

PMS 301



Pacific
Sea
Grant
Advisory
Program

Inventory

non-technical marine resources publications
and audio-visual materials
PASGAP 5

compiled by
OREGON STATE UNIVERSITY
SEA GRANT MARINE ADVISORY PROGRAM

Inventory

non-technical marine resources publications
and audio-visual materials
PASGAP 5

Vicki Gaffke
Gwil Evans
Editors

foreword

Early in 1970, representatives of the member institutions of the Pacific Sea Grant Advisory Program (PASGAP)* decided people would use a listing of non-technical, ocean-related publications and audio-visual materials available from their institutions, if such a listing were compiled and distributed. Issued early in 1971 even before PASGAP itself had received sanction and support from the national Office of Sea Grant, the first *Inventory* cited 91 publications and 124 films. People did use the first *Inventory* and they told us so. They included teachers, international scholars, government workers, employees of industrial firms, fishermen, and many others.

This second edition of the *Inventory* cites more than double the number of publications that appeared

* The Pacific Sea Grant Advisory Program is an international consortium of seven universities and three regions of the National Marine Fisheries Service whose objective is the dissemination of useful information to people who use the sea. Besides three regions of the National Marine Fisheries Service that serve the Pacific states, members are the University of Alaska, University of British Columbia, University of Washington, Oregon State University, University of California, University of Southern California, and University of Hawaii. The University of Southern California joined PASGAP after materials for this edition of the *Inventory* were already compiled, therefore its materials are not represented here.

in the first edition and nearly twice the number of audio-visual entries. Partially, of course, this reflects the expanded productivity of Sea Grant institutions, but it also is a result of the valuable addition of entries from the National Marine Fisheries Service—not included in the first edition.

Objective. The objective of this publication remains modest: to provide a convenient, practical reference to non-technical materials. In its compilation, contributors sought to be thorough but, despite their efforts, the *Inventory* is not comprehensive. We no doubt have missed some eligible materials.

In general, entries in the *Inventory* have met these criteria:

- Published or produced by, or available from, one of the PASGAP institutions;
- Current and available when the *Inventory* was compiled;
- Intended for audiences that are not strictly scientific, but with broader, more general interests.

Format and use. The *Inventory* has three major sections: the comprehensive Subject Index, section 2, which is alphabetical by subject; the Publications section, section 3, which is alphabetical by title; and the Audio-visual Materials section, section 4, also alphabetical by title.

When you are seeking information about a particular subject, look it up in the Subject Index, where you will find all publications (coded *p*) and audio-visual Materials (coded *av*) on that subject. Then refer to the Publications or Audio-visual Materials sections for detailed information describing the material, source, cost, and so on. Of course, if you know the title, look it up directly in the appropriate section. The back cover offers a quick visual reference for using the *Inventory*.

Sample entries from the Publications section and the Audio-visual Materials section are explained on pages 23 and 43. You will note that every entry follows the same format and that codes are used for audience level and source.

Credit. Much of the credit for this second edition of the *Inventory* goes to those representatives of the PASGAP member institutions who spent many hours gathering materials, analyzing them, and reporting them. At Oregon State University, faculty and staff members—many not associated with marine programs—gave freely of their time and talent to help revise the format and make it more useful.

You, the user, have provided a good deal of help, too. Your comments and suggestions have helped us evaluate the first edition and improved the second. If you have more suggestions, send them to me at the OSU Extension Communication office, Administrative Services Bldg. 422, Corvallis, Oregon 97331.

The difficult, challenging, and often tedious work of integrating the contributions to the *Inventory* fell to Ms. Vicki Gaffke, OSU student and communication assistant in the Extension Service. Her critical thinking, careful planning, and exacting execution have contributed immeasurably to the quality of this edition.

Gwil Evans, Associate Professor
Oregon State University
October 1972

1 contents & instructions

Foreword	2
Instructions	5
Subject Index	6
Publications	22
Audio-visual Materials	42
Mailing Addresses	69
Other Sources	72

If you want information on a subject, but don't know the specific titles:

Look under the appropriate subject or subjects in the Subject Index section, page 6, and find the title or titles of interest. The letter "p" following the title in the Subject Index refers you to the Publication section, page 22; the letters "av" following the title in the Subject Index section refer you to the Audio-visual Materials section, page 42.

When you know the title:

Look up the title in the appropriate section, Audio-visual Materials, page 42, or Publications, page 22, where titles are listed alphabetically followed by a short description. To find where to send for the information or materials, look up the mailing address code (the capital letters at the end of each entry) in the Mailing Addresses section, page 69, where the codes are listed alphabetically with their corresponding meanings.

If you would like more information:

Look through the Other Sources section for bibliographies and reference works.

subject index

Adaption

Adaption to a Marine Environment av

Adaptive Radiation—Mollusks av

Animals That Live in Water av

Marine Animals of the Open Coast: A Story of Adaption
av

Algae

Algae av

Algal Reproduction av

Pressing Algae p

Anatomy

Anatomy of the Dogfish av

Crayfish Anatomy av

Dogfish as a Vertebrate av

Perch Anatomy av

Animals see **Marine Animals**

Anthropology

Man and the Sea p

Man in the Marine Environment p

Aquariums

Carnival of the Sea av

*Constructing and Maintaining a Cooled Salt-Water
Aquarium* p

Home Aquarium and Its Care p

Arctic Regions see **Polar Regions**

Bass

Striped Bass p

Bathythermography

Bathythermography Observations av

Biology see **Marine Biology**

Bottomfishing

Bottomfishing Provides a Pleasant Change for Oregon Anglers p

British Columbia

Limited Entry in the Salmon Fishery: The British Columbia Experience p

Bureau of Commercial Fisheries see **National Marine Fisheries Service**

Buying Guides

Guide for Buying Fresh and Frozen Fish and Shellfish p

Guide for Buying Oregon Fish and Shellfish p

How to Eye and Buy Seafood p

Byproducts

Fishery Resources for Animal Food p

Utilization and Disposal of Crab and Shrimp Wastes p

California

California Fresh and Frozen Fishery Trade p

Deep Water Fishes of California p

Marine Mammals of California p

Marine Food and Game Fishes of California p

California, Northern

Introduction to Seashore Life of the San Francisco Bay Region and the Coast of Northern California p

Introduction to the Natural History of the San Francisco Bay Region p

Mammals of the San Francisco Bay Region p

California, Southern

Mammals of Southern California p

Seashore Life of Southern California p

Seashore Plants of Southern California p

Canning see also **Seafood Preservation**

Canning Tuna and Salmon at Home p

Home Canning of Fishery Products p

To Can Fish in Glass Jars p

To Can Fish in Tin Cans p

Cod

Cod and Perch Filleting av

Development of Pot Systems for Harvesting Blackcod: Progress Report p

Continental Drift

Continents Adrift av

Continental Shelf

Continental Shelf Sediment Off Oregon p

Cookery see also **Recipes**

- Basic Fish Cookery* p
- Catching, Cleaning, and Cooking Bay Crabs* p
- Fish Cookery With Savoir* av
- Outdoor Cookery for the Family* p
- Outdoor Fish Cookery* p
- Outdoor Fish Cookery* av
- Preparing Game Fish for the Pan* p

Coral see also **Reefs**

- Carnival Under the Sea* av
- Coral Wonderland* av
- Coral Jungle* av
- Economics and Market Potential of the Precious Coral Industry in Hawaii* p
- Life on the Coral Reef* av
- Literature Review of the Effects of Sand Removal on a Coral Reef Community* p
- Reef at Michaelmas Cay* av
- Status of the Precious Coral Industry in Japan, Taiwan, and Okinawa* p
- Stinging-Celled Animals: Coelenterates* av
- Structure and Distribution of Coral Reefs* p

Cousteau

- Undersea World of Jacques Cousteau* av
- World of Jacques Yves Cousteau* av

Crabs

- Catching, Cleaning, and Cooking Bay Crabs* p
- Economics of the Dungeness Crab Industry* p

Crayfish

- Crayfish* av
- Crayfish Anatomy* av

Currents see **Ocean Currents**

Cuttlefish

- Colorful cuttle* av
- Cephalopods: Cuttlefish, Octopuses, Squids* p

Dogfish

- Anatomy of the Dogfish* av
- Dogfish as a Vertebrate* av

Dolphin

- Capture of a Smile* av

Ecology see also **Pollution**

- Crisis in Oregon Estuaries* p
- End-of-One* av
- Fish Cities—A New School of Design* p
- Fish, Wildlife and Pesticides* av
- Literature Review of the Effects of Sand Removal on a Coral Reef Community* av
- Oregon's Nearshore Ocean* p
- Pollution in Paradise* av
- Reef at Michaelmas Cay* av
- Polar Ecology* av
- So You Want to Get Involved* av
- What is Ecology* p

Economics see also **Fishing Business Management**

- Background on Oregon's Marine Industry* p
- Costs and Earnings of Tuna Vessels in Hawaii* p
- Costs and Profitability in the Commercial Fishing Industry: The Insurance Dilemma* p

Economics (cont.)

Economics and Market Potential of the Precious Coral Industry in Hawaii p

Economics of Fisheries Management: A Symposium p

Economics of the Surplus Hatchery Salmon Disposal in Oregon p

Fishermen as Borrower p

Fishing Business Management and Economic Information p

Eels

Electric Eel av

Embryology

Sea Urchin Embryology in the Classroom p

Egg into Animal av

Embryonic Development of a Fish av

Emergency Services

Commercial Fishermen's Directory of Emergency Services p

Erosion

Earth: Coastlines av

Marine Erosion Processes av

Estuaries see also **Seashore**

Crisis in Oregon Estuaries p

Estuarine Heritage av

Our Estuarine Heritage av

Filleting Fish

Cod and Perch Filleting av

How to Fillet Fish av

Fish see also **Fishes**

Biography of a Fish av

Embryonic Development of A Fish av

Fish and Their Characteristics av

Fish are Interesting av

Fish: Master of Movement av

Structure and Senses of Fishes p

What is a Fish? av

Fish Baits

Fish Baits: Their Collection, Care, Preparation and Propagation p

Fish Holds

Care of Fish Holds p

Cleaning and Sanitizing Fish Holds p

Plastic Liners for Fish Holds p

Plastics as a Fish-Hold Lining Material p

Fish Spoilage see also **Sanitation; Seafood Handling**

Coming: The Wholesale Fish Act p

Epidemiology of Salmonellosis in Man and Animals av

Why Fish Spoil p

Fisheries see also **Marine Industries; Marine Resources; World Fisheries**

California Fresh and Frozen Fishery Trade p

Commercial Fisheries of the Pacific Coast p

Fisherman's Boy av

Fisheries of the Great Slave av

Fishing Partners av

Med Skovelkutter (Fishing from Small Trawlers) av

Fisheries (cont.)

Men of Gloucester av

Pacific Coast Tuna Fleet p

Story of Menhaden av

Study of Demersal Fishes and Fisheries of the North-eastern Pacific Ocean p

Fisheries Management see also **Economics**

Economics of Fisheries Management: A Symposium p

Limited Entry in the Salmon Fishery: The British Columbia Experience p

Fisheries, World see **World Fisheries****Fishermen**

Commercial Fishermen and Adult Education p

Fisherman's Boy av

How a Fishing People Live av

New England Fishermen av

Outboard Fishermen U.S.A. av

Pearlers av

Some Characteristics of Oregon Fishermen p

Three Fishermen av

Fishes see also **Fish**

Deep-Water Fishes of California p

Field Guide to Common Marine and Bay Fishes of Oregon p

Marine Food and Game Fishes of California p

Study of Demersal Fishes and Fisheries of the North-eastern Pacific Ocean p

Fishing

Bottomfishing Provides a Pleasant Change for Oregon Anglers p

Sports Fishing p

Tuna Fishing av

Tuna Fishing av

Fishing Business Management

Fisherman as Borrower p

Fishing Business Management and Economic Information p

Incorporating a Fishing Business p

Organizing and Operating a Fishery Cooperative, Part I p

Organizing and Operating a Fishery Cooperative, Part II p

Fishing Fleets

Catalogue of the Soviet Fishing Fleet p

Pacific Coast Tuna Fleet p

Fishing Gear see also **Nets**

Basic Net Mending av

Development of a Pot System for Harvesting Blackcod: Progress Report p

Fish and the Seine Net av

How to Make and Mend Fish Nets p

Hydraulic Fishing Machinery Systems for Outboard-Motor-Powered Boats p

Method for Tapering Purse Seines p

Midwater Trawling Equipment and Fishing Technique for Capturing Hake Off the Coast of Washington and Oregon p

Whaling Equipment of the Makah Indians p

Fishing Methods see also **Nets**

Danish Seining av

Effective Combination Trawl for West Coast Draggers:
Atlantic and Western Trawls p

Granton Trawler av

Halibut: Treasure of the Deep av

Long Line (Set-Line) Crab Pot System p

Midwater Trawling Equipment and Fishing Technique
for Capturing Hake Off the Coast of Washington and
Oregon p

Otter Trawling av

Pacific Halibut Fishing av

Pearlers av

Porpoise and the Tuna p

Using Porpoise to Catch Tuna p

Freezing Fish see also **Seafood Preservation**

Freezing of Fish to Maintain Quality p

Home Freezing of Seafood p

Refrigerated Locker Storage of Fish and Shellfish p

Sport Fishermen's Guide to Holding and Freezing
Fish p

To Freeze Fish p

Food Chains

Life Cycle av

Marine Food Chains p

Food Technology

FPC (Fish Protein Concentrate) p

Sea Grant Food Science and Technology: Summary
of the First Meeting, May 24, 1970 p

Galapagos Islands

Aquatic Locomotion av

Geology see also **Ocean Floor**

Continental Shelf Sediment Off Oregon p

Continents Adrift av

Earth: Coastlines av

History, Layer by Layer av

Landslides of Oregon: North Coast p

Great Barrier Reef

Coral Wonderland av

Great Barrier Reef av

Grunion

Fish, Moon and Tides: The Grunion Story av

Fish Out of Water av

Halibut

Halibut: Treasure of the Deep av

Pacific Halibut Fishing av

Recommendations for Handling and Icing Fresh Pa-
cific Halibut Aboard Vessels p

Hatcheries

Economics of the Surplus Hatchery Salmon Disposal in
Oregon p

Hawaii, University of

Marine Curricula at the University of Hawaii p

University of Hawaii av

Hydra

Hydra av

Stinging-Celled Animals: Coelenterates av

Ice see Refrigeration

Insurance

Costs and Profitability in the Commercial Fishing Industry: The Insurance Dilemma p

Jellyfish

Stinging-Celled Animals: Coelenterates av

Law

Coming: The Wholesome Fish Act p

Don't Bring 'Em Back Dead or Alive p

Fishermen's Case av

1970 Seacoast Management Bill: Background and Analysis p

Life Cycles

Egg Into Animal av

Lobsters

Lobsters Unlimited av

Spiny Lobsters p

Mammals

America's Rare Sea Mammals p

Mammals of Southern California p

Mammals of the San Francisco Bay Region p

Marine Mammals of California p

Marine Animals see also Mammals; Marine Biology; Seashore Life; and names of specific animals, e.g., Bass; Crabs; Crayfish; etc.

Animal Life at Low Tide av

Animals that Live in Water av

Beach and Sea Animals av

Carnival of the Sea av

Carnival Under the Sea av

Coco Explores a Pier av

Coco Explores a Tide Pool av

Coco At the Seashore av

Life in the Sea av

Marine Animals and Their Foods av

Marine Animals of the Open Coast: A Story of Adaption av

Marine Life av

Mysteries of the Deep av

On the Rocks av

Secrets of the Underwater World av

Sea Adventures of Sandy the Snail av

Seashore Life av

Seashore Oddities av

Undersea World of Jacques Cousteau av

We Explore Ocean Life av

World of Jacques Yves Cousteau av

World of Little Things av

Marine Biology see also Adaption; Natural History

Aquatic Locomotion av

Biology of Estuarine Animals p

Blood Circulation in Marine Animals av

Breath of Life av

Marine Biologist av

Marine Biology: An Introduction to Its Problems and Results p

Reproduction in the Sea Urchin av

Secondary School Instruction in Biological Oceanography p

Marine Biology (cont.)

