Oct-28	0244	4207.2	7002.3	X25413.8	Y44113.0	334	33.6	50.6
0364	Oct-28	0432	4204.8	7006.3	X25417.0	Y44106.0	300	9.6	53.5
0365	Oct-28	0653	4205.6	7018.7	X25490.7	Y44130.5	243	33.4	53.8
0366	Oct-28	0822	4204.3	7016.1	X25466.0	Y44118.5	210	33.4	53.5
0367	Oct-28	1013	4158.7	7010.8	X25396.6	Y44077.3	006	19.1	55.6
0368	Oct-28	1231	4153.8	7010.7	X25360.1	Y44048.0	225	15.3	55.8
0370	Oct-28	1424	4153.0	7018.8	X25403.0	Y44055.9	040	17.8	56.0
0371	Oct-28	1649	4150.2	7025.8	X25429.6	Y44050.1	044	13.9	56.4
0372	Oct-29	0248	4200.2	7031.5	X25534.9	Y44119.8	205	20.0	53.7
0373	Oct-29	0655	4217.1	7040.9	X25706.7	Y44234.8	184	18.0	50.2
0374	Oct-29	1004	4222.2	7043.2	X25753.0	Y44267.5	137	29.3	50.6
0376	Oct-29	1230	4223.5	7042.7	X25758.3	Y44274.4	162	29.3	50.3
0377	Oct-29	1319	4223.4	7042.5	X25756.5	Y44273.5	156	30.9	50.3
0380	Oct-29	1929	4219.8	7045.5	X25753.7	Y44258.1		18.3	53.0
0381	Oct-29	2349	4241.3	7025.2	X25763.7	Y44338.5	272	28.2	51.9
0382	Oct-30	0133	4240.1	7031.9	X25794.7	Y44344.7	155	46.2	45.9
0383	Oct-30	0325	4241.2	7032.9	X25807.4	Y44352.2	356	36.6	48.1
0384	Oct-30	0458	4241.1	7032.9	X25806.8	Y44351.7	344	36.1	48.1
0385	Oct-30	0754	4245.5	7039.2	X25871.1	Y44386.7	140	32.8	47.6
0386	Oct-30	0956	4249.9	7045.6	X25936.2	Y44421.5	148	17.5	50.2
0387	Oct-30	1603	4257.1	7009.9	X25782.0	Y44390.8	276	80.4	44.0
0388	Oct-30	1933	4301.8	6948.6	W13367.0	Y44375.6	331	98.2	42.9
0389	Oct-30	2250	4251.6	6943.0	W13393.7	Y44316.5	354	106.4	44.0
0390	Oct-31	0021	4255.0	6940.3	W13358.2	Y44328.4	051	83.4	42.7
0391	Oct-31	0343	4255.7	6911.2	W13187.7	Y44284.0	177	93.5	42.9
0392	Oct-31	0555	4252.2	6904.5	W13172.0	Y44256.9	331	101.4	42.9
0393	Oct-31	0920	4236.2	6843.5	W13153.9	Y44147.8	055	104.2	45.9
0394	Oct-31	1154	4250.0	6843.3	W13072.2	Y44214.5	176	112.9	44.9
0395	Oct-31	1441	4256.1	6841.6	W13026.7	Y44240.6	178	107.2	44.5
0396	Oct-31	1720	4304.8	6843.7	W12984.9	Y44283.4	132	101.2	44.2
0397	Oct-31	1921	4309.1	6841.4	W12945.7	Y44299.6	343	96.2	44.2
0398	Oct-31	2301	4308.1	6817.8	W12834.0	Y44260.2	217	114.3	44.3
0399	Nov-01	0106	4306.5	6810.2	W12807.7	Y44242.0	188	111.5	44.1
0400	Nov-01	0325	4301.4	6802.3	W12802.7	Y44208.0	235	103.9	44.9
0401	Nov-01	0612	4314.7	6809.8	W12753.9	Y44277.4	330	112.6	44.7
0402	Nov-01	0838	4319.0	6801.5	W12688.1	Y44283.7	279	127.4	47.0
0403	Nov-01	1352	4353.5	6745.9	W12388.3	Y44400.8	057	120.3	47.2
0404	Nov-01	1539	4355.9	6737.3	W12335.2	Y44398.0	026	114.8	48.1
0405	Nov-01	1818	4406.2	6745.5	W12297.0	Y44448.2	152	76.8	
0406	Nov-01	2317	4409.9	6748.7	W12284.1	Y44466.5	329	72.7	
0407	Nov-02	0417	4408.1	6753.5	W12317.6	Y44467.1	206	55.8	51.5
0408	Nov-02	0810	4410.1	6801.5	W12339.4	Y44486.0	009	46.8	52.1
0409	Nov-02	1317	4358.1	6817.3	W12498.5	Y44465.2	000	58.0	50.7
0410	Nov-02	1649	4351.2	6835.3	W12636.4	Y44466.4	154	58.2	50.8
0411	Nov-02	1831	4350.7	6834.9	W12637.9	Y44463.8		58.2	50.8
0412	Nov-02	2138	4340.3	6822.6	W12646.9	Y44403.6	204	100.3	44.7

NOAA Fisheries Service AUTUMN BOTTOM TRAWL SURVEY
2015 STATION INFORMATION

Station*	Date	Time	Lat	Lon	Loran		Course	Bottom Depth (FM)	Temp (F)
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0413	Nov-03	0034	4331.0	6843.0	W12812.7	Y44396.9	033	78.7	
0414	Nov-03	0235	4338.5	6840.2	W12748.1	Y44423.4	242	83.1	48.9
0415	Nov-03	0702	4332.3	6904.9	W12922.2	Y44437.7		58.5	
0416	Nov-03	0914	4333.5	6911.1	W12948.8	Y44453.1	143	74.6	47.2
0417	Nov-03	1604	4331.0	6929.5	W13071.2	Y44473.5	005	75.7	44.5
0418	Nov-03	2010	4333.7	6941.8	W13126.5	Y44506.6	202	62.9	48.0
0419	Nov-03	2253	4328.7	6947.1	W13190.8	Y44494.9	213	71.1	45.7
0420	Nov-04	0114	4319.3	7000.5	X25868.6	Y44477.7	193	86.7	42.6
0421	Nov-04	0517	4318.7	7013.1	X25924.6	Y44498.1	273	54.1	48.2
0422	Nov-04	0916	4313.5	7010.8	X25883.6	Y44470.1	150	62.9	45.5
0423	Nov-04	1325	4245.9	7033.1	X25837.8	Y44377.3	030	53.0	44.6
0424	Nov-04	1628	4241.7	7009.9	X25685.6	Y44313.2	299	57.7	46.4
0425	Nov-04	2008	4234.2	6954.6	W13560.2	Y44248.3	357	98.4	43.2
0426	Nov-04	2243	4229.6	7007.5	X25594.5	Y44245.7	124	44.0	50.3
0427	Nov-05	0000	4229.2	7009.3	X25601.2	Y44246.8		59.1	
0428	Nov-05	0149	4224.4	7003.4	X25539.4	Y44210.7	187	48.1	49.2
0429	Nov-05	0435	4217.5	7022.2	X25591.7	Y44204.1	350	48.7	49.0
0430	Nov-05	0814	4213.2	7033.3	X25631.5	Y44198.7	167	21.1	52.5
0431	Nov-05	0953	4209.5	7028.5	X25576.3	Y44169.1	021	33.1	51.9
0432	Nov-05	1354	4147.3	7024.5	X25401.2	Y44030.2	029	12.6	55.6

*Missing sequential numbers indicate either a test-tow or no trawl was attempted.

NOAA FISHERIES SERVICE-NEFSC FALL BOTTOM TRAWL SURVEY 2015
CATCH WEIGHTS (POUNDS) OF IMPORTANT SPECIES BY HAUL

STATION	ATLANTIC COD	HADDOCK	POLLOCK	WHITE HAKE	SILVER HAKE	REDFISH	GOOSEFISH	SPINY DOGFISH	YELLOWTAIL FLOUNDER	WINTER FLOUNDER	AMERICAN PLAICE	WITCH FLOUNDER	WINDOWPANE FLDR	SUMMER FLOUNDER	BLUEFISH	WEAKFISH	SCUP	BLACK SEA BASS	SPOT	CROAKER	BUTTERFISH	AMERICAN LOBSTER	LOLIGO	ILLEX	TOTAL OTHER ^[1]	TOTAL ALL		
21	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	99	15	25	139		
22 ^[2]	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	
23	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	9	7	68	86	
24	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	43	2	31	76	
25	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	78	2	11	91	
26	0	0	0	0	0	0	1	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	0	142	147	
27 ^[2]	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	
28	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	39	1	23	63	
29	0	0	0	0	0	0	1	8	0	0	0	0	0	0	0	0	0	0	0	0	0	0	30	0	0	46	85	
30	0	0	0	0	2	0	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	7	0	3	0	27	43	
31	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	30	52	83	
32	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	20	8	60	88	
33	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	22	1	245	270	
34	0	0	0	0	0	0	6	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	13	0	573	592	
35	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	52	6	36	97	
36	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	78	4	59	143	
37	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	5	0	14	20	
38	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	179	5	33	217	
39 ^[2]	0	0	0	0	1	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	32	4	5	77	121	
40 ^[2]	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4	30	34	
41	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	4	37	42	
42	0	0	0	0	0	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	40	17	41	101	
43	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	116	7	58	181	
44	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	109	4	25	138	
45	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	21	6	97	127	
46	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9	0	74	83	
47	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	31	8	18	57	
48	0	0	0	0	0	0	0	0	0	0	0	0	0	3	0	0	0	0	0	0	0	0	0	5	0	65	73	
49	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	84	1	34	121	
50	0	0	0	0	1	0	11	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	3	76	92	
51	0	0	0	0	0	0	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	366	0	26	0	32	428	
52	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	12	0	8	7	54	82	
53	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	23	0	48	71	
54	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1067	0	53	0	15	1135	
55	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9	0	120	123	219	472	
56	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	16	1	43	60	
57	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1999	0	65	1	12	2077	
58 ^[2]	0	0	0	0	4	0	5	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	23	75	51	107	265	
59 ^[2]	0	0	0	0	1	0	6	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	35	9	110	161	
60 ^[2]	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	10	10
61	0	0	0	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	2	97	102	
62	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	82	0	880	90	28	0	8	0	33	1123		

NOAA FISHERIES SERVICE-NEFSC FALL BOTTOM TRAWL SURVEY 2015
CATCH WEIGHTS (POUNDS) OF IMPORTANT SPECIES BY HAUL

	ATLANTIC COD	HADDOCK	POLLOCK	WHITE HAKE	SILVER HAKE	REDFISH	GOOSEFISH	SPINY DOGFISH	YELLOWTAIL FLOUNDER	WINTER FLOUNDER	AMERICAN PLAICE	WITCH FLOUNDER	WINDOWPANE FLDR	SUMMER FLOUNDER	BLUEFISH	WEAKFISH	SCUP	BLACK SEA BASS	SPOT	CROAKER	BUTTERFISH	AMERICAN LOBSTER	LOLIGO	ILLEX	TOTAL OTHER ^[1]	TOTAL ALL	
63	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	11	0	9	4	0	0	2	0	208	234	
64	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	1	55	4	0	0	3	0	22	86	
65	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	75	0	52	27	1	0	4	0	62	221	
66 ^[2]	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	11	0	8	6	0	0	2	0	27	54	
67	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	2	0	0	0	0	31	0	21	56	
68	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9	0	10	19	
69	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	5	6	
70	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4	0	18	22	
71	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	3	
72	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9	0	4	1	484	499
73	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	30	2	3	35	
74	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	28	0	56	84	
75	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	30	0	57	88	
76	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	18	6	16	40	
77	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4	97	101	
78	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	30	0	14	44	
79	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	7204	0	77	41	215	7537	
80	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	12	0	13	27	
81	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	24	0	0	0	0	0	3	0	33	60	
82	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	5	86	2	34	266	5	0	2	0	331	731	
83	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	82	0	45	79	7	0	10	0	107	330	
84	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	40	0	1	2	0	0	48	0	517	608	
85	0	0	0	0	0	0	0	0	0	0	0	0	0	3	0	0	162	1	31	112	4	0	4	0	57	374	
86	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	1	213	0	36	257	8	0	3	0	51	570	
87	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	82	1	7	45	6	0	3	0	25	169	
88	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1993	0	0	1	1	0	20	0	94	2109	
90	0	0	0	0	0	0	0	0	0	0	0	0	0	2	0	0	124	1	0	0	0	0	5	0	26	158	
91	0	0	0	0	0	0	0	0	0	0	0	0	0	2	1	0	65	0	0	0	2	0	4	0	21	95	
92	0	0	0	0	0	0	0	0	0	0	0	0	0	2	3	26	66	0	89	1326	36	0	2	0	142	1692	
93	0	0	0	0	0	0	0	0	0	0	0	0	0	1	11	1	546	2	2	7	0	0	10	0	12	592	
94	0	0	0	0	0	0	0	0	0	0	0	0	0	3	2	0	3	0	0	0	0	0	5	0	14	27	
95 ^[2]	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
96	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	17	0	19	36	
97	0	0	0	0	0	0	0	0	0	0	0	0	0	4	0	0	0	16	0	0	0	0	21	0	92	133	
98	0	0	0	0	0	0	0	0	0	0	0	0	0	5	0	0	17	4	0	200	1	0	10	0	139	376	
99	0	0	0	0	0	0	0	0	0	0	0	0	0	2	2	2	28	1	21	154	0	0	3	0	173	386	
100	0	0	0	0	0	0	0	0	0	0	0	0	0	4	1	16	63	0	79	774	1	0	5	0	143	1086	
101	0	0	0	0	0	0	0	0	0	0	0	0	0	4	0	15	42	1	78	1067	2	0	2	0	381	1592	
102	0	0	0	0	0	0	0	0	0	0	0	0	1	4	0	9	102	1	60	711	2	0	2	0	609	1501	
103	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	1	0	69	3	0	15	0	441	531	
104	0	0	0	0	0	0	0	0	0	0	0	0	0	2	5	20	202	0	246	1436	16	0	7	0	733	2667	
105	0	0	0	0	0	0	0	0	0	0	0	0	0	3	1	0	34	0	0	2	0	0	11	0	51	102	
106	0	0	0	0	0	0	0	0	0	0	0	0	0	13	3	19	82	0	159	490	127	0	6	0	4960	5859	
107	0	0	0	0	0	0	0	0	0	0	0	0	0	3	0	0	0	0	0	1	8	0	14	0	167	193	

NOAA FISHERIES SERVICE-NEFSC FALL BOTTOM TRAWL SURVEY 2015
CATCH WEIGHTS (POUNDS) OF IMPORTANT SPECIES BY HAUL

	ATLANTIC COD	HADDOCK	POLLOCK	WHITE HAKE	SILVER HAKE	REDFISH	GOOSEFISH	SPINY DOGFISH	YELLOWTAIL FLOUNDER	WINTER FLOUNDER	AMERICAN PLAICE	WITCH FLOUNDER	WINDOWPANE FLDR	SUMMER FLOUNDER	BLUEFISH	WEAKFISH	SCUP	BLACK SEA BASS	SPOT	CROAKER	BUTTERFISH	AMERICAN LOBSTER	LOLIGO	ILLEX	TOTAL OTHER ^[1]	TOTAL ALL		
108	0	0	0	0	0	0	0	0	0	0	0	0	0	4	3	80	12	0	63	702	42	0	2	0	1502	2410		
109	0	0	0	0	0	0	0	0	0	0	0	0	10	61	0	0	9	26	0	4	1	8	20	0	474	613		
110	0	0	0	0	0	0	0	0	0	0	0	0	4	9	1	0	7	6	0	2	48	0	13	0	361	451		
111	0	0	0	0	0	0	0	0	0	0	0	0	3	7	2	7	41	1	1	94	6	0	36	0	394	592		
112	0	0	0	0	0	0	0	0	0	0	0	0	7	16	0	0	14	36	0	8	0	0	7	0	1176	1264		
113	0	0	0	0	0	0	1	0	0	0	0	0	5	0	0	0	0	0	0	0	0	0	18	0	36	60		
114	0	0	0	0	0	0	2	0	0	0	0	0	19	0	0	0	0	0	0	0	0	0	11	0	79	111		
115	0	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	1	15	0	7	25	
116	0	0	0	0	0	0	4	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	3	0	57	66		
117	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	27	0	670	697		
118	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	20	0	29	49		
119	0	0	0	0	0	0	0	0	0	0	0	0	3	0	0	0	0	0	0	0	0	0	7	0	42	52		
120	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	8	0	32	42		
121	0	0	0	0	0	0	0	0	0	0	0	0	0	4	0	0	6	11	0	2	0	0	20	0	265	308		
122	0	0	0	0	0	0	0	0	0	0	0	0	0	5	0	0	0	6	0	0	0	0	14	0	154	179		
123	0	0	0	0	0	0	0	0	0	0	0	0	0	5	0	0	0	2	0	0	0	0	16	0	66	89		
124	0	0	0	0	0	0	0	0	0	0	0	0	7	3	0	0	1	10	0	5	0	0	8	0	472	506		
125	0	0	0	0	0	0	0	0	0	0	0	0	2	3	0	0	0	4	0	0	0	0	54	0	357	420		
126	0	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	7	0	0	0	0	13	0	126	148		
127	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	27	0	686	714		
128	0	0	0	0	0	0	0	0	0	0	0	0	1	1	0	0	0	2	0	0	0	0	3	0	28	35		
129	0	0	0	0	0	0	0	0	0	0	0	0	2	4	0	0	3	36	0	0	0	2	15	0	678	740		
130	0	0	0	0	0	0	0	0	0	0	0	0	3	5	0	0	0	3	0	3	1	0	24	0	200	239		
131	0	0	0	0	0	0	0	0	0	0	0	0	5	9	0	0	0	3	0	1	0	0	7	0	177	202		
132	0	0	0	0	0	0	0	0	0	0	0	0	10	40	0	0	0	15	0	1	0	0	6	0	930	1002		
133	0	0	0	0	2	0	0	0	0	1	0	0	5	1	0	0	0	0	0	0	0	0	7	0	559	575		
134	0	0	0	0	4	0	35	0	0	1	0	0	0	0	0	0	0	0	0	0	1	1	5	0	1703	1750		
135	0	0	0	0	2	0	3	0	1	1	0	0	5	0	0	0	0	0	0	0	0	0	33	0	286	331		
136	0	0	0	0	1	0	8	0	0	0	0	0	0	0	0	0	0	0	0	0	8	0	12	0	463	492		
137	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	7	0	28	35		
138 ^[2]	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	122
139	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4	0	118	122		
140	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9	0	70	79		
141	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	13	0	204	219		
142	0	0	0	0	1	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	2	0	16	0	268	289		
143	0	0	0	0	0	0	8	0	0	0	0	0	0	0	0	0	0	0	0	0	32	0	18	0	49	107		
144	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	20	0	20	0	137	179		
145	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	2	0	54	3	20	80		
146	0	0	0	0	0	0	9	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4	1	66	34	114		
147	0	0	0	0	0	0	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1	21	3	9	38		
148	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	12	1	71	84		
149	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	31	4	41	76		
150	0	0	0	0	0	0	6	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9	32	10	69	126		
151	0	0	0	0	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	25	37	17	84		

