

U.S. Fish & Wildlife Service

Strategic Plan for the U.S. Fish & Wildlife Service

Partners for Fish and Wildlife Program
Pacific Southwest Region

FY 2017-2021



Pacific Southwest Region

Partners for Fish and Wildlife Strategic Plan (2017-2021)

Signature Page

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Table of Contents

1	Executive Summary
2	Introduction
4	Strategic Planning
5	Partners Program Ecoregion
7	Strategic Goals
7	Goal 1: Conserve Habitat
13	Goal 2: Broaden and Strengthen Partnerships
15	Goal 3: Improve Information Sharing and Communication
17	Goal 4: Enhance our Workforce
18	Goal 5: Increase Accountability
20	Interim Program Priorities, Ecoregions, and Focus Areas
22	Klamath Basin
25	Great Basin
28	Coastal California
32	Sierra-Cascades
35	Pacific Flyway
38	Warm Desert
40	Schoolyard Habitat
43	References
44	Appendices
45	Appendix A
53	Appendix B

Executive Summary

This strategic plan provides a vision, strategy, and accountability for the U.S. Fish and Wildlife Service's Partners for Fish and Wildlife Program (Partners Program; the Program) in the Pacific Southwest Region (Region 8) for fiscal years 2017-2021. The Partners Program was established to provide habitat restoration projects on privately owned lands to advance the Service's conservation efforts. Its mission is: "to restore, protect, and enhance fish and wildlife habitat cooperatively through voluntary partnerships with private landowners, Tribes, and other entities". The Service strives to implement science-based, sustainable, and economically viable habitat restoration projects through the Partners Program.

This document is the third version of strategic plans for the Partners Program in Region 8. It builds on previous successes while modernizing and coalescing the Program to more formally integrate a Strategic Habitat Conservation-based (SHC) approach into Region-wide operations. These changes will provide an additional layer of scientific rigor allowing a more comprehensive adaptive management approach at both the project- and landscape conservation scales. This plan establishes six Partners Program Ecoregions across Region 8 that mimic the provinces described by Bailey (1991). Several key conservation partners in Region 8 also utilize these Ecoregions as functional units including the states and Landscape Conservation Cooperatives (LCC) among others. This Ecoregions design for the Partners Program will enable more seamless collaboration with conservation partners at the landscape scale while considering similarities within (and diversity among) landscapes. It also enables an SHC framework for the Program across the Region to be created with a systematic, practical, and manageable approach.

This plan describes five goals that are identical to previous Partners Program strategic goals for Region 8: Conserve Habitat; Broaden and Strengthen Partnerships; Improve Information Sharing; and Increase Accountability. The Partners Program transition to an SHC framework at the Ecoregion level using conservation business plans will facilitate accomplishing the objectives and targets under all five goals. Goal 1---Conserve Habitat---is the mainstay of the Partners Program in Region 8, and it sets forth a strategy and framework (Objective 1.1) for continuing habitat restoration projects that contribute to fulfilling the Service's responsibilities to its trust resources. Objectives 1.2 and 1.3 of Goal 1 scope the development of an SHC framework that will be implemented in each Ecoregion to ensure Program compatibility with the predominant landscape conservation efforts in each Ecoregion. These efforts are typically expected to be Landscape Conservation Design projects supported by the Service and the LCCs. The remainder of the goals, objectives, and targets in this plan are designed to support Partners Program functions necessary to implement Goal 1. Again, establishing a formal SHC framework will increase Program capacity to accomplish these goals as well by adding programmatic scientific rigor at the Ecoregion-scale.

Finally, a series of habitat priorities and actions for the next five years was developed for this plan in collaboration with Service practitioners and leaders as well as outside partners from across the Region. The priorities and actions herein are justified ecologically and depicted geographically in the form of Focus Areas. The priorities and actions are considered "interim" largely because this plan sets forth a strategic path for refinement once the SHC framework is developed and Landscape Conservation Design efforts in Region 8 are advanced to address habitat restoration needs.

Introduction

This strategic plan is a vision document designed to guide the U.S. Fish and Wildlife Service’s Partners for Fish and Wildlife Program (Partners Program; Program) within the Pacific Southwest Region (Region 8) for the period (fiscal year) 2017-2021. The mission of the Partners Program is: “to restore, protect, and enhance fish and wildlife habitat cooperatively through voluntary partnerships with private landowners, Tribes, and other entities”. Through this, the Service strives to implement science-based, sustainable, and economically viable habitat restoration projects. In general, these are “natural based solutions” to conservation challenges providing direct, timely, measurable, and lasting benefits to the Service’s trust resources while concurrently improving ecological conditions across the Region.

Region 8 for the Service encompasses California, Nevada, and the Klamath Basin (Figure 1). Conservation threats, issues, and concerns in this geography are diverse, considerable, and widespread. Solutions implemented by the Partners Program require careful thought, coordination, planning, follow-up, and analysis. Restoration ecology and habitat restoration project implementation are the primary practices used by the Program to achieve conservation results. The need for these practices in Region 8 is far greater than can be implemented with available funding and resources in any given year. Therefore, careful project prioritization, continued effectiveness evaluations, and adaptive management are critical to ensuring that the Service’s projects are ultimately meaningful and successful. Partners Program restoration efforts are ideally: (1) aimed at the Service’s highest priority conservation concerns in Region 8; (2) relevant to local, regional, and landscape-scale conservation; and (3) efficiently implemented to produce lasting and sustainable conservation results.

The Partners Program in Region 8 is committed to developing strategies that link priority species and habitat types to broader landscapes. This in line with one of the Service’s national focal points, which involves coordinating strategies across scales with diverse partners using a science-based approach that implements conservation actions, monitors change, and tracks progress. The Service’s emphasis on Landscape Conservation Cooperatives demonstrates the importance and benefits of this coordination at local, regional, and national scales. The Partners Program in Region 8 is committed to continuing its contributions to pursuing landscape conservation objectives in conjunction with the LCCs and the ongoing Landscape Conservation Design projects as much as is practical. This will be accomplished by ensuring that habitat restoration projects are planned and implemented to simultaneously support site-specific goals as well as broader collaboratively developed landscape objectives.

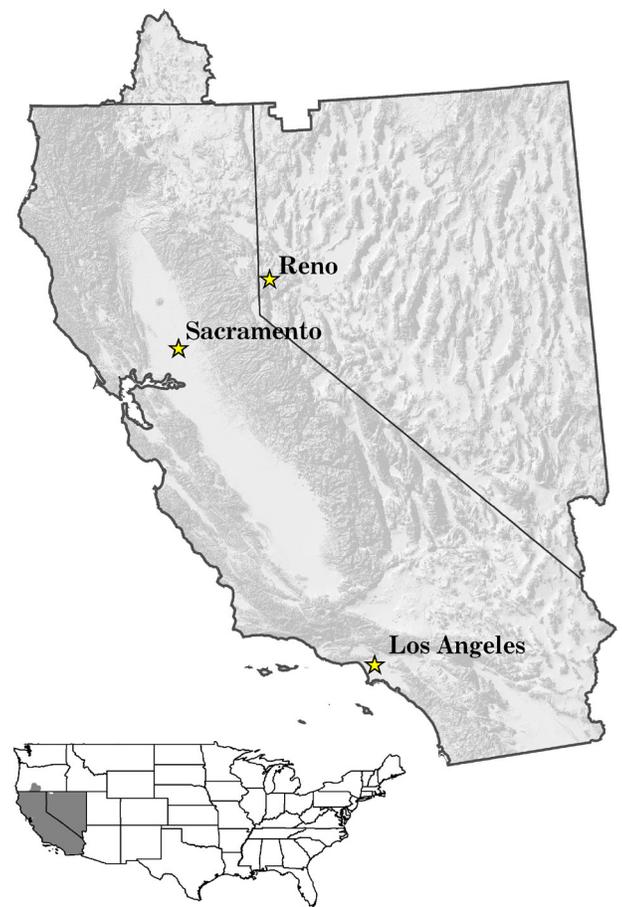


Figure 1. The Pacific Southwest Region (Region 8) of the U.S. Fish and Wildlife Service encompasses California, Nevada, and the Klamath Basin.

Landscape Conservation Cooperatives

The Landscape Conservation Cooperative Network describes Landscape Conservation Cooperatives:

“Managing the landscapes that provide our natural and cultural resources has become increasingly challenging. With the signing of Secretarial Order No. 3289 (https://lccnetwork.org/sites/default/files/Resources/DOI_SecretarialOrder_3289A1.pdf), the Department of the Interior launched the Landscape Conservation Cooperatives (LCCs) to better integrate science and management to address climate change and other landscape scale issues. By building a network that is holistic, collaborative, adaptive, and grounded in science, LCCs are working to ensure the sustainability of our economy, land, water, wildlife, and cultural resources.

The 22 LCCs collectively form a network of resource managers and scientists who share a common need for scientific information and interest in conservation. Each LCC brings together federal, state, and local governments along with Tribes and First Nations, non-governmental organizations, universities, and interested public and private organizations. Our partners work collaboratively to identify best practices, connect efforts, identify science gaps, and avoid duplication through conservation planning and design.” (<https://lccnetwork.org/about/about-lccs>)

Region 8 has four LCC’s operating within and across its boundary:

California LCC
Great Basin LCC
North Pacific LCC
Desert LCC

Strategic Planning

This document is the third consecutive five-year strategic plan developed by the Partners Program regionally and nationally. For the past five years, Program implementation adhered to the 2012-2016 Regional Partners Program Strategic Plan. This previous version identified a broad array of restoration project types implemented primarily in Focus Areas with a wide diverse array of partners. There are five goals listed in that strategic plan to guide Program implementation: (1) Conserve Habitat; (2) Broaden and Strengthen Partnerships; (3) Improve Information Sharing; (4) Enhance Our Workforce; and (5) Increase Accountability.

The purpose of this current national strategic effort is to update the Regional Partners Program strategic work plans and objectives to better address the conservation challenges currently faced by the Service using the same five goals from the previous version. This Region 8 Strategic Plan explains in detail how the Partners Program will utilize conservation philosophy and tools developed and adopted by the Service nationally. The most significant changes in Program strategy associated with this revision are directed towards integrating more effectively with the Service's landscape-level prioritization efforts using a science-based operating framework called Strategic Habitat Conservation. Operating under an SHC approach will enable the Partners Program to more effectively pursue all five established goals in Region 8 simultaneously. It is important to note that the majority of functional changes described in this document compared to the previous Region 8 strategic plans occur in the section describing Goal 1 (Conserve Habitat). These adjustments and revisions ensure that the Partners Program will continue its leadership role in implementing effective and priority habitat restoration projects with private landowners and other partners across Region 8 for the five year period: 2017-2021.

This plan describes a strategic vision that includes implementing the Partners Program following an SHC framework that will function in concert with other Service programs, LCCs, and/or other LCD efforts. This strategy intends to advance the Region 8 Partners Program efforts by:

1. Establishing clear priorities and objectives for project selection and implementation;
2. Creating a conservation business model (as is described in the Strategic Habitat Conservation Handbook (U.S. Fish and Wildlife Service 2008)) that produces results, continually evaluates success, and encourages adaptive management

Strategic Habitat Conservation

Strategic Habitat Conservation (SHC) is an adaptive management framework that supports the Service in delivering conservation through a more strategic and adaptive process (<https://www.fws.gov/landscape-conservation/shc.html>). The SHC framework provides an iterative process that guides management decisions on where and how conservation actions should be delivered effectively and efficiently (Figure 2.1). A key component of the SHC framework is the continued assessment of actions through an adaptive management process to guide future conservation actions.

Functioning under the SHC framework, the Partners Program will be positioned to support larger landscape efforts identified by Landscape Conservation Cooperatives and be integrated into Landscape Conservation Designs as they are developed.

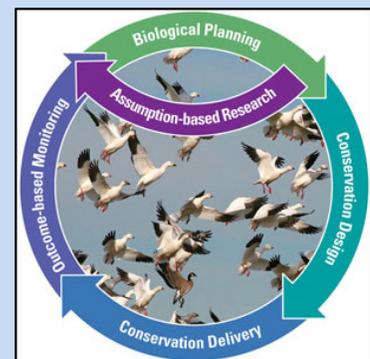


Figure 2.1. Strategic Habitat Conservation Process.

3. Ensuring better project compatibility with the LCD projects and other partner-based landscape scale conservation initiatives; and
4. Improving communication to provide a clear basis for communicating objectives and accomplishments within the Service and especially with partners.

Partners Program Ecoregions

The first step to establishing a functional SHC framework for the Partners Program in Region 8 is to identify landscapes for the Program that align with the predominant landscape-scale planning and science efforts in the Region as closely as practical (i.e., the LCC’s and the State Wildlife Action Plans (California Department of Fish and Wildlife (2015); Nevada Wildlife Action Plan Team (2012)). The Partners Program established six Ecoregions within Region 8 that follow the Provinces described originally by Bailey (1991 with later updates) and are based on geologic and floristic characteristics of these areas (Figure 2). The Partners Program Ecoregions are slightly modified from Bailey’s Provinces (and those used by the LCC’s) to accommodate specific administrative needs for the Partners Program in Region 8. There are then Focus Areas within each Ecoregion where the majority of restoration projects are expected to occur based on established interim habitat restoration priorities (See Interim Program Priorities, Ecoregions, and Focus Areas section).

The main functional purpose of the Partners Program Ecoregions is to create landscapes where conservation priorities, challenges, and opportunities will be similar and closely coordinated within the Program in Region 8. This will enable Partners Program projects to align in support of Service conservation priorities and Trust resources within these landscapes. Ecoregions will also make the Service’s efforts more conducive to collaborating with certain outside partners particularly those operating at the landscape scale. The intent is to create an important link in the prioritization hierarchy that enables Partners Program priorities and accomplishment targets to be set at the Regional, Ecoregional, Focus Area, and project scales simultaneously. For example, use of these Ecoregions will ensure that the Partners Program priorities and objectives align with the LCD Demonstration Projects (U.S. Fish and Wildlife Service 2016) that are collaboratively ongoing in Region 8. These Demonstration Projects will provide the landscape-level backdrop for setting restoration objectives in each Ecoregion. The LCD Demonstration Projects in Region 8 are in development for the Pacific Flyway; Klamath Basin; Sage-Steppe; Southern California and Inland Ranges, and Desert Ecoregions.

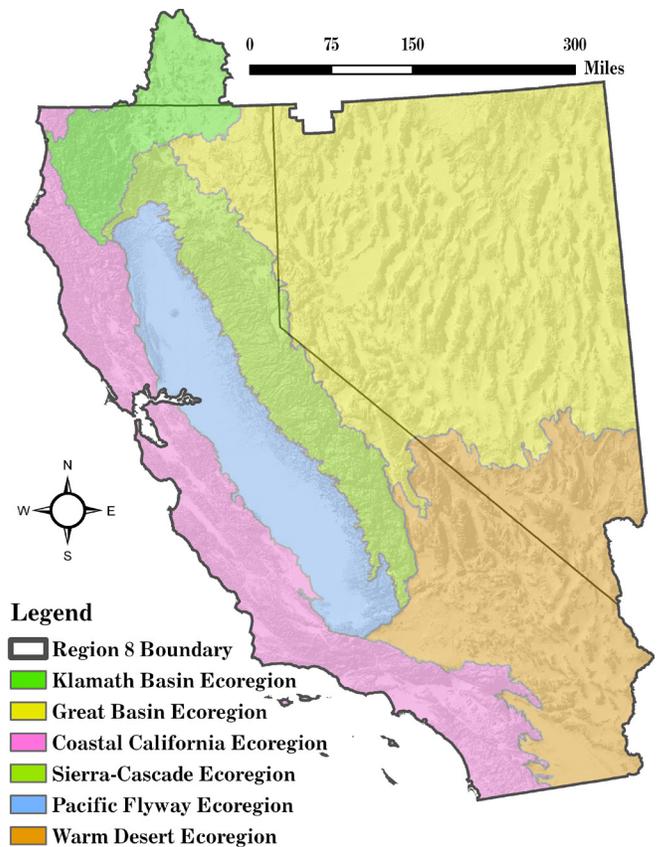


Figure 2. Partners Program Ecoregions within Region 8. These are modified Bailey’s (1991) Provinces and closely align with those in use by the California LCC and the California State Wildlife Action Plan.

Finally, adopting the Ecoregional concept for the Partners Program will facilitate the development of a Region-wide SHC framework that will account for variability among Ecoregions and enable consistent application at a practical scale where conservation issues are similar.

Landscape Conservation Design

The Landscape Conservation Cooperative Network defines and describes Landscape Conservation Design as:

“a partner-driven approach to achieve a sustainable, resilient socio-ecological landscape. It is an iterative, collaborative, and holistic process resulting in strategic and spatial products that provide information, analytical tools, maps, and strategies to achieve landscape goals collectively held among partners. Combining geospatial data, biological information, and models, an LCD identifies opportunities to protect species, habitats, and environmental processes across an entire landscape. A Design can offer guidance for organizations and agencies working at different scales in the same area, and can help foster collaboration among them to achieve shared conservation goals. Designs are often described as living spatial plans or blueprints to conserve natural and cultural resources for future generations.”(<https://lccnetwork.org/issue/landscape-conservation-design>).

