







## State of the LCC A Review of Progress and Next Steps

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North Atlantic LCC Steering Committee Meeting Saratoga Springs, New York



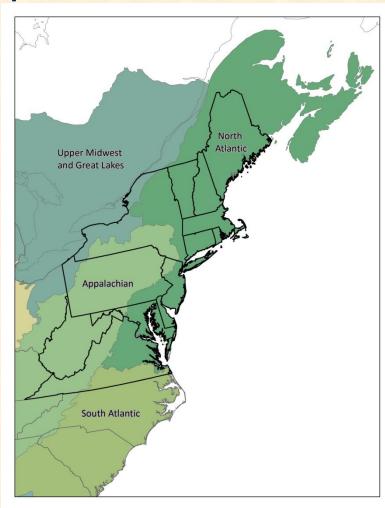
April 10, 2013



North Atlantic Landscape Conservation Cooperative

## The North Atlantic Landscape Conservation Cooperative

- Mission, Components, Framework
- Partnership Development & Operational Capacity
- Science Needs & Projects
- Science Delivery
- Working Across Landscapes
- Communications & Information Management
- Next Steps



#### North Atlantic LCC - Mission

The North Atlantic Landscape Conservation Cooperative provides a partnership in which the conservation community works together to address increasing land use pressures and widespread resource threats and uncertainties amplified by a rapidly changing climate.

The partners and partnerships in the cooperative address these regional threats and uncertainties by agreeing on common goals and jointly developing the scientific information and tools needed to prioritize and guide more effective conservation actions by partners toward those goals.



### North Atlantic LCC Components of Mission

- Ecological Planning
- Conservation Design
- Conservation Adoption and Delivery
- Monitoring and Evaluation
- Research
- Information Management
- Communication and Outreach
- Coordination and Organization







#### **GOAL-SETTING**

Which species/habitats to conserve? At what levels? Who decides?

#### **BIOLOGICAL ASSESSMENT**

What do we know about the status of priority wildlife?

#### **CONSERVATION DESIGN**

What should landscapes look like to conserve species at goal levels

#### **PRIORITIES**

Which species and issues demand immediate attention?

#### INFORMATION **MANAGEMENT**

How will we manage the demand for and creation of data?

#### **SCIENCE TRANSLATION**

How do we make science solutions useful?

#### **MONITORING, EVALUATION AND** RESEARCH

What new information will we gather to support conservation?

#### **CONSERVATION ADOPTION**

How do we get communities and landowners engaged in conservation?

#### **CONSERVATION DELIVERY**

How will we most efficiently put conservation on the ground?

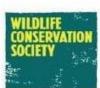


North Atlantic W Landscape Conservation Cooperative

## LCC Partnership





















































MANOMET

Center for Conservation Sciences



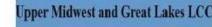


















#### Steering Committee



- 32 Members (14 State, 1 Tribal, 8 Fed.,2 Canadian, 8 NGO, CSC)
- 2012 average meeting attendance39 attendees
- Average representation = 71%
- Meeting frequency quarterly (2 inperson, 2 calls)

- Technical Committee
  - 43 members (7 State, 24 Fed., 1 Can., 8 NGO, 3 LCC)
  - subteams aquatic (12), terrestrial/wetland (16) and coastal/marine (15)
- Demonstration Projects Team 8 members (2 state, 1 fed., 1 tribe, 4 NGO)
- Conservation Design SWAP Synthesis Team with states,
   LCC and FWS
- Conservation Targets Team –12 members (2 state, 2 fed., 1 NGO, 1 univ., 2 regional partnerships, 4 LCC)
- Local Planning and Technical Assistance Team



#### Staff Dedicated to LCC

Position	Agency	Person
Coordinator	U.S. Fish and Wildlife	Andrew Milliken
	Service	
Science	Contract to North Atlantic	Scott Schwenk
Coordinator	LCC	
Conservation	Contract to North Atlantic	Steve Fuller
Design Specialist	LCC (part-time)	
GIS Analyst	Contract to North Atlantic	Lori Pelech
	LCC	
Biological	North Atlantic LCC (part-	Lora Mathers
Technician	time)	(hire new)



