

BIBLIOGRAPHY

BEGINNING IN THE WATERSHED FOR SEA: Investigating Marine Science - Grade 4

This bibliography has been selected <u>specifically</u> for *Beginning i the Watershed - Grade Four.* A few of the titles listed are out of print, but worthwhile enough for you to check for them in your school and public libraries.

RESOURCES FOR STUDENT INFORMATION

A CLOSER LOOK AT FISH. Keith Banister. Gloucester. 1980.

This brief introduction to fish describes the anatomy and habits of various fish species, illustrated with color.

A DAY IN THE LIFE OF A COMMERCIAL FISHERMAN. John Klein and Carol Gaskin. Troll. 1988.

Explores a typical day in the busy world of commercial fishing. Photographs supplement readable text.

A DAY IN THE LIFE OF A MARINE BIOLOGIST. William Jaspersohn. Little. 1982.

Follows a day at work with a marine biologist. Black and white photographs on every page and the enjoyable text show the biologist teaching, researching, doing field work and enjoying his "hard work in beautiful places".

A DAY IN THE LIFE OF A MARINE BIOLOGIST. David Paige. Troll Associates. 1981.

Follows a marine biologist through her work at an oceanographic institute, while in the lab, diving, doing her research with sea turtles and planning further research.

- THE ATLANTIC SALMON. Bianca Lavies. Dutton. 1992.
 - Exquisite color photographs accompany the well-written text describing the life cycle of the Atlantic salmon. Includes findings from recent research into the salmon's migration pattern which still remains a mystery open for further scientific study.
- COME BACK, SALMON: HOW A GROUP OF DEDICATED KIDS ADOPTED PIGEON CREEK AND BROUGHT IT BACK TO LIFE. Molly Cone. Sierra Club. 1992.

A positive story about a group of elementary students' efforts to save a creek and prepare it for the salmon they were raising at their school. Their experiences are described through color photographs and a narrative which includes actual dialogues between students, teachers and other adults.

- DEEP SEA DIVERS. Tony Hayward. Rourke Dangerous Jobs. 1988.

 Discusses various jobs which require diving skills as well as some of the problems faced in those jobs. Color photographs picture divers at work.
- DO FISHES GET THIRSTY? QUESTIONS ANSWERED. Dr. Les Kaufman. New England Aquarium. 1991.

The New England Aquarium staff answers 26 questions that children have asked about the aquatic world. The focus is questions about fish. Lively, accurate text is combined with full-color photographs.

- DOLPHIN ADVENTURE: A TRUE STORY. Wayne Grover. Greenwillow. 1990. Recounts an interesting true-life interaction between humans and dolphins. Illustrations help heighten the adventure.
- DOLPHINS and PORPOISES. Dorothy Hinshaw Patent. Holiday House. 1987. A general introduction to dolphins and porpoises, highlighting such areas as individual species, life cycles, anatomy, feeding habits, sonar system and social organization.
- DOLPHINS OUR FRIENDS IN THE SEA. Judith E. Rinard. National Geographic Books for World Explorers. 1986.

Focusing largely on animals living in captivity, this magazine-style compilation includes accounts of trainers, handlers, and researchers. Discusses many aspects of the history, physical characteristics and behaviors of dolphins.

FISH. Casey Horton. Watts. 1983.

A well-illustrated volume that introduces fish by types and characteristics.

- FISH, an Eyewitness Book. Steve Parker. Alfred A. Knopf. 1990.

 A wealth of information revealing almost all you ever wanted to know about fish is portrayed in this colorful photo essay.
- A FISH HATCHES. Joanna Cole. Morrow. 1978.

 Black and white photographs illustrate the life cycle of a trout, from the eggs in a hatchery to maturity. How a fish swims, breathes and senses its environment are clearly described in text and photos.
- THE FISHING INDUSTRY. Nancy Warren Ferrell. Watts First Book. 1984.

 Describes commercial fishing including the methods, problems and the outlook for the future. Black and white photographs and drawings supplement the text.
- LIFE ON A FISHING BOAT: A SKETCH BOOK. Huck Scarry. Prentice. 1983. A "travel diary of actual fishing trips" made by the author. Various boats, methods of fishing, catches and other aspects of commercial fishing are skillfully illustrated with the author's numerous pencil drawings.
- LOOKING AT DOLPHINS AND PORPOISES. Dorothy Hinshaw Patent. Holiday House. 1989.

