



The Climate Adaptation Fund 2014 Grants Program Applicant Guidance Document

This Applicant Guidance Document is designed to assist potential applicants in both understanding the programmatic priorities of the WCS Climate Adaptation Fund and determining the key elements of a strong proposal. The Applicant Guidance Document serves as a supplement to the Climate Adaptation Fund Request for Proposals (RFP), which contains additional information about the application process.

A strong proposal to the Climate Adaptation Fund will feature a wildlife conservation project with the following characteristics:

- **Designed with climate adaptation as a core goal or outcome of the work;**
- **Conducts on-the-ground implementation, not research or planning;**
- **Focuses on the functionality of ecosystems, rather than conserving individual species;**
- **Proposes conservation goals and actions that are grounded in the best available science;**
- **Designed for long-term conservation impact;**
- **Creates the potential for impact at a landscape scale; and**
- **Serves as a model and communicates learning to other conservation practitioners.**

Below we provide further explanation for each element of a strong proposal.

1. The proposal demonstrates that a project is designed with climate adaptation as a core goal or outcome of the work.

The Climate Adaptation Fund seeks projects designed specifically to address climate change and its impact on wildlife and ecosystems, while working to achieve specific adaptation objectives. Consistent with this focus on project design, the Climate Adaptation Fund seeks projects that are developing or advancing the implementation of management techniques directly informed by climate change science. The application requires all applicants to explain exactly how their project is different from general conservation efforts due to its focus on climate adaptation. Differences might be in WHAT actions you're taking, WHY you have chosen a particular set of actions, WHERE those actions will take place, HOW MUCH of any intervention will take place, or how you have changed your PRIORITIES to take certain actions over others.

For all of these projects it will be critical to show your work by providing the scientific basis and adaptation rationale of the project design. In other words, what are the science inputs (e.g., vulnerability assessments, downscaled climate models, local expert-driven impact assessments) you considered, and how did you use these inputs to evaluate your goals and decide upon actions? It is very important to show how you connect the dots between climate change impacts of concern, the actions you are proposing, and what near- and long-term adaptation outcomes you anticipate will result from the proposed project (e.g., see Table 1 for an example).

Table 1. Example of how to connect the dots between climate change impacts and proposed adaptation actions and outcomes.

Climate Change Impacts	Proposed Adaptation Outcomes	Expected long-term adaptation outcomes
Projections of larger, more frequent floods and subsequent increases in erosion, likely to result in negative impacts on aquatic species and habitat via riverbank destabilization and negative effects on riparian vegetation that currently help shade streams and reduce summer temperatures.	<ul style="list-style-type: none"> • Replace non-native scots pines on riverbank with native species that are better riverbank stabilizers and expected to fare well in future climate. • Rebuild un-vegetated riverbanks with local debris, dirt and native plant species that are good bank stabilizers and expected to fare well in future climate. 	As large floods become more frequent as climate changes, native vegetation will better stabilize the riverbanks, reduce the amount of sediment that enters the stream, and retain shading from riparian vegetation, all of which will benefit a number of aquatic
Warmer temperatures and increased frequency of multi-year droughts likely to increase evaporation and decrease snow pack inputs to streams, thereby reducing base stream flows and causing wetland desiccation.	<ul style="list-style-type: none"> • Halt historic practice of beaver trapping and reintroduce new beaver colonies on the property. • Install a beaver deceiver to protect access roads. 	Beaver activity expands on the property (while minimizing conflict around roads), with the aim of increasing water storage and the extent and diversity of wetland plants and marshes, and decrease wetland susceptibility to multi-year drought. Wetlands will then provide habitat for a diversity of plant and animal species.

Hypothetical example of a project designed with climate adaptation as a core goal:

A project focused on wildlife adaptation in the Northern Rockies is using climate-informed connectivity models, data on impacts of recent climate changes on high elevation habitats, and expert opinion to project future movement patterns for a suite of carnivore species. Based on those analyses, conservation practitioners decided to switch their focus from protecting higher-elevation habitats that will be highly vulnerable to negative impacts of climate change to restoring low-elevation riparian habitats expected to be increasingly important as species are forced to move in and between those low elevation habitats in search of shifting resources.

