

Projects 296

December 1997

NSGO-Q-97-001

THE NATIONAL SEA GRANT COLLEGE PROGRAM

THE PROGRAM

SEA GRANT is a partnership of academia, government, and industry focusing on coastal and marine resources. It operates through a university-based network to meet environmental and economic needs.

THE MISSION

SEA GRANT conducts Research, Education and Outreach to use and conserve coastal and marine resources for a sustainable economy and environment.

Introduction

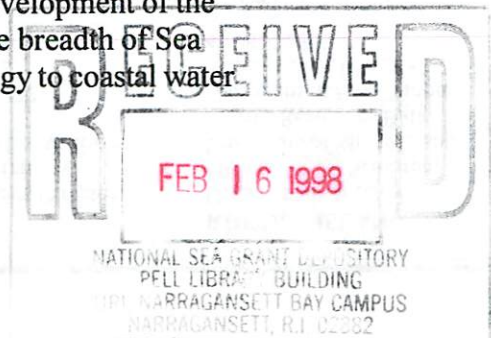
Projects '96 lists all projects supported by the National Sea Grant College Program during Fiscal Year 1996 (October 1, 1995 – September 30, 1996). The report is divided into five parts. Sections One through Three summarize project funding by: Sea Grant program; categories derived from *Sea Grant's Network Plan: 1995 – 2005*; and category and program combined.

Section Four lists individual projects by categories that are consistent with the network plan. In addition, provided with each project are project number, title, investigator, program affiliation, and amount of Sea Grant federal and matching funds as well as pass through funds, which come from agencies outside of Sea Grant.

The Fifth Section contains an analysis, in table form, of the distribution of Sea Grant program funding according to the goals of the NOAA strategic plan.

The number of projects supported during Fiscal Year 1996 was 753. Almost all of these projects were conducted through the core of 29 Sea Grant programs which draw upon a wide network of universities and other marine organizations throughout the nation. Sea Grant program directors are listed on the following page.

Sea Grant directors shape programs to use the strengths of participating institutions, to focus on regional and national issues, and to address priorities set by *Sea Grant's Network Plan* for research, education and training, and outreach services. Decentralized, day-to-day management encourages effective cooperation in marine affairs among academic institutions and federal, state, and local governments. The research programs, while normally dealing with local, state, or regional topics, produce results of generic importance that advance science, solve problems, and seize opportunities for the wise use and development of the nation's marine, coastal and Great Lakes resources. A review of this report shows the breadth of Sea Grant's involvement in the marine sciences from aquaculture and marine biotechnology to coastal water quality and safety at sea.



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1996 PROJECT FUNDING SUMMARY BY PROGRAM

1-1

Program	Project #	Sea Grant	PassThru	*Federal	Matching	**Total
ALASKA	17	1,227,480	465,000	1,692,480	1,091,540	2,784,020
CALIFORNIA	53	5,422,146	177,900	5,600,046	2,733,844	8,333,890
CONNECTICUT	15	843,137	0	843,137	436,067	1,279,204
DELAWARE	28	1,951,668	36,000	1,987,668	1,525,077	3,512,745
FLORIDA	30	2,075,158	322,506	2,397,664	1,123,551	3,521,215
GEORGIA	19	789,141	126,000	915,141	455,540	1,370,681
HAWAII	24	1,337,919	0	1,337,919	942,471	2,280,390
ILLINOIS/INDIANA	14	784,548	0	784,548	483,921	1,268,469
LOUISIANA	34	1,519,189	317,660	1,836,849	1,152,320	2,989,169
MAINE/NEW HAMPSHIRE	24	2,695,086	172,381	2,867,467	1,412,509	4,279,976
MARYLAND	32	2,239,555	1,652,415	3,891,970	1,664,638	5,556,608
MASSACHUSETTS INST. OF TECH.	29	1,976,484	51,000	2,027,484	1,478,076	3,505,560
MICHIGAN	9	929,152	0	929,152	530,741	1,459,893
MINNESOTA	23	2,053,185	85,883	2,139,068	817,106	2,956,174
MISSISSIPPI/ALABAMA	24	1,312,496	411,864	1,724,360	979,244	2,703,604
NEW JERSEY	17	935,113	76,304	1,011,417	657,168	1,668,585
NEW YORK	35	2,524,278	565,164	3,089,442	1,453,047	4,542,489
NORTH CAROLINA	40	1,548,936	832,380	2,381,316	884,477	3,265,793
OHIO	20	988,810	0	988,810	712,181	1,700,991
OREGON	32	2,650,510	147,996	2,798,506	1,463,270	4,261,776
PUERTO RICO	14	466,122	47,000	513,122	618,543	1,131,665
RHODE ISLAND	38	2,555,650	558,931	3,114,581	1,243,989	4,358,570
SOUTH CAROLINA	28	1,234,676	1,406,635	2,641,311	993,091	3,634,402
TEXAS	25	1,546,283	0	1,546,283	816,115	2,362,398
UNIV. OF SOUTHERN CALIFORNIA	10	358,000	0	358,000	261,628	619,628
VIRGINIA	20	1,733,491	63,000	1,796,491	867,383	2,663,874
WASHINGTON	33	2,480,051	428,253	2,908,304	1,316,520	4,224,824
WISCONSIN	39	2,783,574	0	2,783,574	1,220,000	4,003,574
WOODS HOLE OCEANOGRAPHIC INST.	20	1,132,065	158,095	1,290,160	518,466	1,808,626
INDEPENDENT/OTHER	7	1,182,738	123,745	1,306,483	136,936	1,443,419
Grand Total:	753	51,276,641	8,226,112	59,502,753	29,989,459	89,492,212

* : Sea Grant + PassThru

** : Federal + Matching

1996 PROJECT FUNDING SUMMARY BY CATEGORY

2-1

Project Categories	Project #	Sea Grant	PassThru	Federal	Matching	Total
I. ECONOMIC LEADERSHIP						
<u>A. Advanced Technology for Commercial Products and Processes</u>						
10 - COMMERCIAL BIOTECHNOLOGY						
11 - MOLECULAR GENETICS	8	774,573	0	774,573	330,833	1,105,406
12 - NATURAL PRODUCTS: CHEMISTRY AND BIOLOGICAL ACTIVITY	36	3,449,411	15,000	3,464,411	1,783,716	5,248,127
13 - BIOPROCESSING, BIOREACTION, CELL AND TISSUE CULTURE	10	1,639,679	0	1,639,679	898,814	2,538,493
Subtotal:	54	5,863,663	15,000	5,878,663	3,013,363	8,892,026
20 - ENVIRONMENTAL TECHNOLOGY						
21 - ENHANCEMENT OF ENVIRONMENTAL MONITORING AND ASSESSMENT	22	1,018,836	334,427	1,353,263	701,173	2,054,436
22 - POLLUTION CONTROL AND PREVENTION	5	164,871	0	164,871	126,666	291,537
23 - REMEDIATION	11	696,656	0	696,656	366,398	1,063,054
Subtotal:	38	1,880,363	334,427	2,214,790	1,194,237	3,409,027
Total:	92	7,744,026	349,427	8,093,453	4,207,600	12,301,053

1996 PROJECT FUNDING SUMMARY BY CATEGORY

2-2

Project Categories	Project #	Sea Grant	PassThru	Federal	Matching	Total
<u>B. Seafood Production</u>						
30 - REVITALIZE THE NATION'S COMMERCIAL FISHERIES						
31 - ECOSYSTEM-BASED MANAGEMENT	75	3,184,883	1,859,830	5,044,713	1,913,842	6,958,555
32 - ANTICIPATING SOCIAL AND ECONOMIC IMPACTS	13	566,033	0	566,033	298,300	864,333
33 - MINIMIZING BYCATCH	3	236,994	0	236,994	123,713	360,707
34 - ENHANCING WILD STOCKS THROUGH AQUACULTURE	6	283,816	0	283,816	166,529	450,345
Subtotal:	97	4,271,726	1,859,830	6,131,556	2,502,384	8,633,940
40 - DEVELOP SUSTAINABLE U.S. AQUACULTURE						
41 - ADMINISTRATION AND COORDINATION	4	100,293	0	100,293	74,583	174,876
42 - DEVELOPING AND IMPROVING GROW-OUT SYSTEMS	20	1,096,559	0	1,096,559	560,465	1,657,024
43 - IMPROVING HUSBANDRY	33	2,765,186	330,000	3,095,186	1,475,184	4,570,370
44 - ENHANCING AQUACULTURE THROUGH BIOTECHNOLOGY	35	2,451,192	0	2,451,192	1,389,861	3,841,053
Subtotal:	92	6,413,230	330,000	6,743,230	3,500,093	10,243,323
50 - ENHANCE COMPETITIVENESS THROUGH ADVANCES IN SEAFOOD TECHNOLOGY						
51 - PRODUCT QUALITY AND SAFETY	9	356,535	0	356,535	242,391	598,926
52 - PROCESSING TECHNOLOGY AND PRACTICES	6	140,213	0	140,213	165,562	305,775
53 - WASTE MANAGEMENT AND BYPRODUCT RECOVERY	2	58,060	0	58,060	29,569	87,629
54 - PRODUCT DEVELOPMENT	3	168,752	0	168,752	81,780	250,532
Subtotal:	20	723,560	0	723,560	519,302	1,242,862
Total:	209	11,408,516	2,189,830	13,598,346	6,521,779	20,120,125

1996 PROJECT FUNDING SUMMARY BY CATEGORY

2-3

<u>Project Categories</u>	<u>Project #</u>	<u>Sea Grant</u>	<u>PassThru</u>	<u>Federal</u>	<u>Matching</u>	<u>Total</u>
<u>C. Coastal Economic Development</u>						
60 - COASTAL BUSINESS DEVELOPMENT						
61 - FISHING INDUSTRIES	4	107,383	47,000	154,383	55,663	210,046
62 - COASTAL RECREATION BUSINESS	6	201,811	0	201,811	104,610	306,421
63 - MARINE TRADES INDUSTRY	7	249,985	0	249,985	181,648	431,633
Subtotal:	17	559,179	47,000	606,179	341,921	948,100
70 - COASTAL COMMUNITY DEVELOPMENT						
71 - COASTAL TOURISM DEVELOPMENT	6	191,609	0	191,609	126,679	318,288
72 - COMMUNITIES IN TRANSITION	4	366,276	0	366,276	124,444	490,720
73 - COASTAL AND WATERFRONT REDEVELOPMENT	0	0	0	0	0	0
74 - PORTS AND HARBORS	3	447,137	0	447,137	284,459	731,596
75 - PLANNING AND DECISION-MAKING INFORMATION	3	129,082	52,095	181,177	219,290	400,467
Subtotal:	16	1,134,104	52,095	1,186,199	754,872	1,941,071
80 - REVITALIZING MARINE INFRASTRUCTURE						
81 - INSPECTION AND CONDITION SURVEYS	0	0	0	0	0	0
82 - ENVIRONMENTAL AND OPERATIONAL LOADINGS	0	0	0	0	0	0
83 - STRUCTURE PERFORMANCE ASSESSMENTS	0	0	0	0	0	0
84 - REHABILITATION, REPAIR, AND RECYCLING PROCEDURES	1	26,001	0	26,001	24,468	50,469
Subtotal:	1	26,001	0	26,001	24,468	50,469
Total:	34	1,719,284	99,095	1,818,379	1,121,261	2,939,640
I. TOTAL:	335	20,871,826	2,638,352	23,510,178	11,850,640	35,360,818

1996 PROJECT FUNDING SUMMARY BY CATEGORY

2-4

Project Categories	Project #	Sea Grant	PassThru	Federal	Matching	Total
II. COASTAL ECOSYSTEM HEALTH AND PUBLIC SAFETY						
<u>A. Coastal Ecosystem Health</u>						
90 - COASTAL AND GREAT LAKES WATER QUALITY						
91 - TOXICS	21	1,203,330	0	1,203,330	767,537	1,970,867
92 - BIOLOGICAL CONTAMINANTS	2	37,226	0	37,226	67,949	105,175
93 - NUTRIENTS	27	1,476,267	314,999	1,791,266	978,766	2,770,032
94 - SEDIMENTATION	5	208,526	0	208,526	159,825	368,351
95 - BIOTOXINS/HARMFUL ALGAL BLOOMS	18	669,696	488,893	1,158,589	414,957	1,573,546
96 - NONPOINT SOURCE POLLUTION	3	198,775	0	198,775	98,773	297,548
97 - CHEMICAL AND OIL SPILLS	3	2,252	188,994	191,246	75,868	267,114
Subtotal:	79	3,796,072	992,886	4,788,958	2,563,675	7,352,633
100 - COASTAL AND GREAT LAKES HABITATS						
101 - HABITAT STRUCTURE AND FUNCTION	25	965,563	1,023,555	1,989,118	695,518	2,684,636
102 - HABITAT RESTORATION	4	154,288	36,000	190,288	80,311	270,599
103 - AQUATIC NUISANCE SPECIES	42	3,836,747	55,286	3,892,033	1,395,110	5,287,143
104 - COASTAL AND GREAT LAKES HABITATS: CUMULATIVE IMPACTS	6	238,171	1,335,875	1,574,046	127,174	1,701,220
Subtotal:	77	5,194,769	2,450,716	7,645,485	2,298,113	9,943,598
110 - SUSTAINABLE DEVELOPMENT						
111 - SOCIOECONOMIC DIMENSIONS OF ENVIRONMENTAL CHANGE	3	0	137,085	137,085	29,337	166,422
112 - COASTAL MANAGEMENT POLICY TOOLS	6	408,105	10,000	418,105	134,441	552,546
113 - MULTIPLE USE MANAGEMENT AND CONFLICT RESOLUTION	3	223,598	31,825	255,423	238,974	494,397
114 - WATER AVAILABILITY	0	0	0	0	0	0
115 - CUMULATIVE IMPACTS	0	0	0	0	0	0
Subtotal:	12	631,703	178,910	810,613	402,752	1,213,365
Total:	168	9,622,544	3,622,512	13,245,056	5,264,540	18,509,596

1996 PROJECT FUNDING SUMMARY BY CATEGORY

2-5

<u>Project Categories</u>	<u>Project #</u>	<u>Sea Grant</u>	<u>PassThru</u>	<u>Federal</u>	<u>Matching</u>	<u>Total</u>
<u>B. Public Safety</u>						
120 - COASTAL AND NATURAL HAZARDS						
121 - SEVERE STORMS	1	45,436	0	45,436	20,901	66,337
122 - EARTHQUAKES AND TSUNAMIS	1	47,913	0	47,913	7,995	55,908
123 - COASTAL PLANNING AND BUILDING CONSTRUCTION TECHNIQUES	7	223,565	67,668	291,233	181,629	472,862
124 - SHORELINE PROCESSES AND EROSION	17	597,901	249,900	847,801	435,079	1,282,880
Subtotal:	26	914,815	317,568	1,232,383	645,604	1,877,987
130 - SAFETY AT SEA						
131 - VESSEL STABILITY RESEARCH	0	0	0	0	0	0
132 - EQUIPMENT DESIGN AND TESTING	1	36,334	0	36,334	18,653	54,987
133 - SURVIVAL AND SAFETY TRAINING	1	0	15,000	15,000	0	15,000
134 - RECREATIONAL AND COMMERCIAL DIVING	4	195,900	0	195,900	173,416	369,316
Subtotal:	6	232,234	15,000	247,234	192,069	439,303
Total:	32	1,147,049	332,568	1,479,617	837,673	2,317,290
II. TOTAL:	200	10,769,593	3,955,080	14,724,673	6,102,213	20,826,886

1996 PROJECT FUNDING SUMMARY BY CATEGORY

2-6

Project Categories	Project #	Sea Grant	PassThru	Federal	Matching	Total
III. EDUCATION AND HUMAN RESOURCES						
A. EDUCATION						
140 - EDUCATION						
141 - EDUCATION: PRE-COLLEGE	17	505,408	158,663	664,071	354,684	1,018,755
142 - EDUCATION: UNIVERSITY	53	2,696,993	944,466	3,641,459	872,555	4,514,014
143 - EDUCATION: INFORMAL	5	154,649	265,271	419,920	107,889	527,809
Subtotal:	75	3,357,050	1,368,400	4,725,450	1,335,128	6,060,578
Total:	75	3,357,050	1,368,400	4,725,450	1,335,128	6,060,578
B. Marine Advisory Service						
150 - MARINE ADVISORY SERVICE						
151 - MARINE ADVISORY SERVICE: CORE	35	7,365,471	0	7,365,471	5,882,539	13,248,010
152 - MARINE ADVISORY SERVICE: SPECIAL PROJECTS	5	1,021,589	264,280	1,285,869	27,995	1,313,864
Subtotal:	40	8,387,060	264,280	8,651,340	5,910,534	14,561,874
Total:	40	8,387,060	264,280	8,651,340	5,910,534	14,561,874
C. Communications						
160 - COMMUNICATIONS						
161 - COMMUNICATIONS: CORE	28	2,915,445	0	2,915,445	1,676,574	4,592,019
162 - COMMUNICATIONS: SPECIAL PROJECTS	8	501,467	0	501,467	97,955	599,422
Subtotal:	36	3,416,912	0	3,416,912	1,774,529	5,191,441
Total:	36	3,416,912	0	3,416,912	1,774,529	5,191,441
III. TOTAL:	151	15,161,022	1,632,680	16,793,702	9,020,191	25,813,893

1996 PROJECT FUNDING SUMMARY BY CATEGORY

2-7

<u>Project Categories</u>	<u>Project #</u>	<u>Sea Grant</u>	<u>PassThru</u>	<u>Federal</u>	<u>Matching</u>	<u>Total</u>
IV. PROGRAM MANAGEMENT						
<u>A. Program Administration</u>						
170 - PROGRAM ADMINISTRATION						
Subtotal:	33	2,780,784	0	2,780,784	2,226,172	5,006,956
Total:	33	2,780,784	0	2,780,784	2,226,172	5,006,956
<u>B. Program Development</u>						
180 - PROGRAM DEVELOPMENT						
Subtotal:	30	1,602,429	0	1,602,429	672,762	2,275,191
Total:	30	1,602,429	0	1,602,429	672,762	2,275,191
IV. TOTAL:	63	4,383,213	0	4,383,213	2,898,934	7,282,147
V. OTHER						
190 - OTHER						
Subtotal:	4	90,987	0	90,987	117,481	208,468
Grand Total:	753	51,276,641	8,226,112	59,502,753	29,989,459	89,492,212

1996 PROJECT FUNDING SUMMARY BY CATEGORY & PROGRAM

Category: 10 - COMMERCIAL BIOTECHNOLOGY

3-1

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	0	0	0	0	0	0
CALIFORNIA	17	2,774,421	0	2,774,421	1,627,186	4,401,607
CONNECTICUT	0	0	0	0	0	0
DELAWARE	3	81,317	0	81,317	104,477	185,794
FLORIDA	1	142,454	0	142,454	71,227	213,681
GEORGIA	0	0	0	0	0	0
HAWAII	4	154,506	0	154,506	95,918	250,424
ILLINOIS/INDIANA	0	0	0	0	0	0
LOUISIANA	0	0	0	0	0	0
MAINE/NEW HAMPSHIRE	0	0	0	0	0	0
MARYLAND	3	215,762	0	215,762	100,548	316,310
MASSACHUSETTS INST. OF TECH.	1	126,356	0	126,356	63,500	189,856
MICHIGAN	0	0	0	0	0	0
MINNESOTA	1	35,800	0	35,800	3,544	39,344
MISSISSIPPI/ALABAMA	0	0	0	0	0	0
NEW JERSEY	1	58,586	0	58,586	39,440	98,026
NEW YORK	2	300,000	0	300,000	240,801	540,801
NORTH CAROLINA	0	0	0	0	0	0
OHIO	0	0	0	0	0	0
OREGON	5	634,825	0	634,825	111,691	746,516
PUERTO RICO	0	0	0	0	0	0
RHODE ISLAND	0	0	0	0	0	0
SOUTH CAROLINA	1	35,200	0	35,200	18,746	53,946
TEXAS	1	57,820	0	57,820	43,006	100,826
UNIV. OF SOUTHERN CALIFORNIA	0	0	0	0	0	0
VIRGINIA	1	148,006	0	148,006	78,570	226,576
WASHINGTON	4	254,800	0	254,800	141,940	396,740
WISCONSIN	1	160,920	0	160,920	0	160,920
WOODS HOLE OCEANOGRAPHIC INST.	5	525,152	0	525,152	199,190	724,342
INDEPENDENT/OTHER	3	157,738	15,000	172,738	73,579	246,317
Grand Total:	54	5,863,663	15,000	5,878,663	3,013,363	8,892,026

Category: 20 - ENVIRONMENTAL TECHNOLOGY

3-2

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	0	0	0	0	0	0
CALIFORNIA	0	0	0	0	0	0
CONNECTICUT	1	63,390	0	63,390	34,272	97,662
DELAWARE	1	26,809	0	26,809	24,592	51,401
FLORIDA	2	64,317	29,337	93,654	32,327	125,981
GEORGIA	2	48,501	0	48,501	27,768	76,269
HAWAII	2	96,197	0	96,197	70,638	166,835
ILLINOIS/INDIANA	0	0	0	0	0	0
LOUISIANA	0	0	0	0	0	0
MAINE/NEW HAMPSHIRE	0	0	0	0	0	0
MARYLAND	5	133,500	257,666	391,166	108,118	499,284
MASSACHUSETTS INST. OF TECH.	7	458,277	0	458,277	365,198	823,475
MICHIGAN	1	124,078	0	124,078	57,896	181,974
MINNESOTA	0	0	0	0	0	0
MISSISSIPPI/ALABAMA	2	60,630	47,424	108,054	79,161	187,215
NEW JERSEY	0	0	0	0	0	0
NEW YORK	2	66,156	0	66,156	64,563	130,719
NORTH CAROLINA	0	0	0	0	0	0
OHIO	1	20,294	0	20,294	15,776	36,070
OREGON	0	0	0	0	0	0
PUERTO RICO	0	0	0	0	0	0
RHODE ISLAND	1	92,522	0	92,522	20,627	113,149
SOUTH CAROLINA	2	59,433	0	59,433	29,782	89,215
TEXAS	2	66,198	0	66,198	37,062	103,260
UNIV. OF SOUTHERN CALIFORNIA	1	45,570	0	45,570	27,073	72,643
VIRGINIA	0	0	0	0	0	0
WASHINGTON	2	215,300	0	215,300	100,475	315,775
WISCONSIN	3	188,010	0	188,010	73,157	261,167
WOODS HOLE OCEANOGRAPHIC INST.	1	51,181	0	51,181	25,752	76,933
INDEPENDENT/OTHER	0	0	0	0	0	0
Grand Total:	38	1,880,363	334,427	2,214,790	1,194,237	3,409,027

Category: 30 - REVITALIZE THE NATION'S COMMERCIAL FISHERIES

3-3

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	7	262,808	429,000	691,808	14,663	706,471
CALIFORNIA	7	326,175	122,000	448,175	239,404	687,579
CONNECTICUT	1	46,469	0	46,469	30,207	76,676
DELAWARE	1	3,418	0	3,418	31,848	35,266
FLORIDA	3	183,831	0	183,831	96,565	280,396
GEORGIA	3	133,741	126,000	259,741	77,927	337,668
HAWAII	1	20,614	0	20,614	58,215	78,829
ILLINOIS/INDIANA	0	0	0	0	0	0
LOUISIANA	2	108,517	0	108,517	65,890	174,407
MAINE/NEW HAMPSHIRE	7	555,173	112,381	667,554	219,343	886,897
MARYLAND	0	0	0	0	0	0
MASSACHUSETTS INST. OF TECH.	0	0	0	0	0	0
MICHIGAN	1	148,205	0	148,205	73,202	221,407
MINNESOTA	1	6,065	0	6,065	15,754	21,819
MISSISSIPPI/ALABAMA	1	59,141	0	59,141	49,235	108,376
NEW JERSEY	1	0	45,500	45,500	66,169	111,669
NEW YORK	4	263,805	0	263,805	220,533	484,338
NORTH CAROLINA	10	98,142	270,000	368,142	102,964	471,106
OHIO	0	0	0	0	0	0
OREGON	10	559,690	38,000	597,690	220,201	817,891
PUERTO RICO	5	162,625	0	162,625	138,186	300,811
RHODE ISLAND	10	360,385	469,224	829,609	200,076	1,029,685
SOUTH CAROLINA	2	50,528	0	50,528	17,329	67,857
TEXAS	3	151,535	0	151,535	75,647	227,182
UNIV. OF SOUTHERN CALIFORNIA	0	0	0	0	0	0
VIRGINIA	3	222,487	0	222,487	160,945	383,432
WASHINGTON	8	337,918	213,725	551,643	170,593	722,236
WISCONSIN	3	137,293	0	137,293	128,345	265,638
WOODS HOLE OCEANOGRAPHIC INST.	3	73,161	34,000	107,161	29,143	136,304
INDEPENDENT/OTHER	0	0	0	0	0	0
Grand Total:	97	4,271,726	1,859,830	6,131,556	2,502,384	8,633,940

Category: 40 - DEVELOP SUSTAINABLE U.S. AQUACULTURE

3-4

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	0	0	0	0	0	0
CALIFORNIA	7	280,898	0	280,898	218,831	499,729
CONNECTICUT	2	229,823	0	229,823	106,309	336,132
DELAWARE	3	159,934	0	159,934	41,518	201,452
FLORIDA	1	42,892	0	42,892	25,656	68,548
GEORGIA	0	0	0	0	0	0
HAWAII	2	82,774	0	82,774	55,704	138,478
ILLINOIS/INDIANA	4	154,113	0	154,113	92,762	246,875
LOUISIANA	5	307,956	0	307,956	73,502	381,458
MAINE/NEW HAMPSHIRE	6	943,048	0	943,048	521,152	1,464,200
MARYLAND	10	928,543	0	928,543	526,296	1,454,839
MASSACHUSETTS INST. OF TECH.	6	227,716	0	227,716	184,055	411,771
MICHIGAN	0	0	0	0	0	0
MINNESOTA	2	73,784	0	73,784	48,055	121,839
MISSISSIPPI/ALABAMA	2	56,343	330,000	386,343	28,437	414,780
NEW JERSEY	4	368,264	0	368,264	205,640	573,904
NEW YORK	2	159,245	0	159,245	98,601	257,846
NORTH CAROLINA	3	143,875	0	143,875	26,361	170,236
OHIO	3	162,919	0	162,919	116,194	279,113
OREGON	3	191,465	0	191,465	120,290	311,755
PUERTO RICO	0	0	0	0	0	0
RHODE ISLAND	6	451,182	0	451,182	203,877	655,059
SOUTH CAROLINA	5	352,912	0	352,912	239,630	592,542
TEXAS	5	315,121	0	315,121	155,354	470,475
UNIV. OF SOUTHERN CALIFORNIA	0	0	0	0	0	0
VIRGINIA	3	256,543	0	256,543	128,346	384,889
WASHINGTON	2	100,533	0	100,533	92,312	192,845
WISCONSIN	4	293,347	0	293,347	117,180	410,527
WOODS HOLE OCEANOGRAPHIC INST.	1	55,000	0	55,000	36,531	91,531
INDEPENDENT/OTHER	1	75,000	0	75,000	37,500	112,500
Grand Total:	92	6,413,230	330,000	6,743,230	3,500,093	10,243,323

Category: 50 - ENHANCE COMPETITIVENESS THROUGH ADVANCES IN SEAFOOD TECHNOLOGY

3-5

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	3	161,280	0	161,280	49,844	211,124
CALIFORNIA	0	0	0	0	0	0
CONNECTICUT	0	0	0	0	0	0
DELAWARE	1	9,380	0	9,380	37,860	47,240
FLORIDA	1	38,669	0	38,669	21,564	60,233
GEORGIA	1	38,987	0	38,987	50,551	89,538
HAWAII	0	0	0	0	0	0
ILLINOIS/INDIANA	0	0	0	0	0	0
LOUISIANA	2	63,313	0	63,313	42,207	105,520
MAINE/NEW HAMPSHIRE	0	0	0	0	0	0
MARYLAND	0	0	0	0	0	0
MASSACHUSETTS INST. OF TECH.	1	39,766	0	39,766	36,878	76,644
MICHIGAN	0	0	0	0	0	0
MINNESOTA	0	0	0	0	0	0
MISSISSIPPI/ALABAMA	1	54,408	0	54,408	51,127	105,535
NEW JERSEY	0	0	0	0	0	0
NEW YORK	0	0	0	0	0	0
NORTH CAROLINA	3	15,839	0	15,839	65,146	80,985
OHIO	0	0	0	0	0	0
OREGON	3	154,822	0	154,822	83,850	238,672
PUERTO RICO	1	26,545	0	26,545	10,954	37,499
RHODE ISLAND	0	0	0	0	0	0
SOUTH CAROLINA	0	0	0	0	0	0
TEXAS	0	0	0	0	0	0
UNIV. OF SOUTHERN CALIFORNIA	0	0	0	0	0	0
VIRGINIA	3	120,551	0	120,551	69,321	189,872
WASHINGTON	0	0	0	0	0	0
WISCONSIN	0	0	0	0	0	0
WOODS HOLE OCEANOGRAPHIC INST.	0	0	0	0	0	0
INDEPENDENT/OTHER	0	0	0	0	0	0
Grand Total:	20	723,560	0	723,560	519,302	1,242,862

Category: 60 - COASTAL BUSINESS DEVELOPMENT

3-6

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	0	0	0	0	0	0
CALIFORNIA	1	16,492	0	16,492	17,595	34,087
CONNECTICUT	0	0	0	0	0	0
DELAWARE	0	0	0	0	0	0
FLORIDA	3	153,893	0	153,893	75,445	229,338
GEORGIA	2	75,115	0	75,115	27,654	102,769
HAWAII	0	0	0	0	0	0
ILLINOIS/INDIANA	0	0	0	0	0	0
LOUISIANA	1	17,282	0	17,282	8,776	26,058
MAINE/NEW HAMPSHIRE	1	44,362	0	44,362	13,578	57,940
MARYLAND	0	0	0	0	0	0
MASSACHUSETTS INST. OF TECH.	1	128,788	0	128,788	143,168	271,956
MICHIGAN	1	15,510	0	15,510	7,760	23,270
MINNESOTA	0	0	0	0	0	0
MISSISSIPPI/ALABAMA	0	0	0	0	0	0
NEW JERSEY	1	12,382	0	12,382	0	12,382
NEW YORK	1	39,090	0	39,090	23,990	63,080
NORTH CAROLINA	0	0	0	0	0	0
OHIO	0	0	0	0	0	0
OREGON	1	16,061	0	16,061	7,904	23,965
PUERTO RICO	1	0	47,000	47,000	0	47,000
RHODE ISLAND	1	28,500	0	28,500	11,661	40,161
SOUTH CAROLINA	0	0	0	0	0	0
TEXAS	1	8,704	0	8,704	4,390	13,094
UNIV. OF SOUTHERN CALIFORNIA	0	0	0	0	0	0
VIRGINIA	1	3,000	0	3,000	0	3,000
WASHINGTON	0	0	0	0	0	0
WISCONSIN	0	0	0	0	0	0
WOODS HOLE OCEANOGRAPHIC INST.	0	0	0	0	0	0
INDEPENDENT/OTHER	0	0	0	0	0	0
Grand Total:	17	559,179	47,000	606,179	341,921	948,100

