

# Multiparty Monitoring and Public Learning



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# Multiparty Monitoring



- Compliance

*Does it meet the legal requirements?*

- Implementation

*Did we do what we said we would do?*


- Effectiveness

*Are we effectively accomplishing our goals/objectives?*

- Validation

*Is there a better way to meet the goals/objectives?*

# Why Multiparty Monitoring?

- 
- Increase trust and accountability
  - Determine action, program or management effectiveness
  - Inform adaptive management

# Adaptive Management

*'Management based on a series of feedback mechanisms in a continual cycle of evaluation, planning, action, and monitoring' (Shindler et al 1999)*

Experimental

Strategic

Arbitrary



# Keys to Successful Multiparty Monitoring

1. *Identifying and engaging stakeholders*

2. *Building a common understanding*

3. *Defining project and monitoring goals and indicators*

4. *Developing and implementing a monitoring plan*

5. *Learning from monitoring and assessing project process*

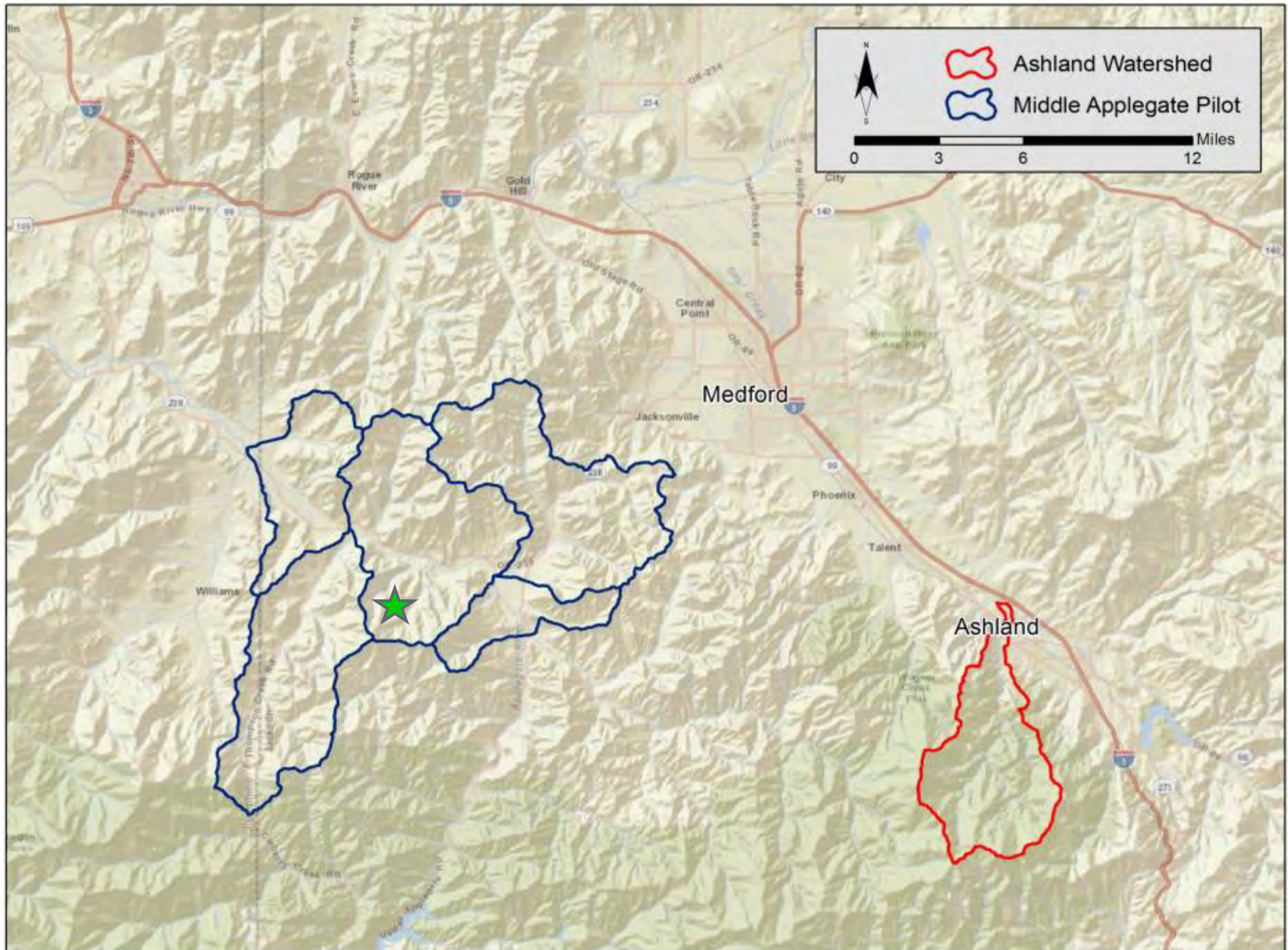
# An Important Question to Ask

Monitoring faces many challenges/constraints

- Time consuming
- Expensive
- Changing agency priorities



How can NGOs and other groups help partner with agencies to build capacity to be able to monitor?




# ***Increase forest ecosystem resistance and resilience***

## Indicators:

- Fire behavior
- Stand density
- Tree vigor
- Mean diameter
- Composition of tree and understory diversity








***Increase spatial heterogeneity to benefit biodiversity and species of concern at the stand and landscape scale***

**Indicators:**

- Canopy cover
- Stand level skips and gaps
- Stand level structural complexity
- Seral stage composition at landscape scale
- Snag and down woody material abundance
- Bird species composition


A photograph of a forest with many trees. In the center, a person is holding a white sign in front of a tree trunk. The sign has handwritten text: 'P10', 'NC 2', '5/30/12', and 'N'. The forest floor is covered with fallen leaves and branches. The background shows a dense stand of trees with green foliage.

***Conserve and improve northern spotted owl habitat through LSEA (late seral emphasis area) design***

**Indicators:**

- Fire behavior adjacent to LSEAs