The 2017 – 2021 Partners Program Strategic Plan is designed to integrate the Strategic Habitat Conservation (SHC) framework into the Program. The initial step of incorporating the SHC framework into the operation of the Program is the develop Ecoregional Conservation Business Plans. These plans will structure Program operations to contribute to the development of LCDs and allow the LCDs to guide the efforts of the Program.

Strategic Goals

Goal 1: Conserve Habitat

The mainstay of the Partners for Fish and Wildlife Program in Region 8 is planning, designing, and implementing habitat restoration projects on private lands in support of the Service’s local, regional, and national priorities. Two key challenges currently are: (1) determining which restoration projects are most beneficial or have the greatest desired effect in a particular area; and (2) ensuring that completed projects are functioning as intended. In an effort to systematically pursue solutions to these challenges, the Partners Program is committed to developing and integrating a formal SHC framework as an operating foundation for the Program. Operating under this framework will: (1) embed adaptive management as a firm component in the Program’s conservation and restoration; (2) continue the transition away from an opportunistic to a more strategic approach to restoration project selection; and (3) ensure program compatibility with the predominant landscape-scale conservation planning efforts across the Region.

Goal 1 includes a series of three objectives for the Region 8 Partners Program that will: (1) guide ongoing habitat restoration efforts on private lands; and (2) promote a migration toward an SHC operational framework; and (3) improve landscape-level planning that is integrated with LCDs (or other landscape planning effort). For the near term, a set of restoration priorities was established within each Ecoregion that will guide decisions about habitat restoration project development, selection, and implementation across the Region (See section: “Interim Program Priorities and Focus Areas”). Over the longer-term, implementing these objectives will ensure that an SHC framework will be developed, adopted, and executed. This will improve upon and highlight the program’s scientific integrity and strategic capacity from the project-scale to the landscape-scale. It will also enable the Partners program in Region 8 to be maximally compatible with the Service’s LCD efforts as they develop across Region 8 (Figure 3).

Partners and Coastal Programs Habitat Strategic Design Progression: 2017-2021

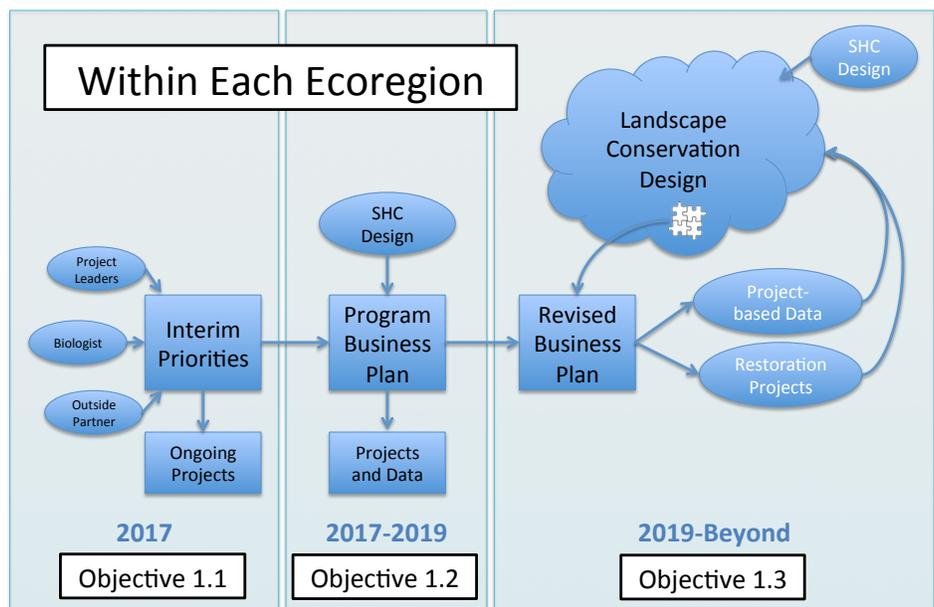


Figure 3. The goal to Conserve Habitat (Goal 1) and its three objectives will be implemented over the next several years using a progressive approach to align priority conservation activities with the relevant Landscape Conservation Designs in each Ecoregion once they are fully established.

Goal 1 Objectives

Objective 1.1. Strategically develop and implement habitat restoration projects with private landowners to support trust resources according to established national, Regional, Ecoregional, and local interim priorities.

Key Strategic Activities:

- Align the Partners Program with LCD efforts (or other landscape plan) by adopting Ecoregions as program geographic units to facilitate the implementation of the Partners Program projects in a landscape context.
- Develop and implement habitat restoration projects according to collaboratively developed priorities in each Ecoregion to the extent listed in the “Interim Priorities, Ecoregions, and Focus Areas” section of this plan.

This objective is to strategically conserve, restore, and enhance key habitats that support or pursue the Service’s priorities and mission in California, Nevada, and the Klamath Basin. The Service priorities are broadly defined in accordance with those listed in the Service’s policy for the Partners for Fish and Wildlife Program (640 FW 1).

In general project priorities target:

1. Federal trust or other priority species. Migratory birds, threatened, endangered, candidate species or species proposed for listing, interjurisdictional fish, marine mammals, other species of concern (e.g., focal or surrogate species) and/or other declining species, as identified by the Service and in other strategic plans. Activities or projects that benefit multiple federal trust species or other priority species will be given higher priority;
2. Expanding priority habitats, reduce habitat fragmentation, establish conservation buffers, and provide wildlife movement corridors. Habitat improvement projects near protected land, including land owned or controlled by the National Wildlife Refuge System, National Forests, National Park Service, U.S. Department of Agriculture, other federal agencies, tribal, state agencies, or nongovernment entities;
3. The National Wildlife Refuge System---Activities or projects that are on private lands near National Wildlife Refuges (Refuges) and complement conservation practices or resolve problems on Refuges that are caused by off-refuge land use practices.

To most effectively implement this objective in a manner that simultaneously pursues the Service’s national and Regional priorities, these project-scale priorities will eventually be based on those more formally established by the LCD (or other landscape-scale planning) efforts within the Region (See Objective 1.3). Completion of an LCD in Region 8 is likely years away in most Ecoregions, and absent LCD-generated priorities for habitat restoration that could be implemented by the Partners Program, a set of interim priorities was developed collaboratively with other Service programs and partners. These interim priorities reflect current resource needs that the Partners Program can best address in each respective Ecoregion. The details related to these interim priorities are presented in the Interim Priorities and Focus Area section of this plan with a more comprehensive list in Appendix A.

To establish these interim priorities, we collaborated with other Service programs and a wide range of conservation partners across the Region. A series of meetings and interviews were held with key Service personnel as well as conservation partners external to the Service in each Ecoregion. Feedback and input were requested regarding where the Partners program can be most effective in a given area. The results of these collaborative discussions were processed by the Partners Program Project Managers (Service personnel

implementing projects and providing technical assistance) in each Ecoregion and collaboratively overlain with administrative goals, capacity, and limitations to develop the interim Partners Program priorities by Ecoregion. These interim priorities will be the baseline for guiding project decision processes in each Ecoregion until the SHC framework is completed and more landscape-scale relevant plans are available in each Ecoregion. Interim priorities are described geographically as Focus Areas.

Focus Areas are an essential component of the interim priorities design in Region 8. They are shown and described in detail in the Interim Priorities and Focus Areas section of this report and are based on locations where projects can be implemented to accomplish conservation objectives while maximizing the effects on the interim priorities in established and functional work areas. In other words, Focus Areas are a geographical depiction of the key areas where project selection and development will be targeted to best implement restoration projects that address the key interim priorities.

Objective 1.2. Establish conservation business plans in each Ecoregion that utilize a landscape-scale Strategic Habitat Conservation framework.

Key Strategic Activities:

- Collaboratively develop conservation business plans in at least four of the six Ecoregions by 2021.
- Establish Ecoregional data management capacity that catalogues relevant data necessary to fully implement an SHC framework in each Ecoregion.

Strategic Habitat Conservation is a key concept that will be a central tenet of the Partners program in Region 8. The SHC framework was adopted by the Service as a recommended approach to conservation implementation and is founded in adaptive management principles (U.S. Fish and Wildlife Service 2008). It operates at multiple scales and “moves away from opportunistic, program-specific activities to an approach that features a strategic focus”. The SHC approach has several elements that align closely with the scientific method with an emphasis on learning from conservation actions. Broadly, the framework involves planning, implementation, and evaluation elements (Figure 4), where “implementation” for the Partners Program includes habitat restoration delivery, and the SHC framework considers these as scientific “experiments” as much as conservation actions.

Previously, the Partners program in Region 8 was appropriately focused on habitat restoration project implementation---the Conservation

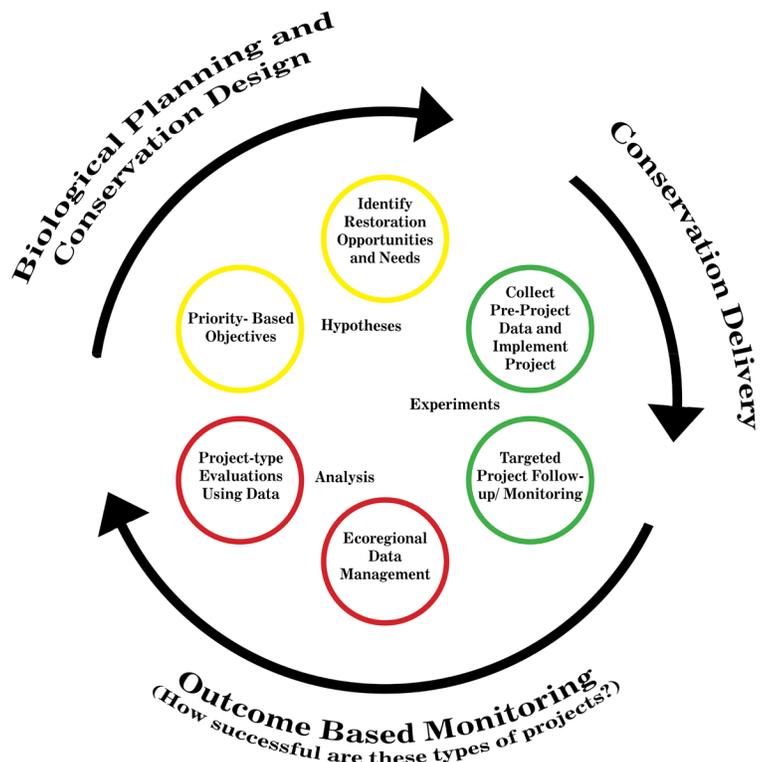


Figure 4. Partners Program habitat restoration project elements are compatible with the Strategic Habitat Conservation framework. Several aspects of the project implementation will be improved and described in Ecoregional Conservation Business Plans. Colors indicate where the Partners Program currently has a well-established process (Green); where some components exist, but more need developed (Yellow); where all components will need developed (Red).

Delivery element of the SHC framework (Figure 4). We now recognize the critical need to consistently include all aspects of SHC in one form or another. This scientific approach is essential as program funding is limited, conservation threats continue to expand, and pressure mounts to demonstrate restoration project relevance and biologically significant outcomes that fit into a landscape-scale context. The Partners Program in Region 8 made previous efforts to work at the landscape scale in conjunction with partners and other programs. This plan will advance and formalize those efforts by working under a formal SHC framework.

Our approach going forward includes developing conservation business plans within each Partners Ecoregion (Box 4). Conservation business plans will have a broad reaching purpose initially within each respective Ecoregion including, but not limited to:

1. Actively anticipating the Partners Program role in the Service's future strategy and effort;
2. Establishing a detailed course for collaboratively developing and operating within in a formal SHC framework that will build on the existing scientific knowledge-base related to habitat restoration projects success and impact; and
3. Providing clarification on expectations regarding funding, roles, and responsibilities for Partners Program personnel and management.

The Ecoregion conservation business plans will be an effort to collectively implement the Partners Program in conjunction with the other Service programs: Refuges, Ecological Services, Fisheries, etc. These plans will help situate the Partners Program in a direction that is more easily coordinated with these other programs as well as non-Service entities thereby maximizing collaborative opportunities and minimizing duplicative efforts, confusion, controversy, and contention. An example business plan for the Klamath Basin Ecoregion is in draft form and attached as Appendix B.

Conservation business plans will fully establish and describe a thorough SHC framework to be implemented by the Partners Program and its Project Managers in each Ecoregion. Future Ecoregion conservation business plans will include:

1. Biological planning components that set clear priorities and appropriate justifications. These should include climate smart objectives and have relevance at the landscape scale as well as the project scale.
2. Conservation designs that are adaptively managed and utilize the results of restoration opportunities analyses.
3. Conservation delivery that includes restoration project design and implementation using goals and objectives that tier directly and clearly to biological planning elements.
4. Implementation monitoring components that are simple to measure (in most cases), standardized by project type, relevant to assessing project outcomes, and compatible with (possible) ongoing effectiveness efforts.
5. Data management plans and structures that enable cataloguing of all project records and data enabling comparison between projects of the same type. Data to be collected include at a minimum: stated goals and objectives, project purposes, design rationale, project design, construction records, as-built surveys, project completion reports, and monitoring data.
6. An evaluation strategy that utilizes collected data to assess project outcomes in reference to stated goals and objectives at the project and (possibly) landscape scales; provides useful information for consideration on future project designs.

Ecoregional Conservation Business Plans

The Region 8 Partners Program Strategic Plan calls for the development of a Conservation Business Plan within each Ecoregion. These plans will provide the operational structure for the Program across the region.

Over the past decade the conservation community has embraced the concept of conservation business models (Keen and Oureshi 2006). In order for a business to remain successful and relevant they must develop a business model that explains their purpose, identifies markets, establishes how they'll operate in these markets, and provides feedback on their activities (Prahalad and Hamel 1990, Drucker 1994, Keen and Qureshi 2006). A conservation business plan can be viewed in the same manner as a business plan.

Structurally, the Conservation Business Plans are the mechanisms from which the goals of the regional plan are met through the action items identified within the individual office action plan (see Figure 5 in the text).

These conservation business plans are intended to establish basic processes for moving toward a more rigorous and unified Program within Ecoregions, which will contribute to creating an enhanced landscape-scale based, strategic, and ideally, successful restoration program for the Service and its partners. Ecoregions will begin developing their plan in 2017 with the expectation that plans will be completed in 2018. Ecoregions will have the flexibility in the development of their plan to ensure it works for their geographic area, but it is expected that all plans contain the same key components.

Key components contained within each plan will be:

- The identification of landscape level resource priorities and objectives necessary to address these priorities
- The establishment of an ecoregional data management process and an ecoregional project monitoring process
- A description of funding allocations from the Regional Office to each ecoregion
- An ecoregion-wide Workforce Plan
- Development of accountability measures; reporting needs; coordination and decision rules; and approaches to revise processes that require changes

References

Drucker, P.F. 1994. The theory of the business. *Harvard Business Review* 70:96-104.

Keen, P. and S. Qureshi. 2006. Organizational transformation through business models: a framework for business model design. Proceedings 39th Hawaii International Conference on System Science. Published on CD-ROM, ISBN 0-7695-2507.

Prahalad, C. K. and G. Hamel. 1990. The core competences of the organization. *Harvard Business Review* 68:79-93

In addition to Ecoregional conservation business plans, Field stations will develop “Office Action Plans” that are compatible with conservation business plans (Figure 5; Box 4). Office Action Plans will articulate how and why each field station will contribute to the overall implementation of the Ecoregion conservation business plan. They will include proposed projects, priorities, accomplishments, and direction for each field station and be evaluated and revised on annual basis. Habitat restoration project accomplishments and metrics will be estimated annually in these documents along with other key contributions that station will make to conservation business plan implementation. Figure 5 illustrates the relationship among Regional Strategic Plan (this document), Ecoregional Conservation Business Plans, and Office Action Plans as a hierarchy or plans that connect local project priorities and objectives to landscape and Regional priorities and objectives.