Category: 70 - COASTAL COMMUNITY DEVELOPMENT

3-7

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	0	0	0	0	0	0
CALIFORNIA	1	44,099	0	44,099	23,827	67,926
CONNECTICUT	0	0	0	0	0	0
DELAWARE	1	3,038	0	3,038	50,030	53,068
FLORIDA	0	0	0	0	0	0
GEORGIA	0	0	0	0	0	0
HAWAII	2	172,017	0	172,017	86,561	258,578
ILLINOIS/INDIANA	0	0	0	0	0	0
LOUISIANA	3	71,091	0	71,091	36,226	107,317
MAINE/NEW HAMPSHIRE	0	0	0	0	0	0
MARYLAND	0	0	0	0	0	0
MASSACHUSETTS INST. OF TECH.	1	400,000	0	400,000	210,602	610,602
MICHIGAN	0	0	0	0	0	0
MINNESOTA	0	0	0	0	0	0
MISSISSIPPI/ALABAMA	1	77,122	0	77,122	133,721	210,843
NEW JERSEY	0	0	0	0	0	0
NEW YORK	0	0	0	0	0	0
NORTH CAROLINA	0	0	0	0	0	0
OHIO	0	0	0	0	0	0
OREGON	2	176,680	0	176,680	61,302	237,982
PUERTO RICO	0	0	0	0	0	0
RHODE ISLAND	1	51,960	0	51,960	56,313	108,273
SOUTH CAROLINA	1	19,220	0	19,220	14,415	33,635
TEXAS	0	0	0	0	0	0
UNIV. OF SOUTHERN CALIFORNIA	0	0	0	0	0	0
VIRGINIA	0	0	0	0	0	0
WASHINGTON	0	0	0	0	0	0
WISCONSIN	2	118,877	0	118,877	52,619	171,496
WOODS HOLE OCEANOGRAPHIC INST.	1	0	52,095	52,095	29,256	81,351
INDEPENDENT/OTHER	0	0	0	0	0	0
Grand Total:	16	1,134,104	52,095	1,186,199	754,872	1,941,071

Category: 80 - REVITALIZING MARINE INFRASTRUCTURE

3-8

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	0	0	0	0	0	0
CALIFORNIA	0	0	0	0	0	0
CONNECTICUT	0	0	0	0	0	0
DELAWARE	0	0	0	0	0	0
FLORIDA	0	0	0	0	0	0
GEORGIA	0	0	0	0	0	0
HAWAII	0	0	0	0	0	0
ILLINOIS/INDIANA	0	0	0	0	0	0
LOUISIANA	0	0	0	0	0	0
MAINE/NEW HAMPSHIRE	0	0	0	0	0	0
MARYLAND	0	0	0	0	0	0
MASSACHUSETTS INST. OF TECH.	0	0	0	0	0	0
MICHIGAN	0	0	0	0	0	0
MINNESOTA	0	0	0	0	0	0
MISSISSIPPI/ALABAMA	0	0	0	0	0	0
NEW JERSEY	0	0	0	0	0	0
NEW YORK	0	0	0	0	0	0
NORTH CAROLINA	0	0	0	0	0	0
OHIO	1	26,001	0	26,001	24,468	50,469
OREGON	0	0	0	0	0	0
PUERTO RICO	0	0	0	0	0	0
RHODE ISLAND	0	0	0	0	0	0
SOUTH CAROLINA	0	0	0	0	0	0
TEXAS	0	0	0	0	0	0
UNIV. OF SOUTHERN CALIFORNIA	0	0	0	0	0	0
VIRGINIA	0	0	0	0	0	0
WASHINGTON	0	0	0	0	0	0
WISCONSIN	0	0	0	0	0	0
WOODS HOLE OCEANOGRAPHIC INST.	0	0	0	0	0	0
INDEPENDENT/OTHER	0	0	0	0	0	0
Grand Total:	1	26,001	0	26,001	24,468	50,469

Category: 90 - COASTAL AND GREAT LAKES WATER QUALITY

3-9

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	1	41,328	0	41,328	0	41,328
CALIFORNIA	0	0	0	0	0	0
CONNECTICUT	0	0	0	0	0	0
DELAWARE	3	201,762	0	201,762	162,758	364,520
FLORIDA	6	310,786	147,169	457,955	191,950	649,905
GEORGIA	1	50,302	0	50,302	25,881	76,183
HAWAII	3	71,776	0	71,776	121,445	193,221
ILLINOIS/INDIANA	0	0	0	0	0	0
LOUISIANA	6	142,834	297,384	440,218	57,978	498,196
MAINE/NEW HAMPSHIRE	2	150,942	0	150,942	60,175	211,117
MARYLAND	2	137,992	0	137,992	172,984	310,976
MASSACHUSETTS INST. OF TECH.	1	69,040	0	69,040	47,772	116,812
MICHIGAN	0	0	0	0	0	0
MINNESOTA	3	51,755	0	51,755	96,816	148,571
MISSISSIPPI/ALABAMA	2	54,169	34,440	88,609	66,605	155,214
NEW JERSEY	3	176,323	0	176,323	99,894	276,217
NEW YORK	10	158,758	488,893	647,651	255,261	902,912
NORTH CAROLINA	5	173,731	25,000	198,731	121,327	320,058
OHIO	3	60,836	0	60,836	125,520	186,356
OREGON	0	0	0	0	0	0
PUERTO RICO	0	0	0	0	0	0
RHODE ISLAND	8	581,519	0	581,519	322,614	904,133
SOUTH CAROLINA	0	0	0	0	0	0
TEXAS	2	155,735	0	155,735	76,976	232,711
UNIV. OF SOUTHERN CALIFORNIA	3	72,923	0	72,923	116,217	189,140
VIRGINIA	0	0	0	0	0	0
WASHINGTON	2	149,800	0	149,800	70,002	219,802
WISCONSIN	10	824,664	0	824,664	295,447	1,120,111
WOODS HOLE OCEANOGRAPHIC INST.	3	159,097	0	159,097	76,053	235,150
INDEPENDENT/OTHER	0	0	0	0	0	0
Grand Total:	79	3,796,072	992,886	4,788,958	2,563,675	7,352,633

Category: 100 - COASTAL AND GREAT LAKES HABITATS

3-10

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	0	0	0	0	0	0
CALIFORNIA	5	174,389	19,900	194,289	79,739	274,028
CONNECTICUT	3	131,234	0	131,234	70,731	201,965
DELAWARE	1	251,858	0	251,858	96,251	348,109
FLORIDA	5	235,358	50,000	285,358	124,191	409,549
GEORGIA	1	0	0	0	0	0
HAWAII	0	0	0	0	0	0
ILLINOIS/INDIANA	3	406,435	0	406,435	262,129	668,564
LOUISIANA	8	342,290	20,276	362,566	170,003	532,569
MAINE/NEW HAMPSHIRE	0	0	0	0	0	0
MARYLAND	2	70,140	1,298,749	1,368,889	36,852	1,405,741
MASSACHUSETTS INST. OF TECH.	0	0	0	0	0	0
MICHIGAN	1	163,458	0	163,458	76,343	239,801
MINNESOTA	7	1,385,149	0	1,385,149	367,849	1,752,998
MISSISSIPPI/ALABAMA	6	318,617	0	318,617	165,363	483,980
NEW JERSEY	1	0	30,804	30,804	8,258	39,062
NEW YORK	3	125,621	0	125,621	89,225	214,846
NORTH CAROLINA	5	0	213,100	213,100	0	213,100
OHIO	5	360,128	0	360,128	212,419	572,547
OREGON	0	0	0	0	0	0
PUERTO RICO	0	0	0	0	0	0
RHODE ISLAND	0	0	0	0	0	0
SOUTH CAROLINA	4	205,673	691,269	896,942	293,111	1,190,053
TEXAS	4	227,808	0	227,808	123,315	351,123
UNIV. OF SOUTHERN CALIFORNIA	1	38,190	0	38,190	25,050	63,240
VIRGINIA	2	59,590	27,000	86,590	36,065	122,655
WASHINGTON	5	130,400	99,618	230,018	61,219	291,237
WISCONSIN	5	568,431	0	568,431	0	568,431
WOODS HOLE OCEANOGRAPHIC INST.	0	0	0	0	0	0
INDEPENDENT/OTHER	0	0	0	0	0	0
Grand Total:	77	5,194,769	2,450,716	7,645,485	2,298,113	9,943,598

Category: 110 - SUSTAINABLE DEVELOPMENT

3-11

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	0	0	0	0	0	0
CALIFORNIA	0	0	0	0	0	0
CONNECTICUT	0	0	0	0	0	0
DELAWARE	3	357,562	0	357,562	134,441	492,003
FLORIDA	0	0	0	0	0	0
GEORGIA	0	0	0	0	0	0
HAWAII	0	0	0	0	0	0
ILLINOIS/INDIANA	0	0	0	0	0	0
LOUISIANA	1	77,529	0	77,529	52,129	129,658
MAINE/NEW HAMPSHIRE	0	0	0	0	0	0
MARYLAND	0	0	0	0	0	0
MASSACHUSETTS INST. OF TECH.	0	0	0	0	0	0
MICHIGAN	0	0	0	0	0	0
MINNESOTA	0	0	0	0	0	0
MISSISSIPPI/ALABAMA	0	0	0	0	0	0
NEW JERSEY	0	0	0	0	0	0
NEW YORK	0	0	0	0	0	0
NORTH CAROLINA	1	0	0	0	21,607	21,607
OHIO	0	0	0	0	0	0
OREGON	1	146,069	0	146,069	186,845	332,914
PUERTO RICO	1	20,035	0	20,035	0	20,035
RHODE ISLAND	0	0	0	0	0	0
SOUTH CAROLINA	1	0	100,000	100,000	7,730	107,730
TEXAS	1	30,508	0	30,508	0	30,508
UNIV. OF SOUTHERN CALIFORNIA	0	0	0	0	0	0
VIRGINIA	0	0	0	0	0	0
WASHINGTON	3	0	78,910	78,910	0	78,910
WISCONSIN	0	0	0	0	0	0
WOODS HOLE OCEANOGRAPHIC INST.	0	0	0	0	0	0
INDEPENDENT/OTHER	0	0	0	0	0	0
Grand Total:	12	631,703	178,910	810,613	402,752	1,213,365

Category: 120 - COASTAL AND NATURAL HAZARDS

3-12

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	0	0	0	0	0	0
CALIFORNIA	2	116,830	0	116,830	17,978	134,808
CONNECTICUT	0	0	0	0	0	0
DELAWARE	3	20,732	0	20,732	131,053	151,785
FLORIDA	1	55,896	0	55,896	27,949	83,845
GEORGIA	1	0	0	0	0	0
HAWAII	3	85,283	0	85,283	64,336	149,619
ILLINOIS/INDIANA	0	0	0	0	0	0
LOUISIANA	0	0	0	0	0	0
MAINE/NEW HAMPSHIRE	2	123,281	0	123,281	26,421	149,702
MARYLAND	1	51,238	0	51,238	26,730	77,968
MASSACHUSETTS INST. OF TECH.	1	15,000	0	15,000	7,807	22,807
MICHIGAN	0	0	0	0	0	0
MINNESOTA	0	0	0	0	0	0
MISSISSIPPI/ALABAMA	0	0	0	0	0	0
NEW JERSEY	1	77,994	0	77,994	80,183	158,177
NEW YORK	1	21,302	0	21,302	20,032	41,334
NORTH CAROLINA	2	23,548	0	23,548	23,874	47,422
OHIO	1	35,176	0	35,176	15,950	51,126
OREGON	1	47,913	0	47,913	7,995	55,908
PUERTO RICO	0	0	0	0	0	0
RHODE ISLAND	2	67,914	67,668	135,582	30,529	166,111
SOUTH CAROLINA	3	119,714	249,900	369,614	154,543	524,157
TEXAS	0	0	0	0	0	0
UNIV. OF SOUTHERN CALIFORNIA	0	0	0	0	0	0
VIRGINIA	0	0	0	0	0	0
WASHINGTON	0	0	0	0	0	0
WISCONSIN	0	0	0	0	0	0
WOODS HOLE OCEANOGRAPHIC INST.	1	52,994	0	52,994	10,224	63,218
INDEPENDENT/OTHER	0	0	0	0	0	0
Grand Total:	26	914,815	317,568	1,232,383	645,604	1,877,987

Category: 130 - SAFETY AT SEA

3-13

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	0	0	0	0	0	0
CALIFORNIA	0	0	0	0	0	0
CONNECTICUT	0	0	0	0	0	0
DELAWARE	0	0	0	0	0	0
FLORIDA	0	0	0	0	0	0
GEORGIA	0	0	0	0	0	0
HAWAII	1	31,309	0	31,309	85,230	116,539
ILLINOIS/INDIANA	0	0	0	0	0	0
LOUISIANA	0	0	0	0	0	0
MAINE/NEW HAMPSHIRE	0	0	0	0	0	0
MARYLAND	0	0	0	0	0	0
MASSACHUSETTS INST. OF TECH.	1	0	15,000	15,000	0	15,000
MICHIGAN	0	0	0	0	0	0
MINNESOTA	0	0	0	0	0	0
MISSISSIPPI/ALABAMA	0	0	0	0	0	0
NEW JERSEY	0	0	0	0	0	0
NEW YORK	1	86,879	0	86,879	20,032	106,911
NORTH CAROLINA	0	0	0	0	0	0
OHIO	0	0	0	0	0	0
OREGON	0	0	0	0	0	0
PUERTO RICO	0	0	0	0	0	0
RHODE ISLAND	0	0	0	0	0	0
SOUTH CAROLINA	0	0	0	0	0	0
TEXAS	0	0	0	0	0	0
UNIV. OF SOUTHERN CALIFORNIA	0	0	0	0	0	0
VIRGINIA	0	0	0	0	0	0
WASHINGTON	0	0	0	0	0	0
WISCONSIN	2	77,712	0	77,712	68,154	145,866
WOODS HOLE OCEANOGRAPHIC INST.	1	36,334	0	36,334	18,653	54,987
INDEPENDENT/OTHER	0	0	0	0	0	0
Grand Total:	6	232,234	15,000	247,234	192,069	439,303

Category: 140 - EDUCATION

3-14

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	2	76,427	36,000	112,427	45,414	157,841
CALIFORNIA	6	798,026	36,000	834,026	77,548	911,574
CONNECTICUT	2	94,304	0	94,304	51,473	145,777
DELAWARE	2	305,756	36,000	341,756	98,884	440,640
FLORIDA	3	29,102	96,000	125,102	49,771	174,873
GEORGIA	4	181,987	0	181,987	158,259	340,246
HAWAII	0	0	0	0	0	0
ILLINOIS/INDIANA	0	0	0	0	0	0
LOUISIANA	2	49,069	0	49,069	21,693	70,762
MAINE/NEW HAMPSHIRE	2	23,000	60,000	83,000	57,854	140,854
MARYLAND	4	157,250	96,000	253,250	54,792	308,042
MASSACHUSETTS INST. OF TECH.	4	132,176	36,000	168,176	207,211	375,387
MICHIGAN	1	83,057	0	83,057	27,265	110,322
MINNESOTA	4	169,907	85,883	255,790	15,427	271,217
MISSISSIPPI/ALABAMA	4	121,966	0	121,966	80,916	202,882
NEW JERSEY	1	14,913	0	14,913	10,240	25,153
NEW YORK	5	269,553	76,271	345,824	0	345,824
NORTH CAROLINA	6	275,580	60,000	335,580	44,661	380,241
OHIO	2	113,782	0	113,782	42,175	155,957
OREGON	2	0	109,996	109,996	1,875	111,871
PUERTO RICO	1	48,962	0	48,962	51,594	100,556
RHODE ISLAND	2	0	72,000	72,000	36,000	108,000
SOUTH CAROLINA	4	36,945	365,466	402,411	65,567	467,978
TEXAS	2	108,710	0	108,710	37,268	145,978
UNIV. OF SOUTHERN CALIFORNIA	1	47,400	0	47,400	12,600	60,000
VIRGINIA	3	86,000	36,000	122,000	25,000	147,000
WASHINGTON	2	36,000	36,000	72,000	0	72,000
WISCONSIN	2	97,178	0	97,178	35,784	132,962
WOODS HOLE OCEANOGRAPHIC INST.	1	0	72,000	72,000	0	72,000
INDEPENDENT/OTHER	1	0	58,784	58,784	25,857	84,641
Grand Total:	75	3,357,050	1,368,400	4,725,450	1,335,128	6,060,578

Category: 150 - MARINE ADVISORY SERVICE

3-15

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	1	434,700	0	434,700	513,659	948,359
CALIFORNIA	1	263,750	0	263,750	187,384	451,134
CONNECTICUT	2	85,448	0	85,448	44,414	129,862
DELAWARE	1	209,739	0	209,739	378,667	588,406
FLORIDA	1	532,500	0	532,500	266,267	798,767
GEORGIA	1	102,598	0	102,598	38,733	141,331
HAWAII	1	293,279	0	293,279	130,258	423,537
ILLINOIS/INDIANA	4	124,540	0	124,540	65,240	189,780
LOUISIANA	1	232,981	0	232,981	272,233	505,214
MAINE/NEW HAMPSHIRE	1	395,408	0	395,408	203,225	598,633
MARYLAND	1	210,000	0	210,000	456,293	666,293
MASSACHUSETTS INST. OF TECH.	2	49,489	0	49,489	23,380	72,869
MICHIGAN	1	223,238	0	223,238	105,072	328,310
MINNESOTA	1	126,324	0	126,324	188,094	314,418
MISSISSIPPI/ALABAMA	2	173,700	0	173,700	177,300	351,000
NEW JERSEY	1	72,875	0	72,875	82,181	155,056
NEW YORK	1	596,216	0	596,216	420,009	1,016,225
NORTH CAROLINA	2	574,573	264,280	838,853	353,044	1,191,897
OHIO	1	144,080	0	144,080	77,813	221,893
OREGON	1	402,400	0	402,400	382,561	784,961
PUERTO RICO	2	102,185	0	102,185	200,675	302,860
RHODE ISLAND	3	275,289	0	275,289	145,195	420,484
SOUTH CAROLINA	1	106,107	0	106,107	105,105	211,212
TEXAS	1	220,000	0	220,000	140,000	360,000
UNIV. OF SOUTHERN CALIFORNIA	1	72,200	0	72,200	21,518	93,718
VIRGINIA	1	545,043	0	545,043	369,136	914,179
WASHINGTON	1	682,600	0	682,600	370,812	1,053,412
WISCONSIN	1	118,893	0	118,893	154,579	273,472
WOODS HOLE OCEANOGRAPHIC INST.	1	66,905	0	66,905	37,687	104,592
INDEPENDENT/OTHER	1	950,000	0	950,000	0	950,000
Grand Total:	40	8,387,060	264,280	8,651,340	5,910,534	14,561,874

Category: 160 - COMMUNICATIONS

3-16

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	1	147,725	0	147,725	288,508	436,233
CALIFORNIA	1	129,583	0	129,583	36,764	166,347
CONNECTICUT	2	92,158	0	92,158	0	92,158
DELAWARE	1	159,961	0	159,961	103,874	263,835
FLORIDA	1	114,500	0	114,500	57,250	171,750
GEORGIA	1	52,709	0	52,709	0	52,709
HAWAII	1	72,917	0	72,917	24,942	97,859
ILLINOIS/INDIANA	1	69,166	0	69,166	30,210	99,376
LOUISIANA	1	57,997	0	57,997	128,679	186,676
MAINE/NEW HAMPSHIRE	1	213,065	0	213,065	89,943	303,008
MARYLAND	2	262,950	0	262,950	127,244	390,194
MASSACHUSETTS INST. OF TECH.	1	145,600	0	145,600	5,016	150,616
MICHIGAN	1	97,185	0	97,185	91,658	188,843
MINNESOTA	1	106,176	0	106,176	28,863	135,039
MISSISSIPPI/ALABAMA	1	100,993	0	100,993	42,055	143,048
NEW JERSEY	1	44,235	0	44,235	20,740	64,975
NEW YORK	1	157,654	0	157,654	0	157,654
NORTH CAROLINA	1	93,462	0	93,462	125,493	218,955
OHIO	1	23,361	0	23,361	11,681	35,042
OREGON	1	160,400	0	160,400	96,530	256,930
PUERTO RICO	1	52,024	0	52,024	109,285	161,309
RHODE ISLAND	2	207,121	0	207,121	48,862	255,983
SOUTH CAROLINA	2	60,539	0	60,539	16,726	77,265
TEXAS	1	85,855	0	85,855	55,381	141,236
UNIV. OF SOUTHERN CALIFORNIA	1	43,175	0	43,175	9,318	52,493
VIRGINIA	0	0	0	0	0	0
WASHINGTON	2	365,100	0	365,100	94,837	459,937
WISCONSIN	3	109,599	0	109,599	120,851	230,450
WOODS HOLE OCEANOGRAPHIC INST.	1	52,030	0	52,030	9,819	61,849
INDEPENDENT/OTHER	1	139,672	0	139,672	0	139,672
Grand Total:	36	3,416,912	0	3,416,912	1,774,529	5,191,441

Category: 170 - PROGRAM ADMINISTRATION

3-17

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	1	81,698	0	81,698	179,452	261,150
CALIFORNIA	2	109,169	0	109,169	83,987	193,156
CONNECTICUT	1	77,811	0	77,811	98,661	176,472
DELAWARE	2	98,028	0	98,028	79,924	177,952
FLORIDA	1	144,500	0	144,500	72,250	216,750
GEORGIA	1	38,830	0	38,830	47,791	86,621
HAWAII	1	75,957	0	75,957	9,333	85,290
ILLINOIS/INDIANA	2	30,294	0	30,294	33,580	63,874
LOUISIANA	1	40,787	0	40,787	211,677	252,464
MAINE/NEW HAMPSHIRE	1	171,335	0	171,335	193,959	365,294
MARYLAND	1	56,500	0	56,500	49,920	106,420
MASSACHUSETTS INST. OF TECH.	1	99,276	0	99,276	124,948	224,224
MICHIGAN	1	64,421	0	64,421	91,545	155,966
MINNESOTA	2	84,225	0	84,225	44,704	128,929
MISSISSIPPI/ALABAMA	1	123,178	0	123,178	51,294	174,472
NEW JERSEY	1	88,667	0	88,667	44,423	133,090
NEW YORK	1	239,923	0	239,923	0	239,923
NORTH CAROLINA	1	122,186	0	122,186	0	122,186
OHIO	1	17,141	0	17,141	48,285	65,426
OREGON	1	80,200	0	80,200	168,404	248,604
PUERTO RICO	1	39,491	0	39,491	92,849	132,340
RHODE ISLAND	1	151,354	0	151,354	110,809	262,163
SOUTH CAROLINA	1	141,865	0	141,865	15,407	157,272
TEXAS	1	109,230	0	109,230	67,716	176,946
UNIV. OF SOUTHERN CALIFORNIA	1	13,625	0	13,625	41,483	55,108
VIRGINIA	1	211,432	0	211,432	0	211,432
WASHINGTON	1	161,200	0	161,200	136,861	298,061
WISCONSIN	1	48,250	0	48,250	80,752	129,002
WOODS HOLE OCEANOGRAPHIC INST.	1	60,211	0	60,211	46,158	106,369
INDEPENDENT/OTHER	0	0	0	0	0	0
Grand Total:	33	2,780,784	0	2,780,784	2,226,172	5,006,956

Category: 180 - PROGRAM DEVELOPMENT

3-18

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	1	21,514	0	21,514	0	21,514
CALIFORNIA	2	376,901	0	376,901	121,601	498,502
CONNECTICUT	1	22,500	0	22,500	0	22,500
DELAWARE	1	50,000	0	50,000	7,751	57,751
FLORIDA	1	26,460	0	26,460	11,139	37,599
GEORGIA	1	66,371	0	66,371	976	67,347
HAWAII	1	114,090	0	114,090	65,559	179,649
ILLINOIS/INDIANA	0	0	0	0	0	0
LOUISIANA	1	7,543	0	7,543	11,327	18,870
MAINE/NEW HAMPSHIRE	1	75,472	0	75,472	26,859	102,331
MARYLAND	1	15,680	0	15,680	4,861	20,541
MASSACHUSETTS INST. OF TECH.	1	85,000	0	85,000	58,541	143,541
MICHIGAN	1	10,000	0	10,000	0	10,000
MINNESOTA	1	14,000	0	14,000	8,000	22,000
MISSISSIPPI/ALABAMA	1	112,229	0	112,229	54,030	166,259
NEW JERSEY	1	20,874	0	20,874	0	20,874
NEW YORK	1	40,076	0	40,076	0	40,076
NORTH CAROLINA	1	28,000	0	28,000	0	28,000
OHIO	1	25,092	0	25,092	21,900	46,992
OREGON	1	79,985	0	79,985	13,822	93,807
PUERTO RICO	1	14,255	0	14,255	15,000	29,255
RHODE ISLAND	1	148,232	0	148,232	57,426	205,658
SOUTH CAROLINA	1	46,540	0	46,540	15,000	61,540
TEXAS	1	9,059	0	9,059	0	9,059
UNIV. OF SOUTHERN CALIFORNIA	1	24,917	0	24,917	8,369	33,286
VIRGINIA	2	80,839	0	80,839	0	80,839
WASHINGTON	1	46,400	0	46,400	77,469	123,869
WISCONSIN	2	40,400	0	40,400	93,132	133,532
WOODS HOLE OCEANOGRAPHIC INST.	0	0	0	0	0	0
INDEPENDENT/OTHER	0	0	0	0	0	0
Grand Total:	30	1,602,429	0	1,602,429	672,762	2,275,191

Category: 190 - OTHER

3-19

Program	Project #	Sea Grant	PassThru	Federal	Matching	Total
ALASKA	0	0	0	0	0	0
CALIFORNIA	1	11,413	0	11,413	2,000	13,413
CONNECTICUT	0	0	0	0	0	0
DELAWARE	1	12,374	0	12,374	41,149	53,523
FLORIDA	0	0	0	0	0	0
GEORGIA	0	0	0	0	0	0
HAWAII	2	67,200	0	67,200	74,332	141,532
ILLINOIS/INDIANA	0	0	0	0	0	0
LOUISIANA	0	0	0	0	0	0
MAINE/NEW HAMPSHIRE	0	0	0	0	0	0
MARYLAND	0	0	0	0	0	0
MASSACHUSETTS INST. OF TECH.	0	0	0	0	0	0
MICHIGAN	0	0	0	0	0	0
MINNESOTA	0	0	0	0	0	0
MISSISSIPPI/ALABAMA	0	0	0	0	0	0
NEW JERSEY	0	0	0	0	0	0
NEW YORK	0	0	0	0	0	0
NORTH CAROLINA	0	0	0	0	0	0
OHIO	0	0	0	0	0	0
OREGON	0	0	0	0	0	0
PUERTO RICO	0	0	0	0	0	0
RHODE ISLAND	0	0	0	0	0	0
SOUTH CAROLINA	0	0	0	0	0	0
TEXAS	0	0	0	0	0	0
UNIV. OF SOUTHERN CALIFORNIA	0	0	0	0	0	0
VIRGINIA	0	0	0	0	0	0
WASHINGTON	0	0	0	0	0	0
WISCONSIN	0	0	0	0	0	0
WOODS HOLE OCEANOGRAPHIC INST.	0	0	0	0	0	0
INDEPENDENT/OTHER	0	0	0	0	0	0
Grand Total:	4	90,987	0	90,987	117,481	208,468

Section Four: Project Listing by Category

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-1

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 11 - MOLECULAR GENETICS

R/MP-61 (10488)	MARGO HAYGOOD	CALIFORNIA	27,689	0	23,439
Title: MOLECULAR CHARACTERIZATION OF MICROBIAL SYMBIONTS OF BRYOZOANS					

RB-41 (11076)	DONALD P. CHENEY	MASSACHUSETTS INST. OF TECH.	126,356	0	63,500
Title: STRAIN IMPROVEMENT BY PROTOPLAST FUSION-SOMATIC HYBRIDIZATION.					

R/BT-19 (11068)	R. H. MEINTS	OREGON	49,854	0	9,044
Title: VIRUSES AS AGENTS FOR MOLECULAR STUDIES OF MARINE ALGAE.					

R/OD-2 (10555)	EUGENE BURRESON	VIRGINIA	148,006	0	78,570
Title: LIFE CYCLE STUDIES OF HAPLOSPORIDIUM NELSONI: (MSX) USING PCR TECHNOLOGY					

R/P-60 (10231)	JOHN J. STEGEMAN	WOODS HOLE OCEANOGRAPHIC INST.	189,114	0	33,058
Title: FISH CYTOCHROME P450 GENES INVOLVED IN CHEMICAL EFFECTS					

R/P-61 (10232)	JOHN STEGEMAN	WOODS HOLE OCEANOGRAPHIC INST.	157,577	0	78,692
Title: MOLECULAR BIOLOGICAL APPROACHES FOR NON-DESTRUCTIVE ASSESSMENT OF CHEMICAL EFFECTS ON MARINE MAMMALS					

R/A-34 (11101)	H. CHIKARMANE/A. KUZIRIA	WOODS HOLE OCEANOGRAPHIC INST.	50,000	0	29,205
Title: DEVELOPMENT OF PHENOTYPIC MARKERS FOR IDENTIFICATION OF SEEDED SCALLOPS					

R/B-137 (11102)	M.E. HAHN/B. A. JENSEN	WOODS HOLE OCEANOGRAPHIC INST.	25,977	0	15,325
Title: MOLECULAR BIOMARKERS OF CHEMICAL SENSITIVITY IN PROTECTED SPECIES: A NEW APPROACH TO ENVIRONMENTAL RISK ASSESSMENT					

Number of Projects:	8	Subtotal:	774,573	0	330,833
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-2

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 12 - NATURAL PRODUCTS: CHEMISTRY AND BIOLOGICAL ACTIVITY					
R/MP-69	ALISON BUTLER	CALIFORNIA	184,151	0	106,883
(10092)	Title: POLY UNSATURATED FATTY ACID OXIDASES IN MARINE ALGAE				
R/MP-73	ALEJANDRO MAYER	CALIFORNIA	70,000	0	73,100
(10093)	Title: NEUROINFLAMMATION, MICROGLIA AND MARINE NATURAL PRODUCTS				
R/MP-71	ROBERT JACOBS	CALIFORNIA	97,828	0	53,755
(10094)	Title: THE OXIDATION AND METABOLISM OF POLYUNSATURATED FATTY ACIDS (PUFA) BY MARINE ORGANISMS				
R/MP-70	KEVIN FARRELL	CALIFORNIA	97,187	0	0
(10095)	Title: MOLECULAR ANALYSIS OF TUBULIN BINDING DOMAINS FOR MARINE NATURAL PRODUCTS				
R/MP-72	VIVEK MALHORTA	CALIFORNIA	322,645	0	176,132
(10096)	Title: ADDRESSING CELLULAR PROCESSES USING MARINE NATURAL PRODUCTS				
R/MP-68	LOUIS BARROWS	CALIFORNIA	138,228	0	98,732
(10097)	Title: TECHNOLOGY FOR DISCOVERY OF ANTI-CANCER DRUGS FROM MARINE SOURCES				
A/EA-1A	CHRISTOPHER DEWEES	CALIFORNIA	337,118	0	80,000
(10099)	Title: PACIFIC REGION MARINE BIOTECHNOLOGY EXTENSION PROGRAM: A THREE-YEAR ADAPTIVE APPROACH				
R/MP-58	ROBERT JACOBS	CALIFORNIA	122,638	0	68,330
(10484)	Title: MARINE DRUG DISCOVERY PROGRAM I. PHARMACOLOGY OF INFLAMMATION				
R/MP-59	WILLIAM FENICAL	CALIFORNIA	68,425	0	76,223
(10485)	Title: MARINE DRUG DISCOVERY PROGRAM: NEW TREATMENTS FOR ARTHRITIS AND RELATED INFLAMMATORY DISEASE				
R/MP-60	JOHN D. FAULKNER	CALIFORNIA	60,084	0	17,615
(10486)	Title: MARINE DRUG DISCOVERY PROGRAM: NEW PHARMACEUTICALS FROM MARINE INVERTEBRATES				
R/MP-63	PHILLIP CREWS	CALIFORNIA	75,000	0	35,687
(10649)	Title: CULTURED MARINE FUNGI AS A SOURCE OF NEW BIOACTIVE MATERIALS				

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-3

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/MP-62	DAVID EPEL	CALIFORNIA	76,546	0	23,219
(10651)	Title: MOLECULAR CHARACTERIZATION OF ANTI-MICROBIAL COMPOUNDS FROM THE PACIFIC SQUID LOLIGO OPALESCENS				
R/MP-65	DANIEL MORSE	CALIFORNIA	168,149	0	190,141
(10652)	Title: NEW HIGH-PERFORMANCE COMPOSITE MATERIALS FROM MARINE BIOMINERALIZATION: BIOTECHNOLOGICAL AND INTERDISCIPLINARY APPROACH				
E/IF-1	JAMES J. SULLIVAN	CALIFORNIA	24,000	0	24,000
(11056)	Title: THE REGULATION OF GENE EXPRESSION IN RHEUMATOID ARTHRITIS: AN INVESTIGATION OF THE ROLE OF MARINE NATURAL PRODUCTS IN TRANSCRIPTION FACTOR MODULATION				
R/MP-74	WILLIAM FENICAL	CALIFORNIA	161,236	0	86,579
(11205)	Title: SALINE FERMENTATION OF NEW DRUGS				
R/B-32	CRAIG S. CARY	DELAWARE	41,409	0	26,236
(10192)	Title: CHARACTERIZATION OF MECHANISMS OF BACTERIAL SYMBIONT TRANSMISSION IN WOOD-BORING BIVALVES				
R/B-31	STEPHEN C. DEXTER	DELAWARE	8,355	0	29,484
(10197)	Title: RELATIVE EFFECTS OF MICROBIOLOGY AND METALLURGY ON CORROSION INITIATION AT WELDS AND INCLUSIONS IN STAINLESS STEELS				
R/MP-8	MARCUS A. TIUS	HAWAII	19,614	0	32,351
(10617)	Title: BIOACTIVE MACROCYCLES FROM SOFT CORAL				
R/MP-3	PAUL J. SCHEUER	HAWAII	44,545	0	10,150
(10618)	Title: BIOACTIVE MARINE METABOLITES				
R/OK-1	FRANCIS J. SCHMITZ	INDEPENDENT/OTHER	75,000	0	39,709
(10938)	Title: BIOACTIVE COMPOUNDS FROM MARINE ORGANISMS				
R/UT-2	CHRIS IRELAND/LOUIS BARR	INDEPENDENT/OTHER	67,738	0	33,870
(11107)	Title: METABOLITE STUDIES WITH MARINE MICROORGANISMS.				
R/P-1	CHARLES E. ARBANAS	INDEPENDENT/OTHER	15,000	0	0
(11203)	Title: MOLECULAR MARINE BIOLOGY AND MARINE BIOTECHNOLOGY: RESEARCH OPPORTUNITIES AND POLICY ISSUES.				

