

Great Northern LCC Resource Managers Connectivity Workshop

April 15-16, 2015
Bozeman, Montana



ISTOCK



JOE RUS



GARY TABOR

About the Great Northern LCC



The Great Northern Landscape Conservation Cooperative is a voluntary network of partners working to address common landscape conservation goals. We work together to identify commonalities among our efforts and build consensus to enact a regional approach to landscape conservation. We work across boundaries and jurisdictions, and share data, science, and capacity to achieve common goals.

CONNECTIVITY was chosen as a shared landscape objective pilot project of the Great Northern LCC steering committee, and is one of the four strategic goals: *Conserve a permeable landscape with connectivity across aquatic and terrestrial ecosystems, including species movement, genetic connectivity, migration, dispersal, life history, and biophysical processes.* This goal is impacted by the threats of conflicting land use and development and climate change.

FOR MORE INFORMATION, Please Review:

Great Northern LCC Strategic Conservation Framework
http://greatnorthernlcc.org/sites/default/files/documents/gnlcc_framework_final_small.pdf

Connectivity Atlas
<http://databasin.org/groups/b571859e82a54359968ab52a00dc27>

Workshop Website
<http://greatnorthernlcc.org/event/646>

Great Northern LCC Website
<http://greatnorthernlcc.org/>

About the Workshop

By the end of this workshop, we will have collectively agreed upon priority landscape connections within the GNLCC and drafted a connectivity work plan.

Objectives

1. Become familiar with existing landscape connectivity science and map products including significant gaps.

Based on the groundwork of the atlas, we will present an overall summary of connectivity within the GNLCC landscape. We will be able to identify geographic areas that are under-served/under-studied (perhaps a map with a bar graph of number of connectivity science projects in each area) as a way to understand gaps.

2. Understand the diverse institutional landscape and partnerships required for effective connectivity conservation, and begin to form these partnerships.

We will help participants visualize (map) the jurisdictions, initiatives, and ownership within the GNLCC landscape and discuss how the hierarchy and diversity of institutions and roles impacts the work of connectivity conservation.

3. Review successful connectivity strategies and tactics, with case study examples relevant to attending agencies.

Regional case studies will address the following questions: What has been done? How have mitigation projects, protected areas, acquisition, or other strategies/tools been applied across jurisdictions on the landscape? Who is engaged (the organizations and agencies) in these efforts? What is the hierarchy of land managers and regulatory frameworks and their roles? What have these initiatives achieved?

4. Generate recommendations to the GNLCC Steering Committee and partners around short-term priorities and a long-term strategy for funding and actions that maintain and enhance connectivity throughout the GNLCC.

The work of maintaining and enhancing connectivity across the GNLCC is a long-term effort. The goals of this workshop are to create tangible short-term strategies in which GNLCC partners can work together to initiate this process and map out a long-term strategy for continued efforts.

Desired Outcomes

1. A better understanding of how to integrate landscape connectivity data and jurisdictional and institutional mandates to inform project planning.
2. Identify information gaps and identify how to overcome barriers in order to enact connectivity conservation projects and actions.
3. Recommended initial priority connectivity opportunities, priorities (based on ecological urgency, pending developmental threats or institutional/regulatory limitations), and needs on the GNLCC landscape for collective action. The recommendations to the Steering Committee will (1) identify how and where GNLCC partners can work together toward common goals, and (2) identify what we still need to know and a strategy for how to fill these gaps.
4. Identify next steps on the road to implement initial priorities and to develop a connectivity strategy for the GNLCC region.

The product resulting from the workshop will be a multi-partner connectivity strategy for the GNLCC. It may look like a matrix with GNLCC-wide strategies along one axis and partners along the other axis; in each cell is the commitment of the partner/agency/institution to action.

This workshop is facilitated by the Center for Large Landscape Conservation

The Center for Large Landscape Conservation strategically connects ideas, individuals, and institutions to catalyze collaboration and amplify progress toward the imperative of our time: to conserve Earth's resilient, vital large landscapes.

Our vision is a dynamic collaboration of ideas, individuals, and institutions that creates a network of connected natural areas resilient to large-scale environmental challenges.

Our mission is to catalyze, advance, and support large landscape conservation by advocating policies and strategies that champion ecological connectivity, advancing science that informs critical decision making, and building communities of invested stakeholders around large landscape issues.



<http://largelandscapes.org//>

Getting Here

Lodging

Two options are available for lodging, both within easy walking distance of the workshop venue.

City Center Inn, Magnuson Hotel

507 W Main St, Bozeman, MT 59715

<http://city-center-inn.magnusonhotels.com/>

(406) 587-3158

A block of rooms has been reserved under *Great Northern Connectivity Conference*; please make your reservation before **March 31, 2015**.