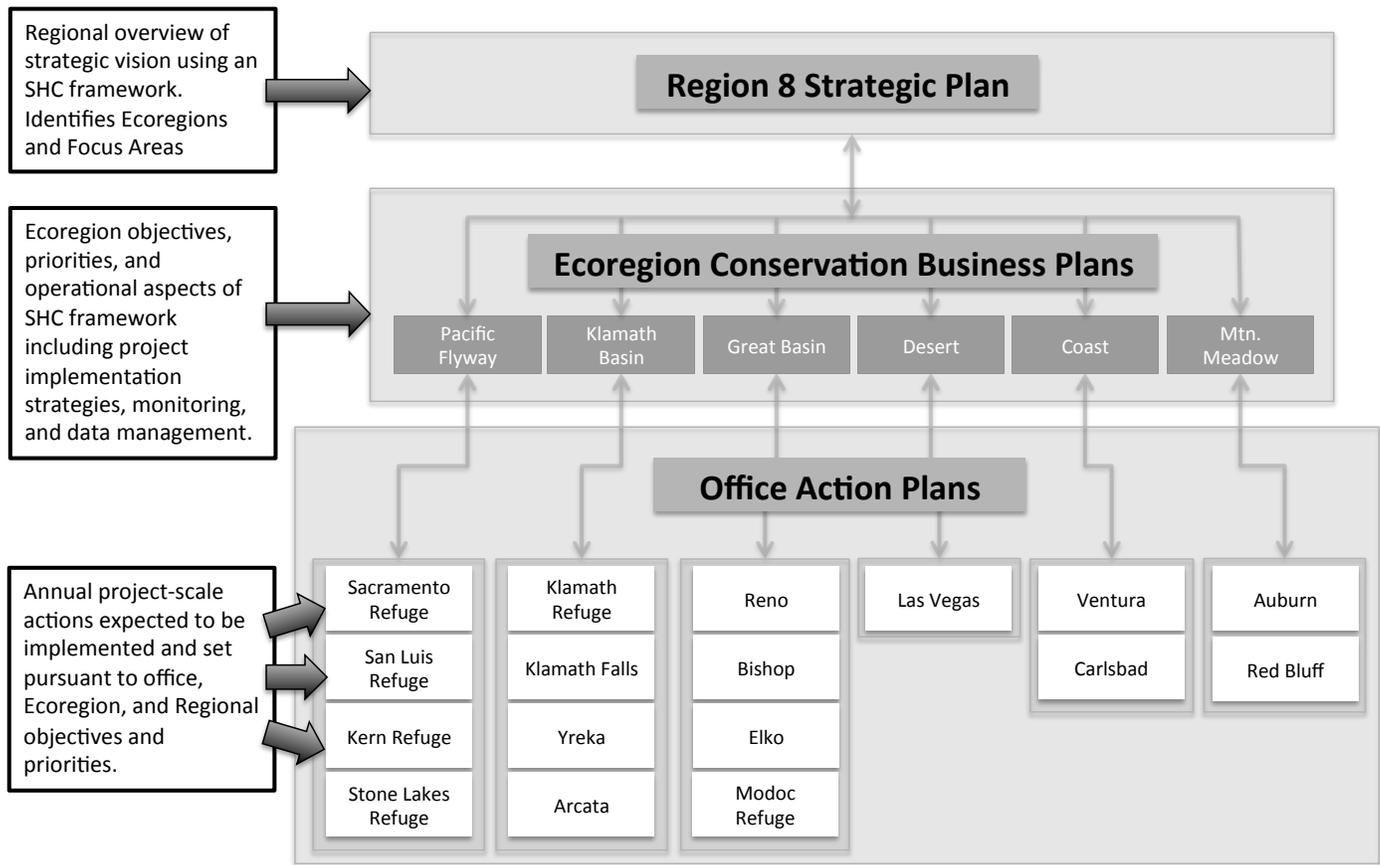


Figure 5. The Partners Program planning process in Region 8 include three types of plans that will be integrated yet operate at different scales and purposes. The various scales are the Regional Partners Program strategic plan (this document), Ecoregion conservation business plans, and field station action plans.

Objective 1.3. Establish a formal connection between Landscape Conservation Design concepts, tools, and products to a Partners Program SHC framework.

Key Strategic Activities:

- Integrate closely and often with ongoing LCD efforts in Region 8 by sharing data and other important collaborative resources.

Over the next five years, the Region 8 Partners program is committed to close integration with LCD. A somewhat complicating feature in this is that none of the LCD efforts in Region 8 are completed at this time. Partners

Program Project Managers are involved with the processes and development for those that are ongoing. However, expectations are that it will be a year or more until the first formal LCD is completed in Region 8. This issue provides the basis for the need to develop “interim” priorities for this strategic plan as the previous objectives indicate. Pursuing this objective in the future will establish more formal priorities to be adopted based on individual LCD recommendations developed for habitat restoration efforts on private lands. This illustrates how these Goal 1 objectives are directed at integrating with the LCDs eventually using the conservation business plans to align Partners Program efforts with the LCDs. Finally, in the absence of formal LCDs, the Partners Program will make every effort to collaborate and integrate with the predominant landscape-scale conservation efforts in each Ecoregion that are addressing the Service’s trust resources and priorities.

Goal 1 Summary

These three objectives are intended to guide the Partners Program in adopting and implementing a more strategic adaptive management approach to conservation and restoration decision-making by implementing a formal SHC framework that is relevant at the landscape scale. This approach will be described in Ecoregion conservation business plans. Figure 3 illustrates how these three objectives progressively move the program in this direction ensuring compatibility with LCDs or the predominant landscape conservation efforts in each Ecoregion. The Partners program project managers will continue to implement high quality habitat restoration projects according to their collaboratively developed interim priorities in pursuit of habitat restoration performance targets.

Goal 1 Performance Targets

- Formally establish fully functioning strategic working groups comprised of Partners Program personnel in each Ecoregion.
 - Complete Partners Program Ecoregion conservation business plans in at least four more Ecoregions.
 - The Partners Program will cooperatively identify representatives to serve on each active Landscape Conservation Design effort that is ongoing within Region 8.
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Goal 2: Broaden and Strengthen Partnerships

The mission of the Partners Program is to efficiently achieve voluntary habitat restoration on private lands through financial and technical assistance for the benefit of Federal Trust resources. Partnerships are an essential component of success and result in improved projects by pooling all available resources for greater conservation benefits, increased efficiency, improved communication, more innovative solutions, and increased public support. The foundation of the Partners Program is building partnerships based on the shared interest in habitat conservation.

Goal 2 Objectives

Objective 2.1. Cultivate existing partnerships and develop new ones to create incentives and opportunities for future conservation activities.

Key Strategic Activities:

- Maintain cooperative relationships with private landowners, tribes, states, local governments, non-profit groups, and industry to conserve trust resources.
- Maintain and develop new resource-based collaborations with other programs within the Service to focus on conservation priorities and build synergy to address conservation challenges.
- Expand Regional partnerships and increase collaboration with other agencies focused on landscape or local conservation issues related to habitat conservation such as LCCs and others.

Ongoing investment in existing productive partnerships will be a priority for the Partners Program in Region 8. These partnerships are certainly a key to past success and will be as important going forward. New concepts introduced in this plan related to an Ecoregion-based program design and using an SHC framework Region-wide will open opportunities to stronger and broader collaboration and partnerships. These program changes will develop new tools, data sets, and opportunities related to restoration project planning and implementation while drawing wider attention to successes at the landscape-scale. This will facilitate the development of new collaborative partnerships on projects as well as on other aspects of conservation.

There are about 139 Native American tribes in Region 8. Successful habitat restoration efforts require maintaining and building strong partnerships with tribes. Tribes manage or influence some of the most important terrestrial and aquatic ecosystems both on and off reservations. The Partners Program has unique opportunities to build lasting partnerships around restoring trust species habitat, protection of cultural resources and spiritual land values, and integrating traditional land ethics and management approaches across a broad landscape. In this capacity the Partners Program plays a critical role in providing Service support to tribes as they exercise their sovereignty and management of fish and wildlife resources.

Partnerships with private landowners, conservation stakeholders, tribes, and others on projects will continue to be the mainstay for the Partners Program in Region 8. The number of partners engaged over the term of this plan will be an indicator of success for this objective. This demonstrates the complexity and engagement of partner organizations across the Region. It is a reflection that conservation projects are most effective when implemented with a diverse group of project partners.

Objective 2.2. Implement SYH projects as a means to build and strengthen new and existing conservation partnerships.

Key Strategic Activities:

- Complete SYH projects and educational activities that reflect the resource priorities associated with each Ecoregion.
- Leverage other Service programs as well as SYH program partners to fully support the implementation and long-term maintenance of projects.
- Provide technical assistance to schools, employing methods from the Schoolyard Habitat Project Guide.
- Distribute Schoolyard Habitat Project Guides to increase awareness to our partners about our program.
- Establish a means to connect local practitioners to a larger network of partners that support Schoolyard Greening.

The Schoolyard Habitat Program (SYH) creates unique partnerships within communities with the Partners Program collaborating with schools as the primary partner. Habitat restoration is outside the scope of most school's everyday curricula and these partnerships are important to engaging students on outdoor educational topics. Schoolyard Habitat Program Managers create formal and informal partnerships to help find, leverage, and direct resources to projects. Partners can be state and local agencies, colleges and universities, hardware

stores, nurseries, service organizations, and non-profits. The projects themselves serve as an educational and marketing tool for the Partners Program through children, parents, and other school related individuals.

Goal 2 Performance Targets

- Establish at least 250 cooperative agreements with private landowners or other cooperators during the five-year period.
- Engage with more than 350 total non-landowner partners during the five-year period.
- Establish a formal collaboration with each of the ongoing LCDs within Region 8 to ensure overlapping priorities with the Partners Program: Klamath, Central Valley, Desert, and Great Basin.
- Establish data sharing relationships with at least six new groups that will enhance our ability to understand project effects across the landscape.
- Strive to maintain a 10:1 match Region-wide for partner and other agency funds to Partners Program funds.
- Install up to 45 SYH new projects across Region 8.
- Visit no fewer than 150 schools across Region 8.
- Distribute both English and Spanish copies of the Schoolyard Habitat Project Guide to incoming emails requests as well as distribute at conferences and teacher training workshops.

Goal 3: Improve Information Sharing and Communication

A fundamental tenet of any partnership is effective communication, which includes both providing and receiving information successfully. It is essential that important information is shared with partners, decision-makers, the scientific community, and the public, but it is also critical that we listen to the priorities and needs of others. Partners Program Project Managers are skilled listeners and effective communicators. They will continue to build trust with landowners and other key partners.

Goal 3 Objectives

Objective 3.1. Improve internal communication within the Partners Program and across programs within the Service.

Key Strategic Activities:

- Regularly assemble and engage Partners Ecoregion working groups to collaborate and communicate common objectives and project success pointed toward landscape-scale accomplishments and successes.
- Continually communicate and engage other Service programs and integrate with their activities related to habitat restoration on private lands.
- Accurately enter project information into HabITs database to ensure that project details and accomplishments are recorded and available for sharing and summarizing.

This objective includes defining and formalizing ecologically and geographically distinct areas that will be referred to as Ecoregions. These Ecoregions will enable the Partners Program to better function at the landscape-scale as well as the Regional-scale. Activities to accomplish this objective are focused on improving sharing and communication with consideration of the Ecoregional scale to ensure that the Partners Program is compatible with the ongoing and potentially new LCD concepts within the Region while continuing to collaborate

within the Partners Program and with other Service programs.

Objective 3.2. Improve communications with partners, the public, the scientific community, and Congress.

Key Strategic Activities:

- Improve outreach with concerted increase in social media that distributes and highlights project specific efforts
- Maintain traditional outreach efforts with partners, the public, and Congress such as fact sheets, conference attendances, meetings, etc.
- Seek out, establish, and utilize data sharing opportunities that will be created as the SHC framework is adopted
- Create data management structures in each Ecoregion that facilitate connections with other entities that can integrate Partners program data sets into their restoration, climate, habitat, or other analyses.

Outreach communications remains a critical component of a successful Partners Program in Region 8. The world of communication is changing rapidly, and Region 8 will strive to use the most effective communication tools to deliver messages to the public and our partners going forward. This includes traditional means as well as more consistently with social media outlets for project stories.

Objective 3.3. The Schoolyard Habitat Program will Educate and Engage the Public and our Partners to Advance the Conservation Mission.

Education and outreach are cornerstones of the Partners Program and are imperative for the long-term success of our projects. Schoolyard Habitat Project Managers interact with a diverse assemblage of citizenry to deliver priority messages about conservation through the implementation of SYH projects and various Connecting People with Nature (CPWN) activities.

- Create localized replicable models that integrate habitat restoration based education and support environmental literacy priorities and habitat conservation priorities.
- Provide teacher-training workshops highlighting habitat restoration connections to STEM curriculum and how SYH projects can lead to increased student academic achievement through hands-on experiential learning.
- Offer opportunities and activities for students and adults that will help develop civic engagement knowledge and skills that address sustainability and environmental issues in local communities.
- Conduct targeted CPWN activities that promote national, regional and local Service program priorities and initiatives.

Goal 3 Performance Targets

- Maintain a Regional Facebook page with postings at least twice weekly.
- Collaborate with External Affairs to highlight news worthy projects and events at least once quarterly.
- Find new collaborative project opportunities with other Service programs at least twice per year.
- Create annual and other reports summarizing and describing project and landscape scale efforts.
- Seek or attend at least three Congressional visits or interactions within Region 8.
- Engage with over 10,000 individuals annually through Schoolyard Habitat and Connecting People with Nature activities.

Goal 4: Enhance Our Workforce

Successful implementation of the Partners Program requires a diverse and highly skilled workforce that is motivated and inspired by their jobs. Partners Program Project Managers deliver habitat restoration projects in close cooperation with private landowners and other non-governmental and private entities. These relationships involve extensive interaction and negotiation. Therefore, Partners Program Project Managers must have a unique skill set enabling them to act with integrity to build trust and successful partnerships as well as have the necessary technical skills to lead the design and implementation of habitat restoration projects in often complex and sensitive sociopolitical environments.

Goal 4 Objectives

Objective 4.1. Strategically align program workforce to improve cost effectiveness, reduce administrative complexity, and maximize resources directed toward restoration project implementation in priority Ecoregions.

Key Strategic Activities:

- Evaluate the results of the Ecoregion SHC frameworks and the resultant priorities to ensure Partners Program success and effectiveness.
- Put forth every effort to strategically establish new (and refill) positions with people possessing the right skill sets in the right place at the right time.
- Continue to develop ideas and mechanisms encouraging healthy dialogues that promote success with Project Leaders and Assistant Regional Directors and others in supervisory chains managing program personnel and resources.

Objective 4.2. Continue to foster and develop existing workforce skill sets to ensure that the Partners Program maintains the most current institutional knowledge of habitat restoration science.

Key Strategic Activities:

- Provide Program Project Managers with access and opportunity to attend relevant training and development courses.
- Coordinate with field station Project Leaders to ensure that the right personnel are attending the right courses for them.
- Ensure that training opportunities and institutional knowledge is shared among field stations.\

Goal 4 Performance Targets

- All program personnel will attend at least 40 hours of relevant training per year.
- Partners Program personnel will attend and host teleconferences, webinars, and in-person informative presentations quarterly or more often as opportunities arise.
- Regional Office personnel will organize and help facilitate Regional-level sharing of technologies and tools among field offices.

Goal 5: Increase Accountability

With the institution of an SHC framework described in Goal 1, a series of new accountability measures at the field station, Ecoregion, and Regional levels will be established to evaluate whether habitat restoration projects are meeting their objectives or not. Projects will be tracked and evaluated in a more scientific manner under this design using Ecoregion conservation business plans. This is in addition to the traditional program accountability that will be enhanced due to this proposed redesign of Goal 1.

Goal 5 Objectives

Objective 5.1. Conduct or oversee project evaluations in each Ecoregion that investigate the degree to which projects and project types meet stated objectives according to the SHC framework.

Key Strategic Activity:

- Each Ecoregion in Region 8 will develop a monitoring and evaluation protocol for its conservation business plan during the period of this strategic plan as stated in Goal 1. These protocols will include clear objectives, specific monitoring protocols, organized data management structures, and targeted evaluation processes.

Monitoring and research are a key part of the SHC framework as described by the U.S. Geological Survey (2006) and later by U.S. Fish and Wildlife Service (2008). This was historically somewhat of a controversial topic as it relates to the Partners Program in Region 8. Going forward, project success and program-level monitoring will be included in a framework to be instituted under the SHC framework. This is in addition to the monitoring that partner entities are conducting across the Region that should also be considered in project development and success.

Monitoring for this objective includes simple and directed project follow-up in an organized manner to capture whether projects are meeting stated objectives (implementation monitoring). This will create an Ecoregional monitoring protocol that utilizes implementation and compliance monitoring (as much as possible) as a source to measure success across the Ecoregion. As part of Goal 1, monitoring protocols will be established during the conservation business plan development in each Ecoregion. These protocols will be designed in such a way that all projects conducted for the same purpose will be monitored and tracked in the same manner within the Ecoregion. Data will then be compiled and stored in a common database. These data can then be analyzed to evaluate and determine project performance using implementation monitoring information as much as possible. Project performance measures will then be tracked by geography, project type, or other parameters to feed an adaptive management process as per the SHC framework. This monitoring effort will be designed to be commensurate to restoration project complexity and expense. For example, simple and inexpensive projects will use simple monitoring metrics, and more complex and expensive projects will be more involved.

Objective 5.2. Institute accountability measures that track Partners Program project success in relation to funding and other administrative aspects of the Partners Program.

Key Strategic Activities:

- Track spending annually in concert with field stations to ensure that funding targets are met according to Partners policies.

- Produce an annual accomplishment report that describes: (1) restoration project accomplishments; and (2) provides program and administrative data to summarize the status of the Partners Program Region-wide.
- Ensure that accomplishment reporting (into HabITs) is accurate, thorough, and consistent across the Region.

