

Zone 17

Shore	south
Total Surveys	9
Start Point	Bradley River
End Point	Aurora Lagoon Outlet
Dates Walked	1989, 96, 98-2001,2003-04, 2007
Spring Surveys	1
Fall Surveys	10
First Walked	1989
Last Walked	2014
Total Person-Hours	97
Total Trash Bags Collected	0
Total Estimated Weight of Trash Collected	0

General Info

Date	29-Apr to 6-May-89	??-Sep-96	28-Sep-96	3-Oct-98
Start Time			1200	
End Time			1400	
Lowest Tide				
Temperature (F)	at time		40	40s
Sky		cloudy	partly cloudy	
Vertical Zones Walked:				
	High			
	Middle			x
	Low	x	x	
# of Observers	1	2	2	1
Hours Spent	8	1	2	5
Person-Hours	8	2	4	5
Shoreline Walked (miles)	2		40 feet	10
Total Trip Mileage				
Did Observers . . .				
	Hike?	x	x	
	Kayak?			x
	Other (specify)?		motor boat	Cleared access to beach
Trash Bags Collected				
Estimated Weight of Collected Trash				

Wildlife Birds

Loons				1
Sea Ducks	24	6		20
Other Ducks and Geese	147	1		
Bald Eagles				
	Adults	16	8	3
	Immatures	4		2
	Nests	3	2	
Shorebirds		5056		

Seabirds	220	30	8
Crows and Ravens	40		
Others (see separate Bird list)	304	2	5

Domestic Mammals

Cattle			
Horses			
Dogs			2
Other			

Land Mammals

Moose			
	Adults	6	
	Calves		
Black Bears			
Brown Bears			
Land/River Otters			
Red Squirrels		2	
Tracks Identified			
Other	1		

Marine Mammals

Sea Otters		3	
Harbor Seals	100		2
Steller's Sea Lions			3
Harbor Porpoises		3	
Whales			
	Beluga	40	
	Orca		
	Minke		
	Humpback		
	Gray		
	Unknown		
Other/Unidentified			

Please note any unusual wildlife sightings

Large goose type by ocean: grey, s

Invertebrates

(from the Intertidal Biodiversity Checklist)

Please note any interesting observations or changes in abundance here

Major mud--probably clams anc Water was clouded anc

Sponges

- Breadcrumb Sponge
- Purple Sponge

Cnidarians

Anemones		x	x
Burrowing Green Anemone			
Orange Colonial Anemone			
Frilled (Plumose) Anemone			
Christmas Anemone			

Sea Jellies

Moon Jelly
Many-ribbed Hydromedusa
Compass Jelly
Lion's Mane Jelly

Worms

Giant Flatworm
Nemerteans
Amphiporus (Two-spotted) Ribbon Worm
Red Ribbon Worm
Echiurans
Fat Innkeeper (Alaskan Spoonworm)
Sipunculids
Peanut Worm
Annelids
Mussel Worm (Clam Worm)
Northern Feather Duster Worm (Carpet Worm)
Cone Worm
Calcareous Tube Worm
Spiral Tube Worm
Scaleworm

Brachiopods

Transverse Lampshell

Mollusks

Chitons x
Gumboot Chiton
Black Katy Chiton
Brick Chiton
Mossy Chiton
Tiger Chiton
Lined Chiton
Limpets x x
Dunce Cap Limpet
Plate Limpet
Snails x
Hairy Triton
Sitka Periwinkle
Helicina Margarite
Puppet Margarite
Aleutian Moonshell
Ridged Neptune
Channeled Dogwinkle
Emarginate Dogwinkle
Frisled Dogwinkle
File Dogwinkle
Big-mouth Whelk
Nudibranchs
Maned Nudibranch
False Sea Lemon (False Lemon Peel)
Orange-tipped Nudibranch
Opalescent Nudibranch
Bushy-backed Nudibranch
Clams x x