The Lark Motel

122 W Main St, Bozeman, MT 59715

<http://www.larkbozeman.com/>

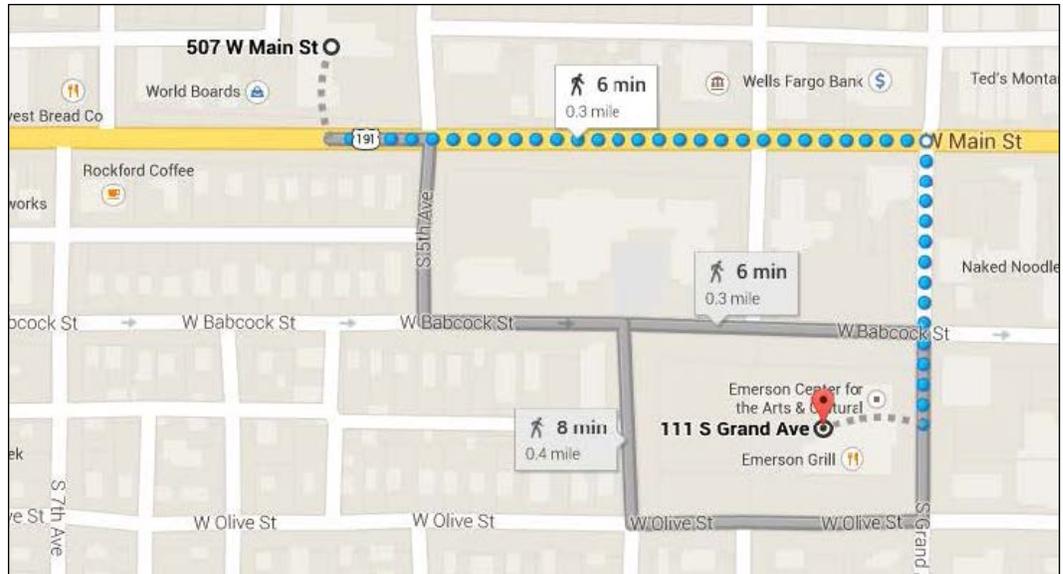
(866) 464-1000

A block of rooms has been reserved under *Great Northern Connectivity Conference* at a government rate of \$86/night. Please make your reservation before **April 7, 2015**.

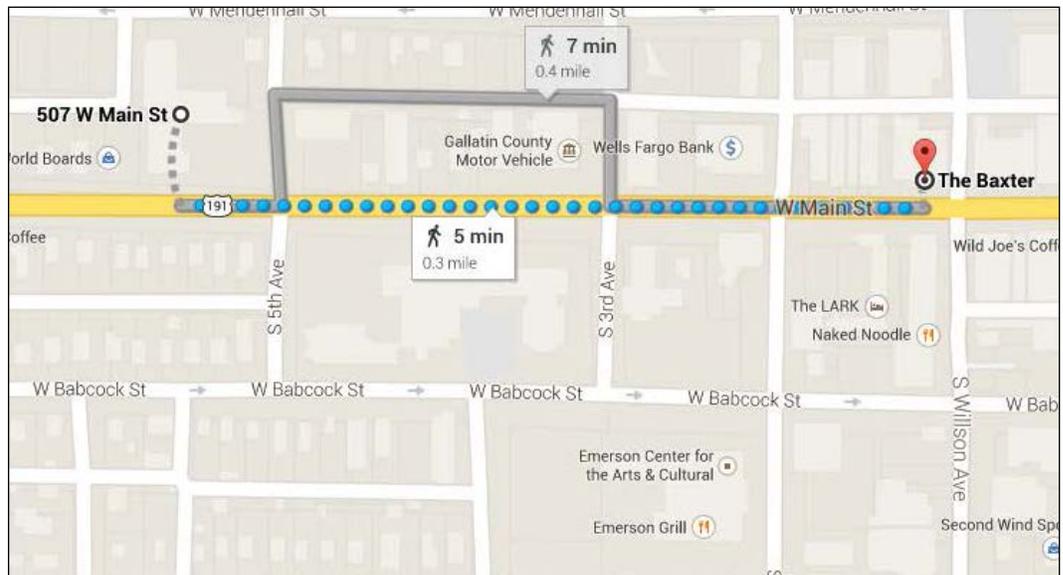
A taxi ride to or from the airport is approximately \$30. Contact Greater Valley Taxi at (406) 587-6303 or at www.greatervalleytaxi.com.

Workshop Locations

Emerson Center for the Arts and Culture
111 S Grand Avenue, Bozeman, MT 59715



The Baxter Hotel
507 W Main Street, Bozeman, MT 59715



The meeting locations are an easy walk from the hotel, as are downtown Bozeman restaurants. We'll meet at the Emerson (top) as our workshop venue. We'll have dinner at the Baxter Hotel (right) the first night with a dinner speaker.

Agenda

April 15, 2015

Day 1—Identify Priority Landscape Connections

Meet at the Emerson Center for the Arts and Culture

8:00-8:45 (45 min) Welcome and Introductions—Scott Bischke

Quick intro from Scott, short self-introductions by participants so everyone knows who is in the room.