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-4

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/P-1	CHARLES E. ARBANAS	INDEPENDENT/OTHER	0	15,000	0
(11203)	Title: MOLECULAR MARINE BIOLOGY AND MARINE BIOTECHNOLOGY: RESEARCH OPPORTUNITIES AND POLICY ISSUES.				
R/BT-03	SAUL ROSEMAN	MARYLAND	105,000	0	52,500
(10089)	Title: THE PREPARATION OF CHITIN OLIGOSACCHARIDES				
R/BT-04	GREGORY PAYNE	MARYLAND	71,295	0	23,658
(10090)	Title: ENZYMATIC MODIFICATION OF CHITOSAN				
A/BT-05	MADILYN FLETCHER	MARYLAND	39,467	0	24,390
(10091)	Title: MID-ATLANTIC SEA GRANT EXTENSION PROGRAM COURSE IN MARINE BIOTECHNOLOGY				
C/M/C-2	MICHAEL MCDONALD	MINNESOTA	35,800	0	3,544
(11185)	Title: A SEA GRANT NATIONAL ISSUES FORUM - BIOTECHNOLOGY				
R/N-95003	GILL DIAMOND	NEW JERSEY	58,586	0	39,440
(10576)	Title: ANTIMICROBIAL PEPTIDES FROM FISH SKIN				
R/XBP-4	JON C. CLARDY	NEW YORK	150,000	0	75,000
(10109)	Title: MECHANISMS OF ACTION OF AN IMMUNOSUPPRESSIVE MARINE NATURAL PRODUCT: DISCODERMOLIDE				
R/BT-18	WILLIAM GERWICK	OREGON	201,203	0	48,197
(10275)	Title: DISCOVERY AND PRODUCTION OF MARINE ALGAL BIOMEDICINALS BY INNOVATIVE METHODS				
R/BT-20	STEVEN J. GOULD	OREGON	165,344	0	31,099
(10277)	Title: BIOORGANIC STUDIES OF CYCLOMARIN A, AN ANTI-INFLAMMATORY PEPTIDE OF MARINE ORIGIN				
R/MX-7	A. P. WHEELER/R. J. ROSS	SOUTH CAROLINA	35,200	0	18,746
(11070)	Title: ENVIRONMENTAL AND BIOLOGICAL FATE OF NEW POLYMER ADDITIVES FOR INDUSTRIAL AND AGRICULTURAL APPLICATIONS.				
R/BT-2	JAMES L. WAY	TEXAS	57,820	0	43,006
(10597)	Title: ANTAGONISM OF SULFIDE INTOXICATION WITH MARINE ENZYMES IN CELL CARRIERS SYSTEMS				

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-5

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
A/B-1 (10308)	A. COPPING	WASHINGTON Title: MARINE BIOTECHNOLOGY OUTREACH	22,300	0	14,270
R/B-17 (10309)	J.W. DEMING	WASHINGTON Title: LOW-TEMPERATURE ENZYMES FOR BIOTECHNOLOGY AND BIOREMEDIATION FROM EXTREMELY PSYCHROPHILIC MARINE BACTERIA	88,900	0	48,937
R/B-18 (10310)	J. BAROSS	WASHINGTON Title: EXTREMELY HIGH TEMPERATURE ENZYMES AND BIOCATALYTIC REACTIONS FOR BIOTECHNOLOGY FROM HYPERTHERMOPHILIC MARINE MICROORGANISMS	80,900	0	33,857
R/B-16 (10748)	LEE A. HADWIGER	WASHINGTON Title: CRAB SHELL CHITOSAN: UTILIZATION OF ITS GENE ACTIVATION PROPERTIES	62,700	0	44,876
Number of Projects: 36			Subtotal:	3,449,411	15,000 1,783,716

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-6

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 13 - BIOPROCESSING, BIOREACTION, CELL AND TISSUE CULTURE

R/MP75 (11206)	ERIC DAVIDSON	CALIFORNIA	743,497	0	493,351
Title: MOLECULAR BIOLOGY OF SEA URCHIN SKELETOGENESIS					
R/B-30 (10193)	JOHN L. GALLAGHER	DELAWARE	31,553	0	48,757
Title: HALOPHYTE SALT-TOLERANCE MECHANISMS: CELLULAR, ORGAN, AND WHOLE PLANT RESPONSES					
R/LR-MB-1 (10014)	SHIRLEY A. POMPONI	FLORIDA	142,454	0	71,227
Title: PRODUCTION OF THE ECTEINASCIDINS, BIOMEDICALLY IMPORTANT MARINE NATURAL PRODUCTS, THROUGH CELL CULTURE OF ECTEINASCIDIA TURBINATA					
R/AQ-46 (10608)	PHILIP C. LOH	HAWAII	48,022	0	26,262
Title: CONTINUING STUDIES ON THE DEVELOPMENT OF DETECTION AND CELL CULTURE TECHNOLOGIES FOR VIRAL DISEASES OF THE PENAEID SHRIMP					
R/MP-4 (10619)	GREGORY M. L. PATTERSON	HAWAII	42,325	0	27,155
Title: INDUSTRIAL MICROBIOLOGY OF CYANOBACTERIA (BLUE-GREEN ALGAE)					
R/ATD-6 (10110)	GLENN D. PRESTWICH	NEW YORK	150,000	0	165,801
Title: LIPOSOMAL DELIVERY OF HORMONES FOR CRUSTACEAN AQUACULTURE: FORMULATION, BIOCHEMICAL MODE OF ACTION, AND PHYSIOLOGY					
R/BT-08 (10427)	GREGORY L. RORRER	OREGON	143,502	0	0
Title: BIOPHARMACEUTICALS FROM CELL CULTURES OF RED MACROALGAE					
R/BT-09 (10428)	WILLIAM H. GERWICK	OREGON	74,922	0	23,351
Title: BIOSYNTHESIS OF CURACIN A AND OPTIMIZATION OF ITS PRODUCTION THROUGH CULTURE, STRAIN SELECTION AND MUTAGENETIC STUDIES					
R/BT-4 (10122)	DANIEL J. KLINGENBERG	WISCONSIN	160,920	0	0
Title: ENHANCED ELECTORHEOLOGICAL FLUIDS USING HYPERTHERMOPHILIC BIOTECHNOLOGY					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-7

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/B-124	MARK E. HAHN	WOODS HOLE OCEANOGRAPHIC INST.	102,484	0	42,910
(10229) Title: IDENTIFICATION OF BIOACTIVE MARINE NATURAL PRODUCTS USING A FISH CELL CULTURE ASSAY					

Number of Projects: 10			Subtotal:	1,639,679	0 898,814

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-8

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 21 - ENHANCEMENT OF ENVIRONMENTAL MONITORING AND ASSESSMENT					
R/ER-9 (11080)	GABOURY BENOIT/XUHUI LEE	CONNECTICUT	63,390	0	34,272
Title: DEVELOPMENT OF A MOBILE MICROMETEOROLOGICAL SYSTEM FOR MEASURING VOLATILE MERCURY FLUX IN CONNECTICUT SALT MARSHES.					
R/ME-13 (10205)	XIAO-HAI YAN	DELAWARE	26,809	0	24,592
Title: SATELLITE OBSERVATIONS AND MONITORING OF THE ENVIRONMENT IN THE DELAWARE BAY: EVOLUTION IN THE PAST TWO DECADES AND CURRENT STATUS					
R/NCOP-5 (11305)	JAMES CATO	FLORIDA	0	29,337	0
Title: OCEAN COLOR ALGORITHM FOR REMOTE SENSING OF COASTAL AND ESTUARINE WATERS: U.S. SOUTH ATLANTIC BIGHT AND EASTERN GULF OF MEXICO					
R/AT-2-PD (11426)	BRIAN J. BINDER	GEORGIA	20,248	0	7,066✓
Title: ASSESSMENT OF MICROBIAL COMMUNITY STRUCTURE IN ESTUARINE ENVIRONMENTS USING FLOW CYTOMETRY					
R/OM26 (10615)	GARY M. MCMURTRY	HAWAII	72,497	0	41,042
Title: CHEMICAL MONITORING OF HYDROTHERMAL VENTING ON LOIHI SEAMOUNT					
R/MC-1 (10616)	JOHN WILTSHIRE	HAWAII	23,700	0	29,596
Title: TAILINGS MANAGEMENT FOR A MARINE MINERALS INDUSTRY					
R/P-37 (10043)	LAWRENCE W. HARDING, JR.	MARYLAND	50,128	0	31,430
Title: SATELLITE REMOTE SENSING WITH SEAWIFS TO DETECT SEASONAL AND INTERANNUAL VARIABILITY IN PHYTOPLANKTON ABUNDANCE IN THE CHESAPEAKE BAY AND ADJACENT COASTAL WATERS					
R/P-42 (11058)	LAWRENCE W. HARDING, JR.	MARYLAND	0	69,654	0
Title: THE STUDY OF PHYTOPLANKTON DYNAMICS IN CHESAPEAKE BAY BY REMOTE SENSING OF OCEAN COLOR FROM AIRCRAFT.					
R/P-43 (11165)	LAWRENCE W. HARDING JR.	MARYLAND	0	188,012	0
Title: OCEAN COLOR MEASUREMENTS FROM THE CHESAPEAKE BAY OBSERVING SYSTEM (CBOS) IN SUPPORT OF SEAWIFS DATA VALIDATION FOR ESTUARIES					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-9

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
RT-2/RU-25 (10382)	HENRIK SCHMIDT	MASSACHUSETTS INST. OF TECH. Title: AUTONOMOUS UNDERWATER VEHICLES: SCIENTIFIC AND INDUSTRIAL APPLICATION	50,000	0	55,229
RC-38 (10387)	JAMES G. BELLINGHAM	MASSACHUSETTS INST. OF TECH. Title: ADAPTIVE SAMPLING FOR POLLUTION MONITORING IN THE COASTAL ENVIRONMENT	75,000	0	46,248
RC-39 (10388)	ROBERT F. CHEN	MASSACHUSETTS INST. OF TECH. Title: REAL-TIME MEASUREMENT OF BOSTON HARBOR ORGANICS WITH TIME-RESOLVED SPECTROFLUOROMETRY	57,811	0	48,191
RC-51 (11087)	MICHAEL S. TRIANTAFYLLOU	MASSACHUSETTS INST. OF TECH. Title: AUTONOMOUS ROBOTIC FISH-LIKE UNDERWATER VEHICLE.	75,000	0	102,286
RC-52 (11088)	ROBERT F. CHEN	MASSACHUSETTS INST. OF TECH. Title: DEVELOPMENT OF A FIBER OPTIC UV FLUOROMETER FOR AUTONOMOUS UNDERWATER VEHICLES	75,000	0	49,092
RC-53 (11089)	JOSEPH P. MONTOYA	MASSACHUSETTS INST. OF TECH. Title: A PRELIMINARY STABLE ISOTOPE TRACER STUDY OF SEWAGE NITROGEN INPUTS TO MASSACHUSETTS BAY	25,466	0	14,152
R/ROV-1 (10837)	EDWARD M. MAHONEY	MICHIGAN Title: A HIGH-RESOLUTION REMOTE SENSING SYSTEM AND METHOD FOR ASSESSMENT OF DEEP-WATER SHIPWRECKS AND NATURAL ENVIRONMENTS	124,078	0	57,896
R/ER-32 (11169)	JONATHAN R. PENNOCK	MISSISSIPPI/ALABAMA Title: OCEAN COLOR ALGORITHM EVALUATION FOR REMOTE SENSING OF COASTAL AND ESTUARINE WATERS: U.S. SOUTH ATLANTIC BIGHT AND EASTER GULF OF MEXICO	0	47,424	35,296
R/ES-9505 (10796)	DAVID TAYLOR	RHODE ISLAND Title: DEVELOPMENT OF A PROTOTYPE EUTROPHICATION MONITORING AND MODELING SYSTEMS FOR THE MARINE BAYS OF THE NORTHEAST	92,522	0	20,627
R/ER-13 (11073)	G.T. CHANDLER/B.C. COULL	SOUTH CAROLINA Title: NEW TECHNIQUES FOR ASSESSMENT OF ESTUARINE SEDIMENT HABITAT QUALITY: FULL LIFE-CYCLE BIOASSAY AND TROPHIC TRANSFER EXPERIMENTS USING MEIOBENTHOS	59,433	0	29,782
CE-2 (11083)	B. H. JONES/L. WASHBURN	UNIV. OF SOUTHERN CALIFORNIA Title: DISPERSION AND MIXING OF STORM WATER RUNOFF IN SANTA MONICA BAY: APPLICATION OF SPECTRAL BIO-OPTICAL TECHNIQUES FOR OBSERVING CONTAMINANT DISTRIBUTIONS	45,570	0	27,073

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-10

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/NI-20	VLADIMIR J. LUMELSKY	WISCONSIN	51,251	0	28,617
(10134) Title: INTELLIGENT ROBOT SYSTEM FOR COMPLEX UNDERWATER EXPLORATION TASKS					

R/M-38	IVAN VALIELA	WOODS HOLE OCEANOGRAPHIC INST.	51,181	0	25,752
(11098) Title: A STABLE ISOTOPIC APPROACH FOR EARLY DETECTION OF WASTEWATER NITROGEN IN ESTUARINE FOOD WEBS					

Number of Projects: 22			Subtotal:	1,018,836	334,427
				701,173	

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-11

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 22 - POLLUTION CONTROL AND PREVENTION

R/LR-32	LEO M. HALL	MISSISSIPPI/ALABAMA	60,630	0	43,865
(10165)	Title: GENETIC ENGINEERING OF BLUE-GREEN ALGAE FOR THE BIOLOGICAL SEQUESTRATION OF TOXIC METALS				

E/IF-1	ROBERT E. BAIER	NEW YORK	17,749	0	29,963
(10541)	Title: NONTOXIC FOUL-RELEASE COATINGS FOR FRESH AND BRACKISH WATER SYSTEMS				

R/PS-14	SUSAN W. FISHER	OHIO	20,294	0	15,776
(10222)	Title: THE RELATIONSHIP BETWEEN CRITICAL BODY BURDEN OF HYDROPHOBIC CONTAMINANTS AND BIOLOGICAL ENDPOINTS IN AQUATIC BIOMONITORING ORGANISMS				

R/ES-62	DAVID H. BADE	TEXAS	8,816	0	7,811
(10599)	Title: VEGETATIVE ENHANCEMENT OF COASTAL DREDGE DISPOSAL SITES FOR INCREASED FORAGE PRODUCTION AND AMENDED SOIL SALINITY				

R/ES-22	JOHN W. MORSE	TEXAS	57,382	0	29,251
(10600)	Title: POLLUTANT METAL REMOVAL AND RELEASE VIA REACTIONS WITH SEDIMENTARY PYRITE.				

Number of Projects:	5	Subtotal:	164,871	0	126,666
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-12

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 23 - REMEDIATION					
R/C-P-21 (10018)	ROBERT E. DEYLE	FLORIDA	64,317	0	32,327
Title: DEVELOPMENT OF A RISK BASED MECHANISM FOR FUNDING LOCAL GOVERNMENT COASTAL STORM HAZARD MANAGEMENT SERVICES					
R/AT-1 (11113)	MARY ANN MORAN	GEORGIA	48,501	0	27,768
Title: IDENTIFICATION AND CHARACTERIZATION OF ECOLOGICALLY RELEVANT LIGNIN-DEGRADING BACTERIA FROM COASTAL MARINE ENVIRONMENTS					
R/PO-2 (10049)	MARK SAGOFF	MARYLAND	25,376	0	26,658
Title: ECOLOGICAL RESTORATION AND THE CONCEPT OF PLACE					
R/P-40 (10967)	ROGER I. NEWELL	MARYLAND	57,996	0	50,030
Title: CAN INCREASING STOCKS OF OYSTERS IN CHESAPEAKE BAY SERVE TO IMPROVE WATER QUALITY					
RT-2/RC-54 (11090)	E. ERIC ADAMS	MASSACHUSETTS INST. OF TECH.	100,000	0	50,000
Title: BEHAVIOR OF CAPPED CONTAMINATED SEDIMENTS					
R/CTP-21 (10992)	JOSEPH F. ATKINSON	NEW YORK	48,407	0	34,600
Title: DEVELOPMENT OF NON-EQUILIBRIUM PCB DESORPTION MODEL FOR EVALUATION OF CONTAMINATED SEDIMENT REMEDIATION					
R/MT-1 (11071)	L. MARTON/J.T. MORRIS/M.	SOUTH CAROLINA	0	0	0
Title: DEVELOPING THE FOUNDATIONS OF A HEAVY METAL WASTE PROCESSING TECHNOLOGY BY GENETIC ENGINEERING OF SPARTINA ALTERNIFLORA FOR CONSTRUCTION WETLANDS					
R/B-12 (10744)	CLEMENT E. FURLONG	WASHINGTON	155,000	0	75,867
Title: DEVELOPMENT OF BIOSENSORS FOR MARINE APPLICATIONS					
R/B-13 (10745)	EVELYN J. LESSARD	WASHINGTON	60,300	0	24,608
Title: PROTOZOAN ENHANCEMENT OF BACTERIAL DEGRADATION IN MARINE SEDIMENTS					
R/BT-3 (10121)	KENNETH H. NEALSON	WISCONSIN	85,000	0	0
Title: BIOTECHNOLOGICAL APPROACHES TO BIOREMEDIATION: MICROBIAL OXIDATION OF ORGANIC POLLUTANTS COUPLED TO IRON REDUCTION SOURCE					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-13

<u>Project Number</u>	<u>PI</u>	<u>Program</u>	<u>Sea Grant</u>	<u>Pass Thru</u>	<u>Matching</u>
R/MW-56	MARC A. ANDERSON	WISCONSIN	51,759	0	44,540
(10129) Title: COUPLED EXTRACTION AND DESTRUCTION OF ORGANIC CONTAMINANTS USING SUPERCRITICAL FLUID EXTRACTION AND PHOTOCATALYTIC OXIDATION					

Number of Projects: 11			Subtotal:	696,656	0 366,398

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-14

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 31 - ECOSYSTEM-BASED MANAGEMENT

R/06-34P	L. HALDORSON & T. QUINN	ALASKA	0	40,000	0
(10508)	Title: IMPROVING STOCK ASSESSMENT OF PACIFIC OCEAN PERCH: EVALUATION OF SURVEY DESIGNS AND MATURITY MODELING				

E/70-91	PAULA CULLENBERG	ALASKA	0	389,000	0
(10510)	Title: CONTINUATION OF UNIVERSITY-BASED MARINE RESOURCE OBSERVER TRAINING				

R/07-19	BRENDA L. NORCROSS	ALASKA	107,225	0	0
(10678)	Title: HABITAT PREFERENCES OF JUVENILE FLATFISHES IN THE CENTRAL GULF OF ALASKA				

R/07-20	BRENDA NORCROSS	ALASKA	33,608	0	0
(10980)	Title: RECRUITMENT OF JUVENILE FLATFISH IN RELATION TO SUBSTRATE, TOPOGRAPHY AND CURRENTS				

R/07-21	TERRANCE J. QUINN II	ALASKA	48,410	0	0
(10981)	Title: LENGTH-BASED POPULATION MODEL FOR HARD-TO-AGE INVERTEBRATE POPULATIONS				

R/02-18	A.J. GHARRETT/W.W. SMOKE	ALASKA	61,749	0	14,663
(10982)	Title: CONSERVING SALMON BIODIVERSITY: OUTBREEDING DEPRESSION IN PINK SALMON				

R/06-35	A. J. PAUL	ALASKA	11,816	0	0
(10983)	Title: ARROWTOOTH FLOUNDER CONSUMPTION RATES: DATA FOR SPECIES INTERACTION MODELS				

R/F-161	GARY CHERR	CALIFORNIA	65,173	0	25,422
(10503)	Title: FACTORS AFFECTING REPRODUCTION AND DEVELOPMENT IN THE PACIFIC HERRING				

R/F-160	DAVID HANKIN	CALIFORNIA	51,976	0	60,231
(10504)	Title: SIZE-DEPENDENCE OF MOLTING IN CRABS: PHYSIOLOGY AND FIELD TESTS				

R/O-22-4PT	JAMES J. SULLIVAN	CALIFORNIA	0	40,000	0
(10515)	Title: 1995-96 SABRE EGG SURVEY AND DATA SYNTHESIS AND INTEGRATION				

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-15

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/A-103 (10532)	CAROLYN S. FRIEDMAN	CALIFORNIA	159,210	0	120,442
Title: AN INVESTIGATION OF THE STRESS RESPONSE SUMMER MORTALITY AND DISEASE RESISTANCE IN CRASSOSTREA GIGAS					
R/CZ-134 (11111)	GREG RAU	CALIFORNIA	49,816	0	33,309
Title: UPWELLING AND THE ECOLOGY OF JUVENILE ROCKFISH: A STUDY USING 14C NATURAL ABUNDANCE					
R/F-25-3PT (11182)	GEORGE HUNT	CALIFORNIA	0	17,000	0
Title: MONITORING AND DEVELOPMENT OF BIOPHYSICAL INDICES OF THE SOUTHEASTERN BERING SEA.					
R/B-111-PT (11193)	STEPHEN M. BOLLENS	CALIFORNIA	0	65,000	0
Title: MODELING THE UPPER OCEAN PRODUCTION DYNAMICS OF PLANKTON AND LARVAL POLLOCK IN THE BERING SEA					
R/A-17 (11078)	HANS LAUFER	CONNECTICUT	46,469	0	30,207
Title: HORMONAL REGULATION OF MORPHOGENESIS AND REPRODUCTION IN MALE MORPHOTYPES OF SPIDER CRABS					
R/LR-B-38 (10010)	WILLIAM F. HERRNKIND	FLORIDA	71,080	0	39,975
Title: THE FUTURE OF FLORIDA SPINY LOBSTER: DEVELOPING A PREDICTIVE MODEL AND PUTTING ARTIFICIAL SHELTERS TO THE ACID TEST					
R/LR-B-39 (10011)	RAYMOND R. WILSON, JR	FLORIDA	50,022	0	25,225
Title: DEVELOPMENT OF A HERITABLE GENETIC "TAG" FOR HATCHERY-RELEASED FISH: DYNAMICS OF "TAG RECOVERY"					
R/EA-12 (10361)	JACKSON ORIN BLANTON	GEORGIA	0	66,000	0
Title: SABRE: PHYSICAL OCEANOGRAPHY AND MODELLING					
R/FS-1 (11114)	J. O. BLANTON/P. G. VERI	GEORGIA	133,741	0	72,882
Title: SOURCES AND TRANSPORT MECHANISMS OF WHITE SHRIMP IN SOUTHEASTERN COASTAL WATERS					
R/FS (11207)	DR. MAC RAWSON	GEORGIA	0	60,000	5,045
Title: PROCESS STUDIES OF PHYSICAL-BIOLOGICAL INTERACTIONS AND LARVAL FISH ON GEORGES BANK					
R/FM-1 (10613)	KIM N. HOLLAND	HAWAII	20,614	0	58,215
Title: HARVEST REFUGIA AS FISHERIES MANAGEMENT TOOLS: AN EMPIRICAL EVALUATION					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-16

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/CFB-19	JOHN W. FLEGER	LOUISIANA	51,017	0	18,874
(11002)	Title: VERIFICATION OF THE UTILITY OF IMMUNOLOGICAL ASSAYS TO IDENTIFY AND QUANTIFY GUT CONTENTS OF MARINE PREDATORS				
R/CFB-21	JOSEPH E. NEIGEL	LOUISIANA	57,500	0	47,016
(11003)	Title: DEVELOPMENT OF DNA BASED ASSAYS FOR PLANKTON SAMPLING				
R/FMD-134	THOMAS D. KOCHER	MAINE/NEW HAMPSHIRE	70,001	0	16,504
(10173)	Title: GENETIC STRUCTURE OF FISHERY-IMPACTED SPECIES IN THE NORTHWEST ATLANTIC				
R/FMD-122	L. G. HARRIS	MAINE/NEW HAMPSHIRE	60,000	0	27,768
(10175)	Title: DEVELOPMENT OF A SUSTAINABLE URCHIN FISHERY IN THE GULF OF MAINE				
R/FMD-247	ROBERT L. VADAS	MAINE/NEW HAMPSHIRE	76,910	0	26,368
(10188)	Title: ECOLOGY AND REPRODUCTIVE BIOLOGY OF GREEN SEA URCHINS				
R/FMD-253	ROBERT S. STENECK	MAINE/NEW HAMPSHIRE	308,112	0	130,065
(10375)	Title: DEVELOPING INDICES NECESSARY FOR PREDICTING COMMERCIAL CATCHES OF THE AMERICAN LOBSTER, HOMARUS AMERICANUS				
R/FMD-241	LES WATLING	MAINE/NEW HAMPSHIRE	40,150	0	18,638
(10972)	Title: EFFECTS OF HABITAT ALTERATION ON FISHERY RECRUITMENT PROCESSES				
A/P-18	BRIAN DOYLE	MAINE/NEW HAMPSHIRE	0	32,381	0
(11161)	Title: GULF OF MAINE DATA COLLECTION BY COMMERCIAL FISHERMAN				
R/FMD-265	DAVID W. TOWNSEND	MAINE/NEW HAMPSHIRE	0	80,000	0
(11202)	Title: U.S. GLOBEC: BROAD-SCALE STUDIES OF NUTRIENTS AND PHYTOPLANKTON ON GEORGES BANK				
R/FM-1	JAMES R. BENCE	MICHIGAN	148,205	0	73,202
(10835)	Title: MANAGEMENT STRATEGIES FOR THE GREAT LAKES SALMONID RECREATIONAL FISHERY IN THE FACE OF ENVIRONMENTAL VARIABILITY				
R/F-32	KEWEN YIN	MINNESOTA	6,065	0	15,754
(10949)	Title: PREDICTING LAKE TROUT (SALVELINUS NAMAYCUSH) SPAWNING HABITAT ALONG THE NORTH SHORE OF LAKE SUPERIOR USING SIDE-SCAN SONAR				

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-17

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/ER-26 (10169)	ROBERT E. DORSEY	MISSISSIPPI/ALABAMA	59,141	0	49,235
Title: APPLICATION OF ARTIFICIAL NEURAL NETWORKS FOR MODELING MARINE FISH STOCKS					
R/COP/96-1P (11190)	DALE B. HAIDVOGEL	NEW JERSEY	0	45,500	66,169
Title: CIRCULATION MODELING FOR THE S.E. BERING SEA; NEW JERSEY COMPONENT.					
R/CMB-6 (10311)	LARS G. RUDSTAM	NEW YORK	60,495	0	81,526
Title: DYNAMICS OF THE MYSID POPULATION IN LAKE ONTARIO					
R/CE-8 (10312)	DONALD J. STEWARD	NEW YORK	48,613	0	41,144
Title: PLANKTIVORE PRODUCTION IN LAKE ONTARIO: EFFECTS OF PREY AVAILABILITY, PREDATION AND SPATIAL HETEROGENEITY					
R/FBM-18 (10987)	ROBERT K. COWEN	NEW YORK	72,467	0	42,730
Title: LARVAL EXCHANGE BETWEEN THE MAB AND SAB: TRANSPORT-MEDIATED RECRUITMENT OF ECONOMICALLY IMPORTANT MAB FISH					
R/FTD-4 (10988)	STEPHEN B. BRANDT	NEW YORK	82,230	0	55,133
Title: LINKING SPACE AND TIME SCALES OF FISH PRODUCTION MEASUREMENTS IN LAKE ONTARIO ADDING THE FOURTH DIMENSION					
R/SAB-6 (10342)	J.A. RICE	NORTH CAROLINA	0	94,000	0
Title: AGE AND DISCRIMINANT ANALYSIS OF ATLANTIC MENHADEN OTOLITHS: VALIDATION AND FIELD APPLICATION					
R/SAB-8 (10344)	L. B. CROWDER	NORTH CAROLINA	0	70,000	0
Title: BIOLOGICAL MODELING AND SABRE SYNTHESIS					
R/SAB-9 (10345)	F. E. WERNER	NORTH CAROLINA	0	80,000	0
Title: SABRE PHYSICAL OCEANOGRAPHIC AND BIOLOGICAL MODELING					
R/SAB-10 (10346)	R. B. FORWARD, JR.	NORTH CAROLINA	0	26,000	0
Title: BEHAVIORAL BASIS OF ESTUARINE TRANSPORT OF ATLANTIC MENHADEN AND SPOT LARVAE					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-18

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/ES-43 (10452)	J. M. MILLER	NORTH CAROLINA Title: RECRUITMENT LEVEL IN TEMPERATE AND TROPICAL FLATFISHES: IS FOOD LIMITING?	21,794	0	0
R/MER-33 (10454)	M. H. POSEY	NORTH CAROLINA Title: INTERACTIVE EFFECTS OF NUTRIENT ENHANCEMENT AND PREDATION ON ESTUARINE COMMUNITY TROPHIC STRUCTURE	12,585	0	21,097
R/MRD-31 (11018)	J.B. GELLER/D.G. LINDQUI	NORTH CAROLINA Title: SOURCE OF VERMILION SNAPPER AT REEFS IN SOUTHERN ONSLOW BAY, NORTH CAROLINA: INFERENCE FROM MOLECULAR POPULATION GENETICS	21,956	0	32,480
R/MRD-33 (11019)	D.B. EGGLESTON/L. XIE	NORTH CAROLINA Title: TESTING HYDRODYNAMIC PREDICTIONS OF LARVAL RECRUITMENT LIMITATION AND IDENTIFICATION OF EARLY JUVENILE "SOURCE" HABITATS	0	0	35,555
R/OPF-46 (10287)	STEVEN A. BERKELEY	OREGON Title: EFFECTS OF FISHING-INDUCED AGE TRUNCATION ON RECRUITMENT AND REPRODUCTIVE POTENTIAL IN BLACK ROCKFISH	84,410	0	0
R/OPF-50 (10296)	DAVID B. SAMPSON	OREGON Title: EVALUATING THE ACCURACY AND VALUE OF GROUND FISH STOCK ASSESSMENTS	69,001	0	37,578
R/COP-2 (11160)	DAVID GREENLAND	OREGON Title: VARIABILITY AND STABILITY OF CLIMATIC/OCEANIC REGIMES IN THE PACIFIC NORTHWEST	0	38,000	0
R/FA-07-4-94 (10243)	JORGE P. GARCIA-SAIS	PUERTO RICO Title: CROSS SHELF DISTRIBUTION PATTERNS OF LARVAL FISHES IN A CARIBBEAN CORAL REEF ENVIRONMENT AND ADJACENT OCEANIC WATERS	44,443	0	22,980
R/FA-06-3-94 (10245)	RICHARD S. APPELDOORN	PUERTO RICO Title: REEF FISH POPULATION MOVEMENT STUDIES FOR DESIGN AND MANAGEMENT OF MARINE FISHERIES RESERVES	44,721	0	48,505
R/31-2-96 (11140)	JAMES P. BEETS/L. MUEHLS	PUERTO RICO Title: SIGNIFICANCE OF SEAGRASS HABITAT TO CORAL REEF FISHERIES AND MARINE FISHERIES RESERVES (MFR)	33,227	0	17,707