Tracking and reporting progress using Partners Program accomplishment, funding, partnership, and administrative data is an important component of program management and success. This strategic plan and the metrics described herein will serve as the foundation for tracking program progress. In many cases, more specific accountability measures will be established further in the conservation business plans developed in each Ecoregion.

Goal 5 Performance Targets

- Implementation and compliance monitoring will be completed for each project.
- Each Ecoregion will establish a conservation business plan inclusive of key elements necessary to evaluate project success at the project and landscape scales.
- One comprehensive restoration project evaluation (involving the review of many projects) will occur in one Ecoregion within the period of this plan following a modified Post Project Appraisal method described by NewFields and Kondolf (2012).



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Interim Program Priorities, Ecoregions, and Focus Areas

In early 2016, the Partners Program in Region 8 initiated a planning process to re-evaluate Regional Partners Program priorities. Internal and external partners were consulted during this process. A standard set of “interview questions” (Appendix C) was developed and intended to guide discussions with partners about the current and future Partners Program priorities. Partners Program Project Managers then met with various groups to collect input by completing the interviews using the interview questions as a guide. Meetings were held with: Service field station leadership and personnel from across the Region (e.g., Project Leaders and other program leads including from Service offices without Partners Program employees); Regional Office program leads (Refuges; Ecological Services; Science Applications; External Affairs; and the Director’s Office); local external partners such as private non-profit conservation organizations, landowners, resource conservation districts, state agencies, etc.

In mid-spring 2016, a Strategic Planning workshop was held with the Partners Program Project Managers assembled into their Ecoregional working groups. They synthesized collected data and organized it by Ecoregion with the help of voluntary independent facilitators. Conservation targets were evaluated using certain criteria such as: Partners Program relevance, limiting factors, restoration potential, Climate Smart Conservation practices, relevance to LCC 5-year goals, relation to Focus Areas identified in the previous Strategic Plan among others. Identified conservation targets were then ranked qualitatively (High, Medium, or Low) by Ecoregion. The resultant conservation priorities were then used to establish the Interim Priorities listed in this section (by Ecoregion) with a more thorough presentation in Appendix A. Only the “high” priority objectives are presented in the tables in this section. More details on other priorities are shown in Appendix A. These are interim priorities that will be utilized for making project decisions until a more thorough set of priorities can be developed as a result of the LCD efforts (see Figure 3) in collaboration with LCCs or other landscape planning initiatives.

Focus Areas

Geographic “Focus Areas” were developed in the previous strategic plan (2012-2016) to describe Partners Program conservation efforts using a more targeted approach. Individual Focus Areas in 2012 were created through a similar approach as the Interim Priority exercise described above, where geographic areas of emphasis were defined by a unique list of conservation objectives, restoration opportunities, potential project partnerships, and annual/five year targets. Each of these previous Focus Areas was carefully re-evaluated using the Interim Priorities developed for this current strategic plan. Some minor changes were made to focus area names, boundaries, and extent for this revision. These revisions resulted in improved Focus Areas that consist of areas within the Ecoregions where the majority of the Partners Program projects will be implemented. The Focus Areas are geographical depictions showing broad locations of the highest priority habitat targets and objectives. A total of six geographic Focus Areas and one programmatic (non-geographic; Schoolyard Habitat) Focus Area was created for the 2012-2017 Partners Program Strategic Plan.

Ecoregions

This section contains for each Ecoregion (presented North to South):

- An overview Ecoregion description
- A map showing the Focus Area within the Ecoregion
- A description of the high priority habitat targets and goals
- An “Interim Priorities” table where the conservation goals and are identified.



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Klamath Basin Ecoregion



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Great Basin Ecoregion



USFWS

Pacific Flyway Ecoregion



USFWS

Coastal California Ecoregion



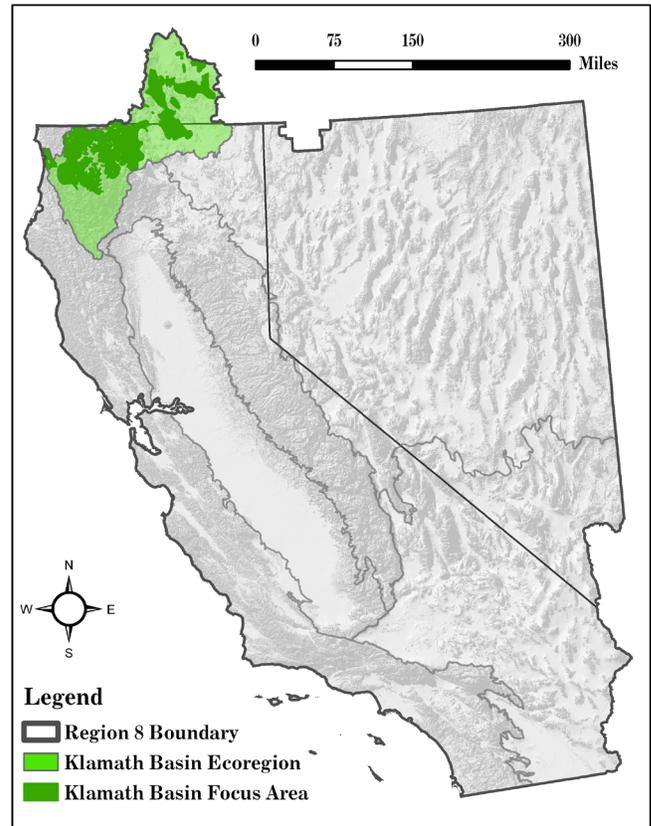
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Sierra Cascade Ecoregion

Klamath Basin

The Klamath Basin is located in northern California and southern Oregon. It encompasses just over 10 million acres with approximately 35 percent of the watershed in southern Oregon. The Upper Klamath Basin has a high-elevation semi-arid climate and consists of broad fault bounded valleys with large shallow lakes and wetlands and numerous spring-fed streams and rivers. The Middle Klamath Basin is dominated by mountains with steep slopes and alluvial valleys with grasslands, chaparral, and mixed conifer forest and woodlands. The Lower Klamath Basin is comprised of the mainstem Klamath River and all tributaries downstream of the Trinity River confluence, encompassing a drainage area of approximately 450 square miles. The lower basin consists of 44 miles of mainstem riverine habitat, the Klamath River estuary, and 25 anadromous fish-bearing tributaries.

The Klamath Basin Ecoregion contains numerous priority species and critical habitats including federally listed coho and Chinook salmon, Pacific lamprey, Lost River and shortnose suckers. Fresh water wetlands (natural and managed), marshes, and wet meadow habitats within the ecoregion are critical for the waterbirds of the Pacific Flyway. Forest habitats in the Klamath are some of the most biologically diverse and threatened woodlands in the country. Climate change, land conversion, over-allocated water resources, and various other threats are stressors to the habitats and species of the Klamath Basin Ecoregion that the Partners Program seeks to address.



Habitat Targets and Goals:

During the development of this plan, interim priority habitats, species, and 5-year targets were established for the Ecoregion. The goal is that offices within the Ecoregion will devote the majority of their efforts in the Focus Areas that contain these priority habitats/species over the life of this plan.

Instream/Riverine

Instream/Riverine habitat is one of the most important resources biologically, socially, and economically in the Ecoregion. This habitat type supports several species of anadromous and resident fish that are of cultural and economic significance and provides critical ecosystem services. Project Managers working in these habitats are focused on reestablishing geomorphic process, providing in-stream habitat complexity, off-channel habitat, and improving water quality.

Riparian

Riparian habitats are the critical interface between our riverine and upland habitats and when fully functioning, mediate negative impacts to the aquatic resources of the Ecoregion. Additionally,

these habitats provide a variety of ecosystem services such as, delivering allochthonous productivity to aquatic systems, stabilizing stream banks, and providing habitat for a variety bird, mammal, and plant species. Project Managers restore these habitats by developing grazing plans, fence installation, plantings of native trees, shrubs, and grasses, and invasive species removal.

Wetlands

The wetlands (managed/natural) of the Klamath provide critical habitat for the millions migrating waterbirds of the Pacific Flyway as well as habitat for resident bird species and amphibians like the Oregon Spotted Frog. These wetlands function as filters to improve the water quality and other functions to receiving waters. Project Managers work to restore, enhance, and create wetland habitat by improving hydrologic connectivity, developing grazing plans, installing fences, and establishing new wetlands.

Forest Health

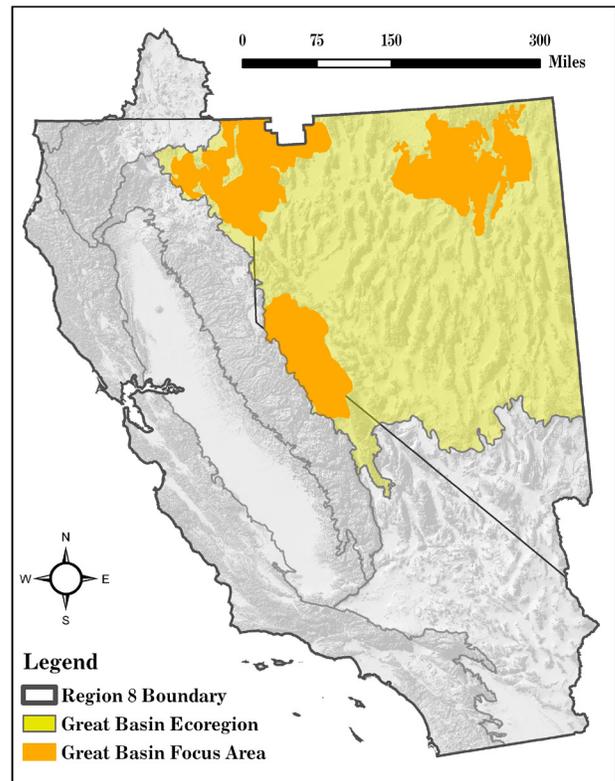
Oak Woodlands, aspen, and coniferous habitats within the Ecoregion support some of the richest biodiversity in Region 8 including several high priority species like Northern Spotted Owl and Pacific Fisher. Project Managers conduct vegetation management activities like mechanical removal of conifers encroaching into Oak Woodlands and thinning of understory within conifer stands to restore and enhance these habitats.

Habitat Target (Species Targets)	PFW Goals	Restoration Strategy	Five-Year Performance Metrics
Instream-Riverine <i>(Lost River/ Shortnose Suckers, native salmonids)</i>	Restore/enhance/create instream-riverine habitat to support self-sustaining native fish populations	Levee Removal. Channel Realignment, Instream Habitat enhancement/ establishment, sediment control	45 Miles
Riparian <i>(Lost River/ Shortnose Suckers, native salmonids)</i>	Restore/enhance/create riparian habitat to support self-sustaining native fish populations	Grazing Management, Plantings, Invasive Species Treatment, Vegetation Management	25 miles
			22 Acres
Wetlands <i>(Migratory waterbirds, native salmonids)</i>	Restore/enhance/create managed and natural wetlands to support waterbirds, wetland obligate species and native fish populations	Establishment, Restoration, or Enhancement of Open Water, Emergent, Wet-meadow, or Off-channel Wetlands	5,707 Acres
Forest Health <i>(Migratory birds, native salmonids)</i>	Create and restore forest health and function to support Threatened and Endangered species, and species of special concern	Vegetation Management	1,295 Acres

Great Basin

The Great Basin encompasses more than 72 million acres of semidesert and covers an area between the east slope of the Sierra Nevada across much of Nevada to the Wasatch Mountains of the western Rocky Mountains in central Utah. It is characterized by its basin and range topography with more than 300 mountain ranges interspersed among long, broad valleys.

Salt desert scrub and sagebrush shrublands cover the valleys and lower slopes. Rising above the valley floors, ecological systems include pinyon-juniper woodlands, mountain sagebrush, open conifer forests, and alpine areas in the mountain ranges. Scattered across the landscape are important aquatic, riparian, wetland, badland, and dune habitats. These small, isolated areas highlight the Great Basin's unique biological diversity: more than 280 plants and animals are considered endemic (occurring nowhere else) to the ecoregion. In addition, the Great Basin is home to many sagebrush ecosystem dependent Federal trust species, including the Bi State and Greater sage grouse.



Although much of the area is managed by federal land management agencies, over 50% of wet meadows, important habitats for fish and wildlife, occur on private lands. Partnerships with these landowners are essential for conservation efforts to benefit Federal trust species.

Habitat Targets and Goals:

Conservation priorities in the Great Basin are grouped into broad landscape targets. Landscape targets include the sagebrush ecosystem, stream/riparian, endemic aquatic species, pollinators/Monarchs, and flood irrigated meadows. Within these landscape targets, priority habitats and species were identified for restoration. The majority of Partners Program efforts will be within the Great Basin Focus Area, and priorities will be sagebrush uplands, wet meadows, Intermountain rivers and streams, and springs restoration.

Sagebrush Uplands

The sagebrush ecosystem is comprised of almost 24 million acres in the Great Basin and is found between 4,500 – 10,000 feet, from valley bottoms to higher elevations in the mountains. Several species evolved specifically to thrive in sagebrush and include sage-grouse, pygmy rabbit, pronghorn antelope, and several migratory songbirds. In the Great Basin, invasives and fire are the largest threat to the persistence of the ecosystem. Other pressures, if not managed appropriately, include recreation, energy development, and ungulate grazing. While management of sagebrush uplands is predominately by federal land management agencies in the Great Basin, particularly within Nevada, there are still many opportunities to work with private landowners to enhance and restore sagebrush uplands. Some of the common projects include pinyon-juniper removal, post wildfire seeding, and grazing management. Project objectives are

focused on improving or maintaining sagebrush uplands that also support a lush undergrowth of bunchgrasses and forbs.

Wet Meadows

Wet meadows can be associated with rivers, streams, and springs in the Great Basin. In addition, flood irrigation in historic floodplains creates habitat for wildlife species. Eight counties across northeast California, northwest Nevada, and southwest Oregon were identified by the Intermountain West Joint Venture as some of the most productive land on the continent for livestock and wetland birds. Because 75 percent of the freshwater emergent wetlands in this region are privately owned, these lands are essential for strategic bird conservation efforts. Wet meadows across the Great Basin have been a focus for the Sage Grouse Initiative (<http://www.sagegrouseinitiative.com/>). While sage grouse evolved to feed on sagebrush, they move to wet meadows, springs, and streamside riparian areas in mid to late summer while hens are raising their growing broods. Leafy plants and insects provide much needed nutrition to sage grouse and other wildlife species. Pinyon and juniper removal is a technique for enhancing and restoring wet meadows. Removing the trees can increase water availability to a meadow since the trees utilize so much water. Additional techniques for restoration are discussed in the below sections on Intermountain Rivers and Streams and Springs/Springbrooks.

Intermountain Rivers and Streams

Intermountain rivers and streams include riparian areas, floodplains, and wetlands adjacent to streams and rivers. More than 75% of Nevada's species are associated with riparian vegetation (Nevada Wildlife Action Plan 2012). Many of the stream systems are isolated with variable aquatic habitat characteristics which resulted in their support of unique aquatic species assemblages across the landscape. Although extremely small in extent, riparian communities are areas with increased numbers in wildlife diversity. The presence of water either at or near the surface contributes to riparian systems being the most productive habitats. They provide food, nest and den sites, cavity sites, hiding cover, thermal cover, and corridors for migration and wildlife movements. Priority species include Lahontan cutthroat trout, Columbia spotted frog, and a variety of migratory birds. Threats to rivers and streams in the Great Basin include non-native invasive plants/animals, irrigation diversion, river channelization, and other sources that result in nonfunctioning hydrologic regime. There are many opportunities to work with partners to protect and improve these areas for fish and wildlife. Some of the ongoing efforts of the Partners Program include grazing management systems (e.g., off site water, fencing riparian, grazing plan), active stream restoration, integrated weed management, and fish passage projects.

Springs/Springbrooks

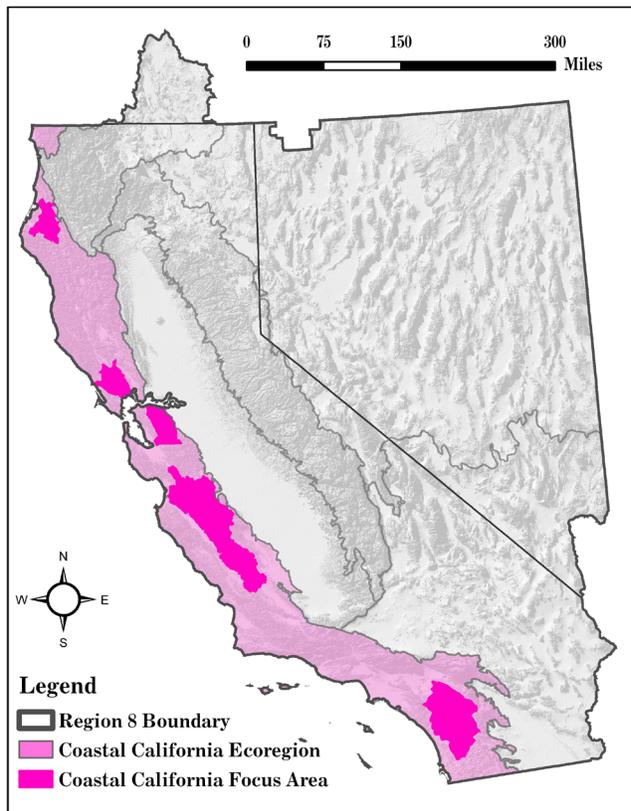
Dotted across the arid Great Basin are springs which are vital to not only fish and wildlife, but are also important sources of water for livestock and other land uses. A spring occurs where deep or shallow ground water flows from bedrock or natural fill onto the land surface and forms surface flow (springbrook) or a body of water. Nevada has the most springs in the United States with over 4,000 springs having been mapped. These spring systems provide habitat for 165 of Nevada's 173 endemic fish and aquatic invertebrates. Water diversion, excessive ungulate grazing, groundwater depletion, recreation, mining (de-watering activities), and establishment of non-native species are all threats to spring systems in the Great Basin. The Partners Program is working with landowners to protect and, when appropriate, restore spring systems. Projects include grazing management (e.g., off site water and fencing), integrated weed management, and restoration of hydrologic regime.