2. The proposal demonstrates that a project conducts on-the-ground implementation, not research or planning

The Climate Adaptation Fund is designed to support a limited set of conservation projects – those developed specifically to demonstrate tangible, on-the-ground solutions to climate-driven problems. Applications for funds to support conservation-planning activities will not be considered. Conservation and adaptation planning processes that have identified what actions are necessary and where to take them should be completed before the project start date. Also, due to this singular focus on applied, “shovel ready” projects, the Fund is unable to support applications for projects whose primary purpose is to undertake scientific research, data analyses, or vulnerability assessments.

The Climate Adaptation Fund does, however, place a high value on monitoring activities in an adaptive management framework that help inform the efficacy of a climate adaptation project. Grant funds will support data collection as part of monitoring activities to track progress and determine the ecological effectiveness of conservation interventions. The Fund will also support activities to document the processes, tools, methods, and results of the project to share with others (as long as these activities are part of a grant for an applied project, not a stand-alone endeavor).

3. The proposal is focused on the functionality of ecosystems, rather than conserving individual species

The Climate Adaptation Fund is focused on projects designed to promote ecosystem functionality across landscapes, rather than those designed to protect or conserve individual species. Protecting and enhancing ecosystem functions will help conserve the processes and conditions necessary to support current and/or future suites of species. Within this context, the Fund seeks projects focused on accommodating, rather than resisting, climatic changes, and facilitating system transitions to future climate change-induced conditions.

4. The proposal demonstrates that proposed conservation goals and actions are grounded in the latest science

A strong proposal to the Climate Adaptation Fund clearly links proposed conservation activities to climate impacts. These goals, strategies and actions should be supported by explicit scientific rationale. Applicants will be asked to identify and provide literature citations for the specific sources of empirical research, modeling, vulnerability analyses, or other rationale that informs the project's implementation activities. Many organizations work with partners to help identify and apply relevant climate science to their own particular project site or landscape.

In writing your proposal it may be helpful to consider the following questions:

- Is it clear what specific climatic changes the project addresses? For example, rather than referring generally to “climate change”, the proposal should reference specific elements of climate change that are relevant to the design of the project. This can include direct climate influences, such as the consequences of changing precipitation patterns, rising temperatures, or changes in the length of the growing season; or it may include more indirect pressures such as through shifts in human land use or behaviors resulting from climate change.
- Does the proposal clarify what's known about the projections for those impacts and address uncertainty in those projections?
- How has the available science informed the conservation goals and actions prescribed by the project? In what ways has the consideration of climate change altered project goals or actions?
- Does the proposal clarify how uncertainty could affect the outcomes of proposed activities of the project? Proposed projects should articulate how the chosen strategies and actions might fare across a range of possible future conditions, when there are relevant uncertainties in future climate conditions and related ecological and human responses.

A special note on science for projects working to address sea-level rise:

The Climate Adaptation Fund does support projects focused on sea-level rise, but requires additional scientific information to justify project rationale and assumptions. The Fund requires all applicants submitting sea-level rise projects to include spatially-explicit maps demonstrating the long-term sustainability of a project given both 1m and 2m sea-level rise scenarios. Applicants should explain how proposed project sites and construction activities are designed to remain resilient to expected climate-driven storm surge events, as well.

Some common datasets and mapping tools for sea-level rise:

- *CRESIS offers geospatial sea-level rise data available at 1 km (for some areas) and 1.8 km resolution (globally).*
- *The University of Arizona Department of Geosciences provides finer resolution maps (30 m) for the US lower 48 states, using an elevation-based model.*
- *Digital Coast, NOAA Coastal Services Center provides a downloadable SLAMM model (ArcGIS software required).*

5. The proposal demonstrates that the project is designed for long-term conservation impact

The Climate Adaptation Fund seeks to support conservation projects with outcomes expected to remain effective even in an uncertain future. The Fund prioritizes projects addressing functionality of systems likely to persist as climate changes rather than projects aimed at protecting ecosystems that are projected to be highly vulnerable to climate impacts over time. These projects should address adaptation needs now without requiring repeated long-term investments of management resources to maintain habitat conditions, such as through unceasing efforts to prevent encroachment of invasive species or rising sea-levels (see special note above).