Discusses the characteristics and habits, the family life and intelligence of dolphins and porpoises.

- MONSTER SEAWEEDS: THE STORY OF THE GIANT KELPS. Mary Daegling. Dillon. 1986.
 - This discussion of a kelp ecosystem includes its place in the ocean food chain, its value as a habitat and the harvesting of kelp for commercial uses. Color photographs enrich the informative text.
- (NOW I KNOW) WHAT IS A FISH? David Eastman. Troll Associates. 1982. Describes and illustrates a variety of salt water, fresh water, and migratory fish, including how and where they live.
- POND & RIVER; EYEWITNESS BOOK. Steve Parker. Alfred A. Knopf. 1988. The photographs and informative text of addresses the plants and animals of the pond and river fresh water systems.
- SALMON. Atsushi Sakurai. Alfred A. Knopf. 1984.

 Magnificent color photographs and brief explatory notes document the salmon life cycle.
- SEA RESCUE UNITS. Dag Pike. Rourke Dangerous Jobs. 1988.

 The U.S. Coast Guard rescue units are described and pictured in color photos.

- SPILL! THE STORY OF THE EXXON VALDEZ. Terry Carr. Watts. 1991.

 Discusses the carelessness and neglect that led to a major oil spill in Prince William Sound. The clean-up effort and the long-term consequences of the disaster are discussed.
- SPOTLIGHT ON SEAFOOD. Harry Barrett. Rourke. 1986. In color photographs and text, the methods of the fishing industry are explored. Includes information on conservation and pollution as well as how fish are found, caught, processed and sold.
- WHALES and DOLPHINS; The Concise Illustrated Book. Ray Gambell. Grange. 1993.

A general description of its natural history, a full-color illustration, and a photograph are provided on a single page for each whale and dolphin species discussed.

RESOURCES FOR LITERATURE INTEGRATION

Please be aware that in the more fanciful of these titles, the science content may not be accurate.

- A SALMON FOR SIMON. Betty Waterton. Douglas & McIntyre. 1980.

 An imaginative and magical story of a young boy's rescue of a stranded salmon. The story is perfectly complemented by vivid color illustrations.
- FIGHT AGAINST ALBATROSS TWO. Colin Thiele. Harper. 1976.
 Conflict between the crew of an oil rig near an Australian fishing village and the villagers is the basis for this exciting story. Excellent characterization and engrossing, topical storyline.
- THE FISH FROM JAPAN. Elizabeth Cooper. Harcourt. 1969.

 A young boy's imaginative resolution of the problem of his pet "fish" is told with humor and insight in picture book format with colorful illustrations.
- FISHES. Brian Wildsmith. Watts. 1968.

 In full-color, full-page paintings, Wildsmith portrays schools or congregations of fishes, naming each group with a collective noun. An interesting lead-in to language and art experiences.

THE FISHERMAN AND HIS WIFE: A TALE FROM THE BROTHERS GRIMM. Randall Jarrell, trans. Farrar. 1980.

The folk tale of the fisherman, a magical flounder, and the fisherman's greedy wife is wonderfully portrayed in Margot Zemach's humorous and colorful illustrations.

HERON STREET. Ann Turner. Harper. 1989.

Changes to the natural world which occur as a marsh by the sea is developed for human use are dramatically pictured in Lisa Desimini's stark paintings which accompany a rhythmic text.

- ISLAND OF THE BLUE DOLPHINS. Scott O'Dell. Dell Publishing. 1960. The Newberry Award winning story of Karana, an Indian girl, left behind on a remote island when her people sailed eat. The story of her survival is a tale of natural beauty and personal discovery. ZIA is the sequel to this book.
- LOUIS THE FISH. Arthur Yorinks. Farrar. 1980.

 Louis, a butcher, is happy only when thinking about fish, until he finally becomes a fish! Richard Egielski's intriguing illustrations perfectly match this picture book fantasy. A great catalyst for discussions.
- THE MAGIC SCHOOL BUS AT THE WATERWORKS. Joanna Cole. Scholastic. 1986.

