# Changing Environmental Conditions Public Feedback

## Overview of Comments Received

- Clarify language
- Include effects of changing environmental conditions
- Broaden the scope outside of nature-based solutions
- Update date or add intermediate steps
- Request for additional details that would be present in management strategies
- Increase incorporation of changing environmental condition resiliency
- Supportive

# Clarify Language

#### **Comments**

The outcome intent is succinctly captured in the second half of this statement. The first text concepts are identified in the first target statement and unnecessary in the outcome statement. The outcome target linkage is clear and effective this way. (outcome)

"By 2040, increase implementation of adaptation strategies that integrate nature-based solutions in the seven or more subwatersheds."

Is community resilience only cultural and economic? Is there no environmental component to make a community more healthy to live in?

For the Adapting to Changing Environmental Conditions language in the draft Watershed Agreement, the two suggested goals in general make a lot of sense and build on existing activities happening in watershed communities. However, the first bullet point, "By 2040, at least seven subwatershed areas have benefited from knowledge-sharing and technical assistance to identify adaptation options with nature-based solutions" fundamentally only promises to identify adaptation options, not actually implement any of them. I know implementation requires a significant funding investment, but in looking at climate projections by 2050, these adaptations will have to be well underway by 2040 in order to have a positive effect.

Clarify the targets to emphasize that the first is focused on developing adaptation strategies while the second is focused on implementation of those strategies.

This Revised Agreement outcome is a weakened version of that contained in the 2014 Agreement. The 2014 Agreement included references to coastal flooding, more intense and frequent storms, and sea level rise. The updated outcome removes all those terms, electing to use neutral language of "changing conditions," while "balancing long-term resiliency" of communities, economies, and ecosystems. The Revised Agreement includes the following metric: by 2040 at least 7 subwatershed areas have benefited from knowledge-sharing and technical assistance to identify adaptation options with nature-based solutions (emphasis added). To simply identify adaptation options is inadequate. We need action that will keep pace with the changes we are observing. The second outcome metric will lead to "an increase in the implementation of adaptation strategies" in the subwatershed areas. What qualifies as an acceptable "increase"? Would we be satisfied with an increase of 1 or 2 projects over the baseline at the time of the agreement's adoption? These metrics are not strong enough and do not meet the moment. We recommend adopting a firm number of new projects designed to meet the impacts of climate change.

## Include effects of CEC

#### Comments

"By 2040, develop adaptation strategies in at least seven subwatersheds by providing information and technical assistance to identify adaptation options with nature-based solutions. These solutions include restoration and protection projects that will help reduce risks to people, infrastructure and habitats from changes in temperature, precipitation and landscapes."

"changes in temperature, precipitation and landscapes." - Does this include sea/bay level rise and its impact on tidal wetlands? If not, can it be added? Suggest: ""changes in temperature, precipitation and landscapes impacted by sea level changes."

This outcome specifically mentions identifying solutions to the risks of changing temperature, precipitation and landscapes. Will this outcome address sea level rise, flooding, and increased storms?

Is the Adapting section also the best goal to acknowledge and prepare for different environmental or coastal disasters? Should some language or targets explicitly refer to disaster or hazard preparedness?

Adapting to Changing Environmental Conditions should consider clearer language than 'increased resilience,' which is very vague. As this is build out, would suggest language around accelerated sea level rise, (you could capture this as 'shoreline erosion and flooding') this has been an omission since the first agreement and should be rectified here. (in the slides it does define 'changing conditions' so why not put those in the goal language?

Ideally, nature-based adaptation takes into account opportunities for carbon sequestration to help mitigate the impacts from climate change. I would recommend adding language to the first outcome that captures this intent: "By 2040, at least seven subwatershed areas have benefited from knowledge-sharing and technical assistance to identify adaptation options with nature-based solutions. These solutions include restoration and protection projects that will help address risks to people, infrastructure and habitats from changes in temperature, precipitation and landscapes and, where feasible, mitigate the impacts of climate change through increased carbon sequestration.

## Broaden scope outside of nature-based solutions

### Comments

Focusing on just nature-based solutions is a very narrow focus. The Adapting to Changing Environmental Conditions Outcome and target should also focus on decision making on how to address changes, transitions and trade-offs in land use types and habitats, and whether it's better to protect existing uses/habitats or plan to adapt to future conditions.

Under "Adapting to Changing Environmental Conditions", replace the exclusive references to "nature-based solutions" with more general language including but not limited to nature-based solutions. The challenges likely to result from changing environmental conditions will need every available tool available. Nature-based solutions may be fine for some purposes, but not for all of them.

Adapting to Changing Environmental Conditions (Page 14). We suggest changing "nature-based solutions" to "nature-based strategies" to convey that actual solutions may not be possible, but strategies may be able to improve and mitigate certain climate-related impacts.

In the first bullet, we recommend adding, "and innovative technologies and approaches" after "restoration and protection projects" to recognize the need to embrace new technologies that will be needed in addition to nature-based solutions to meet the challenges of adapting to climate change.