Strange Partners: Symbiosis in the Sea av

Survival Factor: Defense Mechanisms in the Sea av

To Catch a Meal: Feeding in the Sea av

Marine Iguana

Marine Iguana: Variations on a Theme av

Marine Industries

Background on Oregon's Marine Industry p

Sponge-Treasure From the Sea av

Marine Resources see also **Fisheries; Marine Industries**

Fisheries Resources of the North Pacific Ocean: Part I and II p

Potential of Offshore Sand as an Exploitable Resource in Hawaii p

Marketing

Retailing Fish av

Meteorology see **Weather**

Mollusks

Adaptive Radiation—Mollusks av

Mollusca, Reel I av

Mollusks: Snails, Mussels, Oysters, Octopuses, and Their Relatives av

Sea Shell Animals av

Mullet

Mullet Country av

Natural History

Earth Beneath the Sea av

Introduction to the Natural History of Southern California p

Introduction to the Natural History of the San Francisco Bay Region p

Natural History Along the Washington Coast av

Reptiles and Amphibians of the San Francisco Bay Region p

National Marine Fisheries Service

Guide to the Bureau of Commercial Fisheries Technological Laboratory, Seattle, Washington p

NMFS Fishery Oceanography Center p

Nets see also **Fishing Gear; Fishing Methods**

Basic Net Mending av

Fish and the Seine Net av

How to Make and Mend Fish Nets p

Method for Tapering Purse Seines p

New England

Men of Gloucester av

New England Fisherman av

New England Sea Community av

Nutrition

Seafoods and Health p

Ocean

Conquering the Sea av

Deep Frontier av

Earth: Its Oceans av

Exploring the Ocean av

Oregon's Nearshore Ocean p

Ocean (cont.)

Restless Sea av

Sea av

Sea p

Sea Adventures of Sandy the Snail av

What's Under the Ocean? av

Ocean Currents

Ocean Currents av

Ocean Currents p

Ocean Floor see also **Geology**

Continental Shelf Sediment Off Oregon p

Earth Beneath the Sea av

History, Layer by Layer av

Project Deep Probe av

Project "Mohole" av

Ocean in Literature

Sea: Background for Literature av

Sea Fever av

Sea Fever av

Ocean Tides

Ocean Tides av

Ocean Tides—Bay of Fundy av

Tides of Fundy av

Tides of the Ocean av

Ocean Waves

Ripple Tank Wave Phenomena I: Reflection, Refraction, and Dispersion av

Waves Across the Pacific av

Waves in Fluids av

Waves on Water av

Ocean Zones

Ocean Zones and Boundaries: International Law and Oceans p

Oceanographers

Marine Biologist av

Oceanographers in the Polar Regions av

Riddle of the Seas: Matthais Fontaine Maury: Oceanographer av

Oceanography

Conquering the Sea av

Challenge of the Oceans av

Deep Frontier av

Earth: Its Oceans av

Man Invades the Sea av

Oceanography At Work: Diamonds Under the Sea av

Oceanography—The Study of Oceans av

Restless Sea av

Science of the Sea av

They Share the Sea av

What's Under the Ocean? av

Oceanography, Careers

Career Opportunities in Water Resources p

Careers in Oceanography av

Careers in Oceanography p

Marine Biologist av

So You Want to be a Marine Scientist? p

Today's Youth in Tomorrow's Sea p

Oceanography, Education

- Advanced Education in Water Resources at Oregon State University* p
- Graduate Studies in Water Resources: Oregon State University* p
- Graduate Studies in Water Resources: Universities Council on Water Resources* p
- Marine Curricula at the University of Hawaii* p
- Oceanography at Oregon State University* p
- Preparation for Study in Oceanography* p

Oceanography, Education Aids

- Guidelines for Rocky Intertidal Field Trips* p
- Natural History Along the Washington Coast* av
- Oregon's Rocky Intertidal Life: Selected Transparencies* av
- Pressing Algae* p
- Sandy Beach Exercises* p
- Secondary School Instruction in Biological Oceanography* p

Oceanography, Research

- Bathythermograph Observations* av
- Earth Beneath the Sea* av
- Fishing Partners* av
- North Pacific* av
- Occupying an Oceanographic Station* av
- Vermilion Sea Expedition: Hydrographic Work* av

Octopus see also **Mollusks**

- Cephalopods: Cuttlefish, Octopuses, Squids* p
- Homely Mollusk—Octopus Vulgaris* av

Oregon State University

- Oceanography at Oregon State University* p
- Oregon State University's Marine Science Center Welcomes You* p
- Putting Oregon's Ocean to Work* p
- They Share the Sea* av

Oysters see also **Mollusks**

- Culture, Handling and Processing of Pacific Coast Oysters* p
- Development of Improved Techniques for Shucking Pacific Oysters* p
- Oyster Farming* p
- Oysterman* av

Pacific Coast

- Commercial Fisheries of the Pacific Coast* p
- Natural History Along the Washington Coast* av
- Pacific Coast Tuna Fleet* p
- Study of Demersal Fishes and Fisheries of the Northeastern Pacific Ocean* p

Perch

- Perch and Cod Filleting* av
- Perch Anatomy* av

Plankton

- Phytoplankton, Grass of the Sea* p
- Plankton* p
- Plankton and the Open Sea* av
- Plankton: Pastures of the Ocean* av

Polar Regions

- Arctic Fishermen in World Trade* av
- Fisheries of the Great Slave* av
- Noisy Underwater World of the Weddell Seal* av
- Oceanographers in the Polar Regions* av
- Polar Ecology* av

Pollution see also **Ecology**

- Pollution in Paradise* av
- Pollution Papers* p

Porpoises

- Porpoise and the Tuna* p
- Using Porpoise to Catch Tuna* p
- Your Window in the Sea* av

Puget Sound

- Environmental Management for Puget Sound: Certain Problems of Political Organization and Alternative Approaches* p

Recipes

- Fish for Compliments . . . On a Budget* p
- Fish in Your Kitchen* p
- Fondue Fun With Fish* p
- Heirloom Seafood Recipes to Treasure* p
- Recipes for Canned Fish* p
- Seafood Moods—Alaska, Washington, Oregon* p
- Seafood Slimmers* p
- Shrimp Tips from New Orleans* av
- Stay Slim With Seafood* p
- Top 'O the Mornin' With Fish and Shellfish* p

Recipes, Bulk

- Delicatessen Fish Products* p

Recipes, Outdoor Cooking

- Fish and Shellfish Over the Coals* p

Recipes, Salmon

- How to Cook Salmon* p
- Quick and Easy Ways with Salmon* p
- Quick and Easy Ways with Salmon* p
- Take a Can of Salmon* av
- Take a Can of Salmon* p

Recipes, Tuna

- How to Cook Tuna* p
- Tuna: As You Like It* p

Reefs see also **Coral; Great Barrier Reef**

- Carnival Under the Sea* av
- Coral Jungle* av
- Coral Wonderland* av
- Fish Cities—A New School of Design* p
- Great Barrier Reef* av
- Life on the Coral Reef* av
- Reef at Michaelmas Cay* av
- Structure and Distribution of Coral Reefs* p

Refrigeration

- Improved Methods of Handling Fresh Fish in the United States: Part I Production and Use of Ice. Part II Handling and Chilling Fresh Fish at Sea* p
- Recommendations for Handling and Icing Fresh Pacific Halibut Aboard Vessels* p

Research see **Oceanography, Research**

Safety

Enjoy the Beaches—In Safety p

Overboard with Chest Waders, Hip Boots or Rain Gear p

Underwater Safety: Effects of Pressure on the Human Body av

Salmon see also **Recipes, Salmon**

Economics of the Surplus Hatchery Salmon Disposal in Oregon p

Invader av

North Pacific av

Salmon Catch to Can av

Salmon Story av

Salmon, Bristol Bay

Bristol Bay Story av

Salmon, Pacific

Pacific Salmon p

Salmon's Struggle for Survival av

Stock Concept in Pacific Salmon p

Salmon, Pink

Pink Salmon Story av

Symposium on Pink Salmon p

Salmon, Sockeye

Salmon: Life Cycle of the Sockeye av

Salmon Run av

Sensitive Sockeye av

Sockeye Odyssey av

Salting Fish see also **Seafood Preservation**

To Salt Fish p

Salmonellosis

Epidemiology of Salmonellosis in Man and Animals av

Sand

Beach: A River of Sand av

Literature Review of the Effects of Sand Removal on a Coral Reef Community p

Potential of Offshore Sand as an Exploitable Resource in Hawaii p

Sand Dollars

Echinoderms av

San Francisco Bay Region

Drowning Bay av

Introduction to Seashore Life of the San Francisco Bay Region and the Coast of Northern California p

Introduction to the Natural History of the San Francisco Bay Region p

Reptiles and Amphibians of the San Francisco Bay Region p

Sanitation see also **Fish Spoilage; Seafood Handling**

Care of Fish Holds p

Cleaning and Sanitizing Agents for Seafood Processing Plants p

Cleaning and Sanitizing Fish-Holds p

Fish Plant Sanitation and Cleaning Procedures p

Recommendations for the Sanitary Operation of Plants that Process Fresh and Frozen Fish p

Recommended Practices for Vessel Sanitation and Fish Handling p

Sanitation (cont.)

Sanitation Guidelines for the Breaded-Shrimp Industry p

Sanitation Standards for Smoked Fish Processing: Part I, Fish Smoking Establishments—1967 p

Sardines

Flavor of Maine av

Its the Maine Sardine av

Sardine From Maine, Down East Style av

Sea Grant Program

Pacific Sea Grant Advisory Program p

Putting Oregon's Ocean to Work p

Sea Grant Food Science and Technology: Summary of the First Meeting May 24, 1970 p

They Share the Sea av

Sea Gulls see also **Seabirds**

End-of-One av

Sea Gull av

Sea Horse

Most Exceptional Fish: The Sea Horse av

Sea Horse av

Sea Lion

Dangerous Reef av

Sea Lions and Fur Seals av

Sea Otters

Sea Otters of Amchitka av

Sea Urchins

Echinoderms av

Reproduction in the Sea Urchin av

Sea Urchin av

Sea Urchin Embryology in the Classroom p

Seabirds see also **Seagulls**

Bird Watching in Tillamook County p

Coco and the Seabirds av

Seafood

Delicatessen Fish Products p

Seafood Handling see also **Fish Holds; Fish Spoilage**

Fisherman Returns p

Fresh Out of the Water av

Improved Methods of Handling Fresh Fish in the United States: Part I, Production and Use of Ice. Part II, Handling and Chilling Fresh Fish At Sea p

Plastic Liners for Fish Holds p

Plastics as a Fish-Hold Lining Material p

Recommendations for Handling and Icing Fresh Pacific Halibut Aboard Vessels p

Preparing Game Fish for the Pan p

Recommended Practices for Vessel Sanitation and Fish Handling p

Sport Fishermen's Guide to Holding and Freezing Fish p

Seafood Preservation see also **Canning; Freezing Fish; Salting Fish; Smoking Fish**

Fish Smoking and Drying by the Sportsman p

Home Preservation of Fishery Products p

Mild Curing, Pickling, Dry Salting, and Smoking Salmon p

Refrigerated Locker Storage of Fish and Shellfish p

Seafood Processing

- Catching, Filleting, Packaging* av
- Caviar and Other Fish Roe Products* p
- Development of Improved Techniques for Shucking Pacific Oysters* p
- Machine Separation of Edible Flesh From Fish* p
- Recommendations for the Sanitary Operation of Plants that Process Fresh and Frozen Fish* p
- Sanitation Guidelines for the Breaded-Shrimp Industry* p
- Sanitation Standards for Smoked Fish Processing: Part I, Fish Smoking Establishments—1967* p
- Tuna Packing* av
- Tuna Packing* av

Seals

- Noisy Underwater World of the Weddell Seal* av
- Northern Elephant Seal* av
- Sea Lions and Fur Seals* av
- Seal Island* av

Seashore see also **Seashore Life**

- Beach: A River of Sand* av
- Coco Explores a Pier* av
- Coco at the Seashore* av
- Earth: Coastlines* av
- Sandy Beach Exercises* p
- Seacoast Management Bill: Background and Analysis* p
- Seashore* av
- Soil Salinity Problems in Shoreline Areas of Hawaii* p
- We Explore the Beach* av
- Where Land and Water Meet* av

Seashore Life see also **Mammals; Marine Animals; Marine Biology; Sand; Seaweeds; Tide Pools**

- Between the Tides* av
- Introduction to the Seashore Life of the San Francisco Bay Region and the Coast of Northern California* p
- Oregon's Rocky Intertidal Life: Selected Transparencies* av
- Seashore Life* av
- Seashore Life of Southern California* p
- Seashore Oddities* av
- Seashore Plants of Northern California* p
- Seashore Plants of Southern California* p
- Seaweeds are Not Weeds* p
- Seaweeds at Ebb Tide* p
- Tide Pool Life* av
- We Explore the Beach* av
- Where Land and Water Meet* av

Seaweed

- In a Pickle?* p
- Seaweeds are Not Weeds* p
- Seaweeds at Ebb Tide* p

Sediments

- Continental Shelf Sediment Off Oregon* p

Sharks

- Attack Patterns of Sharks* av

Shells

- Rare Shells* p
- Sea Shell Animals* av
- Shell Collecting: An Illustrated History* p

Ships and Boats see also **Fishing Fleets**

Fisherman's Boy av

Freighter At Sea av

Freighter in Port av

Queen of the Sea: Planning and Building of the Clipper Ships av

Transportation: A Ship Comes Home av

Treasure Under the Sea av

Shrimp

Pacific Coast Shrimp Recipes p

Shrimp Please av

Shrimp Tips From New Orleans av

Skate

Egg Into Animal av

Skindiving

Anyone for Diving? av

Effect of Immersion at Different Water Temperatures on Graded Exercise Performance in Man p

Underwater Safety: Effects of Pressure on the Human Body av

Smoking Fish see also **Seafood Preservation**

Fish Smoking and Drying by the Sportsman p

Sanitation Standards for Smoked Fish Processing: Part I, Fish Smoking Establishments—1967 p

Snails see **Mollusks**

Sounds

Sounds in the Sea av

Sponges

First Many-Celled Animals: Sponges av

Sponge—Treasure From the Sea av

Squids

Cephalopods: Cuttlefish, Octopuses, Squids p

Starfish

Biology and Methods of Controlling the Starfish, Asterias Forbesi (Desor) p

Echinoderms av

Ornamental Use of Starfishes p

Starfish Realm av

Sturgeons

Sturgeons p

Submarines

Flying at the Bottom of the Sea av

Survival

Alive From the Deep av

Mysteries of the Deep av

Tide Pools see also **Seashore Life**

Animal Life at Low Tide av

Coco Explores a Tide Pool av

Oregon's Rocky Intertidal Life: Select Transparencies av

Tide Pool Life av

Tides see **Ocean Tides**

Trawling

- Effective Combination Trawl for West Coast Draggers: Atlantic and Western Trawls* p
- Med Skovellutter (Fishing From Small Trawlers)* av
- Midwater Trawling Equipment and Fishing Technique for Capturing Hake Off the Coast of Washington and Oregon* p

Trout

- Life Cycle of the Trout* av

Tuna see also **Recipes, Tuna**

- Ocean Fresh: The Story of Tuna Packing in Hawaii* av
- Porpoise and the Tuna* p
- Tuna Fishing* av
- Tuna Fishing* av
- Tuna Packing* av
- Tuna Packing* av
- Using Porpoise to Catch Tuna* p

University of Hawaii see **Hawaii, University of**

Washington see also **Puget Sound**

- Natural History Along the Washington Coast* av

Waste

- Utilization and Disposal of Crab and Shrimp Wastes* p

Water

- Hydrology* p
- Water's Edge* av

Water Resources

- Water Resources Management and Public Policy* p

Waves see **Ocean Waves**

Weather

- Sea - Surface Meteorology* av

Whales and Whaling

- Whales and Whalersmen* av
- Whaling* av
- Whaling Equipment of the Makah Indians* p

World Fisheries see also **Fisheries**

- Arctic Fishermen in World Trade* av
- Catalogue of the Soviet Fishing Fleet* p
- Danish Seining* av
- Granton Trawler* av
- Japan Harvests the Sea* av
- Med Skovellutter (Fishing From Small Trawlers)* av
- Ocean Bounty* av

Zonation

- Zonation on a Marine Rock Platform* av

3 publications

This section of the *Inventory* lists and describes publications. In it, each publication is listed **alphabetically, by title.**

Information, is in the **same order** for each publication:

- title
- author (or corporate author)
- designation of the publication by its publisher
- publication date
- description
- difficulty level code
- mailing address (coded) indicating the source
- special comments, if necessary
- price

You may wish to refer to the sample entry below. With only two types of exceptions, **all information follows the standard format.** In some cases, information is omitted because it was not provided by the source of the publication. The other exception occurs when two or more sources offer the same publication. Then the entry reflects the varying data immediately after the mailing address code of the source to which it applies.

Difficulty level codes are explained below. Mailing address codes are explained in section 5, page 69.

Multiple mailing address codes mean availability from more than one source.

Prices indicated are for single copies only. For information about quantity sales, write to the source indicated by the mailing address code.

Publications listed below were in stock at the time the *Inventory* was compiled. Keep in mind, however, publications may go out of print.