Nuttal's Cockle		
Northwest Ugly Clam		
Arctic Rock Borer		
Baltic Macoma		
Stained Macoma		
Pacific Surf Clam		
Truncated Mya		
Steamer Clam (Pacific Littleneck Clam)		
Butter Clam		
Razor Clam		
Mussels	X	X
Horse Mussel		
Pacific Blue Mussel		
Scallops		
Pink Scallop		
Jingles		
Rock Jingle		
Cephalopods		
Giant Pacific Octopus		
Stubby Squid		
Arthropods		
Barnacles	X	X
Acorn Barnacle		
Pelagic Gooseneck Barnacle		
Thatched Acorn Barnacle		
Crabs		X
Dungeness Crab		
Black-clawed Cancer Crab		
Red Hermit Crab		
Striped Hermit Crab		
Decorator Crab		
Carapace Crab		
Red King Crab		
Northern Kelp Crab		
Helmet Crab		
Shrimp		
Broken-back Shrimp		
Coonstripe Shrimp		
Sand Shrimp		
Isopods		
Pillbug Isopod		
Rockweek Isopod		
Amphipods		
Skeleton Shrimp		
Small Beach Hopper		
Echinoderms		
Sea Stars	X	X
Little Six-rayed Star		
Red-banded Star (Rainbow Star)		
Ochre Star		
Sunflower Star		
Morning Sun Star		

Stimpson's Sun Star
 Rose Star
 Leather Star
 True Star (False Ochre Star, Mottled Star)
 Blood Star
Brittle Stars
 Serpent Star
 Daisy Brittle Star
Sea Urchins
 Green Sea Urchin
 Red Sea Urchin
Sea Cucumbers
 Silky Burrowing Cucumber
 Orange Cucumber (Red Cucumber)
 Tar-spot Cucumber (Black Cucumber)
Sand Dollars
 Green-spined Sand Dollar (Northern Sand Dollar)

Chordates

Tunicates

Colonial Tunicate (Sea Pork)
 Sea Peach

Seaweeds

Green Seaweed		x		
	Band			
	Attached			
	Washed Up			
Red Seaweed		x		
	Band			
	Attached			
	Washed Up			
Rockweed				x
	Band			
	Attached			
	Washed Up			
Kelps				
	Band			
	Attached			
	Washed Up			
Eelgrass				
	Band			
	Attached			
	Washed Up			

Beach Substrate

Type	mud	rocky, pebl	rocky	rocky, mud
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Bluff and Cliff Erosion

Comments	none	moderate	severe	moderate
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Human Activities

Walking	Signs of Actual observation	1	2
Camping	Signs of Actual observation		1
Partying	Signs of Actual observation		
Fire Pits	Signs of Actual observation		
Trash Accumulations	Signs of Actual observation	1	
Clamming	Signs of Actual observation		
Fishing	Signs of Actual observation	1	
Coaling	Signs of Actual observation		
Picnicking	Signs of Actual observation		
Horseback Riding	Signs of Actual observation		
Harvesting (specify)	Signs of Actual observation		
Other (specify)	Signs of Actual observation		

Vehicle Use

Cars/Trucks	Sets of tracks Actual observation	1	
ATVs/Motorcycles	Sets of tracks Actual observation		
Bicycles	Sets of tracks Actual observation		
Aircraft	Sets of tracks Actual observation		
Other (specify)	Sets of tracks Actual observation		1

Structures on the Beach

Buildings	1	17	4
Docks		3	
Driftwood Structures			
Riprapped Areas			
Erosion Control Structures			
Abandoned Vehicles			
Abandoned Boats			
	Boat Parts		

Archaeological Sites

- Shell Middens
- Other (specify)

Outfalls or Pipes

Number	1
Comments	Bradley Lk camp into small creek then into bay

Toxic Pollution

Fuel (oil, gas, etc.)	Canoe Pass, Bear Cove, sheen on
Lubricating Oil	
Paint	
Batteries	

Trash & Debris

(from International Coastal Cleanup Data Card)

Shoreline and Recreational Activities

Bags (Paper & Plastic)	
Balloons	
Beverage Bottles, plastic, 2-liter or less	
Beverage Bottles, glass	
Beverage Cans	
Caps, Lids	
Clothing, Cloth	
Cups, Plates, Forks, Knives, Spoons	3
Food Wrappers/Containers	
6-pack Holders	
Pull Tabs	
Shotgun Shells/Wadding	
Straws, Stirrers	
Toys	