#### Staff Providing Partial Support to LCC

Position	Agency	Person
Communications	U.S. Fish and Wildlife Service	Megan Nagel/David
Coordinator		Eisenhauer
GIS Coordinator	U.S. Fish and Wildlife Service	B.J. Richardson
Administrative	U.S. Fish and Wildlife Service	Heather Zackaricz
Assistant		
Assistant Regional	U.S. Fish and Wildlife Service	Ken Elowe
Director		
Regional Scientist	U.S. Fish and Wildlife Service	Rick Bennett
Liaison to Northeast	U.S. Environmental Protection	Tai-ming Chang
LCCs	Agency	
Coastal Landscape	National Park Service	Amanda Babson
Adaptation Coordinator		
GIS Analyst	The Nature Conservancy	Alex Jospe

- Project administration with WMI
- Provided partnership support
  - Support for meetings, workshops and partner travel
    - LCC Meetings as needed
    - SDM workshop at NCTC
    - Baltimore Regional SWAP meeting
    - Hadley Stream Temperature Workshop
    - Amherst Environmental Contaminants
- Annual process, admin. & meetings aligned with NEAFWA to facilitate participation & collaboration

### Science Needs & Projects

# thin.

#### Criteria for prioritizing needs

- Foundational needs for organizing landscape conservation (consistent mapping, decision frameworks)
- Needs that address major threats and uncertainties to sustaining natural or cultural resources in the North Atlantic LCC (land use change, climate impacts, energy)
- Needs that address threats and uncertainties to multiple species or habitats.
- Needs that will inform applied conservation decisions and actions
- Needs that are priorities for existing partnerships in the North Atlantic LCC (NEAFWA, JVs, FHPs, NEPARC etc.)

### 2010 Science Projects

- Regional Climate Change Vulnerability Assessments – Habitats (RCN +)
- Landscape Change & Decision Support Tools
  - Coastal
    - Sea level rise, beaches and piping plovers
  - Aquatic
    - Stream flow, temperature, and brook trout
  - Terrestrial /wetland
    - Designing Sustainable Landscapes
      - Species/habitat
      - Ecological integrity





### 2011 Science Projects

- Foundational Mapping
  - Completing Terrestrial Habitat Map
  - Application of the Coastal and Marine Ecological Classification System
- Species-Habitat Mapping and Modeling
  - Representative Species-Habitat Modeling
  - Mapping the Distribution, Abundance & Risk Assessment of Marine Birds





#### 2011 Science Projects (continued)

- Vulnerability Assessments
  - Regional Climate Change Vulnerability
     Assessments Species
  - Assessing Priority Amphibian & Reptile Conservation Areas & Vulnerability to Climate Change
- Assessments of Landscape Connectivity
  - Permeable Landscapes for SGCN and Rep. Spp. (RCN)
- Information Management
  - Information Management Needs Assessment
- Compilation and Synthesis of Information
  - Northeast Landscape Conservation Design

### 2012 Projects

- Foundational Mapping
  - extend Northeast Wildlife Habitat map into Canada
  - refine Northeast aquatic habitat classification
  - consistent regional intertidal habitat mapping (NWI updates)
- Assessments/Decision Support tools
  - Phase II of Designing Sustainable Landscapes for terrestrial and wetland habitats and species
  - Decision support tools to assess aquatic habitats and threats in North Atlantic watersheds and coastal zone
  - understanding vulnerability of coastal ecosystems and guiding conservation decisions in the face of sea level rise and storms (LCC SDM workshop, CSC funding)

## 2012 Projects (continued)

#### **Demonstration Projects**

- White Mountains to Moosehead Lake Initiative— Parcel Level Planning, Progress Tracking and Stakeholder Engagement to Advance Resilient Landscape Conservation
- Integrating Science into Policy: Local Adaptation for Marsh Migration
- Utilizing Climate Adaptation Science to Prioritize and Amplify Landscape Scale Conservation Efforts in the Appalachian Forests of the North Atlantic Landscape Conservation Cooperative Geography

