

APPENDIX A: CATCHES FOR ENTIRE STUDY PERIOD

Total number of fishes caught in Suisun Marsh by otter trawl, beach seine, midwater trawl, and all methods from 1979 to 2017 (native species in bold).

Common Name	Scientific Name	Otter Trawl	Beach Seine	Midwater Trawl	Total
American shad	<i>Alosa sapidissima</i>	1938	439		2377
bay pipefish	<i>Sygnathus leptorhynchus</i>	2			2
bigscale logperch	<i>Percina macrolepida</i>	19	5		24
black bullhead	<i>Ameiurus melas</i>	882	3		885
black crappie	<i>Pomoxis nigromaculatus</i>	2172	162	1	2335
bluegill	<i>Lepomis macrochirus</i>	20	20		40
brown bullhead	<i>Ameiurus nebulosus</i>	29			29
California halibut	<i>Paralichthys californicus</i>	9	3		12
channel catfish	<i>Ictalurus punctatus</i>	182	7		189
Chinook salmon	<i>Oncorhynchus tshawytscha</i>	76	415	1	492
common carp	<i>Cyprinus carpio</i>	5427	532	1	5960
delta smelt	<i>Hypomesus transpacificus</i>	664	144	4	812
fathead minnow	<i>Pimephales promelas</i>	36	38		74
golden shiner	<i>Notemigonus crysoleucas</i>	9	12		21
goldfish	<i>Carassius auratus</i>	306	49		355
green sturgeon	<i>Acipenser medirostris</i>	3			3
green sunfish	<i>Lepomis cyanellus</i>	5	3		8
hardhead	<i>Mylopharadon conocephalus</i>	1			1
hitch	<i>Lavinia exilicauda</i>	123	16		139
largemouth bass	<i>Micropterus salmoides</i>		3		3
longfin smelt	<i>Spirinchus thaleichthys</i>	11880	53	5	11938
longjaw mudsucker	<i>Gillichthys mirabilis</i>	1			1
Mississippi silverside	<i>Menidia audens</i>	1309	97375		98684
northern anchovy	<i>Engraulis mordax</i>	329		37	366
Pacific herring	<i>Clupea harengus</i>	483	136		619
Pacific lamprey	<i>Lampetra tridentata</i>	48			48
Pacific sanddab	<i>Citharichthys sordidas</i>	3	2		5
plainfin midshipman	<i>Porichthys notatus</i>	20			20
prickly sculpin	<i>Cottus asper</i>	11959	1191	1	13151
rainbow trout	<i>Oncorhynchus mykiss</i>	9	4		13
rainwater killifish	<i>Lucania parva</i>	37	150		187
redeer sunfish	<i>Lepomis microlophus</i>	2	1		3
river lamprey	<i>Lampetra ayresi</i>	3			3
Sacramento blackfish	<i>Orthodon macrolepidotus</i>	26	116		142

Common Name	Scientific Name	Otter Trawl	Beach Seine	Midwater Trawl	Total
Sacramento pikeminnow	<i>Ptychocheilus grandis</i>	177	330		507
Sacramento splittail	<i>Pogonichthys macrolepidotus</i>	34355	5362	14	39731
Sacramento sucker	<i>Catostomus occidentalis</i>	3460	128	5	3593
shimofuri goby	<i>Tridentiger bifasciatus</i>	11148	2732	1	13881
shiner perch	<i>Cymatogaster aggregata</i>	17			17
shokihaze goby	<i>Tridentiger barbatus</i>	1258	5	6	1269
speckled sanddab	<i>Citharichthys stigmaeus</i>	3			3
staghorn sculpin	<i>Leptocottus armatus</i>	2580	3439		6019
starry flounder	<i>Platichthys stellatus</i>	2172	310	4	2486
striped bass	<i>Morone saxatilis</i>	91992	15752	30	107774
striped mullet	<i>Mugil cephalus</i>		1		1
surf smelt	<i>Hypomesus pretiosus</i>	5			5
threadfin shad	<i>Dorosoma petenense</i>	3664	7370	1	11035
threespine stickleback	<i>Gasterosteus aculeatus</i>	18082	6795	6	24883
tule perch	<i>Hysterothorax traski</i>	21828	2545	6	24379
wakasagi	<i>Hypomesus nipponensis</i>	10	10		20
warmouth	<i>Lepomis gulosus</i>	1			1
western mosquitofish	<i>Gambusia affinis</i>	18	362		380
white catfish	<i>Ameiurus catus</i>	6022	167	13	6202
white crappie	<i>Pomoxis annularis</i>	112			112
white croaker	<i>Genyonemus lineatus</i>	3			3
white sturgeon	<i>Acipenser transmontanus</i>	121		2	123
yellowfin goby	<i>Acanthogobius flavimanus</i>	20232	17826		38058
Total		255272	164013	138	419423

APPENDIX B: 2017 CATCHES

Total 2017 otter trawl catch of each fish species in each slough of Suisun Marsh (native species in bold).