Sample entry, PUBLICATIONS

title	author or corporate author	designation	publishing date
<i>Mild Curing, Pickling, Dry Salting, and Smoking Salmon</i>	Norman D. Jarvis.	Fishery Leaflet 60.	June 1944.
Booklet, 10 x 8. Highly detailed recipes for processing these types of fish and their subsequent storage and usage.			
NMFS LJ supply limited, free.			
	mailing address	price	s. difficulty level code
description special comment or designation number			

Difficulty level code explanation, PUBLICATIONS

j—juvenile

g—general

s—semi-technical adult

SPECIAL INFORMATION

Oregon State University publications: Single copies of Agricultural Experiment Station and Extension Service publications are free to Oregon residents and to research workers. Non-residents should obtain information about prices by writing to the source indicated by the mailing address code.

University of Washington publications: Purchases by Washington residents are subject to sales tax laws of that state.

Advanced Education in Water Resources at Oregon State University

Water Resources Education Committee, Water Resources Research Institute.

9-page booklet, 8½x11.

g.

OSU WRRRI free.

America's Rare Sea Mammals

U.S. Dept. of the Interior. Conservation Note 9. Reprint, 1969.

8½x11 fact sheet. Drawings.

g.

NMFS TI supply limited, free.

Background on Oregon's Marine Industry

Robert O. Coppedge and Frederick J. Smith. EC 750. August 1970.

Booklet, 4x8½. Economics of Oregon's marine resources, ocean commerce and the recreational importance of Oregon's coastal areas. Drawings. g.
OSU BC free.

Basic Fish Cookery

Rose G. Kerr. Test Kitchen Series No. 2. Reprint, 1964. Booklet 8x10. Photos. Nutritive value of fish, how to purchase, clean and dress fish, and basic fish recipes. g.

NMFS TI supply limited, free. NMFS PFPC supply limited, free.

Biology and Methods of Controlling the Starfish, *Asterias forbesi* (Desor)

Victor L. Loosanoff. Fishery Leaflet 520. July 1961.

Booklet 8x10. Photos. Damage done to the oyster industry and control. g.

NMFS LJ supply limited, free.

Biology of Estuarine Animals

J. Green. 1968.

Book, 411 pages, more than 100 drawings. s.

UW UWP \$9.50

Bird Watching in Tillamook County

Alex Walker, Curator, Tillamook County Museum.

Leaflet of 3 pages 8½x11. Areas frequented by bird-watchers and permanent resident species, winter residents, summer residents, and migrants. g.

OSU MSC free.

Bottomfishing Provides a Pleasant Change for Oregon Anglers

Paul Heikkila. Sea Grant 14. 1972.

Fact sheet. Methods and species. Diagrams of the gear and technique and some species of fish. g.

OSU BC in press, free.

California Fresh and Frozen Fishery Trade

A. D. O'Rourke and D. B. DeLoach. California Agricultural Experiment Station. Bulletin 850. 1971.

80-page booklet, 6x9. Structure of the industry. g.

UC DAS free.

Canning Tuna and Salmon at Home

Food and nutrition specialists, Oregon State University. FS 21. Feb. 1971.

8x11 fact sheet. g

OSU BC free.

Care of Fish Holds

Wayne I. Tretsven. Reprint 69, Fishery Industrial Research, vol. 4, no. 6, BCF. Feb. 1969.

7-page leaflet. Photos. Procedures to sterilize and eliminate deterioration. For the vessel owner. s.

NMFS PFPC supply limited, free.

Career Opportunities in Water Resources

Universities Council on Water Resources.

Booklet 6x8. Hydrologic cycle. Special demands on the individual. Photos. g.

OSU WRRI free.

Careers in Oceanography

Victor T. Neal. June 1972.

Employment outlook, working conditions, preparation for careers. g.

OSU SO free.

Catalogue of the Soviet Fishing Fleet

Charles R. Hitz. Reprint from *National Fisherman*, Yearbook issue, 1968, Vol. 48, no. 13, March 31, 1968.

Profiles and statistics of Russian fishing vessels. g.

NMFS NFC supply limited, free.

Catching, Cleaning and Cooking Bay Crabs

Jay Long. EC 744. Reprint, Feb. 1970.

10-page leaflet, 8½x11. Photos and drawings. g.

OSU BC free.

Caviar and Other Fish Roe Products

Norman D. Jarvis. Fishery Leaflet 567. May 1964.

Booklet, 6x9. Preparation, curing, and processing. g.

NMFS LJ supply limited, free. NMFS PFPC supply limited, free.

Cephalopods: Cuttlefish, Octopuses, Squids

Lola T. Dees. Fishery Leaflet 524. Reprint, 1969.

Booklet, 10x8. Photos. Life history, species, enemies, capture, and man's uses of cephalopods. g.

NMFS LJ supply limited, free.

Cleaning and Sanitizing Agents for Seafood Processing Plants

Jong Lee. Sea Grant 21. 1972.

Bulletin. Tables. Strengths and weaknesses of types of cleaners. For the seafood processor. Glossary. s.

OSU BC in press, free.

Cleaning and Sanitizing Fish-Holds

Kirby Hayes, William Schumacher, and Curtis Wilder.

Hawaii Fish 'n Facts Information Sheet 165. 1972.

UH SG.

Coming: The Wholesome Fish Act

Kirby Hayes, William Schumacher, and Curtis Wilder.

Hawaii Fish 'n Facts Information Sheet 167. 1972.

UH SG.

Commercial Fisheries of the Pacific Coast

U.S. Dept. of the Interior. Conservation Note 15. Reprint, 1969.

Fact Sheet, 8½x11. Drawings of the fishes, and methods and boats used to catch them. g.

NMFS TI supply limited, free.

Commercial Fishermen and Adult Education

Graham A. Drew. Oct. 1970.

8x11 leaflet. Socio-economic study of British Columbian fishermen. Correlations with their interest in selected subjects. s.

UBC CCE supply limited, free.

Commercial Fishermen's Directory of Emergency Services

Eugene A. (Buzz) Johnson. PASGAP I. March 1971.

Pocket size, 86 pages. Lists refrigeration, fueling, food and medical services, marine radio operators, etc., for the coast from Alaska to Northern California. s.

PASGAP free.

Continental Shelf Sediment Off Oregon

John Byrne and Dan Panshin. Sea Grant 8. 1972.
Bulletin. Map and photos. Types and locations of sediment. g.
OSU BC in press, free.

Costs and Earnings of Tuna Vessels in Hawaii

Abu Ekram Ahsan, John Ball, Jr., and Jack Davidson.
UNIHI-SEA GRANT-AR-72-01 1972.
UH SG in press.

Costs and Profitability in the Commercial Fishing Industry: The Insurance Dilemma

Michael L. Redfield. Sea Grant Publ. WSG-MP 71-4. 1971.
8x11, 59-page booklet. Bibliography. s.
UW DMR free.

Constructing and Maintaining a Cooled Salt-Water Aquarium

Lyndal A. Brixius, curator, OSU Marine Science Center Aquarium and Museum.
11-page leaflet. Diagrams. Reading list. s.
OSU MSC free.

Crisis in Oregon Estuaries

William Q. Wick, ed. Sea Grant 4. May 1970.
Booklet, 6x8. Environmental factors; photos show landfills in estuaries. g.
OSU BC free.

Culture, Handling and Processing of Pacific Coast Oysters

Lynn G. McKee and Richard W. Nelson. Fishery Leaflet 498, BCF. 1960.
Illustrated 21-page leaflet. Bibliography. s.
NMFS PFPC supply limited, free.

Deep-Water Fishes of California

John E. Fitch. Publication 00421-3, California Natural History Guide 25. 1968.
Paperback. Photos, drawings, and charts. g.
UC UCP \$2.25.

Delicatessen Fish Products

Norman D. Jarvis. Fishery Leaflet 553. August 1963.
Booklet, 6x9, has bulk recipes for preparing seafood products to be sold in a delicatessen. For delicatessen owners. s.
NMFS LJ supply limited, free. NMFS PFPC supply limited, free.

Development of a Pot System for Harvesting Black-cod: Progress Report

Alan J. Beardsley and Fred W. Hipkins. Unofficial publication. Dec. 4, 1970.
Experimental trials and gear. s.
NMFS NFC supply limited, free.

Development of Improved Techniques for Shucking Pacific Oysters

John D. Smith. WSG 71-1. 1971.
40-page booklet identifies and assesses feasibility of improved automated methods. A study conducted at Pacific Northwest Laboratory of Battelle Memorial Institute and funded by Pacific Coast Oyster Growers Association and Washington Sea Grant. s.
UW DMR free.

Don't Bring 'em Back Dead or Alive

Extension Marine Advisory Program, OSU. Sea Grant 3. Feb. 71.

8x11 Poster illustrates law against taking marine life from the beach.

OSU BC free.

Economics and Market Potential of the Precious Coral Industry in Hawaii

Kok-Kian Poh. UNIH-SEA GRANT-AR-71-03. 1972.

22 pages.

UH SG.

Economics of Fisheries Management: A Symposium

A. D. Scott, ed. 1970.

Part of the H.R. MacMillan Lectures in Fisheries.

UBC ARE \$5. Cdn. dollars.

Economics of the Surplus Hatchery Salmon Disposal in Oregon

Kenneth J. Roberts. Sea Grant 17. 1972.

Bulletin, 8x11. History, marketing, utilization, and Fish Commission of Oregon and buyer practices. Tables and graphs.

OSU BC free.

Economics of the Dungeness Crab Industry

James G. Youde & John R. Wix. CI 627. Dec. 1967.

Booklet, 6x8. Photos, graphs and tables.

OSU BC free.

Effect of Immersion at Different Water Temperatures on Graded Exercise Performance in Man

E. N. Bernauer, S. K. Hong, T. O. Moore, and Y. S. Park.

Sea Grant 70-3. 1970.

27 pages, 5 figures, 3 tables.

UH SG.

Effective Combination Trawl for West Coast Draggers: Atlantic and Western Trawls

R. Barry Fisher. Station Bulletin. 1972.

For the commercial fisherman. Photos and diagrams.

OSU BC in press.

Enjoy the Beaches—In Safety

Cooperative Extension Service, OSU. EC 721. July 1963.

Pamphlet.

OSU BC free.

Environmental Management for Puget Sound: Certain Problems of Political Organization and Alternative Approaches

Wallace H. Spencer. Sea Grant Publ. WSG-MP-71-2. 1971.

Leaflet, 50 pages. San Francisco Bay case is also discussed.

UW DMR free.

Field Guide to Common Marine and Bay Fishes of Oregon

Alan J. Beardsley and Carl E. Bond. SB 607. May 1970.

Bulletin, 27 pages. Drawings of each fish. Glossary.

OSU BC free.

Fish and Shellfish Over the Coals

Bureau of Commercial Fisheries. Test Kitchen Series 14.

Booklet 5½x8½. Color photos. Buying guide, how to start the fire, and approximate cooking times for some recipes. g.

NMFS PFPC supply limited, free. NMFS TI supply limited, free.

Fish Baits: Their Collection, Care, Preparation, and Propagation

USFWS Fishery Leaflet 28, March, 1950.

A leaflet, 8x10½, on natural baits. Bibliography. s.

NMFS ED supply limited, free.

Fish Cities—A New School of Design

Ann Weeks. Reprint from Vol. 2, No. 2, NOAA. April 1972.

Several-page article on using cast-off junk for fish reefs. g.

NMFS ED supply limited, free.

Fish for Compliments . . . on a Budget

Bureau of Commercial Fisheries. Fishery Market Development Series 9. Oct. 1966.

Booklet. Drawings. Eighteen recipes. g.

NMFS TI supply limited, free. NMFS PFPC supply limited, free.

Fish in Your Kitchen

Texas Parks and Wildlife Department.

Pamphlet. Color drawings, giving recipes using fish fillets. Also includes buying guide. g.

NMFS TI supply limited, free.

Fish Plant Sanitation and Cleaning Procedures

J. Doyle. U of A. Sea Grant Marine Advisory Bulletin. 1970.

Bulletin, 6x9, 10 pages. Basic for plants without quality control professionals.

UA FEMA free.

Fish Smoking and Drying by the Sportsman

Kirby Hayes, William Schumacher, and Curtis Wilder.

Hawaii Fish 'n Facts Information Sheets 168. 1972.

UH SG in press.

Fish, Wildlife and Pesticides

U.S. Dept. of the Interior, Fish and Wildlife Service. 0-796-260. 1966.

Booklet, 9x6. Photos and drawings. g.

NMFS TI supply limited, free.

Fisherman As Borrower

Michael Bird. Sea Grant 20. May 1972.

Bulletin. Sources of financing, a typical loan interview and sample financial statement. An attempt to fill the fisherman-loan organization gap. s.

OSU BC free.

Fisherman Returns

Cooperative Extension Service Publication 27. Reprint, 1971.

Leaflet, 13 pages. Fish handling and preparation for home use. g.

UA CES free.

Fishery Resources for Animal Food

Walter G. Jones. Fishery Leaflet 501. Reprint, 1969.
Booklet. Photos, maps, and charts. Reprints of a series
of articles from "Petfood Industry" and "National Fur
News."

g.

NMFS LJ supply limited, free.

***Fisheries Resources of the North Pacific Ocean:
Part I & Part II***

Hiroshi Kasahara. Part I, 1961; Part II, 1964.

Part of the H. R. MacMillan Lectures in Fisheries.

s.

UBC ARE Parts I & II, each \$1. Cdn. dollar.

***Fishing Business Management and Economic In-
formation***

Frederick J. Smith. Sea Grant 6. Aug. 1970.

Bulletin. Photos. Analyzes some business management
procedures, ways to increase profits, and how to in-
terpret this and other information to benefit the fish-
erman.

s.

OSU BC free.

Fondue Fun With Fish

Texas Parks and Wildlife Department.

Pamphlet. Color drawings. Fondue recipes.

g.

NMFS TI supply limited, free.

FPC (Fish Protein Concentrate)

Fact sheet. Fish protein concentrate.

Recipes for use in cooking and baking.

g.

NMFS PFPC supply limited, free.

Freezing of Fish to Maintain Quality

J. P. Doyle. Univ. Alaska Coop. Ext. Pub. 127. 1971.

Complete primer on large-scale home freezing.

g.

UA CES free.

***Graduate Studies in Water Resources: Oregon State
University***

Water Resources Research Institute. 1970.

Pamphlet.

g.

OSU WRRRI free.

***Graduate Studies in Water Resources: Universities
Council On Water Resources***

Universities Council on Water Resources. 1970.

33-page booklet. Educational opportunities in the
U.S.

s.

OSU WRRRI supply limited, free.

***Guide for Buying Fresh and Frozen Fish and Shell-
fish***

USFWS, BCF Circular 214. 1965.

46 pages. Tables. For those associated with the food
trades. Availability of fishery products, market forms,
purchasing criteria, and handling and storage tech-
niques.

s.

NMFS ED supply limited, free.

Guide for Buying Oregon Fish and Shellfish

Velma Seat, Ext. Food Marketing Specialist. FS 170.
Reprint, Aug. 1970.

Fact Sheet. Species, market forms, season available,
and recommended forms for freezing.

g.

OSU BC free.

Guide to the Bureau of Commercial Fisheries Technological Laboratory, Seattle, Washington

John A. Dassow. Circular 316, USFWS, BCF. 1969.
Goals of the technology program, accomplishments, current programs, organization and staff and physical facilities. Out of date since formation of NOAA. Bibliography on technology subjects. s.
NMFS PFPC supply limited, free.

Guidelines for Rocky Intertidal Field Trips

Marine Science Education Advisory Council
Several sheets offering check questions for group leaders planning an organized trip to the tidepools. Reading list. g.
OSU MSC free.

Heirloom Seafood Recipes to Treasure

Bureau of Commercial Fisheries. Fishery Market Development Series 3. June 1966.
Booklet, illustrated. g.
NMFS TI supply limited, free. NMFS PFPC supply limited, free.

Home Aquarium and Its Care

Carl E. Bond and Charles E. Warren.
Bulletin, 14 pages. g.
OSU FWL free.

Home Canning of Fishery Products

Norman D. Jarvis and Joseph F. Puncochar. Conservation Bulletin 28, USFWS, BCF, 1942. Reprint, 1957.
Equipment, principles and methods. s.
NMFS PFPC supply limited, free.

Home Freezing of Seafood

Kenneth S. Hildebrand. Sea Grant 7. 1970.
Booklet. For the housewife. g.
OSU BC free.

Home Preservation of Fishery Products

Norman D. Jarvis. Fishery Leaflet 18, FWS, BCF. 1945. Reprint, 1964.
Salting, smoking, and other methods. Old, but still applicable. g.
NMFS PFPC supply limited, free. NMFS LJ supply limited, free.

How to Cook Salmon

Rose G. Kerr, Kathryn L. Osterhaug. Test Kitchen Series No. 4. Reprint, 1964.
Booklet. 35 recipes. g.
NMFS TI supply limited, free. NMFS PFPC supply limited, free.

How to Cook Tuna

Rose G. Kerr, Kathryn L. Osterhaug, and Paula J. Wiesters. Test Kitchen Series No. 12. Reprint, 1964.
Booklet, 8x10. Photos. Types of pack available, recipes. g.
NMFS TI supply limited, free. NMFS PFPC supply limited, free.