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-19

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R-21-1-96 (11141)	JORGE E. CAPELLA	PUERTO RICO	21,200	0	10,100
Title: LARVAL DISPERSION OFF LA PARGUERA: A MODELING STUDY					
R-31-1-96 (11142)	JOSHUA SLADEK NOWLIS	PUERTO RICO	19,034	0	38,894
Title: MATHEMATICAL/COMPUTER ANALYSES OF THE DESIGN AND FUNCTION OF MARINE FISHERIES RESERVES					
R/F-934 (10339)	JEREMY S. COLLIE	RHODE ISLAND	0	99,962	0
Title: MULTISPECIES MODELING OF THE GEORGES BANK FISH COMMUNITY					
R/F-935 (10340)	ANN G. DURBIN	RHODE ISLAND	0	49,961	0
Title: FEEDING BEHAVIOR AND GUT EVACUATION RATE IN ATLANTIC MACKEREL AND ATLANTIC HERRING					
R/EM-951 (10360)	PETRA M. STEGMANN	RHODE ISLAND	0	40,000	0
Title: INTERPRETATION OF LARVAL DISTRIBUTION AND TRANSPORT USING SATELLITE-DERIVED FEATURE MAPS IN THE SABRE STUDY SITE					
R/F-9501 (10782)	JEREMY COLLIE	RHODE ISLAND	60,946	0	31,391
Title: PREDATOR-PREY MODELS OF NEW ENGLAND FISHERIES					
R/A-9504 (11158)	STANLEY COBB	RHODE ISLAND	151,066	0	75,985
Title: DEVELOPING INDICES NECESSARY FOR PREDICTING COMMERCIAL CATCHES OF THE AMERICAN LOBSTER HOMARUS AMERICANUS					
R/F-9504 (11200)	LAWRENCE BUCKLEY	RHODE ISLAND	0	92,200	0
Title: U.S. GLOBEC: DISPERSIVE AND ADVECTIVE INFLUENCES ON THE SURVIVAL OF COD AND HADDOCK ON GEORGES BANK					
R/ES-9601 (11208)	PETER CORNILLION	RHODE ISLAND	0	187,101	0
Title: AN ANALYSIS OF PERSISTENT OCEAN FRONTS ON THE CONTINENTAL SHELF BETWEEN CAPE HATTERAS AND CAPE COD					
R/CO-2 (11072)	C.A. BARANS/E. L. WENNER	SOUTH CAROLINA	50,528	0	17,329
Title: SOURCES AND TRANSPORT MECHANISMS OF WHITE SHRIMP IN SOUTHEASTERN COASTAL WATERS.					
R/F-65 (10595)	SCOTT A. HOLT	TEXAS	65,904	0	19,380
Title: RECRUITMENT SUCCESS OF ESTUARINE-DEPENDENT MARINE FISHES: GROWTH AND NATURAL MORTALITY OF LARVAL AND JUVENILE RECRUITS					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-20

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/F-63	DONALD A. HARPER, JR.	TEXAS	45,856	0	33,122
(10602)	Title: THE EFFECT OF PREY DENSITIES AND NURSERY HABITAT QUALITY ON PENAEID SHRIMP RECRUITMENT SUCCESS				
R/CF-33	ROMUALD N. LIPCIUS	VIRGINIA	100,218	0	95,045
(10929)	Title: BIOLOGICAL AND PHYSICAL DETERMINANTS OF BLUE CRAB RECRUITMENT: SOURCES, SINKS AND METAPOPOPULATION DYNAMICS				
R/F-118	T. PIETSCH	WASHINGTON	0	39,712	0
(10723)	Title: INTEGRATION AND DISSEMINATION OF ICHTHYOPLANKTON DATABASES				
R/F-97	D. R. GUNDERSON	WASHINGTON	0	74,957	0
(10725)	Title: BIOLOGY AND MANAGEMENT OF ROCKFISH STOCKS				
R/F-110	ROBERT FRANCIS	WASHINGTON	46,000	0	24,886
(10759)	Title: NATURAL SCALES OF VARIABILITY IN COASTAL MARINE ECOSYSTEMS				
R/F-115	GORDON L. SWARTZMAN	WASHINGTON	78,900	0	26,535
(10978)	Title: FISH SCHOOL SPECIES IDENTIFICATION BY ACOUSTIC BACKSCATTER				
R/F-122	GORDON L. SWARTZMAN	WASHINGTON	0	99,056	0
(11168)	Title: HIGH RESOLUTION ACOUSTIC AND JUVENILE POLLOCK RETROSPECTIVE DATA ANALYSIS				
R/LR-73	RUTH B. PHILLIPS	WISCONSIN	28,027	0	36,002
(11150)	Title: APPLICATION OF MICROSATELLITES TO STOCK IDENTIFICATION IN LAKE SUPERIOR LAKE TROUT				
R/LR-72	JAMES F. KITCHELL	WISCONSIN	60,091	0	64,386
(11151)	Title: SUSTAINABILITY OF THE LAKE SUPERIOR FISH COMMUNITY: AN ANALYSIS OF OPPORTUNITIES AND CONSTRAINTS				
R/B-133-PT	JAMES H. CHURCHILL	WOODS HOLE OCEANOGRAPHIC INST.	0	34,000	0
(10350)	Title: A STUDY OF WATER AND LARVAE TRANSPORT IN BEAUFORT INLET, NC				
R/G-21	DAVID G. AUBREY	WOODS HOLE OCEANOGRAPHIC INST.	41,868	0	4,500
(10431)	Title: DEVELOPMENT OF SPECIES-SPECIFIC IMMUNOFLUORESCENT MARKERS FOR LARVAE OF BENTHIC INVERTEBRATES				

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-21

<u>Project Number</u>	<u>PI</u>	<u>Program</u>	<u>Sea Grant</u>	<u>Pass Thru</u>	<u>Matching</u>
R/B-138	FRANCIS JUANES	WOODS HOLE OCEANOGRAPHIC INST.	31,293	0	24,643
(11100) Title: SCHOOL STRUCTURE AND INDIVIDUAL FEEDING BEHAVIOR OF BLUEFIN TUNA, THUNNUS THYNNUS					

Number of Projects: 75

Subtotal: 3,184,883 1,859,830 1,913,842

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-22

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 32 - ANTICIPATING SOCIAL AND ECONOMIC IMPACTS					
R/E-12 (10195)	LEE ANDERSON	DELAWARE Title: THE TRANSITION PERIOD IN ITQ FISHERIES MANAGEMENT PROGRAMS	3,418	0	31,848
R/BS-8 (11021)	J. C. JOHNSON/M.K. ORBAC	NORTH CAROLINA Title: LONGITUDINAL ANALYSIS OF EMERGING FISHERIES POLICY	15,382	0	13,832
R/BS-9 (11022)	D. GRIFFITH/J. C. JOHNSO	NORTH CAROLINA Title: MANAGING THE SOCIAL HEALTH OF NORTH CAROLINA FISHERIES IN A CONTEXT OF CONFLICT.	26,425	0	0
R/FDF-6 (10278)	SUSAN S. HANNA	OREGON Title: AN ECONOMIC HISTORY OF THE NEW ENGLAND AND PACIFIC GROUND FISH FISHERIES	59,656	0	0
R/FDF-4 (10279)	REBECCA L. JOHNSON	OREGON Title: ECONOMIC IMPACTS OF REDUCED MARINE RESOURCE HARVESTS ON COASTAL COMMUNITIES IN THE PACIFIC NORTHWEST AND NEW ENGLAND	69,802	0	9,990
R/FDF-1 (10280)	BRUCE R. RETTIG	OREGON Title: AN ANALYSIS OF RESPONSES TO CRISES IN PACIFIC SALMON FISHERIES	52,732	0	19,170
R/FDF-3 (10282)	SHELIA M. CORDRAY	OREGON Title: RESOURCE RELIANCE IN A SOCIAL CONTEXT: HUMAN CAPITAL IN FISHING COMMUNITIES, BUSINESSES, AND FAMILIES	69,714	0	39,928
R/FDF-5 (10283)	ANISA M. ZVONKOVIC	OREGON Title: PATTERNS OF INVOLVEMENT IN BUSINESS AND FAMILY LIFE AMONG FISHING FAMILIES: INDIVIDUAL, MARITAL, AND FAMILY WELL-BEING	69,838	0	22,888
R/OPF-48 (10290)	SUSAN S. HANNA	OREGON Title: THE IMPACT OF ACCESS LIMITATION ON A SYSTEM OF LINKED FISHERIES	21,243	0	46,351
R/SS-9502 (10784)	JON SUTINEN	RHODE ISLAND Title: SPECIES SELECTION AND ECONOMIC PERFORMANCE IN THE NEW ENGLAND GROUND FISH FISHERY	67,684	0	30,782

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-23

<u>Project Number</u>	<u>PI</u>	<u>Program</u>	<u>Sea Grant</u>	<u>Pass Thru</u>	<u>Matching</u>
R/SS-9504	HELEN MEDERER	RHODE ISLAND	21,189	0	32,409
(10788) Title: GROUND FISH CRISIS IN NEW ENGLAND FISHERIES: FAMILY STRESS, COPING AND ADAPTATION UNDER CHANGING REGULATIONS					

R/SEL-7	WADE L. GRIFFIN, SR.	TEXAS	39,775	0	23,145
(10596) Title: BIOLOGICAL AND ECONOMIC IMPACTS OF A LIMITED ENTRY PROGRAM IN THE TEXAS BAY AND BAIT SHRIMP FISHERY					

R/PS-46	RICHARD C. BISHOP	WISCONSIN	49,175	0	27,957
(11155) Title: SUSTAINABILITY AND THE ECONOMICS OF FISHERIES MANAGEMENT: A LAKE SUPERIOR CASE STUDY					

Number of Projects: 13			Subtotal:	566,033	0 298,300

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-24

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 33 - MINIMIZING BYCATCH

R/OPF-49	RICHARD K. DEFREEZ	OREGON	63,294	0	44,296
(10293)	Title: DEVELOPMENT OF LASER MARKS FOR MASS MARKING HATCHERY SALMON				

R/F-9502	JOSEPH DEALTERIS	RHODE ISLAND	59,500	0	29,509
(10789)	Title: SPECIES SELECTIVITY IN THE NEW ENGLAND GROUND FISH FISHERIES: BEHAVIOR OF THE FISH AND FISHERS				

R/F-111	ELLEN K. PIKITCH	WASHINGTON	114,200	0	49,908
(10760)	Title: POST-CAPTURE SURVIVAL OF PACIFIC HALIBUT				

Number of Projects:	3		Subtotal:	236,994	0	123,713
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-25

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 34 - ENHANCING WILD STOCKS THROUGH AQUACULTURE

R/LR-A-18	DENNIS M. HANISAK	FLORIDA	62,729	0	31,365
(10012) Title: DEVELOPMENT OF SEAGRASS NURSERY TECHNIQUES					

R/ER-14	L.E. BURNETT	SOUTH CAROLINA	0	0	0
(11074) Title: ENVIRONMENTAL HYPOXIA AND CO2 INFLUENCE THE PROPAGATION, THE PHYSIOLOGY, AND THE BIOCHEMISTRY OF INFECTIONS OF PERKINSUS MARINUS IN OYSTERS					

R/OD-4	MARK LUCKENBACH	VIRGINIA	71,408	0	35,705
(10557) Title: COOPERATIVE REGIONAL OYSTER SELECTIVE BREEDING (CROSBREED) PROJECT					

R/OD-5	EILEEN HOFMANN	VIRGINIA	50,861	0	30,195
(10559) Title: CRASSOSTREA VIRGINICA PATHOGENS IN CHESAPEAKE BAY OYSTER POPULATIONS: A DUAL DISEASE SIMULATION MODEL OF PARASITE-HOST INTERACTIONS OVER A LARGE SPATIAL SCALE					

R/F-112	PAUL BENTZEN	WASHINGTON	76,300	0	37,617
(10743) Title: CONSERVATION GENETICS OF PACIFIC SALMON					

E/R/F-119	T. QUINN/R.BILBY WEYERHA	WASHINGTON	22,518	0	31,647
(11061) Title: FACTORS AFFECTING THE GROWTH, SURVIVAL, HABITAT USE AND COMPETITIVE SUCCESS OF NATURALLY-REARED AND HATCHERY-REARED COHO SALMON.					

Number of Projects: 6

Subtotal:	283,816	0	166,529
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-26

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 41 - ADMINISTRATION AND COORDINATION

A/SE-181-95	LADON SWANN	ILLINOIS/INDIANA	48,086	0	26,589
(10769) Title: DEVELOPMENT OF AN AQUACULTURE NETWORK INFORMATION CENTER (AQUANJC) ON THE WWW					

A/F-87	DONALD WEBSTER	MARYLAND	20,000	0	14,950
(11209) Title: NATIONAL AQUACULTURE EXTENSION CONFERENCE.					

RC-36	CLIFFORD A. GOUDEY	MASSACHUSETTS INST. OF TECH.	4,034	0	2,000
(10114) Title: LIST SERVER FOR OCEAN FARMERS OF AMERICA					

A/A-1	JACK M. WHETSTONE	SOUTH CAROLINA	28,173	0	31,044
(10260) Title: A TECHNOLOGY TRANSFER PROGRAM FOR ENVIRONMENTALLY FRIENDLY COASTAL AQUACULTURE: PHASE I - PENAEID SHRIMP AQUACULTURE					

Number of Projects:	4	Subtotal:	100,293	0	74,583
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-27

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 42 - DEVELOPING AND IMPROVING GROW-OUT SYSTEMS					
R/A-96 (10492)	RAUL PIEDRAHITA/ROGER GA	CALIFORNIA	17,644	0	15,598
Title: INTENSIVE AQUACULTURE SYSTEM MODELING					
R/A-97 (10637)	ARMAND KURIS	CALIFORNIA	34,545	0	52,630
Title: MANAGEMENT AND RISK ASSESSMENT OF SABELLID POLYCHAETE INFESTATIONS IN ABALONE MARICULTURE FACILITIES					
R/F-15 (11184)	BERNARD R. PETROSKY	DELAWARE	50,000	0	25,460
Title: DEVELOPMENT OF AQUACULTURE PRODUCTION METHODS APPROPRIATE TO THE MID-ATLANTIC REGION					
R/A02-2-95 (10767)	RONALD ROSATI	ILLINOIS/INDIANA	14,864	0	10,113
Title: YELLOW PERCH EFFLUENT CHARACTERIZATION					
R/A-02-3-95 (10768)	MARSHALL A. MARTIN	ILLINOIS/INDIANA	17,252	0	17,042
Title: MARKET RESEARCH FOR YELLOW PERCH AQUACULTURE					
R/A-44 (10238)	RONALD F. MALONE	LOUISIANA	66,034	0	13,102
Title: DEVELOPMENT OF ENGINEERING CRITERIA FOR RECIRCULATING MARINE FINGERLING PRODUCTION SYSTEMS WITH EXTENDED WATER REUSE					
R/A-45 (10239)	KELLY A. RUSCH	LOUISIANA	74,688	0	6,995
Title: A COMPUTER AUTOMATED, INTENSIVE LARVAL FEED SYSTEM FOR COMMERCIAL MARINE FINGERLING PRODUCTION					
R/A-46 (11004)	RONALD F. MALONE	LOUISIANA	62,194	0	12,513
Title: MICRO-DESIGN OF MEDIA FOR USE IN FLOATING BEAD FILTERS IN RECIRCULATING AQUACULTURE SYSTEMS					
R/A-47 (11005)	KELLY A. RUSCH	LOUISIANA	59,179	0	18,771
Title: DEVELOPMENT OF PRODUCTION GUIDELINES FOR AND EVALUATION OF MICROALGAL PRODUCTS FROM A HYDRAULICALLY INTEGRATED SERIAL TURBIDOSTAT ALGAL REACTOR (HISTAR)					
R/FMD-506 (10372)	MICHAEL R. GOSZ	MAINE/NEW HAMPSHIRE	49,817	0	25,413
Title: DESIGN AND MODEL TESTING OF AQUACULTURE NET-PENS					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-28

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
RC-35	CLIFFORD A. GOUDEY	MASSACHUSETTS INST. OF TECH.	46,094	0	28,100
(10116) Title: A NATIONAL ENGINEERING TEST CENTER FOR OFFSHORE MARICULTURE					
E/R/MIT-96	CLIFFORD A. GOUDEY	MASSACHUSETTS INST. OF TECH.	30,000	0	40,000
(11077) Title: OPERATIONAL OPTIMIZATION OF AN OCEAN-BASED AQUACULTURE FACILITY.					
A-02	CLIFFORD A. GOUDEY	MASSACHUSETTS INST. OF TECH.	42,467	0	21,000
(11093) Title: CENTER FOR FISHERIES ENGINEERING					
R/AF-32	H.DANIELS/C.SULLIVAN/R.H	NORTH CAROLINA	62,870	0	0
(11025) Title: AQUACULTURE OF SOUTHERN FLOUNDER; REPRODUCTION, LARVICULTURE AND GROWOUT					
R/SS-9505	JAMES ANDERSON	RHODE ISLAND	47,343	0	29,559
(10785) Title: ECONOMIC ANALYSIS OF LAND-BASED AQUACULTURE OF SUMMER FLOUNDER					
A/F-9503	JOSEPH DEALTERIS	RHODE ISLAND	57,720	0	38,502
(10798) Title: LAND-BASED SUMMER FLOUNDER AQUACULTURE: TECHNICAL ASSISTANCE TO AN EMERGING INDUSTRY AND EDUCATING THE PUBLIC					
R/A-29	JOSPEH R. TOMASSO	SOUTH CAROLINA	24,406	0	12,686
(10258) Title: HYPERINTENSIVE AQUACULTURE OF RED DRUM IN RECIRCULATING SYSTEMS: IDENTIFICATION AND MANAGEMENT OF STRESSFUL AND NONOPTIMAL ENVIRONMENTS					
R/A-27	P. A. SANDIFER	SOUTH CAROLINA	146,349	0	85,187
(10259) Title: MANAGEMENT OF SLUDGE ACCUMULATIONS IN INTENSIVE POND CULTURE OF SHRIMP					
R/A-26	PAUL A. SANDIFER	SOUTH CAROLINA	94,571	0	55,866
(10264) Title: DEVELOPMENT OF ENVIRONMENTALLY-FRIENDLY COASTAL AQUACULTURE TECHNOLOGIES					
R/AQ-22	JEFFREY A. MALISON	WISCONSIN	98,522	0	51,928
(10132) Title: ASSESSMENT AND MANAGEMENT OF PHYSIOLOGICAL STRESS IN COOL-WATER FISH CULTURE					
Number of Projects: 20			Subtotal:	1,096,559	0 560,465

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-29

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 43 - IMPROVING HUSBANDRY					
R/A-14 (10516)	CHARLES YARISH	CONNECTICUT	154,823	0	75,845
Title: DEVELOPING A COMMERCIALY VIABLE SEAWEED AQUACULTURE INDUSTRY IN NEW ENGLAND: FIELD AND CULTURE EVALUATIONS					
R/F-11 (10706)	P.M. GAFFNEY	DELAWARE	98,208	0	16,058
Title: EVALUATION OF AMERICAN OYSTER STOCKS FOR RESOURCE REHABILITATION: DISEASE RESISTANCE AND GENETICS					
R/LR-A-19 (10013)	R. LEROY CRESWELL	FLORIDA	42,892	0	25,656
Title: CULTIVATION OF ORNAMENTAL MARINE SHRIMP FOR THE SALTWATER AQUARIUM INDUSTRY					
R/AQ-37 (10609)	GORDON GRAU	HAWAII	68,659	0	33,933
Title: FEEDS AND GROWTH TECHNOLOGY RESEARCH					
R/AQ-57 (10610)	CHRISTOPHER L. BROWN	HAWAII	14,115	0	21,771
Title: NON-INVASIVE METHODS FOR REEF FISH LARVAL CULTURE					
R/A02-1-95 (10766)	PAUL B. BROWN	ILLINOIS/INDIANA	73,911	0	39,018
Title: LIPID NUTRITION AND METABOLISM IN YELLOW PERCH					
R/FMD-140 (10373)	CHENEY/LEVINE/MATHIESON	MAINE/NEW HAMPSHIRE	522,220	0	286,864
Title: DEVELOPING A COMMERCIALY VIABLE SEAWEED AQUACULTURE INDUSTRY IN NEW ENGLAND					
R/FMD-504 (10374)	HUNT HOWELL	MAINE/NEW HAMPSHIRE	220,575	0	106,597
Title: DEVELOPMENT OF A COMMERCIALY VIABLE COD AND HADDOCK AQUACULTURE INDUSTRY IN NEW ENGLAND					
R/FMD-243 (10974)	B. BARBER	MAINE/NEW HAMPSHIRE	30,117	0	21,200
Title: IMPACTS OF THE PARASITE BONAMIA OSTSCAE ON THE EUROPEAN OYSTER AND STRATEGIES FOR COMMERCIAL CULTURE					
R/F-83 (10088)	REGINAL M. HARRELL	MARYLAND	68,080	0	56,717
Title: EVALUATION OF THE AQUACULTURE POTENTIAL OF DIFFERING STRAINS OF STRIPED BASS					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-30

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/ODR-5	EILEEN HOFMANN/JOHN KLIN	MARYLAND	39,354	0	18,844
(10739)	Title: CRASSOSTREA VIRGINICA PATHOGENS IN CHESAPEAKE BAY OYSTER POPULATIONS: A DUAL DISEASE SIMULATION OF PARASITE-HOST INTERACTIONS OVER A LARGE SPATIAL SCALE				
R/ODR-08	KENNEDY T. PAYNTER	MARYLAND	67,532	0	21,830
(10742)	Title: COOPERATIVE REGIONAL OYSTER SELECTIVE BREEDING (CROSBREED) PROJECT.				
R/LR-34	BUDDINGTON	MISSISSIPPI/ALABAMA	56,343	0	28,437
(10924)	Title: DEVELOPMENT OF NOVEL, LOW-COST DIET FOR LARVAL FISH AND CRUSTACEANS				
R/LR-37	DAVID B. ROUSE/WILLIAM H	MISSISSIPPI/ALABAMA	0	330,000	0
(11210)	Title: COASTAL ALABAMA SEAFOOD HARVEST - PHASE II				
R/F-95004	MICHAEL P. RUSSELL	NEW JERSEY	51,652	0	31,792
(10575)	Title: ENHANCING HARD CLAM AQUACULTURE THROUGH MANIPULATIONS OF LARVAL CULTURING TECHNIQUES				
R/F-95010	STANDISH K. ALLEN, JR.	NEW JERSEY	105,385	0	66,383
(10709)	Title: COOPERATIVE REGIONAL OYSTER SELECTIVE BREEDING (CROSBREED) PROJECT: NJ COMPONENT				
R/OD-2	SUSAN FORD	NEW JERSEY	192,248	0	96,208
(10710)	Title: LIFE CYCLE STUDIES OF HAPLOSPORIDIUM NELSONI (MSX) USING PCR TECHNOLOGY: NJ COMPONENT				
R/OD-5	ERIC POWELL	NEW JERSEY	18,979	0	11,257
(10711)	Title: CRASSOSTREA VIRGINICA PATHOGEN IN CHESAPEAKE BAY OYSTER POPULATIONS: A DUAL DISEASE SIMULATION MODEL OF PARASITE-HOST INTERACTIONS OVER A LARGE SPATIAL SCALE - NEW JERSEY COMPONENT.				
R/ATD-8	JOSEPH K. BUTTNER	NEW YORK	88,047	0	51,804
(10989)	Title: IMPACTS AND MITIGATION OF COMMERCIAL NET PEN CULTURE IN THE GREAT LAKES				
R/ABM-1	DAVID O. CONOVER	NEW YORK	71,198	0	46,797
(10990)	Title: COUNTERGRADIENT LATITUDINAL VARIATION IN GROWTH OF STRIPED BASS: IMPLICATIONS FOR AQUACULTURE				
R/ER-27	DAVID A. CULVER	OHIO	18,292	0	20,212
(10216)	Title: USE OF ELECTRON TRANSPORT SYSTEM ENZYME ACTIVITY TO ESTIMATE RESPIRATION IN BIOENERGETICS MODELS OF JUVENILE FISH: GROWTH AND COMPENSATION OF ZOOPLANKTON				

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-31

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/A-9501 (10777)	DAVID BENGTON	RHODE ISLAND	99,846	0	0
Title: INCREASING HATCHERY PRODUCTION OF SUMMER FLOUNDER LARVAE THROUGH IMPROVEMENTS IN FEEDING AND NUTRITION					
R/A-9502 (10778)	JENNIFER SPECKER	RHODE ISLAND	84,003	0	44,168
Title: CONTROLLING THE TIMING OF METAMORPHOSIS IN CULTURED FLOUNDER					
R/A-9503 (10779)	GRACE KLEIN-MACPHEE	RHODE ISLAND	51,528	0	27,832
Title: GROWTH ACCELERATION IN EARLY JUVENILE STAGE SUMMER FLOUNDER					
R/A-9504 (10780)	TERENCE BRADLEY	RHODE ISLAND	110,742	0	63,816
Title: DEVELOPMENT OF A COMMERCIALLY VIABLE AQUACULTURE INDUSTRY IN NEW ENGLAND BASED ON COD AND HADDOCK					
R/A-25 (10261)	T.I. SMITH	SOUTH CAROLINA	59,413	0	54,847
Title: IMPROVEMENT OF HYBRID STRIPED BASS AQUACULTURE THROUGH DEVELOPMENT OF CULTURED BROODSTOCKS AND IMPROVED SPawning TECHNIQUES: PHASE II					
R/M-55 (10081)	W.H. NEILL	TEXAS	45,920	0	25,137
Title: HYPERINTENSIVE PRODUCTION OF RED DRUM IN RECIRCULATING AQUACULTURE SYSTEMS: OPTIMIZATION OF ENVIRONMENT					
R/M-53 (10082)	PHILLIP C. LEE	TEXAS	68,525	0	35,849
Title: AUTOMATED MONITORING AND INTELLIGENT CONTROL OF ENVIRONMENTAL CONDITIONS AND WATER FILTRATION FOR COMMERCIAL, RECIRCULATING FINFISH FINGERLING PRODUCTION					
R/M-52 (10083)	D.M. GATLIN	TEXAS	58,631	0	36,511
Title: HYPERINTENSIVE PRODUCTION OF RED DRUM RECIRCULATING AQUACULTURE SYSTEMS: OPTIMIZATION ON DIET COMPOSITION AND FEED REGIMES					
R/M-41 (10591)	G. JOAN HOLT	TEXAS	58,056	0	29,028
Title: MICROBIAL HATCHERY TECHNOLOGY FOR THE UTILIZATION OF ARTIFICIAL DIETS IN INTENSIVE CULTURE OF FISH LARVAE					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-32

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/OD-6	FU-LIN E. CHU/ASWANI K.	VIRGINIA	76,836	0	38,418
(11285) Title: ACID PHOSPHATASE(S): A VIRULENCE FACTOR OF THE PROTOZOAN PARASITE, PERKINSUS MARINUS AGAINST HOST, OYSTER'S DEFENSE					

R/A-72	MARSHA LANDOLT	WASHINGTON	31,100	0	20,452
(10976) Title: FURTHER DEVELOPMENT OF A SUBUNIT VACCINE FOR CONTROL OF BACTERIAL KIDNEY DISEASE					

A/AS-37	FRED P. BINKOWSKI	WISCONSIN	17,956	0	21,903
(11146) Title: AQUACULTURE DEVELOPMENT WITHIN THE GREAT LAKES REGION: THE SEA GRANT INITIATIVE					

Number of Projects: 33			Subtotal:	2,765,186	330,000 1,475,184

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-33

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 44 - ENHANCING AQUACULTURE THROUGH BIOTECHNOLOGY					
R/A-95 (10497)	JANE BURNS	CALIFORNIA	42,728	0	18,500
Title: PSEUDOTYPED RETROVIRAL VECTOR-MEDIATED GENE TRANSFER INTO STRIPED BASS					
R/A-94 (10635)	HOWARD BERN	CALIFORNIA	80,943	0	42,000
Title: SALINITY, HORMONES AND THE PHYSIOLOGY OF GROWTH AUGMENTATION IN TILAPIA (OREOCHROMIS MOSSAMBICUS)					
R/A-98 (10638)	GARY MOBERG	CALIFORNIA	46,163	0	66,988
Title: ENDOCRINE MANIPULATION OF FEMALE STURGEON REPRODUCTION					
R/A-99 (10639)	JUAN MEDRANO	CALIFORNIA	28,555	0	23,115
Title: IDENTIFYING THE SEX OF WHITE SURGEON USING MOLECULAR TECHNIQUES					
R/A-104 (11112)	FRED GRIFFIN	CALIFORNIA	30,320	0	0
Title: BIOCHEMICAL BASIS OF SPERM EGG RECOGNITION IN PENAEID SHRIMP					
R/A-12 (10694)	HANS LAUFER	CONNECTICUT	75,000	0	30,464
Title: LIPOSOMAL DELIVERY OF HORMONES FOR CRUSTACEAN AQUACULTURE: FORMULATION, BIOCHEMICAL MODE OF ACTION, AND PHYSIOLOGY					
R/F-13 (10703)	P. M. GAFFNEY	DELAWARE	11,726	0	0
Title: COOPERATIVE REGIONAL OYSTER SELECTIVE BREEDING PROJECT (CROSBREED)					
306390 (10830)	DONALD V. LIGHTNER	INDEPENDENT/OTHER	75,000	0	37,500
Title: USE OF POLYMERASE CHAIN REACTION (PCR) TO DETECT PENAEID SHRIMP VIRUSES AS AN AID IN THE DEVELOPMENT OF SPECIFIC PATHOGEN-FREE SHRIMP STOCKS.					
R/OA-3 (11006)	JOHN SUPAN	LOUISIANA	45,861	0	22,121
Title: DEVELOPMENT AND TESTING OF TETRAPLOID CRASSOSTREA VIRGINICA BROODSTOCK FOR PRODUCING TRIPLOID OYSTERS					
R/FMD-132 (10178)	SUBHASH C. MINOCHA	MAINE/NEW HAMPSHIRE	50,000	0	42,140
Title: GENETIC ENGINEERING OF SEaweEDS					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-34

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/FMD-249	B. NICHOLSON	MAINE/NEW HAMPSHIRE	70,319	0	38,938
(10973) Title: REVERSE TRANSCRIPTASE-PCR ASSAY FOR DETECTION OF AQUATIC BIRNAVIRUSES					
R/F-80	MARY HAGEDORM	MARYLAND	50,000	0	26,455
(10085) Title: CRYOPRESERVATION OF TELEOST EMBRYOS					
R/F-80	MARY HAGEDORM	MARYLAND	88,950	0	32,101
(10085) Title: CRYOPRESERVATION OF TELEOST EMBRYOS					
R/F-81	YONATHAN ZOHAR	MARYLAND	72,001	0	52,991
(10086) Title: THE NOVEL GONADOTROPIN RELEASING HORMONE (GNRH) OF FISH: ITS FUNCTIONS, REGULATION OF SYNTHESIS AND RELEASE AND POTENTIAL USE FOR SPAWNING MANIPULATION IN STRIPPED BASS					
R/F-81	YONATHAN ZOHAR	MARYLAND	93,397	0	41,591
(10086) Title: THE NOVEL GONADOTROPIN RELEASING HORMONE (GNRH) OF FISH: ITS FUNCTIONS, REGULATION OF SYNTHESIS AND RELEASE AND POTENTIAL USE FOR SPAWNING MANIPULATION IN STRIPPED BASS					
A/F-82	MERRILL LEFFLER	MARYLAND	49,999	0	39,190
(10087) Title: THE ROLE OF IRON AND HOST DERIVED GROWTH FACTORS IN REGULATING GENE EXPRESSION OF THE OYSTER PARASITE PERKINSUS MARINUS: THE BASIS FOR PARASITE PROLIFERATION INHIBITION STRATEGIES					
R/ODR-03	PATRICK GAFFNEY	MARYLAND	81,370	0	57,868
(10737) Title: EVALUATION OF AMERICAN OYSTER STOCKS FOR RESOURCE REHABILITATION: DISEASE RESISTANCE AND GENETICS					
R/ODR-07	GERARDO R. VASTA	MARYLAND	199,199	0	100,171
(10741) Title: THE MOLECULAR BASIS FOR THE ETIOLOGY OF THE OYSTER "DERMO" DISEASE: GENE REGULATION EVENTS SUSCEPTIBLE TO CHEMICAL INHIBITION					
R/BT-05	JOHN M. TRENT	MARYLAND	98,661	0	63,588
(11170) Title: RED DRUM GROWTH HORMONE: HETEROLOGOUS PRODUCTION IN A EUKARYOTIC EXPRESSION SYSTEM, PHYSIOLOGY, AND EFFECTS ON GROWTH AFTER DIETARY ADMINISTRATION					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-35

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
RB-42 (11091)	DONALD P. CHENEY	MASSACHUSETTS INST. OF TECH.	30,121	0	21,002
Title: NOVEL POLYSACCHARIDE PRODUCTION THROUGH SEAWEED GENETIC MANIPULATION AND CELL CULTURE TECHNOLOGY					
RB-43 (11097)	ROBERT LANGER	MASSACHUSETTS INST. OF TECH.	75,000	0	71,953
Title: DEVELOPMENT OF NEW METHODS FOR EFFICIENT VACCINATION OF FARMED FISH: CONTROLLED AND SUSTAINED DELIVERY OF VACCINES					
(10411)	PERRY B. HACKETT, JR.	MINNESOTA	61,554	0	23,307
Title: DEVELOPMENT OF EXPRESSION VECTORS FOR TRANSGENIC FISH					
R/F-31 (10948)	ANNE R. KAPUSCINSKI	MINNESOTA	12,230	0	24,748
Title: TEMPORAL TRENDS IN GENETIC DIVERSITY IN MANAGED FISH POPULATIONS AND IMPLICATIONS FOR SUSTAINABILITY					
R/AF-30 (10438)	C.V. SULLIVAN	NORTH CAROLINA	64,730	0	0
Title: REPRODUCTION OF TEMPERATE BASES (GENUS MORONE) REGULATION BY GONADOTROPHINS, GROWTH HORMONE, AND PROLACTIN					
R/AF-33 (11268)	EDWARD NOGA & MICHAEL LE	NORTH CAROLINA	16,275	0	26,361
Title: CHARACTERISTICS OF A NOVEL, POTENT, IMMUNOLOGICAL DEFENSE IN FISH					
R/BT-3 (10223)	RICHARD T. SAYRE	OHIO	106,657	0	59,976
Title: APPLICATIONS OF RECOMBINANT ALGAE FOR THE TREATMENT OF HEAVY METAL CONTAMINATION IN AQUEOUS SOLUTIONS					
R/A-7 (11129)	KONRAD, DABROWSKI	OHIO	37,970	0	36,006
Title: EXTENDING THE SEASONAL AVAILABILITY OF WALLEYE JUVENILES THROUGH ENVIRONMENTAL/HORMONAL TREATMENT DURING REPRODUCTION AND EVALUATING THE QUALITY OF RESULTING PROGENY					
R/FSD-28 (10286)	JO-ANN C. LEONG	OREGON	72,624	0	26,932
Title: RATIONAL IMMUNOTHERAPY FOR FISH: ISOLATION AND CHARACTERIZATION OF RAINBOW TROUT CYTOKINES					
R/FSD-26 (10288)	JOHN L. FRYER	OREGON	44,540	0	82,137
Title: DEVELOPMENT OF DNA PROBES TO CHARACTERIZE THE LIFE CYCLE OF CERATOMYXA SHASTA, A MYXOSPOREAN PARASITE OF SALMONID FISH					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-36

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/BT-16	J. LEONG/J. SMITH/L. BOO	OREGON	74,301	0	11,221
(11067) Title: DEVELOPMENT OF CAULOBACTERS AS A VACCINE PRESENTATION SYSTEM FOR THE IMMUNIZATION OF SALMONID FISH AGAINST IHN VIRUS.					