NOAA FISHERIES SERVICE-NEFSC FALL BOTTOM TRAWL SURVEY 2015
CATCH WEIGHTS (POUNDS) OF IMPORTANT SPECIES BY HAUL

	ATLANTIC COD	HADDOCK	POLLOCK	WHITE HAKE	SILVER HAKE	REDFISH	GOOSEFISH	SPINY DOGFISH	YELLOWTAIL FLOUNDER	WINTER FLOUNDER	AMERICAN PLAICE	WITCH FLOUNDER	WINDOWPANE FLDR	SUMMER FLOUNDER	BLUEFISH	WEAKFISH	SCUP	BLACK SEA BASS	SPOT	CROAKER	BUTTERFISH	AMERICAN LOBSTER	LOLIGO	ILLEX	TOTAL OTHER ^[1]	TOTAL ALL
152	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	45	3	22	73
153	0	0	0	0	0	0	9	0	0	0	0	0	0	0	0	0	0	0	0	0	13	0	37	1	33	93
154	0	0	0	0	0	0	28	0	0	0	0	0	0	0	0	0	0	0	0	0	2	3	17	26	60	136
155	0	0	0	0	0	0	4	0	0	0	0	0	0	0	0	0	0	0	0	0	5	0	86	3	19	117
156	0	0	0	0	0	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	95	5	44	148
157	0	0	0	0	0	0	11	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	100	1	23	136
158	0	0	0	0	0	0	45	0	0	0	0	0	0	0	0	0	0	0	0	0	0	16	0	26	22	109
159	0	0	0	0	0	0	7	0	0	0	0	0	0	0	0	0	0	0	0	0	0	14	13	56	25	115
160	0	0	0	0	0	0	23	0	0	0	0	0	0	0	0	0	0	0	0	0	0	10	60	9	186	288
161	0	0	0	0	0	0	6	0	0	0	0	0	0	0	0	0	0	0	0	0	0	18	70	1	20	115
162	0	0	0	1	0	0	22	0	0	0	0	0	0	0	0	0	0	0	0	0	0	21	1	9	32	86
163	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	7	1	114	0	42	164
164	0	0	0	0	0	0	9	0	0	0	0	0	0	0	0	0	0	0	0	0	20	1	24	0	43	97
165	0	0	0	0	0	0	11	0	0	0	0	0	0	0	0	0	0	0	0	0	10	0	23	0	23	67
166	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	4	0	31	3	12	51
167	0	0	0	0	2	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	38	3	27	74	147
168	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	73	13	19	105
169	0	0	0	0	4	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	21	1	78	5	36	147
170	0	0	0	0	2	0	12	26	0	0	0	0	0	0	0	0	0	0	0	0	695	0	27	0	69	831
171	0	0	0	0	54	0	5	19	0	1	0	0	0	0	0	0	0	0	0	0	720	0	21	0	126	946
172	0	0	0	0	0	0	7	0	0	0	0	0	0	0	0	0	0	0	0	0	3	0	22	0	38	70
173	0	0	0	0	0	0	11	0	0	0	0	0	0	0	0	0	0	0	0	0	1	1	6	0	70	89
174	0	0	0	0	1	0	13	0	0	0	0	0	0	0	0	0	0	0	0	0	61	0	13	0	56	144
175	0	0	0	0	2	0	12	3	0	0	0	0	0	0	0	0	0	0	0	0	358	1	17	0	37	430
176	0	0	0	0	1	0	17	4	0	0	0	1	0	0	0	0	0	0	0	0	172	1	9	0	60	265
178	0	0	0	0	15	0	14	3	1	0	0	0	0	6	0	0	0	0	0	0	91	1	92	0	93	316
179	0	0	0	0	10	0	4	6	1	0	0	0	0	0	0	0	0	0	0	0	302	0	81	0	109	513
180	0	0	0	0	1	0	76	0	0	0	0	0	0	1	0	0	0	0	0	0	101	2	1	0	47	229
181	0	0	0	0	3	0	150	0	0	0	0	0	0	0	0	0	0	0	0	0	70	0	0	0	122	345
182	0	0	0	0	3	0	35	0	0	0	0	0	0	0	0	0	0	0	0	0	48	0	72	0	136	294
183	0	0	0	0	2	0	27	0	1	8	0	0	0	0	0	0	0	0	0	0	39	8	54	0	120	259
184	0	0	0	0	1	0	9	0	1	0	0	0	1	0	0	0	0	0	0	0	4	0	98	1	688	803
185	0	0	0	0	1	0	21	0	0	0	0	0	0	0	0	0	0	0	0	0	651	0	105	0	96	874
186	0	0	0	0	0	0	8	0	0	0	0	0	0	0	0	0	0	0	0	0	29	1	40	0	64	142
187	0	0	0	0	0	0	2	0	1	0	0	0	0	0	0	0	0	0	0	0	1	0	75	0	178	257
188	0	0	0	0	0	0	0	1	0	0	0	0	3	3	0	0	0	0	0	0	1	0	62	0	649	719
189	0	0	0	0	0	0	0	0	0	0	0	0	0	42	0	0	0	4	0	0	0	0	31	0	97	174
190	0	0	0	0	0	0	0	0	0	0	0	0	5	18	0	0	0	1	0	0	0	0	16	0	220	260
191	0	0	0	0	0	0	0	0	0	0	0	0	2	4	0	1	3	5	0	0	0	0	1	0	118	134
192	0	0	0	0	0	0	0	0	0	0	0	0	0	4	2	0	2	1	0	0	1	16	0	0	192	218
193	0	0	0	0	0	0	0	0	0	2	0	0	2	4	0	0	3	1	0	0	0	0	1	0	351	364
194	0	0	0	0	1	0	0	0	0	2	0	0	5	3	0	3	7	0	0	1	2	7	2	0	455	488
195	0	0	0	0	0	0	0	0	0	0	0	0	0	15	2	5	6	4	0	0	0	0	2	0	182	216
196	0	0	0	0	0	0	0	0	0	1	0	0	1	2	1	3	17	2	0	0	1	0	9	0	67	104
197	0	0	0	0	0	0	0	0	0	0	0	0	0	2	0	0	4	0	0	0	0	0	11	0	23	40

NOAA FISHERIES SERVICE-NEFSC FALL BOTTOM TRAWL SURVEY 2015
CATCH WEIGHTS (POUNDS) OF IMPORTANT SPECIES BY HAUL

	ATLANTIC COD	HADDOCK	POLLOCK	WHITE HAKE	SILVER HAKE	REDFISH	GOOSEFISH	SPINY DOGFISH	YELLOWTAIL FLOUNDER	WINTER FLOUNDER	AMERICAN PLAICE	WITCH FLOUNDER	WINDOWPANE FLDR	SUMMER FLOUNDER	BLUEFISH	WEAKFISH	SCUP	BLACK SEA BASS	SPOT	CROAKER	BUTTERFISH	AMERICAN LOBSTER	LOLIGO	ILLEX	TOTAL OTHER ^[1]	TOTAL ALL	
241 ^[2]	13	1	0	0	0	0	13	1171	0	18	0	0	0	4	17	0	0	0	0	0	0	24	0	0	233	1494	
242	22	81	0	11	335	1	11	60	0	5	1	0	0	0	0	0	0	0	0	0	0	3	0	2	232	764	
243 ^[2]	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	
244	0	0	0	0	0	0	0	1329	3	3	0	0	4	7	0	0	0	0	0	0	0	0	11	0	1351	2708	
245 ^[2]	0	0	0	0	0	0	0	1930	1	3	0	0	0	4	0	0	0	0	0	0	0	0	3	0	0	1079	3020
247	0	11	0	0	9	0	33	0	0	0	0	0	0	0	0	0	0	0	0	0	174	0	36	1	61	325	
248	0	0	0	0	0	0	16	0	0	0	0	0	0	0	0	0	0	0	0	0	11	0	11	4	24	66	
249	0	1	0	0	5	0	19	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	36	1	54	117	
250	0	0	0	0	0	0	4	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	6	0	15	26	
251	0	0	0	0	0	0	5	0	0	0	0	0	0	0	0	0	0	0	0	0	7	0	2	0	10	24	
252	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	29	29
253	0	0	0	5	0	0	76	0	0	0	0	1	0	0	0	0	0	0	0	0	0	83	0	1	268	434	
254	0	0	0	0	25	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	60	1	252	341	
255	0	0	0	0	36	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	2	3	130	1	167	340	
256	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	33	0	18	51	
257	0	0	0	0	0	0	0	0	0	0	0	0	1	5	0	0	0	0	0	0	0	0	12	0	63	81	
258	0	0	0	0	0	0	0	0	0	0	0	0	2	18	5	0	0	0	0	0	0	0	21	0	48	94	
259	0	0	0	0	0	0	0	0	0	0	0	0	2	3	0	0	0	0	0	0	0	5	4	0	78	92	
260 ^[2]	0	0	0	0	0	0	0	2	0	0	0	0	1	0	0	0	0	0	0	0	0	0	2	0	0	10	15
261	0	0	0	0	0	0	0	15	1	0	0	0	1	0	0	0	0	0	0	0	1	0	17	0	174	209	
262	0	0	0	0	0	0	0	5	0	0	0	0	0	0	0	0	0	0	0	0	0	1	12	0	65	83	
263	0	0	0	0	0	0	0	0	0	0	0	0	1	6	0	0	0	0	0	0	0	0	32	0	61	100	
264	0	15	0	0	20	0	2	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	11	0	214	265	
265	0	58	0	0	14	0	7	0	0	0	0	0	0	0	0	0	0	0	0	0	1	3	13	1	109	206	
266	0	0	0	0	2	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	11	0	78	93	
267 ^[2]	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	
268	0	20	0	0	22	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	126	7	1	81	257	
269	0	1	0	0	2	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	16	0	4	24	
270	0	0	0	0	84	0	22	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9	0	447	562	
271	0	2	0	0	73	0	20	0	0	0	0	0	0	0	0	0	0	0	0	0	1	2	34	1	219	352	
272	0	5	0	1	4	0	1	9	3	0	0	0	0	0	0	0	0	0	0	0	0	0	1	0	564	588	
273	0	8	0	0	8	0	6	0	1	0	0	0	0	0	0	0	0	0	0	0	0	2	3	0	540	568	
274	0	0	0	2	71	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	66	0	2	48	190	
275	0	1	0	0	69	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	1	19	0	1	83	175	
276	0	2	0	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	13	0	0	28	46	
277	0	0	0	3	0	1	9	0	0	0	0	0	0	0	0	0	0	0	0	0	0	37	0	11	198	259	
278	0	10	0	0	13	0	0	383	1	0	0	0	0	0	0	0	0	0	0	0	1	0	2	0	2453	2863	
279	0	42	0	0	0	0	0	1	3	0	0	0	0	0	0	0	0	0	0	0	0	9	8	1	63	127	
280	0	1578	0	0	15	0	26	6	7	25	0	0	0	0	0	0	0	0	0	0	1	49	0	1	327	2035	
281	2	53	0	0	3	0	0	8	85	0	0	0	14	0	0	0	0	0	0	0	1	293	1	0	509	969	
282	0	7	0	0	7	0	0	49	2	0	0	0	10	0	0	0	0	0	0	0	0	43	0	0	279	397	
283 ^[2]	0	1	0	0	0	0	0	6	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	19	27
284	0	24	0	2	8	0	0	136	2	7	0	0	15	0	0	0	0	0	0	0	7	15	3	0	456	675	

NOAA FISHERIES SERVICE-NEFSC FALL BOTTOM TRAWL SURVEY 2015
CATCH WEIGHTS (POUNDS) OF IMPORTANT SPECIES BY HAUL

	ATLANTIC COD	HADDOCK	POLLOCK	WHITE HAKE	SILVER HAKE	REDFISH	GOOSEFISH	SPINY DOGFISH	YELLOWTAIL FLOUNDER	WINTER FLOUNDER	AMERICAN PLAICE	WITCH FLOUNDER	WINDOWPANE FLDR	SUMMER FLOUNDER	BLUEFISH	WEAKFISH	SCUP	BLACK SEA BASS	SPOT	CROAKER	BUTTERFISH	AMERICAN LOBSTER	LOLIGO	ILLEX	TOTAL OTHER ^[1]	TOTAL ALL
285	0	0	0	0	0	0	0	24	1	0	0	0	39	0	0	0	0	0	0	0	3	2	44	0	222	335
286	0	0	0	0	1	0	0	741	0	0	0	0	5	0	19	0	0	0	0	0	6	0	4	0	213	989
287 ^[2]	0	2	0	0	1	0	0	286	0	3	0	0	1	0	0	0	0	0	0	0	1	2	8	0	191	495
288	0	1	0	0	3	0	0	1077	0	33	0	0	3	0	0	0	0	0	0	0	1	21	18	0	594	1751
289	0	0	0	0	0	0	0	706	0	0	0	0	2	0	5	0	0	0	0	0	27	5	5	0	286	1036
290	0	0	0	0	6	0	0	132	0	2	0	0	10	0	0	0	0	0	0	0	0	0	35	0	1167	1352
291	0	0	0	0	5	0	0	119	0	0	0	0	21	0	0	0	0	0	0	0	8	2	7	0	425	587
292	0	1696	3	2	263	0	21	2	0	0	67	4	0	0	0	0	0	0	0	0	0	0	0	0	301	2359
293	0	79	0	10	1218	16	14	6	0	0	15	4	0	0	0	0	0	0	0	0	0	0	0	0	749	2111
294 ^[2]	0	0	0	0	1	0	0	14	0	0	0	0	1	0	0	0	0	0	0	0	0	0	7	0	100	123
295	2	1896	0	0	225	0	10	0	0	17	0	0	0	0	0	0	0	0	0	0	6	42	9	1	120	2328
296	0	607	0	0	89	0	4	0	0	0	49	192	0	0	0	0	0	0	0	0	0	2	0	0	506	1449
297	91	130	0	0	9	0	5	489	0	83	1	0	11	0	19	0	0	0	0	0	1	31	86	0	389	1345
298	0	110	0	0	0	0	0	835	1	183	0	0	11	0	0	0	0	0	0	0	7	13	6	0	1103	2269
299	1	1539	0	0	17	0	0	636	0	368	0	0	18	0	0	0	0	0	0	0	1	27	2	0	2866	15474
300	10	2680	0	0	141	0	0	126	0	12	0	0	10	0	0	0	0	0	0	0	0	18	11	0	1298	4306
301	0	3562	3	3	21	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	4	0	0	702	4297
302	19	87	0	8	365	0	51	1	0	0	2	20	0	0	0	0	0	0	0	0	0	23	0	0	294	870
303	142	232	1	4	2	0	0	0	7	11	0	0	0	0	0	0	0	0	0	0	0	26	1	0	226	652
304	7	4	0	12	703	1	69	0	0	0	0	10	0	0	0	0	0	0	0	0	0	84	0	1	96	987
305	0	2	0	6	1288	1	54	0	0	0	0	2	0	0	0	0	0	0	0	0	0	76	0	0	71	1500
306	46	1100	0	0	7	0	0	0	0	15	0	0	0	0	0	0	0	0	0	0	0	23	0	1	148	1340
307	133	3017	0	0	0	0	0	14	1	15	0	0	0	0	0	0	0	0	0	0	2	5	1	0	297	3485
308	83	2360	0	2	15	0	0	0	4	21	0	0	0	0	0	0	0	0	0	0	0	16	0	0	372	2873
309	156	891	1	0	5	0	0	70	0	11	0	0	0	0	0	0	0	0	0	0	0	11	0	0	681	1826
310	0	24	0	0	6	0	2	1350	9	0	0	0	3	0	0	0	0	0	0	0	0	27	0	0	664	2085
311	0	3	0	0	2	0	0	288	1	0	0	0	0	0	0	0	0	0	0	0	0	1	0	0	431	726
312	0	15	0	1	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	58	0	0	53	129
313	76	825	4	5	3	0	0	299	0	0	17	0	0	0	0	0	0	0	0	0	0	11	0	0	150	1390
314	27	741	67	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	50	885
315 ^[2]	11	99	4	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	4	0	1	5	124
316	14	420	0	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	8	0	1	36	481
317 ^[2]	0	81	7	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	3	0	2	10	103
318	0	77	0	0	0	0	0	0	0	0	0	1	0	0	0	0	0	0	0	0	0	2	0	0	4	84
319 ^[2]	48	233	1	2	0	0	22	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	54	360
320	34	377	46	44	28	35	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	6	0	0	153	723
321	0	4	0	10	128	0	16	2	0	0	2	0	0	0	0	0	0	0	0	0	0	13	0	2	66	243
322	0	12	0	14	125	0	35	2	0	0	2	1	0	0	0	0	0	0	0	0	0	7	0	3	51	252
323	0	118	0	28	580	20	87	25	0	0	0	0	0	0	0	0	0	0	0	0	0	13	0	11	79	961
324	38	184	261	105	142	223	0	129	0	0	1	0	0	0	0	0	0	0	0	0	0	14	0	5	87	1189
325	0	6	15	4	60	2	17	0	0	0	3	0	0	0	0	0	0	0	0	0	0	7	0	3	19	136
326	0	0	0	7	95	0	31	0	0	0	0	0	0	0	0	0	0	0	0	0	0	5	0	2	25	165
327	0	0	0	4	57	0	24	0	0	0	1	0	0	0	0	0	0	0	0	0	0	4	0	2	19	111
328	33	43	20	59	7	321	0	13	0	0	0	1	0	0	0	0	0	0	0	0	0	13	0	2	180	692