How to Eye and Buy Seafood

National Marketing Services Office, NMFS. 0-822-058. 1971.
Booklet. Drawings and charts. For restaurant owners and mass feeders. Industrial gradings of fish and general preparation. g.
NMFS TI supply limited, free. NMFS PFPC supply limited, free.

How to Make and Mend Fish Nets

Reprint from *Atlantic Fisherman*, Feb. 1945. Fishery Leaflet 125. August 1969.

Detailed instructions. Drawings.

s.

NMFS LJ supply limited, free.

Hydraulic Fishing Machinery Systems for Outboard-Motor-Powered Boats

Agricultural Experiment Station, OSU. SB 608. March 1971.

40 pages. Uses and system designs. Graphs, photos, and drawings.

s.

OSU BC free.

Hydrology

Universities Council on Water Resources.

Pamphlet. The cycle and applications of the science.

g.

OSU WRRI free.

Improved Methods of Handling Fresh Fish in the United States: Part I Production and Use of Ice. Part II Handling and Chilling Fresh Fish at Sea

Proc. Indo-Pacific Fish. Coun., II (III). 1965.

Part I, J. A. Dassow. Summary paper on technological considerations in the use of ice with fish.

Part II, H. R. Beard and J. A. Dassow. Species limitations, operational factors and clean-up, vessel sanitation.

s.

NMFS PFPC supply limited, free.

In a Pickle?

Marine Advisory Program, Cooperative Extension Service and Marine Science Center, Oregon State University.

2 8x11 sheets. Recipes for pickled shad and seaweed.

g.

OSU MSC free.

Incorporating a Fishing Business

Frederick J. Smith. Sea Grant 11. 1971.

Bulletin. Management, ownership, liability, taxation, finance, fringe benefits.

s.

OSU BC free.

Introduction to Seashore Life of the San Francisco Bay Region and the Coast of Northern California

Joel W. Hedgpeth. 00544-9. California Natural History Guides 9. 1962.

Paperback.

g.

UC UCP \$1.95.

Introduction to the Natural History of Southern California

Edmund C. Jaeger and Arthur C. Smith. 00601-1. California Natural History Guides 13. 1966.

Paperback.

g.

UC UCP \$1.95.

Introduction to the Natural History of the San Francisco Bay Region

Arthur C. Smith. 01185-6. California Natural History Guide I. 1959.

Paperback.

g.

UC UCP \$1.85.

Landslides of Oregon: North Coast

John V. Byrne and William B. North. Sea Grant 5. Dec. 1970.

Landslide and rock types, landslide prevention, landslide problems corrected. Photos and drawings. g. OSU BC free.

Limited Entry in the Salmon Fishery: The British Columbia Experience

Blake A. Campbell. PASGAP 6. May 1972.

Tables. Review of the Salmon vessel license control program. s. PASGAP free.

Literature Review of the Effects of Sand Removal on a Coral Reef Community

James Levin. UNIH-SEA GRANT TR-71-01. 1970.

78 pages. s. UH SG.

Long-Line (Set-Line) Crab Pot System

R. Barry Fisher. CI 630. July 1970. Revised, Jan. 1972.

Diagrams and photos. Rigging, setting, equipping, and operating of the system. s. OSU BC free.

Machine Separation of Edible Flesh from Fish

David Miyauchi and Maynard Steinberg. Reprint from Fishery Industrial Research, vol. 6(4). August 1970.

Description of machine, results of tests with fish, with shrimp, potential impact on fisheries. g. NMFS PFPC supply limited, free.

Mammals of Southern California

Ernest S. Booth. 00152-4. California Natural History Guide 21. 1968.

Paperback. g. UC UCP \$1.75.

Mammals of the San Francisco Bay Region

William D. Berry and Elizabeth Berry. 00116-8, California Natural History Guide 2. 1959.

Paperback. g. UC UCP \$1.75.

Man and the Sea

Courtland L. Smith. Copy of article published in *Portland* magazine, Feb. 4, 1972.

Man's dependence on and change of his marine environment. g. OSU WH free.

Man in the Marine Environment

Wilbur A. Davis, Thomas C. Hogg, and Courtland L. Smith. MARU Report I. September 1971.

Report of the goals, methods, and results of the Marine Anthropology Research Unit at OSU. Cultural systems and the marine environment. Uses of and attitudes toward the marine environment. s. OSU WH free.

Marine Biology: An Introduction to Its Problems and Results

Hermann Friedrich. Translated by H. Gwynne Vevers. 450 pages, illustrated. Focus on ecology of organisms and communities. s.

UW UWP \$9.50.

Marine Curricula at the University of Hawaii

Barbara Tillet. OSIC 6. January 1972.

10 pages.

s.

UH SG.

Marine Food and Game Fishes of California

John E. Fitch and Robert J. Lavenberg. 01831-1 California Natural History Guide 28. 1971.

g.

UC UCP \$2.35.

Marine Food Chains

J. H. Steele, ed. 01397-2. 1970.

Cloth bound.

g-s.

UC UCP \$13.50.

Marine Mammals of California

Robert T. Orr. 02077-4, Natural History Guide 29. 1972. Pocketbook.

g.

UC UCP \$2.25.

Method for Tapering Purse Seines

Jerry E. Jurkovich. USFWS, Sep. No. 802, reprint from *Commercial Fisheries Review*. November 1967.

8x10½. Diagrams and drawings. For the fisherman. s.

NMFS NFC supply limited, free.

Midwater Trawling Equipment and Fishing Technique for Capturing Hake Off the Coast of Washington and Oregon

William L. High and Leonard J. Johnson. Circular 332, USFWS, BCF. February 1970.

Booklet, 8x10½. Diagrams of trawls and telemetry systems. For the fisherman. s.

NMFS NFC supply limited, free.

Mild Curing, Pickling, Dry Salting, and Smoking Salmon

Norman D. Jarvis. Fishery Leaflet 60. June 1944.

Booklet, 10x8. Highly detailed.

s.

NMFS LJ supply limited, free.

Nautical Notions for Nibbling

Bureau of Commercial Fisheries.

Booklet, 5½x8½. Color photos. Recipes for appetizers.

g.

NMFS TI supply limited, free. NMFS PFPC supply limited, free.

NMFS Fishery-Oceanography Center

U.S. Department of Commerce, NOAA. 1971.

Leaflet, 9x4. Photos. Facilities, research activities, and accomplishments.

g.

NMFS LJ supply limited, free.

Ocean Currents

Donald E. Giles, October 1972.

Single sheet. Drawings. Classroom method for teachers of studying salinity currents and temperature currents.

g.

OSU MSC free.

Ocean Zones and Boundaries: International Law and Oceans

Sea Grant, Oregon State University, Jon L. Jacobson. Sea Grant 10. 1972.

Bulletin. Photos and maps. Traditional surface zones, new "resource" zones, state-federal ownership of zones, and international law.

g.

OSU BC free.

Oceanography at Oregon State University

School of Oceanography. July 1972.

Pamphlet. For the high school and college student.
Staff, courses, facilities, etc.

OSU SO free.

Oregon State University's Marine Science Center Welcomes You

Oregon State University. 1967.

Pamphlet. Public facilities, research facilities, laboratory, and research vessels.

OSU MSC free.

Oregon's Nearshore Ocean

James E. McCaulcy. Sea Grant 16. 1972.

16-page booklet. How land and sea contribute to the ecology of this area. g.

OSU BC price not yet set.

Organizing and Operating a Fishery Cooperative, Part I

Frederick J. Smith. Sea Grant 19. 1972.

Bulletin. Organization, management, and legal instruments. s.

OSU BC in press, free.

Organizing and Operating a Fishery Cooperative, Part II

Frederick J. Smith. Sea Grant 19a. 1972.

Bulletin. Greater detail about the legal instruments and requirements. s.

OSU BC in press, free.

Ornamental Use of Starfishes

Haskell S. Tubiash. Circular 253. December 1966.

Booklet, 6x9. Photos. g.

NMFS LJ supply limited, free.

Outdoor Cookery for the Family

Anita C. Dean and Robert E. Rust. EB 778. Reprint, July 1967.

Booklet. Photos, tables, and drawings. g.

OSU BC free.

Outdoor Fish Cookery

Bureau of Commercial Fisheries. GPO 976-046.

Pamphlet. g.

NMFS TI supply limited, free.

NMFS PFPC supply limited, free.

Overboard with Chest Waders, Hip Boots or Rain Gear

R. O. Parker, Jr. Fishery Leaflet 635. February 1971.

Booklet, 6x9. Photos. Illustrates water safety pointers.

NMFS LJ supply limited, free.

Oyster Farming

William Q. Wick and W. P. Breese. Sea Grant 13. 1972.

Bulletin. Photos and diagrams. Species. Oregon oyster culture, farming and harvesting, and processing. g.

OSU BC in press, free.

Pacific Coast Shrimp Recipes

Rose G. Kerr, Thelma S. Rose, and Helen H. Snyder. Fishery Leaflet 446. October 1957.

Booklet. g.

NMFS LJ supply limited, free.

NMFS PFPC supply limited, free.

Pacific Coast Tuna Fleet

James H. Johnson. 1964.

Booklet, 10x6½. Charts and drawings. Methods, boats used, history of the industry, types of tuna, advantages of a strong fleet, international law. g.

NMFS LJ supply limited, free.

Pacific Salmon

Clifford J. Burner. Fishery Leaflet 563. September 1964.

Booklet, 10½x8. Photos. Life history, migration, food, importance, and research.

NMFS LJ supply limited, free.

Pacific Sea Grant Advisory Program

Pacific Sea Grant Advisory Program. PASGAP 2. March 1972.

Pamphlet.

g.

PASGAP free.

Phytoplankton, Grass of the Sea

Herbert Curl, Jr. Sea Grant 9. 1970.

Life and reproduction. Food chains, drawings of the most common species. g.

OSU BC free.

Plankton

Louella E. Cable. Fishery Leaflet 583. July 1966.

Booklet, 8x10. Species, distribution, possible commercial uses. g.

NMFS LJ supply limited, free.

Plastic Liners for Fish Holds

Kirby Hayes, William Schumacher, and Curtis Wilder.

Hawaii Fish'n Facts Information Sheets 164. 1972.

s.

UH SG.

Plastics as a Fish-Hold Lining Material

Burton W. Adams and R. Barry Fisher. CI 631. September 1970.

Considerations, limitations, and advantages. Tables and drawings. s.

OSU BC free.

Pollution Papers

National Marine Fisheries Service, NOAA. 1971.

Booklet, 10½x8. A general introduction for students. Reading list and a list of agencies to contact for further information. g.

NMFS LJ supply limited, free.

Porpoise and the Tuna

William F. Perrin. Reprint from *Sea Frontiers*, Vol. 14, No. 3, May/June 1968.

Booklet 6x9. Photos. Herding of porpoises to catch tuna. g.

NMFS LJ supply limited, free.

Potential of Offshore Sand as an Exploitable Resource in Hawaii

Frederick M. Casciano and Robert Q. Palmer. SEA GRANT 69-4. 1969.

32 pages.

s.

UH SG.

Preparation for Study in Oceanography

School of Oceanography, Oregon State University. 1969.

Pamphlet. Recommended graduate and undergraduate courses. g.

OSU SO free.

Preparing Game Fish for the Pan

Department of Fisheries and Wildlife, Oregon State University.

6-page bulletin. g.

OSU FWL free.

Pressing Algae

Marine Science Center, Oregon State University.

One sheet of instructions to teachers. g.

OSU MSC free.

Putting Oregon's Ocean to Work

Extension Marine Advisory Program, Oregon State University. Sea Grant 1. March 1970.

Pamphlet. OSU's Marine Advisory Program: its development and staff. g.

OSU BC free.

Quick and Easy Ways with Salmon

Canned Salmon Institute, Anne Seranne.

Booklet. Color photos. Recipes. g.

NMFS TI supply limited, free.

Quick and Easy Ways with Salmon

Canned Salmon Institute, Anne Seranne. November 1971.

Pamphlet. Color photos. 13 recipes. Condensed version. g.

NMFS TI supply limited, free.

Rare Shells

S. Peter Dance. Publication 00288-1. 1969.

Cloth bound book. Photos, drawings, and charts. g-s.
UC UCP \$17.

Recipes for Canned Fish

Cooperative Extension Service Publication 220B. 1970. 13 pages. g.

UA CES free.

Recommendations for Handling and Icing Fresh Pacific Halibut Aboard Vessels

Harold Barnett and Wayne Tretsven. Reprint from *Fishery Industrial Journal*, Vol. 6, No. 1, BCF. February 1970.

Fact Sheet, 9 pages. For fishermen. s.

NMFS PFPC supply limited, free.

Recommendations for the Sanitary Operation of Plants that Process Fresh and Frozen Fish

J. Perry Lane. *Fishery Industrial Research*, vol. 6(2). 1970.

For the seafood processor. s.

NMFS PFPC supply limited, free.

Recommended Practices for Vessel Sanitation and Fish Handling

Edgar W. Bowman and Alfred Larsen. USFWS, BCF, Circular 333. Mar. 1970.

Booklet, 6x9. Illustrated. For the boatowner. s.

NMFS ED supply limited, free.

Refrigerated Locker Storage of Fish and Shellfish

Dorris L. Bucher, Marting Heerdt, and Maurice E. Stansby. USFW, Fishery Leaflet 128. 1949.

20 pages. Drawings. Procedures for the home freezer or locker. g.

NMFS PFPC supply limited, free.

Reptiles and Amphibians of the San Francisco Bay Region

Robert C. Stebbins. California Natural History Guides 3. 01212-7. 1959.

Paperback. j-g.

UC UCP \$1.65.

To Salt Fish

Cooperative Extension Publication 26. Reprint, 1971. Single-sheet primer for home use in the Arctic. g.

UA CES free.

Sandy Beach Exercises

Marine Science Center. Oregon State University.

Single sheet. Suggestions to teachers for field trip activities. g.

OSU MSC free.

Sanitation Guidelines for the Breaded-Shrimp Industry

Joe P. Clem and E. Spencer Garrett. UFSWS, BCF, Circular 308. November 1968.

Booklet, 6x9. For management in the industry. s.

NMFS PFPC supply limited, free.

Sanitation Standards for Smoked Fish Processing: Part I Fish Smoking Establishments—1967

Public Health Service Publication 1587. 1967.

Booklet, 6x9. Highly detailed recommendations. For the professional fish processor. s.

NMFS PFPC supply limited, free.

Sea

U.S. Dept. of the Interior. Conservation Note 10. Reprint, 1969.

Booklet, 4 pages. Oceanographers, and living, mineral, and energy resources of the sea. g.

NMFS TI supply limited, free.

Sea Grant Food Science and Technology: Summary of the First Meeting, May 24, 1970

Sea Grant Marine Advisory Program, Oregon State University, Kenneth S. Hilderbrand, reporter. 1970.

Booklet. Edited proceedings. s.

OSU SL free.

Sea Urchin Embryology in the Classroom

Donald E. Giles. October 1970.

Two pages. Gives teachers a teaching technique for fourth grade through college level classes. g.

OSU MSC free.

1970 Seacoast Management Bill: Background and Analysis

Susan F. Morry. Sea Grant Pub. WSG-MP 71-1. 1971. 27 pages. s.

UW DMR free.

Seafood Moods—Alaska, Washington, Oregon

BCF, USDI. Fishery Market Development Series 14. 1969.

Booklet, color photos. 30 recipes.

g.

NMFS TI supply limited, free. NMFS PFPC supply limited, free.

Seafood Slimmers

BCF, Fishery Market Development Series 7. October 1966.

Booklet, color photos. Recipes.

g.

NMFS TI supply limited, free. NMFS PFPC supply limited, free.

Seafoods and Health

Dr. Bruce R. Stillings and Mary H. Thompson. Fishery Market Development Series 17.

Pamphlet.

g.

NMFS TI supply limited, free. NMFS PFPC supply limited, free.

Seashore Life of Southern California

Sam Hinton. California Natural History Guides 26, 01470-7. 1969.

Paperback, pocketsize.

j-g.

UC UCP \$2.25.

Seashore Plants of Northern California

E. Yale Dawson. California Natural History Guides 20, 00301-2. 1966.

Paperback.

j-g.

UC UCP \$1.75.

Seashore Plants of Southern California

E. Yale Dawson. California Natural History Guides 19, 00300-4. 1966.

Paperback.

j-g.

UC UCP \$1.75.

Seaweeds Are Not Weeds

U.S. Dept. of the Interior. Conservation Note 7. Reprint, 1969.

Fact sheet on commercial uses.

g.

NMFS TI supply limited, free.

Seaweeds at Ebb Tide

Muriel L. Guberlet, 1971.

Handbook of Pacific Coast seaweeds.

198 pages, illustrated, bibliography, index.

UW UWP \$3.95.

Secondary School Instruction in Biological Oceanography

Bureau of Commercial Fisheries, USDI. 1967.