- Percentage of NRF, dispersal, and unsuitable habitat
- Spotted Owl reproduction and pattern of use

# *Generate jobs and support regional manufacturing infrastructure*

A group of five people are standing in a forest, surrounded by tall, thin trees. In the foreground, a large, dark log lies on the ground. One person on the left is wearing a blue cap and an orange safety vest. Another person in the center is wearing a blue and white plaid shirt and a blue cap. A woman on the right is wearing a black jacket and a black skirt. A man on the far right is wearing a light-colored shirt and dark pants. The forest floor is covered with dry leaves and twigs.

## Indicators:

- Jobs created or maintained
- Board feet and ton weight of material harvested
- Market utilization by product category

# *Gain public support for active management in federal forests*



## **Indicators:**

- Awareness and support of engaged public
- Success of community outreach and engagement
- Scoping and EA comments

# Permanent Photo Points



Conditions at one of 20 FIREMON plots established one year prior to any treatments.

Conditions at the same plot immediately following the hand-piling of remaining activity fuels.

- Visual record across multiple phases
- Baseline to identify changes over time
- Tool for public understanding of stand response to active management

This permanent photo point of a cable yarding corridor was established by the Pilot Joe Multiparty Monitoring Team immediately after completion of the 'finish work'



# Building Capacity, Accountability, and Support



- Sponsored a conference in Oct 2010
- Sponsor field trips
- Worked as citizens on ID teams
- Work on MPM team
- Taken photos/collected data in field to help monitoring efforts
- Work to find funding
- Advocate for agency funding
- Provide agency opportunity (and others) to bring questions to the table
- Got funding- i.e., Title II from RAC
- Create(d) jobs
- Public buy-in

# Ashland Forest Resiliency

- 7,600 acre project area
- 1,700 acres non-commercial thinning
- 1,300 acres commercial thinning
- Cooperative project design
- Cooperative implementation
- Multiparty Monitoring