Species	Slough													Total
	Boynton	Cut-off	Denve-rton	First Mallard	Good-year	Hill	lower Suisun	Monte-zuma	Montezuma new	Nurse	Peyt-onia	Sheldrake	upper Suisun	
American shad	11	9	10	49	16		15	6	1	64	5	6	11	203
bigscale logperch				1				1				1		3
black crappie			145	1						14				160
channel catfish								6		1				7
Chinook salmon								3						3
common carp	14	2	10	3	16		2	2		4	61	1	4	119
goldfish											1			1
longfin smelt					2		2	1					8	13
Mississippi silverside				23	2							2		27
prickly sculpin	60	49	157	30	322	66	60	24	17	71	52	33	88	1029
rainwater killifish					2									2
Sacramento pikeminnow	3	1	4	2	2			4		3	1			20
Sacramento splittail	87	78	396	240	183	4	60	149	15	314	241	43	119	1929
Sacramento sucker	12	2	1	12	3	1	2			2	11	5	1	52
shimofuri goby	67	38	171	14	9	28	3	8	11	82	42	21	25	519
shokihaze goby	4	1	4		13	10	35	74	23	22	2	3	138	329
staghorn sculpin					1									1
starry flounder	3	4	5	5	2	3	22	16	19	5	4	2	26	116
striped bass	337	256	668	786	148	9	506	147	78	272	264	59	502	4032
threadfin shad	2	1	221	80	7		2	105		128	9		9	564

Species	Slough													Total
	Boynton	Cut-off	Denve-rton	First Mallard	Good-year	Hill	lower Suisun	Monte-zuma	Montezuma new	Nurse	Peyt-onia	Sheldrake	upper Suisun	
threespine stickleback	8	9	4	5	294		9	7	2	4	9		19	370
tule perch	17	25	82	55	2	1	15	7		94	49	5	25	377
white catfish	1	1	26	2		1		79	1	5	8	1	2	127
white croaker							1							1
white sturgeon							2						1	3
yellowfin goby	29	9	21	14	27	8	90	17	17	30	22	6	88	378
Total	655	485	1925	1322	1051	131	826	656	184	1115	781	188	1066	10385

Total 2017 beach seine catch of each fish species in Denverton, Montezuma, and upper Suisun sloughs (native species are in bold).

Species	Slough			Total
	Denverton	Montezuma new	upper Suisun	
American shad	92	30	11	133
bigscale logperch	3			3
black crappie	45	1		46
bluegill		1	1	2
Chinook salmon	7	3		10
common carp	9		2	11
Mississippi silverside	1333	1610	909	3852
prickly sculpin	101	1	80	182
rainwater killifish	3	5	5	13
Sacramento pikeminnow	8	60		68
Sacramento splittail	240	367	147	754
Sacramento sucker		4	5	9
shimofuri goby	65	4	14	83
starry flounder	5	14	11	30
striped bass	278	121	138	537
threadfin shad	532	712	174	1418
threespine stickleback	43	68	50	161
tule perch	77	23	62	162
wakasagi	3	1		4
western mosquitofish	4	3	6	13
white catfish	1			1
yellowfin goby	39	116	221	376
Total	2888	3144	1836	7868

APPENDIX C: 2017 EFFORT

Number of otter trawls in each slough and each month in 2017.

Slough	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Total
Boynton	2	2	2	2	2	2	2	2	2	2	2	2	24
Cutoff	2	2	2	2	2	2	2	2	2	2	2	2	24
Denverton	3	3	3	3	3	3	3	3	3	3	3	3	36
First Mallard	2	2	2	2	2	2	3	2	3	2	2	2	26
Goodyear	3	3	3	3	3	3	3	3	3	3	3	3	36
Hill						1	1	1	1				4
lower Suisun	2	2	2	2	2	2	2	2	2	2	2	2	24
Montezuma	2	2	2	2	2	2	2	2	2	2	2	2	24
Montezuma new	1	1	1	1	1	1	1	1	1	1	1	1	12
Nurse	3	3	3	3	3	3	3	3	3	3	3	3	36
Peytonia	2	2	2	2	2	3	2	3	2	2	2	2	26
Sheldrake						1	1	1	1				4
upper Suisun	3	3	3	3	3	3	3	3	3	3	3	3	36
Total	25	25	25	25	25	28	28	28	28	25	25	25	312

Number of beach seines in each slough and each month in 2017.

Slough	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Total
Denverton	2		3	3	3	2	2	3	3	3	2	2	28
Montezuma new	2		3	3	3	3	3	3	2	2	3	3	30
upper Suisun			3	2	3	2	2	2	3	3	2	2	24
Total	4	0	9	8	9	7	7	8	8	8	7	7	82