

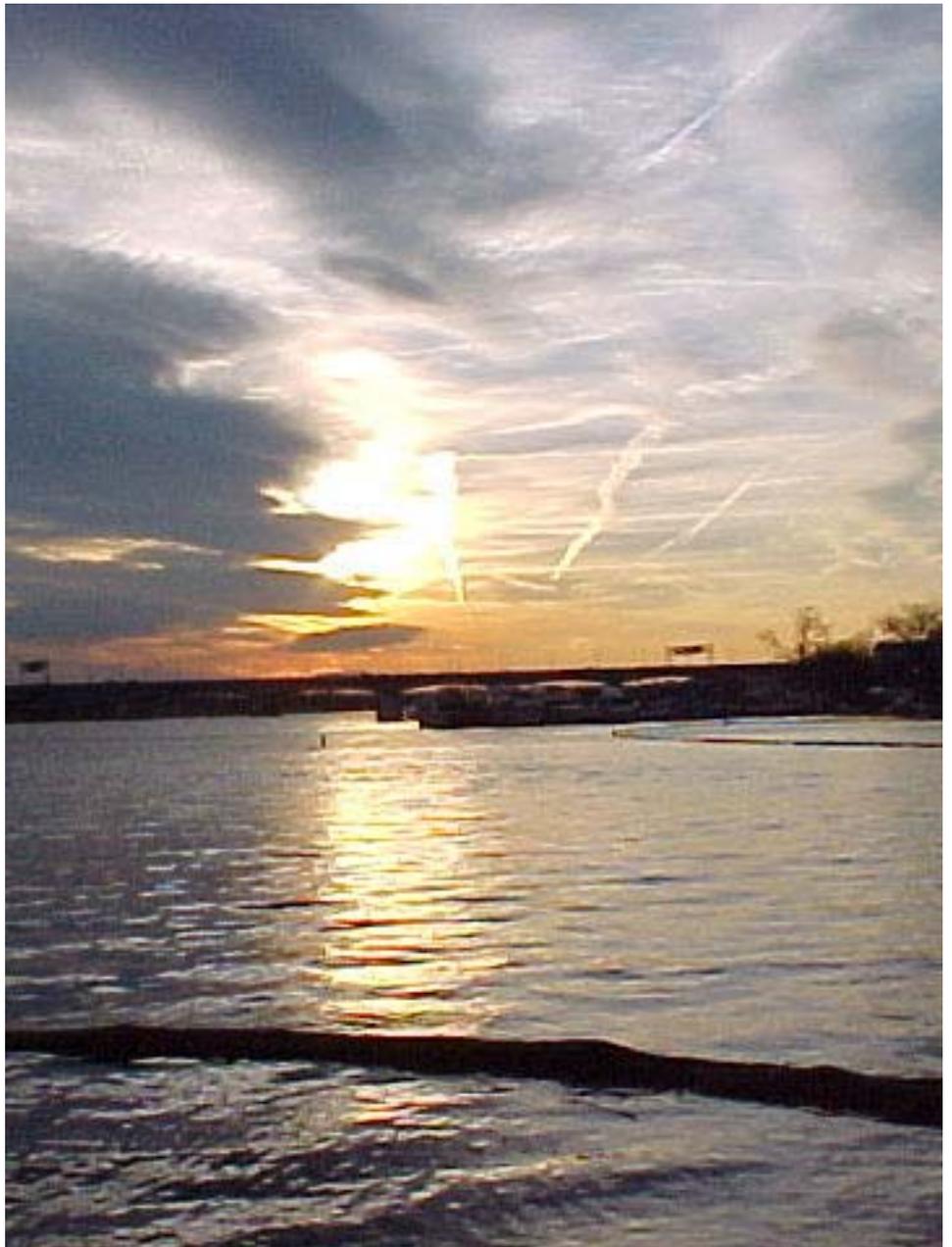


U.S. Fish & Wildlife Service

Chesapeake Bay Field Office

Environmental Contaminants Program

Overview



Who we are Since 1984, the Chesapeake Bay Field Office Environmental Contaminants Program has investigated contaminant issues and worked to protect and restore natural resources in the mid-Atlantic states and the District of Columbia. The Chesapeake Bay Field Office is located at 177 Admiral Cochrane Drive, Annapolis, MD 21401. The field office is staffed with approximately 50 biologists and support personnel. Directions to our office are on our web site: www.fws.gov/chesapeakebay