NOAA FISHERIES SERVICE-NEFSC FALL BOTTOM TRAWL SURVEY 2015
CATCH WEIGHTS (POUNDS) OF IMPORTANT SPECIES BY HAUL

	ATLANTIC COD	HADDOCK	POLLOCK	WHITE HAKE	SILVER HAKE	REDFISH	GOOSEFISH	SPINY DOGFISH	YELLOWTAIL FLOUNDER	WINTER FLOUNDER	AMERICAN PLAICE	WITCH FLOUNDER	WINDOWPANE FLDR	SUMMER FLOUNDER	BLUEFISH	WEAKFISH	SCUP	BLACK SEA BASS	SPOT	CROAKER	BUTTERFISH	AMERICAN LOBSTER	LOLIGO	ILLEX	TOTAL OTHER ^[1]	TOTAL ALL	
329	49	73	33	17	1	4	0	48	0	0	1	0	0	0	0	0	0	0	0	0	0	1	0	2	66	295	
330	32	194	9	15	0	1	0	789	0	1	1	0	0	0	0	0	0	0	0	0	1	4	0	5	100	1152	
331 ^[2]	0	12	0	8	26	0	3	8	0	0	0	0	0	0	0	0	0	0	0	0	3	9	3	2	17	91	
332	17	1	1	0	109	13	36	0	0	0	0	3	0	0	0	0	0	0	0	0	0	7	0	0	44	231	
333	19	190	11	86	369	7	18	1	0	0	4	7	0	0	0	0	0	0	0	0	0	10	0	1	117	840	
334	0	190	1	28	12	0	24	1	0	0	4	9	0	0	0	0	0	0	0	0	0	66	0	4	47	386	
335	7	153	0	11	28	7	9	12	0	2	1	54	0	0	0	0	0	0	0	0	0	36	0	1	90	411	
336	34	463	0	45	453	15	5	8	0	2	0	34	0	0	0	0	0	0	0	0	0	16	0	0	133	1208	
337	2	26	0	8	163	3008	5	2	0	0	1	9	0	0	0	0	0	0	0	0	0	1	0	0	11	3236	
338	20	1931	0	21	344	52	0	0	0	0	1	3	0	0	0	0	0	0	0	0	0	10	0	2	89	2473	
339	20	424	1	28	195	318	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	47	0	4	34	1072	
340	19	261	0	39	523	45	34	0	0	0	0	15	0	0	0	0	0	0	0	0	0	0	0	2	58	996	
341	0	165	0	22	1095	31	136	0	0	0	9	0	0	0	0	0	0	0	0	0	0	0	0	4	161	1623	
342	0	40	1	7	154	54	81	23	0	0	7	9	0	0	0	0	0	0	0	0	0	0	0	1	82	459	
343	0	3	2	69	269	46	0	51	0	0	0	0	0	0	0	0	0	0	0	0	0	8	0	1	77	526	
344	21	50	25	31	12	1231	23	11	0	0	0	4	0	0	0	0	0	0	0	0	0	0	0	1	103	1512	
345	0	32	0	8	351	2588	14	2	0	0	12	4	0	0	0	0	0	0	0	0	0	3	0	1	121	3136	
346	0	34	0	10	196	15	46	5	0	0	9	0	0	0	0	0	0	0	0	0	0	1	0	3	185	504	
347	8	49	0	12	131	332	16	2	0	0	17	7	0	0	0	0	0	0	0	0	0	0	0	0	0	215	789
348	0	61	2	10	194	55	35	0	0	0	20	7	0	0	0	0	0	0	0	0	0	0	0	1	189	574	
349	0	98	0	4	137	8	2	0	0	0	3	0	0	0	0	0	0	0	0	0	0	3	0	0	142	397	
350	0	171	0	0	157	0	0	0	0	0	24	6	0	0	0	0	0	0	0	0	0	0	0	0	0	342	700
351	0	1813	0	0	313	132	9	0	0	0	20	9	0	0	0	0	0	0	0	0	0	0	0	0	0	418	2714
352 ^[2]	88	969	0	6	10	351	3	7	0	0	2	0	0	0	0	0	0	0	0	0	0	2	2	0	189	1629	
353	62	1238	3	14	17	476	0	10	0	0	2	2	0	0	0	0	0	0	0	0	0	10	1	0	211	2046	
354	0	474	1	0	55	42	7	0	0	0	10	1	0	0	0	0	0	0	0	0	0	0	0	1	328	919	
355	0	404	0	3	306	127	1	2	0	0	0	7	0	0	0	0	0	0	0	0	0	0	0	0	0	253	1103
356	0	143	0	2	78	15	0	0	0	0	26	1	0	0	0	0	0	0	0	0	0	0	0	1	52	318	
357	0	257	0	9	238	5	22	10	0	0	35	0	0	0	0	0	0	0	0	0	0	2	0	0	315	893	
358	0	11	0	7	246	1	12	8	0	0	6	0	0	0	0	0	0	0	0	0	0	0	0	1	215	507	
359	0	17	1	32	224	5	31	4	0	0	120	3	0	0	0	0	0	0	0	0	0	0	0	2	194	633	
360	0	5	3	21	51	26	31	0	0	0	108	3	0	0	0	0	0	0	0	0	0	0	0	1	1031	1280	
361	55	1669	8	16	96	225	0	5	0	0	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	202	2277
362	6	1289	0	6	414	0	5	79	3	0	4	0	0	0	0	0	0	0	0	0	1	2	0	0	255	2064	
363	0	121	0	1	279	0	2	0	126	8	0	0	0	0	0	0	0	0	0	0	1	30	1	4	249	822	
364	0	0	0	1	320	0	0	0	1	49	0	0	4	0	0	0	0	0	0	0	0	6	25	1	502	909	
365	3	6	0	11	119	0	6	74	39	93	1	0	0	0	0	0	0	0	0	0	13	188	17	0	197	767	
366	0	0	0	4	416	0	0	7	2	100	0	0	0	3	0	0	0	0	0	0	10	639	73	0	237	1491	
367	0	0	0	18	105	0	2	0	0	36	0	0	5	6	0	0	1	0	0	0	9	19	57	1	179	438	
368	0	0	0	0	70	0	3	0	0	53	0	0	2	0	0	0	1	0	0	0	223	29	20	0	124	525	
370	0	0	0	7	200	0	1	5	9	88	0	0	21	0	0	0	0	0	0	0	137	47	36	0	245	796	
371	0	0	0	1	157	0	0	0	1	53	0	0	7	0	0	1	3	0	0	0	151	30	119	2	97	622	
372	0	1	0	2	234	0	1	0	23	32	0	0	11	0	0	0	0	0	0	0	5	155	4	0	240	708	
373	33	0	0	0	3	0	0	0	1	34	0	0	0	0	0	0	0	0	0	0	5	132	17	0	102	327	

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374	44	12	1	0	13	1	0	0	16	66	0	0	2	0	0	0	0	0	0	0	0	158	40	1	373	727	
375 ^[2]	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
376 ^[2]	15	25	1	0	4	1	0	0	33	36	0	0	1	0	0	0	0	0	0	0	1	121	12	0	79	329	
377	36	114	0	3	16	1	3	5	63	84	0	0	1	0	0	0	0	0	0	0	0	192	18	1	228	765	
378 ^[2]	0	0	0	0	0	0	0	4	1	1	0	0	0	0	0	0	0	0	0	0	0	11	0	0	3	20	
379 ^[2]	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
380	11	0	0	2	53	0	7	0	42	41	0	0	15	0	0	0	0	0	0	0	0	261	2	0	257	691	
381	141	995	5	1	25	3	0	24	100	36	0	0	0	0	0	0	0	0	0	0	0	109	1	2	121	1563	
382	0	1	0	2	12	0	2	0	2	5	19	0	5	0	0	0	0	0	0	0	0	180	0	0	104	332	
383 ^[2]	0	1	0	2	94	2	3	0	8	8	2	0	4	0	0	0	0	0	0	0	1	245	0	1	264	635	
384 ^[2]	0	0	0	1	63	6	1	0	9	5	1	0	5	0	0	0	0	0	0	0	0	286	0	0	340	717	
385	4	1	0	2	30	0	12	0	23	6	0	0	0	0	0	0	0	0	0	0	34	245	22	1	303	683	
386	1	0	0	0	1	0	0	0	5	3	0	0	0	0	0	0	2	0	0	0	2	44	4	0	311	373	
387	22	9	14	8	283	37	12	80	0	0	62	11	0	0	0	0	0	0	0	0	0	0	0	5	250	793	
388	0	58	0	21	50	22	18	0	0	0	188	6	0	0	0	0	0	0	0	0	0	0	0	0	0	174	537
389	0	291	5	15	88	4	10	13	0	0	51	0	0	0	0	0	0	0	0	0	0	0	0	0	0	102	579
390	6	95	29	19	67	285	3	55	0	0	5	6	0	0	0	0	0	0	0	0	0	0	0	1	138	709	
391	16	77	0	23	39	386	9	10	0	0	40	36	0	0	0	0	0	0	0	0	0	0	0	0	0	186	822
392	0	9	0	10	122	203	27	13	0	0	126	2	0	0	0	0	0	0	0	0	0	0	0	3	197	712	
393	0	20	0	31	183	207	3	232	0	0	6	7	0	0	0	0	0	0	0	0	0	0	0	2	77	768	
394	0	114	27	26	147	120	12	26	0	0	13	1	0	0	0	0	0	0	0	0	0	0	0	2	69	557	
395	0	104	1	31	282	403	84	0	0	0	61	5	0	0	0	0	0	0	0	0	0	0	0	7	135	1113	
396	0	3	0	13	317	11	15	8	0	0	56	4	0	0	0	0	0	0	0	0	0	0	0	0	0	125	552
397	0	1	0	24	178	9	10	4	0	0	18	1	0	0	0	0	0	0	0	0	0	0	0	1	170	416	
398	0	173	1	13	115	9	32	44	0	0	30	1	0	0	0	0	0	0	0	0	0	0	0	1	149	568	
399	0	128	0	29	121	13	41	28	0	0	25	2	0	0	0	0	0	0	0	0	0	0	0	2	64	453	
400	0	3	0	18	126	51	58	7	0	0	10	1	0	0	0	0	0	0	0	0	0	0	0	3	144	421	
401	0	92	0	14	91	18	16	0	0	0	22	6	0	0	0	0	0	0	0	0	0	0	0	4	137	400	
402	0	120	9	31	173	5	36	3	0	0	4	0	0	0	0	0	0	0	0	0	0	0	0	4	55	440	
403	0	14	1	69	349	10	21	7	0	0	10	12	0	0	0	0	0	0	0	0	0	2	0	2	182	679	
404	0	6	1	59	565	15	15	12	0	0	6	9	0	0	0	0	0	0	0	0	0	0	0	2	78	768	
405	0	1	0	106	236	0	38	0	0	1	12	1	0	0	0	0	0	0	0	0	0	61	0	1	91	548	
406	0	0	0	20	17	0	16	0	0	4	5	18	0	0	0	0	0	0	0	0	0	187	0	0	33	300	
407	0	1	0	17	43	0	0	0	1	4	1	1	0	0	0	0	0	0	0	0	1	447	0	1	21	538	
408	0	2	1	13	67	0	1	0	1	13	1	0	0	0	0	0	0	0	0	0	1	489	3	1	216	809	
409	0	1	0	32	255	0	2	0	0	8	2	0	0	0	0	0	0	0	0	0	3	642	2	3	119	1069	
410 ^[2]	0	0	0	14	67	0	0	0	0	1	0	0	0	0	0	0	0	0	0	0	0	154	0	0	16	252	
411	0	0	0	22	142	0	2	0	0	1	2	0	0	0	0	0	0	0	0	0	0	255	0	1	23	448	
412	0	0	0	8	76	23	27	0	0	0	19	7	0	0	0	0	0	0	0	0	0	10	0	0	132	302	
413	1	11	0	13	1301	0	16	4	0	0	3	3	0	0	0	0	0	0	0	0	0	7	0	1	135	1495	
414	0	1	0	13	292	0	12	10	0	0	8	7	0	0	0	0	0	0	0	0	0	40	0	0	127	510	
415	4	1	0	6	341	9	17	4	0	1	2	1	0	0	0	0	0	0	0	0	1	46	0	3	141	577	
416	0	0	0	10	136	0	22	9	0	0	4	7	0	0	0	0	0	0	0	0	1	9	0	2	55	255	

