Update on the GIT-Funded project, "Building a Bay-Wide Climate Scorecard for Watershed Communities"

November 16, 2020

Julie Reichert-Nguyen (NOAA), CRWG coordinator

Background

CRWG FY19 GIT-Funded Project

- March 2020 Awarded contract to RAND Corporation
- May 2020 project start

 Project extended to November 2021 to address delays from pandemic

Project Team







Krista Romita Grocholski











Technical Lead from GIT:

Julie Reichert-Nguyen (CRWG coordinator)

Climate Resiliency Workgroup Staffer:
Breck Sullivan

Project Plan

Runs from May 2020 through November 2021

 Due to COVID-19, adjusted approach from a 2-day workshop to a series of virtual engagements with stakeholder groups

Consists of 4 Steps

- Phase 1: Formation of Steering Committee and Background Research
- Phase 2: Stakeholder Engagement
- Phase 3: Scorecard Development
- Phase 4: Synthesis of Findings and Outreach

We are here

Phase 1 Phase 2 Phase 3 Phase 4

May 2020 Nov 2020 June 2021 Oct 2021 Dec 2021

Deliverables

Phase 1 (completed)

- Project steering committee list (Elizabeth Andrews, Jim George, Julie Reichert-Nguyen, and Breck Sullivan are on the steering committee from CRWG)
- Scorecard literature review
- Engagement strategy memo

Phase 2

- Memo defining targeted audience (ongoing)
- List of invitees for series of virtual small group stakeholder engagement meetings
- Materials and summary of notes from stakeholder engagement meetings

Phase 3

 Draft report to include scorecard approach for inland and coastal communities, recommended geographic scope, metrics, and methods for implementation

Phase 4

Final report

Purpose

- Identification of climate resilience metrics and methodology to track effectiveness of restoration and protection policies, programs, and projects for inland and coastal areas
- Relate metrics to outcomes in the Chesapeake Bay Watershed Agreement in connection with state and relevant local priorities
- Identification of opportunities to improve resilience that benefit natural resources and provide protection to inland and coastal communities
- Help target potential future resources to support climate resilience actions where needed

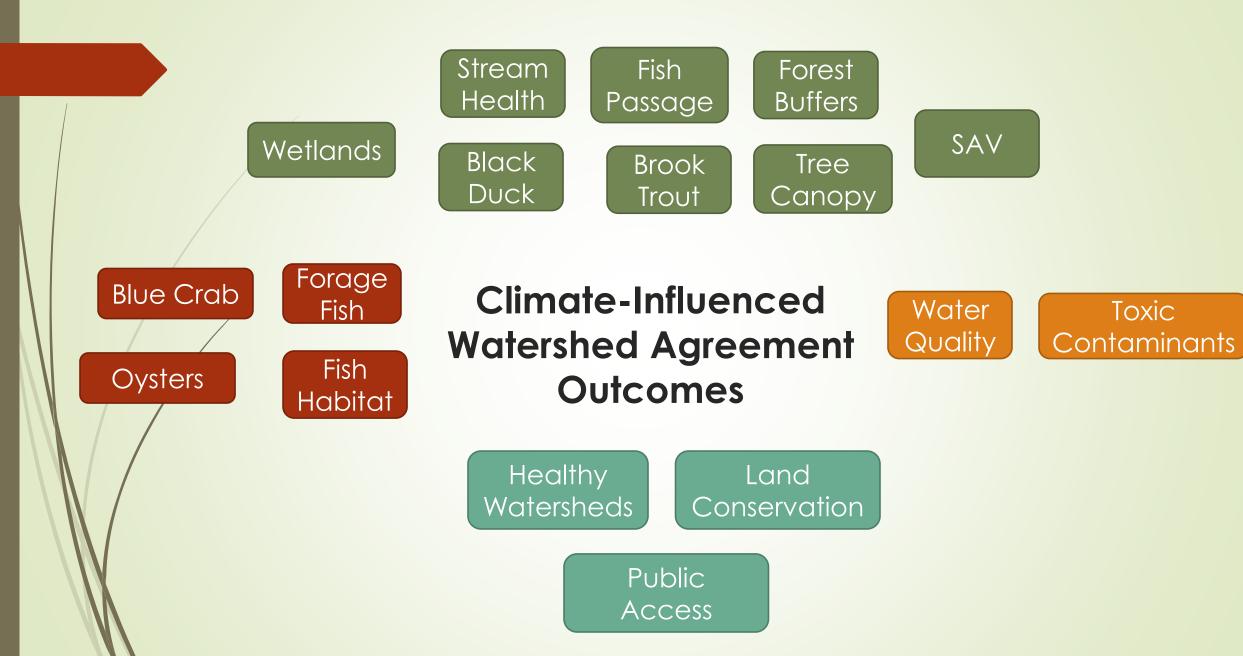
Targeted Audiences

Scorecard End Users

- State governments implementation
 - Agencies already involved in assessing Chesapeake Bay restoration and/or climate resilience progress
- CBP Partnership tracking climate resilience progress and identifying where to target resources

Stakeholder Engagement Meetings

- State agency end users
- CBP Partnership GITs/workgroups
- Local government officials/staff
- Local restoration/conservation planners



Example metric topics from discussions with living resources and habitat workgroups

Physical Indicators (Signals of Change)



Impact Indicators (Ecological and Community Threats)



Climate Resilience Indicators (Preparedness)

Change in Air Temperature

(seasonal shifts)

Change in **Water Temperature** (Streams/Bay)

Change in Precipitation

Sea Level Rise

Ocean/Coastal Acidification

Habitat

- Suitability for key fish (brook trout, forage fish, striped bass) and SAV species
- Fish, SAV, tree species abundance and distribution
- Pathogens/invasives
- Harmful algal blooms
- Wetland/SAV loss

Land-Use

- Population/development increases
- Forest, wetland, marsh fragmentation and loss/change in migration corridors

Seasonality/Phenology Shifts

- Summer abundance of forage fish
- Longer growing seasons (trees)
- Tree mortality from late-season "flash droughts"

Conservation/Preservation

 Restore/protect critical habitat areas in climate resilient locations

BMP Implementation

- Temperature lowering BMPs (e.g., forest buffers) in priority aquatic habitat areas
- Living/hardened shorelines
- Green infrastructure-related BMPs

Species Diversity

(Forests and SAV)

Behavior/Policy Changes

- Shift planting schedules/change species
- Plans that allow for tree/marsh migration