What we do The mission of the Chesapeake Bay Field Office Environmental Contaminants Program is to identify and prevent harmful containment effects on fish and wildlife, and restore resources degraded by contamination in the Chesapeake and Delaware watersheds. We accomplish this mission through scientific investigations, technical assistance and on the ground response to oil and chemical spills. The staff has a fleet of boats for sampling on the bays and tributaries. We maintain sampling equipment that allows us to collect various media, both chemical and biological, for our field studies. We work with the U.S. Fish and Wildlife Service's, Analytical Control Facility's contract laboratories who provide state-of-the-art chemical analyses with a rigorous quality control program. Our ability to conduct a variety of studies is enhanced through collaborations with scientists from federal, state and local agencies and academic institutions. The following page lists broad categories that define our experience and expertise. For a more thorough discussion of recent projects, visit www.fws.gov/chesapeakebay/ecpubs.htm.

Areas of Experience and Expertise

Site Investigations/Contaminant Monitoring/Ecological Risk Assessment

- Amphibian abnormality investigations
- Aquatic toxicology
- Contaminant bioavailability and bioaccumulation
- Contaminant effects on avian reproduction
- Fish biotelemetry
- Fish tissue analysis and interpretation
- Fish tumor and biomarker studies
- *In situ* bioassays
- Military and former military site investigations
- Population modeling
- Rapid bioassessment protocol surveys
- Sediment Quality Triad Studies

Oil and Hazardous Waste Spills

- Coordination of wildlife rehabilitation
- Critical habitats assessment
- Designing compensatory restoration
- Documentation of wildlife injury
- Habitat equivalency analysis
- Natural resource damage assessment
- Oil and hazardous materials spill response and planning

Water Quality Issues

- Chesapeake Bay Regions of Concern
- Clean Water Act and Endangered Species Act reviews
- Pesticide impacts on non-target species
- Total Maximum Daily Loads
- Knowledge of Water Quality Standards in Delaware, Maryland and DC

Equipment and Capabilities

- Backpack electroshockers
- Gill and fyke nets, seines, minnow and eel traps, and otter trawls for fish collection
- Fleet of small water craft including an electroshocking boat
- Geographic Information System capability

- Global Positioning Systems
- Sediment sampling gear–Ponar, Ekman, Hand Corer
- Statistical software
- Surveying equipment
- Water Quality Instruments – including long-term data sonde units

Capabilities Within the Chesapeake Bay Field Office

We frequently draw on the experience of other staff within our office. Projects often require an interdisciplinary approach to work from contaminant assessment through restoration and monitoring. Within the Chesapeake Bay Field Office, our colleagues provide expertise in the following areas:

- Aquatic ecology
- Avian monitoring
- Beneficial use of dredged material
- Coastal habitat protection and restoration
- Ecology and conservation of herpetofauna
- Education and outreach
- Endangered species consultation and recovery
- Fish passage
- Graphics and publication development
- Habitat restoration
- Highway impact assessment
- Hydrology
- Invasive species management and policy
- Landscape and watershed-level conservation planning
- Mammal ecology and conservation
- Migratory bird issues
- Native plant landscaping/Bayscapes
- Private land protection and restoration
- Public relations
- Raptor behavior and conservation
- Soils assessment
- Stream assessment, design and restoration
- Submerged aquatic vegetation monitoring
- Water supply project consultation
- Web site design
- Wetland assessment, design and restoration
- Wetland permitting review

We also work closely with the Maryland Fisheries Resource Office, located in our building, on a variety of fisheries investigations.

*Counting lead shot in samples
from a trap and skeet range,
Patuxent Research Refuge,
Laurel, Maryland*



*Stream survey site, Patuxent
River Naval Air Station,
Maryland*



Site of PCB cleanup, Occoquan Bay National Wildlife Refuge, Woodbridge, Virginia



Surveying wetlands for abnormal frogs, Great Swamp National Wildlife Refuge, Basking Ridge, New Jersey



Effects of non-target mosquito spray study on the Salt Marsh, Bombay Hook National Wildlife Refuge, Smyrna, Delaware

Chalk Point oil spill, Patuxent River, Maryland