R/BT-1	LARRY L. KEELEY	TEXAS	83,989	0	28,829
(10590) Title: BIOTECHNOLOGY OF GONAD-INHIBITING HORMONE TO IMPROVE PENAEID SHRIMP AQUACULTURE					

R/OD3	FAISAL MOHAMMED	VIRGINIA	122,380	0	61,201
(10556) Title: IDENTIFICATION OF INHIBITORS AGAINST PERKINSUS MARINUS PROTEASES IN OYSTER PLASMA					

R/A-27	THOMAS CACECI	VIRGINIA	57,327	0	28,727
(10928) Title: GROWTH HORMONE IN PRAWNS					

R/A-73	ARTHUR GEE	WASHINGTON	69,433	0	71,860
(10537) Title: DEVELOPMENT OF MOLECULAR DIAGNOSTIC METHODS OF DETECTING PACIFIC OYSTER NOCARDIOSIS DISEASE.					

R/BT-8	JEFFREY A. MALISON	WISCONSIN	110,244	0	0
(10567) Title: EVALUATING YELLOW PERCH TETRAPLOIDS FOR THE PRODUCTION OF POLYPLOIDS, GYNOGENS AND HYBRIDS					

R/AQ-30	TERENCE P. BARRY	WISCONSIN	66,625	0	43,349
(11148) Title: STEROID REGULATION OF THE STRESS RESPONSE IN SALMONID FISHES					

R/B-139	CHERYL ANN BUTMAN	WOODS HOLE OCEANOGRAPHIC INST.	55,000	0	36,531
(11105) Title: DEVELOPMENT OF SPECIES-SPECIFIC IMMUNOFLUORESCENT MARKERS FOR BIVALVE LARVAE WITH AN APPLICATION TO FISHERIES MANAGEMENT					

Number of Projects: 35			Subtotal:	2,451,192	0 1,389,861

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-37

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 51 - PRODUCT QUALITY AND SAFETY

R/ST-1 (10203)	DALLAS G. HOOVER	DELAWARE	9,380	0	37,860
Title: IMPROVEMENT OF THE MICROBIAL SAFETY AND QUALITY OF SEAFOOD BY HIGH HYDROSTATIC PRESSURE TREATMENT					
R/LR-Q-19 (10009)	MARK L. TAMPLIN	FLORIDA	38,669	0	21,564
Title: DEFINING CONCENTRATIONS OF VIRULENT VIBRIO VULNIFICUS IN OYSTERS					
R/PMO-16 (11007)	RONALD J. SIEBELING	LOUISIANA	28,313	0	15,690
Title: SEROLOGICAL EXAMINATION OF CLINICAL AND ENVIRONMENTAL VIBRIO VULNIFICUS USING CAPSULE AND LIPOPOLYSACCHARIDE SPECIFIC ANTIBODY					
R/PMO-17 (11008)	PAUL LAROCK	LOUISIANA	35,000	0	26,517
Title: A PROCESS TO KILL VIBRIO VULNIFICUS IN OYSTERS					
R/MT-26 (10167)	ASIM K. BEJ	MISSISSIPPI/ALABAMA	54,408	0	51,127
Title: RAPID DETECTION OF MICROBIAL PATHOGENS IN SHELLFISH USING ARBITRARILY PRIMED POLYMERASE CHAIN REACTION (AP-PCR)					
R/SF-6 (10294)	HAEJUNG AN	OREGON	70,214	0	20,312
Title: STRATEGIES TO CONTROL HISTAMINE AND OTHER BIOGENIC AMINES FORMATION IN ALBACORE TUNA					
R/SP-11 (10930)	CAMERON HACKNEY	VIRGINIA	47,325	0	30,461
Title: QUALITY AND SHELF-LIFE INDICATORS FOR PASTEURIZED CRABMEAT					
R/SP-12 (10931)	GEORGE FLICK	VIRGINIA	33,950	0	19,350
Title: THE DETECTION AND CONCENTRATIONS OF CADAVERINE, PUTRESCINE, AND HISTAMINE IN SELECTED FRESH AND PROCESSED FINFISH AND SHELLFISH					
R/CM-23 (10933)	HOWARD KATOR	VIRGINIA	39,276	0	19,510
Title: EVALUATION OF TWO COLIPHAGE CLASSIFICATION METHODS TO DISTINGUISH SOURCES OF FECAL CONTAMINATION					

Number of Projects: 9

Subtotal: 356,535 0 242,391

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-38

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 52 - PROCESSING TECHNOLOGY AND PRACTICES

RB-38	HERBERT O. HULTIN	MASSACHUSETTS INST. OF TECH.	39,766	0	36,878
(10378)	Title: VALUE-ADDED FISH PRODUCTS BASED ON PROTEIN SOLUBILIZATION AT LOW SALT CONCENTRATIONS				

R/SST-21	D. GREEN/S. ANDREW HALE	NORTH CAROLINA	15,839	0	0
(11027)	Title: RE-ENGINEERING THE HANDLING OF FRESH (COOKED) CRAB CLAWS FOR IMPROVED MEAT QUALITIES AND NEW PRODUCT DEVELOPMENT				

R/SST-22	TYRE LANIER	NORTH CAROLINA	0	0	49,346
(11028)	Title: STABILIZATION OF QUALITY IN FROZEN SEAFOODS BY PRESSURE FREEZING IN COMBINATION WITH VITRIFYING CRYOPROTECTANT INFUSION				

R/SST-23	B. FARKAS/L. JAYKUS/D. G	NORTH CAROLINA	0	0	15,800
(11029)	Title: PROCESS ENGINEERING OF A "PASTEURIZED" RAW OYSTER FOR INSTITUTIONAL USERS				

R/SF-5	GILBERT R. SYLVIA	OREGON	28,597	0	17,356
(10289)	Title: DYNAMIC PORTFOLIO ANALYSIS OF PACIFIC WHITING PRODUCTS				

R/SF-7	EDWARD R. KOLBE	OREGON	56,011	0	46,182
(10295)	Title: ELECTRICAL HEAT PROCESS DEVELOPMENT FOR UNDERUTILIZED SEAFOOD				

Number of Projects: 6			Subtotal:	140,213	0	165,562
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-39

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 53 - WASTE MANAGEMENT AND BYPRODUCT RECOVERY

R/35-16	GOUR S. CHOUDHURY	ALASKA	31,515	0	18,615
(10682)	Title: VALUE-ADDED PRODUCTS FROM SEAFOOD BY-PRODUCT PROTEINS USING EXTRUSION TECHNOLOGY				

R-53-1-96	JOHN M. KUBARYK	PUERTO RICO	26,545	0	10,954
(11143)	Title: CONVERSION OF TUNA WASTE SLUDGE INTO AN INGREDIENT TO REPLACE FISH MEAL IN THE DIET OF A FRESHWATER FISH				

Number of Projects: 2

Subtotal:	58,060	0	29,569
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-40

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 54 - PRODUCT DEVELOPMENT

R/35-17	GOUR S. CHOUDHURY	ALASKA	67,480	0	9,122
(10683)	Title: ENZYME BIOTECHNOLOGY FOR UTILIZATION OF ARROWTOOTH FLOUNDER				

R/35-18	CHARLES CRAPO/BRIAN HIME	ALASKA	62,285	0	22,107
(10984)	Title: DEVELOPING VALUE-ADDED PRODUCTS FROM LATE HARVEST SALMON				

R/HAB-1	YEN-CON HUNG	GEORGIA	38,987	0	50,551
(11122)	Title: DEVELOPMENT OF A VALUE-ADDED PROCESS FOR THE RETENTION OF CRISPNESS IN BREADED SHRIMP AFTER FRYING.				

Number of Projects: 3

Subtotal: 168,752 0 81,780

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-41

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 61 - FISHING INDUSTRIES					
A/MAS-3 (11115)	RANDAL L. WALKER	GEORGIA Title: SHELLFISH RESOURCE SPECIALIST FOR COASTAL GEORGIA	23,931	0	18,095

A/P-16 (10376)	ROB ROBERTSON/BRUCE LIND	MAINE/NEW HAMPSHIRE Title: ISSUES CONFRONTING NEW ENGLAND FINFISH AQUACULTURE	44,362	0	13,578

R/FHD-8 (10991)	TOMMY L. BROWN	NEW YORK Title: PARTICIPATION, ECONOMIC IMPACT, AND MARKETING ANALYSIS OF GREAT LAKES FISHERIES	39,090	0	23,990

A-61-1-96 (11109)	J.VELEZ AROCHO/A. WYPYSZ	PUERTO RICO Title: FIFTH WIDER CARIBBEAN MARINE DEBRIS WORKSHOP.	0	47,000	0

Number of Projects: 4			Subtotal:	107,383	47,000
					55,663

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-42

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 62 - COASTAL RECREATION BUSINESS

R/MA-38 (10653)	JAMES WILEN	CALIFORNIA	16,492	0	17,595
Title: THE ECONOMIC VALUE OF CALIFORNIA'S IN-RIVER FISHING					

E/URB-1 (10369)	G. A. ANTONINI	FLORIDA	121,293	0	58,894
Title: NON-REGULATORY BOATING MANAGEMENT TO ACHIEVE SUSTAINABLE WATERWAY USE: AN EXTENSION EDUCATION INITIATIVE					

E/URB-2 (10371)	R. HAMANN	FLORIDA	17,016	0	8,700
Title: LEGAL ISSUES IN NON-REGULATORY BOATING MANAGEMENT TO ACHIEVE SUSTAINABLE WATERWAY USE					

A/FP-5 (10833)	JOHN SCHWARTZ	MICHIGAN	15,510	0	7,760
Title: NATIONAL SEA GRANT MARINA NETWORK: ENHANCING THE ECONOMIC AND ENVIRONMENTAL SUSTAINABILITY OF THE MARINA INDUSTRY (AS SUBMITTED BY RHODE ISLAND SEA GRANT PROGRAM)					

A/CR-9502 (10786)	VIRGINIA LEE	RHODE ISLAND	28,500	0	11,661
Title: NATIONAL SEA GRANT MARINA NETWORK: ENHANCING THE ECONOMIC AND ENVIRONMENTAL SUSTAINABILITY OF THE MARINA INDUSTRY					

A/MD-4 (11286)	WILLIAM L. RICKARDS	VIRGINIA	3,000	0	0
Title: HIGHLY MIGRATORY SPECIES RECREATIONAL HARVEST DATA WORKSHOP					

Number of Projects: 6			Subtotal:	201,811	0	104,610
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-43

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 63 - MARINE TRADES INDUSTRY					
E/T-7 (10367)	MARION CLARKE	FLORIDA	15,584	0	7,851
Title: SEA GRANT MARINA NETWORK ENHANCING THE ECONOMIC AND ENVIRONMENTAL SUSTAINABILITY OF THE MARINA INDUSTRY					
A/MAS-2 (11117)	MAC V. RAWSON, JR.	GEORGIA	51,184	0	9,559
Title: MARINE BUSINESS DEVELOPMENT AND MANAGEMENT					
A/MRT-2 (10240)	MICHAEL LIPPMANN	LOUISIANA	17,282	0	8,776
Title: NATIONAL SEA GRANT MARINA NETWORK: LOUISIANA COMPONENT					
RT-2 (10383)	CHRYSSOSTOMOS CHRYSSOSTO	MASSACHUSETTS INST. OF TECH.	128,788	0	143,168
Title: FOCUSED RESEARCH					
A/S-1-M (10302)	ALEX WYPYSZINSKI	NEW JERSEY	12,382	0	0
Title: NATIONAL SEA GRANT MARINA NETWORK: ENHANCING THE ECOLOGICAL AND ENVIRONMENTAL SUSTAINABILITY OF THE MARINA INSTITUTION (NEW JERSEY COMPONENT)					
A/EC-3 (10285)	BRUCE R. DEYOUNG	OREGON	16,061	0	7,904
Title: ENHANCING MARINE TRADES AWARENESS OF EMERGING INFORMATION TECHNOLOGY					
A/F-5 (10079)	DEWAYNE HOLLIN	TEXAS	8,704	0	4,390
Title: NATIONAL SEA GRANT MARINA NETWORK: ENHANCING THE ECONOMIC AND ENVIRONMENTAL SUSTAINABILITY OF THE MARINA INDUSTRY-TEXAS COMPONENT					
Number of Projects: 7			Subtotal:	249,985	0 181,648

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-44

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 71 - COASTAL TOURISM DEVELOPMENT

R/MR-50 (10612)	KIM N. HOLLAND Title: LONG TERM MONITORING OF TIGER SHARK MOVEMENTS	HAWAII	18,274	0	47,151
A/MRT-1 (10810)	MICHAEL LIFFMAN Title: ADVISORY SERVICES IN MARINE RECREATION AND TOURISM	LOUISIANA	25,461	0	6,175
R/MRT-2 (11009)	JOYCE M. JACKSON Title: ECONOMIC OPPORTUNITIES BASED ON THE HISTORICAL AND CULTURAL DEVELOPMENT OF TRADITIONAL NEW ORLEANS JAZZ IN COASTAL LOUISIANA	LOUISIANA	9,777	0	6,319
R/CH-4 (10267)	KENNETH F. BACKMAN Title: THE IMPACT OF TOURISM ON SOCIAL AND CULTURAL DIVERSITY IN COASTAL COUNTIES IN SOUTH CAROLINA	SOUTH CAROLINA	19,220	0	14,415
R/PS-48 (11156)	THOMAS A. HEBERLEIN Title: PARTICIPATION IN APOSTLE ISLANDS BOATING: PERSISTENCE AND CHANGE, 1975-1997	WISCONSIN	60,504	0	27,292
R/PS-49 (11157)	WILLIAM R. PROVENCHER Title: A DYNAMIC ECONOMIC MODEL OF RECREATION: AN APPLICATION TO THE GREEN BAY YELLOW PERCH FISHERY	WISCONSIN	58,373	0	25,327
Number of Projects: 6			Subtotal:	191,609	0 126,679

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-45

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 72 - COMMUNITIES IN TRANSITION

A/AS-5 (10256)	BRUCE J. MILLER	HAWAII	153,743	0	39,410
Title: SUSTAINABLE ECONOMIC DEVELOPMENT IN THE INSULAR PACIFIC					

R/SPS-5 (11010)	FORREST A. DESERAN	LOUISIANA	35,853	0	23,732
Title: OYSTER FISHERMEN AND THE LOCAL ECONOMY: A STUDY OF LABOR DISPLACEMENT IN THE LOUISIANA OYSTER INDUSTRY					

R/FDF-2 (10281)	COURTLAND L. SMITH	OREGON	70,148	0	12,852
Title: EFFECTIVE DISASTER RELIEF FOR FISHING ENTREPRENEURS AND THEIR FAMILIES					

A/FDF-1 (10284)	FLAXEN D. L. CONWAY	OREGON	106,532	0	48,450
Title: FISHING BUSINESSES, FAMILIES, AND COMMUNITIES: TRANSITIONING TO THE FUTURE					

Number of Projects: 4

Subtotal:	366,276	0	124,444
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-46

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 74 - PORTS AND HARBORS

R/OE-34	WILLIAM WEBSTER	CALIFORNIA	44,099	0	23,827
(10655)	Title: PREDICTING SEICHE IN HARBORS				

R/OE-16	ROBERT A. DALRYMPLE	DELAWARE	3,038	0	50,030
(10199)	Title: WATER WAVES IN NAVIGATIONAL CHANNELS				

RC-49	N.M. PATRIKALAKIS	MASSACHUSETTS INST. OF TECH.	400,000	0	210,602
(10113)	Title: A RISK MODEL FOR EVALUATING MARINE SAFETY				

Number of Projects:	3		Subtotal:	447,137	0	284,459
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-47

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 75 - PLANNING AND DECISION-MAKING INFORMATION					
R/SL-4 (10168)	RICHARD J. MCLAUGHLIN	MISSISSIPPI/ALABAMA Title: MISSISSIPPI-ALABAMA SEA GRANT LEGAL PROGRAM	77,122	0	133,721

R/SS-9503 (10787)	TIMOTHY HENNESSEY	RHODE ISLAND Title: SCIENCE AND LEARNING IN FISHERY MANAGEMENT: POLICY DEVELOPMENT AND EVOLUTION	51,960	0	56,313

R/S-27-PT (11211)	RICHARD F. DELANEY	WOODS HOLE OCEANOGRAPHIC INST. Title: A PRACTICAL FRAMEWORK FOR WATERSHED MANAGEMENT: DEVELOPING A TRAINING MODULE ON ECONOMIC AND DECISION ANALYSIS	0	52,095	29,256

Number of Projects:	3		Subtotal:	129,082	52,095
					219,290

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-48

<u>Project Number</u>	<u>PI</u>	<u>Program</u>	<u>Sea Grant</u>	<u>Pass Thru</u>	<u>Matching</u>
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Project Category: 84 - REHABILITATION, REPAIR, AND RECYCLING PROCEDURES

R/OE-13	CHON L. TSAI	OHIO	26,001	0	24,468
(11127) Title: CONTROL ALGORITHM FOR UNDERWATER "WET" FLUX-CORED ARC WELDING PROCESS					

Number of Projects: 1			Subtotal:	26,001	0	24,468
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-49

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 91 - TOXICS					
R/B-33 (10202)	GEORGE W. LUTHER, III	DELAWARE	17,969	0	15,988
Title: VOLTAMMETRIC MICROELECTRODES FOR THE DETERMINATION OF BIOGEOCHEMICALLY RELEVANT SPECIES IN SEDIMENTS AND WATERS					

R/ME-15 (10206)	THOMAS M. CHURCH	DELAWARE	12,912	0	92,151
Title: MERCURY: A CRITICAL POLLUTANT IN THE COASTAL ENVIRONMENT					

R/C-E-38 (10024)	H. ANSON MOYE	FLORIDA	60,432	0	31,103
Title: SOLID PHASE SOLVENTLESS ON-SITE EXTRACTION OF PESTICIDES FROM MARINE WATERS AND FISHES					

R/CE-120 (10975)	H. GAUDETTE	MAINE/NEW HAMPSHIRE	30,000	0	15,985
Title: DISCRIMINATION OF POINT AND NONPOINT SOURCES OF METAL CONTAMINATION IN THE COASTAL ZONE BY ISOTOPIC ANALYSIS					

R/NP-14 (10951)	THOMAS C. JOHNSON	MINNESOTA	20,027	0	25,440
Title: ACOUSTIC MAPPING OF LAKE FLOOR SEDIMENTS IN WESTERN LAKE SUPERIOR					

R/B-95002 (11135)	PEDDRICK WEIS	NEW JERSEY	29,577	0	23,416
Title: TROPHIC TRANSFER OF CONTAMINANTS FROM ORGANISMS ATTACHED TO CHROMATED COPPER ARSENATE (CCA)-TREATED WOOD TO THEIR CONSUMERS: A FIELD STUDY					

R/CTP-22 (10993)	VICENT T. BRESLIN	NEW YORK	63,054	0	49,659
Title: DISTRIBUTION AND EFFECTS OF SHIP-DERIVED WASTES: A GEOCHEMICAL AND ECOLOGICAL STUDY OF LAKE ONTARIO SEDIMENTS					

R/MRD-34 (11030)	S. K. BURGESS	NORTH CAROLINA	18,129	0	0
Title: EFFECT OF ESTUARINE METAL POLLUTANTS ON BLUE CRAB SHELL MINERALIZATION					

R/PS-13 (10221)	SUSAN W. FISHER	OHIO	20,878	0	17,660
Title: PARTITIONING OF PRIORITY POLLUTANTS INTO EDIBLE FISH AND QUANTITATIVE HUMAN RISK ASSESSMENT					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-50

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/PS-17 (11132)	KEITH A. GRASMAN	OHIO	0	0	76,330
Title: IMMUNOLOGICAL BIOMARKERS AND CONTAMINANT-ASSOCIATED IMMUNOSUPPRESSION IN FISH-EATING BIRDS OF THE LOWER GREAT LAKES					
R/MBT-3 (10589)	PETER THOMAS	TEXAS	122,660	0	61,330
Title: STEROID RECEPTOR-MEDIATED MECHANISMS OF ENDOCRINE DISRUPTION IN ATLANTIC CROAKER BY CHEMICALS IN THE MARINE ENVIRONMENT					
CE-1 (11082)	T.L. KU/E.Y. ZENG	UNIV. OF SOUTHERN CALIFORNIA	28,351	0	50,719
Title: TRACING ORGANIC CONTAMINANTS FROM THE WHITE'S POINT OUTFALL EFFLUENT - RADIOISOTOPE STUDIES.					
CE-3 (11084)	M.H. HORN/C.T. COLLINS/A	UNIV. OF SOUTHERN CALIFORNIA	22,856	0	41,581
Title: FOOD WEB STRUCTURE AND HEAVY METAL ACCUMULATION IN A RECENTLY ESTABLISHED GUILD OF BREEDING SEABIRDS IN SOUTHERN CALIFORNIA					
R/BT-1 (10119)	RICHARD E. PETERSON	WISCONSIN	150,000	0	0
Title: IN VITRO BIOASSAY FOR DETERMINATION OF FISH-SPECIFIC TCDD EQUIVALENTS BY ASSESSMENT OF TCDD-REGULATED GENES					
R/MW-54 (10128)	WILLIAM H. KARASOV	WISCONSIN	23,835	0	35,101
Title: ECOTOXICOLOGY OF AMPHIBIANS IN GREEN BAY					
R/MW-59 (10130)	STEPHEN R. CARPENTER	WISCONSIN	53,845	0	52,887
Title: MICROCONTAMINANT CYCLING IN GREAT LAKES FOOD WEBS					
R/MW-58 (10570)	RICHARD E. PETERSON	WISCONSIN	306,981	0	0
Title: AH RECEPTOR-MEDIATED DEVELOPMENTAL TOXICITY IN ZEBRAFISH					
R/MW-71 (11152)	DAVID E. ARMSTRONG	WISCONSIN	52,452	0	55,593
Title: TRACE METALS IN LAKE SUPERIOR TRIBUTARIES: IMPLICATIONS FOR CONTAMINANT VIRTUAL ELIMINATION					
R/MW-72 (11153)	MARGARET CLAGETT-DAME	WISCONSIN	52,931	0	61,253
Title: IDENTIFICATION OF THE ENDOGENOUS LIGAND FOR THE ARYL HYDROCARBON RECEPTOR IN FISH					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-51

<u>Project Number</u>	<u>PI</u>	<u>Program</u>	<u>Sea Grant</u>	<u>Pass Thru</u>	<u>Matching</u>
R/MW-73	WILLIAM H. KARASOV	WISCONSIN	16,551	0	11,670
(11154) Title: STATUS OF AMPHIBIANS IN THE GREEN BAY ECOSYSTEM: EVALUATION BY BIOASSAY, BIOMARKERS AND HABITAT					

R/P-58	MARK E., HAHN	WOODS HOLE OCEANOGRAPHIC INST.	99,890	0	49,671
(10230) Title: IMPACT OF ENVIRONMENTAL CONTAMINANTS ON AN AQUATIC BIRD POPULATION					

Number of Projects: 21			Subtotal:	1,203,330	0 767,537

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-52

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 92 - BIOLOGICAL CONTAMINANTS

R/NP-13	RANDALL E. HICKS	MINNESOTA	15,510	0	44,032
(10950)	Title: SURVIVAL AND REPRODUCTION OF PATHOGENIC BACTERIA IN A GREAT LAKES ESTUARY: A COMPREHENSIVE TEST OF COMBINED MUNICIPAL AND INDUSTRIAL SEWAGE MANAGEMENT				

CH-1	JED FUHRMAN	UNIV. OF SOUTHERN CALIFORNIA	21,716	0	23,917
(11085)	Title: VIRUSES IN THE COASTAL WATER OF LOS ANGELES				

Number of Projects:	2	Subtotal:	37,226	0	67,949
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-53

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 93 - NUTRIENTS					
R/ME-18 (10545)	VICTOR KLEMAS	DELAWARE	170,881	0	54,619
Title: INTEGRATION OF REMOTELY SENSED LAND COVER DATA AND CONDITION INDICATORS IN A GIS TO EVALUATE COASTAL WETLANDS					
R/WQ-1 (11116)	DEBORAH A. BRONK	GEORGIA	50,302	0	25,881
Title: COASTAL EUTROPHICATION: ORGANIC VERSUS INORGANIC NITROGEN AS A SOURCE OF COASTAL PRODUCTIVITY					
R/EL-1 (10625)	MARLIN J. ATKINSON	HAWAII	42,672	0	38,435
Title: METABOLIC RESPONSE OF CORAL REEF COMMUNITIES TO NUTRIENT LOADING					
R/EL-2 (10626)	JOHN STIMSON	HAWAII	17,418	0	31,870
Title: THE RELATIVE IMPORTANCE OF INORGANIC NITROGEN FROM THE WATER COLUMN AND BENTHOS IN SUSTAINING THE GROWTH OF THE MACROSCOPIC GREEN ALGA <i>DICTYOSPHAERIA CAVERNOSA</i>					
R/MAR94-07 (10070)	NANCY N. RABALAIS	LOUISIANA	0	95,000	0
Title: HYPOXIA HYDROGRAPHIC AND BIOLOGICAL SURVEYS					
R/MAR94-09 (10071)	WILLIAM J. WISEMAN, JR.	LOUISIANA	0	29,999	5,799
Title: A SYNTHESIS OF EXISTING KNOWLEDGE OF THE LOUISIANA INNER SHELF RESULTING FROM NECOP					
R/MPE-68 (11011)	R. EUGENE TURNER	LOUISIANA	96,915	0	33,506
Title: ESTUARINE EUTROPHICATION: RECONSTRUCTION OF HISTORICAL CHANGES AND PREDICTION OF FUTURE EVENTS					
R/MAR94-08 (11403)	WILLIAM J. WISEMAN	LOUISIANA	0	165,000	0
Title: HYPOXIA ON THE LOUISIANA INNER SHELF: A MODELING STUDY					
R/CE-108 (10179)	WENDELL S. BROWN	MAINE/NEW HAMPSHIRE	120,942	0	44,190
Title: AN OBSERVATIONAL/MODELING STUDY OF THE WESTERN GULF OF MAINE COASTAL CURRENT					
R/P-38 (10044)	CYNTHIA C. GILMOUR	MARYLAND	74,991	0	139,456
Title: BACTERIOPLANKTON DYNAMICS IN THE PATUXENT RIVER: RESPONSE TO NITROGEN ABATEMENT					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-54

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/P-41	PATRICIAL M. GLIBERT	MARYLAND	63,001	0	33,528
(10969)	Title: THE ROLE OF DISSOLVED ORGANIC NITROGEN IN THE EUTROPHICATION OF CHESAPEAKE BAY				

R/CI-47	ROBERT W. STERNER	MINNESOTA	16,218	0	27,344
(10953)	Title: THE LIGHT: NUTRIENT RATION - CONTROLS ON SESTON COMPOSITION, SECONDARY PRODUCTION, AND BIOGEOCHEMISTRY				

R/ER-27	JONATHAN R. PENNOCK	MISSISSIPPI/ALABAMA	54,169	0	37,119
(10925)	Title: NUTRIENT-ENHANCED PRODUCTION AND TROPHIC DYNAMICS IN WEEKS BAY, ALABAMA				

R/E-95003	SYBIL P. SEITZINGER	NEW JERSEY	84,510	0	42,413
(10580)	Title: ESTUARINE EUTROPHICATION: CONTRIBUTION OF DISSOLVED ORGANIC NITROGEN FROM NON-POINT AND POINT SOURCES				

R/MER-36	J. BURKHOLDER	NORTH CAROLINA	44,268	0	18,030
(11031)	Title: EUTROPHICATION OF SEAGRASS MEADOWS: INTERACTIONS BETWEEN NITRATE AND PHOSPHATE IN CONTROLLING EELGRASS SURVIVAL				

R/MER-37	H. PRAERL/J PINKNEY	NORTH CAROLINA	11,466	0	26,815
(11032)	Title: ANTHROPOGENIC NITROGEN SOURCES AND COASTAL EUTROPHICATION: DOES N COMPOSITION CONTROL PHYTOPLANKTON BIODIVERSITY AND WATER QUALITY?				