Booklet. Teacher's guide, with subject matter followed by an explanatory demonstration. Photos, charts, and graphs.

s.

NMFS LJ supply limited, free.

Shell Collecting: An Illustrated History

S. Peter Dance. 00287-3. 1966.

Cloth bound book.

g-s.

UC UCP \$10.

So You Want to be a Marine Scientist?

William M. Stephens. Seaquarium Science Series 2. 1968.

Booklet, photos. Specializations, jobs available, recommended studies. g.

NMFS LJ supply limited, free.

So You Want to Get Involved

U.S. Department of the Interior. 0-414-915. 1971.

Leaflet, a broad look at environment. g.

NMFS LJ supply limited, free.

Soil Salinity Problems in Shoreline Areas of Hawaii

S. A. El-Swaify, Wade McCall, and S. Sinanuwong. UNIH-SEA GRANT-AR-71-01 or Cooperative Ext. Circular 462. 1972.

12 pages. s.

UH SG.

Some Characteristics of Oregon Fishermen

Frederick J. Smith. Sea Grant 12. 1972.

Bulletin, graphs and photos. Number, age, vessel ownership, and turnover of Oregon fishermen. s.

OSU BC free.

Spiny Lobsters

Lola T. Dees. Fishery Leaflet 523. Reprint, 1968.

Booklet, photos. Species, migrations, life history, capture, usage, and culture. g.

NMFS LJ free.

Sport Fishermen's Guide to Holding and Freezing Fish

Kirby Hayes, William Schumacher, and Curtis Wilder. Hawaii Fish 'n Facts Information Sheets 169. 1972.

UH SG in press.

Sports Fishing

Hoffman. UNIH-SEA GRANT-AR-72-02. 1972.

UH SG in press.

Status of the Precious Coral Industry in Japan, Taiwan, and Okinawa

Richard Grigg. 1970.

14 pages.

UH SG.

Stay Slim with Seafoods

Texas Parks and Wildlife Department.

Pamphlet, color drawings. Buying guide and recipes. g.

NMFS TI supply limited, free.

Stock Concept in Pacific Salmon

Peter A. Larkin and Raymond C. Simon, eds. 1972. s.

UBC ARE \$5. Cdn. dollar.

Striped Bass

Paul R. Nichols. Fishery Leaflet 592. October 1966.

Booklet, with photos, drawings, and graphs. g.

NMFS LJ supply limited, free.

Structure and Distribution of Coral Reefs

Charles Darwin. 00291-1. 1962.

Paperback. g.

UC UCP \$1.95.

Structure and Senses of Fishes

Ralph Hile. Fishery Leaflet 132. August 1969.

Booklet, diagrams.

s.

NMFS LJ free.

Study of Demersal Fishes and Fisheries of the Northeastern Pacific Ocean

D. L. Alverson, A. T. Pruter, and L. L. Ronholt. H. R.

MacMillan Lectures in Fisheries. 1964.

s.

UBC ARE \$1. Cdn. dollar.

Sturgeons

Lola T. Dees. Fishery Leaflet 526. September 1961.

Booklet, photos. Species, life, behavior, protection, and value.

g.

NMFS LJ supply limited, free.

Symposium on Pink Salmon

N. J. Wilimovsky, ed. 1962.

s.

UBC ARE \$1. Cdn. dollar.

Take a Can of Salmon

BCF, Circular N. 60.

Booklet, color photos. Recipes.

g.

NMFS TI supply limited, free.

To Can Fish in Glass Jars

J. K. Burand. University of Alaska Cooperative Extension Service 24. 1971.

Single-sheet primer for home use.

g.

UA CES free.

To Can Fish in Tin Cans

J. F. Burand. Cooperative Extension Service Publication 25. 1971.

Single-sheet primer for home use.

g.

UA CES free.

To Freeze Fish

J. K. Burand. University of Alaska Cooperative Extension Publication 227. 1970.

Single-sheet primer for home use.

g.

UA CES free.

Today's Youth in Tomorrow's Sea

Harold A. Goodwin. PASGAP 3. February 1972.

Bulletin. Opportunities for youth in oceanography: training necessary.

g.

PASGAP free.

Top O' The Mornin' with Fish and Shellfish

Bureau of Commercial Fisheries. Test Kitchen Series No. 15.

Booklet, color photos. Breakfast recipes.

g.

NMFS TI supply limited, free. NMFS PFPC supply limited, free.

Tuna: As You Like It

Tuna Research Foundation.

Booklet, color photos and drawings. Recipes.

g.

NMFS TI supply limited, free.

Using Porpoise to Catch Tuna

William F. Perrin. Reprint from *World Fishing*. 1969.

Leaflet, photos.

g.

NMFS LJ supply limited, free.

Utilization and Disposal of Crab and Shrimp Wastes
V. Mendenhall. University of Alaska Sea Grant Marine
Advisory Bulletin 2. 1971.

41 pages. A technical review with an extensive bibliography. s.

UA FEMA.

Water Resources Management and Public Policy

Thomas H. Campbell and Robert O. Sylvester, eds.
1968.

296 pages. Tables, figures. g.

UW UWP \$8.50.

Whaling Equipment of the Makah Indians

T. T. Waterman. 1920.

g.

UW UWP \$2. paper.

What Is Ecology

Fact Sheet.

g.

NMFS LJ supply limited, free.

Why Fish Spoil

Kirby Hayes, William Schumacher, and Curtis Wilder.
Hawaii Fish 'n Facts Information Sheet 166. 1972.

UH SG in press.

4 audio-visual materials

This section lists and describes audio-visual materials. Unless they are described otherwise, entries are for 16mm sound motion picture films. In this section, each entry is listed alphabetically, by title. Information is in the same order for each entry:

- title
- length
- color or black and white
- date
- description
- difficulty level code
- mailing address (coded) indicating the source
- special notes or order numbers for that source
- rental charge or use fee

You may wish to refer to the sample entry below. With only two types of exceptions, all information follows the standard format. In some cases, information is omitted because it was not provided by the source of the material. The other exception occurs when two or more sources offer the same material. Then, the entry reflects the varying data immediately after the mailing address code of the source to which it applies.

Difficulty level codes are explained below. Mailing address codes are explained in section 5, page 69.

Multiple mailing address codes mean availability from more than one source.

Sample entry, AUDIO-VISUAL MATERIALS

description	title	length	color or b&w	date
	<i>Marine Animals of the Open Coast: A Story of Adaption</i>			
	22 minutes. Color, 1963			
How animals of the open coast are modified to adapt to the conditions in which they live. Considers animals of the intertidal area, the surf-swept zone, the splash zone, the protected tidal pools, and the sandy beaches.				
	OSU AV (2824)	\$7.75	UW LH	\$8.25
mailing address		price or rental fee		difficulty level code
special note or order number exclusively for the source indicated by preceding mailing address code				

Difficulty level code explanation, AUDIO-VISUAL MATERIALS

k—kindergarten and preschool
 p—primary (grades 1-3)
 i—intermediate (grades 4-6)
 j—junior high (grades 7-9)
 s—senior high (grades 10-12)
 c—college
 a—adult

SPECIAL INFORMATION

University of British Columbia audio-visual materials, coded UBC CCE: Because of customs regulations, the University of British Columbia will not ship films outside Canada. Each film affected is noted in the individual description.

Oregon State University audio-visual materials, most entries coded OSU AV, some entries coded OSU CC, or OSU MSC: Available to anyone, but only in Arizona, California, Colorado, Idaho, Montana, Nevada, New Mexico, Oregon, Utah, Washington, Wyoming, Alaska, and Hawaii. All films are shipped by air mail to Alaska and Hawaii; user bears the additional cost.

University of Washington audio-visual materials: University of Washington Audio-visual Services, coded UW LH, makes its materials available to anyone, but only in Washington, Oregon, Idaho, western Montana, northern California, and—conditionally—Alaska and Hawaii. Users in Alaska and Hawaii must pay air mail shipping both ways. University of Washington Press, coded UW FD, will ship its films anywhere in the United States. Services available from the University

of Washington to Washington state residents are subject to the sales tax laws of that state.

Adaption to a Marine Environment

18 minutes, color. 1967.

How a unique Thailand frog adapts to the constantly changing level of salt in its tidewater environment. Adaption mechanisms employed by other organisms living along the ocean floor.

s-c-a.

OSU AV (8153) \$7.75.

Adaptive Radiation—Mollusks

18 minutes, b&w. 1961.

EBEC film. Shows characteristics of the classes of mollusks. Live photography showing chitons, snails, clams, and oysters, shells, the squid, octopus, etc.

UC MC \$9.

Algae

17 minutes. 1964.

Introduces major algae groups, illustrates unity of function and diversity of types. Shows habitat, reproduction, and evolution of living forms.

j-s-c-a.

UW LH \$7.

Algal Reproduction

28 minutes, color. 1960.

AIBS Biology series. The ocean, while at present insignificant as far as man's food supply is concerned, has tremendous possibilities for the future. Some life cycles of marine algae. Excellent inserts of red, brown, green marine algae.

s.

OSU AV (0114) \$9.50.

Alive From the Deep

15 minutes, b&w. 1952.

The eternal fight for life goes on among animals of the deep sea. Fish, corals, jellyfish, octopuses, seals, etc.

i-j-s-c.

OSU AV (0122) \$3.

Anatomy of the Dogfish

19 minutes, b&w. 1948.

Presents the skeletal, muscular, respiratory, digestive, urine-genital, and nervous systems of the dogfish and demonstrates dissection through macro-photography and diagrams.

c.

UH AV.

Animal Life at Low Tide

11 minutes, color. 1955.

A boy and girl visit the seashore and at a tidepool find and study many salt water animals and their means of locomotion, protection, and getting food. Included are starfish, tube building seaworms, sea anenomes, limpets, sea urchins, sea crabs, and snails. Hermit crabs molting and selection of home.

i-j.

OSU AV (0194) \$5.75.

Animals That Live in Water

13 minutes, color. 1970.

Ways animals are adapted for living in water in relation to food, oxygen, protection and movement. Includes the whirligig beetle, fish, crab, snail, sea cucumber, octopus, lamprey, turtle, and frog. i.

OSU AV (9109) \$7.75.

Anyone for Diving?

35 minutes, color. 1962.

Training of a hypothetical skindiving class. Includes animated brief history of skindiving. s-c-a.

OSU AV (0232) \$11.50.

Aquatic Locomotion

16 minutes, color. 1971.

UC Media Center Film. Shows the many varieties of fish, reptiles, and mammals that live in the water surrounding the Galapagos Islands. j.

UC MC \$13.

Arctic Fishermen in World Trade

11 minutes, color. 1964.

The interdependence of peoples in world trade. How Norwegian fishermen catch and ship cod to Italy, Africa, and the U.S. in exchange for manufactured goods and agricultural products. i-j.

OSU AV (0249) \$5.75.

Attack Patterns of Sharks

30 minutes, color. 1966.

Cornell University zoologist shows attack patterns of sharks. Shows how certain shark repellents seem to work and others don't; not any certain. j-s-c-a.

UC MC \$14. UH AV (F-1431) OSU AV (0294) \$9.50.

Basic Net Mending

16 minutes, color.

Teaching film, showing basic procedures and equipment used in mending a hole in a net. a.

NMFS MRS free.

Bathythermograph Observations

17 minutes, color. 196-.

The function of a bathythermograph and how it operates. Good for instructional purposes. s-c-a.

UH AV (F-920).

Beach and Sea Animals

11 minutes, b&w. 1957.

Typical beach and sea animals, habitats, and activities. Interrelationships and methods of self-protection. Balance in nature portrayed. i-j-s-c.

UW LH \$5. OSU AV (0374) \$4.50.

Beach: A River of Sand

20 minutes, color. 1965.

Earth Science series. Analysis of currents produced by waves and calculations of the accumulation and depletion of sand. The pronounced movement of sand along the shore. i-j-s-a.

UC MC \$7.75. OSU AV (0373) \$7.75. UW LH \$10.50.

Between the Tides

20 minutes, color. 1958.

Bird and sealife around the tide zones in Britain. Very outstanding scenes of underwater life. i-j-s-c.

OSU AV (0136) \$7.75. UW LH \$7.

Biography of a Fish

10 minutes. 1950.

Details of nest-building, mating, and guarding the young. i-j-s-c-a.

UW LH \$5.

Blood Circulation in Marine Animals

14 minutes, color. 1942.

Describes a variety of circulating fluids and mechanisms. Shows colorless and pigmented fluids and corpuscles in pulsating vessels and hearts: circulating media demonstrated, transportation of food, oxygen; specimens chosen include *Thalassoma*, *Norsis*, *Cistenides*, *Callinectes*, *Palaemonetes*, *Ostrea*, a fish, and a terrapin. c-a.

UH AV (F-505).

Breath of Life

12 minutes, color. 1968.

Living world of the sea series. How animals breathe in the sea. The principle of counter-current exchange (how oxygen is taken from water while carbon dioxide is given off). The mystery of drowning fish. j-s.

UC MC \$13. OSU AV (9152) \$7.75.

Bristol Bay Story

45 minutes, color. 1961.

Biology and industry centered around the Bristol Bay salmon. s-c-a.

UA AV.

Capture of a Smile

13 minutes, color. 1969.

CCM film. Shows capture of a dolphin. Use of blow-hole for communication, effective "sonar" mechanism. The dolphin's willingness to work with people. j.

UC MC \$13.

Careers in Oceanography

Cassette tape recording 1972.

Recording of an interview with a professional oceanographer on various aspects of a career in oceanography, conducted by a counseling staff member. Copies made and sent to those organizations which request it. j-s-c.

OSU CC \$3.50.

Carnival of the Sea

90 minutes, color.

Shows method of capturing different groups of underwater organisms and the techniques of preserving them alive in aquariums. Carnival mood of the film is enhanced by a jazz score and informative English narration. The climax of the dazzling display of ocean life is an underwater sequence showing the very rare deep sea corals. j-s.

UH AV (F-2006, I and II).

Carnival Under the Sea

70 minutes, color. 1967.

CATALA film. Biology among the coral reefs of New Caledonia and Noumea aquarium. Banner fish, burrowing fish, dancing crabs, dancing starfish, etc. j.
UC MC \$46.

Catching, Filleting, Packaging

12 minutes, b&w. 1950.

Method of catching bottom fish by means of an otter trawl; also the processing, filleting, packaging, and freezing of fish for market. i-j-s-c-a.
NMFS MRS free. UA AV.

Challenge of the Oceans

29 minutes, color. 1960.

Planet Earth series. Research activities being carried out to learn more facts about the ocean and its floor, currents, tides, etc. World-wide explorations during the International Geophysical Year. j-s-c-a.
UCMC \$9. UH AV (F-1221). OSU AV (0678)
\$9.50. UH LH \$7.

Coco and the Seabirds

11 minutes, color. 1953.

Coco and an adult friend find sea gulls, pelicans, sandpipers, and egrets in the marshes near the ocean. They study their food and flight patterns. p-i.
OSU AV (0839) \$5.75.

Coco Explores a Pier

11 minutes, color. 1953.

Coco and his friend find barnacles, gooseneck barnacles, and mussels. How seaweeds differ from land plants. p-i.
OSU AV (0841) \$5.75.

Coco Explores a Tide Pool

10 minutes, color. 1953.

Coco and an adult friend find sand dollars, sea urchins, starfish, and rock crabs. They study the protection provided for each. p-i.
OSU AV (0842) \$5.75.

Coco at the Seashore

11 minutes, color. 1953.

Coco and an adult friend examine sea anemones, periwinkles, limpets, hermit crabs, and sea hares. p-i.
OSU AV (0840) \$5.75.

Cod and Perch Filleting

18 minutes, color, silent. German titles, no translation. Machine filleting of commercial fish. a.
UA AV.

Colorful Cuttle

14 minutes, color. 1962.

IFB film. Structure and characteristics of the cuttlefish clearly shown. Shows process or color changes. Locomotion and color change are linked to ability to produce "ink." j.
UC MC \$11.

Conquering the Sea

25 minutes, color. 1967.

21st century series. Current research which will enable man to live and harvest great resources from the sea. Points out how man has used the sea as a means of transportation and as mineral and food resources are depleted, how he will turn to oceans for a new supply.

s-c.

OSU AV (0926) \$9.50. UW LH \$12.75. UH AV (F-475 II).

Continents Adrift

15 minutes, color. 1970.

Shows theory of continental drift. Examines paleomagnetism and sea floor spreading. Studies first attempt in 1970 to portray breakup of continents.

UW LH \$8.25.

Coral Jungle

24 minutes, color. 1969.

Undersea world of Jacques Cousteau series. The coral reef as a well-ordered complex community with tropical marine life existing in a tenuous balance. An undersea closeup of this seldom-seen world.

i-j-s-c.

OSU AV (9101) \$9.50.

Coral Wonderland

30 minutes, color. 1950.

ANIB film. Shows coral growths of Australia's Great Barrier Reef. Shows color of fish, underwater creatures, and coral.

i.