# ASHLAND FOREST RESILIENCY STEWARDSHIP AGREEMENT





# Technical Stakeholders

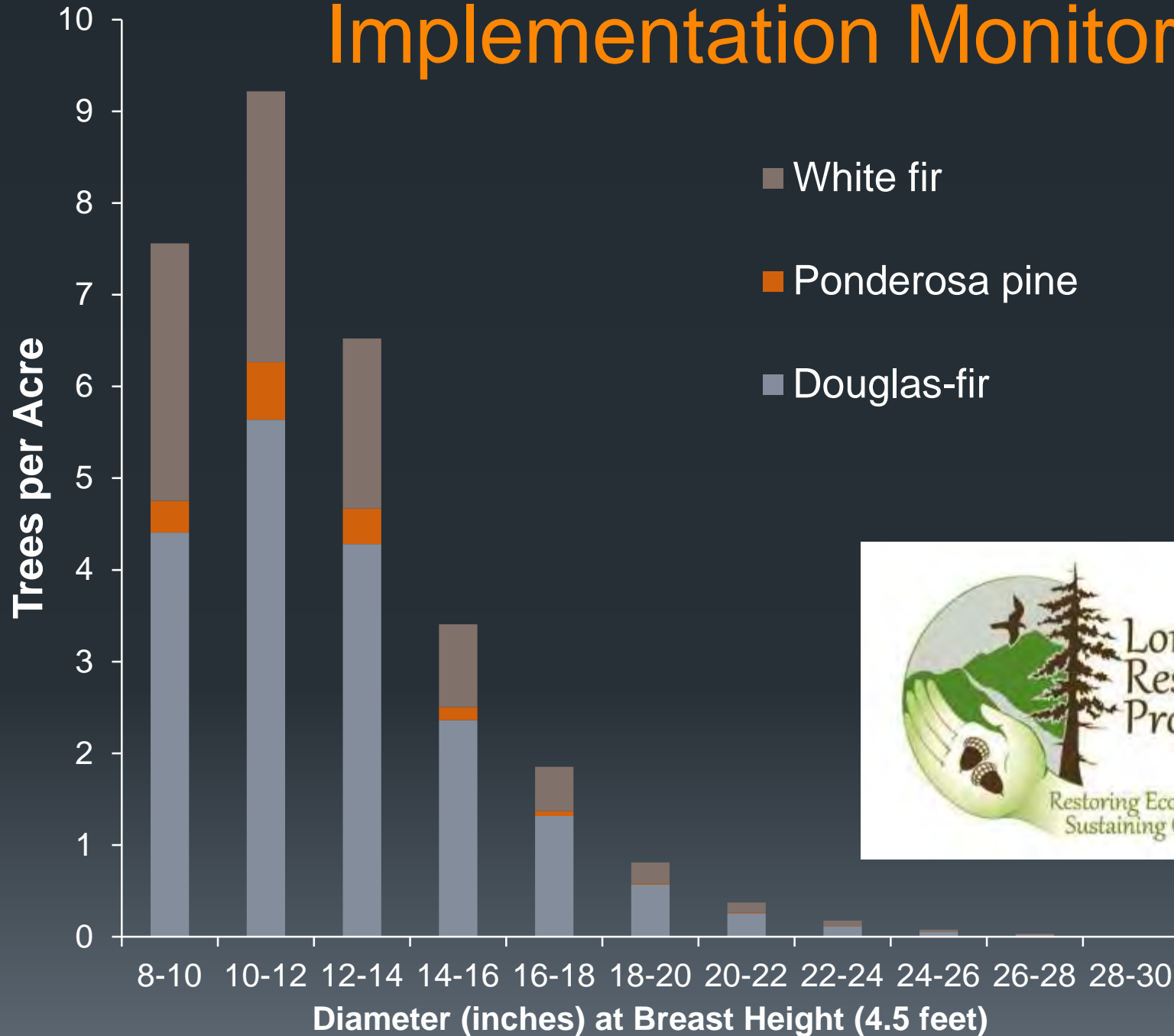
Developing Monitoring Priorities, June 12, 2009



## Monitoring Advisory Committee

- Ellen Goheen - USFS, Forest Health Program
- John Alexander - Klamath Bird Observatory
- John Gutrich - Southern Oregon University
- Mark Shibley - Southern Oregon University
- Eric Dinger- National Park Service
- Dan Sarr- monitoring scientist
- Dave Clayton – USFS, Rogue-Siskiyou NF

