Fish Habitat Quarterly Meeting Minutes Tuesday, September 20, 2016 1:00 pm – 3:00 pm

Materials: http://www.chesapeakebay.net/calendar/event/24304/

Participants:

Bruce Vogt Julie Devers Matt Ogburn
Emilie Franke Kara Skipper Paige Hobaugh
Jennifer Greiner Karl Blankenship Tom Ihde

Main Takeaways:

- The Habitat and Fisheries Goal Team Chairs met recently to discuss priorities, overlapping goals, and potential points of collaboration, resulting in recommendations for a joint full GIT meeting and a shared project.
- Work will resume on the TetraTech Habitat Matrix Executive Summary.
- SERC, ACFHP, and FWS continue to make progress toward Chesapeake Bay fish habitat projects.
- A student project and GIT-funded project will test forage sampling gear for use in a larger-scale citizen monitoring project focused on SAV monitoring and fish monitoring in shallow-water habitats.
- A shoreline and tidal wetland project proposal is being developed to evaluate the impact of tidal wetlands on fish productivity, identify trends, and determine the implications of current pressures on wetland habitat. This project would primarily be a synthesis and communication effort to provide more focus on tidal wetlands.

Meeting Discussion:

I. Review of June Meeting

We last met in June to kick off our recently published Workplans and hear a presentation from the TetraTech team which compiled habitat stressor/threat literature on 13 lesser-studied species suggested by the Fish Habitat Action Team. This September meeting was designed to review what actions we're currently engaging in, and to discuss how we might coalesce on a group-wide project to focus our efforts and advance our goals. At our last meeting, we agreed to meet quarterly to discuss this work and future work.

II. Habitat and Fisheries GIT Chairs Meeting

The Sustainable Fisheries and Habitat Goal Implementation Teams (GITs) organized a meeting for the GIT Chairs to discuss our overarching goals, outcomes, respective goal team structures and operation. Christine Conn (MD DNR) and David Whitehurst (VDGIF) serve as the Habitat GIT Co-Chairs and Peyton Robertson (NOAA) serves as the Sustainable Fisheries GIT Chair. At the meeting, the GIT Chairs discussed the possibility of having a joint meeting in spring 2017, awareness building and messaging, moving fish habitat issues to the Chesapeake Bay Program Management Board, and potential collaboration on a tidal wetlands and shoreline project.

III. TetraTech Matrix Executive Summary

Background: TetraTech developed two matrices based on a proposal from the Fish Habitat Action Team. These matrices were designed to provide a summary of habitat stressors and threats for 13 lesser-studied species selected by the team. The team selected these species to avoid being duplicative of existing information and to encompass numerous habitats within the watershed from freshwater to tidal habitats. In addition to developing a habitat matrix and an early life stage habitat matrix, TetraTech drafted one-page literature reviews for each selected species to summarize their findings.

Action: Kara will resume populating the fish habitat executive summary.

Development of Executive Summary: Fish Habitat Team members, Margaret McGinty and Lee Karrh began developing an executive summary in response to the TetraTech research. This executive summary is intended to function as a one-page document to report TetraTech's findings and simplify which stressors have effects on the studied species in an easily digestible format that can be utilized by land planners, fishery managers, and other stakeholders. Kara Skipper is currently restarting this effort based on the previous version.

Next Steps to Utilize TetraTech Products: The full Fish Habitat Team should provide input on how their organization would use this product and what potential applications could be served by an executive summary. There is support for the condensed version of the matrix, and to summarize the effects of each stressor. It was noted that this document is similar to the <u>Atlantic Coastal Fish Habitat Partnership Fish Habitat (ACFHP) spreadsheet</u>. The ACFHP Species Habitat Matrix was not used to populate the TetraTech matrices, however it could be used to inform future usage and as a supplemental data source. Julie suggested that Marek Topolski as a contact to discuss the ACFHP Species Habitat Matrix. Suggested uses for the finished summary are to help target efforts or funding, and to develop connections across Chesapeake Bay Program teams. A future goal would be to develop mapping efforts based on the available data.

IV. Reengaging the Fish Habitat Action Team

The team is interested in bringing more voices to the table to better direct our efforts, support our members, and move towards achieving the Fish Habitat Outcome. Recommended reengagement could include a "Map Day", where participants develop maps to inform and drive action within the group. The team will initiate more proactive outreach through early planning with doodle polls, and reaching out with phone calls.

Action: Paige will review the Habitat GIT and Fish Habitat Action Team membership lists to cross-reference which members fall into both teams.