UC MC \$17.

Crayfish

11 minutes, b&w. 1947.

Examines the crayfish in general terms, then analyzes the function of the individual parts, reproduction, digestion, and the nervous system.

j-s-c.

OSU AV (0997) \$4.50. UW LH \$3.75.

Crayfish Anatomy

11 minutes, color. 1961.

Indiana University Film. Shows external anatomy of a living crayfish. Shows in detail anatomy of crayfish, traces blood circulation, shows reproductive system.

UC MC \$9. OSU AV (0998) \$5.75.

Dangerous Reef

23 minutes, color. 1969.

Australian Museum Film. Three-month study of a colony of Australian sea lions shown. Shows sea lions on land and underwater. Social structure, formation of harems, courtship and mating, etc.

s.

UC MC \$16.

Danish Seining

17 minutes, b&w. 1955.

Experimental seining techniques off Newfoundland coast. Due to customs difficulty available in British Columbia only.

UBC CCE \$2.75.

Deep Frontier

25 minutes, color. 1967.

21st Century series. New techniques in exploring the ocean. Interviews six men who are among the pioneers of ocean exploration. Six newly developed devices for accomplishing missions in the depths of the sea.

i-j-s.

OSU AV (1087) \$9.50.

Dogfish as a Vertebrate

13 minutes, b&w. 1950.

UEVA film. Introduction to study of vertebrates. Shows skeletal, digestive, circulatory, nervous, and reproductive systems of fish. j.

UC MC \$8.

Drowning Bay

9 minutes, color. 1970.

Simple version of 'Men at Bay.' Describes degradation of San Francisco's bays and environmental problems. Acquaints children with environmental problems and dangers of abuses.

UW LH \$7.

Earth Beneath the Sea

27 minutes, color. 1967.

Earth and the sea series. Marine science series. Some of the techniques employed to study the natural history of the ocean bottom. How data collected is interpreted and put to use. s-c-a.

OSU AV (8027) \$9.50.

Earth: Coastlines

11 minutes, color. 1970.

The forces that create various coastline formations. The action of waves in forming terraces and cliffs, of river and ocean currents in forming peninsulas and sandbars, and the role of diastrophism in forming coastlines of submergence and emergence. j.

OSU AV (8921) \$5.75.

Earth: Its Oceans

14 minutes, b&w. 1960.

The oceans of the world. Modern means of present-day mapping and charting of the oceans. Development of oceanography. Studies of currents, sea bottom, and water temperature. i-j.

OSU AV (1242) \$5.50.

Echinoderms

17 minutes, color. 1961.

EBEC film. Shows basic body plan of echinoderms. Shows sea stars, feather stars, sea urchins, sand dollars, and serpent stars. c.

UC MC \$14.

Egg Into Animal

14 minutes, color. 1968.

CCM film gives life cycle and environment of the roundel skate. Presents external anatomy and organs of reproduction and digestion. s.

UC MC \$13.

Electric Eel

12 minutes, color. 1954.

MTS film. Electric eel study show close relationship between physical and biological science. Eel's electric discharge enables it to locate food and to live in a particular environment, and prevent other animals from living there. p-i-j-s.

UBC CCE \$2.75, available in B.C. only. UC MC \$11.

Embryonic Development of a Fish

28 minutes, color. 1961.

Development of fish embryo from fertilization to hatching. Shown by magnification, time-lapse, and natural speed photography. s-c-a.

UW LH \$9.50.

End-Of-One

7 minutes, color.

As seagulls compete for edible bits of garbage from a city trash dump, a lone sick bird limps, struggles, and dies ignored by the rest of the gulls. Suggests a death knell for our environment, an allegory on greed, a parody of life. j-s-c.

OSU AV (9033) \$5.75.

Epidemiology of Salmonellosis in Man and Animals

15 minutes. 1964.

Shows transmission patterns of salmonellosis from contaminated feeds to food animals to humans. Only suggests means of control. s-c-a.

UW LH \$5.

Estuarine Heritage

28 minutes, color.

Stresses the importance of estuaries for important species such as shrimp, crab, oysters, clams, and finfish. NMFS MRS free.

Exploring the Ocean

11 minutes, color. 1960.

The ocean's floor, slopes, and continental shelf: sea plants and animals, how all life in the ocean depends on the tiniest forms of plant life. The ocean's vast storehouse of minerals and the water cycle. Animation. p-i.

OSU AV (1432) \$5.75.

First Many-Celled Animals: Sponges

17 minutes, b&w. 1962.

EBEC film. Illustrates the greater efficiency of multicellular animals. Shows reproductive processes, limited mobility, and adaption of sponges to their environment. j.

UC MC \$9.

Fish and Their Characteristics

11 minutes, b&w. 1961.

The four common characteristics of fish: 1) fins, 2) gills, 3) scales, and, 4) cold blood. How fish breathe, swim, and feed. i-j.

OSU AV (1540) \$4.50.

Fish and the Seine Net

17 minutes, b&w. 1953.

A semi-technical documentary. Makeup of seine nets and their uses. Underwater photography of fishing with a seine net. Action of Danish seine, reactions of fish, and escape from the nets. c-a.

UBC CCE, due to customs, available only in B.C.

UH AV (F-918) UW LH \$3.75. UA AV.

Fish Are Interesting

10 minutes, color. 1954.

Classes of fish. Characteristics of all fish. How they breathe, eat, sleep; methods of locomotion. i-j.

OSU AV (1541) \$5.75.

Fish Cookery with Savoir

14 minutes, color.

Housewives, home economics classes, and has general audience appeal.

NMFS MRS free.

Fish: Master of Movement

12 minutes, color. 1968.

CCM film. Living world of the sea series. Explores the complex and beautiful movements of fish within their natural environment. j-s-c.

UC MC \$13. OSU AV (9162) \$7.75.

Fish, Moon and Tides: The Grunion Story

15 minutes, color. 1964.

CCM film. Relationship of reproduction of grunion to the moon and tides. Spawning, fertilization, growth of embryo presented by photomicrography, and hatching. j-s.

UC MC \$12. OSU AV (1545) \$7.75. UW LH \$5.

Fish Out of Water

11 minutes, color. 1954.

MIS film. Grunion, one of the few fish that lays its eggs out of water. Closeup of female nesting in sand. Eggs are taken to a lab to be studied with photomicrography and time-lapse photography. Animated charts show movements of tides and how it affects hatching eggs. i-j-s-c.

UBC CCE \$2.75, Available in B.C. only. UC MC \$10. OSU AV (1546) \$5.75.

Fish Spoilage Control

10 minutes, color.

Cartoon about fish handling procedures. s-c-a.
UA AV.

Fishermen's Boy

11 minutes, b&w. 1955.

Danny earns an interesting trip on his father's commercial fishing boat. p.

OSU AV (1549) \$4.50.

Fishermen's Case

25 minutes, b&w.

Discusses legal fight of the Californian fishermen. j-s-c.
UA AV.

Fisheries of the Great Slave

19 minutes, color.

Commercial operations in a subarctic lake for whitefish and trout. s-c-a.

UA AV.

Fishery Product Standards

14 minutes, color.

Importance of maintaining the quality of fish products. NMFS MRS free.

Fishing Partners

18 minutes, b&w. 1945.

Describes research carried on by the Biological Station of the University of Laval and the Fisheries Research Board of Canada to help the codfishermen in a Gaspé fishing village. Scientists pass on new scientific research to fishermen.

UH AV (F-916).

Flavor of Maine

14 minutes, color.

Artistically depicts the whole Maine sardine industry. j-s-c.

NMFS TI free. NMFS MRS free.

Flying at the Bottom of the Sea

30 minutes, b&w. 1967.

IU film. Shows manned research submarine, *Alvin*, which is intended to operate at depths of up to 6,000 feet. Design and construction and first research programs with it. j.

UC MC \$10.

Freighter at Sea

17 minutes, color. 1948.

Life aboard ship, the activities of the officers and crew, navigation instruments, and safety devices. Animated map of ocean trade routes. Sequel to "Freighter in Port." p-i-j-s.

OSU AV (1651) \$7.75.

Freighter in Port

14 minutes, color. 1947.

Activities on an ocean freighter in port. Parts of ship and duties of the crew; loading and unloading cargo. Partially animated. Sequel: "Freighter at Sea." p-i-j-s.

OSU AV (1652) \$7.75.

Fresh Out of the Water

14 minutes, color.

Starts underwater and traces the capture, processing, retailing, cooking, and serving of commercial varieties of fish. General, useful in schools at all levels.

NMFS MRS free.

Granton Trawler

11 minutes, b&w. 1934.

An early documentary. Fishermen engaged in dragnet fishing off the coast of Scotland. j-s-c-a.

OSU AV (8166) \$4.50. UW LH \$5.

Great Barrier Reef

26 minutes, color. 1968.

A study of marine and bird life on the Great Barrier Reef of Australia. j-s-c.

UH AV (F-1691).

Halibut—Treasure of the Deep

14 minutes, color.

Film on fishing methods for halibut. General.

NMFS MRS free.

History, Layer by Layer

23 minutes, color. 1967.

Earth and the sea series. Marine science series. Reconstruction of the earth's history from recovery of sediment cores from the ocean floor. Work of Lamont Geological Observatory research vessels in taking ocean bottom cores. s-c-a.

OSU AV (8045) \$9.50. UW LH \$8.25.

Homely Mollusk—Octopus Vulgaris

13 minutes, color. 1968.

CCM film. Living world of the sea series. Life cycle and physical characteristics of the octopus. Feeding habits. Defense mechanisms, including ability to change skin color and paralyze attacker's sense of smell. Includes an attack by a mortal enemy, the moray eel. j-s-c.

OSU AV (9167) \$7.75. UC MC \$13.

How a Fishing People Live

8 minutes, b&w.

North Pacific example.

UA AV.

i-j.

How to Fillet Fish

11 minutes, b&w.

Teaching film on how to fillet both round and flat fish; step-by-step procedure using animation to clarify the processes. Aimed at filleters, sportsfishermen, restaurant personnel, and housewives who purchase whole fish.

NMFS MRS free.

Hydra

11 minutes, b&w. 1950.

UEVA film. Study of hydra in natural surroundings. Shows response to stimuli, sexual and asexual reproduction.

j-s.

UC MC \$7.

Invader

10 minutes, color. 1953.

Salmon and their plight to spawn. Man's many hazards such as dams, forest fires, etc. Commercial fisheries and their part.

j-s-c.

OSU AV (2323) \$5.75.

Its the Maine Sardine

20 minutes, color.

Methods of capturing and processing sardines.

NMFS MRS free.

Japan Harvests the Sea

29 minutes, color. 1958.

People and places series. Importance of the sea to Japan. How so many of the people are dependent on fishing for a livelihood. Young girls who spend each day diving for seaweed. Life along the coast, fishing, etc.

i-j-s.

OSU AV (2380) \$7.75.

Life Cycle

29 minutes, color. 1958.

Survival in the sea series, #8. The cycle between plant and animal life in the sea, the importance of plankton in providing food for many species of marine life. How various marine organisms capture their food; the part they play in the food chain. Examples of sponge, clam, octopus, ray, barracuda, and other fish.

s-c-a.

OSU AV (2595) \$9.50.

Life Cycle of the Trout

10 minutes, b&w. 1948.

Life cycle of the trout shown through photomicrography and time-lapse photography.

s-c.

OSU AV (2599) \$4.50.

Life in the Sea

11 minutes, color.

Explains main groups of life in the sea: the plankton, the bottom dwellers, and the free-swimming animals. Interrelationships of plants and animals. Economic importance to man.

UC MC 1965 \$20. OSU AV 1958 (2632) \$5.75.

Life on the Coral Reef

29 minutes, color. 1958.

Survival in the sea series. The three regions of a coral reef—the outer reef, middle reef, and inner reef—the differences in each, the dwellers in each area. Many examples of coral, including fan, star, lettuce, and brain. j-s-c-a.

OSU AV (2648) \$9.50. UH AV (F-1415).

Lobsters Unlimited

14 minutes, color.

Film describes the Nova Scotia lobster industry. j-s.
UA AV.

Man Invades the Sea

28 minutes, b&w. 1965.

An introduction to oceanography. International scientific explorations of the oceans. The new ways of probing the sea. j-s.

OSU AV (2786) \$6.50.

Marine Animals and Their Foods

8 minutes, b&w. 1949.

The interrelation of marine animals and their surroundings. The five types of foods on which they depend. j-s.

OSU AV (2823) \$4.50.

Marine Animals of the Open Coast: A Story of Adaption

22 minutes, color. 1963.

How animals of the open coast are modified to adapt to the conditions in which they live. Considers animals of the intertidal area, the surfswept zone, the splash zone, the protected tidal pools, and the sandy beaches. i-j-s-c.

OSU AV (2824) \$7.75. UW LH \$8.25.

Marine Biologist

14 minutes, color. 1963.

EBEC film. Shows scientists at work studying the living things of the sea. Shows excitement of gaining new knowledge about the sea and challenges facing a marine biologist. j.

UC MC \$12.

Marine Ecology

28 minutes, color. 1963.

AIBS biology series. Some limiting factors that influence distribution of plants and animals in the ocean. Characteristics pertaining to life forms, zonation, stratification, and productivity of the ocean.

OSU AV (2825) \$9.50.

Marine Erosion Processes

11 minutes, color.

The major processes at work in shaping cliffs. Uses examples from the South Coast of New South Wales. Partially animated. j-s.

OSU AV (9172) \$5.75.

Marine Iguana: Variations on a Theme

23 minutes, color. 1971.

EMC film. Detailed study of an animal that exists only in the Galapagos Islands. Shows the animal and the adaptations that enable it to dive for food; social organization; ways it maintains body temperature. s.

UC MC \$17.

Marine Life

11 minutes, color.

EBEC film. Shows activities of octopuses, sea urchins, hermit crabs, reef fish, etc. Tiger sharks, porpoises, and sea fans are among the many animals seen in natural environment. j.

UC MC 1962 \$11. OSU AV (2826) 1952 \$5.75.

Med Skovelkutter (Fishing from Small Trawlers)

26 minutes. b&w.

Silent with Danish titles, no translation, but quite clear. Shows entire process, fishing through processing, in the plaice fishery. s-c-a.

UA AV.

Men of Gloucester

25 minutes, color.

Describes the New England fishing industry. j-s.

UA AV.

Mollusca, Reel I

14 minutes, color. Silent. 1941.

Depicts representative mollusks, including a nudibranch, a snail, rapidly burrowing bivalves, a scallop, and the common squid. Shows details of bivalve foot in action. Tentacles, mantle cirri, palps, and siphons; color of scallop eyes and pigment sacs of the adult squid. s-c-a.

UH AV. (F-470).

Mollusks: Snails, Mussels, Oysters, Octopuses and Their Relatives

14 minutes, color. 1955.

EBEC film. Discusses the distinguishing characteristics and habitats of the five classes of mollusks, showing some of the ways in which they are useful to man. j-s.

UH AV (F-909). UC MC \$8.

Most Exceptional Fish: The Sea Horse

13 minutes, color. 1968.

Living world of the seas series. Life cycle, external anatomy, defense mechanisms, and locomotion of the sea horse. Function of the air bladder and the counter-current exchange system. Includes animation and time-lapse photography. j-s.

OSU AV (9186) \$7.75.

Mullet Country

14 minutes, color.

Associates the mullet with the beauty of Florida. j-s-c. NMFS TI free.

Mysteries of the Deep

24 minutes, color. 1961.

True-life adventure series. Some of the strange and unusual sea life and its fight for survival. i-j-s.

OSU AV (3081) \$9.

Natural History Along the Washington Coast

Filmstrip and teacher's guide. 62 frames, color.

Reveals diversity of life along the shore. Survey of geological formations and how wave action alters them. Animals and plants shown are common varieties readily seen at low tide.

UW FD \$6.95.

New England Fisherman

11 minutes, b&w.

Spirit of Gloucester fishermen and precarious way of making a living. Work and living conditions aboard a steam fishing trawler.

OSU AV (3146) \$4.50.

New England Sea Community

16 minutes, color. 1962.

Pioneer life series. The daily life in a New England seacoast town in 1845 as seen through the eyes of a boy of 13. An overview of the different trades relating to the sea; fishing, whaling, coastal shipping, and the land-based services which supported them. Some of the aspects of family life in a town where the principal work activities were related to the sea. i-j.

OSU AV (3147) \$7.75.

Noisy Underwater World of the Weddell Seal

13 minutes, color. 1966.

The Weddell seal as a creature of two worlds finding food and steady temperatures under the Antarctic ice and air above it. Describes an expedition. i-j-s-c.

OSU AV (8588) \$7.75.

North Pacific

27 minutes, color. 1967.

Salmon research cruise on the vessel G. B. Reed in the Gulf of Alaska.

UBC CCE available in B.C. only, \$3.50.

Northern Elephant Seal

15 minutes, color. 1962.

Presents the life cycle of the northern elephant seal. Shows behavior including vocal communication, structure, and maintenance of dominance. s.