# Implementation Monitoring



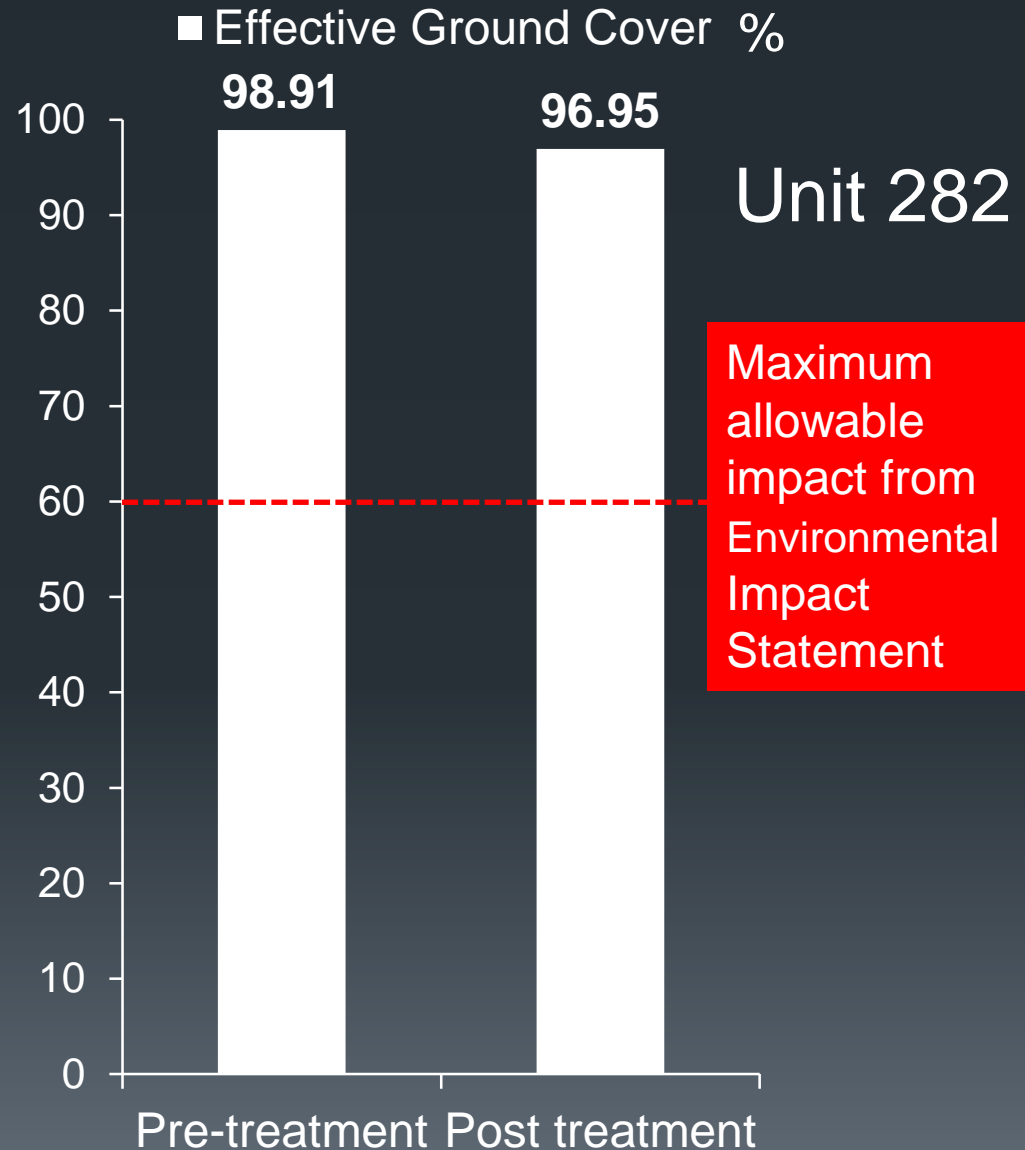
# Implementation Review Team



Southern Oregon Forest  
Restoration Collaborative



# Soil disturbance and effective ground cover

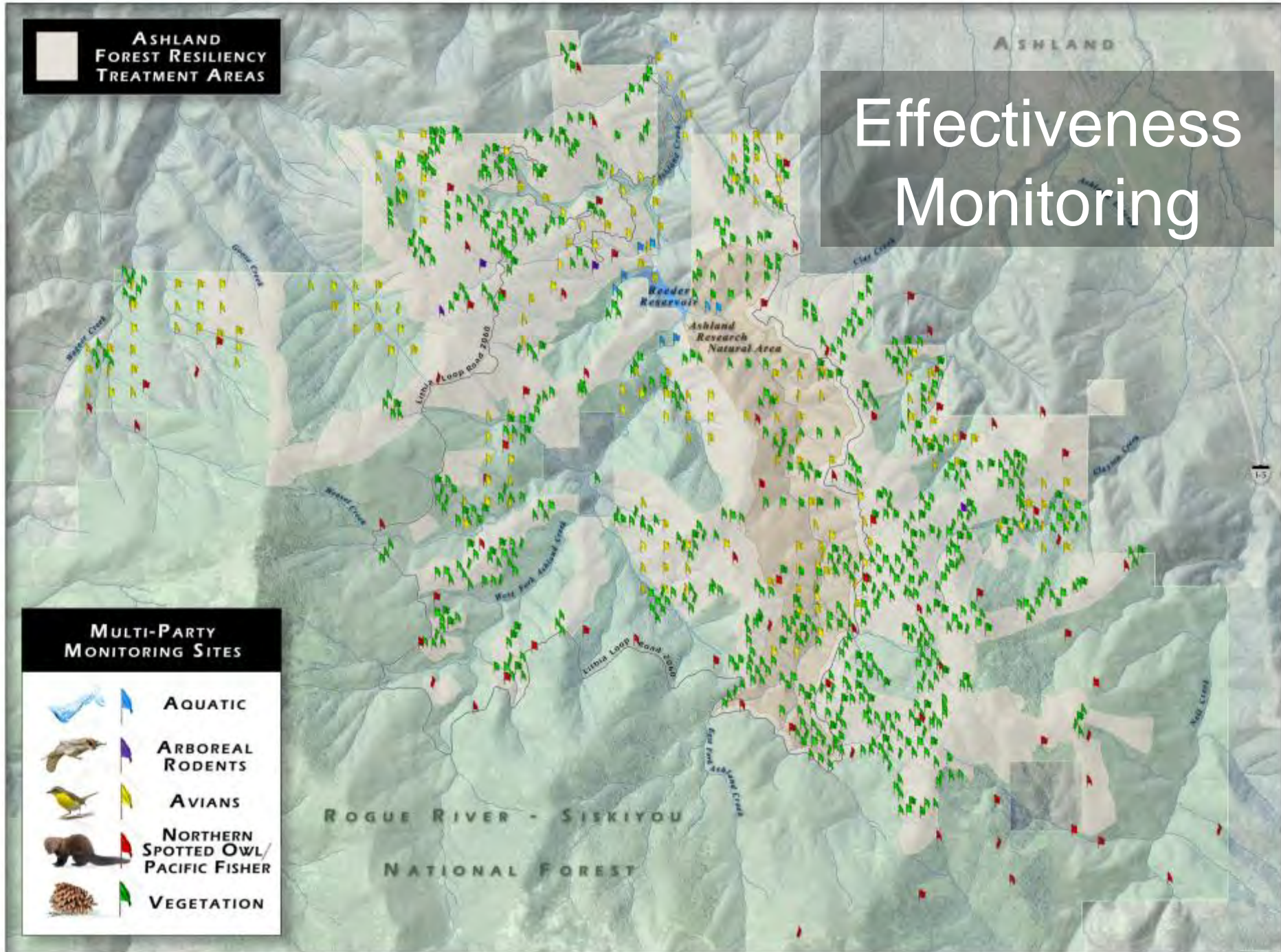


**ASHLAND  
FOREST RESILIENCY  
TREATMENT AREAS**

# Effectiveness Monitoring

**MULTI-PARTY  
MONITORING SITES**

-  **AQUATIC**
-  **ARBOREAL  
RODENTS**
-  **AVIANS**
-  **NORTHERN  
SPOTTED OWL/  
PACIFIC FISHER**
-  **VEGETATION**



# Water Quality and Aquatic Habitat

A photograph of two researchers in a stream habitat. The researcher on the left is wearing a dark blue hoodie with 'PR OF SOERI RECOVER' printed on it. The researcher on the right is wearing a green and grey jacket and glasses. They are both smiling and looking towards the camera. In the background, there is a stream with rocks and a person in a green jacket standing on the bank.

