

Attachment B

Qualifications of William E. Hearn

William E. Hearn  
Summary of Qualifications

Current Position: Fishery Biologist  
Supervisory Fishery Biologist for the Santa Rosa Area Office North  
Coast Team

Address/Telephone National Marine Fisheries Service  
777 Sonoma Avenue, Room 325  
Santa Rosa, California 95404  
(707) 575-6062

Employment History:

11/05 to present National Marine Fisheries Service (NMFS) – Supervisory Fishery  
Biologist  
Supervisor for the North Coast Team of the Protected Resources  
Division.

Coordinate and manage staff engaged in formal consultations under  
the Federal Endangered Species Act, oversight and management of staff  
involved in actions promoting the recovery of listed salmonid species.

7/00 to 11/05 NMFS - Fishery Biologist and Team Leader

Coordinate the activities of the Scientific and Technical Support Team  
for the Habitat Conservation Division of NMFS Southwest Region.  
Activities include management of NMFS water rights program,  
development of guidelines for stream flow diversions, and the  
provision of technical support of NMFS staff concerned with the  
protection of instream flows and water rights issues.

7/99 to 7/00 NMFS - Fishery Biologist and Water Rights Specialist

Review water right applications and prepare NMFS responses to protect anadromous salmonids. Prepare written and oral testimony for hearings and workshops before the State Water Resources Control Board in support of NMFS responsibilities to protect and recover listed salmonid stocks.

1993 to 1999

Kleinschmidt Associates (NH) - Senior Fisheries Biologist

Senior instream flow specialist for a private firm specializing in environmental licensing of hydroelectric projects. Project manager and technical director of diverse fisheries assessments, most of which concerned impacts of hydroelectric project operations on fisheries resources. Managed several large instream flow assessments on rivers in New York, South Carolina, Wisconsin, Maine, and Connecticut.

1984 to 1993

Normandeau Associates (NH) - Senior Fisheries Biologist

Senior fishery biologist for a private firm specializing in terrestrial and aquatic environmental assessments. Company specialist in instream flow assessments and salmonid biology. Conducted numerous instream flow studies and assessments concerned with fish passage at hydroelectric dams.

1980 to 1984

Massachusetts Cooperative Fisheries Research Unit – Fisheries Research Assistant

Conducted doctoral research concerning the ecology and competitive relations of juvenile rainbow trout and juvenile Atlantic Salmon in tributaries of the White River, Vermont.

1978 to 1980

Massachusetts Department of Fisheries and Wildlife - YACC

## Supervisor

Supervised a crew of six young adults engaged in conservation projects within a District of the Massachusetts Department of Fisheries and Wildlife. Conducted extensive stream habitat surveys and stream habitat mapping.

1977 to 1978

Massachusetts Department of Fisheries and Wildlife - Hatchery Technician

Performed fish hatchery duties related to rearing juvenile coho salmon, and catchable sized rainbow trout, brown trout, and brook trout.

1974

Cortell Associates (MA) - Asst. Aquatic Biologist

Acted as the principal fisheries specialist in the preparation of an EIR concerned with impacts of water diversions on anadromous fish species. Conducted field sampling for diverse environmental projects. Assisted with laboratory testing of water quality.

## Education:

Ph.D., 1985 - Wildlife & Fisheries Biology, University of Massachusetts-Amherst

Master of Science, 1978 - Biology, with fisheries emphasis, University of Massachusetts-Dartmouth

Bachelor of Science, 1973 - Wildlife Biology, Unity College

## Special Training:

Managing Environmental Quality: Air, Water, Energy, 1979; Harvard University. 1979.

Techniques of Fisheries Biology, University of Massachusetts, Amherst; 1980. Taught graduate course emphasizing technical writing, field techniques, and age and growth analysis.

Habitat Evaluation Procedures (HEP) Certification, 1984; U.S. Fish and Wildlife Service.

Instream Flow Incremental Methodology (IFIM) courses, IFG 200, 205, 210, 215 (1984-1986); U.S. Fish and Wildlife Service.

At request of the USFWS Instream Flow Group, taught IFG 205 course: Field Techniques for Stream Habitat Analysis. National Fisheries Academy, Leetown, WV; September 1986.

#### Professional Affiliations:

American Fisheries Society -- member of the AFS Committee on Standards of Professional Conduct; Peer reviewer of journal manuscripts

#### Selected Publications and Presentations:

Hearn, W.E. 1979. Behavioral interactions between juvenile coho salmon, *Oncorhynchus kisutch*, and juvenile Atlantic salmon, *Salmo salar*, in a still-water environment. M.S. Thesis, Southeastern Massachusetts University, Dartmouth, MA 72 p.

Hearn, W.E., and B.E. Kynard. 1983. The care and feeding of weirs in a Vermont stream. 40th Northeast Fish and Wildlife Conference, Mt. Snow, VT.

Hearn, W.E., and B.E. Kynard. 1984. Competition between juvenile rainbow trout and Atlantic salmon in the White River of Vermont. 41st Northeast Fish and Wildlife Conference, Ocean City, MD. (Received Best Student Paper Award)

Hearn, W.E. 1985. Competition between rainbow trout, *Salmo gairdneri*, and Atlantic salmon, *Salmo salar*, in tributaries of the White River, Vermont. Ph.D. Dissertation, University of Massachusetts, Amherst, MA.

Hearn, W.E., and B.E. Kynard. 1986. Habitat utilization and behavioral interaction of juvenile Atlantic salmon and rainbow trout in tributaries of the White River of Vermont. *Can. J. Fish. Aquat. Sci.* 43:1988-1998.

Hearn, W.E. 1986. Interspecific competition and habitat segregation among stream dwelling trout and salmon: A review. *Fisheries* 12(5):24-31.

Hearn, W.E. 1988. Development and application of habitat suitability index curves for landlocked Atlantic salmon, *Salmo salar*, for use in IFIM. Atlantic International Chapter of the American Fisheries Society, Annual Meeting, Sargentville, ME.

Simmons, R.A., and W.E. Hearn. 1991. Radio telemetry assessment of a downstream fish bypass and turbine mortality of Atlantic salmon smolts at the Lowell Hydroelectric facility. Annual Atlantic Salmon Workshop, Rockport, ME.

Hearn, W. 1997. Use and limitations of the Instream Flow Incremental Methodology. Presentation and panelist for the Special Session: Applied Science Paradox - the instream flow example;

implications for fisheries managers. 53 Northeast Fish & Wildlife  
Conferences, Framingham, MA.