UC MC rental \$11. Sale \$150. UH AV (F-1011).

Occupying an Oceanographic Station

25 minutes, color. 1950.

Describes how water samples are taken from the ocean depths as well as oxygen samples and water temperatures from different depths. s-c-a

UH AV.

Ocean Bounty

22 minutes, color. 1952.

Demonstration of equipment used and methods of handling fish in Norway's large fisheries. s-c-a.

UW LH \$5.

Ocean Currents

16 minutes, color. 1963.

The constant motion of ocean water caused by tides, winds, and currents. How differences in densities of hot and cold, fresh and salt water cause convection currents. The northward and southward flow of masses of water as definite ocean currents. Influences of the Coriolis effect and the location and shape of land-forms in the currents' path. j-s.

OSU AV (3223) \$7.75. UW LH \$8.25.

Ocean Fresh: The Story of Tuna Packing in Hawaii

15 minutes, color. 1955.

Depicts commercial tuna fishing off the coast of Oahu.

UH AV (F-1044).

Ocean Tides

14 minutes, b&w. 1957.

EBEC film. Animation explains how tides are formed. Show 40-foot tides and the reversing fall rapids of the St. John River. i.

UC MC \$8.

Ocean Tides—Bay of Fundy

14 minutes, color. 1957.

Unusual tides at Bay of Fundy, maps and charts used to explain the causes of tides and reasons for the extreme high and low tides. j-s.

UW LH \$5. OSU AV (3225) \$7.75.

Oceanographers in the Polar Regions

29 minutes, color. 1967.

How men meet the challenges of oceanographic research in Arctic and Antarctic. Men master the oceans for defense and economic betterment of the world. s-c-a.

UW LH \$2.50.

Oceanography at Work: Diamonds Under the Sea

25 minutes, color. 1966.

How the principles of oceanography aid a scientific expedition to survey and explore the ocean floor in search of diamonds. j.

OSU AV (3227) \$9.50.

Oceanography—The Study of Oceans

15 minutes, color. 1969.

The work of the meteorologist, physicist, chemist, biologist, and geologist in studying the ocean. i-j-s.

OSU AV (8806) \$7.75.

On the Rocks

29 minutes, color. 1958.

Survival in the sea series. Examples of the corals and other animals living in the zoological zone of fast water on the rocky bottom. Methods these animals use in obtaining food. Some plants and their adaptive behavior in this environment. s-c.

OSU AV (3263) \$9.50.

Oregon's Rocky Intertidal Life: Selected Transparencies

34 color slides with teacher's guide giving description of each slide.

Subject is the animal life in the intertidal zone in Oregon. Transparencies must be scheduled ahead on loan only. i-j-s-c.

OSU MSC free.

Otter Trawling

21 minutes, color.

Complete description of fishing (trawling) with the otter net. Operation of the net below the surface of the water is illustrated by drawings. Life aboard a trawler is also described. j-s-a.

UH AV (F-919).

Our Estuarine Heritage

30 minutes, color.

j-s-c-a.

NMFS TI free.

Outdoor Fish Cookery

28 minutes, color.

Age-old and modern out-of-doors fish cookery in the U.S. General audiences. j-s-c-a.

NMFS MRS free. NMFS TI free.

Outboard Fisherman U.S.A.

27 minutes, color.

How small, independent, commercial fishermen, using outboard motors, contribute to the national economy. j-s-c-a.

NMFS MRS free. NMFS TI free.

Oysterman

18 minutes, b&w. 1950.

The story of oyster farming in the Gulf of St. Lawrence. The stages of oyster cultivation, the sampling of minute larvae, the staking of oyster beds, the culturing of spat until they can be transferred to their natural habitat, ensnaring of starfish which prey on the oyster, and the grading and shipping of oysters.

UH AV (F-921).

Pacific Halibut Fishing

16 minutes, color. 1949.

A trip with a halibut schooner from its base at Seattle to the Shumigan Islands off Alaska. Method of fishing shown by diagram. i-j-s-c.

NMFS MRS free. NMFS TI free. OSU AV (3370) \$3.

Pearlers

19 minutes, b&w. 1950.

Story of the men who operate the pearl luggers of North Australia. Australia as a source of most of the world's mother-of-pearl shells. j-s.

OSU AV (3437) \$3.

Perch Anatomy

17 minutes, color. 1963.

Exterior structure and coloration of a living perch. Uses fresh specimens to demonstrate dissection techniques and reveal internal structures. Respiratory, digestive, excretory, circulatory, and reproductive systems. Olfactory tract and brain. Observes heart action in freshly killed specimen. s-c-a.

OSU AV (3458) \$7.75.

Pink Salmon Story

33 minutes, color. 1964.

Life history and the pink salmon industry. j-s-c.

UA AV.

Plankton and the Open Sea

19 minutes, color. 1962.

EBEC film. Biology program. Ecology and environmental science. Distribution of plankton, dependence of one kind on another; how an attempt is made to determine the amount of food available at the base of the food chain. j-s.

UC MC \$10. OSU AV (3538) \$7.75. UW LH \$8.25.

Plankton: Pastures of the Ocean

10 minutes, color. 1966.

Uses live sequences and microphotography to develop concepts which reveal the importance of plankton in the ecologic structure of the ocean environment and the possibility that plankton may someday become a major source of food for the world's exploding population. i-j-s.

UH AV (F-551).

Polar Ecology

23 minutes, color. 1963.

UH AV (F-1012).

Pollution in Paradise

50 minutes, color. 1963.

Depicts man-made pollution of air and water resources in the Pacific Northwest. Sources and effects of pollution are considered. Political and economic consequences of pollution in the state of Oregon.

UW LH \$10.50.

Project Deep Probe

28 minutes, color. 1969.

Shows scientists trying to determine how earth looked millions of years ago. Presents hypothesis that earth was once a single body of land rather than the continents we know. Shows ship *Glomar Challenger* and how it probes for samples from the ocean floor 20,000 feet deep.

UW LH \$10.50.

Project "Mohole"

20 minutes, color. 1960.

Horizons of Science series. A scientific project to break through the earth's crust to explore its interior. Moho—the thin layer between the rocky crust layer and the earth's mantle. Testing in the sea to find a crust layer thin enough to break through. s-c-a.

OSU AV (3690) \$7.75.

Queen of the Sea: Planning and Building of the Clipper Ships

15 minute Audio-Tape. Science; Adventures in Research series. Transportation. j-s.

OSU AV \$1. Transcription fee.

Reef at Michaelmas Cay

10 minutes, color. 1970.

Marine ecology of coral reef at Michaelmas Cay off Australia. Shows varieties of coral, fish, and other sea creatures that balance each other to make a relatively unspoiled ecosystem.

UW LH \$7.

Reproduction in the Sea Urchin

13 minutes, color. 1965.

Uses closeups and photomicrography to illustrate the physiology of the sea urchin's reproductive system. Follows the reproductive process through the primary stages of cell division and embryonic development. s.

OSU AV (3815) \$7.75.

Restless Sea

54 minutes, color. 1964.

Science series. A study of oceanography including the composition and characteristics of sea water, formation of tides, what waves are, the tracing and charting of currents, the circulation of sea water, plant and animal life, and new techniques of studying the ocean floor. Partially animated. j-s-c.

OSU AV \$3. UW LH \$2.50.

Retailing Fish

20 minutes, color.

Operation of retail fish store; selecting, handling, displaying fresh and frozen fish. Aimed at an audience of fish retailers, housewives, and home economics classes.

NMFS MRS free.

Riddle of the Seas: Matthew Fontaine Maury, Oceanographer

21 minutes, b&w. 1964.

Excerpt from a TV film of the same title. Cavalcade of America Series. Dramatizes Maury's pioneer work in mapping the ocean currents and winds of the seas for greater safety and dependability of navigation. Establishment of the US Weather Bureau. i-j-s.

OSU AV (9450) \$5.50.

Ripple Tank Wave Phenomena I: Reflection, Refraction and Dispersion

17 minutes, b&w. 1961.

Depicts a logical sequence of water phenomena projected on ground glass, photographed with a high-speed camera. s-c-a.

UH AV (F-948).

Salmon Catch to Can

10 minutes, b&w.

Description of the salmon industry. For use in schools at all levels; all adult groups.

UA AV. NMFS MRS free.

Salmon: Life Cycle of the Sockeye

11 minutes, color. 1951.

The life cycle of a sockeye salmon from its birth in inland waters, its maturity in the ocean, and its return to freshwater streams to spawn and die. Importance of the salmon fishing industry in the Pacific Northwest. i-j-s.

UB CCE available only in B.C. \$2.50. UC MC \$10.

OSU AV (3950) \$5.75.

Salmon Run

20 minutes, color. 1945.

Depicts the salmon industry of British Columbia and describes the life cycle of the sockeye salmon, which swims up the Fraser River each year to spawn.

UH AV (F-925).

Salmon Story

11 minutes, color. 1950.

Life cycle of the salmon. Artificial breeding and raising of salmon to preserve the species. Fishing for and canning of salmon. i-j.

OSU AV (3951) \$5.75.

Salmon's Struggle for Survival

27 minutes, color. 1957.

Shows how a dilemma facing fisheries on Canada's west coast is being overcome. Shows need to keep rivers uncontaminated and unobstructed to allow the Pacific salmon to carry on its life cycle. j.

UC MC \$19.

Sardine from Maine, Down East Style

14 minutes, color.

Catching, processing, buying, cooking, and serving Maine sardines. For general audiences.

NMFS MRS free.

Science of the Sea

19 minutes, color. 1958.

IFB film. Scientists shown as they check the many interrelationships between sea and land. Air and water currents, winds, water samples, measuring the topography of the ocean floor. Digging into the rock layer of the sea's floor. j-s-c-a.

UC MC \$15. UH AV (F-913). OSU AV (3991) \$7.75. UW LH \$6.

Sea

27 minutes, color. 1962.

EBEC film. Ecology and environmental science. Interdependence of plant and animal life, food supply, adaptability of plants and animals, rich variety of animal life, and the natural beauty and importance of the marine biome. Geography of the sea, partially in animated drawings. Deep sea explorations. j-s.

UC MC \$12. OSU AV (4000) \$9.50. UW LH \$9.50.

Sea Adventures of Sandy the Snail

16 minutes, color. 1957.

Sandy the snail travels the ocean floor, by way of the finger paintings of Betty Ohirogge, seeing the plants and animals of the Pacific. p-i.

OSU AV (4001) \$7.75.

Sea: Background for Literature

11 minutes, b&w. 1958.

How the sea has provided inspiration for some great works of literature. Includes excerpts from poems and stories, reenactment of some key scenes in famous sea stories. j-s.

OSU AV (4002) \$4.50.

Sea Fever

15 minute audio tape.

Poetic patterns, interpretive poetry reading Series A. Includes "The Ocean" from "Childe Harold" by Byron —"Break, Break, Break," by Tennyson, "Shenandoah" sung by Leonard Warren, "Dover Beach" by Arnold.

OSU AV \$1. Transcription price, purchaser to buy the tape.

Sea Fever

8 minutes, color. 1966.

Scenes of a square rigged clipper at sea with the narration of John Masefield's poem, "Sea Fever." i-j-s.

OSU AV (4003) \$5.75.

Sea Gull

14 minutes, color. 1968.

Nesting site, courtship display, nest building, and incubation of blacktailed sea gull. Activities of young fledglings. i.

OSU AV (8315) \$7.75.

Sea Horse

12 minutes, color. 1968.

CCM film. Shows anatomy, feeding, and birth of young sea horses. Animation illustrates function of the bladder (air) and counter-current exchange system. j.

UC MC \$13.

Sea Lions and Fur Seals

19 minutes, color. 1971.

EMC production. Studies two populations of sea lions. Observes grooming, feeding and mating habits, social organization, and adaptations. j.

UC MC \$15.

Sea Otters of Amchitka

45 minutes, color. 1959.

THORNE Film. Comprehensive story of sea otters in actual life situations. Stresses life history, ecology, and behavior of sea otters. s.

UC MC \$22.

Sea Shell Animals

10 minutes, color. 1955.

Survey of sea animals living in shells (mollusks)—how they move and feed. j-s.

UW LH \$5.

Sea-Surface Meteorology

24 minutes, b&w. 1965.

The role played by the formation of rain with the transfer of large condensation nuclei and electrical charges from the sea surface to the atmosphere. Effect of an erupting volcano at the sea surface. s-c-a.

OSU AV (8212) \$6.50.

Sea Urchin

10 minutes, b&w. 1948.

Life cycle of the sea urchin, a close relative of the starfish. Compares the structures of the male and female and shows the process of fertilization. Segmentation is observed. Differentiation into layers, with formation of the body cavity. Through animated diagrams shows the metamorphosis of the larva into the adult sea urchin. j-s-c.

UH AV (F-514). OSU AV (4004) \$4.50. UW LH \$5.

Seal Island

27 minutes, color. 1949.

Disney film record of Alaska fur-bearing seals. Shows seals on their remote harem reefs in the Bering Sea. Shows complete life cycle. j.

UC MC \$19.

Seashore

10 minutes, color.

Explains waves, how sand is made, two types of western shorelines, tides and tidepools. Sea animals, birds, shells, and seaweed. i-j-s.

OSU AV (4009) \$5.75.

Seashore Life

11 minutes, color. 1950.

Life in the rock pool, sandy beach, and mudflat of the seashore. Ways representative seashore animals are adapted to survive in their special environments. p-i-j. OSU AV (4010) \$5.75.

Seashore Oddities

10 minutes, color. 1947.

Scientific secrets of marine life in first fathom of ocean waters. How marine invertebrates secure food and maintain their species. j-s. UW LH \$1.60.

Secrets of the Underwater World

16 minutes, color. 1960.

Secrets of life series, true-life adventures series. Describes many of the unusual animals found in the shallow seas, in the tidal fringe and in fresh water, including the stickleback, diving spider, archer fish, kelpfish, jellyfish, ctenophore, angler fish, decorator crab, and fiddler crab. Disney. j-s. OSU AV (4023) \$7.75.

Sensitive Sockeye

30 minutes, color. 1958.

Life cycle and the effect of dams on the salmon runs. UBC CCE available only in B.C. \$3.50.

Shrimp Please

21 minutes, color.

Methods used by the Louisiana and Mississippi shrimp fishing industry. j-s-c. NMFS TI free.

Shrimp Tips from New Orleans

14 minutes, color.

Shrimp recipes are prepared. General audiences. NMFS MRS free.

Simple Plants—The Algae

17 minutes, color. 1962.

Biology program; Plant life. The variation of algae in size and character. Performance of important functions; providing basic food supply for nearly all aquatic animals and generating large amounts of oxygen for the atmosphere. Commercial uses including cosmetics, food, and possibly in space exploration. s. OSU AV (4120) \$7.75.

Sockeye Odyssey

14 minutes, color.

Life cycle and conservation of Alaskan sockeye salmon. Experiments by U.S. Fish and Wildlife biologists. j-s-c-a. UA AV. NMFS MRS free.

Sounds in the Sea

16 minutes, color. 1955.

Events during World War II leading to the discovery that fish produce sounds. The findings of an undersea biological expedition. Sea life heard over hydrophones. i-j-s. UBC CCE available only in B.C. \$3. OSU AV (4192) \$7.75.

Sponge-Treasure from the Sea

14 minutes, color.

The story of the natural sponge industry of Tarpon Springs, Florida. Underwater sequences. General, schools at all levels. All adult groups. i-j-s.

NMFS MRS free. NMFS TI free.

Starfish Realm

14 minutes, color. 1971.

Starfish and other aquatic creatures. Both lab and ocean setting. Discusses starfish, anemone, sea slug, and other water creatures. Shows lab encounter between crab and octopus.

UW LH \$8.25.

Stinging-Celled Animals: Coelenterates

16 minutes, b&w. 1962.

IU film. Shows coelenterates in their natural underwater habitats. Shows anemone, hydra, Portuguese man-of-war, and jellyfish. c.

UC MC \$9.

Story of Menhaden

20 minutes, color.

Story of menhaden fishery showing the uses, methods of capture, and processing of the fish. General.

NMFS MRS free.

Strange Partners: Symbiosis in the Sea

11 minutes, color. 1968.

Living world of the sea series. Explanation of mutualism, commensalism, and parasitism with natural scenes demonstrating each of the categories of symbiosis. Pearlfish living within a sea cucumber; the neon goby cleaning the gills and mouth of the moray eel. Ecological effects of "cleaning stations" upon the area. j-s-c-a.

UC MC \$13. OSU AV (9193) \$5.75.

Survival Factor: Defense Mechanisms in the Sea

12 minutes, color. 1970.

CCM film. The defense mechanisms of sea creatures in deep water and at the bottom of the sea. Shows speed, countershading, disruptive coloration, weapons, etc. j-s.

UC MC \$13. OSU AV (9195) \$7.75.

Take a Can of Salmon

14 minutes, color.