8:45-9:05 (20 min) The Challenge Ahead—Tom Olliff

Connectivity was identified by the Great Northern LCC Steering Committee as a shared landscape outcome; one of two pilot projects. The purpose of the meeting is to identify shared actions to facilitate connectivity at the GNLCC level. Tom will address: What does this mean? What will it take? How will we get there? He'll address the inherent scale issues and what we mean by connectivity—why and for what? Outcomes from this meeting will inform recommendations to the steering committee as this project moves forward.

Outcome: Clearly define the scope of the workshop (limitations and constraints as well as focus) and the scope of this project moving forward.

9:05-9:15 (10 min) Review Agenda and Background –John Pierce

John will review the desired outcomes of the workshop and the specific product(s) we're working toward.

Outcome: Specifically lay out where we are headed and what we will achieve.

9:15-10:45 (90 min) A Landscape of Opportunities and Threats— Meredith McClure and Dave Theobald

Meredith and Dave will present key features of the atlas including connectivity opportunities, gaps in knowledge, and land use stressors on the landscape at a coarse scale across the GNLCC. They will provide an overview of the different kinds of information available at different scales and discuss application of this information to on-the-ground connectivity management questions..

Handout: participants will have a hard copy summary of the atlas, links to access maps and data on line, and large maps will be printed in the room for use in discussions.

Outcome: The presentation will set up the following discussion.

10:45-11:00 BREAK

11:00-12 noon (60 min) Group Discussion: Priority Connections I

The purpose of this session is to initiate discussion about priority geographic areas and record initial reactions that capture opportunities, threatened areas, gaps that need more investigation, and other major points. (Worksheet 1)

Outcome: Initial thoughts on priority landscape connections based on science in atlas.

12 noon-1:00 LUNCH (provided on site at no charge to participants)

1:00-1:30 (30 min) The Institutional Lay of the Land—Gary Tabor

Gary's presentation will summarize the jurisdictional and institutional complexity of the GNLCC landscape: the roles, mandates, and decision-making realms of various institutions including federal agencies, state and provincial agencies, tribal agencies, county jurisdictions, private landowners, and private organizations such as industry/companies, nonprofit organizations, and foundations.

Outcome: Opportunities, barriers, and strategies will be presented for how diverse institutional partners can work together for connectivity.

1:30-3:00 (90 min) Group Discussion: Priority Connections II

The purpose of this session is to capture participant institution mandates and jurisdiction, priorities, up-coming opportunities (e.g., forest planning), and barriers related to connectivity. (Worksheet 2)

Outcome: Initial thoughts on priority landscape connections based on partner institution jurisdiction and mandates.

3:00-3:15 (15 min) Case Study of Connectivity in Action: Crown Managers Partnership—Erin Sexton

Erin will talk about the Crown Managers Partnership and how priority landscape linkages were collaboratively identified and next steps for management action.

3:15-3:30 (15 min) Case Study of Connectivity in Action: Grizzly Bear Connectivity Mapping and Management in the Canada-US Transborder Region—Michael Proctor

Michael will present work by the Trans-border Grizzly Bear Project to translate science into action through field studies, connectivity modeling, and on-the-ground management actions in priority grizzly bear linkage areas.

3:30-3:45 BREAK

3:45-5:00 (75 min) Group Discussion: Priority Connections III

The groups will take the products from the first two discussion sessions and merge them to identify key geographic areas within the GNLCC for short- and long-term priority attention for connectivity. (Worksheet 3)

Outcome: By the end of this discussion we will identify priority linkages for the GNLCC.

5:00-5:30 (30 min) Group Reports: Priority Connections within the GNLCC

The groups report back (10 min/group) and as a full group we decide (by consensus or dot voting) on the highest-priority landscape linkages (short-term and long-term) for connectivity conservation. Be sure to capture the “minority report”—any dissenting ideas that fall away from the consensus.

OUTCOME, DAY 1: Identify landscape and institutional opportunities and challenges, identify priority landscape connections. Summarize gaps in information that were identified during the discussion sessions, and any other suggestions for improving the atlas.

6:00 Dinner at the Baxter Hotel

Cocktails will be available before dinner at the Baxter Hotel bar. Come early to relax and socialize before dinner.

6:30 Dinner presentation: Exploring the Interface between Land Uses and Landscapes in the GNLCC – Brad Stelfox

Using a recently completed web-based landscape simulator (ALCES Online), this presentation will examine the suite of land uses and natural disturbances that are shaping (historical, current, future) the Canadian portion of the GNLCC landscape. Particular attention will be given to spatial and temporal dynamics that are leading to landscape transformation and fragmentation, and the resultant changes in performance of key ecological indicators. The demonstration will also explore the effects of climate change, and the benefits of “best management practices” in mitigating erosion of ecological indicators. The simulation results will indicate that achieving conservation targets will require both BMPs and the adoption of defined limits/thresholds to anthropogenic footprints.

April 16, 2015

Day 2—Strategies and Action Planning

Meet at the Emerson Center for the Arts and Culture.

8:00-8:15 (15 min) Get Focused—John Pierce

Recap of the day before, focus for today’s activities.