Example of a project with the potential for long-term impact:

A non-profit watershed organization is working with state and federal agencies to restore previously degraded habitat for a variety of species that rely on mid-elevation mountain habitats of the Sierra Nevada range in California. Temperatures are expected to increase within the project landscape and species are expected to migrate upslope as their current habitat deteriorates and becomes unsuitable. Climate science suggests that suitable conditions for those species will persist further upslope in the long-term. Restoration activities are therefore targeted for those upslope forest lands to serve as potential future climate refugia for those species.

6. The proposal demonstrates that the project creates the potential for impact at a landscape scale

The Climate Adaptation Fund seeks projects that make a difference at the landscape level, either through landscape-scale efforts, or place-based efforts that directly support broader landscape conservation goals. These are essentially two types of projects. The first type is conducted at a scale that impacts an entire landscape. A project might create land-use designation changes over a large area, connect management practices on private lands to large adjacent public lands, tie together core habitat areas to create a larger connected landscape, include many collaborators, and leverage significant funding resources to take the project to scale. The second project type is a smaller, site-based effort, which implements critical pieces of a larger landscape-wide conservation plan or has the potential to impact the broader landscape through replication of similar practices. These smaller projects may lend themselves to replicability through activities aimed at gaining stakeholder buy-in across a landscape, communicating project success to other conservation practitioners, and gaining public policy support to catalyze similar actions.

Example of a project with the potential for impact at a landscape scale:

In partnership with the Idaho Department of Fish and Game and the U.S. Forest Service, a non-profit conservation organization plans to re-introduce beavers on public and private lands in southeastern Idaho. Beavers will be introduced to eight stream segments identified by a recent climate study as likely to benefit from increased water storage to ensure summer flows for a number of freshwater fish species vulnerable to climate impacts. The study identified an additional 56 stream segments as potential beaver re-introduction sites. Project partners are working to raise additional funding to replicate this project and introduce beavers to additional stream segments across the landscape in future years.

7. The proposal demonstrates how the climate adaptation project will serve as a model and communicates learning to other conservation practitioners

The ultimate goal of the Climate Adaptation Fund is to catalyze managers and practitioners to consider climate adaptation in how we prioritize and implement wildlife conservation actions. For this reason, the Climate Adaptation Fund seeks projects that can relate a compelling story to other conservation practitioners about the development and implementation of a project that addresses climate adaptation solutions for various geographies, habitat types, and conservation outcomes.

Climate adaptation projects can tell a good climate adaptation story in terms of how they were developed and implemented, and what conservation outcomes were realized. These projects serve to build a common knowledge base and a common language among those in the conservation community to support future science,

planning and on-the-ground activities. Communications are an important part of any adaptation project and should contribute knowledge to help build the adaptation field, publicize working models for applied on-the-ground adaptation actions, convene practitioners for shared learning opportunities, and reach stakeholders who are key to your project's long-term success.

This year, for the first time, we are allowing each applicant to allocate up to \$25,000 of their grant request to communications activities. These funds can be used to support a variety of strategic communications efforts aimed at informing other conservation practitioners. These activities should be designed to increase the chances of replicating and broadening adaptation impacts across a region or landscape. Funds can be used to support communication consulting services and partner organizations that specialize in strategic communications. We ask applicants to outline their communications strategy, to write communications-related outcomes into each proposal, and to indicate how these outcomes are expected to influence the adoption of adaptation practices beyond the boundaries of their project area.

APPENDIX

A quick guide to sources of science and information on climate adaptation

General adaptation knowledge and tools

The Yale Mapping Framework offers a menu of approaches appropriate for ecological assessments that support conservation planning in a changing climate. It provides guidance on appropriate strategies for climate-smart ecological assessments and the tools to implement them. <http://www.databasin.org/yale>

The Climate Adaptation Knowledge Exchange (CAKE) is a clearinghouse for a wide variety of information about climate adaptation. <http://www.cakex.org/>

Selected literature

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