NOAA FISHERIES SERVICE-NEFSC FALL BOTTOM TRAWL SURVEY 2015
CATCH WEIGHTS (POUNDS) OF IMPORTANT SPECIES BY HAUL

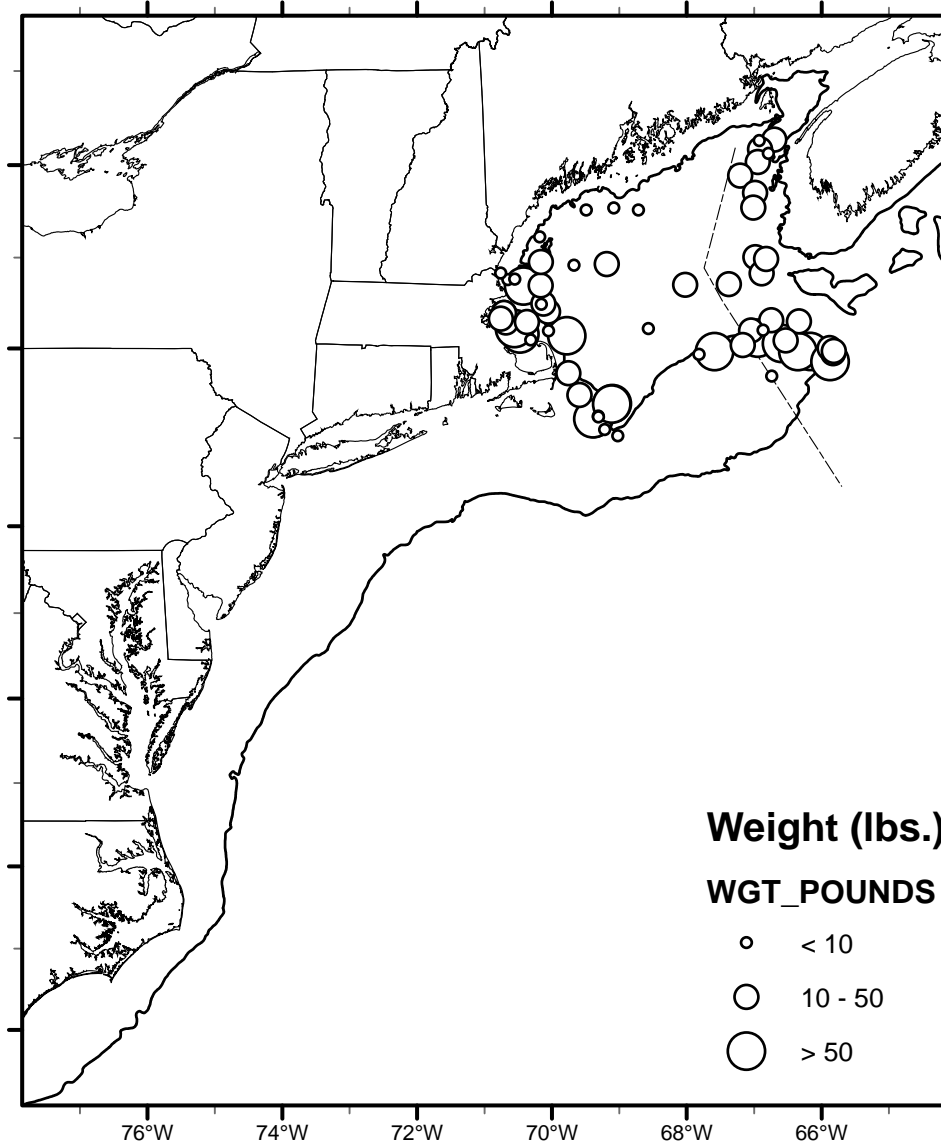
	ATLANTIC COD	HADDOCK	POLLOCK	WHITE HAKE	SILVER HAKE	REDFISH	GOOSEFISH	SPINY DOGFISH	YELLOWTAIL FLOUNDER	WINTER FLOUNDER	AMERICAN PLAICE	WITCH FLOUNDER	WINDOWPANE FLDR	SUMMER FLOUNDER	BLUEFISH	WEAKFISH	SCUP	BLACK SEA BASS	SPOT	CROAKER	BUTTERFISH	AMERICAN LOBSTER	LOLIGO	ILLEX	TOTAL OTHER ^[1]	TOTAL ALL	
417	2	0	1	7	198	2	8	0	0	0	15	14	0	0	0	0	0	0	0	0	0	9	0	2	99	357	
418	0	0	0	20	36	0	1	0	0	1	8	0	0	0	0	0	0	0	0	0	0	59	0	0	26	151	
419	0	0	0	9	116	0	21	15	0	0	21	6	0	0	0	0	0	0	0	0	0	2	0	0	101	291	
420	0	186	0	9	92	15	53	19	0	0	78	7	0	0	0	0	0	0	0	0	0	0	0	1	173	633	
421 ^[2]	0	0	0	4	49	0	12	25	2	2	5	2	0	0	0	0	0	0	0	0	0	173	0	2	51	327	
422	1	581	0	1	461	8	17	42	0	0	45	4	0	0	0	0	0	0	0	0	13	2	0	6	187	1368	
423	3	332	0	9	61	3	50	21	27	4	38	2	1	0	0	0	0	0	0	0	1	62	1	0	68	683	
424	22	143	9	13	89	11	2	99	0	0	10	9	0	0	0	0	0	0	0	0	5	3	1	1	128	545	
425	0	4	0	6	91	9	13	46	0	0	77	0	0	0	0	0	0	0	0	0	1	0	0	0	103	350	
426 ^[2]	44	194	1	0	7	0	0	26	0	22	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	12	308
427	3	673	0	17	49	53	61	889	0	2	33	15	0	0	0	0	0	0	0	0	0	0	0	2	271	2068	
428	45	1010	79	3	106	0	39	1547	5	13	3	0	0	0	0	0	0	0	0	0	0	0	3	7	653	3513	
429	15	106	0	5	10	3	2	18	2	5	78	2	0	0	0	0	0	0	0	0	0	2	0	0	95	343	
430	141	1	1	0	1	0	0	9	45	131	2	0	3	0	0	0	0	0	0	0	57	84	10	0	216	701	
431	1465	15	0	7	123	16	5	48	29	108	3	0	5	0	0	0	0	0	0	0	9	63	11	0	175	2082	
432	0	0	0	0	6	1	0	0	0	25	0	0	3	0	0	0	19	0	0	0	503	13	27	0	105	702	
TOTAL	3767	45569	725	1849	23652	11834	3126	42543	778	2435	1843	650	508	1444	207	260	6682	575	1956	7953	16635	8010	6906	949	83732	284587	

^[1]"Total others" in southern areas are comprised primarily of rays, large sharks and spotted hake.

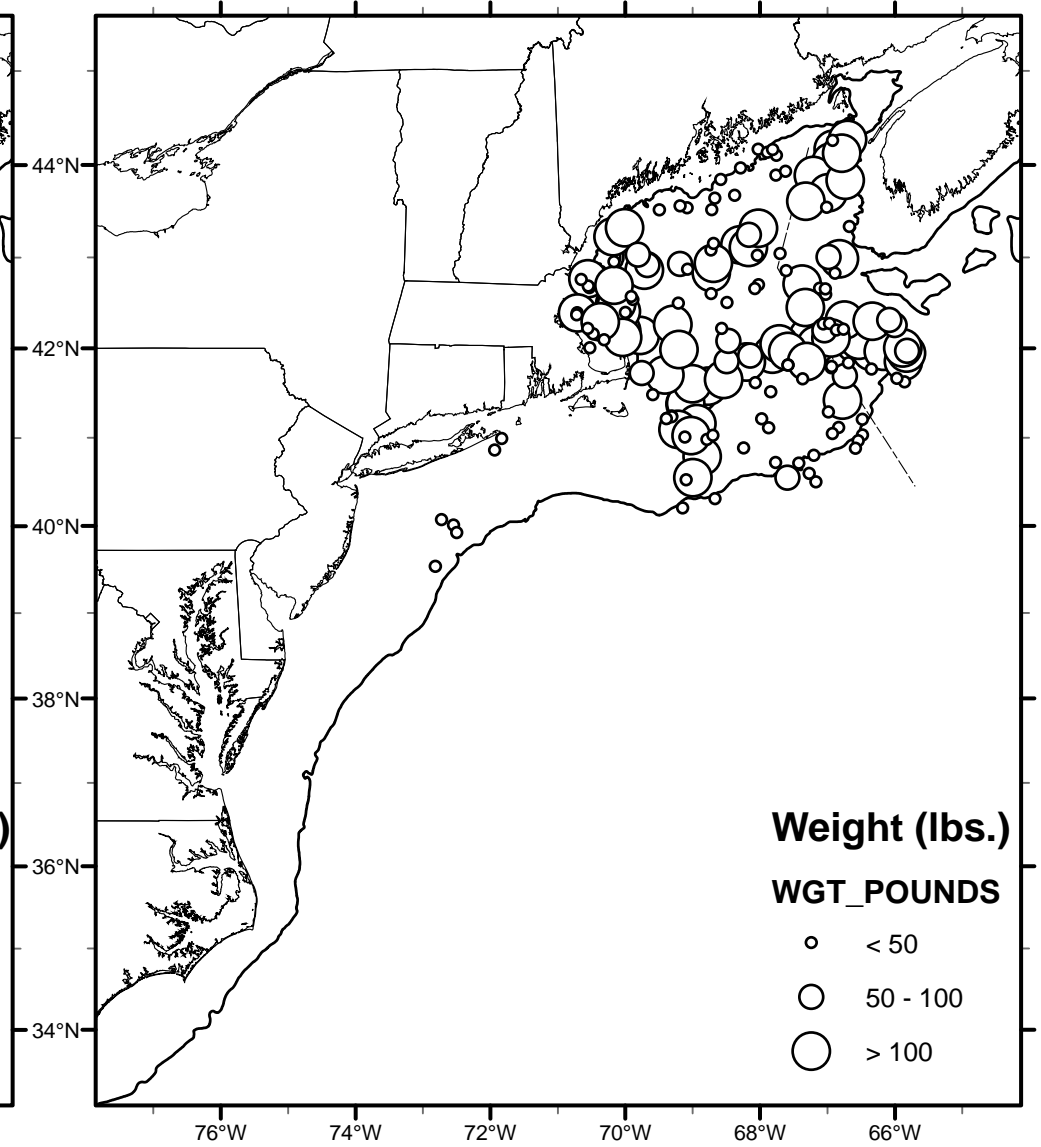
^[2] Excluded from stock assessment due to an unacceptable tow evaluation code.