8:15-8:35 (20 min) Managers’ Charge—Ian Dyson

“Managers” is any person or party that can influence a desired connectivity outcome on the ground. Ian will address the considerations that go into making an intervention, considerations of scale, and he will review the range of strategies and actions that can be deployed. He will conclude with some personal observations about the role one category of manager (agency managers) can play in effective partnerships and taking action. Ian’s presentation will set the tone for the day about what all managers can do together to reach common goals.

Outcome: We will be introduced to the kinds of interventions, the suite of strategies and actions, and success factors for GNLCC partners to collectively and actively participate in connectivity conservation.

8:35-10:15 (100 min) Group Discussion: Strategies and Action I

In small groups (with mixed institutional representation) based on priority landscape connections, identify the short-term strategies and actions that can be employed by each partner on the landscape. Be as specific as possible. (Worksheet 4)

Outcome: Initial ideas with short-term strategies and actions identified for GNLCC partners in priority landscape. The start of a connectivity work plan.

10:15-10:30 BREAK

10:30-10:45 (15 min) Case Study of Connectivity in Action: High Divide—Michael Whitfield

Putting the pieces together, this example will illustrate how multiple institutions work together to address landscape opportunities and threats through actions that enhance connectivity at a landscape scale.

10:45-11:00 (15 min) Case Study of Connectivity in Action:

Conservation Northwest—Jen Watkins

Jen will present an example of how multiple strategies play out on a landscape, implemented by multiple partners, for connectivity—land acquisition and protection, connectivity science, advocacy, regulation, and crossing mitigation on I-90.

11:00-12 noon (60 min) Group Discussion: Strategies and Action II

Review, add, and refine work from earlier in the morning. Identify the long-term strategies and actions that can be employed by each partner on the landscape. Be as specific as possible.

Outcome: Initial ideas with long-term strategies and actions identified for GNLCC partners in priority landscape. Continue refining a connectivity work plan.

12 noon- 1:00 LUNCH

(lunch is arranged/provided on site and everyone pitches in to pay for their portion; facilitators meet to compare notes)

1:00-1:15 (15 min) Get Focused—John Pierce

To start the afternoon discussions, John will provide a recap of what progress we've made so far and how to proceed the rest of the day. (Instructions to groups for creating/refining strategies and actions.)

1:15-2:15 (60 min) Group Discussion: Strategies and Action III

Pulling it all together: refine short- and long-term strategies at GNLCC-wide scale and priority sub-regions. Refine recommendations for action and draft work plan. Outcome: A connectivity work plan for each priority landscape connection.

2:15-2:30 BREAK

2:30-3:30 (60 min) Report Out

Each group will report out on their work plans. These will be combined into a draft GNLCC-wide connectivity strategy and work plan.

**3:30-4:00 (30 min) Wrap Up and Next Steps, Adjourn—Scott
Bischke**

We'll recap the accomplishments of the workshop and identify next steps and timeline for follow up.

OUTCOME, DAY 2: A collaborative, coordinated connectivity work plan for the GNLCC specific to each priority landscape connection.

Worksheets

WORKSHEET 1

Group Discussion: Priority Connections I

Day 1: 11:00-12 noon (60 min)

Purpose: Initiate discussion about priority geographic areas and record initial reactions that capture opportunities, threatened areas, gaps that need more investigation, and other major points.

Instructions: Divide in three groups (each with a facilitator and recorder), and based on the presentation of the atlas, identify opportunities, barriers (potential problem areas), and any questions or needs for more information. Record group responses to the discussion questions; record information on maps; note other thoughts or ideas that come up in discussion.

Outcome: Initial thoughts on priority landscape connections based on science in atlas.

Discussion questions (15 minutes per question)

1. At the GNLCC-scale, where are opportunities for connectivity where mostly intact landscapes can be protected?
2. Where are opportunities for connectivity where critical areas are threatened?
3. Are there particular problem areas (where there seem to be more barriers)?
4. Where do we see data gaps and need for more information?

WORKSHEET 2

Group Discussion: Priority Connections II

Day 1: 1:30-3:00 (90 min)

Purpose: Capture the existing institutional jurisdictions and opportunities. This discussion will inform priority geographic areas based on partner mandates and jurisdictions.

Instructions: Return to the same three groups from the morning session, and based on the presentation of the institutional landscape, identify opportunities, barriers (potential problem areas), and any questions or needs for more information. Round-robin discussion (by agency/organization represented) that captures participant institutional mandates and jurisdiction, priorities, up-coming opportunities (e.g., forest planning), and barriers related to connectivity. Record group responses to the discussion questions; note any other thoughts or ideas that come up in discussion.

Outcome: Initial thoughts on priority landscape connections based on partner mandates and jurisdictions.

Discussion questions (15-20 minutes per question)

1. Round robin discussion: Where are the “hotspots” for your particular institution (e.g., those places of high value and those places of high contention):
2. Areas where you are currently working?
3. Areas where you are not yet working but intend to?
4. For each area, identify challenges, obstacles, or barriers that exist for your institution? .
5. Identify specific opportunities to engage in a particular landscape (e.g., pending plan development, special permitting in progress, funding for project work, etc.).

