

Accelerated Chesapeake Restoration through Multi-Objective Targeting

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The Chesapeake Bay Program (CBP) is a unique regional partnership that leads and directs Chesapeake Bay restoration and protection efforts. The 2014 Chesapeake Bay Watershed Agreement established 10 goals and 31 outcomes that guide the actions of the partnership. The topics addressed by these goals and outcomes often relate to place-based management of fisheries, habitats, water quality, and watersheds.

The CBP partnership spends about \$1.2B annually on activities toward achieving the goals of the Watershed Agreement, with a traditional focus on water-quality improvement. Recent funding increases, including the Bipartisan Infrastructure Law, provide additional opportunities to accelerate progress toward multiple Watershed Agreement outcomes while simultaneously achieving state and local benefits. A science-based approach to target resources, including these funding increases, is needed to use decision-support tools wisely and identify places to more effectively advance multiple outcomes and benefits.

In collaboration with CBP partners, including the U.S. Environmental Protection Agency (EPA) and the National Oceanic and Atmospheric Administration (NOAA), the U.S. Geological Survey (USGS) has developed a web-based portal that contains a wide range of existing decision support tools that can be used to target resources. The portal is an ArcGIS Hub implementation with integrated and cross-linked web mapping applications. The information is organized around several topics based on the goals of the Chesapeake Bay Watershed Agreement: (1) accelerate water-quality improvements, (2) improve fish, wildlife populations and habitats, (3) expand land conservation efforts, and (4) increase benefits to people, with all topics considering opportunities to enhance climate resiliency.

This presentation will provide an overview of the portal, sample use cases for selecting and applying several decision-support tools, and a description of how the Portal can be used for multi-objective ecosystem management.

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