Habitat Target (Species Targets)	PFW Objective	Restoration Strategy(s)	Five-Year Performance Metrics
Sagebrush uplands (sage-grouse, migratory birds, pygmy rabbit)	(1) Reduce fire risk and improve habitat quality in sagebrush ecosystems and priority sage-grouse habitat; (2) Protect intact sagebrush ecosystems and priority sage-grouse habitat; (3) Restore sagebrush ecosystems and priority sage-grouse habitat following fire	Grazing management, Vegetation management	4,000 acres
Wet meadows (sage-grouse, migratory birds, Columbia spotted frog)	(1) Enhance wet meadow systems for wildlife habitat; (2) Restore hydrology to wet meadow systems for wildlife habitat	Grazing management, Vegetation man.	500 acres
		Restore hydrologic regime	2 miles
Intermountain Rivers and Streams (Lahontan cutthroat trout, Columbia spotted frog, migratory birds)	Improve stream functioning in perennial streams	Restore hydrologic regime	8 miles
	Improve riparian habitat	Grazing management; Vegetation management	50 acres
	Improve aquatic and riparian habitat at springs and springbrooks	Grazing management	5 acres

Coastal California

The Coastal California Focus Area consists of three components: the North Coast in Humboldt County; the Central Coast ranging from Santa Clara to San Luis Obispo Counties, and the South Coast in Riverside and San Diego Counties. The northern area is comprised of anadromous fish-bearing streams, steep mountains, wetlands, oak woodlands and mixed conifer forests. The Central Coast provides an intact and rural landscape comprised of grasslands, vernal pools, oak woodlands, ponds, wetlands, and riparian habitat types. The southern component is within the valleys and foothills of several mountain ranges and contains coastal sage scrub chaparral, grassland, oak woodland, riparian and wetland habitat types.

Across the California coast, Partners Program efforts will focus on identifying, enhancing and restoring priority habitats to benefit trust species, improve habitat connectivity, and restore ecological processes. Restoration and enhancement within the Coastal California Ecoregion are critical to mitigating the effects of climate change by reducing habitat fragmentation, maintaining habitat connectivity, and promoting fish and wildlife migration or movement to adapt to climate-change-induced habitat dynamics.



The northern component of the focus area provides a unique opportunity to restore and conserve priority habitats in relatively undeveloped areas including large working ranches, dairies, and extensive forest lands that have not experienced significant urbanization. Agricultural lands and rural lifestyles, the desire for open space, and a community interested in natural resource conservation has led to a shared goal between private landowners and the conservation community of preserving working agricultural lands with the knowledge that both the economy and fish and wildlife will benefit. The Partners Program can fill a niche in this area by building trusting relationships with individual landowners to conduct restoration work on private lands previously inaccessible. These relationships and projects will be important in providing connectivity of restoration work at a watershed or landscape scale.

The majority of lands within the central coast component of this focus area are private working rangelands. The Partners Program can build trusting relationships with individual landowners to conduct restoration and enhancement activities on private lands that support a diversity of wildlife, including more than 20 federally listed threatened and endangered species, numerous State-listed species, and many species of concern. The central coast component connects habitats in a north-south direction which follows the natural mountain range orientation and aligns with projected climate change models of vegetative and species migration scenarios into and within the region. The Partners Program will focus on the restoration, protection, and enhancement of priority habitats such as grasslands, vernal pools, oak woodlands, wetlands, and riparian habitats. These habitat types have been targeted in order to improve habitat quality, increase connectivity, and support the recovery of listed species. Partners Program staff will continue to strengthen the partnership between the Service and the

Natural Resource Conservation Service (NRCS) within the U.S. Department of Agriculture. This partnership facilitates the implementation of priority on-the-ground restoration and conservation projects in central California.

Despite the pressures of urbanization in southern California, there are still many landscapes that are relatively intact. Working with private landowners to conserve and restore these private lands the Partners Program will help to fill gaps between mitigation lands and larger regional habitat preserves. Restoration efforts in the southern component will focus on the restoration of coastal sage scrub, grasslands, Oak woodland, and riparian corridors. Efforts will also focus on the limited wetlands that exist in southern California, such as vernal pools, alkali playas, ponds, and mountain springs. The Partners program will focus on working with private landowners and ranchers in the inland portion of coastal southern California. In recent years, pollinators and Monarch Butterfly has become an important resource to consider in restoration and public outreach. We have been able to add components to our restoration work such as planting native milkweed.

Habitat Targets and Goals:

During the development of this plan, interim priority habitats, species, and 5-year targets were established for the Ecoregion. The goal is that offices within the Ecoregion will devote a majority of their efforts in the Focus Areas that contain these priority habitats/species over the life of this plan.

Coastal Sage Scrub

Coastal Sage Scrub is located along the coast and its inland distribution follows the distribution of the marine layer. This habitat is composed of shrubs such as California sagebrush, California buckwheat, and black sage. This habitat has been impacted by development, clearing, and frequent fire return intervals. Several priority species including the California Gnatcatcher are dependent on this habitat type. Project Managers work to restore this habitat by identifying areas of disturbed coastal sage scrub on landowners' properties and working with the landowner to remove invasive species and then plant coastal sage scrub plant species. Project Managers also work with landowners to develop long-term management plans to address new issues as they arise in coastal sage scrub.

California Foothill and Valley Forests and Woodlands

Oak Woodland and conifer habitats within the Ecoregion support several high priority species like mountain lion, deer, bald and golden eagles, California condor, and many native plants. High intensity fires have impacted these habitats after years of fire suppression, diseases, and tree pests such as golden-spotted oak borer and polyphagous shot hole borer. In the northern portion of the Ecoregion, Project Managers conduct vegetation management activities like mechanical removal of conifers encroaching into Oak Woodlands. Project Managers also include thinning of understory and plantings within conifer stands to restore and enhance these habitats. Central California Project Managers work with landowners to assess the condition of oak woodland and associated grassland habitat. Habitat improvements generally consist of developing and implementing grazing plans, enhancing native grassland habitat, installing livestock fencing and trough systems, planting oak trees, protecting young trees from grazing pressure. In the southern portion of the Ecoregion, Project Managers work with landowners to promote forest health by removing high density vegetation in recently burned conifer forests to allow conifers to regrow. Additionally, Project Managers work with landowners to plant and protect oak seedlings to ensure that this ecosystem will continue into the future.

American Southwest Riparian Forest and Woodland

Riparian areas are the critical interface between our riverine and upland habitats and when fully functioning, can mediate negative impacts to the aquatic resources of the Ecoregion. Additionally, these habitats provide a variety of ecosystem services such as, delivering allochthonous productivity to aquatic systems, stabilizing stream banks, and providing habitat for a variety of bird, mammal, and plant species. Several priority species including Least Bell's Vireo and Southwestern Willow Flycatcher are dependent on healthy riparian areas. Project managers are restoring these habitats by developing grazing plans, fence installation, plantings of native trees, shrubs, and grasses, and invasive species removal. Additionally, Project Managers work with landowners to identify solutions erosion is occurring.

Freshwater (Includes Freshwater Marsh)

Freshwater in California is an extremely valuable resource biologically, socially, and economically. The Partners Program will focus on the vernal pools, freshwater ponds and marsh, wet meadows, and springs. These wetlands provide habitat for priority species including the western pond turtle and the California red-legged frog, as well as various migratory bird species. Vernal pools provide habitat for many rare, state, and federally listed plant species including California tiger salamander and four federally listed fairy shrimp species. Project Managers restore, enhance and establish these habitats by influencing hydrological processes, adjusting local topography, invasive species control, fence installation, and developing grazing plans.

California Grasslands and Flowerfields

In California the areas that are now wide open grasslands dominated by annual European grasses were probably a mixed of native perennial grasses and native forbs. To recognize this diversity, these habitats are now being referred to as the California Grasslands and Flowerfields. These areas provide habitat for wide range of native species such as the California tiger salamander, Grasshopper Sparrow, Burrowing Owl, San Joaquin kit fox, and giant kangaroo rat. Targeted restoration projects can improve the biodiversity in these areas by implementing grazing plans, removing invasive plants, and establishing native grasses and forbs (including milkweed plants).

Monarchs-Pollinators

Monarch butterfly populations in North America are in decline, and in 2015, the Service declared monarch butterfly conservation one of its National Priority Initiatives. As of 2016, California coastal overwintering monarchs had declined by approximately 74% from the long term average population size. Threats leading to the decline of western monarchs are poorly understood, but habitat loss, pesticide use, drought, climate change and disease are all likely limiting factors. Project Managers work with various entities to restore pollinator habitat by installing native plant species that provide nectar and rearing habitat (monarchs); removal of invasive species, and encouraging landowners to consider pollinators/monarchs in their operations. Small-scale project include urban pollinator gardens at schools or in backyards while large scale enhancement projects include installing pollinator hedgerows or several acres of native milkweeds. Most projects have an educational component to help the public understand how they can provide habitat for pollinators and Monarch butterflies.

Habitat Target (Species Targets)	PFW Goals	Restoration Strategy	Five-Year Performance Metrics
Coastal Sage-Scrub (<i>California Gnatcatcher</i>)	Conserve and enhance Coastal Sage-Scrub Habitat to support self-sustaining populations of migratory birds	Removal of Invasive Plant Species, Native Species Plantings	187 Acres
Forests and Woodlands (<i>Migratory birds, Oregon White Oak</i>)	Improve upland habitat for priority species and to enhance habitat connectivity	Native species plantings, establish grazing plans, invasive species removal	118 Acres
Riparian (<i>Southwest Willow Flycatcher, Native Salmoinds</i>)	Restore and enhance riparian habitat to support native salmonids, migratory birds, and restore geomorphic processes	Removal of invasive species, development of riparian management plans, fence installations	87 Acres
			19.8 Miles
Freshwater (<i>Western Pond Turtle, San Diego Fairy Shrimp</i>)	Restore and enhance vernal pools, freshwater ponds, mountain meadows, and freshwater spring habitat to support priority aquatic species and migratory birds	Topography manipulation, native species planting, invasive species removal, fencing	5 Acres
Grasslands and Flowerfields (<i>Burrowing Owl, Checkerspot Butterfly, grasshopper sparrow</i>)	Conserve and enhance Native Grassland Habitat to support self-sustaining populations of migratory birds	Removal of Invasive Plant Species, Native Species Plantings, Installation of Habitat Structures	300 Acres
Pollinators (<i>Monarch Butterfly</i>)	Restore, enhance and establish stop-over pollinator habitat, reestablish historical breeding habitat	Establish pollinator gardens, plantings of nectar and breeding plants	25 Acres

Sierra-Cascades Ecoregion

The Sierra-Cascades Ecoregion encompasses most of the westward-draining Southern Cascade and Northern Sierra Nevada mountain ranges and separates the Central Valley to the west and Great Basin to the east. This Ecoregion is a significant source water area to the California Central Valley and San Francisco Bay Delta through a system of stream and river corridors. Low gradient and broad valley meadows and floodplains are diversity hotspots of the Sierra-Cascades Ecoregion. Although these meadows and floodplains make up a disproportionately smaller area than surrounding forested habitats, they have unique hydrology that supports habitat areas and migration corridors for high concentrations of aquatic, terrestrial, avian, and plant species. These two environments also provide important ecosystem services including water storage, groundwater recharge, flood attenuation, fertile soils, and carbon sequestration.

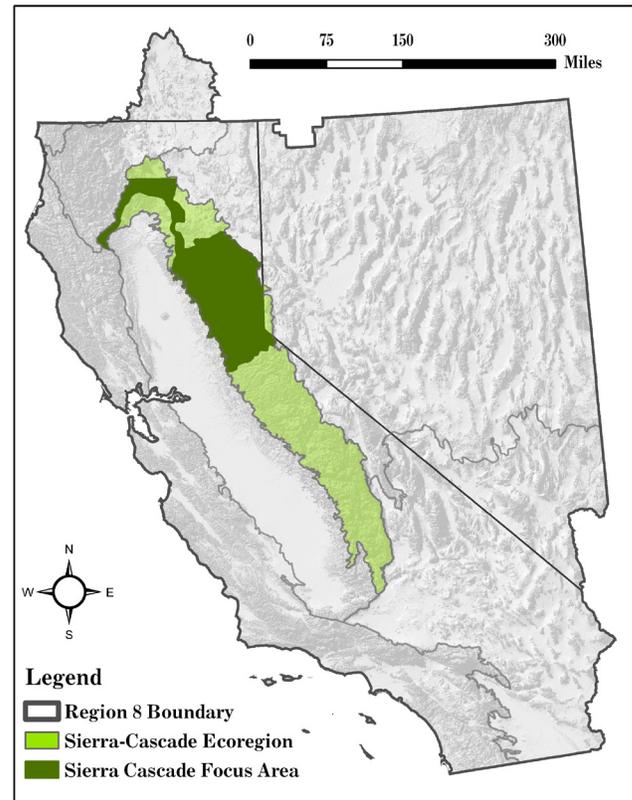
Meadows and floodplains of the Sierra-Cascades Ecoregion are generally characterized by low gradient areas of finer grained soils, frequent periodic flooding, and migrating stream channels. They additionally have greater productivity and herbaceous cover than the surrounding mountainous grassland and forested landscape. These unique conditions result in habitat areas that shift between terrestrial and aquatic with a high diversity of plants and animals including sensitive species and migratory birds. Degradation of these ecosystems have resulted from a variety of past land management practices and naturally-occurring disturbance events causing stream channel incision, disconnections between stream and riparian areas, and overall dryer meadow and floodplain conditions. Since the late 1800's overgrazing, road building, mining, logging, urbanization, water management, levee construction and climate change have contributed to a decline in habitat quality and hydrologic function of these ecosystems. Restoration actions will focus on identifying and addressing causes of degradation at the watershed and site scales and restoring components of dynamic fluvial and ecosystem process along stream and river corridors.

Habitat Targets and Goals:

Conservation priorities within the Sierra-Cascades Ecoregion will focus on high elevation Sierra meadows and lower elevation Sierra foothill floodplains. Combined, these two landscape targets sustain a majority of the Ecoregion's sensitive species, including Willow Flycatcher (*Empidonax traillii*), Mountain Yellow-legged frog (*Rana muscosa*), California Red-legged frog (*Rana draytonii*), Greater Sandhill Crane (*Antigone canadensis*), Pacific lamprey (*Entosphenus tridentatus*) and various native trout and salmon (*Oncorhynchus* spp.) populations. They therefore offer the best opportunity to increase production of sensitive species populations through habitat restoration.

Sierra Mountain Meadows

Sierra wet meadows are the headwaters to major rivers flowing into the San Francisco Bay Delta.



Meadows contain shallow water tables that support wetland, riparian, stream, and lacustrine habitats. These areas are essential for most sensitive species in the high elevations and are also critical areas of climate change refugia. There are approximately 191,000 acres of mountain meadows throughout the high elevations of the Sierra-Cascades Ecoregion, of which an estimated 90,000 acres, or nearly 50%, are in a degraded state. Nearly half of these degraded meadows are estimated to be on private lands, providing opportunities for Partners Program to support restoration and enhancement efforts.

Meadow stream channels change over time and maintain meadow vegetation and habitat diversity through processes of erosion and deposition as stream channels migrate across a meadow. Past management actions often resulted in excessive straightening and downcutting of meadow streambeds leading to a lower local water table and successional changes to drier and less dynamic meadow systems. A variety of restoration actions are currently utilized to restore these habitats including: removing or modifying infrastructure such as culverts or road berms to open stream corridors and restore wet meadow hydrology and channel migration; grazing management that promotes diverse riparian vegetation communities; and beaver restoration approaches that increase water and sediment storage and encourage greater stream channel and meadow floodplain interaction.