### Project Management

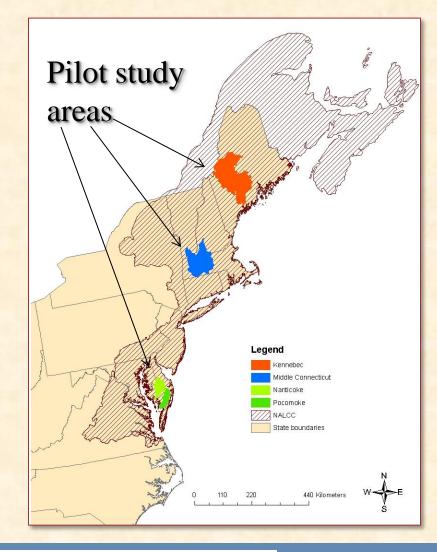
- All projects posted on website <u>http://www.northatlanticlcc.org/projects</u>
  - Summaries, quarterly reports and products
- Spatial data products compiled and synthesized
- All projects get quarterly review and approval by WMI and LCC staff
- Projects include technical and decision-maker input
  - Designing Sustainable Landscapes workshops
- LCC emerging role in bringing together project P.I.s to increase coordination and reduce redundancy
  - Aquatic P.I. example

Science Delivery: Engaging Managers

in Designing DSTs

Three workshops, October, 2012 with > 100 partners attending:

- Increase understanding among conservation decision makers
- Actively involve potential users to make decision support tools relevant and useful
- Begin a long-term collaboration on shared conservation issues across a broad landscape



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## Science Delivery: Northeast Landscape Conservation Design and Synthesis

- Organization, synthesis, science translation and adoption for completed, ongoing and future projects including:
  - organization of existing data to make information more available;
  - synthesis of existing data to develop/compile landscape designs that will allow partners to map and prioritize focus areas for conservation;
  - translation of maps and other tools to make landscape design data useful at various scales and in various formats; and
  - assistance to ensure that science and tools are understood and consistently adopted and implemented in support of on-the-ground conservation.
- GIS Analysts in the LCC and TNC are now working with LCC staff, state and other partners. Initial focus on synthesizing information for the State Wildlife Action Plan Updates.

#### Science Delivery Integrating

Landscape Conservation Designs

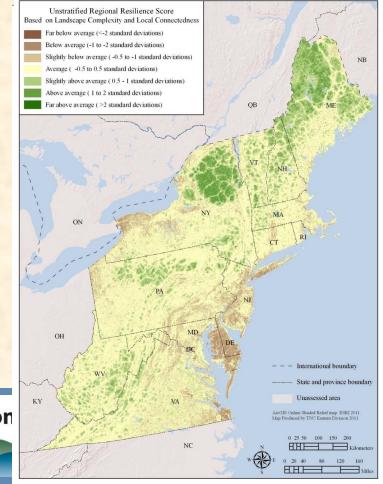
Models and maps (conservation blueprints)

that prioritize conservation actions and

guide conservation decisions towards common

goals based on current and predicted future conditions e.g.

- Habitat maps and condition
- Projections of climate impacts
- Integrity of ecological systems
- Habitat suitability for wildlife
- Resiliency and connectivity



North Atlantic Landscape Conservation

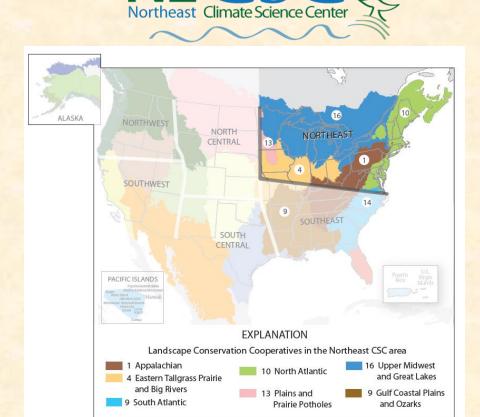
## Science Delivery: Northeast Regional Synthesis, Putting it Together for SWAPs

- Regional context and highlights-what is leveraged through a regional approach
  - Responsibility of each state toward regional goals
  - Regional support and partnerships
- Organization follows SWAP 8 required elements
- Needs
  - Organization of existing information
  - Synthesis to develop/compile landscape designs
  - Translation to make data useful at various scales and formats
  - Assistance with conservation adoption
- Intended audience/use
  - SWAP coordinators
  - States and conservation partners implementing SWAPs

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# Working Across Landscapes Northeast Climate Science Center