When Ms. Frizzle takes her class to the waterworks, the water purification system is experienced by everyone from the inside. Concepts included are: evaporation, the water cycle, and filtration.

NEPTUNE'S APPRENTICE: ADVENTURES OF A COMMERCIAL FISHERWOMAN. Marie De Santos. Presidio. 1984.

A true adventure story of the author's eight years as a commercial fisherwoman with all the excitement, hard work, fear, humor, beauty and comradeship which is a part of that daily life.

PRINCE WILLIAM. Gloria Rand. Holt. 1992.

A story about one of the seals rescued from the 1989 oil spill in Prince William Sound, Alaska. Provides insight into the volunteers' work caring for animals after the disaster. Watercolors illustrate the story.

SEABIRD. Holling C. Holling. Houghton Mifflin. 1948.

A Newberry Honor Book about a carved ivory gull that is the mascot for four generations of seafarers aboard a whaler, a clipper ship, a steamer, and an airplane.

- SEAL MORNING. Rowena Farre. Scholastic. 1957.
 - Lora is a pet seal who can fetch the mail, unpack the week's groceries and even play tunes on musical instruments.
- SHARK BENEATH THE REEF. Jean Craighead George. Harper. 1989.

A suspenseful adventure story of a young boy whose family has always fished commercially for sharks in the Sea of Cortez. The boy's hunt for a "killer" shark is exciting. The story has a strong ecological background, and George has her science straight.

STORY OF A DOLPHIN. Katherine Orr. Carolrhoda. 1993.

A story, based on a true account, in which a young girl and her father live on an island in the Caribbean and develop a friendship with a dolphin.

WATERMAN'S BOY. Susan Sharpe. Bradbury Press. 1990.

Two boys from a small town on the Chesapeake Bay challenge parental disapproval of people with too much education and of outsiders' interference in their means of earning a living as the boys help a scientist interested in cleaning up the water for the benefit of animals, plants, and people. A story of the Chesapeake Bay crab men and the failing industry.

THE WHITE PALACE. Mary O'Neill. Thomas Y. Crowell Co. 1966.

Against the background of "the White Palace", a delicate structure formed of the bones of two giant fish, this book tells the authentic life story of the Chinook salmon.

RESOURCES FOR TEACHERS & STUDENTS

Included are books, curriculum, media resources, equipment, posters, etc. The books in this list present further information in a more difficult text; even so, many of them will be enjoyed by children for the illustrations and photographs.

BOOKS

FOOTSTEPS IN THE OCEAN: CAREERS IN DIVING. Denise V. Lang. Lodestar. 1987.

Discusses career opportunities in commercial and sport diving, as well as science and research opportunities. Illustrated with black and white photos.

THE MARINE BIOLOGY COLORING BOOK. Thomas M. Niesen. Barnes and Noble. 1982.

An introduction to the major marine environments and their inhabitants. Coloring plates illustrate the organisms in detail and the text explains their life cycles and interactions.

PACIFIC COAST FISH. Ron Russo. Nature Study Guild. 1990.

A guide to marine fish of the Pacific coast of North America featuring detailed black and white drawings. Very helpful for identification of fish and information on fish biology.

PACIFIC SALMON AND STEELHEAD TROUT. R.J. Childerhose and Marj Trim. University of Washington Press. 1981.

A readable, detailed study of the Pacific salmon species and steelhead trout. Complete life histories are explored in text and striking color photographs and paintings, as well as maps and detailed line drawings.

POETRY

A CHILD'S TREASURY OF SEASIDE VERSE. Mark Daniel, (comp.). Dial. 1991.

A collection of verses about the sea from Byron, Shakespeare, Whitman and other British and American writers of the 19th and early 20th centuries.

ALL THE SMALL POEMS. Natalie Worth. Farrar. 1987.

These small poems of familiar, ordinary subjects are perfectly complemented by Natalie Babbitt's small black and white drawings.

- PIPING DOWN THE VALLEYS WILD. Nancy Larrick. Dell. 1968.