Worksheet 2. Example: Institutional Priorities

Partner	Jurisdiction	Mandate (related to connectivity)	Upcoming Opportunities	Barriers	Priorities
e.g., Center for Large Landscape Conservation	(nonprofit)	Connect intact landscapes	Funded projects in the Crown of the Continent region, access to the Practitioners Network of landscape conservation initiatives	(only limited by funding and staff capacity)	Connectivity throughout the GNLCC landscape

WORKSHEET 3

Group Discussion: Priority Connections III

Day 1: 3:45-5:00 (90 min)

Purpose: Identify key geographic areas within the GNLCC for short- and long-term priority attention for connectivity by merging results from the first two discussion sessions.

Instructions: Returning to the same three groups, and based on the results from the first two discussion sessions, identify high-priority landscape linkages for short- and long-term attention. Record group responses to the discussion questions; note any other thoughts or ideas that come up in discussion.

Outcome: By the end of this discussion we will identify priority linkages for the GNLCC.

Discussion questions (20-25 minutes per question)

Based on the previous discussion of landscape opportunities and institutional opportunities, discussion will focus on:

1. What are potential GNLCC-wide priority landscape connections and why?
2. What are potential GNLCC sub-region priority landscape connections and why?
3. Where are some viable short-term (within the next three years) priorities for action and why?
4. Where should there be long-term (more than three years) attention and why?

HANDOUT: DRAFT EXAMPLE GNLCG Connectivity Outcomes

Partners	Policy	Conservation	Restoration	Mitigation
USFS	Include connectivity considerations in forest planning	Maintain and protect critical habitat	Identify critical forest lands for restoration that are within priority landscape linkages	Implement mitigation measures on USFS roads
Montana FWP	Actively participate in W/GA connectivity efforts			Identify state road and needed mitigation measures for key wildlife crossing areas
Idaho DFG	Actively participate in W/GA connectivity efforts			Identify state road and needed mitigation measures for key wildlife crossing areas
BLM	Consider wildlife crossing areas in resource management planning	Protect key wildlife migration areas on BLM lands through the creation of ACECs or other designations	Identify critical areas for restoration of wildlife habitat and linkages	
Crown Managers Partnership	Collaboratively identify and commit to cross-border connectivity projects	Create interagency agreements for the protection of cross-border		
Heart of the Rockies		Work with regional land trusts to identify critical lands for acquisition to conserve wildlife connectivity		
Turner Foundation	Adopt landscape connectivity as a funding priority	Provide funding to organizations conserving landscape linkages		

WORKSHEET 4

Group Discussion: Strategies and Action I

Day 2: 8:35-10:15 (100 min)

Purpose: Identify the short-term strategies and actions that can be employed by each partner on the landscape. Be as specific as possible.

Instructions: Divide into groups specific to each priority landscape identified on the first day. Start drafting the work plan by identifying actions and partners engaged. Use the workshop outcome matrix as a guide.

Outcome: By the end of this discussion we will have an initial start at a work plan.

Discussion questions (30-35 min per question)

1. Among the workshop participants (GNLCC partners), what are the available strategies for connectivity? What are the roles of each partner?
2. What are the short-term (within the next three years) opportunities and challenges for applying strategies collaboratively across institutions?
3. Are there tangible, timely next steps for applying these strategies identified? (What needs to happen to facilitate these strategies and actions? What support do you need?)

Worksheet 4. Example: Short-term strategies.

Partners (list roles)	Policy Action	Conservation/ Restoration Action	Mitigation Action	Next Steps
EXAMPLE: CLLC Build partnerships for connectivity			Partner with WTI to identify critical wildlife crossings and develop strategies with partners	Identify critical partners and key crossings

WORKSHEET 5

Group Discussion: Strategies and Action II

Day 2: 11:00-12 noon (60 min)

Purpose: Identify the long-term strategies and actions that can be employed by each partner on the landscape. Be as specific as possible.

Instructions: Continue to work in groups specific to each priority landscape. Continue drafting the work plan by identifying actions and partners engaged. Review, add, and refine work from earlier in the morning. Facilitators will compare notes over lunch so we can see where we are and what we need to focus on to get to the final product in the afternoon.

Outcome: By the end of this discussion we will have an initial start at a work plan.

Discussion questions (15 min per question)

1. What do we (specifically) want to achieve in the GNLCC for connectivity?
2. What are some opportunities for partner long-term strategies (beyond three years) that can help achieve connectivity?
3. What are some barriers or obstacles that need to be addressed with long-term strategies?
4. Are there other partners missing that need to be engaged? Who and how do they get involved?

Worksheet 5. Example: Long-term strategies.