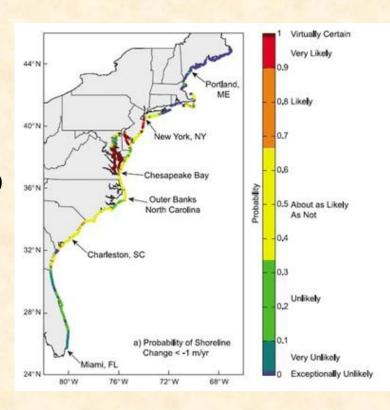
- Critical new USGS and University consortium for providing fundamental science
- Significant LCC staff time to help lead collaboration of CSC with LCCs and prioritization of science needs across LCCs



Approximate boundary of Climate Science Center (CSC)

## Working Across Landscapes: Sea Level Rise Structured Decision Making

- LCC sponsored and led
- Brought together coastal scientists and managers
- Where to invest resources to sustain coastal habitats, species and ecosystem services
- USGS CSC using results for SLR decision model



#### Communications & Information Management: Information Management System

- NALCC Information Management System Components: Conceptual Framework

  VALUE ADDED
  PRODUCTS

   Model Requite
   Management System Components: Conceptual Framework

   Management System Conceptual Framework

   Management
- LCC Team and contractor conducted Information Management Needs Assessment
- Recommendation for system to meet the priority LCC IM needs
- Consistent with adjacent/national LCCs
- Integrated with LCC website

# Communications: North Atlantic LCC Website

 Dynamic Content Management Website

- North Atlantic LCC partners work together to identify common science needs, shared scientific capacity and information and coordinate natural resource conservation

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  Lear more...

  Search Site Search

  Calendar Members Help

  REGISTER LOG IN

  About the North

  Atlantic LCC

  The North Atlantic

  Landscape Conservation

  Coperative is an applied science and management partnership working to protect natural lands, valued resources and the biological diversity that prote environmental benefits and services to the humin communities across the region.

  Participate in the North Atlantic
- Web community all staff and partners can post and share documents
- Currently supporting 12 groups, considering partner websites e.g. Atlantic Salmon partnership
- Announcements, meetings, webinars
- Project information, tracking, online RFPs
- Data portal linking to Information Management System

## Communications: Outreach with Tribes



- 12 federally-recognized tribes in LCC
- Represented by United South and Eastern Tribes (USET) natural resources committee
- USET passed a resolution supporting LCCs but challenging for them to participate
- North Atlantic LCC brought together LCCs and CSCs for joint participation at USET meetings
- Planning tribal forums starting in Maine this summer
- Also potential interest by tribes in science delivery demonstration projects