A/MD/A9	J. W. WILLIAMS	NORTH CAROLINA	0	25,000	25,000
(11163)	Title: USE OF RIPARIAN BUFFERS TO PROTECT SURFACE WATER QUALITY				

R/ER-37	ROBERT T. HEATH	OHIO	39,958	0	31,530
(11128)	Title: ORIGIN, PROCESSING, AND FATE OF PHOSPHATE AND UV-SENSITIVE PHOSPHORUS INPUTS IN A GREAT LAKES COASTAL WETLAND				

R/ES-9501	STEPHEN GRANGER	RHODE ISLAND	50,226	0	45,882
(10791)	Title: A SHALLOW HIGH-SALINITY COASTAL LAGOON MESOCOSM FACILITY				

R/ES-9502	DAVID TAYLOR	RHODE ISLAND	102,852	0	66,510
(10792)	Title: EXPERIMENTAL INVESTIGATIONS OF THE INTERACTIVE IMPACTS OF NUTRIENT ENRICHMENT AND GRAZING ON THE LAGOONS OF THE NORTHEAST				

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-55

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/ES-9503	ROBERT HOWARTH	RHODE ISLAND	45,923	0	29,162
(10793) Title: ENRICHMENT AND REMEDIATION OF ENRICHMENT OF SHALLOW MARINE SYSTEMS AND CRITICAL HABITATS: NITROGEN FIXATION IN SEAGRASS LAGOONS					
R/ES-9503A	MICHAEL BENDER	RHODE ISLAND	36,890	0	12,421
(10794) Title: ENRICHMENT AND REMEDIATION OF ENRICHMENT OF SHALLOW MARINE SYSTEMS AND CRITICAL HABITATS: NITROGEN FIXATION IN SEAGRASS LAGOONS					
R/ES-9504	BARBARA NOWICKI	RHODE ISLAND	73,520	0	22,192
(10795) Title: ENRICHMENT OF SHALLOW MARINE SYSTEMS AND CRITICAL HABITATS: THE IMPORTANCE OF SEDIMENT DENITRIFICATION IN REDUCING NITROGEN LOADS					
R/MBT-9401	YUZURU SHIMIZU	RHODE ISLAND	135,569	0	81,739
(11159) Title: EXPERIMENTAL INVESTIGATIONS OF THE INTERACTIVE IMPACTS OF NUTRIENT ENRICHMENT AND GRAZING ON THE LAGOONS OF THE NORTH EAST					
R/EC-2	DAVID N. EDGINGTON	WISCONSIN	52,915	0	46,511
(10124) Title: TERRESTRIAL-AQUATIC COUPLING, PARTICLE TRAPPING AND NUTRIENT BIOGEOCHEMISTRY IN LAND MARGIN SYSTEMS OF THE GREAT LAKES					
R/EC-4	RUSSELL CUHEL	WISCONSIN	40,156	0	32,432
(11149) Title: BIOLOGICAL ASSIMILATION OF PHOSPHORUS IN ESTUARIES					
R/M-37	A. E. GIBLIN/C. S. HOPKI	WOODS HOLE OCEANOGRAPHIC INST.	50,505	0	26,382
(11103) Title: ECOSYSTEM LEVEL MEASUREMENTS OF DENITRIFICATION IN ESTUARIES					
Number of Projects: 27			Subtotal:	1,476,267	314,999
				978,766	

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-56

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 94 - SEDIMENTATION					
R/C-E-35	WALTER M. GOLDBERG	FLORIDA	51,058	0	26,594
(10021) Title: AN EVALUATION OF THE EFFECTS OF TURBIDITY ON CORAL PHOTOSYNTHESIS, RESPIRATION AND GROWTH					
R/EL-3	PAUL L. JOKIEL	HAWAII	11,686	0	51,140
(10611) Title: RESPONSE OF HAWAIIAN REEF CORALS TO INCREASED SEDIMENT LOADING					
R/MMR-14	JOHN W. DAY, JR.	LOUISIANA	43,667	0	18,673
(11012) Title: ASSESSING THE CAPACITY AND MECHANISMS FOR WETLAND ASSIMILATION OF SEDIMENTS AND NUTRIENTS IN DIVERTED MISSISSIPPI RIVER WATER					
RC-40	OLE SECHER MADSEN	MASSACHUSETTS INST. OF TECH.	69,040	0	47,772
(10389) Title: MECHANISMS FOR ONSHORE SEDIMENT TRANSPORT					
R/ES-64	GEORGE H. WARD	TEXAS	33,075	0	15,646
(10601) Title: HYDRODYNAMIC AND CIRCULATION DATA SET FOR MATAGORDA BAY					
Number of Projects: 5			Subtotal:	208,526	0 159,825

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-57

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 95 - BIOTOXINS/HARMFUL ALGAL BLOOMS					
R/08-07 (10985)	F. GERALD PLUMLEY	ALASKA	41,328	0	0
Title: MOLECULAR BIOLOGY OF PARALYTIC SHELLFISH POISONING: ROLE OF PROKARYOTES IN TOXIN PRODUCTION					
R/C-E-33 (10019)	RICHARD E. DODGE	FLORIDA	67,919	0	22,182
Title: ALGAL BLOOMS IN COASTAL WATERS: USING CORALS TO DIFFERENTIATE NUTRIENTS FROM POLLUTION OR NATURAL SOURCES					
R/C-E-34 (10020)	BRIAN E. LAPOINTE	FLORIDA	61,974	0	30,987
Title: ALGAL BLOOMS IN COASTAL WATERS: EUTROPHICATION ON CORAL REEFS OF SOUTHEAST FLORIDA					
R/C-E-36 (10022)	EDWARD J. PHILIPS	FLORIDA	69,403	0	34,702
Title: BLUE-GREEN ALGAL BLOOMS IN FLORIDA BAY: CONTROLLING FACTORS AND CONSEQUENCES FOR FOOD WEBS					
R/FBM-16 (10314)	MONICA V. BRICELJ	NEW YORK	62,587	0	36,767
Title: RELATIVE SUSCEPTIBILITY OF BIVALVES TO THE BROWN TIDE ALGA AUREOCOCCUS ANOPHAGEFFERENS: COMPARISON AMONG SPECIES AND LIFE HISTORY STAGES					
R/CE-10 (10995)	ROBERT E. WILSON	NEW YORK	14,000	0	25,109
Title: CAUSATIVE FACTORS IN THE INITIATION OF "BROWN TIDE" BLOOMS					
R/CMB-12 (10997)	EDWARD J. CARPENTER	NEW YORK	19,117	0	27,928
Title: CELL CYCLE TECHNIQUE FOR MEASUREMENT OF GROWTH RATES AND ENVIRONMENTAL EFFECTS OF THE BROWN TIDE ALGA					
R/XG-5 (11176)	ROBERT A. ANDERSEN	NEW YORK	0	96,364	0
Title: MULTIPLE CULTURE ISOLATES (XENIC AND AXENIC) BIODIVERSITY AND ULTRASTRUCTURE OF AUREOCOCCUS ANOPHAGEFFERENS					
R/CMC-2 (11177)	GREGORY L. BOYER	NEW YORK	0	48,485	9,664
Title: FERREDOXIN AND FLAVODOXIN AS METABOLIC MARKERS FOR IRON STRESS IN AUREOCOCCUS ANOPHAGEFFERENS					
R/CE-12 (11178)	DAVID CARON	NEW YORK	0	96,323	40,601
Title: MICROZOOPLANKTON-MESOOZOOPLANKTON COUPLING AND ITS ROLE IN THE INITIATION OF BLOOMS OF AUREOCOCCUS ANOPHAGEFFERENS (BROWN TIDES)					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-58

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/CMB-14	MAUREEN D. KELLER	NEW YORK	0	102,799	21,989
(11179) Title: PHYSIOLOGICAL ECOLOGY OF THE BROWN TIDE ORGANISM, AUREOCOCCUS ANOPHAGEFFERENS					

R/CE-11	THEODORE J. SMAYDA	NEW YORK	0	43,235	25,501
(11180) Title: ANALYSIS OF PHYSICAL, CHEMICAL AND BIOLOGICAL CONDITIONS ASSOCIATED WITH NARRAGANSETT BAY BROWN TIDE					

R/CMC-3	SERGIO SANUDO WILHELMY	NEW YORK	0	101,687	18,043
(11181) Title: BIOGEO-CHEMICAL AND ANTHROPOGENIC FACTORS THAT CONTROL BROWN TIDE BLOOMS: THE EFFECTS OF METALS AND ORGANIC NUTRIENTS IN LONG ISLAND'S EMBAYMENTS					

R/MBT-1	JOANN M. BURKHOLDER	NORTH CAROLINA	99,868	0	51,482
(10453) Title: IMPROVED DETECTION OF AN ICHTHYOTOXIC DINOFLAGELLATE IN ESTUARIES AND AQUACULTURE FACILITIES					

R/B-14	ROSE ANN CATTOLICO	WASHINGTON	91,000	0	44,002
(10746) Title: ECOSYSTEM DEVELOPMENT: GENE EXPRESSION IN MARINE ALGAE					

R/B-15	ROSE ANN CATTOLICO	WASHINGTON	58,800	0	26,000
(10747) Title: TOXIC HETEROSIGMA BLOOMS: MOLECULAR MONITORING AND ICHTHYOTOXIN CHARACTERIZATION					

R/BT-2	FUN S. CHU	WISCONSIN	74,998	0	0
(10120) Title: IMMUNOCHEMICAL STUDIES IN SELECTED PHYCOTOXINS					

R/B-140	D. M. ANDERSON/J. T. TUR WOODS HOLE OCEANOGRAPHIC INST.		8,702	0	0
(11099) Title: DYNAMICS OF THE TOXIC DINOFLAGELLATE ALEXANDRIUM IN THE GULF OF MAINE: SOURCE POPULATIONS AND DOWNSTREAM IMPACTS					

Number of Projects: 18			Subtotal:	669,696	488,893
					414,957

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-59

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 96 - NONPOINT SOURCE POLLUTION

R/S-95001	GERARD P. LENNON	NEW JERSEY	62,236	0	34,065
(10577) Title: DETERMINATION OF RECHARGE/DISCHARGE RATES TO/FROM BARNEGAT BAY SEDIMENTS, NEW JERSEY					

R/EC-9501	RAYMOND WRIGHT	RHODE ISLAND	65,077	0	28,906
(10790) Title: CHARACTERIZATION OF NONPOINT SOURCES TO AN ESTUARY UNDER WET WEATHER CONDITIONS					

R/EM-9501	MALCOLM SPAULDING	RHODE ISLAND	71,462	0	35,802
(10797) Title: APPLICATION OF COASTMAP, A MONITORING AND MODELING SYSTEM, TO ASSIST IN WATER QUALITY MANAGEMENT					

Number of Projects:	3	Subtotal:	198,775	0	98,773
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-60

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 97 - CHEMICAL AND OIL SPILLS

R/COE-1	C.DOULIGERIS	FLORIDA	0	147,169	46,382
(11075) Title: STUDY OF GULF COAST OIL SPILL CONTINGENCY PLANS WITH RESPECT TO REMEDIATION AND RESTORATION.					

R/OS-1	CHARLES E. PROFFITT	LOUISIANA	2,252	0	0
(11187) Title: STUDY OF GULF OIL SPILL CONTINGENCY PLANS WITH REGARDS TO REMEDIATION AND RESTORATION.					

R/OS-1	CHARLES E. PROFFITT	LOUISIANA	0	7,385	0
(11187) Title: STUDY OF GULF OIL SPILL CONTINGENCY PLANS WITH REGARDS TO REMEDIATION AND RESTORATION.					

R/ER-31	M. GRAHAM/J. STOUT	MISSISSIPPI/ALABAMA	0	34,440	29,486
(11167) Title: STUDY OF GULF COAST OIL SPILL CONTINGENCY PLANS WITH REGARDS TO REMEDIATION AND RESTORATION					

Number of Projects: 3

Subtotal: 2,252 188,994 75,868

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-61

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 101 - HABITAT STRUCTURE AND FUNCTION					
R/CZ-132 (10658)	JOHN PEARSE	CALIFORNIA	23,496	0	16,256
Title: BIODIVERSITY OF THE ROCKY INTERTIDAL IN THE MONTEREY BAY NATIONAL MARINE SANCTUARY: A 24-YEAR COMPARISON					
R/CZ-125 (10659)	LISA LEVIN	CALIFORNIA	61,619	0	26,609
Title: STRUCTURE AND FUNCTION OF INFAUNA IN SOUTHERN CALIFORNIA WETLANDS: GROUND WORK TO PROMOTE RESTORATION SUCCESS					
R/C-23-3PT (11045)	LISA A. LEVIN	CALIFORNIA	0	19,900	0
Title: HABITAT AND TROPIC LINKAGES IN SALT MARSHES: GEOGRAPHIC COMPARISONS					
R/ER-2 (10695)	JOHAN C. VAREKAMP	CONNECTICUT	18,383	0	20,450
Title: HOW SALT MARSHES GROW: INVESTIGATIONS OF LONG ISLAND SOUND AND DELAWARE BAY MARSHES					
R/ME-19 (10546)	XIAO-HAI YAN	DELAWARE	251,858	0	96,251
Title: THE DEVELOPMENT AND APPLICATION OF A COASTAL AND ESTUARINE ENVIRONMENTAL REMOTE SENSING OBSERVING SYSTEM					
R/C-E-37 (10023)	JEFFREY CHANTON	FLORIDA	50,992	0	25,496
Title: SIGNIFICANCE OF SUBMARINE GROUNDWATER DISCHARGE ON SEAGRASS DISTRIBUTION, BIOMASS AND PRODUCTIVITY					
R/EHRP-3 (11046)	SUSAN S. BELL	FLORIDA	0	50,000	0
Title: MULTIPLE SCALE STUDIES OF SPATIAL AND TEMPORAL INFLUENCES ON SEAGRASS ECOSYSTEMS: STRUCTURE, FUNCTION, AND MANAGEMENT					
R/HAB-2-PD (11428)	RICHARD G. WIEGERT	GEORGIA	10,000	0	0✓
Title: ZOOPLANKTON AND FOOD WEB DYNAMICS IN ESTUARIES OF GEORGIA RIVERS DRAINING INTO THE SOUTH ATLANTIC BIGHT					
R/CPB-20 (11013)	RICHARD F. SHAW	LOUISIANA	73,538	0	35,072
Title: APPLICATION OF A NEW TECHNIQUE: (1) FOR DETERMINATION OF POSTLARVAL AND JUVENILE FISH NURSERY GROUND/REFUGIA FUNCTION OF OFFSHORE OIL AND GAS PLATFORMS; AND (2) FOR BIOCHEMICAL RESOLUTION					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-62

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/LR-33 (10162)	THANE R. WIBBELS	MISSISSIPPI/ALABAMA	45,202	0	24,869
Title: DEVELOPMENT AND IMPLEMENTATION OF A SEXING TECHNIQUE FOR ENHANCING THE RECOVERY OF SEA TURTLE POPULATIONS					
R/EHRP-5(132) (10068)	KENNETH W. ABLE	NEW JERSEY	0	30,804	8,258
Title: FISH RECRUITMENT IN THE NORTHEASTERN UNITED STATES: THE ROLE OF ESTUARINE HABITATS					
R/SAB-5 (10341)	R.A. LUETTICH	NORTH CAROLINA	0	14,000	0
Title: THE PHYSICAL/HYDROGRAPHIC CHARACTERISTICS OF SHELF-ESTUARY EXCHANGE THROUGH A BARRIER ISLAND INLET					
MD/A-5 (10451)	B. J. COPELAND	NORTH CAROLINA	0	116,730	0
Title: DEVELOP THE BASIS FOR REGIONAL EVALUATION OF COASTAL ECOSYSTEM HEALTH					
R/MER-34 (11043)	STEPHEN W. BROOME	NORTH CAROLINA	0	20,160	0
Title: HABITAT AND TROPHIC LINKAGES IN SALT MARSHES: GEOGRAPHIC AND DEVELOPMENTAL COMPARISONS--PART I					
R/MER-35 (11044)	HANS W. PAERL	NORTH CAROLINA	0	26,210	0
Title: HABITAT AND TROPIC LINKAGES IN SALTMARSHES: GEOGRAPHIC AND DEVELOPMENTAL COMPARISONS--PART II					
R/EH-1 (10062)	ERIC T. KOEPFLER/D. CHIL	SOUTH CAROLINA	0	91,269	0
Title: SALT MARSH GEOMORPHOLOGY AND ECOLOGICAL DEVELOPMENT: INFLUENCE UPON HABITAT LINKAGES WITHIN AND ACROSS ECOSYSTEM BOUNDARIES					
R/ER-12 (10257)	RICHARD S. POLLENZ	SOUTH CAROLINA	126,294	0	100,313
Title: DEVELOPMENT OF MODELS FOR THE STUDY OF ENVIRONMENTALLY-MEDIATED SIGNAL TRANSDUCTION AND DEVELOPMENT IN MARINE SPECIES					
R/ER-10 (10268)	LOREN D. COEN	SOUTH CAROLINA	79,379	0	30,909
Title: FUNCTIONAL ROLE OF OYSTER REEFS AS "CRITICAL" ESTUARINE HABITATS					
R/COP-6 (10301)	WINONA B. VERNBERG	SOUTH CAROLINA	0	600,000	161,889
Title: URBANIZATION AND SOUTHEASTERN ESTUARINE SYSTEMS (USES)					
R/F-58 (10592)	DAVID W. OWENS	TEXAS	59,071	0	50,603
Title: THE REPRODUCTIVE AND MIGRATORY BIOLOGY OF SEA TURTLES IN THE GULF OF MEXICO					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-63

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/F-59	ANDRE M. LANDRY, JR.	TEXAS	63,441	0	30,017
(10593) Title: POPULATION STATUS AND ECOLOGY OF KEMP'S RIDLEY SEA TURTLE IN A GULF OF MEXICO INDEX HABITAT					

COP/SABRE-95-1	GLEN H. WHELESS	VIRGINIA	0	27,000	2,145
(10351) Title: THE EFFECTS OF VARIABLE ENVIRONMENTAL FORCING ON INLET FLOW AND LARVAL TRANSPORT					

R/CM-22	LINDA K. BLUM	VIRGINIA	59,590	0	33,920
(10932) Title: COMPARISON OF THE IMPORTANCE OF MICROBIALLY-BASED FOOD CHAINS IN AUTOTROPHIC AND HETEROTROPHIC ESTUARIES					

R/ES-9	BARBARA M. HICKEY	WASHINGTON	52,700	0	32,461
(10749) Title: WILLAPA BAY TRANSPORT PATHWAYS AND THEIR RELATION TO THE COASTAL OCEAN					

R/ES-9	BARBARA M. HICKEY	WASHINGTON	0	27,482	0
(10926) Title: WILLAPA BAY TRANSPORT PATHWAYS AND THEIR RELATION TO THE COASTAL OCEAN					

Number of Projects: 25			Subtotal:	965,563	1,023,555
				695,518	

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-64

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 102 - HABITAT RESTORATION

R/C-S-36	MICHAEL E. KANE	FLORIDA	54,658	0	27,969
(10016)	Title: GENETIC CHARACTERIZATION OF ATLANTIC AND GULF COAST UNIOLA PANICULATA (SEA OATS) POPULATIONS: IMPLICATION OF VARIETAL SELECTION USING MICROPROPAGATION TECHNOLOGY				

R/MMR-13	IRVING A. MENDELSSOHN	LOUISIANA	59,819	0	29,926
(11014)	Title: MARSH RESTORATION WITH DREDGED SEDIMENT: THE EFFECT OF DIFFERENTIAL SEDIMENT ADDITION ON SALT MARSH STRUCTURE AND FUNCTION				

R/ER-25	JUDY P. STOUT	MISSISSIPPI/ALABAMA	39,811	0	22,416
(10166)	Title: HABITAT RESTORATION IN ESTUARINE SUBMERGED GRASSBEDS: IS RECOVERY RECRUITMENT LIMITED?				

M/EHP96-1	STEPHEN W. BROOME	NORTH CAROLINA	0	36,000	0
(11201)	Title: A WORKSHOP ON SALT MARSH RESTORATION AND HABITAT UTILIZATION				

Number of Projects:	4	Subtotal:	154,288	36,000	80,311
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-65

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 103 - AQUATIC NUISANCE SPECIES					
R/CZ-133 (10660)	DONALD STRONG	CALIFORNIA Title: HYBRIDIZATION BETWEEN ALIEN (SPARTINA ALTERNIFLORA) AND NATIVE (S. FOLIOSA) INTERTIDAL	55,669	0	26,054
R/CZ-135 (11110)	CHARLES LAMBERT	CALIFORNIA Title: THE INTRODUCTION OF NON-INDIGENOUS ASCIDIAN SPECIES INTO SOUTHERN CALIFORNIA HARBORS AND MARINAS	33,605	0	10,820
A/E-6 (10519)	NANCY C. BALCOM	CONNECTICUT Title: CONNECTICUT SEA GRANT COLLEGE PROGRAM SUB-PROPOSAL TO THE SEA GRANT/USDA-EXTENSION SERVICE NATIONAL TRAINING INITIATIVE	12,851	0	0
A/E-11 (11194)	ANN BOVE	CONNECTICUT Title: VERMONT ZEBRA MUSSEL EDUCATION AND OUTREACH PROGRAM.	100,000	0	50,281
E-ZM-2 (10365)	M. L. CLARKE	FLORIDA Title: FLORIDA ZEBRA MUSSEL AWARENESS AND PREVENTION PROGRAM	61,886	0	33,526
A/SE-77.1 (11136)	BRIAN K. MILLER	ILLINOIS/INDIANA Title: ZEBRA MUSSEL OUTREACH PLAN: A CONTINUING PROGRAM OF THE GREAT LAKES NETWORK.	194,585	0	87,915
A/SE95-B76.1 (11137)	BRIAN K. MILLER/TOM LUBA	ILLINOIS/INDIANA Title: VIDEO TAPE AND VIDEO CONFERENCE PROJECT: ZEBRA MUSSELS: LESSONS LEARNED IN THE GREAT LAKES: AN OVERVIEW OF THE BIOLOGY, IMPACTS, PREVENTION AND CONTROL OF A FRESHWATER INVADER	45,590	0	25,391
R/EC-45-40.1 (11138)	GARY LAMBERTI	ILLINOIS/INDIANA Title: POTENTIAL IMPACTS OF INVADING RUFFE (GYMNOCEPHALUS CERNUUS) ON BENTHIC AND PELAGIC ECOSYSTEMS OF THE GREAT LAKES	166,260	0	148,823
A/ZM-3 (10234)	MICHAEL LIFFMANN	LOUISIANA Title: NATIONWIDE ZEBRA MUSSEL TRAINING INITIATIVE - LOUISIANA'S PART, YEAR TWO	9,998	0	116

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-66

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/ZM-3 (10235)	BRUCE A. THOMPSON	LOUISIANA	58,087	0	26,749
Title: COMPARATIVE LIFE HISTORY AND MICROHABITAT OF A FRESHWATER POPULATION OF DARK FALSE MUSSEL (MYTILOPSIS LEUCOPHAEATA) AND ZEBRA MUSSEL (DREISSENA POLYMORPHA) AT THE SOUTHERN EDGE OF ITS RANGE					
R/ZM-4 (10236)	RAYMOND T. BAUER	LOUISIANA	37,768	0	32,583
Title: TESTING OF CRAWFISH DEFENSES AGAINST ZEBRA MUSSEL FOULING					
R/ZM-1 (10237)	MARY GAIL YEATES	LOUISIANA	9,198	0	5,068
Title: MUSSELING INTO THE CLASSROOM					
R/122A (11042)	DENISE J. REED/BRENT A.	LOUISIANA	0	20,276	5,953
Title: ECOLOGICAL EFFECTS OF MARSH PROGRADATION BY NATIVE AND NON-NATIVE SPECIES IN TWO PACIFIC NORTHWEST ESTUARIES					
A/ZM-2 (11066)	MICHAEL LIFFMANN	LOUISIANA	93,882	0	34,536
Title: SUBPROGRAM COORDINATION AND OUTREACH TO REDUCE OR CONTROL THE SPREAD OF ZEBRA MUSSELS (DREISSENA POLYMORPHA) FOR SURFACE WATER-USING INDUSTRIES AND COMMERCIAL INLAND NAVIGATION					
R/ES-4 (10045)	GREGORY M. RUIZ	MARYLAND	70,140	0	36,852
Title: SUSCEPTIBILITY OF CHESAPEAKE BAY TO INVASIONS OF NON-INDIGENOUS SPECIES ASSOCIATED WITH BALLAST WATER					
A/FP-4 (10362)	JOHN D. SCHWARTZ	MICHIGAN	163,458	0	76,343
Title: MICHIGAN SEA GRANT EXTENSION - NON-INDIGENOUS SPECIES OUTREACH					
A/SE-2A (10352)	JEFFREY GUNDERSON	MINNESOTA	116,376	0	21,215
Title: NON-INDIGENOUS SPECIES OUTREACH PLAN: A CONTINUING PROGRAM OF THE GREAT LAKES SEA GRANT NETWORK					
R/F-28 (10353)	CARL RICHARDS	MINNESOTA	821,452	0	185,346
Title: POTENTIAL IMPACTS OF INVADING RUFFE (GYMNOCEPHALUS CERNUUS) ON BENTHIC AND PELAGIC ECOSYSTEMS OF THE GREAT LAKES					
R/F-29 (10354)	PATRICK K. SCHOFF	MINNESOTA	254,888	0	60,972
Title: REPRODUCTION IN THE EURASIAN RUFFE, GYMNOCEPHALUS CERNUUS					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-67

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/F-30 (10355)	GEORGE R. SPANGLER	MINNESOTA	83,774	0	39,024
Title: GEOGRAPHIC VARIATION AND COLONIZATION PATTERNS OF RUFFE, GYMNOCEPHALUS CERNUUS, IN THE GREAT LAKES OTOLITH SIGNATURES AND DNA SEQUENCE DIVERGENCE					
A/SE-4 (10359)	JEFFREY GUNDERSON	MINNESOTA	29,341	0	3,695
Title: NATIONWIDE ZEBRA MUSSEL TRAINING INITIATIVE					
R/CL-48 (10954)	DEBORAH L. SWACKHAMER	MINNESOTA	10,033	0	24,110
Title: EFFECT OF BYTHOTREPHES ON PCB BIOMAGNIFICATION IN SALMONIDS					
A/O-24-ZM1 (10103)	WILLIAM HOSKING	MISSISSIPPI/ALABAMA	59,977	0	30,082
Title: AN INTEGRATED, REGIONAL PROGRAM OF RESEARCH, EDUCATION, AND OUTREACH ON ZEBRA MUSSELS IN SOUTHERN WATERS					
A/O-24-ZM3 (10104)	D. R. BAYNE	MISSISSIPPI/ALABAMA	83,628	0	42,940
Title: ENVIRONMENTAL VARIABLES ASSOCIATED WITH IMMINENT ZEBRA MUSSEL INFESTATION IN ALABAMA					
A/O-24-ZM5 (10106)	EMILY KLING	MISSISSIPPI/ALABAMA	9,998	0	5,040
Title: ZEBRA MUSSEL AWARENESS AND INFORMATION FOR ALABAMA YOUTH					
A/O-24-ZM2 (10108)	C. DAVID VEAL	MISSISSIPPI/ALABAMA	80,001	0	40,016
Title: AN INTEGRATED REGIONAL PROGRAM OF RESEARCH, EDUCATION AND OUTREACH					
A/EEP-4 (10543)	DAVID G. WHITE II	NEW YORK	60,525	0	30,264
Title: MAINTAIN AND IMPROVE A NATIONAL ZEBRA MUSSEL INFORMATION CLEARING HOUSE					
R/CTP-23 (10994)	NICHOLAS S. FISHER	NEW YORK	2,222	0	27,524
Title: BIOACCUMULATION OF METALS BY ZEBRA MUSSELS					
A/ZM-1 (10303)	LEROY J. HUSHAK	OHIO	127,359	0	63,691
Title: OHIO SEA GRANT'S NONINDIGENOUS SPECIES OUTREACH					
R/NIS-1 (10304)	CAROL A. STEPIEN	OHIO	93,376	0	46,690
Title: GEOGRAPHIC VARIATION AND COLONIZATION PATTERNS OF RUFFE, GYMNOCEPHALUS CERNUUS IN THE GREAT LAKES: OTOLITH SIGNATURES AND GENETIC DIVERGENCE					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-68

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/NIS-2 (10305)	MICHEAL C. MILLER	OHIO	74,000	0	55,475
Title: POTENTIAL IMPACTS OF INVADING RUFFE (GYMNOCEPHALUS CERNUUS) ON BENTHIC AND PELAGIC ECOSYSTEMS OF THE GREAT LAKES					
R/ER-36 (11125)	DAVID J. BERG/KENNETH KR	OHIO	25,588	0	15,470
Title: EFFECTS OF HABITAT MODIFICATION BY DREISSENA SPP. ON BURROWING MAYFLY SURVIVAL AND FITNESS					
R/ER-38 (11130)	PAUL A. BERKMAN	OHIO	39,805	0	31,093
Title: ECOSYSTEM STATE CHANGES IN WESTERN LAKE ERIE: EXPANSION OF INVADING MUSSEL ASSEMBLAGES ON SOFT SUBSTRATES					
R/F-66 (10080)	PETER THOMAS	TEXAS	58,550	0	21,598
Title: IDENTIFICATION OF THE RUFFE OOCYTE MATURATION INDUCING SUBSTANCE AND CHARACTERIZATION OF ITS RECEPTOR					
R/ES-23 (10594)	JOHN W. TUNNELL, JR.	TEXAS	46,746	0	21,097
Title: PHYSIOLOGICAL TOLERANCES AND NONCHEMICAL CONTROL STRATEGIES FOR THE RECENTLY INTRODUCED MACROFOULING BROWN MUSSEL, PERNA PERNA					
R/ES-11 (10977)	DAVID A. JAY	WASHINGTON	77,700	0	28,758
Title: EFFECTS OF SPARTINA ALTERNIFLORA ENCROACHMENT ON TIDAL PROCESSES IN WILLAPA BAY, WA					
R/ES-6 (11049)	C.A. SIMENSTAD/B.F. ATWA	WASHINGTON	0	35,010	0
Title: ECOLOGICAL EFFECTS OF MARSH PROGRADATION BY NATIVE AND NON-NATIVE SPECIES IN TWO PACIFIC NORTHWEST ESTUARIES					
R/MW-57 (10569)	DAVID E. ARMSTRONG	WISCONSIN	172,667	0	0
Title: INFLUENCES OF ZEBRA MUSSEL ON THE DISTRIBUTION AND FATE OF COPLANAR PCB CONGENERS IN THE GREEN BAY ESTUARY					
R/LR-63 (10571)	DAVID N. EDGINGTON	WISCONSIN	192,485	0	0
Title: THE EFFECT OF ZEBRA MUSSEL INFESTATION IN INLAND LAKES ON PELAGIC BENTHIC COUPLING					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-69

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/LR-65	DIANNA K. PADILLA	WISCONSIN	30,317	0	0
(10572) Title: FACILITATION OF EXOTIC SPECIES INFORMATION EXCHANGE BETWEEN NORTH AMERICA AND THE FORMER SOVIET UNION					

R/LR-66	MARK B. SANDHEINRICH	WISCONSIN	25,377	0	0
(10573) Title: TROPHIC INTERACTIONS BETWEEN ZEBRA MUSSELS AND LARVAL FISH: EXPERIMENTAL TESTS OF COMPETITION FOR PLANKTONIC RESOURCES					

A/AS-36	CLIFFORD KRAFT	WISCONSIN	147,585	0	0
(10574) Title: ZEBRA MUSSEL OUTREACH PLAN: A CONTINUING PROGRAM OF THE GREAT LAKES SEA GRANT NETWORK					

Number of Projects: 42			Subtotal:	3,836,747	55,286 1,395,110

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-70

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 104 - COASTAL AND GREAT LAKES HABITATS: CUMULATIVE IMPACTS

R/C-E-39	S. S. BELL	FLORIDA	67,822	0	37,200
(10368)	Title: IMPACT OF BOATING ON FAUNAL-SEAGRASS LINKS: MODIFICATION OF HABITAT FUNCTION BY PROPELLER SCARS				

R/PT-5	DENISE BRIETBURG ET AL	MARYLAND	0	1,298,749	0
(11016)	Title: THE IMPORTANCE OF UNDERSTANDING ECOLOGICAL COMPLEXITY TO PREDICTING EFFECTS OF MULTIPLE STRESSORS ON COASTAL SYSTEMS				

R/CL-46	ANNE E. HERSHEY	MINNESOTA	69,285	0	33,487
(10952)	Title: WATERSHED EFFECTS ON STREAM PRODUCTIVITY AND WATER QUALITY DISCHARGE IN LAKE SUPERIOR TRIBUTARY STREAMS				

A/EEP-7	DAVID G. WHITE, II	NEW YORK	62,874	0	31,437
(10544)	Title: SEA GRANT/USDA-EXTENSION SERVICE NATIONWIDE ZEBRA MUSSEL TRAINING INITIATIVE; NEW YORK SEA GRANT COMPONENT				

R/CM-61	STEVEN N. MURRAY	UNIV. OF SOUTHERN CALIFORNIA	38,190	0	25,050
(10405)	Title: DO CALIFORNIA MARINE LIFE REFUGES CONSERVE BIODIVERSITY ON URBAN SEASHORES? ANALYSIS OF REPEATED PULSE DISTURBANCE FROM HUMAN ACTIVITIES				

R/ES-18	R.C. WISSMAR/C.A. SIMENS	WASHINGTON	0	37,126	0
(11062)	Title: PNCERS: RIVERINE AND ESTUARINE PRODUCTION PATTERS AND PROCESSES.				