Partners (list roles)	Policy Action	Conservation/ Restoration Action	Mitigation Action	Next Steps
EXAMPLE: CLLC Build partnerships for connectivity	Advocate for state and federal policies that maintain connected landscapes			Engage the Practitioners Network in identifying key policy opportunities to support connectivity work

WORKSHEET 6

Group Discussion: Strategies and Action III

Day 2: 1:15-2:15 (60 min)

Purpose: Pull it all together—refine short- and long-term strategies at GNLCC-wide scale and priority sub-regions.

Instructions: Continue to work in groups specific to each priority landscape. Continue drafting the work plan by identifying actions and partners engaged. Review, add, and refine work from earlier in the morning.

Outcome: By the end of this discussion we will have an initial start at a work plan.

Discussion questions (12 min per question)

1. Based on the experience of identifying strategies and actions, where did you run into gaps or barriers?
2. What is missing? What additional strategies or partners are needed?
3. What obstacles need to be resolved?
4. How do we move forward a multi-institutional strategy for connectivity within the GNLCC? What support do you need? How can we support each other as we move forward?
5. Refine recommendations for action and draft work plan.

Participants

Support Team

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Speaker Bios

Ian Dyson

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Ian Dyson is a geographer and planner with over 30 years of experience dealing with integrated resource management, water resources, protected areas, land use, and regional cumulative effects management systems in Alberta, Canada. He is a senior manager responsible for provincial planning integration with Alberta Environment and Sustainable Resource Development. His career experiences have focused on building and sustaining partnership approaches to environmental management, conceiving management systems approaches to address environmental cumulative effects, and facilitating institutional and societal capacity to define and meet common, place-based environmental outcomes across boundaries and borders.

Amongst Ian's diverse career experiences, the most satisfying have been those with a geographical and applied focus—the conservation of prairie and parkland biodiversity, watershed management in southern Alberta, and trans-boundary collaboration in the Rockies. In 1999, Ian was awarded the Alberta Emerald Foundation Award for Corporate and Institutional Leadership and he received the Prairie Conservation Award in 2001.

Dr. Meredith McClure, Ph.D.

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Dr. Meredith McClure serves as chair of the technical team for the GNLCC connectivity project. Meredith is a Conservation Scientist with the Center for Large Landscape Conservation (CLLC), where she helps partner organizations and agencies focus limited resources on conserving crucial connections across the Northern Rockies and beyond. Her scientific perspective also helps to inform CLLC's conservation policy and strategy work. Currently, Meredith works jointly with CLLC and our partner organization, Conservation Science Partners. Her past and ongoing work has explored connectivity-related processes in diverse settings. Meredith completed her graduate research in landscape ecology at Montana State

University in 2012, testing models commonly used to predict corridors against actual wildlife movement data. Her past and ongoing work has explored connectivity-related processes in diverse settings.

Tom Olliff

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As co-coordinator for the Great Northern Landscape Conservation Cooperative, an area extending across 260 million acres, **Tom Olliff** takes a broad view of land management and conservation, increasing dialogue across an international landscape, including federal, state, tribal, non-governmental organizations (NGOs), and Canadian organizations, to inform management of land, water, fish, wildlife, and cultural heritage resources in response to climate change and other landscape-level stressors. Tom previously lived and worked in Yellowstone National Park for 32 years, where he served as a backcountry ranger, wildland firefighter, wilderness coordinator, district resource manager, park resource operations coordinator, and finally as the chief of the resources. At Yellowstone, he managed grizzly bear and bald eagle recovery, wolf restoration, northern range elk management, bison management, and native fisheries programs, as well as the park's historic structures and archeological programs. Tom has a MS in resource conservation from the University of Montana; BS in forest management from Auburn University.

Dr. Michael Proctor

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Dr. Michael Proctor lives on the shores of Kootenay Lake in Kaslo, BC. He has been researching grizzly bears in the Kootenays since 1995 and received a PhD in 2003 from the University of Calgary. He is the lead researcher for the Transborder Grizzly Bear Project working to recover the threatened South Selkirk and South Purcell mountain grizzly bear. He uses DNA from the hairs of bears to estimate population sizes, reveal fragmentation due to human settlement and highways, and to explain why bears thrive in some areas. He currently uses GPS radio telemetry to identify critical movement and foraging habitat in order to apply workable conservation solutions to grizzly conservation issues.

Erin Sexton

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Erin Sexton is a Research Scientist and Regulatory Affairs Manager with the Institute on Ecosystems at The University of Montana. Erin came to the Flathead Lake Biological Station in early 2007 to continue her research on the transboundary North Fork of the Flathead River, within in the context of the Crown of the Continent Ecosystem. The transboundary Flathead River is an internationally renowned watershed shared by British Columbia and Montana. Erin began her work on the transboundary Flathead in 2000 as a master's student at the University of Montana, focused on the terrestrial and aquatic impacts of coalbed methane development in the British Columbia portion of the Flathead River. Erin continues her engagement with the Crown Managers Partnership. She was named a Wilburforce Conservation Science Fellow, one of 20 Fellows for 2015. The Wilburforce Fellowship in Conservation Science is a year-long program that empowers scientists with training in leadership and communication to build a community of conservation science leaders who excel in using science to help achieve durable conservation solutions in western North America.