Sierra Foothill Floodplains

The Sierra Foothill valleys are the upper reaches of what was historically an expansive 4,000+ square mile floodplain complex extending across the Central Valley to the sea. This massive floodplain ecosystem served as essential habitat and migration corridors for a vast array of wildlife. An estimated 90% of the floodplains within the San Francisco Bay Delta Watershed are now degraded. The Sierra foothills below 1000 feet of elevation present many opportunities to restore components of this natural floodplain system composed of stream channels, riparian forests, and wetlands. Restoration actions will focus on lateral connectivity by increasing the extent and frequency of floodplain and stream channel interaction. Actions include removing or modifying infrastructure such as culverts, levees or road berms to open up the floodplain system. Other instream actions include fish passage as well as beaver restoration approaches to encourage stream evolution towards greater habitat value. This evolution will improve habitat conditions while leading to greater stream channel migration, sediment deposition and increased water storage.

Working Lands

Most restoration opportunities for the Partners Program in the Sierra-Cascades Ecoregion are on privately owned and productive timberlands, ranches, and farms as well as river corridors that serve as flood control for communities. Restoration opportunities will be found where habitat and working lands objectives converge. Expanding stream and river floodplain habitat and restoring meadows also restores ecosystem services. The Partners Program will serve S. Cascade and Sierra Nevada communities by ensuring objectives such as water and sediment storage, improved soil fertility, and flood attenuation will be integrated into habitat restoration design and planning. Program Managers will continue to assist private landowners to manage livestock grazing that promotes diverse riparian vegetation communities. They will also continue to integrate working lands and urban water management objectives with restoration of complex and dynamic floodplain and meadow systems that serve as essential habitat for a diversity of wildlife species.

Habitat Target	PFW Objective	Restoration Strategy	Five-Year Performance Metrics
Mountain Wet Meadow	Increase habitat for all life stages of sensitive amphibian, avian, and fish species by restoring fluvial and dynamic ecosystem processes for meadows	Restore fluvial and physical processes that increase meadow wetland area and herbaceous vegetation	2,500 acres
		Restore fluvial and physical processes that increase meadow stream evolution towards higher habitat values for species of concern	10 miles
Foothill Floodplain	Increase habitat for all life stages of sensitive amphibian, avian, and fish species by restoring dynamic fluvial and ecosystem processes along floodplains	Restore fluvial and physical processes that increase floodplain inundation frequency, floodplain wetland area and herbaceous vegetation	500 acres
		Restore fluvial and physical processes that promote channel evolution towards higher habitat values for species of concern	10 miles
		Restore fluvial and physical processes that increase riparian area and function	300 acres

Pacific Flyway Ecoregion

The Pacific Flyway Ecoregion extends 400 miles through the state of California, and is largely comprised of three main hydrologic basins, including the Sacramento River Basin, the San Joaquin River Basin, and the Tulare Basin. California's Mediterranean climate, paired with the unique geology of the Coastal and Sierra Nevada mountain ranges, and the gentle slopes of the valley floor, has developed a unique checkerboard of historically flooded wetlands, uplands, and dynamic riparian systems. This unique combination of habitats provides a uniquely valuable resource for both resident and migratory wildlife that depend on it.

The Pacific Flyway Ecoregion is one the most threatened landscapes in Region 8. Approximately 95% of the wetlands within this ecoregion have been modified for urban development (CA population expected to grow from 39 million to 44 million by 2025), wind and solar development, and conversion to non-compatible agriculture (orchard and vineyard). These direct habitat losses and degradations amplify concerns about species resiliency and mobility throughout the valley in the face of climate change.

Restoration and enhancement of priority habitats within this ecoregion are critical to mitigating the effects of climate change by reducing habitat fragmentation, maintaining habitat connectivity, and promoting fish and wildlife migration or movement to adapt to climate-change-induced habitat dynamics.

Habitat Targets and Goals:

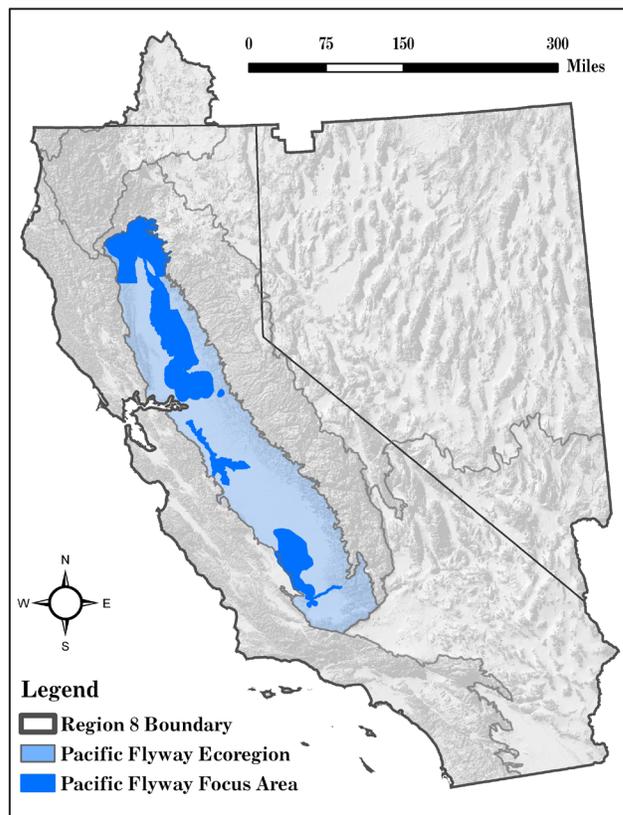
Priority habitats within the Pacific Flyway Ecoregion are coarsely subdivided into seasonal wetlands, permanent/semi-permanent wetlands, great valley riparian, native grasslands, and vernal pools. Each habitat is responsible for supporting an array of federal trust species, and each habitat carries with it a unique set of restoration and enhancement challenges.

Wetlands

As a cornerstone for the Pacific Flyway, the Central Valley provides seasonal wetland basins to support 5.5 million migratory waterfowl and 500,000 shorebirds dependent on the presence and production of these habitats for successful migration and maintenance of healthy populations. Similarly, long-standing semi-permanent wetlands provide habitat to a multitude of waterbird species, federally listed giant garter snakes, and other resident wildlife species. Project Managers often work to increase the wetland footprint and connectivity throughout the valley.

Riparian Woodlands

Similarly tied to the unique hydrology of California's Central Valley are the Riparian woodlands, which accompany the primary rivers of the Sacramento, San Joaquin, and Tulare rivers as



well as their associated tributaries. Project Managers restore habitats through native tree and shrub planting, managed grazing and invasive species removal within these historically dynamic systems.

Native Grasslands

Native grassland habitats contain some of the greatest diversity of Federally threatened and endangered species in the Region. In fact, 90 percent (197) of California's rare and endangered species inhabit the State's grassland ecosystems (California Native Grasslands Association, <http://www.cnga.org>). Degradation of these habitats occurs through changes in plant composition and structure from encroachment by conifers, fire suppression, urban development, and the conversion of land to agriculture. Project managers commonly use prescribed burns, mowing, controlled grazing, hand removal of encroaching shrubs and trees, or thinning to restore and enhance these habitats.

Vernal Pool Systems

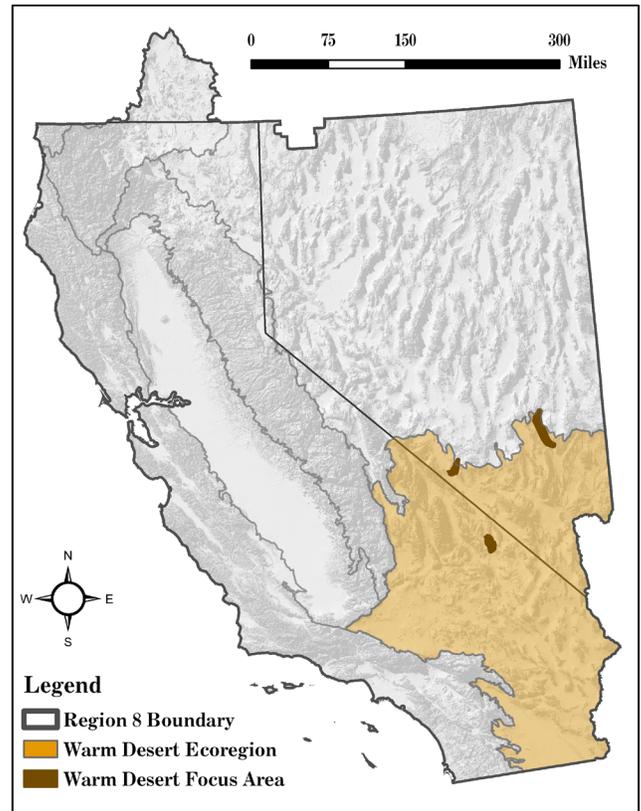
Vernal pools are a characteristic habitat of California and are rapidly being lost to agricultural production. This is specifically related to cropping and orchard systems and urban development. Vernal pools are ephemeral wetlands and occur in depressional areas that are seasonally filled with water. They are typically dry in the summer. Program Managers assist private landowners with managed livestock grazing, which enhances and maintains vernal pool diversity, and restoration activities include excavation of depressional areas where soils with often delicate restrictive layers have not been destroyed through tillage or other land grading practices.

Habitat Target	PFW Objective	Restoration Strategy	Five-Year Performance Metrics
Managed Seasonal Wetlands	Restore and/or enhance managed seasonal wetlands to support migratory waterfowl, shorebirds and other wetland obligate species.	Infrastructure improvements, water efficiency improvements	2500 Acres
		Wetlands Restoration	250 Acres
Permanent/Semi-permanent Wetlands	Restore and/or enhance managed seasonal wetlands to support migratory waterfowl, shorebirds and other wetland obligate species.	Wetlands Restoration	100 Acres
		Wetlands Enhancement	100 Acres
Great Valley Riparian	Restore hydrologic function in riparian areas to support migratory bird populations and river function.	Riparian Restoration, Protection, Enhancement	300 Acres
Native Grasslands	Restore and/or enhance native grasslands to support migratory birds and breeding waterfowl.	Weed control and seeding	250 Acres
Vernal Pools	Maintain and enhance functionality of a network of vernal pool complexes to support a diverse assemblage of vernal pool obligate species and migratory birds.	Vernal Pool Restoration and Enhancement	500 Acres

Warm Desert Ecoregion

The American Warm Desert Ecoregion encompasses portions of the Mojave, Colorado, and Sonoran Deserts. Gently undulating shrub-scrub plains with isolated abruptly rising low mountains characterize this Ecoregion. Elevations range from 280 ft. below sea level to 4,000 ft. above in valleys and basins with elevations around 11,000 ft. in some mountain ranges.

The Warm Desert Focus Area was delineated within the Warm Desert Ecoregion to align the Partners Program efforts to deliver critical habitat conservation and restoration efforts in three habitats that are essential for maintaining biological diversity in the desert as well as maximizing resilience to climate change. These areas are predominately held in private ownership. Springs, spring outflows, and associated riparian and wetland areas within this Focus Area provide habitat for over 30 endemic species. Threats include dewatering, channelization, grazing management, incompatible recreational use, and non-native plants and animals.



Habitat Targets and Goals:

Priority habitats within the Warm Desert Ecoregion are Desert Springs, Stream/Riparian, and Desert Cienegas. Each of these habitat types support an array of federal trust species and carries a unique set of restoration and project challenges.

Desert Springs

Isolated springs support several endemic fish species and springsnails within Region 8. Desert springs provide important resources for riparian and migratory birds in an otherwise extremely dry landscape. These distinct habitats are threatened by water development, agricultural conversion, incompatible recreation use, and subject to nonnative plants and animal establishment. Conservation actions in desert springs are designed to remediate those threats with projects expanding and maintaining those habitats where possible. Desert spring systems are also identified as very vulnerable to the effects of climate change.

Stream/Riparian

Stream and river systems such as the Colorado River and its tributaries, the Amargosa River, and the Mojave River provide important habitat for aquatic and riparian dependent species. Dominant woody vegetation includes cottonwoods, willows, and mesquite trees. Many stream segments are ephemeral, and the systems are heavily impacted by water diversions, irrigation inputs, or flow regulation. Additional threats include invasive plant species, channelization, recreation and urban development, and nonnative aquatic species invasion. Restoration projects in these habitat types typically remove invasive plants, install native vegetation, manage grazing, and improve instream habitat.

Desert Cienegas

Cienegas are water-saturated and poorly drained wetland areas associated with perennial spring and seep systems in isolated arid basins of the southwest. Cienegas support marsh and wet meadow habitat surrounding isolated springs. The Amargosa River system has several cienegas that support the endemic Amargosa toad and Endangered Amargosa vole. These systems also provide habitat for endemic fish including the endangered ridgeway rail and other cryptic marsh bird species. Cienega habitats are unique to the desert west and rapidly disappearing. High priority restoration projects generally manage vegetation and restore hydrology.

Habitat Target	PFW Objective	Restoration Strategy	Five-Year Performance Metrics
Isolated Springs and Springbrooks	Enhance aquatic and riparian habitat at desert springs and springbrooks to make populations of endemic species more sustainable and resilient over time	Wetland Vegetation & Water Management	5 Acres
		Riparian Planting; Vegetation Management	5 Acres
		Aquatic Habitat Restoration	1 Mile
Desert Cienegas	Enhance and create bulrush marsh habitat to make populations of Amargosa vole more sustainable and resilient over time	Restore Hydrology; Vegetation Management	1 Acre
Stream/Riparian	Create and restore conditions that support self-sustaining populations of endemic fish in perennial reaches of desert rivers and streams and provide good quality breeding and migratory bird habitat in riparian areas	Vegetation and Grazing Management; Native Planting	25 acres
		River and Stream Restoration Techniques	5 Miles

Schoolyard Habitat

The Schoolyard Habitat Program (SYH Program) represents a “non-geographic” Ecoregion for the Partners Program in Region 8 for the purposes of this plan. It operates across the Region without a specific geographic Focus Area because its focus is primarily on school grounds and with students and teachers. The SYH Program provides education and outreach primarily for the Partners Program but also supports most other Service programs in Region 8. SYH Project Managers are located in various field stations around the Region and deliver key strategic messages through activities that: (1) encourage and foster community-based partnerships with schools through teacher and student activities (in partial support of portions of Goals 2 and 3 of this plan); and (2) provide and construct native habitats through habitat restoration in schoolyards to create outdoor classrooms that foster the next generation of conservation stewards. The Region 8 SYH Program has a programmatic strategic plan in development, which aligns the Youth Program Planning and Education model (National Conservation Training Center) with the SHC model for adaptive management planning.

The SYH Program’s mission is to enhance student understanding of the importance of the Service’s trust resources and instill knowledge and appreciation of native landscapes in students by: (1) implementing “hands-on” restoration projects targeting native habitats at schools; (2) providing related education, outreach, and interpretation; and (3) supporting educators by offering topical teaching resources and programs. The SYH Program is committed to Connecting People with Nature, while addressing conservation priorities aligned with Service, Department of the Interior, and Department of Education priorities.

There are more than 10,000 public schools within Region 8 educating approximately seven million students. That includes the Los Angeles Unified School District, which is the second largest urban school district in the United States. The SYH Program in Region 8 was established in 2008 with a single SYH Project Manager in the Regional Office. It now includes seven total Service personnel including four full-time (with support from numerous other Service programs) and two part-time SYH Project Managers. They are located in the following field stations: Ventura Fish and Wildlife Office, Stone Lakes National Wildlife Refuge, Yreka Fish and Wildlife Office, Klamath Falls Fish and Wildlife Office, Northern Nevada Fish and Wildlife Office, and a part-time contractor co-located with the Garden Network of Sonoma County. (See Box 2)

Schoolyard Habitat Restoration

Schoolyard Habitats are typically small scale habitat improvement projects focused on creating and restoring native habitats on or near school grounds. These are projects where students and communities gather and participate in rich hands-on experiences that support student learning and inspire “a love of” nature. Successful Schoolyard Habitat projects become a key component in a diverse array of features that schools use to support student learning in a variety of subjects that extend far beyond conservation topics. For example, at many schools math and art teachers use the habitats for projects and lessons to inspire students and make curricula more meaningful and memorable to students.

Schoolyard Habitat projects must be planned, designed, implemented, and sustained by the school community. Projects address multiple environmental and educational concepts that benefit youth, the community, and the environment. The most successful projects are also designed to simultaneously achieve the mission and goals of the school, the Service, and other cooperators. Student involvement in the design and their ownership of the project area are also important components that provide opportunities for leadership, stewardship, and a sustained connection to the environment. These projects are time intensive and generally beyond the realm of regular school business. The Service provides on-site technical assistance to educators, administrators, students, and community members to create effective outdoor classrooms on their school grounds.

Education, Outreach, and Interpretation

The goals of the SYH education component are to promote environmental literacy, long-term stewardship, and outdoor skills among its constituents. These goals are aligned with the North American Conservation Education Strategy and core concepts CE Strategy). The SYH Program uses the CE strategy as a foundation for program messaging, and the SYH Project Managers teach children, families, and local communities directly about conservation with a strong emphasis on Federal Trust Resources, migratory birds, threatened and endangered species, and inter-jurisdictional fish. Additionally, the SYH Program promotes other Service priorities such as monarch butterflies and pollinators with the overall intent to build an informed and involved citizenry who appreciate fish, wildlife, and other conservation issues.