Number of Projects: 6			Subtotal:	238,171	1,335,875	127,174
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-71

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 111 - SOCIOECONOMIC DIMENSIONS OF ENVIRONMENTAL CHANGE

R/MRD-32	V. KERRY SMITH	NORTH CAROLINA	0	0	21,607
(11033)	Title: INTEGRATING MARKET AND NON-MARKET IMPACTS OF ENVIRONMENTAL REGULATIONS FOR NET BENEFIT MEASUREMENTS: NUTRIENT CONTROL AND COASTAL RESOURCES				

R/COP-7	M. RICHARD DEVOE	SOUTH CAROLINA	0	100,000	7,730
(11059)	Title: SOUTH ATLANTIC BIGHT LAND USE COASTAL ECOSYSTEM STUDY (LU-CES)				

R/MS-46	D. HUPPERT/A. OLSON/M.HE WASHINGTON		0	37,085	0
(11064)	Title: PNCERS: SOCIOECONOMIC CONSEQUENCES OF ECOSYSTEM CHANGE.				

Number of Projects: 3			Subtotal:	0	137,085
					29,337

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-72

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 112 - COASTAL MANAGEMENT POLICY TOOLS

R/B-37	JOHN L. GALLAGHER	DELAWARE	75,000	0	7,792
(10194)	Title: TRANSGENIC MARINE PLANTS: THE KEY TO EXPLOITING SALINE LAND AND WATER RESOURCES FOR INDUSTRIAL AND FOOD PRODUCTS				

R/P-4	BILIANA CICIN-SAIN	DELAWARE	18,988	0	65,825
(10196)	Title: POLICY CONTEXT OF MARINE BIOTECHNOLOGY: EVOLVING NATIONAL/INTERNATIONAL FRAMEWORKS, ISSUES & THE PUBLIC INTEREST				

R/P-6	BILIANA CICIN-SAIN	DELAWARE	263,574	0	60,824
(10548)	Title: IMPROVING THE SCIENCE/POLICY INTERFACE IN THE MANAGEMENT OF COASTAL ECOSYSTEMS THROUGH MANAGEMENT ANALYSIS AND OUTREACH				

R/MFRI-I-94	R. APPELDOORN	PUERTO RICO	20,035	0	0
(10242)	Title: MARINE FISHERIES RESERVES (MFR) INITIATIVE ENHANCEMENT				

R/SEL-6	R. R. STICKNEY/L. R. KIN	TEXAS	30,508	0	0
(11050)	Title: EVALUATION OF MARINE RESEARCH PROGRAMS: A PRELIMINARY REVIEW AND ASSESSMENT				

R/CZ-21(A)	MARC J. HERSHMAN	WASHINGTON	0	10,000	0
(10722)	Title: THE EFFECTIVENESS OF U.S. COASTAL ZONE MANAGEMENT				

Number of Projects: 6			Subtotal:	408,105	10,000	134,441
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-73

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 113 - MULTIPLE USE MANAGEMENT AND CONFLICT RESOLUTION

A/L-1	MICHAEL W. WASCOM	LOUISIANA	77,529	0	52,129
(10827) Title: LEGAL ADVISORY SERVICE					

R/PPA-41	RICHARD G. HILDRETH	OREGON	146,069	0	186,845
(10291) Title: LAW OF THE SEA AND COASTAL COHO SALMON RECOVERY: PACIFIC NORTHWEST IMPLICATIONS					

R/BS-17	RONALD M. THOM	WASHINGTON	0	31,825	0
(11063) Title: PNCERS: HUMAN INTERVENTION IN THE COASTAL ECOSYSTEM.					

Number of Projects:	3		Subtotal:	223,598	31,825	238,974
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-74

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 121 - SEVERE STORMS

R/CE-2	TIMOTHY A. REINHOLD	SOUTH CAROLINA	45,436	0	20,901
(10265)	Title: WIND EFFECTS ON COASTAL STRUCTURES: PROTECTION OF THE BUILDING ENVELOPE AND STRUCTURE				

Number of Projects: 1

Subtotal: 45,436 0 20,901

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-75

<u>Project Number</u>	<u>PI</u>	<u>Program</u>	<u>Sea Grant</u>	<u>Pass Thru</u>	<u>Matching</u>
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Project Category: 122 - EARTHQUAKES AND TSUNAMIS

R/CP-33	STEPHEN E. DICKENSON	OREGON	47,913	0	7,995
(10292) Title: SEISMIC PERFORMANCE OF WATERFRONT RETAINING STRUCTURES					

Number of Projects: 1			Subtotal:	47,913	0	7,995
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-76

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 123 - COASTAL PLANNING AND BUILDING CONSTRUCTION TECHNIQUES

R/EP-1 (10622)	• KWOK FAI CHEUNG	HAWAII	13,274	0	21,604
Title: A GENERALIZED REFRACTION-DIFFRACTION MODEL FOR STEEP BATHYMETRY					
R/EP-2 (10623)	R. CENGIZ ERTEKIN	HAWAII	39,265	0	19,652
Title: REFRACTION-DIFFRACTION OF DIRECTIONALLY SPREAD, NONLINEAR, RANDOM WAVES IN THE NEARSHORE ENVIRONMENT					
R/EP-3 (10624)	MARK A. MERRIFIELD	HAWAII	32,744	0	23,080
Title: WAVE MODEL VERIFICATION FOR ISLAND REGIONS					
R/CE-223 (10180)	VIJAY PANCHANG	MAINE/NEW HAMPSHIRE	60,288	0	13,236
Title: WAVE MODEL FOR GULF OF MAINE					
R/S-95002 (10578)	KARL F. NORDSTROM	NEW JERSEY	77,994	0	80,183
Title: SHORELINE CHANGE ON THE DEVELOPED NEW JERSEY COAST					
R/CZS-29 (11034)	WALTER CLARK/DAVID BROWNE	NORTH CAROLINA	0	0	23,874
Title: COASTAL PUBLIC TRUST LANDS AND WATERS: LIMITATIONS AND OPPORTUNITIES FOR SUSTAINABLE PUBLIC AND PRIVATE USE					
UNKNOWN (11171)	VIRGINIA LEE	RHODE ISLAND	0	67,668	0
Title: PUBLIC-PRIVATE PARTNERSHIPS FOR HAZARD MITIGATION.					
Number of Projects: 7			Subtotal:	223,565	67,668 181,629

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-77

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 124 - SHORELINE PROCESSES AND EROSION					
R/CZ-121 (10476)	JOHN LARGLER	CALIFORNIA	51,705	0	8,802
Title: INTERACTION OF WAVE-DRIVEN NEARSHORE FLOWS WITH CROSS-SHORE BARRIERS AND TIDAL JETS					
R/OE-31 (10657)	MICHELE OKIHIRO	CALIFORNIA	65,125	0	9,176
Title: PREDICTING SEICHE IN HARBORS					
R/OE-13 (10198)	JAMES T. KIRBY	DELAWARE	10,098	0	34,849
Title: SPECTRAL WAVE EVOLUTION NEAR TIDAL INLETS					
R/OE-17 (10200)	IB A. SVENDSEN	DELAWARE	5,317	0	58,682
Title: APPLICATION OF A COMPREHENSIVE NEARSHORE CIRCULATION MODEL TO INFRAGRAVITY WAVE GENERATION					
R/OE-18 (10201)	NOBUHISA KOBAYASHI	DELAWARE	5,317	0	37,522
Title: SWASH DYNAMICS UNDER OBLIQUELY INCIDENT WAVES					
R/C-S-35 (10015)	ROBERT G. DEAN	FLORIDA	55,896	0	27,949
Title: QUANTIFICATION OF SHORT-AND LONG-TERM SHORELINE CHANGES DUE TO CROSS SHORE SEDIMENT TRANSPORT					
R/HAB-1-PD (11427)	CHANGSHENG CHEN	GEORGIA	10,000	0	0√
Title: MODELING STUDY OF PHYSICAL PROCESSES OVER THE INNER SHELF OF THE GEORGIA COAST					
R/CE-225 (10181)	DANIEL F. BELKNAP	MAINE/NEW HAMPSHIRE	62,993	0	13,185
Title: SAND AND GRAVEL OF THE WELLS, MAINE EMBAYMENT; A HEAVILY DEVELOPED COASTAL SYSTEM					
ROC-1 (10046)	LAWRENCE P. SANFORD	MARYLAND	51,238	0	26,730
Title: MEASUREMENT AND MODELING OF SURFACE WAVES IN NORTHERN CHESAPEAKE BAY					
RC-50 (11086)	DUNCAN M. FITZGERALD	MASSACHUSETTS INST. OF TECH.	15,000	0	7,807
Title: SAND AND GRAVEL OF THE WELLS, MAINE, EMBAYMENT: NEARSHORE AND BARRIER SEDIMENT VOLUMES AND TRANSPORT PATHS IN A HEAVILY DEVELOPED COASTAL SYSTEM.					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-78

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
R/CCP-6 (10996)	DANIEL C. CONLEY	NEW YORK Title: SEDIMENT BYPASSING AT MORICHES INLET	21,302	0	20,032
R/CZS-28 (11035)	W. CLEARY/P. HOISER/S. R	NORTH CAROLINA Title: A PICTORIAL ATLAS OF NORTH CAROLINA'S INLETS	23,548	0	0
R/EM-19 (11131)	KEITH BEDFORD	OHIO Title: AN INTEGRATED WATERSHED-LAKE ERIE FORECASTING SYSTEM: PART I	35,176	0	15,950
R/EG-9501 (10783)	JON BOOTHROYD	RHODE ISLAND Title: A SUSTAINABLE BEACH/DUNE REPLENISHMENT STRATEGY FOR THE MICROTIDAL BARRIER/HEADLAND COAST OF SOUTHERN RHODE ISLAND	67,914	0	30,529
R/GS-1 (10233)	LESLIE SAUTTER	SOUTH CAROLINA Title: SOUTH CAROLINA COASTAL EROSION STUDY	0	249,900	99,659
R/CP-10 (10266)	TIMOTHY W. KANA	SOUTH CAROLINA Title: MESOSCALE MODELING OF SEDIMENT TRANSPORT AND MORPHOLOGIC CHANGES AT TIDAL INLETS	74,278	0	33,983
R/O-30 (11104)	W. R. GEYER/J. R. LEDWEL	WOODS HOLE OCEANOGRAPHIC INST. Title: QUANTIFYING FLUSHING RATES OF ESTUARIES	52,994	0	10,224
Number of Projects: 17			Subtotal:	597,901	249,900
					435,079

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-79

<u>Project Number</u>	<u>PI</u>	<u>Program</u>	<u>Sea Grant</u>	<u>Pass Thru</u>	<u>Matching</u>
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Project Category: 132 - EQUIPMENT DESIGN AND TESTING

R/S-28	DI JIN	WOODS HOLE OCEANOGRAPHIC INST.	36,334	0	18,653
(11106) Title: AN OPTIMAL RISK SHARING STRATEGY FOR MARINE OIL TRANSPORT					

Number of Projects: 1			Subtotal:	36,334	0	18,653
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-80

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 133 - SURVIVAL AND SAFETY TRAINING

RC-49A	N. M. PATRIKALAKIS	MASSACHUSETTS INST. OF TECH.	0	15,000	0
(10918) Title: TOWARDS THE DEVELOPMENT OF A RISK MODEL FOR EVALUATING MARINE SAFETY					

Number of Projects: 1			Subtotal:	0	15,000	0
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-81

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 134 - RECREATIONAL AND COMMERCIAL DIVING

R/HP-6 (10621)	YU-CHONG LIN	HAWAII	31,309	0	85,230
Title: APPLIED PHYSIOLOGY OF DIVING					

R/DP-5 (10328)	GERALD L. LOGUE	NEW YORK	86,879	0	20,032
Title: DECOMPRESSION SICKNESS AND COMPLEMENT ACTIVATION, THE ROLE OF DIVER'S AGE					

R/NI-25 (11144)	RUDOLF DUELAND	WISCONSIN	45,205	0	39,145
Title: DIVE SAFETY AND EFFICIENCY					

R/NI-26 (11145)	WILLIAM P. MORGAN	WISCONSIN	32,507	0	29,009
Title: PREDICTION OF ADHERENCE, HEALTH STATUS AND DIVING ACCIDENTS IN RECREATIONAL SCUBA DIVERS: A TEN-YEAR LONGITUDINAL STUDY					

Number of Projects: 4

Subtotal:	195,900	0	173,416
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SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-82

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 141 - EDUCATION: PRE-COLLEGE					
E/UG-4 (10467)	JAMES SULLIVAN	CALIFORNIA Title: JOHN D. ISAACS MEMORIAL SEA GRANT SCHOLARSHIP	10,000	0	3,290

E/R/CZ-131 (10664)	DALE INGMANSON	CALIFORNIA Title: WETLANDS RESTORATION BY PUBLIC SCHOOL TEACHERS AND STUDENTS	12,932	0	4,749

E/T-9 (11047)	EDWARD MONAHAN/V.	COURNO CONNECTICUT Title: OPERATION PATHFINDER: OCEANOGRAPHY AND COASTAL PROCESSES FOR ELEMENTARY AND MIDDLE SCHOOL TEACHERS	53,340	0	9,000

E/METCON (10528)	ELBERT L. COX	INDEPENDENT/OTHER Title: NOAA ENGINEERING/SCIENCE CAREER ORIENTATION PROGRAM	0	58,784	25,857

E/ENV-2 (11015)	LYLE M. SONIAT	LOUISIANA Title: CROSS DISCIPLINARY MARINE EDUCATION RESOURCES	36,169	0	17,071

E/R/VBE-1 (10836)	SHARI L. DANN	MICHIGAN Title: A TRANSFERABLE, MULTIDISCIPLINARY, VESSEL-BASED, EXPERIENTIAL EDUCATION MODEL	83,057	0	27,265

E/T-11 (11300)	MICHAEL MCDONALD	MINNESOTA Title: OPERATION PATHFINDER: OCEANOGRAPHY AND COASTAL PROCESSES FOR ELEMENTARY AND MIDDLE SCHOOL TEACHERS	0	49,883	0

E/O-53 (10102)	SHARON H. WALKER	MISSISSIPPI/ALABAMA Title: PROJECT MARINE DISCOVERY: TEACHERS' MINI CAMPS--EXPANSION PROJECT	49,699	0	33,843

E/O-48 (10170)	SHARON H. WALKER	MISSISSIPPI/ALABAMA Title: GLOBAL ENVIRONMENTAL EDUCATION: PUBLICATIONS TO FACILITATE THE TRANSFER OF GLOBAL SCIENCE TECHNOLOGY AND INFORMATION TO MIDDLE SCHOOL TEACHERS	19,171	0	12,502

E/O-49 (10171)	DAVID L. SCOTT	MISSISSIPPI/ALABAMA Title: PROJECT WETLANDS: WATERS ESSENTIAL TO LAND AND SEA	17,903	0	15,635

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-83

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
E/T-9601 (11195)	JOHN A. TIEDEMANN/C. ANT	NEW JERSEY	14,913	0	10,240
Title: THE BIOLOGY OF THE HUDSON-RARITAN ESTUARY: A MARINE EDUCATIONAL PROGRAM FOR MIDDLE AND HIGH SCHOOL TEACHERS.					
E/MP-6 (11304)	ANN E. MCELROY	NEW YORK	6,000	0	0
Title: EDUCATIONAL TECHNOLOGY WORKSHOP FOR SEA GRANT STAFF WITH RESPONSIBILITIES FOR EDUCATION PROGRAMMING					
E/E-1 (11134)	ROSANNE W. FORTNER	OHIO	41,782	0	42,175
Title: EVALUATION OF PROGRAM EFFECTIVENESS AND CLASSROOM TECHNOLOGY USE IN GREAT LAKES EDUCATION					
E/MED-6 (11053)	ROBERT E. MALOUF/VICKI O	OREGON	0	49,996	1,875
Title: OPERATION PATHFINDER: OCEANOGRAPHY AND COSTAL PROCESSES FOR ELEMENTARY AND MIDDLE SCHOOL TEACHERS					
E/D-70-1 (10247)	ALIDA ORTIZ	PUERTO RICO	48,962	0	51,594
Title: MARINE EDUCATION AND TRAINING					
E/O-13 (11267)	LESLIE REYNOLDS SAUTTER	SOUTH CAROLINA	36,945	0	62,320
Title: TESTING AND EVALUATION A TEACHING MODEL IN MARINE SCIENCE: THE COASTTEAM PROGRAM, PHASE II					
ET/C-32 (10603)	RICHARD K. TINNIN	TEXAS	74,535	0	37,268
Title: MARINE FIELD EXPERIENCES FOR TEACHERS AND STUDENTS					
Number of Projects: 17			Subtotal:	505,408	158,663
					354,684

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-84

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 142 - EDUCATION: UNIVERSITY					
E/70-10 (10685)	R. K. DEARBORN	ALASKA	76,427	0	27,414
Title: SEA GRANT TRAINEESHIPS					
E/70-107 (10986)	R. K. DEARBORN	ALASKA	0	36,000	18,000
Title: KNAUSS SEA GRANT FELLOWSHIP FOR NINA MOLLETT					
E/G-2A (10098)	JAMES SULLIVAN	CALIFORNIA	344,046	0	0
Title: SEA GRANT TRAINEES					
E/G-9 (10471)	JAMES SULLIVAN	CALIFORNIA	19,400	0	11,717
Title: CALIFORNIA SEA GRANT STATE FELLOWSHIP PROGRAM					
E/G-2 (10665)	JAMES SULLIVAN	CALIFORNIA	375,648	0	57,792
Title: SEA GRANT TRAINEES					
E/DC-16 (10942)	JAMES J. SULLIVAN	CALIFORNIA	36,000	36,000	0
Title: NATIONAL SEA GRANT FELLOWSHIPS					
E/G-1 (10208)	RICHARD W. TARPLEY	DELAWARE	305,756	0	84,484
Title: GRADUATE EDUCATION					
E/G-2 (10209)	RICHARD W. TARPLEY	DELAWARE	0	36,000	14,400
Title: GRADUATE EDUCATION					
E/INDST-1 (10364)	JAMES C. CATO	FLORIDA	29,102	0	29,102
Title: THE USE OF GIANT CLAM (TRIDACNA) TO REMOVE PARTICULATE AND DISSOLVED NUTRIENTS IN AQUACULTURE EFFLUENTS					
E/ST-21 (10917)	JAMES C. CATO	FLORIDA	0	36,000	0
Title: DEAN JOHN A. KNAUSS MARINE POLICY FELLOWSHIP					
E/CMF-1 (11188)	JAMES C. CATO	FLORIDA	0	60,000	20,669
Title: COASTAL MANAGEMENT FELLOWSHIP					

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-85

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
E/EDU-1 (11120)	DAIVD J. DAVIES	GEORGIA Title: MARINE EDUCATION AND TRAINING	64,346	0	65,153
E/MS-7 (11121)	DENISE M. STEPHENSON-HAW	GEORGIA Title: THE COASTAL ENVIRONMENT AS AN INTEGRATED SYSTEM	15,541	0	16,947
E/EDU-3 (11191)	DENISE M. STEPHENSON-HAW	GEORGIA Title: HBCU CAPACITY DEVELOPMENT CENTER.	50,308	0	25,000
E/EDU-2 (11192)	MATTHEW R. GILLIGAN	GEORGIA Title: INCREASING DIVERSITY IN MARINE RESEARCH AND EDUCATION: CAPACITY-BUILDING AT A COASTAL HISTORICALLY-BLACK COLLEGE WITH MARINE AND ENVIRONMENTAL PROGRAMS AND FACILITIES.	51,792	0	51,159
E/MUR-1 (10823)	CHARLES A. WILSON	LOUISIANA Title: LOUISIANA UNDERGRADUATE RESEARCH OPPORTUNITIES PROGRAM	12,900	0	4,622
E/A-10 (10191)	M. R. SWIFT	MAINE/NEW HAMPSHIRE Title: OPPORTUNITIES FOR UNDERGRADUATE RESEARCH AND DEVELOPMENT IN MARINE SCIENCE AND ENGINEERING	23,000	0	43,994
E/A-13 (11199)	ROBERT E. WALL	MAINE/NEW HAMPSHIRE Title: CSC COASTAL RESOURCE MANAGEMENT FELLOWSHIP	0	60,000	13,860
E-1 (10041)	GAIL B. MACKIERNAN	MARYLAND Title: SEA GRANT TRAINEE PROGRAM	107,250	0	17,020
E-16 (10943)	CHRISTOPHER F. D'ELIA	MARYLAND Title: DEAN JOHN A. KNAUSS MARINE POLICY FELLOWSHIP: TIMOTHY A. BATTISTA	0	36,000	0
E/R/E-19 (11186)	CAROLYN BROOKS	MARYLAND Title: PROVIDING INCENTIVES AND QUALITY PROGRAMS TO ATTRACT MINORITIES TO CAREERS IN THE MARINE SCIENCES	50,000	0	37,772
E-19 (11198)	CHRISTOPHER D'ELIA	MARYLAND Title: COASTAL SERVICE CENTER MANAGEMENT FELLOWSHIP: GENE RILLING	0	60,000	0

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-86

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
E-5 (10390)	JOHN J. CALLAHAN	MASSACHUSETTS INST. OF TECH. Title: MIT SEA GRANT/MMA JOINT PROGRAM IN MARINE EDUCATION AND TRAINING	38,083	0	125,702
E-01 (10391)	C. CHRYSOSTOMIDIS	MASSACHUSETTS INST. OF TECH. Title: MIT SEA GRANT UNDERGRADUATE RESEARCH OPPORTUNITIES PROGRAM	14,583	0	19,340
E/11 (10947)	C. CHRYSOSTOMIDIS	MASSACHUSETTS INST. OF TECH. Title: SEA GRANT FELLOWS PROGRAM	0	36,000	0
E/T-3 (10420)	MICHAEL MCDONALD	MINNESOTA Title: SEA GRANT ASSISTANTSHIPS	120,793	0	0
E/T-4 (10421)	GERALD L. HILL	MINNESOTA Title: AMERICAN INDIANS IN MARINE SCIENCE	49,114	0	15,427
E/T-11 (10970)	MICHAEL MCDONALD	MINNESOTA Title: 1996 DEAN JOHN A. KNAUSS MARINE POLICY FELLOWSHIP	0	36,000	0
E/O-52 (10101)	CASEY S. HARRISON	MISSISSIPPI/ALABAMA Title: PRE-SERVICE TEACHER TRAINING: APPLIED INSTRUCTIONAL TECHNIQUES IN MARINE SCIENCE AND NONPOINT SOURCE POLLUTION	35,193	0	18,936
E/PS-1 (10322)	CORNELIA G. SCHLENK	NEW YORK Title: SEA GRANT SCHOLARS	199,730	0	0
E/I-25 (10945)	ANNE MCELROY	NEW YORK Title: DEAN JOHN A. KNAUSS MARINE POLICY FELLOW	0	36,000	0
E/MP-2 (10971)	ROBERT J. KENT	NEW YORK Title: EDUCATIONAL EXPERIENCE IN PROGRAM DEVELOPMENT AND MANAGEMENT WITH THE NATIONAL SEA GRANT COLLEGE PROGRAM	63,823	0	0
E/GS-3 (10458)	W. QUEEN	NORTH CAROLINA Title: SEA GRANT MARINE POLICY FELLOWSHIP	0	0	0

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-87

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
E/GS-4 (10459)	B. J. COPELAND Title: SEA GRANT GRADUATE RESEARCH STIPENDS	NORTH CAROLINA	167,580	0	0
E/SGI-15 (10999)	B. J. COPELAND Title: DEAN JOHN A. KNAUSS POLICY FELLOW: ALEXANDER ELKAN	NORTH CAROLINA	36,000	0	14,887
E/SGI-16 (11000)	B. J. COPELAND Title: DEAN JOHN A. KNAUSS POLICY FELLOW - MARSHALL HAYES	NORTH CAROLINA	36,000	0	14,887
E/SGI-17 (11001)	B. J. COPELAND Title: DEAN JOHN A. KNAUSS POLICY FELLOW - SARAH BITTLEMAN	NORTH CAROLINA	36,000	0	14,887
E/SGI-19 (11197)	B. J. COPELAND Title: CSC COASTAL MANAGEMENT FELLOW - CHAD NELSEN	NORTH CAROLINA	0	60,000	0
E/I-9 & E/I-10 (10998)	JEFFREY M. REUTTER Title: SEA GRANT FEDERAL FELLOWS PROGRAM	OHIO	72,000	0	0
E/INT-23 (11196)	ROBERT E. MALOUF Title: NOAA COASTAL SERVICES CENTER COASTAL MANAGEMENT FELLOWSHIP (GREG BENOIT)	OREGON	0	60,000	0
E/F-24 (10919)	SCOTT W. NIXON Title: DEAN JOHN A KNAUSS MARINE POLICY FELLOWSHIP - LAURA ERNST	RHODE ISLAND	0	36,000	18,000
E/F-25 (10920)	SCOTT W. NIXON Title: DEAN JOHN A. KNAUSS MARINE POLICY FELLOWSHIP - ANDREA OLIVER	RHODE ISLAND	0	36,000	18,000
E/O-18 (10720)	M. RICHARD DEVOE/W. PATT Title: INTERNSHIPS TO ASSIST IN THE COMMERCIALIZATION OF COASTAL ENVIRONMENTAL TECHNOLOGIES	SOUTH CAROLINA	0	104,466	0
E/F-10 (10946)	M. RICHARD DEVOE Title: SEA GRANT FEDERAL FELLOWS PROGRAM	SOUTH CAROLINA	0	36,000	0
E/M-1 (10406)	SUSAN YODER Title: SEA GRANT GRADUATE TRAINEE	UNIV. OF SOUTHERN CALIFORNIA	47,400	0	12,600

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-88

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
E/KF-96-1	RUSSELL W. CALLENDER	VIRGINIA	36,000	0	0
(10940) Title: DEAN JOHN A. KNAUSS MARINE POLICY FELLOWSHIP - 1996 FOR JENNIFER D. AIOSA					
E/KF-96-1	RUSSELL W. CALLENDER	VIRGINIA	0	36,000	0
(10941) Title: DEAN JOHN A. KNAUSS MARINE POLICY FELLOWSHIP - 1996 FOR ELIZABETH LAUCK					
E/M/AD-3	GEORGE BURBANCK	VIRGINIA	50,000	0	25,000
(11183) Title: HAMPTON UNIVERSITY RESEARCH CAPABILITY ENHANCEMENT PROJECT: DEVELOPMENT OF A UNIFIED, LONG-TERM RESEARCH PROGRAM					
E/I-1(A)	LOUIE S. ECHOLS	WASHINGTON	36,000	0	0
(10921) Title: KNAUSS SEA GRANT FELLOWS-COALTER LATHROP					
E/I-1(B)	LOUIE S. ECHOLS	WASHINGTON	0	36,000	0
(10922) Title: KNAUSS SEA GRANT FELLOWSHIPS CATHERINE MARZIN					
E/E-1	MARY LOU REEB	WISCONSIN	25,178	0	35,784
(10141) Title: SPECIAL MARINE EDUCATION PROGRAMS					
E/E-27	MARY LOU REEB	WISCONSIN	72,000	0	0
(10944) Title: DEAN JOHN A. KNAUSS MARINE POLICY FELLOWSHIP					
E/R-18	DR. JUDITH E. MCDOWELL	WOODS HOLE OCEANOGRAPHIC INST.	0	72,000	0
(10916) Title: WHOI SEA GRANT KNAUSS FELLOWS-1996					
Number of Projects: 53			Subtotal:	2,696,993	944,466 872,555

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-89

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 143 - EDUCATION: INFORMAL					
E/T-7 (10696)	VALERIE COURNOYER	CONNECTICUT Title: PROJECT LISTEN: LONG ISLAND SOUND TEACHER ENHANCEMENT NETWORK	40,964	0	42,473
A-01 (11092)	RICHARD G. MORRIS	MASSACHUSETTS INST. OF TECH. Title: MIT SEA GRANT MARINE INDUSTRY COLLEGIUM	79,510	0	62,169
E/MP-7 (11303)	JULIE M. ZEIDNER	NEW YORK Title: EDUCATIONAL EXPERIENCE IN COMMUNICATIONS DEVELOPMENT WITH THE NATIONAL UNDERSEA RESEARCH PROGRAM	0	40,271	0
E/F-11 (11162)	RICHARD DEVOE/LEIGH J. H	SOUTH CAROLINA Title: A TRAINING AND EDUCATION PROGRAM FOR COASTAL RESOURCE MANAGERS	0	225,000	3,247
ET/C-36 (10927)	LAURISTON R. KING	TEXAS Title: EDUCATIONAL EXPERIENCE IN MARINE RESEARCH MANAGEMENT	34,175	0	0
Number of Projects: 5			Subtotal:	154,649	265,271
					107,889

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-90

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 151 - MARINE ADVISORY SERVICE: CORE					
A/71-01 (10688)	D. E. KRAMER	ALASKA Title: ALASKA MARINE ADVISORY PROGRAM	434,700	0	513,659
A/EA-1 (10468)	CHRISTOPHER DEWEES	CALIFORNIA Title: SEA GRANT EXTENSION PROGRAM (SGEP)	263,750	0	187,384
A/E-1 (10697)	NANCY BALCOM/HEATHER CRA	CONNECTICUT Title: SEA GRANT MARINE ADVISORY PROGRAM	75,507	0	38,943
A/E-3 (10698)	GABOURY BENOIT	CONNECTICUT Title: COASTAL MARINE EXTENSION AGENT INTERNS: DEVELOPMENT AND COORDINATION OF PUBLIC POLICY AND ENVIRONMENTAL EDUCATION	9,941	0	5,471
A/I-1 (10210)	KENT S. PRICE	DELAWARE Title: MARINE ADVISORY SERVICE	209,739	0	378,667
A/SGEP-11 (10026)	JOHN L. WOESTE	FLORIDA Title: FLORIDA SEA GRANT EXTENSION PROGRAM	532,500	0	266,267
A/MAS-1 (11118)	KEITH W. GATES	GEORGIA Title: ADVISORY SERVICES - GENERAL	102,598	0	38,733
A/AS-1 (10628)	BRUCE J. MILLER	HAWAII Title: SEA GRANT EXTENSION	293,279	0	130,258
A/SE-05-95 (10772)	PHILLIP E. POPE/JOE RUDD	ILLINOIS/INDIANA Title: OUTREACH AND TECHNOLOGY TRANSFER FOR WATER QUALITY AND BIOLOGICAL RESOURCES ISSUES IN SOUTHERN LAKE MICHIGAN	46,112	0	13,880
A/SE-03-95 (10774)	CHRISTINE H. PENNISI	ILLINOIS/INDIANA Title: MARINE EXTENSION EDUCATION	44,123	0	26,264