Dr. Brad Stelfox

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Dr. Brad Stelfox is the architect of the ALCES modeling platform and established the ALCES Group in 1995. The ALCES Group is a collection of landscape planners and resource analysts whose mission is to be a world leader in the delivery of land-use cumulative effects simulation modelling tools, strategic land-use planning advice, and the provision of practical strategies to assist governments, businesses, and society make balanced, informed decisions. Our key technologies include ALCES Integrator© (A Landscape Cumulative Effects Simulator), ALCES© Mapper, and ALCES Online. Dr. Stelfox is an adjunct professor at the Department of Biological Sciences, University of Alberta and the Department of Environmental Design, University of Calgary. He and his wife Sarah live in Calgary, Alberta, Canada.

Dr. Stelfox received the William Rowan Award (The Wildlife Society; Alberta Chapter) in 2011, the Outstanding Leadership Award of the Canadian Boreal Initiative (2009), the Alberta Emerald Foundation Award (2004), and the Alberta Science and Technology Award (2003) for his contributions with the ALCES model in advancing understanding of landuse sustainability issues and in seeking solutions that balance economic, social, and ecological indicators.

Gary M Tabor, VMD MEM

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Dr. Gary Tabor is the founder and Executive Director of the Center for Large Landscape Conservation, established in 2007. Focused on the American West, the Center creates strategies to solve nature's large-scale challenges such as climate change, habitat fragmentation, and loss of vital goods and services provided by healthy ecosystems. Tabor currently serves on the Advisory Team of the Great Northern Landscape Conservation Cooperative. He is also a Senior Fellow, University of Montana Center for Natural Resources and Environmental Policy and Co-Director, Roundtable for the Crown of the Continent. Dr. Tabor is helping to create a Network of Large Landscape Practitioners, in conjunction with the Lincoln Institute of Land Policy, an operating foundation. This effort seeks to build capacity, leverage resources, and enhance the policy influence of North America's large landscape conservation community. He also assisted the Yellowstone to Yukon Conservation Initiative in the design and publication of its 2010 report *Moving Toward Climate Change Adaptation: The promise of the Yellowstone to Yukon Conservation Initiative for addressing the region's vulnerability to Climate Disruption*. Tabor is a former elected member to the Board of Governors of the Society for Conservation Biology. He is a member of the Phi Zeta, the Veterinarian Honor Society, and was awarded a Henry Luce Scholar grant.

Dr. David M. Theobald

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Dr. Theobald is a Senior Scientist at Conservation Science Partners and an adjunct professor in the Department of Fish, Wildlife, and Conservation Biology

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Jen Watkins began working with Conservation Northwest in 2001 as part of the outreach team for The Cascades Conservation Partnership. She continues to work on connectivity issues in the Central Cascades with the I-90 Wildlife Bridges Coalition and with our national forests program on the Okanogan-Wenatchee and Mt. Baker-Snoqualmie National Forests. Jen graduated from the University of Washington's College of Forest Resources and has a strong interest in community collaborations and wildlife connectivity.

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Michael B. Whitfield, a long-time leader in the conservation field, is the Coordinator for the Heart of the Rockies Initiative. Michael served on the national Land Trust Accreditation commission with the Land Trust Alliance. He was the founding board president and long-term executive director of Idaho's Teton Regional Land Trust. He's also a conservation biologist and research associate for the Northern Rockies Conservation Cooperative, through which he investigates the ecological needs of sensitive wildlife species, like the bald eagle and bighorn sheep, and partners with management agencies to conserve their habitats. He is a recipient of the Craighead Conservation Award. He completed a B.S. degree in Biology at the University of Utah in 1971, an M.S. in Biology at Idaho State University in 1983, and is a Ph.D. Candidate at Montana St. University in Conservation Biology.