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ATLANTIC COD

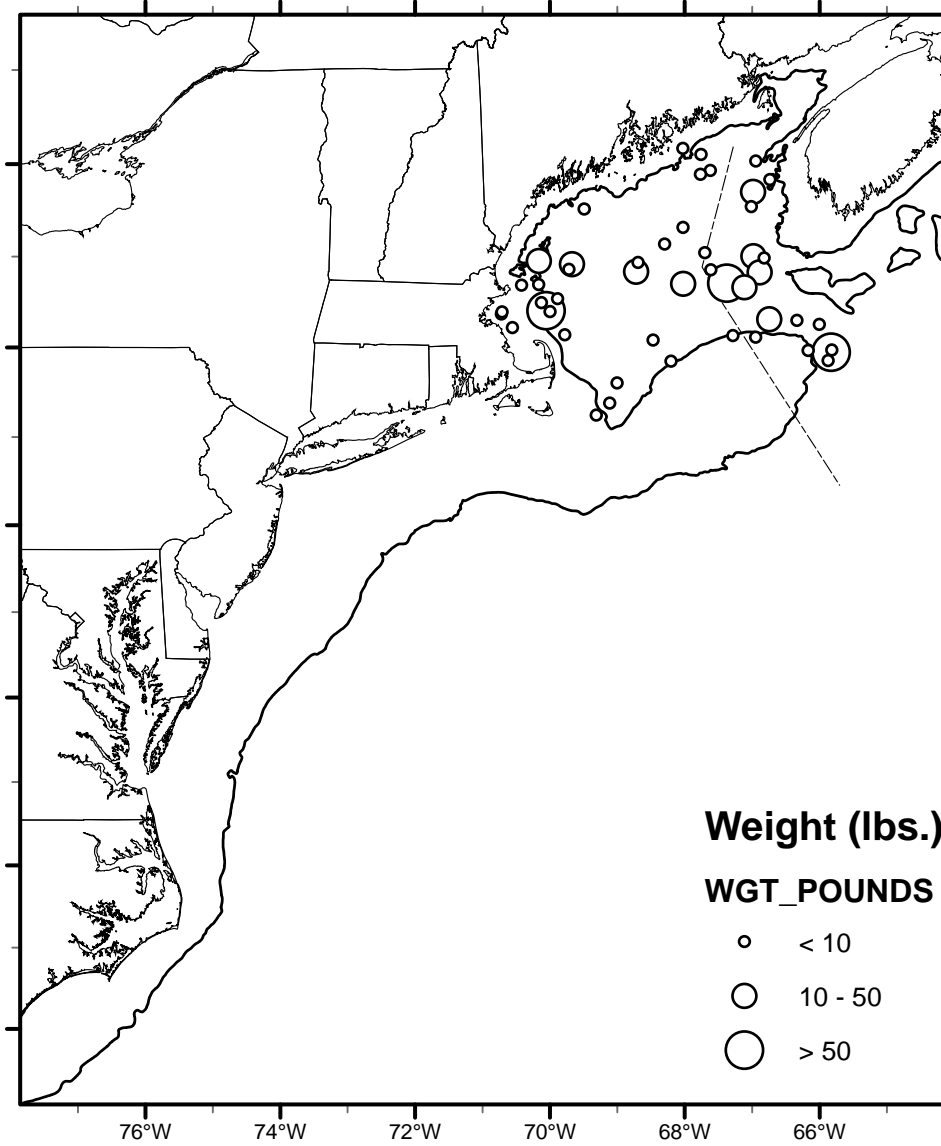


HADDOCK

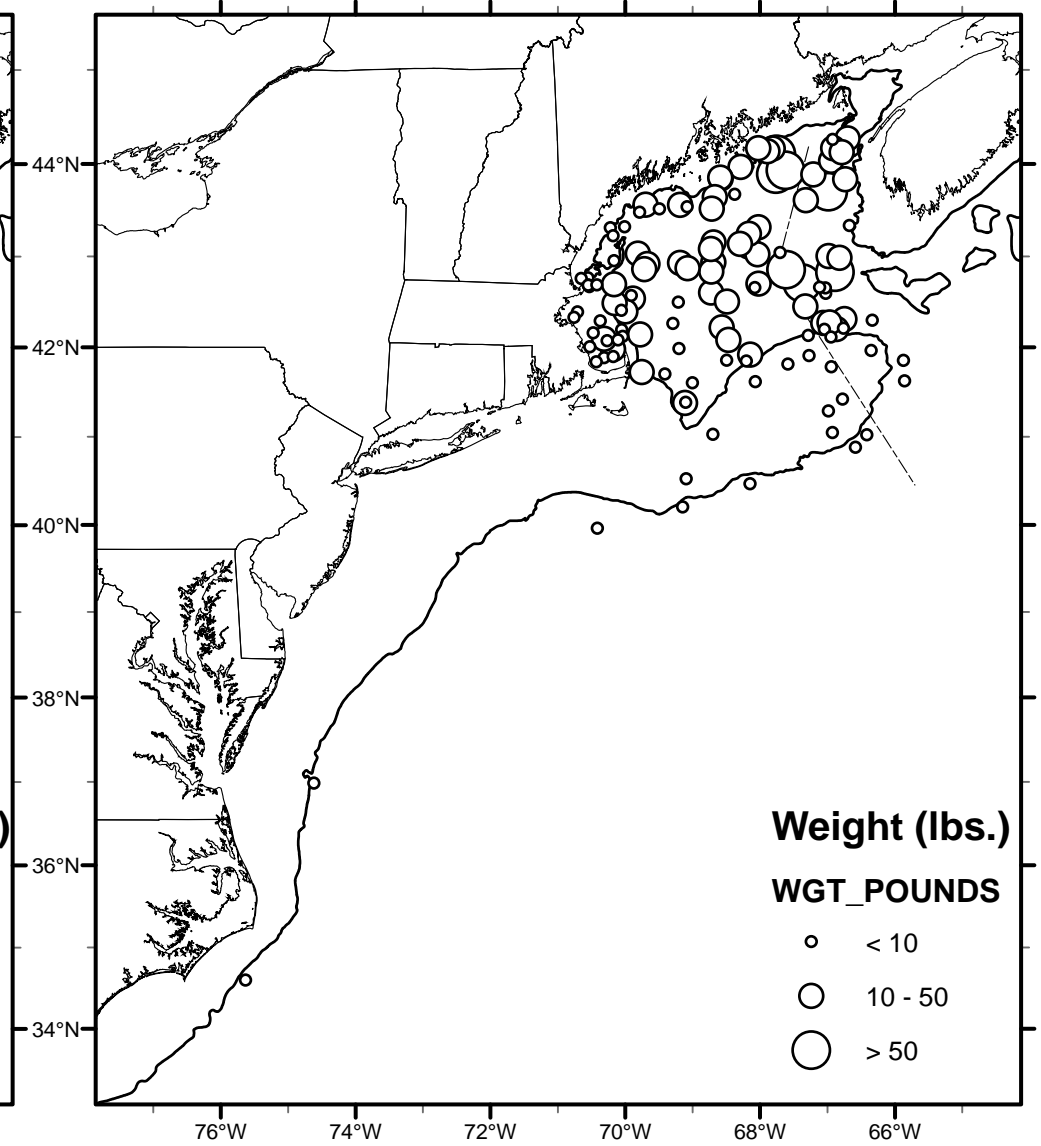


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POLLOCK

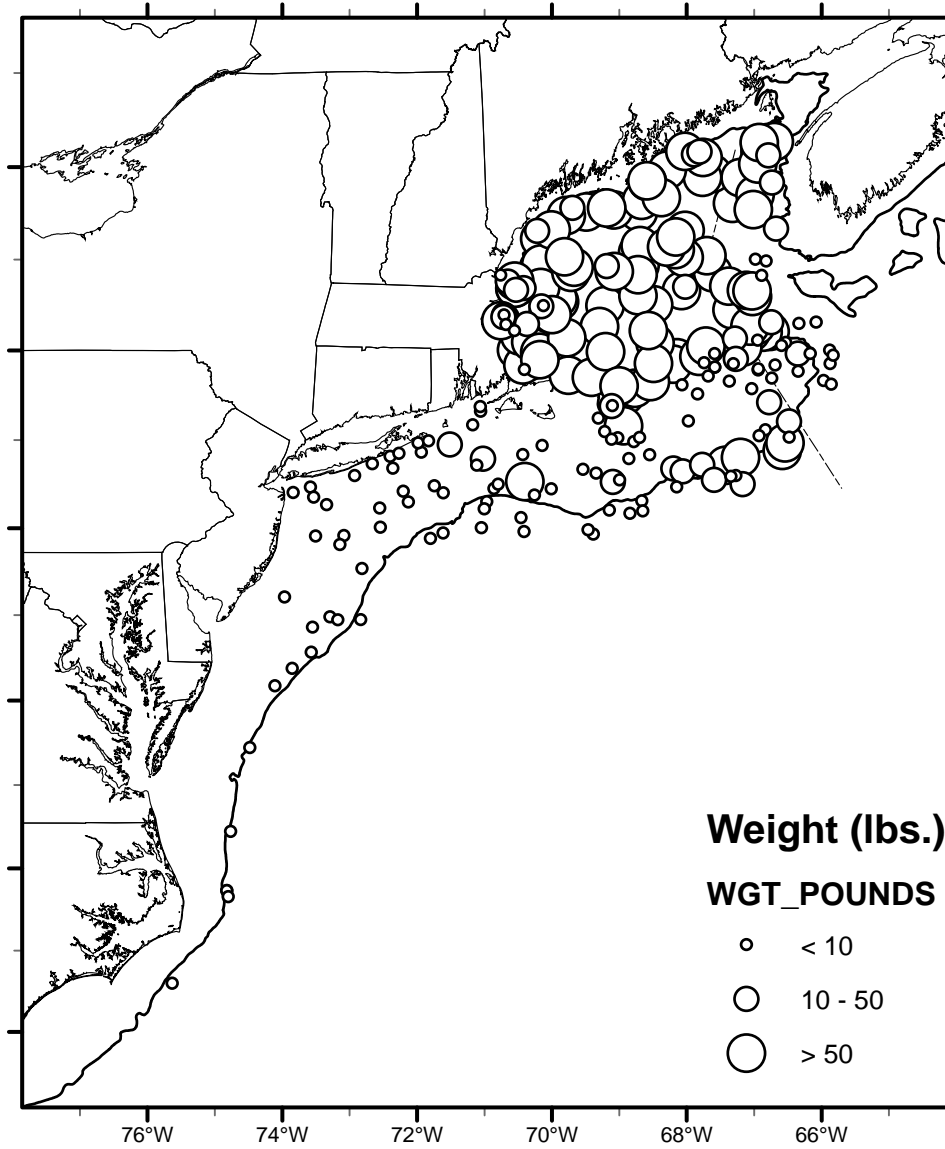


WHITE HAKE

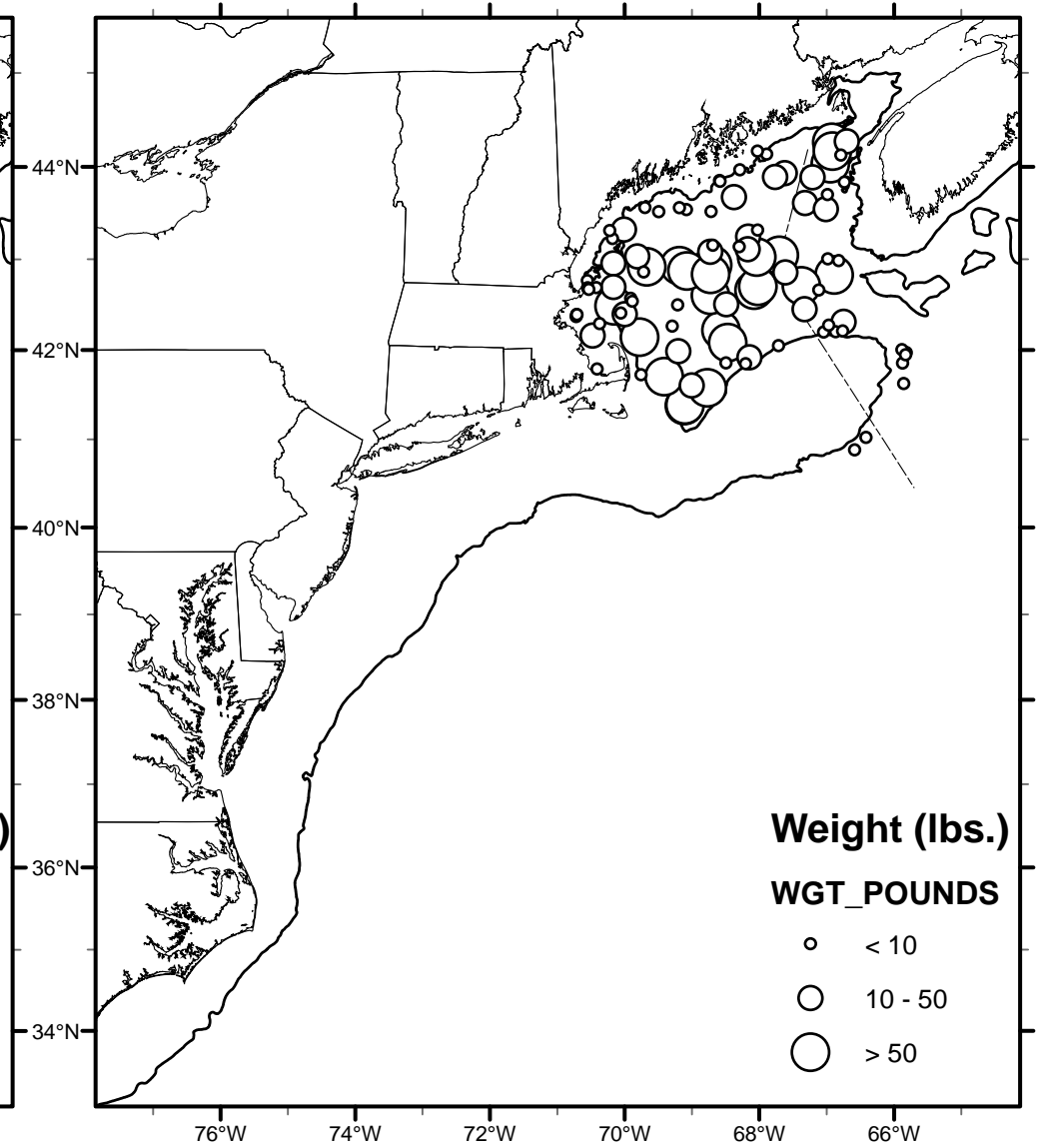


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SILVER HAKE

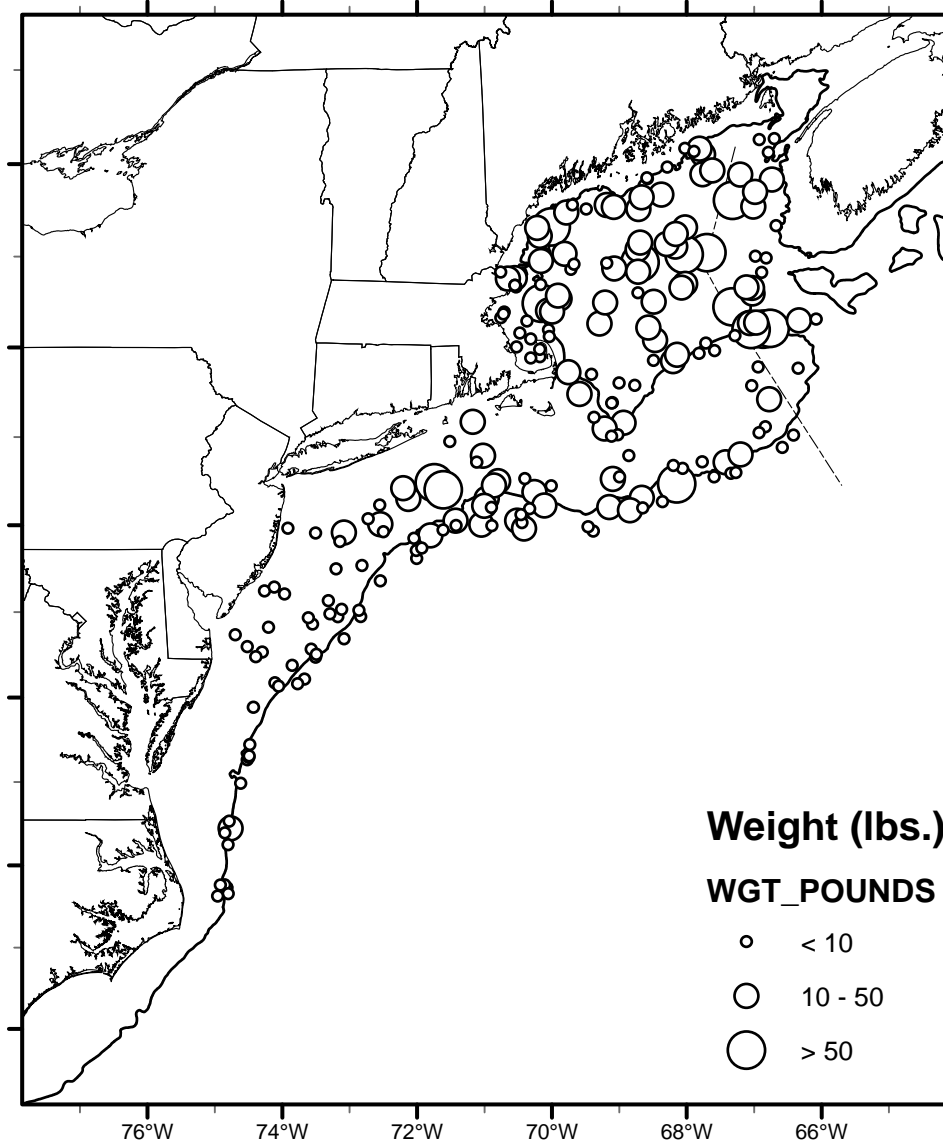


ACADIAN REDFISH

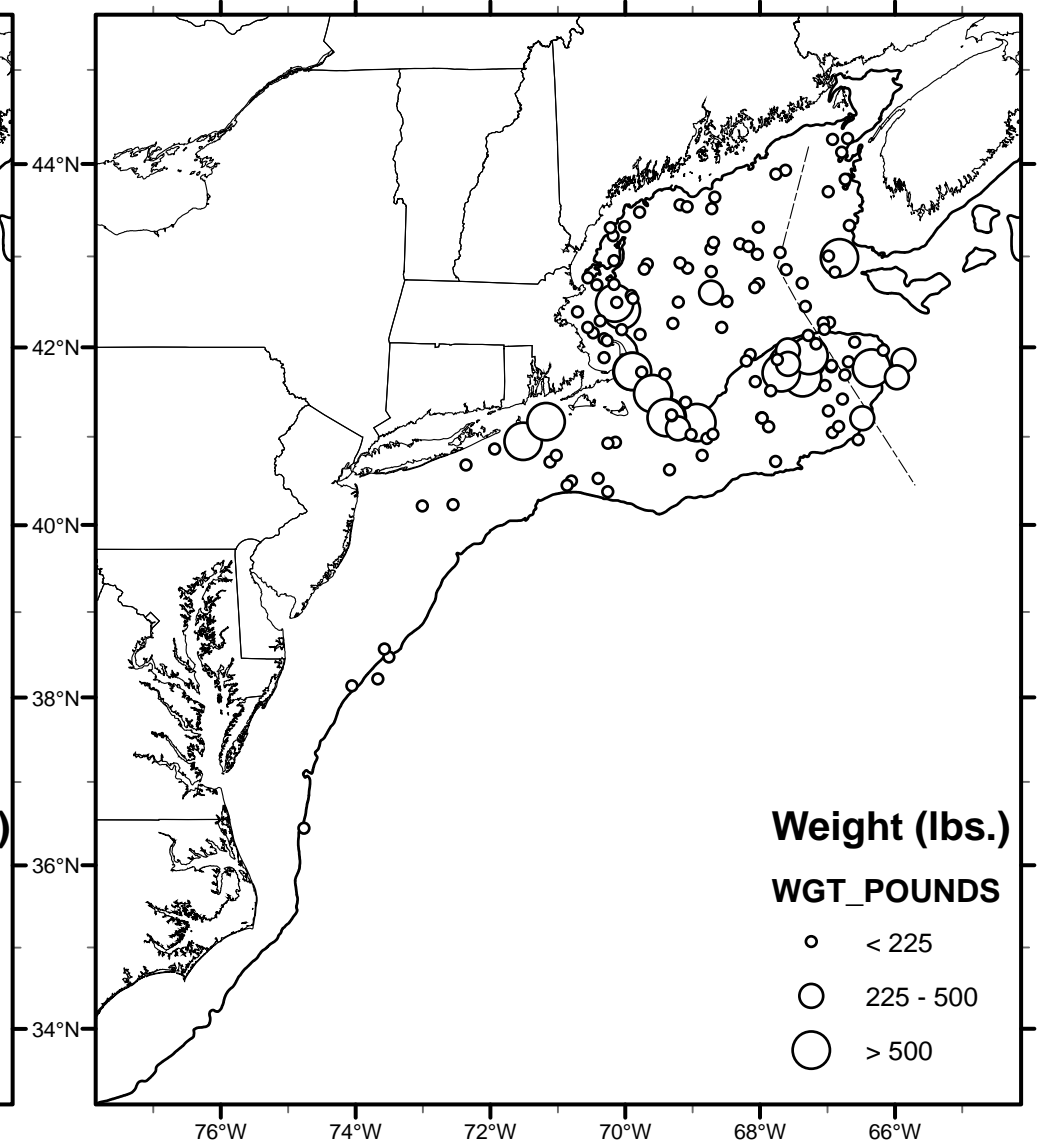