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-91

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
A/SE-1B-95 (10775)	LADONE SWANN	ILLINOIS/INDIANA Title: MARINE ADVISORY SERVICE - AQUACULTURE	20,047	0	7,979
A/SE-04-95 (10776)	BRIAN K. MILLER	ILLINOIS/INDIANA Title: MARINE ADVISORY SERVICE	14,258	0	17,117
A/EXT-1 (10825)	KENNETH J. ROBERTS	LOUISIANA Title: MARINE ADVISORY SERVICES IN THE LOUISIANA COOPERATIVE EXTENSION SERVICE	232,981	0	272,233
A/P-1 (10182)	BRIAN DOYLE	MAINE/NEW HAMPSHIRE Title: SEA GRANT MARINE ADVISORY PROGRAM	395,408	0	203,225
A/T-1 (10040)	DOUGLAS LIPTON	MARYLAND Title: SEA GRANT EXTENSION PROGRAM	210,000	0	456,293
A/FP-1 (10834)	JOHN D. SCHWARTZ	MICHIGAN Title: MICHIGAN SEA GRANT EXTENSION	223,238	0	105,072
A/SE-1 (10423)	JEFFREY GUNDERSON	MINNESOTA Title: MINNESOTA SEA GRANT EXTENSION PROGRAM	126,324	0	188,094
A/O-9 (10159)	WILLIAM HOSKING	MISSISSIPPI/ALABAMA Title: SEA GRANT ADVISORY ALABAMA COMPONENT	93,700	0	46,890
A/O-9 (10160)	DAVID VEAL	MISSISSIPPI/ALABAMA Title: MISSISSIPPI SEA GRANT ADVISORY SERVICE PROGRAM	80,000	0	130,410
A/S-1 (10581)	ALEX W. WYPYSZINSKI	NEW JERSEY Title: NEW JERSEY SEA GRANT MARINE ADVISORY SERVICE	72,875	0	82,181
A/EEP-1 (10321)	DALE R. BAKER	NEW YORK Title: SEA GRANT EXTENSION PROGRAM	596,216	0	420,009
A/EA-10 (10461)	J. D. MURRAY	NORTH CAROLINA Title: MARINE ADVISORY SERVICE PROGRAM	550,505	0	353,044

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-92

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
A/EA-10 (10461)	J. D. MURRAY	NORTH CAROLINA Title: MARINE ADVISORY SERVICE PROGRAM	24,068	0	0
A/EP-1 (10225)	LEROY J. HUSHAK	OHIO Title: OHIO SEA GRANT EXTENSION PROGRAM	144,080	0	77,813
A/ESG-3 (10297)	EDWAD KOLBE	OREGON Title: OREGON EXTENSION SEA GRANT	402,400	0	382,561
A/E-71 (10248)	JAVIER VELEZ-AROCHO	PUERTO RICO Title: MARINE ADVISORY SERVICES	73,322	0	139,396
A/VI-1 (10249)	LAVERNE E. RAGSTER	PUERTO RICO Title: US VIRGIN ISLANDS MARINE ADVISORY SERVICES	28,863	0	61,279
A/CR-9501 (10801)	VIRGINIA LEE	RHODE ISLAND Title: RHODE ISLAND SEA GRANT MARINE ADVISORY SERVICES: COASTAL MANAGEMENT PROGRAM	169,533	0	91,131
A/F-9501 (10802)	KATHLEEN CASTRO	RHODE ISLAND Title: MARINE ADVISORY SERVICES FISHERIES, AQUACULTURE, AND SEAFOOD PROGRAM	83,656	0	49,449
A/E-1 (10271)	ROBERT H. BACON	SOUTH CAROLINA Title: S. C. MARINE EXTENSION PROGRAM	106,107	0	105,105
A/F-4 (10604)	MIKE HIGHTOWER	TEXAS Title: MARINE ADVISORY SERVICES	220,000	0	140,000
AE-1 (10408)	PHYLLIS GRIFMAN	UNIV. OF SOUTHERN CALIFORNIA Title: MARINE ADVISORY SERVICES AND EDUCATION	72,200	0	21,518
A/EP-1 (10935)	WILLIAM D. DuPAUL	VIRGINIA Title: VIRGINIA SEA GRANT MARINE ADVISORY PROGRAM	545,043	0	369,136
A/FP-7 (10755)	MICHAEL SPRANGER	WASHINGTON Title: WASHINGTON SEA GRANT PROGRAM MARINE ADVISORY SERVICES	682,600	0	370,812

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-93

<u>Project Number</u>	<u>PI</u>	<u>Program</u>	<u>Sea Grant</u>	<u>Pass Thru</u>	<u>Matching</u>
A/AS-1	ALLEN H. MILLER	WISCONSIN	118,893	0	154,579
(10137) Title: ADVISORY SERVICES PROGRAM COORDINATION AND FIELD OFFICES					

A/M/O-2	GRAHAM S. GIESE	WOODS HOLE OCEANOGRAPHIC INST.	66,905	0	37,687
(10434) Title: MARINE ADVISORY SERVICE					

Number of Projects: 35			Subtotal:	7,365,471	0 5,882,539

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-94

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 152 - MARINE ADVISORY SERVICE: SPECIAL PROJECTS					
A/TT/NCRI-96 (11052)	STEVEN G. OLSON	INDEPENDENT/OTHER	950,000	0	0
Title: TECHNOLOGY TRANSFER FOR STRENGTHENING U.S. COASTAL ECONOMIES.					
A-03 (11094)	MADELEINE HALL-ARBER	MASSACHUSETTS INST. OF TECH.	24,443	0	11,171
Title: MASSACHUSETTS MARINE LIAISON SERVICE					
A-05 (11096)	JUDITH PEDERSON	MASSACHUSETTS INST. OF TECH.	25,046	0	12,209
Title: FACULTY/STUDENT MARINE ADVISORY SERVICE					
A/MD/A-8 (11164)	EARLE N. BUCKLEY/B.J.	CO NORTH CAROLINA	0	264,280	0
Title: SOUTHEAST CENTER FOR TECHNOLOGICAL INNOVATION					
A/I-9502 (10799)	JOSEPH DEALTERIS	RHODE ISLAND	22,100	0	4,615
Title: OUTREACH: THE LINK BETWEEN FISHERIES RESEARCH AND SUSTAINABLE DEVELOPMENT OF FISHERY RESOURCES					
Number of Projects: 5			Subtotal:	1,021,589	264,280 27,995

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-95

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 161 - COMMUNICATIONS: CORE					
C/A/75-01 (10689)	B.R. BAXTER & K. M. BYER Title: PUBLIC INFORMATION SERVICES	ALASKA	147,725	0	288,508
C/A/P-1 (10469)	JAMES SULLIVAN Title: COMMUNICATIONS PROGRAM	CALIFORNIA	129,583	0	36,764
C/M/CP-1 (10701)	MARGARET VAN PATTEN Title: CORE COMMUNICATIONS PROGRAM	CONNECTICUT	79,035	0	0
C/I-5 (10211)	TRACEY L. BRYANT Title: SEA GRANT COMMUNICATIONS	DELAWARE	159,961	0	103,874
C/COMM-3 (10027)	J. T. WOESTE Title: FLORIDA SEA GRANT COMMUNICATIONS PROGRAM	FLORIDA	114,500	0	57,250
C/M/COM-1 (11119)	CHARLOTTE INGRAM Title: COMMUNICATIONS PROGRAM	GEORGIA	52,709	0	0
C/M/C-1 (10629)	PRISCILLA BILLIG Title: THE COMMUNICATIONS PROGRAM	HAWAII	72,917	0	24,942
C/A/SE-02-95 (10773)	ROBIN G. GOETTEL/PHILLIP Title: COMMUNICATIONS	ILLINOIS/INDIANA	69,166	0	30,210
C/A/P-1 (10826)	ELIZABETH B. COLEMAN Title: PUBLICATIONS AND INFORMATION DISSEMINATION	LOUISIANA	57,997	0	128,679
C/M/C-1 (10185)	KATHLEEN LIGNELL Title: COMMUNICATIONS AND INFORMATION PROGRAM	MAINE/NEW HAMPSHIRE	213,065	0	89,943
C/M-4 (10038)	JACK GREER Title: SEA GRANT COMMUNICATIONS	MARYLAND	125,700	0	127,244

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-96

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
C/A-04 (11095) Title: MARINE COMMUNICATIONS/INFORMATION SERVICE	CAROLYN A. LEVI	MASSACHUSETTS INST. OF TECH.	145,600	0	5,016
C/A/C-1 (10831) Title: MICHIGAN SEA GRANT COMMUNICATIONS	MILDRED FLORY	MICHIGAN	97,185	0	91,658
C/M/C-1 (10426) Title: COMMUNICATIONS	MARIE SALES	MINNESOTA	106,176	0	28,863
C/M/PC-1 (10158) Title: PROGRAM MANAGEMENT - COMMUNICATIONS	LINDA C. SKUPIEN	MISSISSIPPI/ALABAMA	100,993	0	42,055
C/A/S-2 (10582) Title: NEW JERSEY SEA GRANT COMMUNICATIONS	KIM KOSKO	NEW JERSEY	44,235	0	20,740
C/PC-1 (10326) Title: COMMUNICATIONS	JULIE M. ZEIDNER	NEW YORK	150,388	0	0
C/PC-1 (10326) Title: COMMUNICATIONS	JULIE M. ZEIDNER	NEW YORK	7,266	0	0
C/M/D/A-3 (10462) Title: PROGRAM COMMUNICATIONS	K. HART	NORTH CAROLINA	93,462	0	125,493
C/M/P-2 (10226) Title: OHIO SEA GRANT COMMUNICATIONS PROGRAM	MARAN BRAINARD HILGENDOR	OHIO	23,361	0	11,681
C/M/A-12 (10300) Title: SEA GRANT COMMUNICATIONS	JOSPEH S CONE	OREGON	160,400	0	96,530
C/P-1 (10250) Title: UPRSGCP COMMUNICATIONS/PUBLICATIONS	LAURA COTTE	PUERTO RICO	52,024	0	109,285

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-97

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
C/A/I-9501 (10803) Title: THE RHODE ISLAND SEA GRANT COMMUNICATIONS PROGRAM	CAROLE JAWORSKI	RHODE ISLAND	132,339	0	26,427
C/M/P/M-3 (10273) Title: COMMUNICATIONS	LEIGH HANDAL	SOUTH CAROLINA	47,539	0	16,726
C/A/I-1 (10605) Title: MARINE INFORMATION SERVICES	AMY BROUSSARD	TEXAS	85,855	0	55,381
C/M-3 (10407) Title: COMMUNICATIONS AND PUBLICATIONS	PHYLLIS GRIFMAN	UNIV. OF SOUTHERN CALIFORNIA	43,175	0	9,318
C/A/PC-5 (10756) Title: WASHINGTON SEA GRANT PROGRAM COMMUNICATIONS	NANCY E. BLANTON	WASHINGTON	273,700	0	49,443
C/A/AS-2 (10139) Title: COMMUNICATIONS OFFICE AND PROGRAM COORDINATION	STEPHEN C. WITTMAN	WISCONSIN	77,359	0	90,725
C/A/S-14 (10433) Title: COMMUNICATIONS, PUBLIC OUTREACH AND EDUCATION	JUDITH MCDOWELL	WOODS HOLE OCEANOGRAPHIC INST.	52,030	0	9,819
Number of Projects: 28		Subtotal:	2,915,445	0	1,676,574

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-98

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 162 - COMMUNICATIONS: SPECIAL PROJECTS					
C/M/CP-4 (10517)	MARGARET VAN PATTEN	CONNECTICUT	13,123	0	0
Title: REACHING THE PUBLIC WITH A GREATER WEALTH OF INFORMATION: EXPANSION OF NOR'EASTER TO AN ON-LINE, DISK AND PRINT PROJECT					

C/PI-1 (10349)	CYNTHIA J. MURRAY	INDEPENDENT/OTHER	139,672	0	0
Title: A PROPOSAL FOR THE SUPPORT OF CONTINUING AND NEW ACTIVITIES OF THE NATIONAL SEA GRANT DEPOSITORY					

C/M-4A (10039)	JACK GREER	MARYLAND	137,250	0	0
Title: NETWORK MEDIA RELATIONS SPECIALIST					

C/A/I-9503 (10800)	CAROLE JAWORSKI	RHODE ISLAND	74,782	0	22,435
Title: REACHING THE PUBLIC WITH A GREATER WEALTH OF INFORMATION: EXPANSION OF NOR'EASTER TO AN ON-LINE, DISK, AND PRINT PROJECT					

C/M/M-3A (11166)	LEIGH HANDAL/LINDA BLACK	SOUTH CAROLINA	13,000	0	0
Title: A PROPOSAL TO CREATE A MORE COHESIVE AND INFORMED SEA GRANT NETWORK THROUGH EXPANSION OF THE COMMUNICATOR NEWSLETTER.					

C/R/ES-13 (10752)	ROBERT MIYAMOTO	WASHINGTON	91,400	0	45,394
Title: PUGET SOUND MULTIMEDIA CD-ROM					

C/A/AS-3 (10140)	RICHARD HOOPS	WISCONSIN	19,984	0	22,823
Title: EARTHWATCH PUBLIC SERVICE RADIO PROGRAM					

C/A/AS-38 (11147)	DAVID J. COOPER	WISCONSIN	12,256	0	7,303
Title: ICE-WATER MANSIONS: MULTI-MEDIA SITE GUIDES TO LAKE SUPERIOR SHIPWRECKS					

Number of Projects:	8		Subtotal:	501,467	0 97,955

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-99

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 170 - PROGRAM ADMINISTRATION					
M/79-01 (10690)	R. K. DEARBORN Title: PROGRAM ADMINISTRATION	ALASKA	81,698	0	179,452
M/A-1 (10473)	JAMES SULLIVAN Title: MANAGEMENT	CALIFORNIA	109,169	0	63,939
M/A-1 (10671)	JAMES SULLIVAN Title: MANAGEMENT	CALIFORNIA	0	0	20,048
M/PA-1 (10699)	EDWARD C. MONAHAN Title: PROGRAM MANAGEMENT: ADMINISTRATION AND PLANNING	CONNECTICUT	77,811	0	98,661
M/M-1 (10213)	CAROLYN THOROUGHGOOD Title: PROGRAM MANAGEMENT	DELAWARE	67,607	0	63,816
M/M-3 (10547)	VICTOR KLEMAS Title: INTEGRATION OF REMOTELY SENSED LAND COVER DATA AND CONDITION INDICATORS IN A GIS TO EVALUATE COASTAL WETLANDS	DELAWARE	30,421	0	16,108
M/PM-11 (10865)	JAMES C. CATO Title: FLORIDA SEA GRANT COLLEGE MANAGEMENT	FLORIDA	144,500	0	72,250
M/AD-1 (11123)	MAC V. RAWSON, JR. Title: PROGRAM MANAGEMENT	GEORGIA	38,830	0	47,791
M/PM-1 (10630)	CHARLES HELSLEY Title: PROGRAM MANAGEMENT AND ADMINISTRATION	HAWAII	75,957	0	9,333
M/P-01-95 (10770)	PHILLIP E. POPE Title: ILLINOIS-INDIANA SEA GRANT PROGRAM DEVELOPMENT, COORDINATION AND MANAGEMENT	ILLINOIS/INDIANA	21,420	0	28,575
M/P-02-95 (10771)	JOHN B. BRADEN Title: ILLINOIS-INDIANA SEA GRANT RESEARCH PROPOSAL COORDINATION	ILLINOIS/INDIANA	8,874	0	5,005

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-100

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
M/A-1 (10828) Title: PROGRAM ADMINISTRATION	JACK R. VAN LOPIK	LOUISIANA	40,787	0	211,677
M/A-1 (10183) Title: PROGRAM MANAGEMENT	ROBERT WALL	MAINE/NEW HAMPSHIRE	171,335	0	193,959
M-1 (10036) Title: SEA GRANT COLLEGE MANAGEMENT	CHRISTOPHER F. D'ELIA	MARYLAND	56,500	0	49,920
M/PM-1 (10395) Title: SEA GRANT COLLEGE PROGRAM MANAGEMENT	CHRYSSOSTOMOS CHRYSSOSTO	MASSACHUSETTS INST. OF TECH.	99,276	0	124,948
M/PM-1 (10832) Title: MICHIGAN SEA GRANT ADMINISTRATION	WILLIAM S. VORUS	MICHIGAN	64,421	0	91,545
M/P-1 (10425) Title: PROGRAM MANAGEMENT	MICHAEL MCDONALD	MINNESOTA	19,173	0	44,704
A/SE-2 (11429) Title: MINNESOTA SEA GRANT OUTREACH/MANAGEMENT PROGRAM	MICHAEL MCDONALD	MINNESOTA	65,052	0	0
M/PA-1 (10156) Title: PROGRAM MANAGEMENT: ADMINISTRATION	JESUS B. TUPAZ	MISSISSIPPI/ALABAMA	123,178	0	51,294
M/M-1 (10584) Title: PROGRAM MANAGEMENT	RICHARD T. DEWLING	NEW JERSEY	88,667	0	44,423
M/P/PPM-1 (10325) Title: PROGRAM MANAGEMENT	ANNE E. MCELROY	NEW YORK	239,923	0	0
M/D/A-1 (10464) Title: PROGRAM MANAGEMENT AND DEVELOPMENT	B. J. COPELAND	NORTH CAROLINA	122,186	0	0
M/P-1 (10227) Title: ADMINISTRATION OF THE OHIO SEA GRANT COLLEGE PROGRAM: PROGRAM DEVELOPMENT	JEFFREY M. REUTTER	OHIO	17,141	0	48,285

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-101

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
M/A-1 (10298) Title: PROGRAM MANAGEMENT	ROBERT E. MALOUF	OREGON	80,200	0	168,404
M/A-79 (10251) Title: PROGRAM MANAGEMENT	MANUEL L. HERNANDEZ-AVIL	PUERTO RICO	39,491	0	92,849
M/PM-9501 (10804) Title: PROGRAM MANAGEMENT	SCOTT NIXON	RHODE ISLAND	151,354	0	110,809
M/P/M-1 (10272) Title: PROGRAM MANAGEMENT	M. RICHARD DEVOE	SOUTH CAROLINA	141,865	0	15,407
M-1 (10606) Title: ADMINISTRATION AND PROGRAM DEVELOPMENT	ROBERT STICKNEY	TEXAS	109,230	0	67,716
M-1 (10409) Title: ADMINISTRATION AND MANAGEMENT	DOUGLAS J. SHERMAN	UNIV. OF SOUTHERN CALIFORNIA	13,625	0	41,483
M/AD-1 (10936) Title: VIRGINIA SEA GRANT COLLEGE - PROGRAM ADMINISTRATION	WILLIAM L. RICKARDS	VIRGINIA	211,432	0	0
M-1 (10757) Title: MANAGEMENT OF THE WASHINGTON SEA GRANT PROGRAM	LOUIE S. ECHOLS	WASHINGTON	161,200	0	136,861
M/SGA-2 (10143) Title: PROGRAM MANAGEMENT	ANDERS W. ANDREN	WISCONSIN	48,250	0	80,752
M/O-1 (10432) Title: PROGRAM MANAGEMENT	JUDITH MCDOWELL	WOODS HOLE OCEANOGRAPHIC INST.	60,211	0	46,158
Number of Projects: 33			Subtotal:	2,780,784	0 2,226,172

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-102

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
Project Category: 180 - PROGRAM DEVELOPMENT					
M/81-01 (10691)	R. K. DEARBORN	ALASKA Title: PROGRAM DEVELOPMENT AND RAPID RESPONSE	21,514	0	0
M/P-1 (10472)	JAMES SULLIVAN	CALIFORNIA Title: PLANNING AND DEVELOPMENT	62,437	0	10,324
M/R/NP-1 (10673)	JAMES SULLIVAN	CALIFORNIA Title: RAPID RESPONSE CAPABILITY	314,464	0	111,277
M/PD-1 (10700)	EDWARD C. MONAHAN	CONNECTICUT Title: PROGRAM DEVELOPMENT	22,500	0	0
M/M-2 (10212)	CAROLYN A. THOROUGHGOOD	DELAWARE Title: PROGRAM DEVELOPMENT	50,000	0	7,751
M/PD-9 (10029)	JAMES C. CATO	FLORIDA Title: COASTAL SCIENCE AND TECHNOLOGY INNOVATION WITH LIMITED FUNDS: THE FLORIDA SEA GRANT COLLEGE PROGRAM DEVELOPMENT PORTFOLIO	26,460	0	11,139
M/AD-2 (11124)	MAC V. RAWSON, JR.	GEORGIA Title: PROGRAM DEVELOPMENT	66,371	0	976
M/PM-2 (10631)	CHARLES HELSLEY	HAWAII Title: PROGRAM DEVELOPMENT	114,090	0	65,559
M/A-2 (10829)	JACK R. VAN LOPIK	LOUISIANA Title: PROGRAM DEVELOPMENT	7,543	0	11,327
M/D-1 (10184)	ANN BUCKLIN	MAINE/NEW HAMPSHIRE Title: PROGRAM DEVELOPMENT	75,472	0	26,859
M-3 (10037)	CHRISTOPHER F. D'ELIA	MARYLAND Title: PROGRAM DEVELOPMENT	15,680	0	4,861

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-103

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
M/PM-2 (10396)	CHRYSSOSTOMOS CHRYSSOSTO	MASSACHUSETTS INST. OF TECH. Title: PROJECT DEVELOPMENT OPPORTUNITIES	85,000	0	58,541
M/PM-2 (11057)	W. VORUS/W. TAYLOR/S. ST	MICHIGAN Title: MICHIGAN SEA GRANT COLLEGE PROGRAM DEVELOPMENT	10,000	0	0
M/P-2 (10424)	MICHAEL MCDONALD	MINNESOTA Title: PROGRAM DEVELOPMENT	14,000	0	8,000
M/PD-1 (10157)	JESUS B. TUPAZ	MISSISSIPPI/ALABAMA Title: PROGRAM MANAGEMENT - PLANNING AND DEVELOPMENT	112,229	0	54,030
M/M-2 (10583)	RICHARD T. DEWLING	NEW JERSEY Title: PROGRAM DEVELOPMENT	20,874	0	0
M/I/PIU-1 (10327)	ANNE E. MCELROY	NEW YORK Title: PROGRAM DEVELOPMENT	40,076	0	0
M/D/A-2 (10465)	B. J. COPELAND	NORTH CAROLINA Title: PROJECT INITIATION AND RAPID RESPONSE CAPABILITY	25,000	0	0
M/D/A-2 (10465)	B. J. COPELAND	NORTH CAROLINA Title: PROJECT INITIATION AND RAPID RESPONSE CAPABILITY	3,000	0	0
M/D-1 (10228)	JEFFREY M. REUTTER	OHIO Title: ADMINISTRATION OF THE OHIO SEA GRANT COLLEGE PROGRAM: PROGRAM DEVELOPMENT	25,092	0	21,900
M/A-2 (10299)	ROBERT E. MALOUF	OREGON Title: PROGRAM DEVELOPMENT	79,985	0	13,822
M/B-81 (10252)	MANUEL L. HERNANDEZ-AVIL	PUERTO RICO Title: PROGRAM DEVELOPMENT	14,255	0	15,000
M/PD-9501 (10805)	SCOTT NIXON	RHODE ISLAND Title: PROGRAM DEVELOPMENT	148,232	0	57,426

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-104

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
M/P/M-2 (10274) Title: PROGRAM DEVELOPMENT	M. RICHARD DEVOE	SOUTH CAROLINA	46,540	0	15,000
M/PM-2 (10607) Title: PROGRAM DEVELOPMENT	CHARLES HELSLEY	TEXAS	9,059	0	0
M-2 (10410) Title: PROGRAM DEVELOPMENT	DOUGLAS J. SHERMAN	UNIV. OF SOUTHERN CALIFORNIA	24,917	0	8,369
M/ODRP/PD-1 (10553) Title: OYSTER DISEASE RESEARCH PROGRAM: NEW INITIATIVES	WILLIAM L. RICKARDS	VIRGINIA	25,000	0	0
M/AD-2 (10937) Title: PROJECT DEVELOPMENT AND PROBLEM RESPONSE CAPABILITY	WILLIAM L. RICKARDS	VIRGINIA	55,839	0	0
M-2 (10758) Title: PROGRAM DEVELOPMENT	LOUIE S. ECHOLS	WASHINGTON	46,400	0	77,469
M/SGA-1 (10142) Title: PROGRAM DEVELOPMENT	ANDERS W. ANDREN	WISCONSIN	40,400	0	39,522
M/SGA-3 (10144) Title: SHIP TIME IN SUPPORT OF SEA GRANT RESEARCH PROJECTS	ANDERS W. ANDREN	WISCONSIN	0	0	53,610
Number of Projects: 30			Subtotal:	1,602,429	0 672,762

SEA GRANT 1996 - PROJECT LISTING BY CATEGORY

4-105

Project Number	PI	Program	Sea Grant	Pass Thru	Matching
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Project Category: 190 - OTHER

A/S-3	JAMES SULLIVAN	CALIFORNIA	11,413	0	2,000
(10470) Title: INTERNATIONAL TECHNOLOGY AND INFORMATION TRANSFER PROGRAM					

R/ME-16	KUO-CHUIN WONG	DELAWARE	12,374	0	41,149
(10207) Title: THE TRANSVERSE VARIABILITY IN A COASTAL PLAIN ESTUARY					

R/OM-25	GEORGE ANDERMANN	HAWAII	31,878	0	35,641
(10614) Title: CONVERSION OF FERROMANGANESE CRUST MATERIALS INTO USEFUL ELECTRICAL PRODUCTS					

R/ES-1	JUNKU YUH	HAWAII	35,322	0	38,691
(10620) Title: DEVELOPMENT OF A VISION-BASED REMOTELY OPERATED VEHICLE					

Number of Projects:	4	Subtotal:	90,987	0	117,481
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Total number of projects:	753	Grand Total:	51,276,641	8,226,112	29,989,459

Note 1 - √ : Project for program development. Not included in the subtotal/total.

Note 2 - Some identical projects are listed twice due to different funding source and amount.

**Section Five:
Funding Distribution by
NOAA Strategic Plan**

DISTRIBUTION OF SEA GRANT PROGRAM FUNDING BY NOAA STRATEGIC PLAN GOAL

	<i>BUILD SUSTAINABLE FISHERIES (BSF)</i>		<i>SUSTAIN HEALTHY COASTS (SHC)</i>		<i>NOT ALLOCATED - MANAGEMENT, OUTREACH, OTHER</i>		5-1	
	<i>FEDERAL</i>	<i>MATCHING</i>	<i>FEDERAL</i>	<i>MATCHING</i>	<i>FEDERAL</i>	<i>MATCHING</i>	<i>%BSF</i>	<i>%SHC</i>
ALASKA	\$424,088	\$64,507	\$117,755	\$45,414	\$685,637	\$981,619	78	22
CALIFORNIA	\$607,073	\$458,235	\$3,924,257	\$1,843,873	\$890,816	\$431,736	13	87
CONNECTICUT	\$276,292	\$136,516	\$288,928	\$156,476	\$277,917	\$143,075	49	51
DELAWARE	\$172,732	\$111,226	\$1,248,834	\$802,486	\$530,102	\$611,365	12	88
FLORIDA	\$265,392	\$143,785	\$991,808	\$572,860	\$817,960	\$406,906	21	79
GEORGIA	\$196,659	\$146,573	\$331,974	\$221,467	\$260,508	\$87,500	37	63
HAWAII	\$103,388	\$113,919	\$611,088	\$524,128	\$623,443	\$304,424	14	86
ILLINOIS/INDIANA	\$154,113	\$92,762	\$406,435	\$262,129	\$224,000	\$129,030	27	73
INDEPENDENT/OTHER	\$75,000	\$37,500	\$157,738	\$99,436	\$1,089,672	\$0	32	68
LOUISIANA	\$479,786	\$181,599	\$700,095	\$346,805	\$339,308	\$623,916	41	59
MAINE/NEW HAMPSHIRE	\$1,542,583	\$754,073	\$297,223	\$144,450	\$855,280	\$513,986	84	16
MARYLAND	\$928,543	\$526,296	\$765,882	\$500,024	\$545,130	\$638,318	55	45
MICHIGAN	\$148,205	\$73,202	\$386,103	\$169,264	\$394,844	\$288,275	28	72
MINNESOTA	\$79,849	\$63,809	\$1,642,611	\$483,636	\$330,725	\$269,661	5	95
MISSISSIPPI/ALABAMA	\$169,892	\$128,799	\$632,504	\$525,766	\$510,100	\$324,679	21	79
MIT	\$267,482	\$220,933	\$1,329,637	\$1,045,258	\$379,365	\$211,885	17	83
NEW JERSEY	\$368,264	\$271,809	\$340,198	\$238,015	\$226,651	\$147,344	52	48
NEW YORK	\$462,140	\$343,124	\$1,028,269	\$689,914	\$1,033,869	\$420,009	31	69
NORTH CAROLINA	\$257,856	\$194,471	\$472,859	\$211,469	\$818,221	\$478,537	35	65
OHIO	\$162,919	\$116,194	\$616,217	\$436,308	\$209,674	\$159,679	21	79
OREGON	\$905,977	\$424,341	\$1,021,548	\$377,612	\$722,985	\$661,317	47	53
PUERTO RICO	\$189,170	\$149,140	\$68,997	\$51,594	\$207,955	\$417,809	73	27

	<i>BUILD SUSTAINABLE FISHERIES (BSF)</i>		<i>SUSTAIN HEALTHY COASTS (SHC)</i>		<i>NOT ALLOCATED - MANAGEMENT, OUTREACH, OTHER</i>		%BSF	%SHC
	<i>FEDERAL</i>	<i>MATCHING</i>	<i>FEDERAL</i>	<i>MATCHING</i>	<i>FEDERAL</i>	<i>MATCHING</i>		
RHODE ISLAND	\$811,567	\$403,953	\$822,415	\$477,744	\$781,996	\$362,292	50	50
SOUTH CAROLINA	\$403,440	\$256,959	\$476,185	\$583,894	\$355,051	\$152,238	46	54
TEXAS	\$466,656	\$231,001	\$655,483	\$322,017	\$424,144	\$263,097	42	58
UNIV. OF SOUTHERN CAROLINA	\$0	\$0	\$204,083	\$180,940	\$153,917	\$80,688	0	100
VIRGINIA	\$599,581	\$358,612	\$296,596	\$139,635	\$837,314	\$369,136	67	33
WASHINGTON	\$438,451	\$262,905	\$786,300	\$373,636	\$1,255,300	\$679,979	36	64
WISCONSIN	\$430,640	\$245,525	\$2,035,792	\$525,161	\$317,142	\$449,314	17	83
WOODS HOLE	\$128,161	\$65,674	\$824,758	\$359,128	\$179,146	\$93,664	13	87
TOTAL	\$11,515,899	\$6,577,442	\$23,482,570	\$12,710,539	\$16,278,172	\$10,701,478	32.90%	67.10%

NOTE: The NOAA goal of Build Sustainable Fisheries includes these Sea Grant Strategic Plan categories: Seafood Production (31-54) and Fishing Industries (61). The NOAA goal of Sustain Healthy Coasts includes these Sea Grant Strategic Plan Categories: Advanced Technology for Commercial Products and Processes (11-23), Coastal Economic Development (62-84), Coastal Ecosystem Health (91-115), Public Safety (121-134), and Education (141-143). The remaining categories -- Marine Advisory Service (151-152), Communications (161, 162), Program Management (170-180), and Other (190) contribute to both NOAA goals and were not allocated further.

[illegible]