Each SYH Project Manager uses locally relevant content in their programming to support the Partners Program Project Managers. They build trust within their communities by offering information and activities associated with their Ecoregion priorities. Schoolyard Habitat Project Managers exemplify conservation jobs and careers within federal service to a broad array of students by sharing their knowledge and passion and displaying professional characteristics at schools. SYH Project Managers model positivity and inspire youth to develop and pursue careers in the conservation field.

Teacher Support

Teacher-training workshops are a key activity for the SYH Program. These workshops expand teacher knowledge and skills on conservation issues. The workshops enable teachers to learn about local natural resources and priorities. They in turn share these curricula with their students via indoor and outdoor lessons. Teacher training enables the SYH Program to reach a greater number of students over time since these same teachers influence a new group of students each year.

Schoolyard Habitat Target	Education Objective	Education Strategy	Five-Year Performance Metrics
Schoolyard Habitat Restoration Projects	Implement small-scale habitat improvement projects	Restore habitats: Forest/ Woodland Meadow/Grassland Wetland/Water Feature Pollinator/Monarch Xeriscape	45 projects (50% located at Title 1 schools) 150 school site visits
Education, Outreach, and Interpretation	Provide conservation education messaging about Trust Resources	Booth/ table at fair or festival Camp/ Field Trip Informal Classroom presentation Group assembly Guided walk/ bus tour Public use program Webinar/ Video conferencing Formal, curriculum based program Distribute publications	Engage 10,000 students
Teacher Support	Deliver Teacher Training	Workshop Conference Webinar/ Video Conferencing Online resources (activity downloads/ how-to information)	Engage 500 teachers

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Appendices

Appendix A: Comprehensive tables with priorities

Appendix B: Worksheet and interview questions for establishing interim priorities with Service leadership and external partners

Pacific Flyway

Primary Focus Area	Landscape Target	Target Objective	Species or Habitat Target	Trust Resource	Supporting Plans	Restoration Strategy	Priority Level	Five-Year Performance Metrics	Units
Pacific Flyway	Managed Seasonal Wetlands	Restore and/or enhance managed seasonal wetlands to support migratory waterfowl, shorebirds and other wetland obligate species.	Wintering and migrating waterfowl and shorebirds	Migratory Birds	Inter-Mountain Region Joint Venture, Central Valley Joint Venture Plan, North American Waterfowl Management Plan	Infrastructure improvements, water efficiency improvements	High	2500	Acres
						Wetlands Restoration		250	
	Permanent/Semi-permanent Wetlands	Restore and/or enhance managed seasonal wetlands to support migratory waterfowl, shorebirds and other wetland obligate species.	Locally nesting waterfowl, waterbirds, giant garter snake	Migratory Birds, ESA Listed Species	Inter-Mountain Region Joint Venture, Central Valley Joint Venture Plan, North American Waterfowl Management Plan; Recovery Plans	Wetlands Restoration	High	100	Acres
						Wetlands Enhancement		100	
	Stream/Riparian	Restore hydrologic function in streams and riparian areas to support migratory bird populations, river function and fisheries	Migratory Birds, ESA Listed Species,	Migratory Birds, ESA Listed Species	Point Blue Conservation Science Riparian Bird Plan, Central Valley Joint Venture Plan, Inter-Mountain Region Joint Venture	In-Stream form and function restoration, flood plain reconnection, Riparian Restoration, Protection, Enhancement	High	300, 2	Acres, Miles
	Native Grasslands	Restore and/or enhance native grasslands to support migratory birds, breeding waterfowl and over wintering/breeding ungulates.	Migratory Birds; Breeding Waterfowl; Antelope, Elk	Migratory Birds	Central Valley Joint Venture Plan, Inter-Mountain Region Joint Venture	Weed control and seeding	High	TBD	Acres
	Vernal Pools	Maintain and enhance functionality of a network of vernal pool complexes to support a diverse assemblage of vernal pool obligate species and migratory birds.	Vernal Pool Obligates; Migratory Birds	Migratory Birds, ESA Listed Species	Central Valley Joint Venture Plan, Recovery Plans	Vernal Pool Restoration and Enhancement	Moderate	500	Acres

Appendix A

Klamath Basin

Primary Focus Area	Landscape Target	Target Objective	Species or Habitat Target	Trust Resource	Supporting Plans	Restoration Strategy	Priority Level	Five-Year Performance Metrics	Units
Klamath Basin	Upper Klamath Basin (upstream of Keno)	Create and restore conditions that support self-sustaining populations of native fish through out the Upper Klamath Basin	Lost River Sucker; Shortnose Sucker; Bull Trout; native salmonids	ESA Listed Species; Interjurisdictional Fish	Recovery Plans; NFWF Business Plan; Settlement Agreements	Riparian Grazing Management	High	25	Miles
						Riparian Planting	Moderate	70	Acres
						Levee Removal (Connectivity)	High	4	Miles
						Instream Habitat Improvements	High	8	Miles
						Fish Passage Improvements	Moderate	10	Structures
						Stream Channel Realignment	High	5	Miles
	Create Treatment Wetlands	Moderate	20	Acres					
	Upper Klamath Basin (Keno to Iron Gate)	Restore and/or enhance managed seasonal wetlands to support migratory waterfowl, shorebirds and other wetland obligate species.	Migratory Birds	Migratory Birds	Intermountain West Joint Venture Plan (SONEC); Refuge CCP	Wetlands Restoration/Creation	High	5700	Acres
	Mid-Klamath Basin	Create and restore forest health and function in the Mid-Klamath Basin	Northern Spotted Owl	ESA Listed Species	Recovery Plan	Vegetation Management	High	500	Acres
						Fish Passage Improvements	High	3	Structures
		Create and restore conditions that support self-sustaining populations of native fish through out the Mid-Klamath Basin	Anadromous Fish	ESA Listed Species; Interjurisdictional Fish	Recovery Plans	Wetlands Restoration	High	1	Acre
						Instream Habitat Improvements	High	2.5	Miles
						Riparian Habitat Improvements	High	25	Acres
						Wetlands Restoration/Creation	Moderate	5	Acres
		Protect and restore rare and declining habitats and species that occur in the Mid-Klamath Basin	Yreka Phlox	ESA Listed Species	Recovery Plan	Road Decommission	Moderate	1	Acre
						Wetlands Restoration/Creation	Moderate	2	Acres
	Create and restore forest health and function in the Mid-Klamath Basin	Migratory Birds	Migratory Birds	Birds of Conservation Concern (2008)	Uplands Vegetation Management	High	1000	Acres	
					Large Wood Addition	High	5	Miles	
	Lower Klamath Basin	Create and restore conditions that support self-sustaining populations of native fish through out the Lower Klamath Basin	Anadromous Fish	Interjurisdictional Fish; ESA Listed Species	Recovery Plans; Lower Klamath Restoration Plan	Off-channel Wetlands Restoration	High	5	Acres
						Instream Habitat Improvements	High	7	Miles
						Beaver Dam Analogue	Moderate	3	Structures
						Riparian Habitat Improvements	Moderate	7	Miles
						Road Decommission-uplands connected to aquatic resources	High	200	acres
						Road Decommission	High	10	Miles
						Fish Passage Improvements	Moderate	2	Structures
						Create and restore forest health and function in the Lower-Klamath Basin	Oak Woodlands	Migratory Birds	Birds of Conservation Concern, Partners in Flight Landbird Conservation Plan
	Trinity River Basin	Create and restore conditions that support self-sustaining populations of native fish through out the Trinity River Basin	Anadromous Fish	Interjurisdictional Fish; ESA Listed Species	Recovery Plan; Trinity River Restoration Plan	Instream Habitat Improvements	Moderate	1	Miles
Anadromous Fish			Interjurisdictional Fish; ESA Listed Species	Recovery Plan; Trinity River Restoration Plan	Fish Passage Improvements	Moderate	2	Structures	
Create and restore forest health and function in the Lower-Klamath Basin		Oak Woodlands	Migratory Birds	Recovery Plan; Trinity River Restoration Plan	Uplands Vegetation Management	Moderate	23	Acres	
					Wetlands Restoration/Creation	Moderate	2	Acres	
Create and restore conditions that support native wildlife populations in floodplain areas of Trinity River tributaries.		Wetlands	Migratory Birds, native amphibians and western pond turtle	Trinity River Restoration Plan; Partners in Flight Landbird Conservation Plan	Wetland enhancement/creation	Moderate	10	Acres	

Primary Focus Area	Landscape Target	Target Objective	Species or Habitat Target	Trust Resource	Supporting Plans	Restoration Strategy	Priority Level	Five-Year Performance Metrics	Units				
Great Basin	Sagebrush ecosystem	(1) Reduce fire risk and improve habitat quality in sagebrush ecosystems and priority sage-grouse habitat; (2) Protect intact sagebrush ecosystems and priority sage-grouse habitat (3) Restore sagebrush ecosystems and priority sage-grouse habitat following fire.	Sagebrush Uplands	Sage-grouse Initiative, Refuge Purpose	Nevada Wildlife Action Plan, Bi-state Action Plan, Elko County Sagebrush Ecosystem Conservation Strategy, Conservation Objectives Team Report, Sagebrush Conservation Initiative, Buffalo Skedaddle Sagegrouse PMU Plan, SGI 2.0	Create Fuel Breaks	Moderate	4,000	Acres				
						Grazing Management	High						
						Vegetation Management	High						
						Grazing Management	High						
						Vegetation Management	High						
						Restore Hydrologic Regime	High						
						Restore Hydrologic Regime	High						
						Fish Passage Improvements	Moderate						
						Grazing Management	High						
						Vegetation Management	Moderate						
Great Basin	Stream/Riparian	Improve stream functioning in perennial streams. Improve riparian habitat Remove non-native fishes from perennial stream Improve aquatic and riparian habitat at springs and springbrooks.	Wet Meadows Streams	Sage-grouse Initiative, Refuge Purpose	Nevada Wildlife Action Plan, Bi-state Action Plan, Elko County Sagebrush Ecosystem	Grazing Management	High	500	Acres				
						Vegetation Management	High						
						Restore Hydrologic Regime	High						
						Restore Hydrologic Regime	High						
						Fish Passage Improvements	Moderate						
						Grazing Management	High						
						Vegetation Management	Moderate						
						Fish Passage Improvements	Moderate						
						Grazing Management	High						
						Vegetation Management	Moderate						
Great Basin	Endemic Aquatic Species	(1) Remove non-native fishes and plants from springs and springbrooks; (2) Improve aquatic and riparian habitat at springs and springbrooks; (3) Separate nonnative fish from native fish in priority spring ecosystems; (4) Maintain adequate flow of springs	Fish and springsnails endemic to Great Basin springs (see State Wildlife Action Plans)	ESA Listed Species	Recovery Plans; NV and CA Wildlife Action Plans; NV Springs Conservation Plan	Non-native control (plant and animal)	Moderate	5	Acres				
						Eliminate/avoid diversions/developments that capture all water from a spring	Moderate						
						Restore Hydrologic Regime	Moderate						
						Seeding/Planting	Moderate						
						Improve/replace water delivery systems	Moderate						
						Director Priority	Monarch Initiative Presidential Memo			Moderate	50	Acres	
						Wet Meadows/Wetlands	Sage-grouse Initiative, Refuge Purpose; Migratory Birds			Recovery Plans; NV Wildlife Action Plan	Moderate	200	Acres
						Wet Meadows/Wetlands	Sage-grouse Initiative, Refuge Purpose; Migratory Birds			Recovery Plans; NV Wildlife Action Plan	Moderate	200	Acres
						Wet Meadows/Wetlands	Sage-grouse Initiative, Refuge Purpose; Migratory Birds			Recovery Plans; NV Wildlife Action Plan	Moderate	200	Acres
						Wet Meadows/Wetlands	Sage-grouse Initiative, Refuge Purpose; Migratory Birds			Recovery Plans; NV Wildlife Action Plan	Moderate	200	Acres

Warm Desert

Primary Focus Area	Landscape Target	Target Objective	Species or Habitat Target	Trust Resource	Supporting Plans	Restoration Strategy	Priority Level	Five-Year Performance Metrics	Units
Warm Desert	Isolated Springs and Springbrooks	Enhance aquatic and riparian habitat at Mojave Desert springs and springbrooks to make populations of endemic species more sustainable and resilient over time.	Endemic Springsnails, Endemic Fish, Endemic Amphibians, Migratory Birds	ESA Listed Species; Migratory Birds	Recovery Plans; Wildlife Action Plans	Wetlands Vegetation Management; Water Management	High	5	Acres
		Enhance aquatic habitat at Mojave Desert springs and springbrooks to make populations of endemic species more sustainable and resilient over time.	Endemic Springsnails, Endemic Fish, Endemic Amphibians	ESA Listed Species	Recovery Plans	Aquatic Habitat Restoration	High	1	Miles
	Rivers and Streams	Create and restore conditions that support self-sustaining populations of endemic fish in perennial reaches of Mojave rivers and streams and provide good quality breeding and migratory bird habitat in riparian areas.	Migratory Birds, Endemic fish, Amphibians	ESA Listed Species; Migratory Birds	Recovery Plans; Wildlife Action Plans	Vegetation Management; Grazing Management; Native Planting	High	25	Acres
			Endemic Fish	ESA Listed Species	Recovery Plans	River and Stream Restoration Techniques	High	5	Miles
			Create and restore conditions that support self-sustaining populations of endemic fish in perennial reaches of Mojave rivers and streams.	Endemic Fish	ESA Listed Species	Recovery Plans	Fish Barrier Removal/Installation	Moderate	1
	Desert Cienegas	Enhance and create bulrush marsh habitat to make populations of Amargosa vole more sustainable and resilient over time.	Amphibians, Amargosa Vole	ESA Listed Species	Recovery Plans	Restore Hydrology; Wetland Vegetation Management	High	1	Acres
	Pollinators/Monarchs	Increase and improve pollinator habitat.	Pollinators	Director Priority	Monarch Initiative Presidential Memo	Seeding/Planting	Moderate	5	Acres
	Urban and Ag. Desert Scrub	Enhance breeding habitat in areas where natural burrows no longer exist.	Burrowing Owl	Migratory Bird	Wildlife Action Plan	Create Artificial Burrows	Moderate	5	Structure
	Managed Seasonal Wetlands	Restore and/or enhance managed seasonal wetlands around the Salton Sea Basin to support migratory waterfowl, shorebirds and other wetland obligate species.	Wintering waterfowl and shorebirds	Migratory Birds	Sonoran Joint Venture, North American Waterfowl Management Plan, Sonny Bono Salton Sea NWRC CCP	Wetlands Restoration, Infrastructure Improvements, Water Efficiency Improvements	Moderate	40	Acres

Northern California Coast

Primary Focus Area	Landscape Target	Target Objective	Species or Habitat Target	Trust Resource	Supporting Plans	Restoration Strategy	Priority Level	Five-Year Performance Metrics	Units
North Coast	Interior Uplands	Conserve wetlands and their associated upland habitats to support specific ecological processes for sensitive coastal amphibian species (Lower Mad River ranches).	Freshwater wetlands, northern red-legged frog, migratory birds, western pond turtle	Migratory Birds	Recovery Plans, status reviews, BCPs	Remove invasive species, Improve hydroperiod for native amphibians, restore wetlands, create wetlands, protect habitat	High	8	Acres
		Conserve native grasslands and associated native species (unknown at this time).	Native Grasslands, Migratory birds; pollinators	Migratory Birds	BCP's.	Work with landowners, improve grazing practices, assist landowners to remove invasive nonnative plant species, develop restoration plans	High	5	Acres
		Create and restore forest health and function (mid-Van Duzen, middle Mad River watersheds, TA on Oak Woodland RCPP)	Migratory birds and cultural resources, deer, elk, pacific fisher	Migratory Birds	Pacific Bird Joint Venture priorities, BCP's	Planting acorns and seedlings, assess oak health, work with grazing plans, protect browsed young trees, remove invasives	Moderate	100	Acres
	Inland Ranges	Work with private landowners to protect (restore, enhance, or create) connectivity between larger habitat preserves such as National Forest Lands, BLM lands, or National Parks (Unknown at this time).	Riparian, pollinators, northern red-legged frog, migratory birds, steelhead, coho salmon	Migratory Birds, Interjurisdictional Fish	Recovery Plans, Critical Habitat, ESA, BCP's	Fencing, Remove Invasive Plants, Plant Native Plants, Increase the structural diversity, Increase pollinator plants, Remove barriers,	Moderate	0.25	Miles
		Work with private landowners to protect (restore, enhance, or create) connectivity between larger habitat preserves such as National Forest Lands, BLM lands, or National Parks (Unknown at this time).	Migratory birds, bald eagle, pacific fisher	Migratory Birds, Species of Concern	BCP's, ESA status reviews	Grazing plans, outreach, forest management (to decrease risk from catastrophic fire)	Moderate	TBD	Acres
	Inland valleys	Improve upland habitat for species such as burrowing owl, pacific fisher, migratory birds, pollinators, and a diversity of native plants (unknown at this time)	Migratory birds, burrowing owl, pacific fisher, pollinators	Migratory Birds, Species of Concern	Recovery plans, ESA status reviews, BCP's,	Grazing Plans; Plant native species (pollinator plants); forest management	Moderate	TBD	Acres
	Interior Freshwater	Improve conditions in Riparian Habitats (Lower Mad River, Lower Mattole River)	Riparian, Migratory Birds, Native flora and fauna, anadromous fish	Migratory Birds, Interjurisdictional Fish	Recovery plans, status reviews, BCP's	Identify degraded locations, work with landowners to understand riparian issues, develop restoration plan,	Moderate	0.25	Miles
		Improve conditions at natural springs on private property	Springs/Upwellings, Migratory birds	Migratory Bird	BCP's	Identify springs, provide restoration support, provide ideas about how to use spring without degradation	Moderate	2	Acres