To that end, we strongly support the Adapting to Changing Environmental Conditions Outcome and encourage setting targets that aren't tied to specific dates but rather tied to incorporating a One Water approach. By combining implementation that addresses water quality improvements with resilience planning and water quantity, not only will the co-benefits be realized (i.e., improved habitat, increased water quality, improved public health and safety) but the costs of implementation may be consolidated, offering an efficient and holistic approach to restoration. Nature-based approaches alone won't protect against increasing hazards and degrading water quality. We suggest the following revised language for this outcome: "Increase the capacity for pursuing nature-based and hybrid solutions to improve planning and response to changing environmental conditions while balancing long-term resilience for water quality and quantity of watershed communities, economies and ecosystems."

## Update Date or Add Intermediate Steps

### Comments

For the Adapting to Changing Environmental Conditions Outcome, consider whether the two outcome targets should be on different timelines. For example, maybe the first target for identifying focal subwatershed areas would be completed by 2035, and the second target for implementation of adaptation strategies in those areas would be completed by 2040?

Both Adapting to Changing Environmental Conditions Section (P14). Should have intermediate steps to 2040.

Suggest that Healthy Landscapes/Adapting to Changing Conditions targets use 2035 to be more consistent with other outcomes.

Add, "By 2035" to the beginning of each of the Adapting to Changing Environmental Conditions targets.

Consider changing the date in both Adapting to Changing Environmental Conditions targets from 2040 to 2035

## Request for Additional Detail

#### **Comments**

Given how few people know they live in a watershed to begin with, can we not use something apparently as abstract and undefined as 'subwatershed areas'? The nine major basins are commonly recognized as subwatersheds. Can we be more specific? E.g., size of target watersheds to be specific? (target 1)

Adapting to changing conditions - this section is vague and extremely brief. I would expect much more robustness and details here.

Say what we mean - 'workgroup activities' is abstract and ambiguous. I believe the tet can be more explicit, specific and intentional, something like I provide here as my translation of the activities and what that really means in our program work. Please consider being more specific here. Thank you. (target 2)

Adapting to Changing Environmental Conditions: What are the seven sub-watersheds?

The plan seeks to target seven subwatersheds. Further consideration should be given to the subwatershed selection process—will this selection be issue-driven (i.e. selecting areas most vulnerable) or more geographically driven (i.e. selecting an area with multiple issues or an area with low capacity or an area that has not received much Bay Program attention or services in the past?

## Increase Incorporation of CEC Resiliency

#### Comments

The impacts of climate change, such as extreme heat, flooding, and invasive species, impact all our national park sites across the watershed as well as our communities, the Bay and its tributaries. Not only is climate resilience planning critical for water quality, it is important that our communities are resilient and prepared. The Bay Agreement must include updates to the climate resilience goals to prepare and protect our waterways and communities for current and future challenges.

Since climate change threatens Bay restoration, including by adding 5 million pounds of nitrogen annually to the Bay, the Bay states commit to adopting and implementing plans to significantly reduce their emissions of global warming gases and to plan for resiliency to prevent erosion, loss of wetland vegetation, and damage to important infrastructure.

Climate resiliency has been stripped to a footnote

The Bay Program's recently released draft 2025 Chesapeake Bay agreement lacks clear deadlines, fails to directly address non point source pollution, toxic contaminants, and the realities of a changing climate. There is a need for stronger, science-based action.

I am especially concerned that the impacts of climate change, in terms of both warmer water temperatures and rising sea levels, need to be more clearly addressed in future plans.

How are we going to predict and protect from changes that have been happening and will continue to happen in perpetuity? This statement seems to be suggesting climate change but does not say it.

The entirety of the Bay Watershed will be experiencing uncertainty as the climate changes. Increased duration and frequency of rainfall events, rising temperatures, sea level rise, and more intense storms are just a few of the issues facing the region in the next several decades. The Partnership must be poised to assist in future-proofing any investments that not only improve water quality but also aid in establishing resilient communities.

As we experience extreme rainfall and temperatures this summer across the Mid-Atlantic, the Chesapeake restoration effort must continue to adapt to extreme weather events. Increased weather extremes of flooding and drought not only threaten our restoration work, but also put our homes, lives, farms, and economy in jeopardy.

## Supportive

#### Comments

Even as the partnership works to conserve land, farms in the Chesapeake region are increasingly at risk from changing environmental conditions. Increased precipitation and intensifying storms make it more difficult for farms to remain economically viable. Pursuing nature-based solutions to improve planning and response to changing conditions, as called for in the draft, can help better equip our farm communities with the tools and resources needed to address these growing threats.

COG is aware of the increasing impacts of Changing Environmental Conditions and emphasizes the importance of this Outcome in the Agreement.

While the Coalition does not find the current Targets under this Outcome to be 'SMART', we support the continued inclusion of this Outcome.

The goals of the Agreement cannot be achieved without a deep understanding of the impacts climate change is having on the Bay watershed and the ability to meet each goal presented in the Agreement as underscored by the Comprehensive Evaluation of System Response (CESR) report in 2023. We strongly support the continued inclusion of the outcome "Adapting to Changing Environmental Conditions: Increase the capacity for pursuing nature-based solutions to improve planning and response to changing conditions while balancing long-term resiliency of watershed communities, economies, and ecosystems" and enhancing the related targets.