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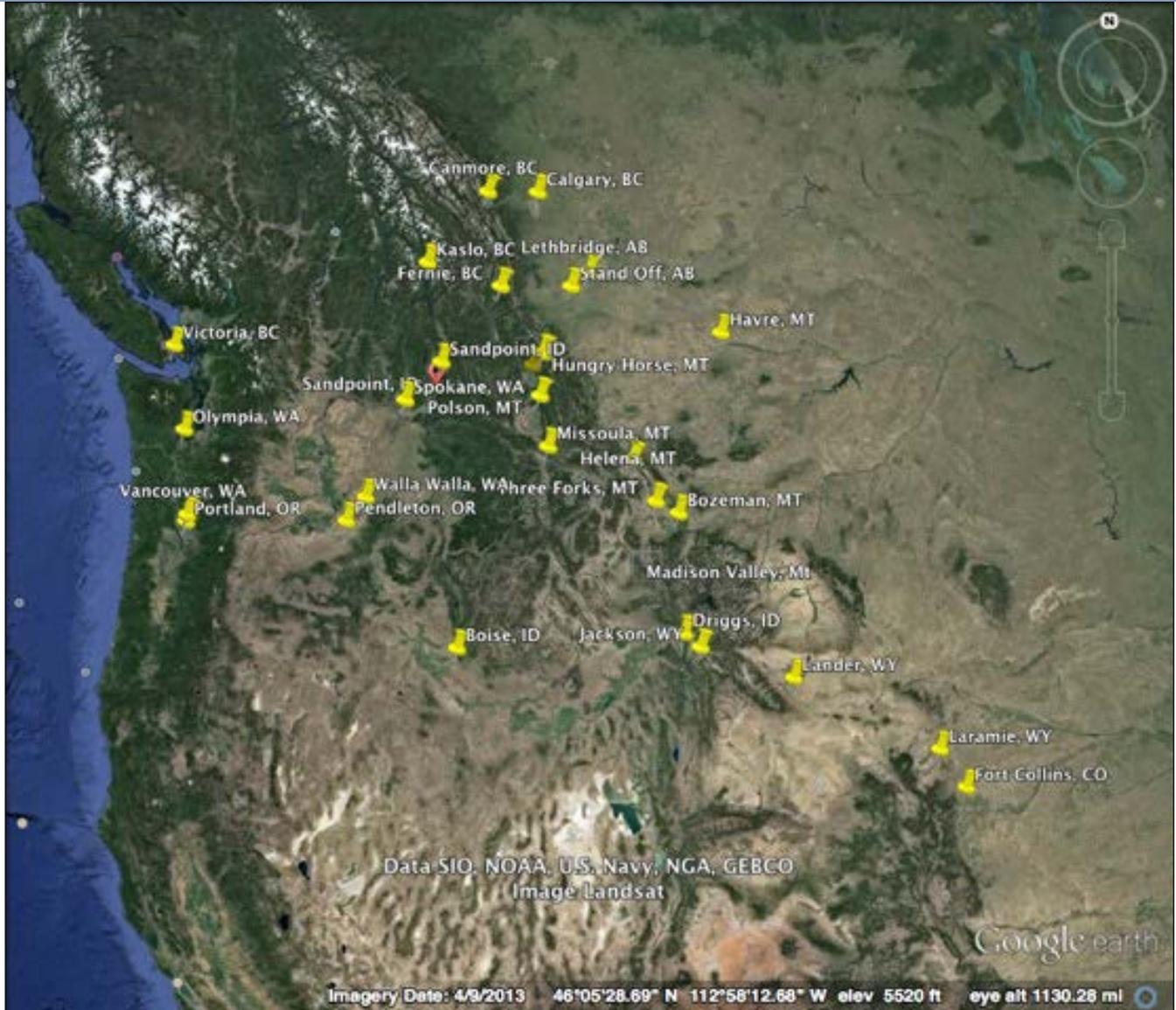
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Workshop participants represent the entire GNLCC geography.

Evaluation

As the GNLCC Connectivity Project continues, your feedback on this initial workshop will be very helpful!

Workshop

1. How useful was this workshop for you?

1	2	3	4	5
Not useful				Very useful

How was it useful? or why wasn't it useful?

2. Please evaluate the components of the workshop on a 1 to 5 scale (1=not useful, 5=very useful)

Day 1 - Identify Priority Landscape Connections

The Challenge Ahead	1	2	3	4	5
A Landscape of Opportunities	1	2	3	4	5
The Institutional Lay of the Land	1	2	3	4	5
Case Study—Crown Managers Partnership	1	2	3	4	5
Case Study—Grizzly Bear Connectivity	1	2	3	4	5
Group Discussion: Priority Connections	1	2	3	4	5
Exploring the Interface between Land uses and Landscapes	1	2	3	4	5

Day 2 - Strategies and Action Planning

Managers Charge	1	2	3	4	5
Case Study—High Divide	1	2	3	4	5
Case Study—Conservation Northwest	1	2	3	4	5
Group Discussion: Strategies and Action	1	2	3	4	5
Wrap up and Next Steps	1	2	3	4	5

Comments:

Atlas

3. How useful did you find the atlas?

<hr/>				
1	2	3	4	5
Not useful			Very useful	

Why/why not?

4. How can you envision using the current atlas in your work?

5. What content and functionality can we add to the atlas to make it more useful to you?

6. What would you suggest as next steps for the atlas?

7. The atlas will expanded to include information of other taxa (birds), ecosystems (aquatic), ecosystem processes (e.g., fire), and stressors (e.g., land use, climate change). Are there particular areas of interest you'd like to see included?

Next Steps

8. How helpful do you think this workshop and resulting strategy will be for maintaining connectivity in the GNLCC?

1	2	3	4	5
Not helpful			Very helpful	

Why/why not?

9. How confident do you feel about implementation of the connectivity work plan resulting from this meeting?

1	2	3	4	5
Not confident			Very confident	

10. What support (besides funding) do you need going forward?

11. Any other comments you'd like to add?

About you

What is your position title?

Optional

Name:

State:

Agency or organization:



Great Northern
LANDSCAPE CONSERVATION COOPERATIVE