Recipes in film included in recipe booklet, "Take a Can of Salmon." Attractive salmon meals in six typical American cities. General adult.

NMFS MRS free. NMFS TI free.

They Share the Sea

18 minutes, color. 1972.

The importance of the ocean and interdependence of plant and animal life using the resources of the sea. Overview of OSU's Sea Grant College activities. i-j-s-c-a.

OSU AV (9555) \$2.25.

Three Fishermen

28 minutes, b&w. 1964.

NFBC film. Compares the lives of fishermen in Greece, Thailand, and Canada. Shows differences in fishing and lives of fishermen in the three countries. j.

UC MC \$11.

Tide Pool Life

11 minutes, color. 1947.

The more unusual species of marine life found near rocky shores and tide pools. Detailed study of mussels, whelks, sea anemones, sea urchins, and abalones. Shows source of food and means of protection for tide pool life. Elementary version. p-i-j.

UC MC \$10. OSU AV (4490) \$5.75.

Tides of Fundy

15 minutes, color. 1964.

Study of causes and effects of the tidal bore.

UBC CCE available only in B.C. \$3.

Tides of the Ocean

16 minutes, color. 1964.

What tides are: how the sun and moon cause them; man's use of them. Partially animated. i-j.

OSU AV (4491) \$7.75. UW LH \$7.

To Catch a Meal: Feeding in the Sea

12 minutes, color. 1969.

Living world of the sea series. The wide range of eating patterns of several species: the barnacle snaring the cilia, the angler luring the victim, the sea horse's use of vacuum, the man of war's use of venom, and others. Includes the octopus, a number of predators and scavengers. j-s.

UC MC \$13. OSU AV (9196) \$7.75.

Transportation: A Ship Comes Home

16 minutes, color. 1965.

The complexity of modern ocean transportation. The exact maneuvers, expert timing and alertness to shifts of wind and current. i-j.

OSU AV (8601) \$7.75.

Treasure Under the Sea

24 minutes, color. 1966.

Smithsonian series. The story of a ship up to the time of her sinking. The work of archaeologists in unraveling the secrets of the sea. i-j.

OSU AV (4560) \$9.50.

Tuna Fishing

11 minutes, b&w. 1947.

Paul Hoefer productions. Describes the tuna fishing industry; shows a tuna clipper's cruise to the fishing banks of Central America, with scenes of fishing near the Galapagos Islands. Pictures preparation of poles, lines, and squid, the gathering of bait, catching the tuna by hook and line and pulling the fish aboard the boat. i-j-s-c-a.

UH AV (F-490).

Tuna Fishing

11 minutes, color. 1962.

Revision of the Paul Hoefer production of this film distributed by Bailey-Film Associates. How tuna fishing is a way of life for many families living in fishing ports on the Pacific Coast. Looking for schools of fish in Coastal waters from Washington state to South America. Polefishing and purse seining as two systems used to catch tuna. i-j-s.

OSU AV (4612) \$5.75.

Tuna Packing

11 minutes, b&w. 1947.

Paul Hoefler Productions. Shows the processing of tuna from the unloading of the frozen fish until it is ready for marketing—the unloading, cleaning, inspecting, packing, and shipping of the canned tuna and its by-products. i-j-s-c.

UH AV (F-487).

Tuna Packing

11 minutes, color. 1962.

Revision of the Paul Hoefler production of this film, distributed by Bailey-Film Associates. The process of packing tuna from the time the fish are checked by the government inspectors until the white meat is packed in cans by automatic machines. How the fish are handled before they are packed. i-j-s.

OSU AV (4613) \$5.75.

Undersea World of Jacques Cousteau

(series of six films)

A well-known series.

i-j-s-c-a.

UA AV.

Underwater Safety: Effects of Pressure on the Human Body

15 minutes, color.

The dangers inherent in skindiving, particularly with reference to the bends. Explains the U.S. Navy Standard Compression Table in timing decompression stops. j-s-c-a.

OSU AV (4654) \$7.75.

University of Hawaii

10 minutes, color. 1967.

Shows the unusual aspects of the University such as the fruit fly Laboratory at the Pineapple Research Institute, volcano studies; Asian music and instruments; and the newly developed field of marine biology at Coconut Island. j-s-c.

UH AV (F-537 4c).

Vermillion Sea Expedition: Hydrographic Work

13 minutes, color. 1963.

Follows two research vessels of the Scripps Institution of Oceanography to the Gulf of California. Shows the hydrographic crew at work and gives detailed methods of gathering data. c-a.

UC MC rental \$10. Sale \$130.

Water's Edge

13 minutes, color. 1965.

FL film. Natural water forms from a melting icicle to pounding waves shown. This study of natural water forms is set to a flowing musical score. i-j-s.

UC MC \$11.

Waves Across the Pacific

32 minutes, color. 1967.

The nature of ocean waves and their loss of energy from the time they are set in motion by Antarctic storms to their arrival on the coast of Alaska. Sites for wave stations, including FLIP, Floating Instrument Platform, in the North Pacific. s-c-a.

OSU AV (8102) \$11.50. UW LH \$9.50.

Waves in Fluids

33 minutes, b&w. 1964.

Visualizes some of the basic phenomena of wave motions in fluids. Shows one-dimensional surface gravity waves in a 32-foot channel and in a 28-foot flume; demonstrates shallow- and deep-water waves, waves of small and large amplitude. The steepening of compression waves and the spreading of expansion waves. Points out the distinction between particle motion and the wave motion.

s-c-a.

UH AV (F-1380). UW LH \$5.

Waves on Water

16 minutes. 1965.

Interprets the characteristics of waves and wave motion on the sea surface. Identifies wind and underwater earthquakes as sources of wave's energy. How particles in a wave describe circular orbits of a size inversely related to depth.

j-s-c-a.

UC MC color. \$14. UH AV color. OSU AV (4813) b&w. \$5.50. UW LH b&w or color not indicated, \$7.

We Explore Ocean Life

11 minutes, b&w. 1962.

Steve and his father go down under the surface of the water to explore a coral reef and the plants and animals of the ocean floor.

p.

OSU AV (4820) \$4.50.

We Explore the Beach

11 minutes, color. 1955.

Betty and Billy discover many things along the beach; a bird's nest, seashells, and water animals.

p.

OSU AV (4821) \$5.75.

Whales and Whalermen

22 minutes, color. 1957.

Far places series. Follows a whaling expedition in the Indian Ocean off the coast of South Africa. Preparation of harpoon and powder charges, harpooning of three whales and dissection of three carcasses. Economic importance of whaling.

i-j-s.

OSU AV (4860) \$7.75.

Whaling

15 minutes, b&w. 1957.

Tells the story of whaling. Describes the harpooning of the whale and the uses of whale oil. Includes folk songs and dances.

i-j-s.

UH AV (F-486).

What Is a Fish?

22 minutes, color. 1963.

Biology program; animal life. Major types of fish. Evolutionary development of the fish. Habits, characteristics, anatomy, and reproductive processes of many kinds of fishes.

s-a.

UC MC \$11. OSU AV (4889) \$7.75.

What's Under the Ocean?

14 minutes, color. 1960.

Describes various ways in which scientists study the ocean: taking cameras to study plants and animals in shallow depths, and using instruments on research ships to study bottom materials and to map vast areas of the ocean floor. Points out some findings of the scientists.

UH AV (F-893).

Where Land and Water Meet

29 minutes, color. 1958.

Survival in the sea series. The shoreline habitats; the animals that have adapted to the seashore environment and live and reproduce there. General abilities of most animals living in their zone such as sand dwellers and rock dwellers. s-c.

OSU AV (4942) \$9.50.

World of Jacques Yves Cousteau

48 minutes, color. 1967.

FI film. National Geographic series. Account of Conshelf Three, an expedition led by Cousteau. This project site is a small terrace 328 feet below the surface of the Mediterranean. s-c.

UC MC \$29.

World of Little Things

15 minutes, color. 1954.

MIS films. Introduces the student to a whole world of littleness in water. Uses microscope to show little plants and animals. Shows the complexity of the so-called simple forms of life. j-s-c-a.

UC MC \$12. OSU AV (5058) \$7.75.

Your Window in the Sea

15 minutes, b&w. 195?.

Follows the antics of the trained porpoises at feeding time as seen through the spectator portholes at the oceanarium.

UH AV (F-927).

Zonation on a Marine Rock Platform

19 minutes, color.

The various zones on a marine rock formation, the major species that inhabit each zone, and the relationship between the zones. The adaptations made by plants and animals for feeding and clinging in each zone. s-c-a.

OSU AV (9208) \$7.75.

mailing addresses

- NMFS ED Extension Division
National Marine Fisheries Service
Lake Union Building
1700 Westlake Avenue North
Seattle, WA 98109
- NMFS LJ National Marine Fisheries Service
Southwest Fisheries Center
P.O. Box 271
La Jolla, CA 92037
- NMFS MRS Market Research and Services Division
National Marine Fisheries Service
Lake Union Building
1700 Westlake Avenue North
Seattle, WA 98109
- NMFS NFC Northwest Fishery Center
National Marine Fisheries Service
2725 Montlake Blvd. East
Seattle, WA 98102
- NMFS PFPC Pacific Fishery Products Center
National Marine Fisheries Service
2725 Montlake Blvd. East
Seattle, WA 98102

NMFS TI	National Marine Fisheries Service 300 South Ferry Street Terminal Island, CA 90731
OSU AV	Audio-Visual Instruction Division of Continuing Education Gill Coliseum 133 Corvallis, OR 97331
OSU BC	Bulletin Clerk Industrial Building Oregon State University Corvallis, OR 97331
OSU CC	Dr. John Shelton Counseling Center Oregon State University Corvallis, OR 97331
OSU FWL	Department of Fisheries and Wildlife Oregon State University Corvallis, OR 97331
OSU MSC	Donald E. Giles Marine Science Education Specialist OSU Marine Science Center Marine Science Drive Newport, OR 97365
OSU SL	Kenneth S. Hilderbrand OSU Seafoods Laboratory 250 36th Street Astoria, OR 97103
OSU SO	School of Oceanography Oregon State University Corvallis, OR 97331
OSU WH	Courtland L. Smith 228 Waldo Hall Corvallis, OR 97331
OSU WRRI	Water Resources Research Institute Covell Hall 115 Oregon State University Corvallis, OR 97331
PASGAP	Available at UA FEMA; UBC CCE; UC AES; UH SG; NMFS PFPC; NMFS LJ; OSU BC; and UW DMR.
UA AV	Film Library, Audio-Visual Aids University of Alaska College, AK 99701
UA CES	Cooperative Extension Service University of Alaska College, AK 99701
UA FEMA	Fisheries Extension Marine Advisory University of Alaska College, AK 99701
UBC ARE	Institute of Animal Resource Ecology Library University of British Columbia Vancouver, British Columbia, Canada
UBC CCE	Center for Continuing Education University of British Columbia Vancouver 8, British Columbia, Canada

UC MC	University of California Media Center Berkeley, CA 94720
UC DAS	Mailing Room University of California Division of Agricultural Sciences 2000 Carleton Street Berkeley, CA 94720
UC UCP	University of California Press 2223 Fulton Street Berkeley, CA 94720
UH AV	Audio-Visual Center Sinclair Library University of Hawaii Honolulu, HI 96822
UH SG	University of Hawaii Sea Grant Program Marine Programs 255 Spalding Hall University of Hawaii Honolulu, HI 96822
UW DMR	Division of Marine Resources HG-30 University of Washington Seattle, WA 98195
UW FD	Film Division University of Washington Press Seattle, WA 98195
UW LH	Room 114 Lewis Hall University of Washington Seattle, WA 98195
UW UWP	University of Washington Press Seattle, Washington 98195

other sources

Atlases

Marine Atlas of the Pacific Coastal Waters of South America

by Merritt Stevenson, Oscar Guillen, and Jose Esteban Santoro de Ycaza. 1970. 01616-5. Cloth bound.

University of California Press, 2223 Fulton Street, Berkeley, CA 95720

\$40.

Fisheries

Available Leaflets on Fisheries

U.S. Dept. of the Interior. 1969. Fishery Leaflet 626.

National Marine Fisheries Service, Southwest Fisheries Center, P.O. Box 271, La Jolla, CA 92037.

Free.

Fisheries (cont.)

Commercial Fisheries Abstracts

Washington, U.S. Fish and Wildlife Service, Bureau of Commercial Fisheries. V.I.-. 1948-.

A monthly summary of important developments for the fishing industries.

Available for reference from many libraries.

List of Available Publications from the Department of Fisheries and Wildlife, Oregon State University

July 27, 1970. Seven sheets list technical and general reprints, order form included.

Department of Fisheries and Wildlife, Oregon State University, Corvallis, OR 97331.

Free.

Publications Available from the Pacific Fishery Products Center & Environmental Conservation Division, NMFS, Seattle

February 1972. Technical papers, supply limited.

Pacific Fishery Products Center, National Marine Fisheries Service, 2725 Montlake Blvd. E., Seattle, WA 98102.

Free.

Fishes

Fishes of the Pacific Coast of Canada

Fisheries Research Board of Canada. 1961.

Fisheries Research Board of Canada, Sir Charles Tupper Bldg., Ottawa 8, Ontario, Canada.

\$8.50.

Pacific Salmon Literature Compilation

Ed. by Galen H. Maxfield. 1900-59-. Sometimes called the 'Pacific Salmon Compendium,' a misnomer. Original was assembled as duplicate copies of the text pages and used as hard copy.

1,406 articles of original research comprising 17,895 pages from 119 serials, journals, and reports.

Available for reference from many libraries.

Marine Biology

Aquatic Biology and Oceanography—A Selected List of Books

Paul T. Macy and Ida K. Johnson. Reprinted, 1968. Fishery Leaflet 541.

Booklet, 10x8.

National Marine Fisheries Service, Southwest Fisheries Center, P.O. Box 271, La Jolla, CA 92037.

Free.

Marine Biology—Where to Begin

Barbara Tillet. June 1971. OSIC #4.

Lists call numbers, card catalogue subject entries, and titles of materials in University of Hawaii's Hamilton Library.

University of Hawaii Sea Grant Program, Marine Programs, 255 Spalding Hall, University of Hawaii, Honolulu, HI 96822.

Marine Science

Marine Sciences in Scientific American: 1948-1969.
Ronald B. Linsky. Sept. 1969.

Nine-page list of articles.

Don Giles, Marine Science Education Specialist, OSU
Marine Science Center, Marine Science Drive, New-
port, OR 97365.

Free.

Reading in Marine Science

Victor T. Neal and Sally A. Kulm. July 1968.

Booklet, 28 pages. Supply limited.

OSU Bookstore, Oregon State University, Corvallis,
OR 97331.

\$0.35.

Ocean Engineering

Ocean Engineering and Technology—Where to Begin
Barbara Tillet. August 1971. OSIC #5.

Call numbers, card catalogue subject entries, and
titles of materials available from University of Hawaii's
Hamilton Library.

University of Hawaii Sea Grant Program, Marine Pro-
grams, 255 Spalding Hall, University of Hawaii, Hono-
lulu, HI 96822.

Oceanography

*Aquatic Biology and Oceanography—A Selected List
of Books*

Paul T. Macy and Ida K. Johnson. Reprinted 1968.
Fishery Leaflet 541.

Booklet, 10x8.

National Marine Fisheries Service, Southwest Fisheries
Center, P.O. Box 271, La Jolla, CA 92037.

Free.

Films in Oceanography and Related Subjects

Barbara Tillet. July 1971. OSIC #1.

Films are from University of Hawaii's Sinclair Library
Audio-Visual Center.

University of Hawaii Sea Grant Program, Marine Pro-
grams, 255 Spalding Hall, University of Hawaii, Hono-
lulu, HI 96822.

Oceanography: Physical, Chemical, Geological

Barbara Tillet. June 1971. OSIC #3.

Call numbers, titles and subject entries of materials
available at University of Hawaii's Hamilton Library.
University of Hawaii Sea Grant Program, Marine Pro-
grams, 255 Spalding Hall, University of Hawaii, Hono-
lulu, HI 96822.

Readers Guide to Oceanography

Jan Hahn. June 1968.

Hahn of the Woods Hole Oceanographic Institution
prepared the listing in order of increasing technicality.
National Marine Fisheries Service, Southwest Fish-
eries Center, P.O. Box 271, La Jolla, CA 92037.

Free.

Sources of Oceanographic Educational Materials

School of Oceanography, Oregon State University.
March 1970.

School of Oceanography, Oregon State University,
Corvallis, OR 97331.

Free.

Water

Water Films 1965-74

Canadian National Committee.

Catalogue of films on ground water, rivers, oceans, and hydrology compiled by the National Science Film Library of the Canadian Film Institute.

Secretariat, Canadian National Committee, International Hydrological Decade, No. 8 Building, Carling Ave., Ottawa 1, Ontario, Canada.

1

instructions

2

subject index

3

publications

4

audio-visual materials

5

mailing addresses

6

other sources