

Landscape Conservation Cooperatives

Frequently Asked Questions

What are landscape conservation cooperatives (LCCs)?

Landscape conservation cooperatives (LCCs) are applied conservation science partnerships focused on a defined geographic area. They are fundamental units of planning and science capacity to target the right science in the right places for efficient and effective landscape-scale conservation.

Collectively, LCCs will comprise a national network focused on helping conservation agencies and organizations support natural systems capable of sustaining abundant, diverse and healthy populations of fish, wildlife and plants. By functioning as a unified network rather than independent entities, LCCs can accomplish a conservation mission no single agency or organization can accomplish alone.

What should conservation organizations know about LCCs?

LCCs are partnerships—they are not owned by the Department of the Interior, or the Fish and Wildlife Service, or any other single entity. State fish and wildlife agencies, tribes, conservation and environmental organizations, universities, and other

stakeholders will combine to make these cooperatives come to life and share in their governance.

LCCs will complement and build on the current science and conservation work of existing partnerships, such as fish habitat partnerships, migratory bird joint ventures and flyway councils, as well as species- and geographic-based partnerships.

What are the primary functions of an LCC?

Landscape conservation cooperatives will:

- Support biological planning, conservation design and adaptive management.
- Share information and data, improve products, and prioritize and coordinate research.
- Design inventory and monitoring programs.
- Help partners identify common goals and priorities.
- Support landscapes capable of sustaining abundant, diverse and

healthy populations of fish, wildlife and plants.

- Provide a strong link between science and conservation delivery.
- Continue to take advantage of state-of-the-art technology and cutting edge science that is peer reviewed.
- Regularly evaluate the effectiveness of scientific information and conservation actions.
- Maintain scientific credibility and provide support for management decisions by publishing new methods, controversial findings and other noteworthy products in peer-reviewed journals.
- Focus primarily on priority species and habitats, identified by the partnership.
- Provide a forum for continuous exchange and feedback among partners, scientists, bio-climate modelers and fish, wildlife and habitat managers.

Do all LCCs share common core functions, governance and structure?

For LCCs to function as a national framework, and ultimately, an international model for collaborative landscape conservation, common core functions, governance, and structure are essential. Key components will include:

- A steering committee of executive and management level representatives from partner organizations, which will provide management direction and set priorities;



Brian Jonkers

Landscape conservation cooperative partnerships strategically link science with conservation actions.

- An LCC coordinator;
- A science and technology coordinator;
- GIS capability;
- Population modeling capability;
- Monitoring and evaluation capability; and
- Decision analysis expertise.

What are some LCC products and services?

With a clear focus on modeling, conservation design, decision-support and evaluation of monitoring data, LCCs will provide unique support for effective adaptive management. Some of the products and services that LCCs will produce include:

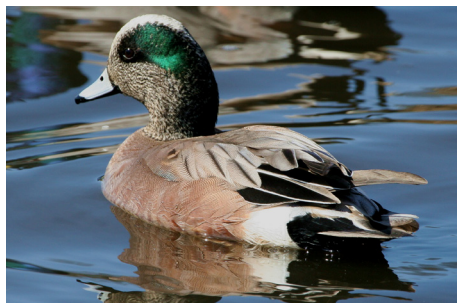
- Integrated data for seamless spatial modeling of species and habitats, within and across geographic area boundaries;
- Explicit and measurable biological objectives, focusing on population objective variables;
- Population modeling linking fish, wildlife, and plant populations to habitat and other limiting factors;
- Identification of areas of converging and overlapping climate and non-climate stressors;
- Application of downscaled climate models to predict effects on fish and wildlife;
- Predicted ranges of native species and invasive species under temperature and precipitation projections;
- Vulnerability assessments for fish, wildlife, plants, and their habitats;
- Conservation strategies that spatially integrate biological objectives for species groups, management practices, and ecological functions and processes;
- Monitoring and assessments to predict the ability of the landscape to support and sustain priority fish and wildlife populations;
- Decision support systems and tools that help define what is needed, how much is needed, and where;

- Short- and long-term adaptation approaches at spatial scales meaningful to natural resources and LCC partnership interests;
- Maps of potential corridors linking present and future habitat, incorporating considerations of conservation genetics;
- Evaluation of genetic consequences of habitat fragmentation on small populations;
- Identification of high-priority research and technology needs.

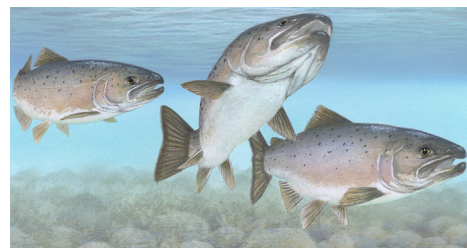
How will LCCs work?

The Service will initially provide funding and other resources to assist new LCCs with basic planning, coordination, assembling core staff, and meeting associated needs for operational support. Later, the LCC partnership will determine responsibilities for further funding core science, administrative and management functions. Conservation organizations may fund some positions or provide in-kind services, but neither is required for participation.

- Core staff may be co-located within a partner facility, while complementary staff may participate virtually from remote locations. Funding for staff may come from multiple sources.
- The LCC coordinator will facilitate the link between science and management as well as providing day-to-day leadership and direction of the LCC staff and partnership.
- All staff positions, including the coordinator, may be supported through any LCC participating organization, or shared between organizations.
- LCC scientists will share their expertise both within and across LCCs by participating in local and



American Wigeon Drake
Donna Dewhurst/FWS



Atlantic salmon

Timothy Knepp

national training and mentoring programs.

- Staff may be added in phases as the LCC matures and demand for LCC products and services change and grow.

Are LCCs climate-specific?

LCCs will be integral to climate change adaptation efforts, but they are not climate-centric. They will provide science support for conservation activities that will address a variety of broad-scale challenges that affect species and habitats, such as water scarcity, species invasion, wildlife disease and a changing climate.

What is the relationship between LCCs and DOI Climate Science Centers?

LCCs and DOI Climate Science Centers form the cornerstones of Interior's integrated approach to climate-change science and adaptation. Each has a distinct science and resource-management role but also shares complementary capacities and capabilities.

Climate Science Centers will provide the latest climate science information and data and help LCCs develop modeling tools and conduct site-specific studies of climate impacts and species and habitat responses. LCCs will use this information to develop landscape-scale conservation plans that will inform conservation delivery activities and assist participating organizations in focusing their management decisions and conservation actions. In turn, LCCs will provide Climate Science Centers with information on species and ecosystem responses to climate change and the effectiveness of their conservation actions.

For more information on landscape conservation cooperatives, visit <http://www.fws.gov/science/shc/lcc.html>