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GOOSEFISH

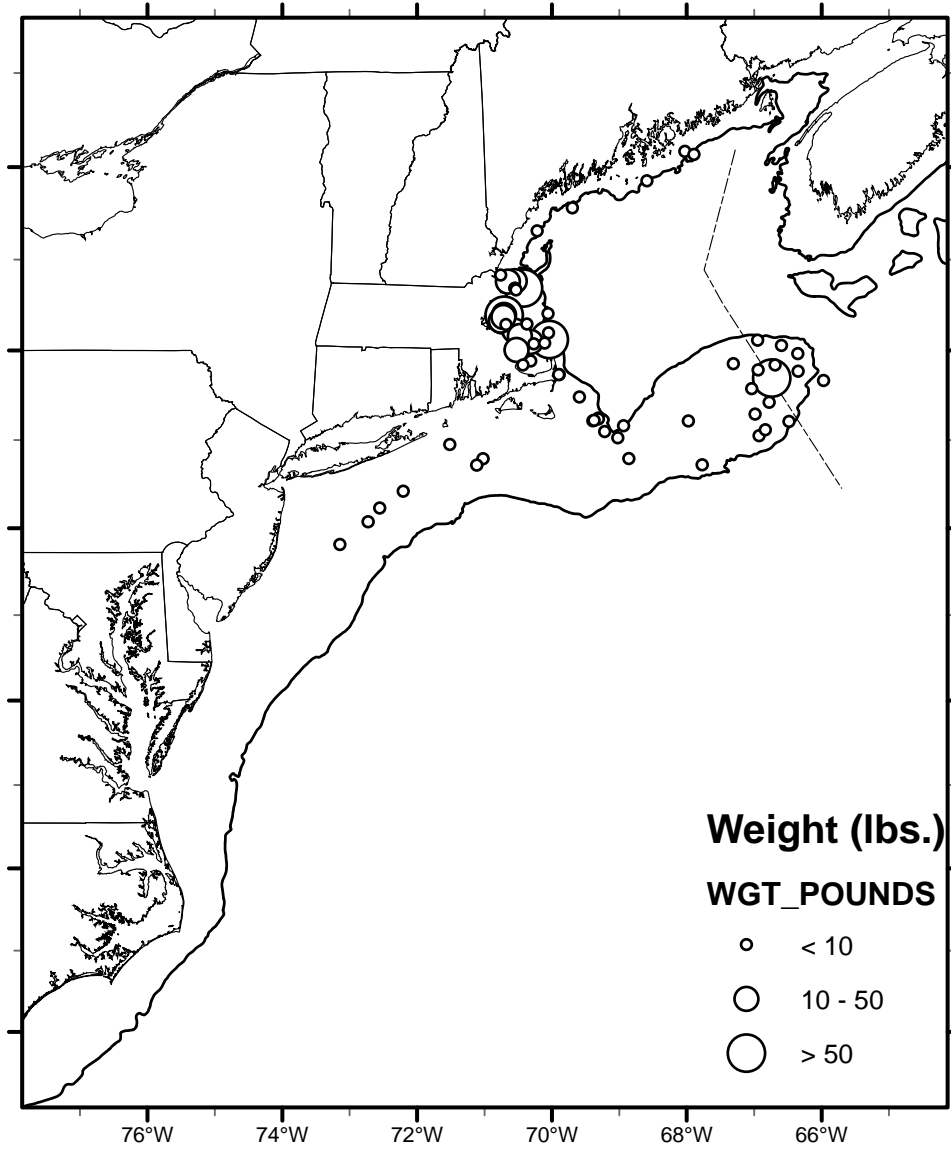


SPINY DOGFISH

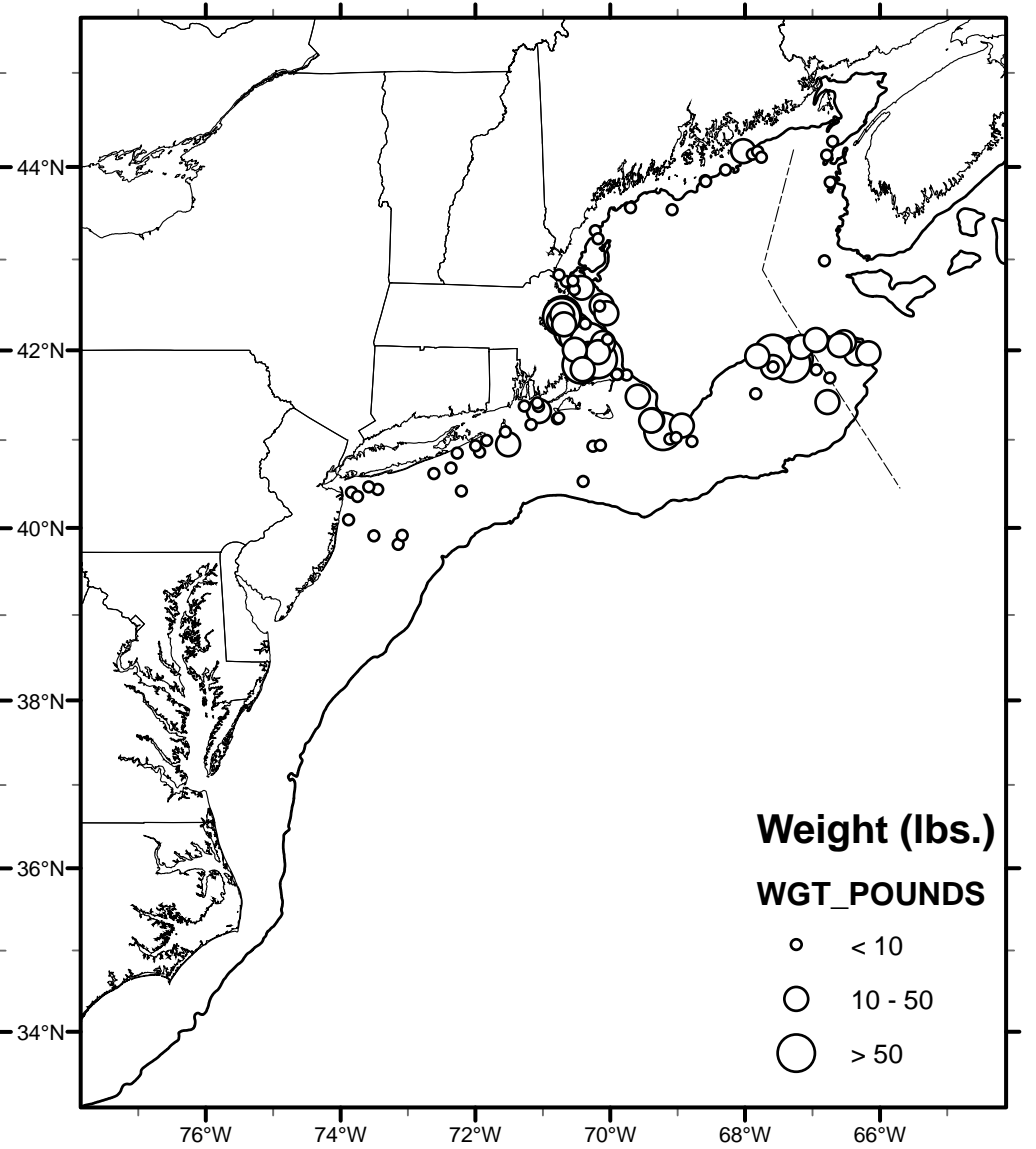


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YELLOWTAIL FLOUNDER

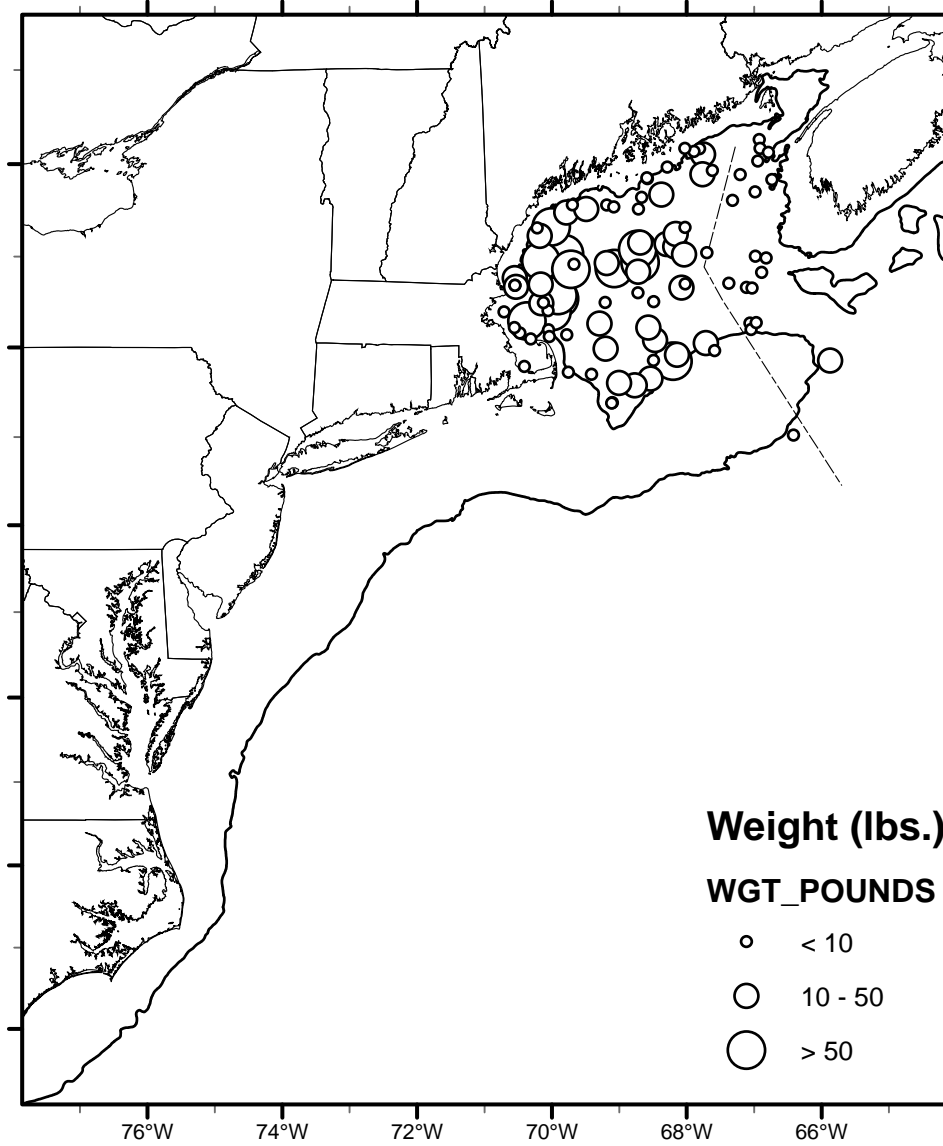


WINTER FLOUNDER

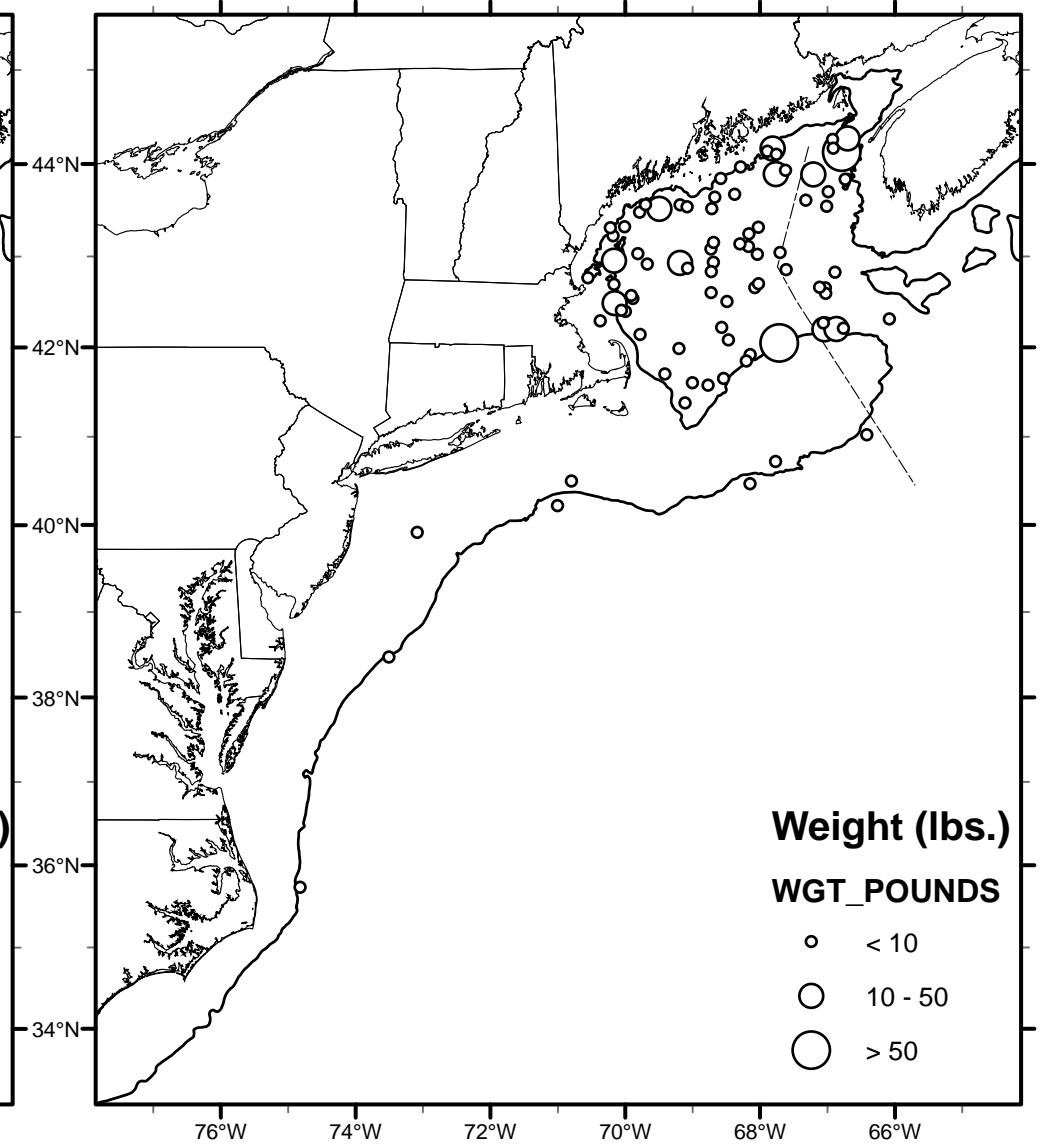


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AMERICAN PLAICE

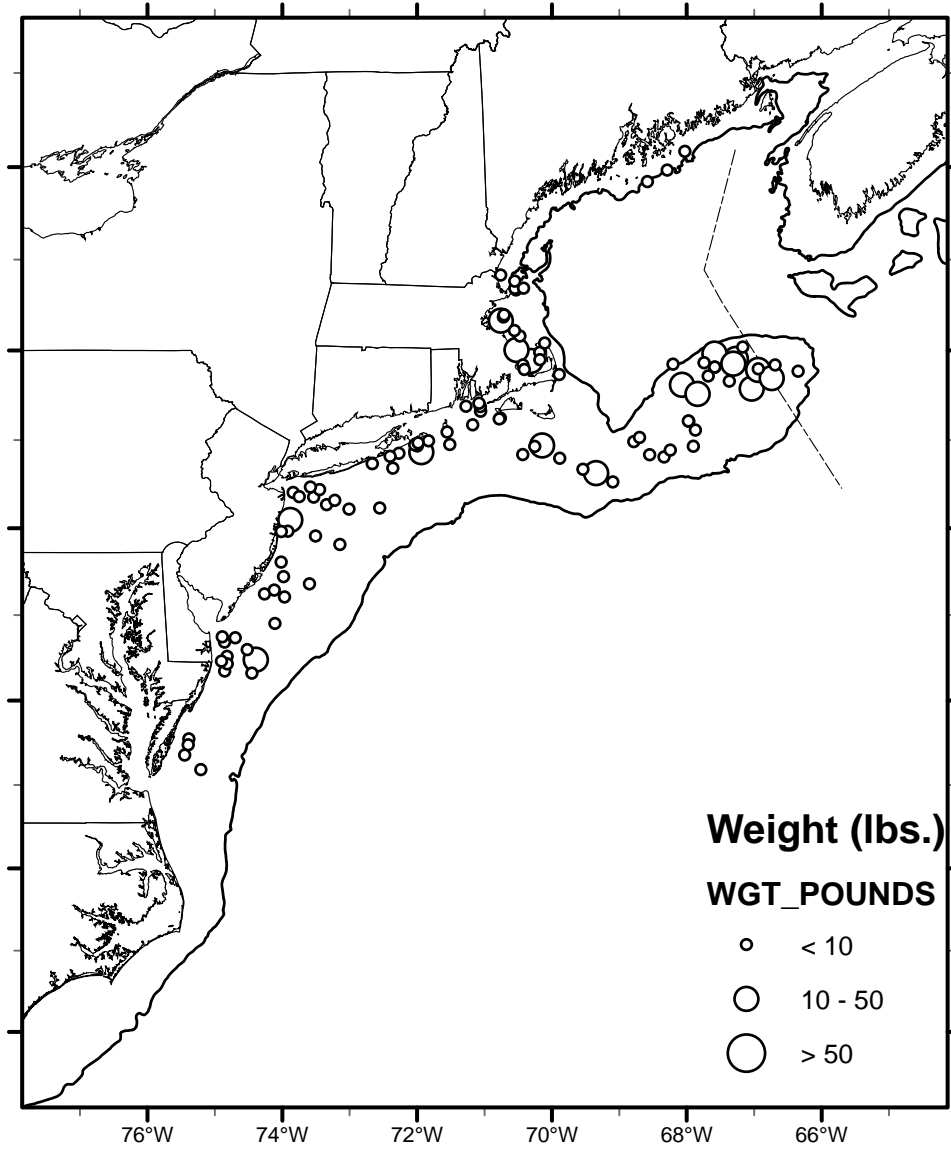


