

Dwight A. Webster

February 2, 1919 — November 9, 1986

The lake's quiet water is spackled with oranges and reds from a setting sun. In the dark shadows cast by surrounding spruce, a mayfly emerges on the surface. It pauses to launch into the air for its mating flight. Before it can do so, a large, streamlined shape flashes to the surface and with popping jaws engulfs the mayfly. The fish turns on its side. A pattern of gleaming olive, gold, and crimson is visible for a fleeting instant. The knowledgeable observer knows that a brook trout has begun its evening feeding.

This scene, repeated many times on more and more lakes, owes much to Dwight A. Webster, professor emeritus in the Department of Natural Resources, who died on November 10, 1986. His career was dedicated to studying the biology and management of salmonid fishes, especially the brook trout, a native species of eastern North America highly prized by anglers and admired by all who know its distinctive beauty.

Recently Dwight's colleagues were discussing plans for a comprehensive research program on recreational fisheries in the Adirondacks. One offered an insightful comment: "When Doc began his studies on brook trout in the mid-1950s, fishing was so poor he could experimentally manipulate a body of water and its fish community virtually any way he wanted to. Now, however, fishing's so good there would be strong resistance to any kind of study that threatened to alter an existing fishery, albeit temporarily!" This marked change-about is a great tribute both to Dwight Webster's research and to his dedicated interest in having findings applied in new management practices.

To those of us who were fortunate enough to work directly with Dwight Webster, his most impressive characteristics were an unwavering interest in his beloved salmonids and the meticulousness with which he applied the tools of his science to understanding them better. He was a scholar in the fullest sense. Dwight worked under a long-term plan that brought fish genetics and modern fish culture together with needs to conserve rare native strains, improve angling, and even meet the crisis of populations threatened with extirpation by atmospheric pollution. At any time he could explain where his work stood with respect to long-term goals.

Dwight's contributions to fishery science began with his studies of rainbow trout strains, the smallmouth bass fishery, and lake trout population dynamics in New York's Finger Lakes. Focusing principally on Cayuga Lake, he achieved noteworthy success in reestablishing a lake trout fishery here through a carefully thought out, closely monitored program of stocking. This reliance on fish culture was necessary in Cayuga Lake because the traditional spawning grounds of lake trout were destroyed early in the century by siltation.

During the latter thirty or so years of his career the focus of Professor Webster's scientific interest was the brook trout. The ubiquity and dominance of this fish in Adirondack waters ensured its role as both indicator and principal victim of lake and stream acidification, an insidious form of pollution first identified as a problem for North American waters by Carl Schofield, now senior research associate in natural resources, who at that time was one of Dwight's graduate students. As more and more brook trout habitat became degraded by this phenomenon, Dwight's expertise came to the fore in seeking understanding of what was happening and in the search for solutions. As an active researcher working on communities in the affected ecosystems, he was able to shift critical aspects of his studies to embrace objectives that served acidification-related questions. The research he initiated and inspired continues and represents a splendid example of scholarly research put to use in coping with an environmental crisis.

Dwight was a natural scientist in every sense. He knew this state's geology, its plants and its animals, and especially how they related to lakes and streams and the communities they contained. He observed and thought about the multitudinous interactions of fish, zooplankton, and insects that comprise aquatic communities. His research and teaching were based on the questions he developed and the conclusions he reached from direct experience with the lakes and streams he loved so much. Indeed, he developed special interest in the recolonization of fishes in Adirondack waters following glaciation, and, to better equip himself for his inquiry, took courses in glacial geology.

Many of Dwight's friends and colleagues will be frequently reminded of him through his legacy of artistic works. These include both black-and-white and color photographs, the trout flies he tied so professionally, and hand-painted mounts of fish that convey strength, motion, and beauty. As with so many truly gifted people, he combined scientific knowledge and acute powers of observation with a talent for artistic expression.

Dwight Webster was a Cornellian in every sense. His education included a bachelor's (1940) and a doctoral (1943) degree from this university. In 1942 he began his career as a teacher with a post in entomology as an instructor of limnology. By 1946 he was an assistant professor of fisheries, still in entomology, where he resided until our Department of Conservation (now the Department of Natural Resources) formed in 1948. Rapid promotion to associate professor in 1949, and full professor in 1957, followed. He was awarded emeritus status subsequent to his retirement in January 1986.

Throughout his nearly fifty-year association with Cornell Dwight played a full role as a member of the faculty and as a member of the fishery science profession. From 1967 to 1972 he served as chairman for the Department

of Natural Resources and in 1979 was selected to receive the Outstanding Teaching Award from the College of Agriculture and Life Sciences. We had special esteem for his high academic standards. Professorial recognition included the Trout Conservation Award (1965) from Trout Unlimited and a Professional Award of Merit (1979) from the Northeast Division of the American Fisheries Society, a group of colleagues he served in several capacities. He was a member of Sigma Xi and Phi Kappa Phi.

Offices and appointments Dwight held also attest to the respect accorded by his peers. He was a member of the Scientific Advisory Committee to the Great Lakes Fishery Commission; symposium coordinator for a landmark international symposium, "River Ecology and Man"; and a counselor on the management of many privately owned fishing waters in the Adirondacks. The Adirondack League Club at Old Forge, which was one of his principal research sites, granted him honorary membership.

Professor Webster published some seventy-five technical and popular articles during the course of his career. Most notable were those dealing with his research describing the development of in-strain hybrids of brook trout and several scholarly works recounting and analyzing observations on New York's fish and fisheries made by some of this state's earliest explorers and men of learning, such as, for example, Dewitt Clinton.

He also wrote extensively for widely read semitechnical publications such as *The Conservationist* to communicate his research to a broad audience of those who care and use the resources he studied. He collaborated closely with New York State's cadre of fishery biologists over the years and in effect maintained important sectors of salmonid investigation cooperatively with our state resource agency.

Many of Dwight's former students attained positions of prominence in their profession and have substantively affected the development of fishery science and management. Their careers reflect the influence of a mentor who demanded much and who shared both his knowledge of, and dedication to, the goal of scientific fishery management.

About a year before his death Dwight Webster organized an endowment at Cornell, the Adirondack Fishery Research Fund, to insure support for continued research leading to improved scientific management of fisheries in that region. Former students, colleagues, and especially the anglers with whom he worked have shown the esteem they felt for Dwight and the respect they had for his dream through their generous contributions to this fund.

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