Central Inner Coast and Transverse Ranges

Primary Focus Area	Landscape Target	Target Objective	Species or Habitat Target	Trust Resources	Supporting Plans	Restoration Strategy	Priority Level	Five-Year Performance Metrics	Units
Central Inner Coast and Transverse Ranges	Interior Freshwater	Conserve and improve existing vernal pool habitats	Vernal Pools, Endemic plants, rare fairy shrimp, CRLF, CTS	ESA Listed Species	Listing docs, recovery plans, 5 year reviews	Identify locations of vernal pools, assess habitat and species presence, coordinate with ES on locations and importance, provide restoration planning and partnering support	Moderate	0.1	Acre (0.1 acre = 1 pool)
		Improve wetlands and their associated upland habitats to support ecological processes for sensitive amphibian species.	Springs, Seeps, CRLF, CTS, migratory birds	ESA Listed Species; Migratory Birds	Recovery Plans 5 year reviews	Control grazing, increase native plant abundance and diversity.	High	1	Acre
		Improve ponds to support specific ecological processes for sensitive amphibian and other species.	CRLF, CTS, endemic plants, fairy shrimp	ESA Listed Species; Migratory Birds	Recovery Plans, 5 year reviews	Increase cover, improve hydroperiod for native amphibians; protect habitat, remove invasive species.	High	5	Acres
	Interior Uplands	Improve upland habitat for listed species	Migratory birds, pollinators, CTS, CRLF, Monarch, GKR, SJKF, burrowing owl	ESA Listed Species; Migratory Birds	Recovery Plans, Audubon Important Bird Areas, Statewide GAP analysis, Bay Area Critical Linkages, Xerces Rangeland Pollinator assessment	Grazing Plans Plant appropriate native species (milkweed, pollinator plants)	High	200	Acres
		Create and restore forest health and function	Oak Woodland	Migratory Birds	The Oak Woodland Bird Conservation Plan (Point Blue), Pacific Birds Joint Venture Plan, HCP's	Planting acorns and seedlings, assess oak health (insects, disease), work with grazing plans, fence browsed young trees	High	10	Acres
	Corridors - River/Stream	Work with private landowners to restore, enhance, or create connectivity between larger habitat preserves	Upland and riparian habitat, Pollinators, LBV, CRLF, Monarch, migratory birds, steelhead	Migratory Birds, Interjurisdictional Fish	Recovery Plans, Critical Habitat, ESA, Audubon Important Bird Areas, TNC (Bay Area Critical Linkages, HCPs)	Remove Invasive Plants, Plant Native Plants, Increase the structural diversity, Increase pollinator plants, Remove in-stream barriers, fence riparian areas	High	4 - 3	Acres/Miles
	Corridors - Upland	Work with private landowners to restore, enhance, or create connectivity between larger habitat preserves	Grassland/schrublands/woodlands	ESA Listed Species; Migratory Birds	Recovery plan, critical habitat, other agency plans	Grazing plans, outreach, forest management	Moderate	50	Acres
	Urban/Suburban Wildlife Habitat; CCDE CICTR	Create stop-over habitat for monarchs and other pollinators	Urban Grasslands/Forblands/Riparian Areas, Monarchs and Pollinators	Director Priority	National Strategy to Promote the Health of Honey Bees and other Pollinators, Monarch Joint Venture Implementation Plan, Region 8 Monarch Action Plan,	Create pollinator gardens: Nectar plants, milkweed	High	200	Acres

South Coast Inland Ranges- Riverside and San Diego County

Primary Focus Area	Landscape Target	Target Objective	Species or Habitat Target	Trust Resource	Supporting Plans	Restoration Strategy	Priority Level	Five-Year Performance Metrics	Units
South Coast Inland Ranges - Riverside and San Diego County	Coastal Uplands	Conserve and improve coastal sage scrub habitat	Coastal Sage Scrub	ESA Listed Species; Migratory Birds	Recovery Plans HCPs	Invasive plant removal, plant native species	High	187	Acres
		Work with private landowners to restore, enhance, or create connectivity between larger habitat preserves	Chaparral	ESA Listed Species; Migratory Birds	Recovery plan, critical habitat,	Grazing plans, outreach, forest management (to decrease risk from catastrophic fire)	Moderate	TBD	Acres
		Improve upland habitat for listed species	Native Grasslands, Forbe-land	ESA Listed Species; Migratory Birds	Recovery Plans, Critical Habitat, ESA, Audubon Important Bird Areas, Statewide GAP analysis	Grazing plans, outreach, decrease risk from catastrophic fire; improve grassland health	High	355	Acres
	Interior Uplands	Create and restore forest health and function	Migratory birds and cultural resources	Oak woodland	Birds of Conservation Concern, Partners In Flight Landbird Conservation Plan	Planting acorns and seedlings, assess oak health (GSOB), work with grazing plans, fence browsed young trees, remove native invasives	High	8	Acres
		Work with private landowners to restore, enhance, or create connectivity between larger habitat preserves	Upland and riparian habitat	Pollinators, Migratory birds, Native flora and fauna	Recovery Plans, Critical Habitat, ESA, Audubon Important Bird Areas, TNC (Bay Area Critical Linkages, HCPs	Remove invasive plants, Plant Native plants, Increase the structural diversity, increase pollinator plants, Remove in-stream barriers, Fence Riparian	High	TBD	Acres
		Restore conifer forest damaged by wildfire or insect pests	Native Conifer Forest, Native flora and fauna	Migratory Birds	HCPs	Collect native seed, replant native conifers	High	100	Acres
	Coastal Freshwater	Conserve and improve existing vernal pool habitats	Vernal Pools, San Diego Button Celerly, Orcutt's Grass, Pogogyne ambrosi, San Diego fairy shrimp, Riverside fairy shrimp	ESA Listed Species	Listing docs, recovery plans, 5 year reviews	Identify locations of vernal pools, assess habitat and species presence, coordinate with Es on locations and importance, provide restoration planning and partnering support	High	1	Acres
		Improve conditions in Riparian Habitats	LBV, SSWVF, CRLF, ARTO, Steelhead, Migratory Birds, Pollinators, Native flora and fauna	Migratory Birds, Interjurisdictional Fish	Listing docs, recovery plans, 5 year reviews	Identify degraded locations, work with landowners to understand riparian issues, develop restoration plan, secure permitting and funding, implement project, communicate with surrounding community; remove invasive species	High	87.1 / 9.8	Acres / Miles
		Improve ponds to support ecological processes for sensitive amphibian and other species.	Western Pond Turtle, endemic plants, fairy shrimp	ESA Listed Species; Migratory Birds	Recovery Plans, 5 year reviews	Control invasive species, improve hydroperiod for native amphibian	High	4	Acres
	Interior Freshwater	Improve conditions at natural springs on private property	Spring/Upwellings, Migratory birds, Native flora and fauna	Migratory Birds	MNTBA, HCPs	Identify springs, provide restoration support, fence and improve spring functionality	High	0.1	Acres
Urban/Suburban Wildlife Habitat		Create stop-over habitat for monarchs and other pollinators	Monarchs and Pollinators, Pollinator Gardens - Grasslands/Riparian Areas: Nectar plants, milkweed	Director Priority	National Strategy to Promote the Health of Honey Bees and other Pollinators, Monarch Joint Venture Implementation Plan, Region 8 Monarch Action Plan,	Plant milkweed in known historic locations, plant nectar plants	High	25	Acres

Sierra Cascades

Primary Focus Area	Landscape Target	Target Objective	Species or Habitat Target	Trust Resource	Supporting Plans	Restoration Strategy	Priority Level	Five-Year Performance Metrics	Units	
Sierra Cascades	Foothill Riparian	Restore hydrologic function in riparian areas to support migratory bird populations and river function.	Migratory Birds; Anadromous Fish	Migratory Birds; Interjurisdictional Fish; ESA Listed Species	Point Blue Conservation Science Riparian Bird Plan; Central Valley Joint Venture Plan; Recovery Plans	Restore Hydrologic Function; Grazing Management	High	10	Miles	
	Oak Woodland	Create and restore forest health and function in the Lower-Klamath Basin	Blue Oak; Valley Oak	Migratory Birds	State Wildlife Action Plan; Point Blue Conservation Science Oak Woodland	Protection; Planting; Grazing Management; Prescribed Fire	Moderate	500	Acres	
	Native Grasslands	Restore and/or enhance native grasslands to support migratory birds and breeding waterfowl.	Migratory Birds; Breeding Waterfowl	Migratory Birds	Central Valley Joint Venture Plan	Weed control and seeding	High		Acres	
	Working Lands			Sandhill Cranes; Other Migratory Birds; Ungulates	Migratory Birds	Central Valley Joint Venture Plan; Sandhill Crane Plan; Partners in Flight Plan	Seeding; Grazing Management	Moderate	250	Acres
				Native Pollinators; Migratory Birds; Riparian Brush Rabbits; Valley Elderberry Longhorn Beetle	Migratory Birds; ESA Listed Species	Xerces Society Native Pollinator Plan;	Hedgerows and native planting; Non-native species management	Moderate	8	Miles
	Mountain Wet Meadow		Southwest Willow Flycatcher, Southern Mountain Yellow-legged Frog, Yosemite Toad, Migratory Birds, Redband Trout, Eagle Lake Rainbow Trout, CA	Migratory Birds; Interjurisdictional Fish; ESA Listed Species	NFWF 2010 Business Plan; UC Davis Vulnerability Assessment; CDFW 2016 Climate Change Vulnerability Assess;	River and Stream Restoration Techniques	High	TBD	Miles	
	High Sierra	Restore aquatic habitat conditions in the high elevation Sierra that support native amphibian and migratory bird populations	Meadow and riparian corridor	ESA Listed Species	Endangered Species Status; Final Rule (Mountain Yellow-Legged Frog)	Grazing Management	High	300	Acres	
						Culvert Replacement		1	Acres	
						Channel Re-alignment; Beaver Dam Analogue		1	Acres	
						Non-native Species Eradication (Brook Trout)		0	Acres	

Appendix B

Strategic Plan Priorities/Objectives/Goals Spreadsheet Description

Purpose and Scope: This table is an effort to compile, align, and organize your priorities, objectives, and goals across your Ecoregion. It is intended to be intuitive, and you are encouraged to be thoughtful but not over-think! You should be creative, and feel free to modify elements of the spreadsheet if they are not working for your group as long as there is agreement to do that. What is most important is that it works for your group. The tool is not meant to be quantitative. It should get your group thinking about important components of our programs without a scoring system or specific ranking.

The ultimate prioritization is up to you and your Ecoregion group. This tool should help you see how various elements of your priorities fit together, and it should help provide a justification for your prioritization, goals, and objectives. It is this rationale that is most important not scores.

1. **Prioritize targets.** This sheet is intended to help your Ecoregion prioritize your targets. It is recommended that you create **three tiers** of priorities. The size of these lists will certainly vary across Ecoregions. (I recommend that you fill in the entire spreadsheet. Then categorize the targets at the end.)
 - a. **Tier 1** Priorities: List those targets that these programs will focus on for **80%** of our efforts within your Ecoregion.
 - b. **Tier 2** Priorities: List those targets that will consume **20%** of the time.
 - c. **Tier 3** Priorities: List targets that will be addressed **occasionally**.
2. **Compile and align targets and priorities across the Ecoregions.** One of the requirements for this plan revision is to connect Partners/Coastal/SYH programs to the Service's Landscape Conservation Design efforts. While formal LCD's are not completed as of yet, it is prudent to describe the work we do in a landscape context to demonstrate the value of restoration at that scale as well as facilitate improved collaboration with a broad array of partners that may be thinking at that scale. Scaling to landscapes at this point will readily enable solid connections to LCD's while those conversations are starting.
3. **Develop an "outline" for the Strategic Plan revision.** The information that you put in the spreadsheet will be what we use to describe the "interim" Ecoregional priorities and objectives. This will be the backbone of the plan for each Ecoregion for the Goal 1: Conserve Habitat chapter. This will enable us to hold true to priorities established by the field stations.
4. **Connect various aspects of Strategic Habitat Conservation.** The information in this table will set us up for creating an SHC framework within each Ecoregion eventually. This SHC design will be developed in each Ecoregion between now and 2020. The SHC design will require that all the linkages listed in the table are well-established including conservation planning, implementation, and monitoring (implementation and effectiveness monitoring).

Agenda for Partners, Coastal, Schoolyard Habitat Priority Worksheet
(Meeting with Project Leaders, other experts, and partners)

1. Introductions and Purpose
2. Overview: Program Strategic Plan Framework and Progress
3. Status Report: Field Station Update on Recent Program Direction and Accomplishments
4. Identify Need for Input on Priorities
5. Purpose of Priority Worksheets and Meetings
6. Priority Worksheet Questions
7. Wrap up---Anything we missed?

Partners/Coastal/SYH Priority Development Worksheet

Purpose: Serve as a uniform approach to developing a means for gathering, prioritizing, and articulating ecoregional and field station priorities from internal and external partners through a structured conversation. Take notes on the discussion

Needs: Identify and list the internal and external partners that will be approached and have conversations with them covering the questions below. Take notes and be prepared to align your results with the other field stations in your Ecoregion.

Worksheet Questions (next page: one question per page for notes)

1. What are the most important Service resource priorities at your field station that habitat restoration and protection can affect? List resources, species, habitat types, whatever you think best. Why? What plans support these? For example, list the resource issues that the Partners/Coastal Program should focus 80% of their resources on (in your opinion).
 - a. Identify the key landscape-scale drivers for your list (include both biological and human-driven).
 - b. What “directives” or influences are driving your list?
 - c. What types of activities (Partners and Coastal) are/will be most effective at addressing these priorities? That is, which of the available tools (project types) will be best to improve conditions for the items on your list.
 - d. Which types of partnerships and with whom would be most important for accomplishing your identified restoration priorities?
 - e. Are there other lower resource priorities that Partners and Coastal Programs should and could address (with less than 20% of their resources)?
 - f. Do the Partners and Coastal Program staff have the correct skillsets in these areas to meet these needs? What do we need to add?
 - g. What about outreach priorities and partnership building priorities?

Which resource priorities have the Partners and Coastal Programs addressed effectively in the past?

- h. Are these still resource concerns in existing or other areas within your office’s geography? Tie this to your answers for No: 1.
- i. Looking back: are there opportunities we missed? What can these programs do better in the future based on what you’ve seen?

2. What are the key ecological threats that habitat protection and restoration projects can be an effective tool at addressing?
3. What are the key program limiting factors to effectively address your priority restoration needs (e.g., is there a lack of NGO's in an area or is nobody focused on a certain area?)
4. How can Partners/Coastal best communicate with your office/program about mutual opportunities and/or outreach? What improvements can we make?
5. How should we fit other Service priorities into these programs? For example, National MOU's, National initiatives, programs.
6. Schoolyard Habitat and Connecting People with Nature specific questions:
 - a. What resource priorities (environmental education topics) do you want me educating youth and the general public about?
 - b. List the education/ outreach issues that the Schoolyard Habitat Program should focus 80% of their resources on (in your opinion).
 - c. What outreach messages do you want me to convey during SYH and CPWN activities/ programs/ presentations? Should these messages be aligned with Regional or station specific priorities or both?
 - d. How should be market/ publicize these activities? How can we more effectively engage with Service social media?
 - e. What type of activities are/ will be most effective at addressing these priorities? That is, which of the available tools (project type/ activity) will be best to improve conditions for the items on your list?
 - f. What resource, outreach and partnership priorities have the Schoolyard Habitat/ CPWN programs addressed effectively in the past?
 - g. What are the Schoolyard Habitat Program and/ or office limiting factors to effectively addressing your education and outreach priorities?
 - h. How important is it that I align my lessons/ work to DOE's NGSS and Common Core standards? If programs are aligned, will this create more buy-in from schools?
 - i. Are there specific demographic populations I should be working with?
 - j. What opportunities are there for working with refuges/ urban refuge partnerships?
 - k. What resources/ support are available for conducting SYH/ CPWN activities directly from this office? How would you like to see those resources used?
 - l. How do you/ can we encourage staff to participate in SYH/ CPWN activities? Are employees required to contribute time as part of their performance plans? Is there an (What is the?) expectation of the SYH/ CPWN lead to create opportunities for other staff?
 - m. How do you see SYH and CPWN benefitting your office programs and employees?

Strategic Plan for the U.S. Fish & Wildlife Service

Partners for Fish and Wildlife Program Pacific Southwest Region

FY 2017-2021