WITCH FLOUNDER

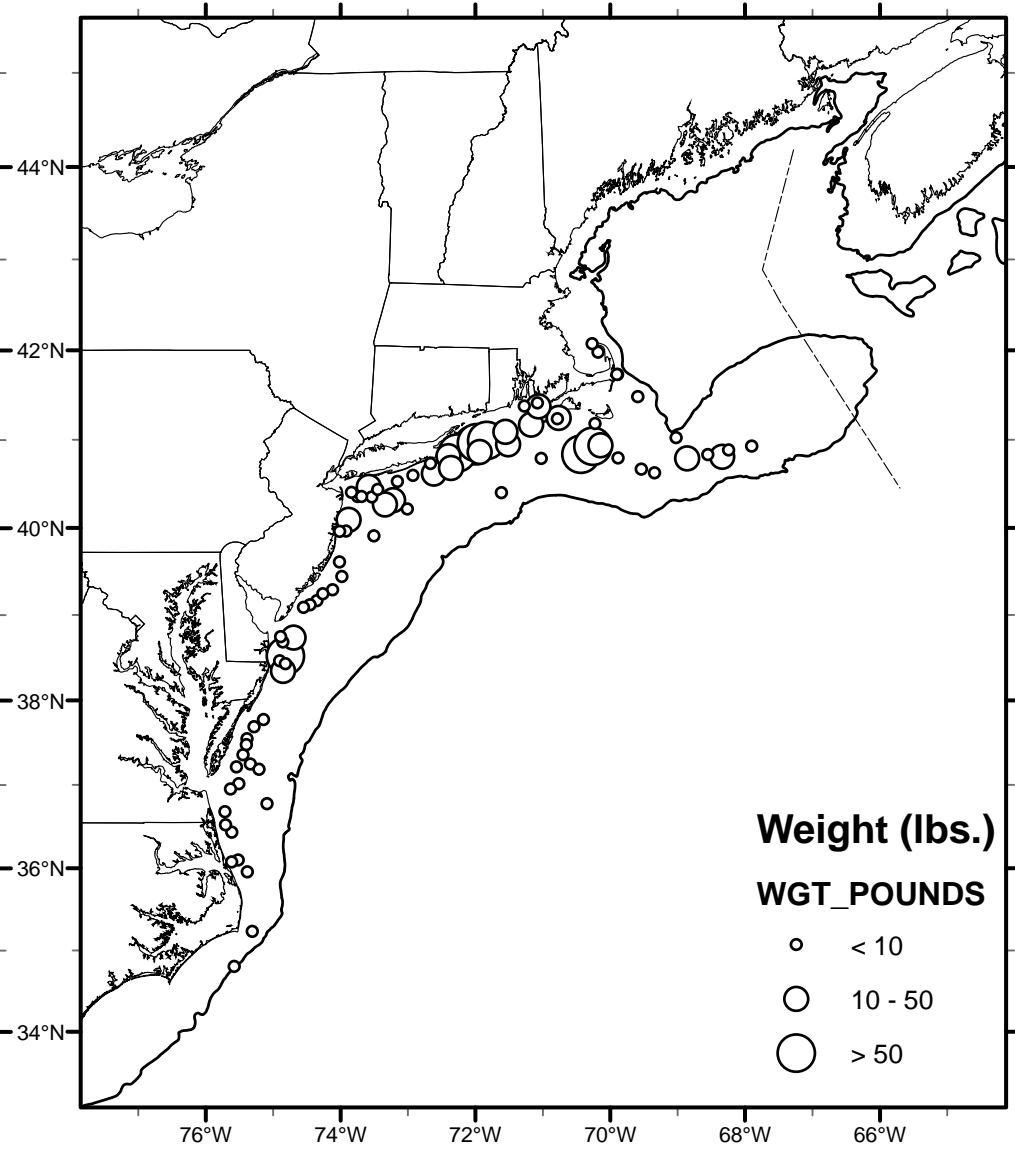


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WINDOWPANE FLOUNDER

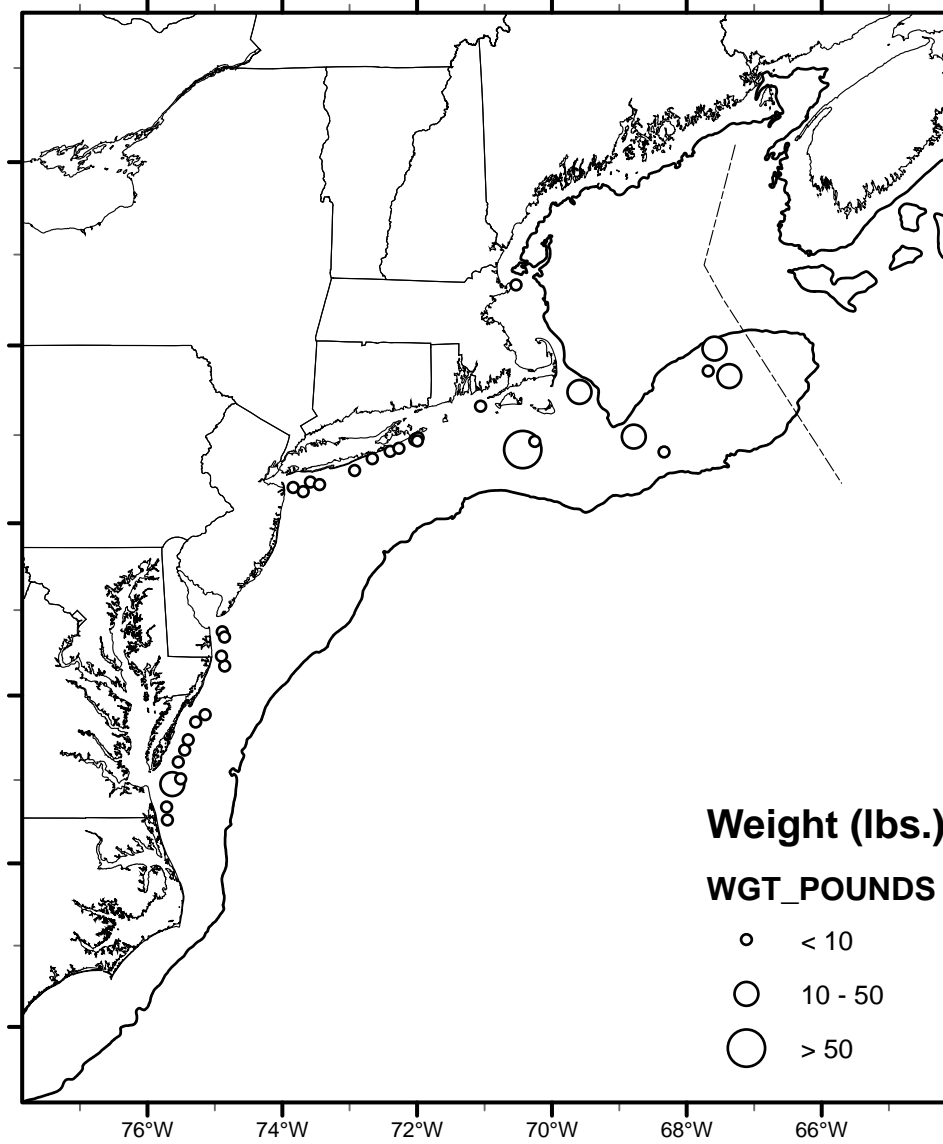


SUMMER FLOUNDER

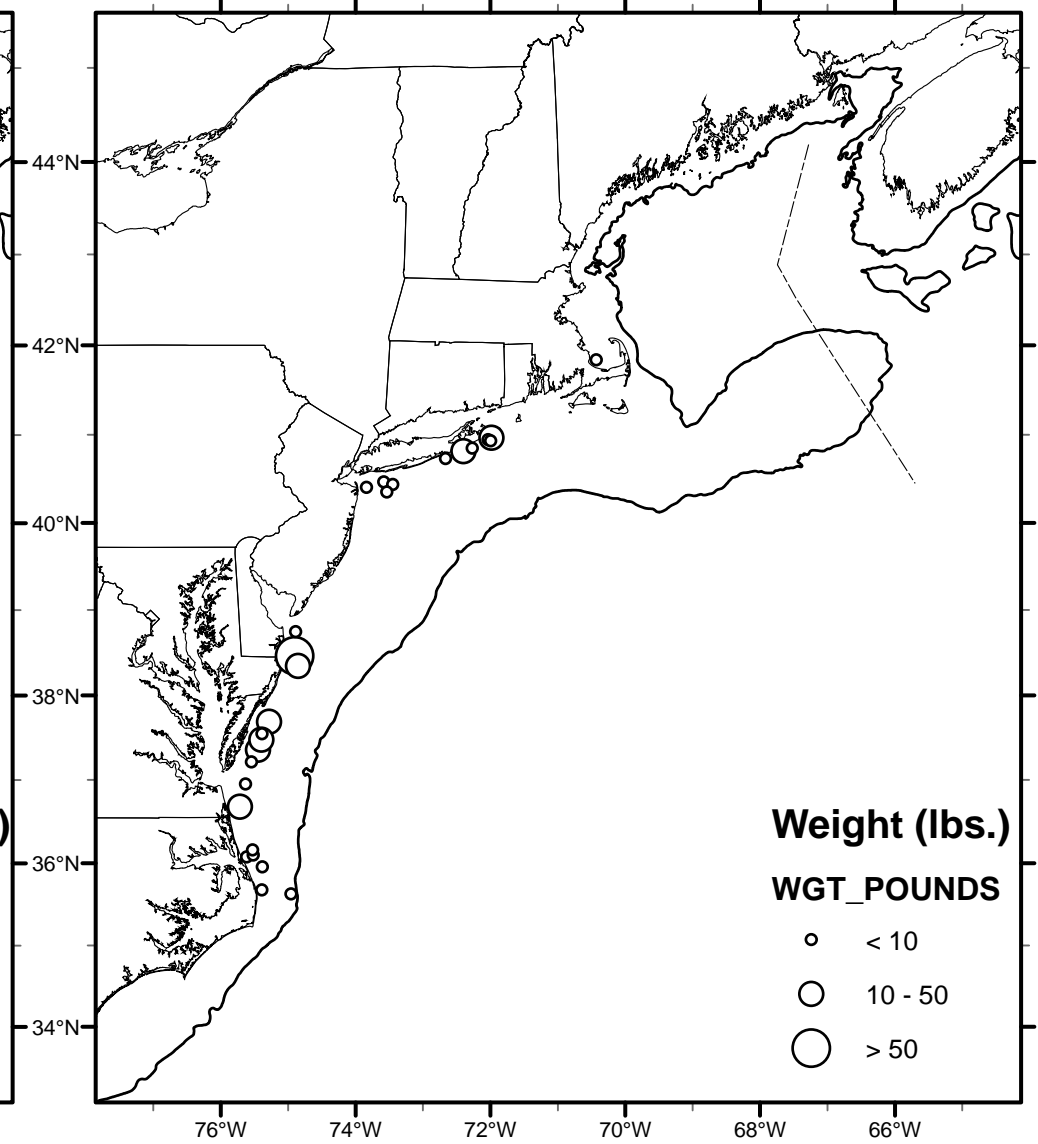


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BLUEFISH

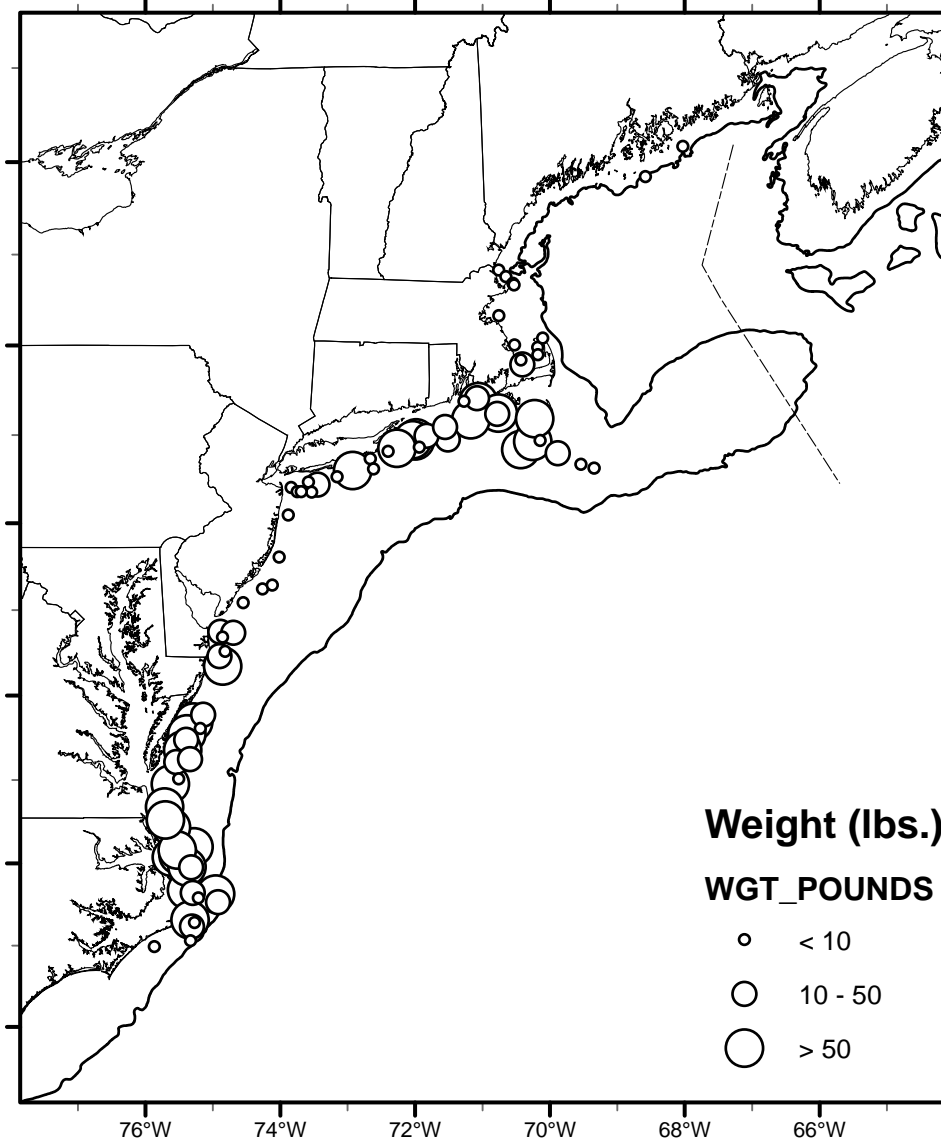


WEAKFISH

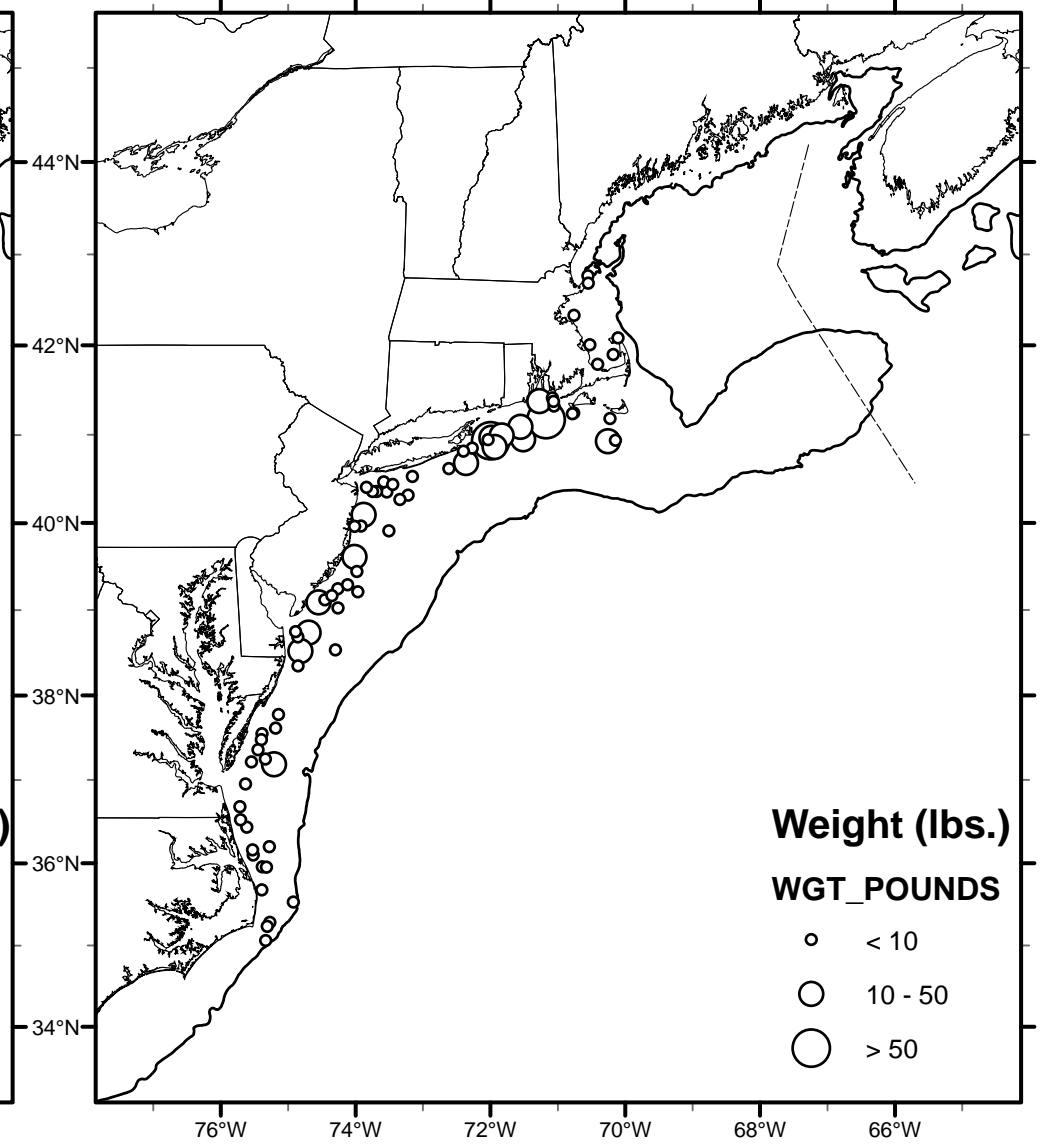


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SCUP

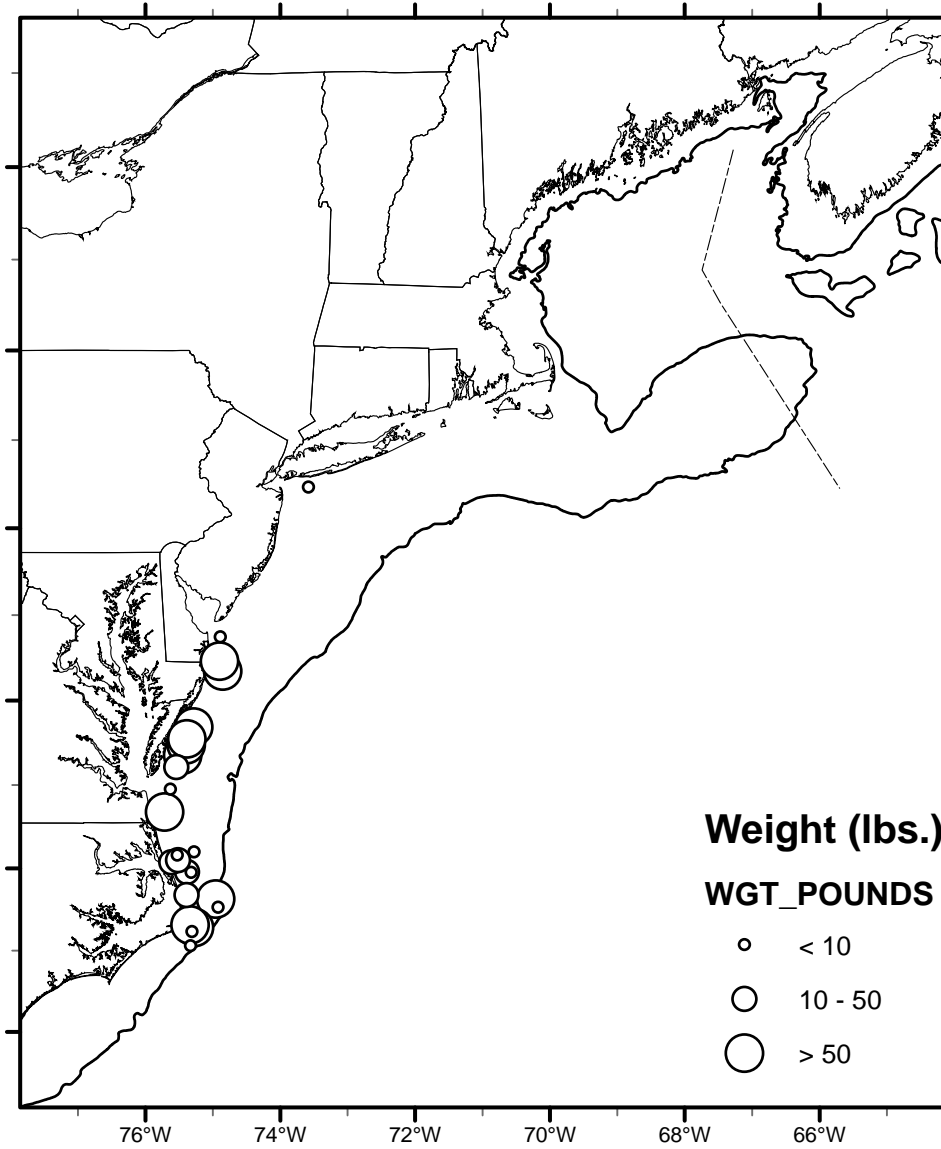


