Midwest Association of Fish and Wildlife Agencies: Climate Change Technical Working Committee Report

June 2022

Meeting Time and Place

Committee met by conference call on February 18, 2022.

Attendance:

There were 8 states in attendance: MI: Chris Hoving; MO: Jacob Westoff; NE: Caroline Jezierski; SD: Eileen Dowd Stukel; IL: Leon Hinz; MN: Jim Leach, Michael Larson; IA: Katy Reeder; WI: Tara Bergeson.

Executive Summary:

The committee met once over the past year, to address a request by Midwest Climate Adaptation Science Center (CASC) to prioritize research needs.

Director Action Items:

1. none

Director Information Items:

 The MAFWA Climate Change Technical Working Committee was asked by the Midwest Climate Adaptation Science Center (CASC) to prioritize the list of research needs that were developed last year for the AFWA Science and Research Committee. The CASC continues to be very responsive to the needs of state agencies, both in proactively asking us what we need, as well as funding research projects to address those needs. Below are the highest priorities identified by the Midwest states.

Time and Place of Next Meeting:

In 2022-2023, the committee will meet at least twice by conference call.

MAFWA Climate Priorities: June 2022

In response to Midwest Climate Adaptation Science Center (CASC) request for prioritizing science and research management needs, the MAFWA Climate Change Committee submits the following high priority research / management needs:

Priority Level	Science Priority	Category
High	5.9. Inform the design of monitoring programs to detect and respond to climate change	Barriers to and opportunities for adaptation
	1.6. Evaluate the potential of natural lands to moderate extreme rainfall and flooding	Heavy precipitation events and drought
	5.2. Advance climate-informed optimization of protected lands for fish, wildlife, and ecosystems	Barriers to and opportunities for adaptation
	3.5. Assess the effects changes in connectivity on wetland/aquatic ecosystems	Altered hydrological regimes
	3.8. Evaluate the efficacy of in-lake, landscape, and watershed management to protect fish communities	Altered hydrological regimes
	4.6. Identify optimal future habitat for at-risk or priority species	Novel terrestrial landscapes
Medium High	5.1. Assess the feasibility of current and potential ecological restoration goals under future conditions	Barriers to and opportunities for adaptation
	2.5. Assess the effects of phenological mismatch and false springs on at-risk terrestrial species	Loss of winter
	2.7. Identify and evaluate management strategies to facilitate short-term (e.g., microclimate) or long-term refugia	Loss of winter
	1.7. Identify and evaluate management strategies to prepare refuges and parks for extreme rainfall and flooding	Heavy precipitation events and drought
	1.3. Assess potential impacts of extreme rainfall on fish and wildlife management infrastructure	Heavy precipitation events and drought