MEMBER UPDATES

V. SERC Efforts: Anadromous Fish Habitat Modeling, Oyster Reef Ecosystem Services (ORES)

The Smithsonian Environmental Research Center (SERC) is continuing their work to develop an anadromous fish habitat model. Related to this effort, Louis Plough (UMCES-Horn Point) is developing a rapid, cost-effective technique to determine habitat use for freshwater fish in streams. Another ongoing SERC project is their Oyster Reef Ecosystem Services project which includes work with GoPro video to monitor bottom habitat. This effort could be very informative as a citizen science project. In addition, SERC recently launched a new website which will eventually include more video materials. Currently, users can view video on the Choptank River.

VI. Fish and Wildlife Service and Atlantic Coastal Fish Habitat Partnership Updates

The US Fish and Wildlife Service (FWS) is currently working on two major projects related to fish habitat using Hurricane Sandy funds: Bloede Dam removal and Centerville Dam removal. Bloede Dam is expected to have construction begin in one month. Funding from the National Fish Passage Project will provide support for smaller projects that will target culvert and fish passage work. FWS is also working to develop a culvert assessment through Northeast Atlantic Aquatic Connectivity Collaborative. Jennifer suggested better collaboration with Natural Resources Conservation Service on culverts that are located on agricultural lands.

The Atlantic Coast Fish Habitat Partnership (ACFHP) recently closed the request for proposals and would like to find methods to better reach out to the Chesapeake Bay for future work. ACFHP's steering committee reviewed their strategic plan in mid-October to determine how their objectives could change, and if their focus could include shellfish restoration. To identify priority threats, ACFHP will map data from their Habitat Matrix. They are aiming to get complete the Southeast portion the end of the year, and the Northeast by late

spring 2017. Chris Guy may be a helpful contact to discuss oyster restoration work for the incorporation of oyster reefs as habitat. Small scale projects can provide great opportunities for improving recreational fisheries.

Action: Bruce will connect Julie Devers with oyster restoration contacts.

VII. GIT-Funded Citizen Monitoring Project

A GIT-Funded proposal was funded by the Chesapeake Bay Program and is open for application under the Chesapeake Bay Trust's RFP. The project builds off of Brooke Landry (MD DNR) and JJ Orth's (VIMS) work to identify and document species abundance and distribution of Submerged Aquatic Vegetation (SAV). This project includes a pilot study which will function to test forage sampling gears, including benthic cores and fish traps, to sample forage species in shallow water habitats. Initial efforts will primarily focus on Riverkeepers and watershed organizations. We expect that this project may grow into a more expansive group for citizens to monitor the Bay watershed. Tom suggested that the Izaak Walton League can expand their current database for citizen monitoring efforts to include the efforts through this RFP as it becomes more developed. Details for this project are still forthcoming. Matt recommended making considerations early on to determine the collection, organization and distribution of citizen science data.

VIII. Saint Mary's College of Maryland (SMCM) Forage Sampling Project

A student at SMCM is developing a 2-semester long project in collaboration with the Chesapeake Bay Program to test forage sampling gear in various habitats in the St. Mary's River, including tidal marsh, areas directly adjacent to rip rap, and in areas with woody debris. The project is currently being refined by the student, professor, and CBP contacts. The end product will be a report and presentation on the efficiency, ease-of-use, and practicability of a variety of forage sampling gear in these habitats and an analysis of how the gear can be incorporated into a citizen monitoring project. The SERC Chesapeake Bay Barcode Initiative could be helpful in identifying invertebrate species for projects such as these.

Action: Kara will keep the Fish Habitat Action Team informed of the progress at future quarterly meetings.

IX. Shorelines and Tidal Wetland Project Proposal

This is a project to get the team to coalesce around a specific topic. Tidal wetlands are a gap in the Chesapeake Bay Program. The Wetlands Workgroup primarily focuses on wetlands that are further upstream. Tidal wetlands are experiencing pressure from the land by development, and pressure from the water due to sea level rise. The project aims to identify available shoreline and tidal wetland data, evaluate trends, and illustrate what is known about the impact of losing tidal wetlands. Through this project, we aim to tell a story of what this means for fish habitat and how this can apply to the Bay jurisdictions. Julie is interested to see a conclusive report on the impacts of shoreline hardening on avian, land and aquatic life. Tom noted that these shoreline modifications and alterations to tidal wetlands are often a tradeoff, benefitting some species while negatively affecting others. Matt stated that this project could highlight the areas of shoreline research that are still needed for a comprehensive analysis.

Action: Kara and Paige will develop a description of the proposed Shoreline and Tidal Wetland project and a description of the SERC study results.

X. Management Strategy

In the <u>Fish Habitat Outcome Management Strategy</u>, we had identified the major factors influencing Chesapeake Bay habitats. Emilie reviewed the full table and identified factors influencing which appeared in multiple habitat classifications. Land use change/urbanization and climate change/sea level rise appeared frequently for each habitat type.