 A wonderful collection of poems including many relating to the sea and shore.
- THE RANDOM HOUSE BOOK OF POETRY. Jack Prelutsky, (comp.). Illustrated by Arnold Lobel. Random House. 1983.

 A treasury of 572 poems, many with a marine theme.
- THE SEA IS CALLING ME. Poems selected by Lee Bennett Hopkins. Harcourt. 1986.

A collection of poems pertaining to the sea and seashores. Each poem is appropriately illustrated in soft colors.

CURRICULUM

CLEAN WATER, STREAMS AND FISH: A HOLISTIC VIEW OF WATERSHEDS Elementary curriculum guide. WA State Office of Environmental Education, 17011 Meridian Ave., Seattle, WA 98137. (206) 542-7671.

A comprehensive curriculum on salmon, water quality, stream ecology and environmental impacts of humans.

LIFE CYCLE OF SALMON Curriculum guide and slides to accompany the unit. Project ORCA, Pacific Science Center Explore More Store, 200 Second Ave. N., Seattle, WA 98109. (206) 443-2870.

POSTERS

LIFE STAGES OF A SALMON Poster set. Available from: BCTF Lesson Aids, 2235 Burrard St., Vancouver, B.C. V6J 3H9.

Eight posters illustrate the life stages of a salmon.

MARINE FISHES OF THE NORTH PACIFIC NOAA Poster. Contact: Superintendent of Documents, Government Printing Office, Washington DC 20402-9325.

VIDEOTAPES and SLIDES

FABULOUS WETLANDS Video. Available from WA State Dept. of Ecology, Wetlands Educ. Unit, Mail Stop PV-11, Olympia, WA 98504. (206) 438-7538.

A wacky and entertaining 7 minute video featuring Bill Nye, the "Science Guy", talking about the importance of wetlands.

THE MONTEREY BAY AQUARIUM VIDEO TREASURY. Monterey Bay Aquarium, 886 Cannery Row, Monterey, CA 93940-1085 ph. (408) 648-4850.

Segments in the 69 minute long video tape include: Feeding on the Rocky Shore, Reproduction on the Rocky Shore, The Kelp Forest, Marine Mammal Introduction, Flukes and Flippers, Voices in the Sea, Seasons of the Squid, Plankton, Behind-the-Scenes: Collecting, and Dive into Monterey Canyon.

OCEANS ALIVE! Video. Available from Environmental Media, P.O. Box 1016, Chapel Hill, NC 27514 1-800-368-3382.

A series of 5 minute programs. Part Two, available in both English and Spanish, contains several good fish segments.

OTHER RESOURCES

DISCOVERY SCOPES. Available from: Discovery Scope, Inc., P.O. Box 607, Green Valley, AZ 85622 (602) 648-1401.

This highly versatile hand-held, wide-field microscope includes an adaptor to hold clear view chambers which can serve as tiny aquariums.

- MAC'S FIELD GUIDES. 2321 -34th Ave. S. Seattle, WA 98144.

 Available for all kinds of marine and terrestrial organisms, Mac's guides are heavy plastic cards with detailed drawings for identification.
- MARINE EDUCATION; A BIBLIOGRAPHY OF EDUCATIONAL MATERIALS AVAILABLE FROM THE NATION'S SEA GRANT COLLEGE PROGRAMS. July 1988. Available from: Marine Information Service, Sea Grant College Program, Texas A & M University, College Station, TX 77843-4115. A highly recommended free resource that includes a state-by-state listing of regional resources, curricula and other materials of general interest.
- THE MONTEREY BAY AQUARIUM ANIMAL SETS and ECOSYSTEM SETS. Monterey Bay Aquarium, 886 Cannery Row, Monterey, CA 93940-1085 ph. (408) 648-4850.

Animal sets include: Marine Mammals (Gr. K-12) and Sharks/Fishes (Gr. 3-12). Ecosystem sets include: Rocky Shore (Gr. K-5), Sandy Seashore (Gr. K-8), Kelp Forest (Gr. K-12), Deep Sea (Gr. 6-12) and Ecology/ Conservation (Gr. K-12). Each set includes materials and activities developed by the aquarium staff.