BLACK SEA BASS

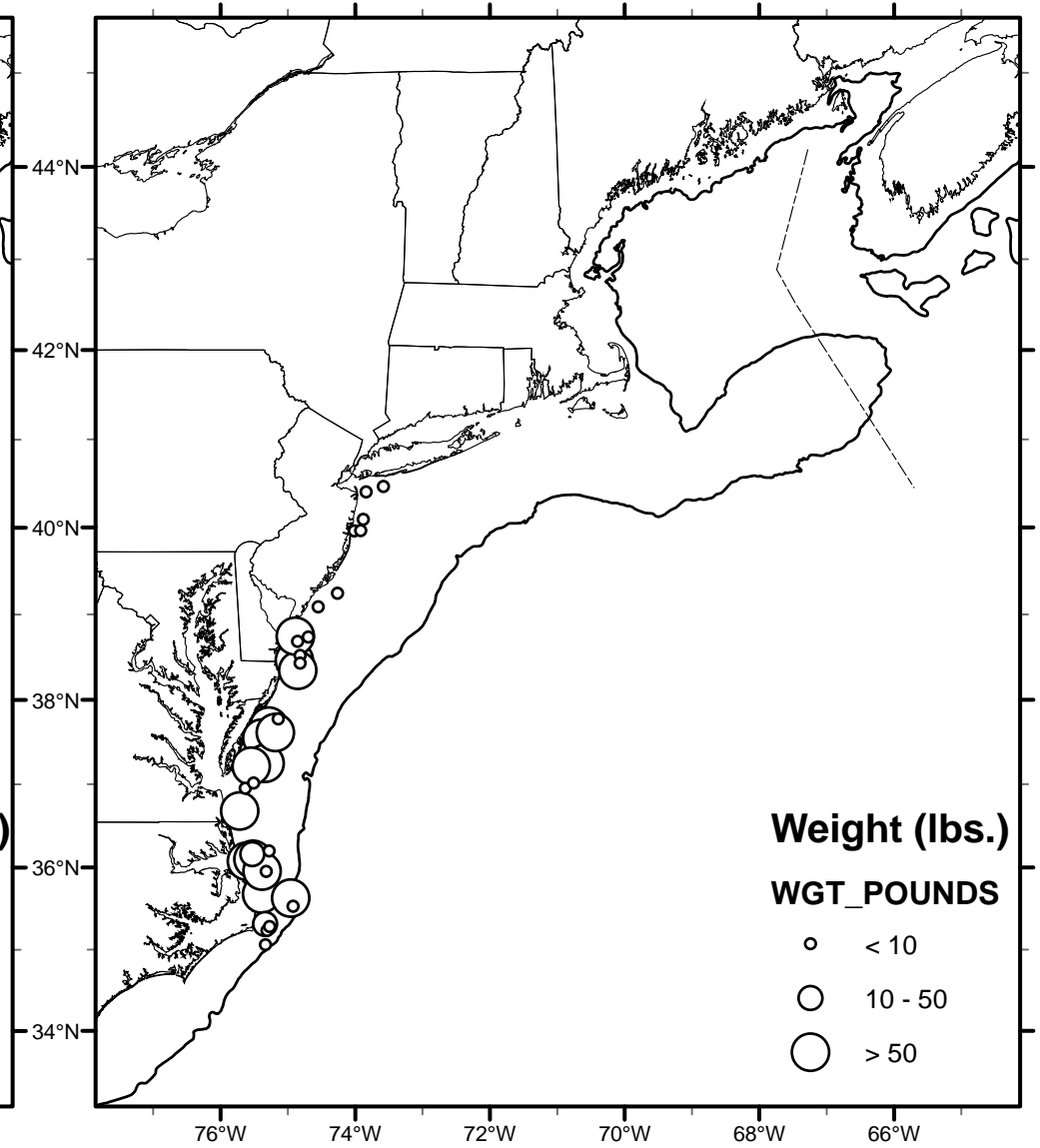


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SPOT

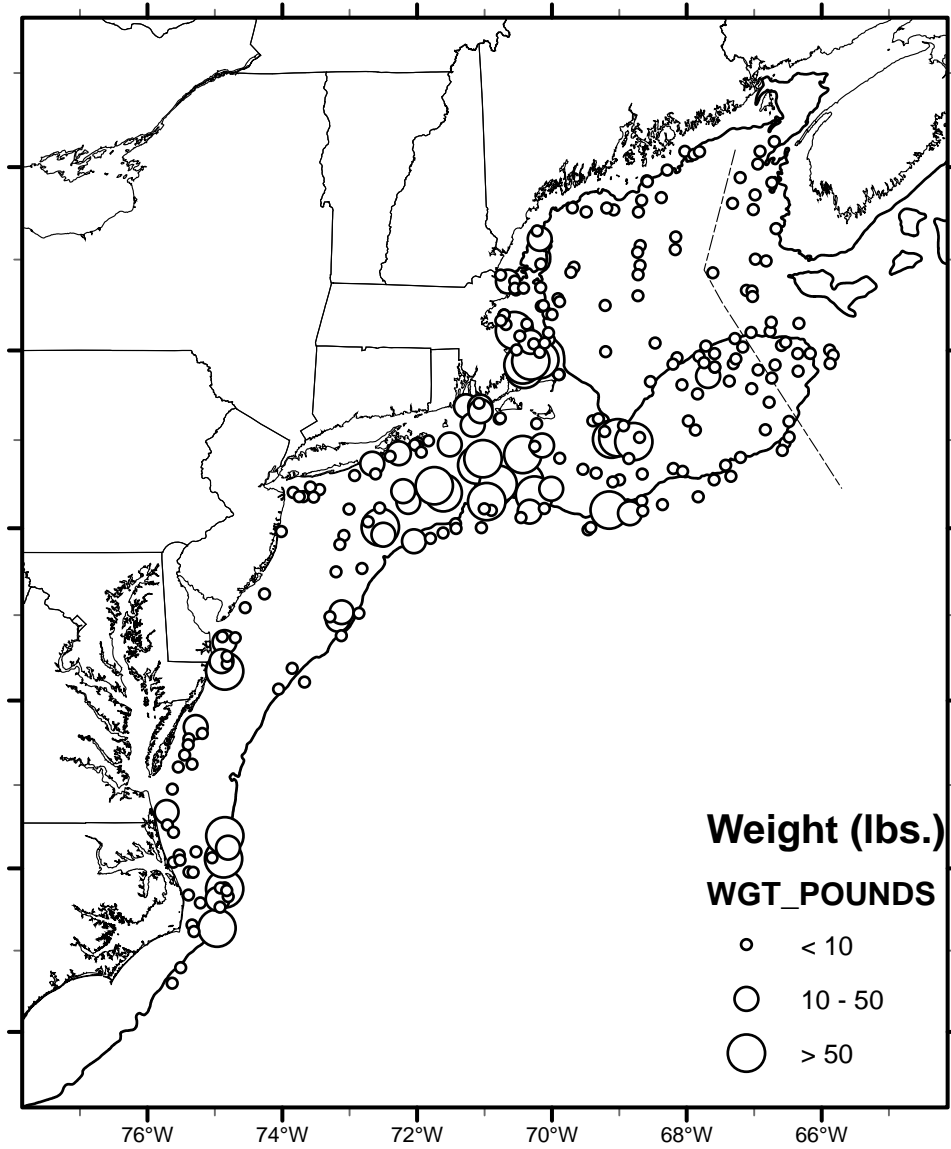


ATLANTIC CROAKER

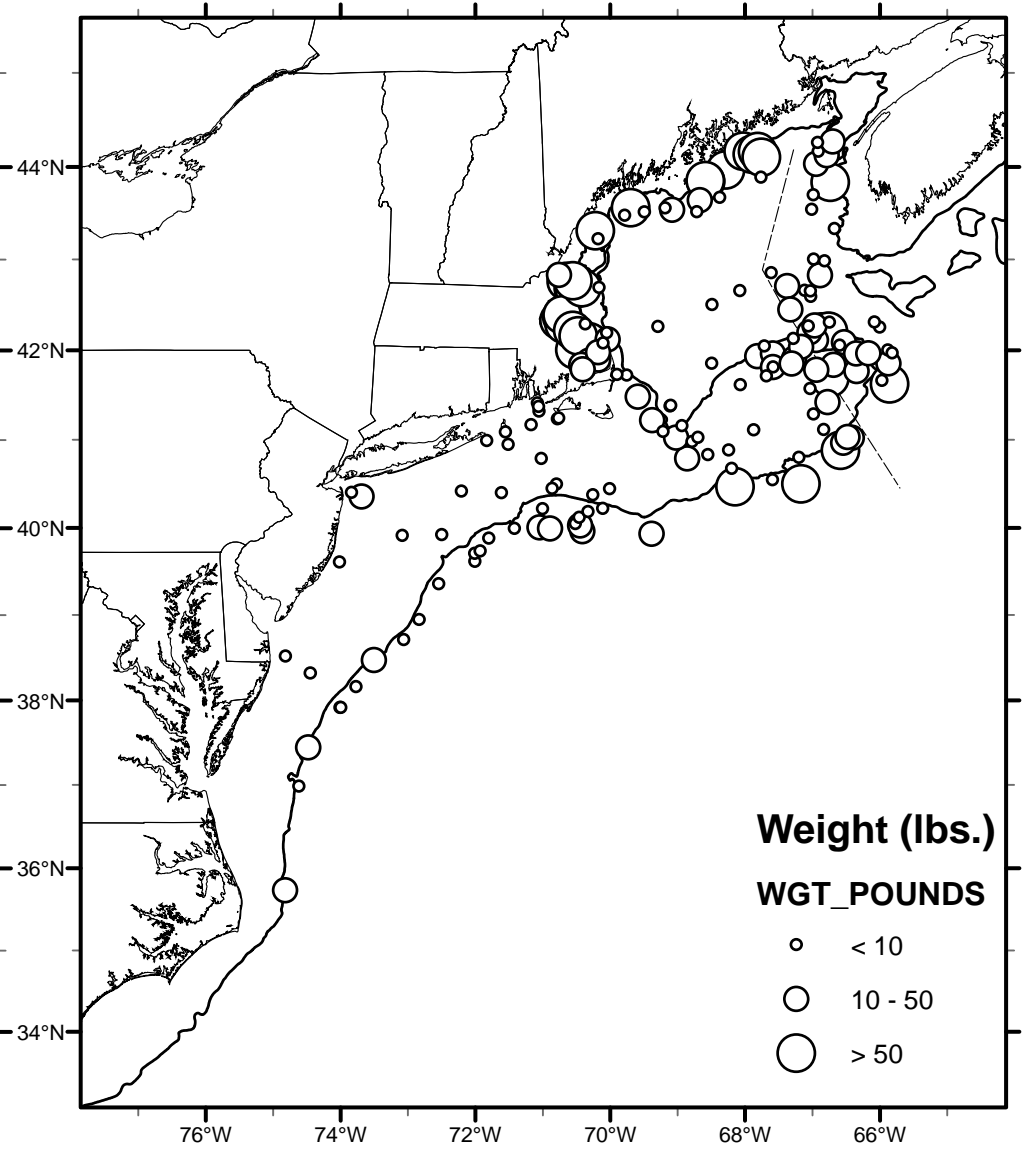


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BUTTERFISH

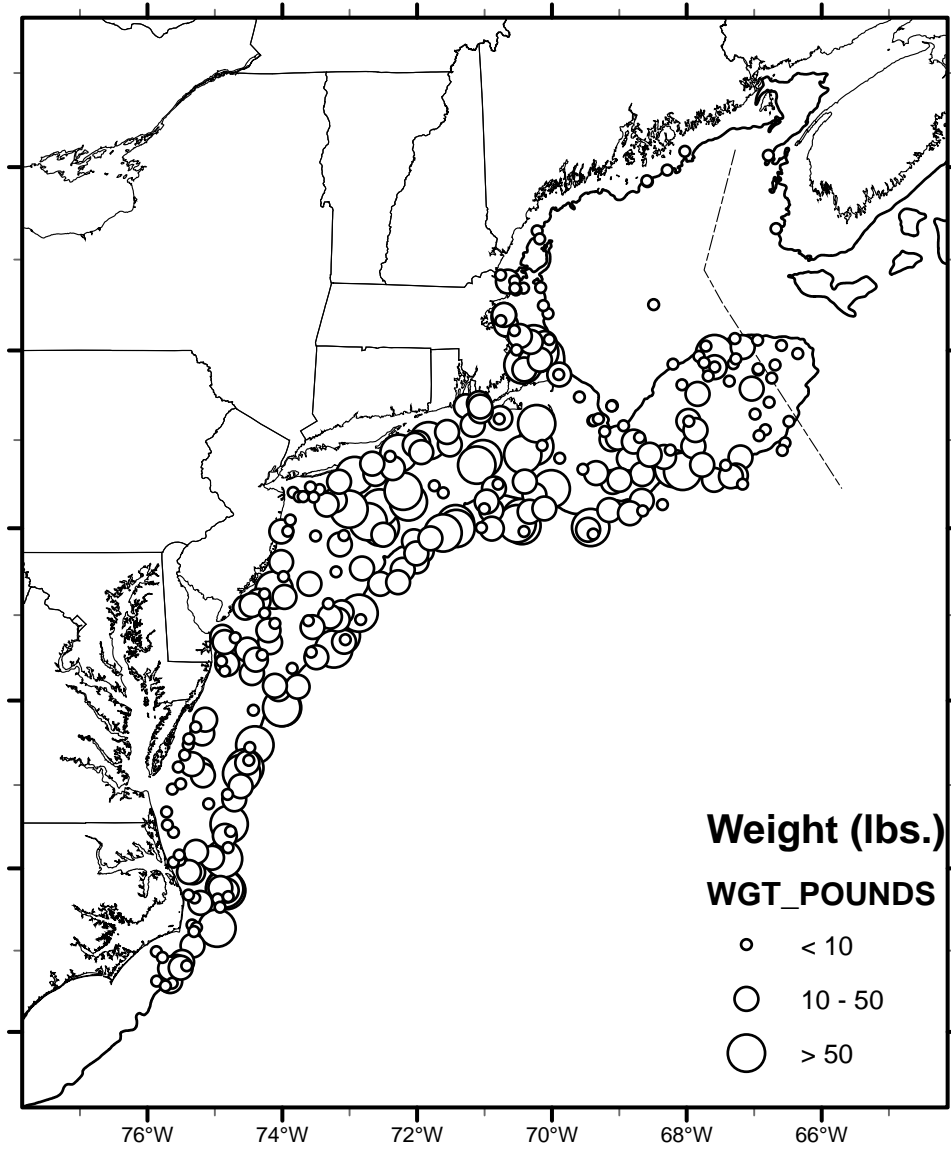


AMERICAN LOBSTER



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LONGFIN INSHORE SQUID



NORTHERN SHORTFIN SQUID

