

Symposium Organized by Andrew Turner (CRC), Derek Orner (NMFS) and Karen Terry (UMN)

Title: Making the Connection Between Land, Water, and Sustainable Fisheries: Management Beyond the Aquatic Zone

Date: Tuesday, August 21, 2012: 8:00 AM-3:00 PM

Symposium Description: This symposia will feature some of the latest research in the Chesapeake Bay region as well in the Upper Midwest that has addressed or is involved with explaining the connection between land use and fisheries. Bringing this issue to a national level will provide us with a better idea of the links between fisheries and land based activities as well as the actions taken in the upper Midwest to effectively engage land based decision makers and increase the prioritization of fisheries in the planning process.

-The section begins at 8AM with an introduction from Tim Cross with the Minnesota DNR. Mr Cross will describe the perspective of a fisheries manager and why this connection is necessary to effectively manage aquatic resources in any region.

-Peyton Robertson will give an introduction to planning in a plenary session devoted to touching on a few of the necessary steps behind the land based planning process. This presentation will provide an overview to those who may not be familiar with the way things work along the land to water interface.

-NCBO staff will give a short presentation explaining the regional importance for this connection in our Watershed and describe how the Chesapeake region is a unique system with the intersection between agriculture, vibrant commercial and recreational fisheries, population expansion, and critical habitat.

To follow will be presentations by

1. Jim Uphoff MDDNR (30) minutes

On land use influences on fish habitats on Mattawoman Creek.

2. Margaret McGinty MDDNR (15) minutes

Links and the application of impervious surface thresholds to fisheries management.

3. Rochelle Seitz (VIMS) 15 Minutes

Mechanisms determining patterns in fish and crabs associated with development in Chesapeake Bay: Bottom up control.

4. Alison Anderson (University of West Virginia)

Fish Community Response to Natural Landscapes and Anthropogenic Stressors: Application of Biological Condition Gradients in West Virginia Watersheds.

5. Denise Breitburg (SERC)

The indirect and direct impact of land use, dissolved oxygen, on fisheries species.

6. Dave Secor (UMCES)

Good Fish in Bad Habitats: Conceptual and Empirical Challenges in Linking Land-Use Practices to Coastal Fisheries Management.

7. Mathew Kornis (SERC)

Relating Community Composition, Abundance, Growth, and Condition of Aquatic Macrofauna to Watershed Land Use and Shoreline Alteration in Chesapeake Bay

8. Alison Bowden (TNC)

A “Stronghold” Approach for River Herring: Landscape-Scale Conservation Strategies for the Wild and Scenic Taunton River Watershed

To follow we will have a series of presentation from the upper Midwest.

1. Deb Swackhamer (UMN)

This presentation will introduce the upper Midwest and explain the regional need and specific challenges of the upper Midwest in making the connection between land use and fisheries.

2. Dana L. Winkelman(CSU)

Response of Fathead Minnow Populations to an Exogenous Estrogen.

3. Timothy Cross (MN DNR)

Identifying the Influence of Anthropogenic Land use on Phosphorus Levels in Minnesota Fishing Lakes for Prioritizing Conservation Efforts

4. Dan Jaynes (USDA)

Saturating Riparian Buffers for Improved Water Quality

5. Shahram Missaghi (UMN)

From Rainfall Patterns to Streamflow Hydrodynamics and Lake Water Quality

6. Jesse Schomberg (MN Sea Grant)

Engaging Community Officials to Improve Aquatic Resources

7. John Bilotta (UMN)

The Watershed Game – Advancing Beyond the Shoreline and Making the Land Use to Water Connection Using Effective Education and Public Engagement