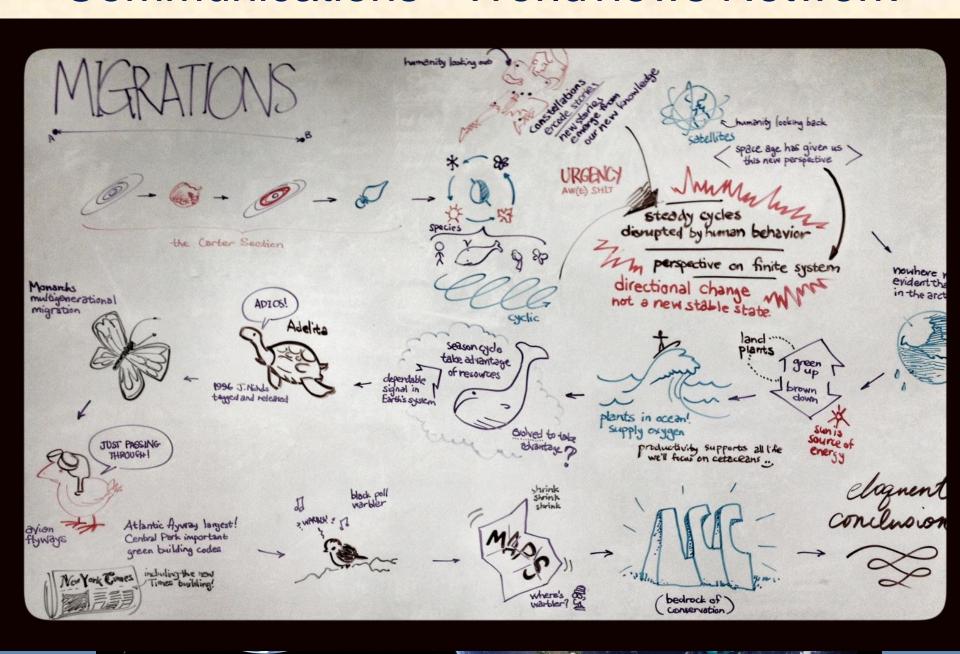


# Communications: Outreach with local planners

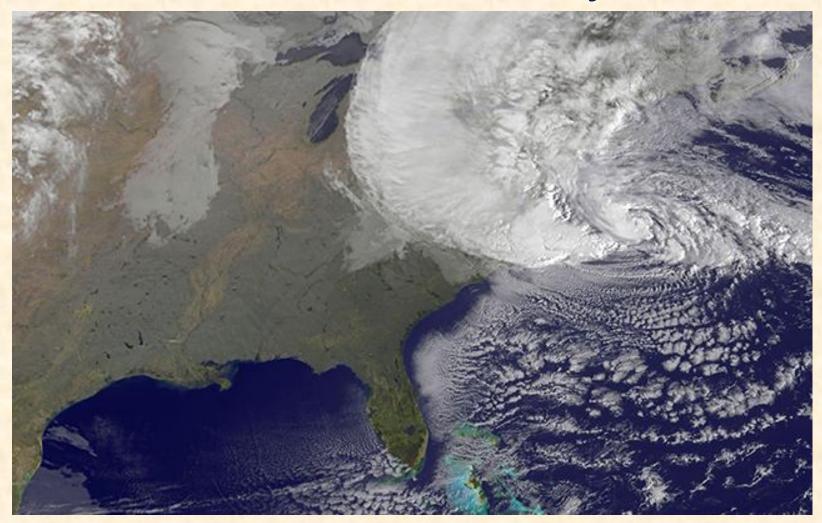
- Planned and participated in Regional Plan Association Doris Duke Northeast Landscape Conference
  - Attended by regional and local planners and land trusts
  - Land trusts great link to local planning
- Planned and participated in a session at the American Planning Association Northern New England Chapter with Maine Inland Fisheries and Wildlife and Manomet
  - Attended by local planners
  - Good feedback on tools presented
  - Need for further simplification and translation
  - Need for town by town training
  - Capacity in each state?



#### Communications - Worldviews Network



## Hurricane Sandy



North Atlantic Landscape Conservation Cooperative



- Partnership Development and Operations
  - Canadian Provinces & NGOs
  - Tribes continue USET, add tribal forums around region
  - Local planners and land trusts state capacity?
  - Delivery partners (e.g. NRCS) as part of science delivery
  - Maintain or increase operational capacity for conservation design, translation and adoption
- Science Needs and Projects
  - Technical committee involvement throughout year
  - Consider broader call for science needs in 2013
  - Coordination with neighboring LCCs & Network
  - Coordination with Climate Science Center
  - Select initial indicators and conservation targets
- Develop cultural resource science needs



- Science Project Implementation & Tracking
  - Oversight committees
  - Science seminars and feedback
  - Manager/User groups for additional projects
  - RFPs online
- Conservation Design, Translation, Adoption
  - Implementation of Landscape Conservation Design & regional synthesis of information for SWAPS
  - Develop science delivery team
  - Testing and delivery of science by partners in subregions (Gulf of Maine, Connecticut River etc.)



- Hurricane Sandy Science Coordination
  - Link between DOI resiliency science and LCC partners
  - Web portal linking information to decision makers
  - Addressing major science needs to make conservation decisions with an understanding of the impacts of sea level rise and storms on beaches, marshes, other coastal habitats and species
  - Develop conservation designs and decision support tools for coastal ecosystems
  - Working with communities on options to help sustain natural coastal systems in the face of sea level rise and storms

- Communications and Information Management
  - Complete full website and web portal
  - Implement Information Management System
  - Congressional outreach
  - Outreach to broader audiences
    - Worldviews network
  - Communicators Community of practice
- What else?
- Questions?
- Ideas?