Ocean/Waterway Activities

Bait Containers/Packaging	
Bleach/Cleaner Bottles	
Buoys/Floats	2
Crab/Lobster/Fish Traps	
Crates	
Fishing Line	
Fishing Lures	
Fishing Nets	

Light Bulbs/Tubes
Oil/Lube Bottles
Pallets
Plastic Sheeting/Tarps
Rope/cable
Strapping Bands

Smoking-Related Activities

Cigarettes/Cigarette Filters
Cigarette Lighters
Cigar Tips
Tobacco Packaging/Wrappers

Dumping Activities

Appliances (refrigerators, washers, etc.)
Batteries
Building Materials
Cars/Car Parts
55-gallon Drums
Tires

Medical/Personal Hygiene

Condoms
Diapers
Syringes
Tampons/Tampon Applicators

Debris Items of Local Concern

Styrofoam pieces
Plastic Pieces
Paper products
Metal Pieces
Other

Entangled Animals

Type of Animal
Form of Entangling Debris
Comments

Most Peculiar Item Collected?

Comments

Glass and metal car Styrofoam Numerous k Visqueen, c

Additional Observations and Comments

Beaches pretty clea All spruce c Beach area The NE sid

28-Sep-99	3-Sep-00	15-Sep-01	22-Sep-01	09.09.03	10.10.04	9.8.07	9.17.14	
	1400			1000			11:00	
				1200			15:00	
		-1.7	-0.8	-1.7		0.01	-0.9	
		736	:20	834		726	12:42	
40s	>50	52	cool	502		60	60	
cloudy	sunny	partly cloud	cloudy	sunny	overcast	sun	sun	
			x		x	x	x	
	x	x	x		x		x	
x		x	x	x	x			
1	1	1	3	1	3	1	12	
1	1	3.5	3.5	2	4		4	
1	1	3.5	10.5	2	12	0	48	0
2	2	3		2	1		2	
		32		2	1		4	
		x			x		x	
skiff	x	x		x				
						boat		
				no trash collec	0	0		
			1	0				
2				0			1	
				0			1	
2	2	2	1		2	1	1	
	2		1		2			
				1	1			
				0				

	19	6	3	0				
1	7			0				
				0				
	1	1	3	0				
				0				
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		3		0				
				0				
2	1	3	1	0	3	1	2	
		1	1	0	3	1	1	
				1				
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				0				
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				0				

ize of Canada goose, c Silver salmon, flounder, sculpin, gunnel.

I debris litter Rich with n Also coloni The tide wa oyster farmer is cleaning nets here, so there is a large inc

x x x x
x x x
x x x

x

x

x

x

x

x

x

x

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x x x x

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		X		
		X		X
		X	X	X
		X		X
		X		X
X				
		X	X	X
				X
				X
X	X			
		X	X	X
		X		X
				X
		X	X	
X		X	X	
X		X		X
			X	



pebbles rocky, mud rocky, pebt rocky, pebt rocky, muddy, pebbles, edrock, mu sand

moderate moderate 2 areas with none

				1	
				1	1
				1	
1	1	1		x	
	1			x	
	2				

boat mooring 2 oysters
oyster farming/ cleaning of nets

x x

x

log skidder

10	4	22	2	9	cabins	x	1
		4	1			x	1

1

water.

no ICC card turned in

6

5

1

3

1

4

7

1

2

73

15

50

16

clay pigeon

High tides ε No trash--in past there No sign of garbage or ρ very clean - no garbag >20 shotgun waddings

Excellent--r Lots of washed-up deb Covered inner south side Bear Cove. (further notes attached to data:

TOTAL

0

0

0

0

0

0

0

0

0

2
53
149

40
9
7
5056

286
40
321

0
0
8
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6
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0
0
0
5
0
1

16
109
4
3

40
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:rease of True Stars in area

6
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16
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, cardboard and clothing

sheet)

0

0