## ■ Indicators

- residual pool depth
- substrate embeddedness
- macroinvertebrate communities
- water turbidity
- sediment accumulation in Reeder

# Baseline Macroinvertebrate data



2010	Preferred	Reeder Gulch	East Fork Ashland Creek	West Fork Ashland Creek	Section 20
Richness	>30	28	34	40	26
Abundance	>500	2643	799	473	795
EPT taxa	>30	14	19	23	19
% Dominant	<30	19.6	30.9	22.0	18.4
Intolerant taxa	>15	6	11	15	6
Tolerant taxa	<5	0	0	1	0

2011	Preferred	Reeder Gulch	East Fork Ashland Creek	West Fork Ashland Creek	Section 20
Richness	>30	26	26	45	25
Abundance	>500	546	461	884	326
EPT taxa	>30	19	17	31	15
% Dominant	<30	26.7	39.9	15.4	27.9
Intolerant taxa	>15	11	12	18	9
Tolerant taxa	<5	0	1	0	0

# Songbird mist netting and point counts

- Indicators

- Songbird community composition
- Individual species utilization of specific habitats

Klamath Bird  
Observatory





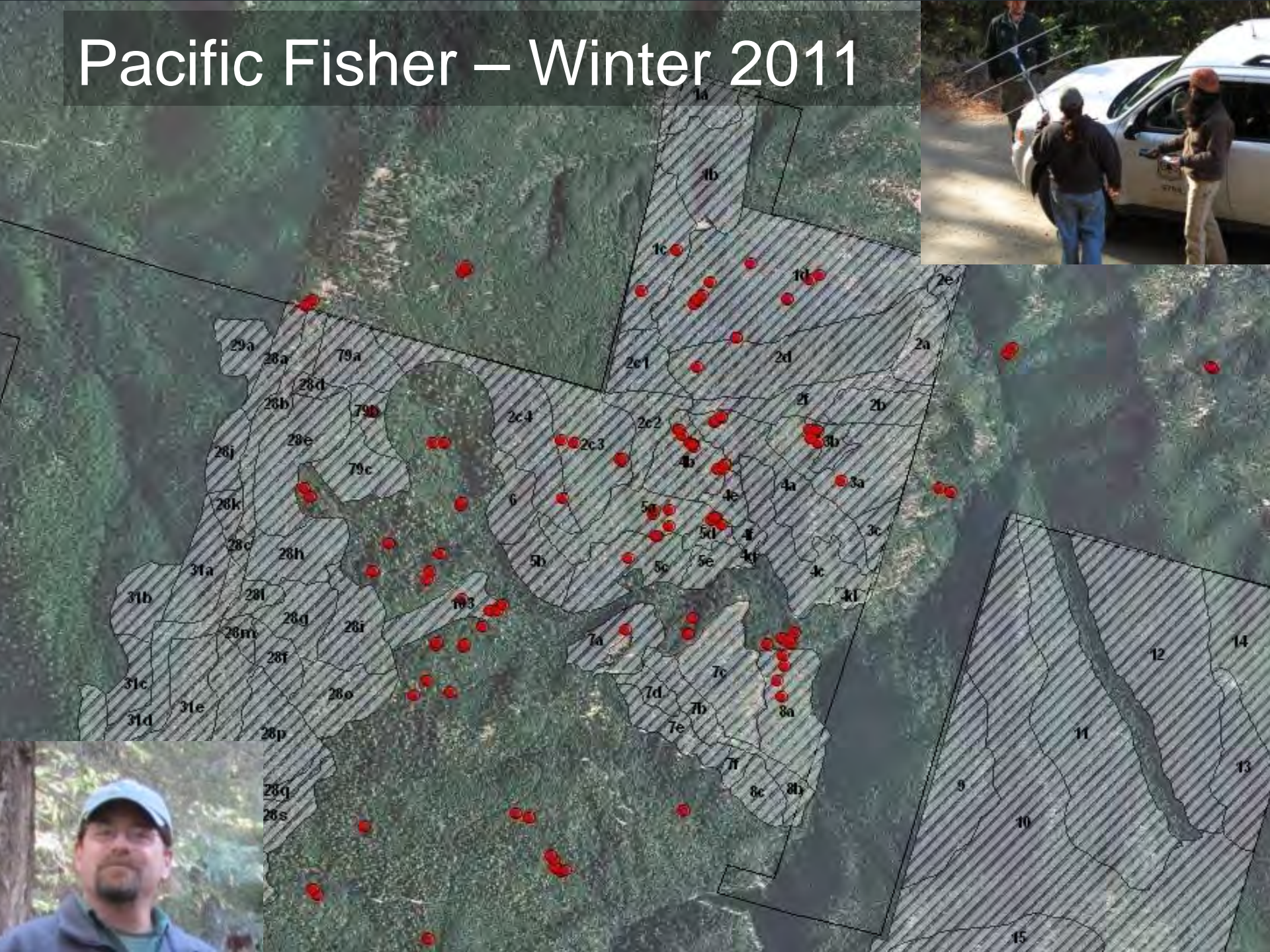
# Late Successional Habitats



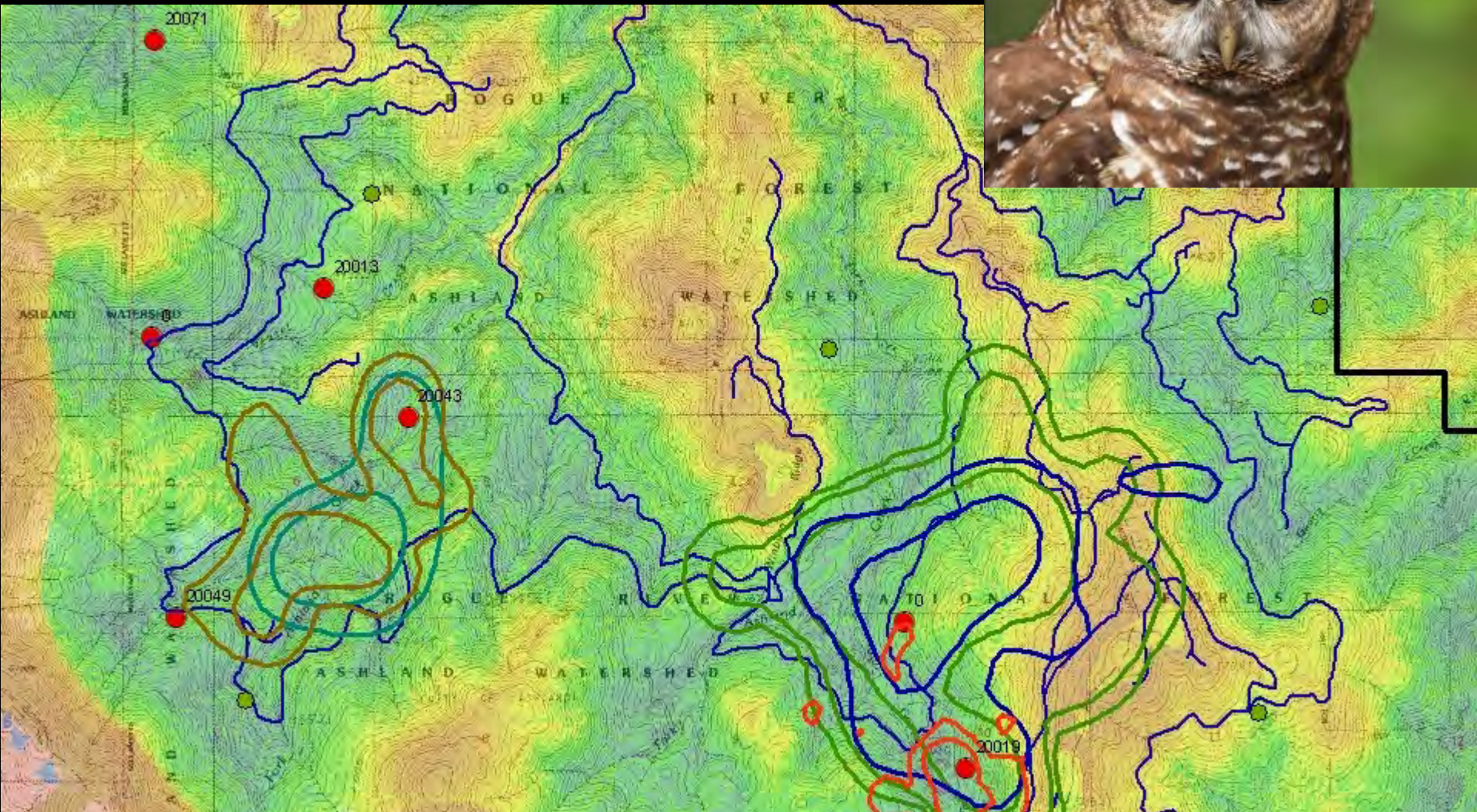
## ■ Indicators

- Vegetation structures before and after project completion
- Population dynamics and habitat use of Northern Spotted Owl, flying squirrels and pacific fisher

# Pacific Fisher – Winter 2011



# Northern Spotted Owls Habitat Use



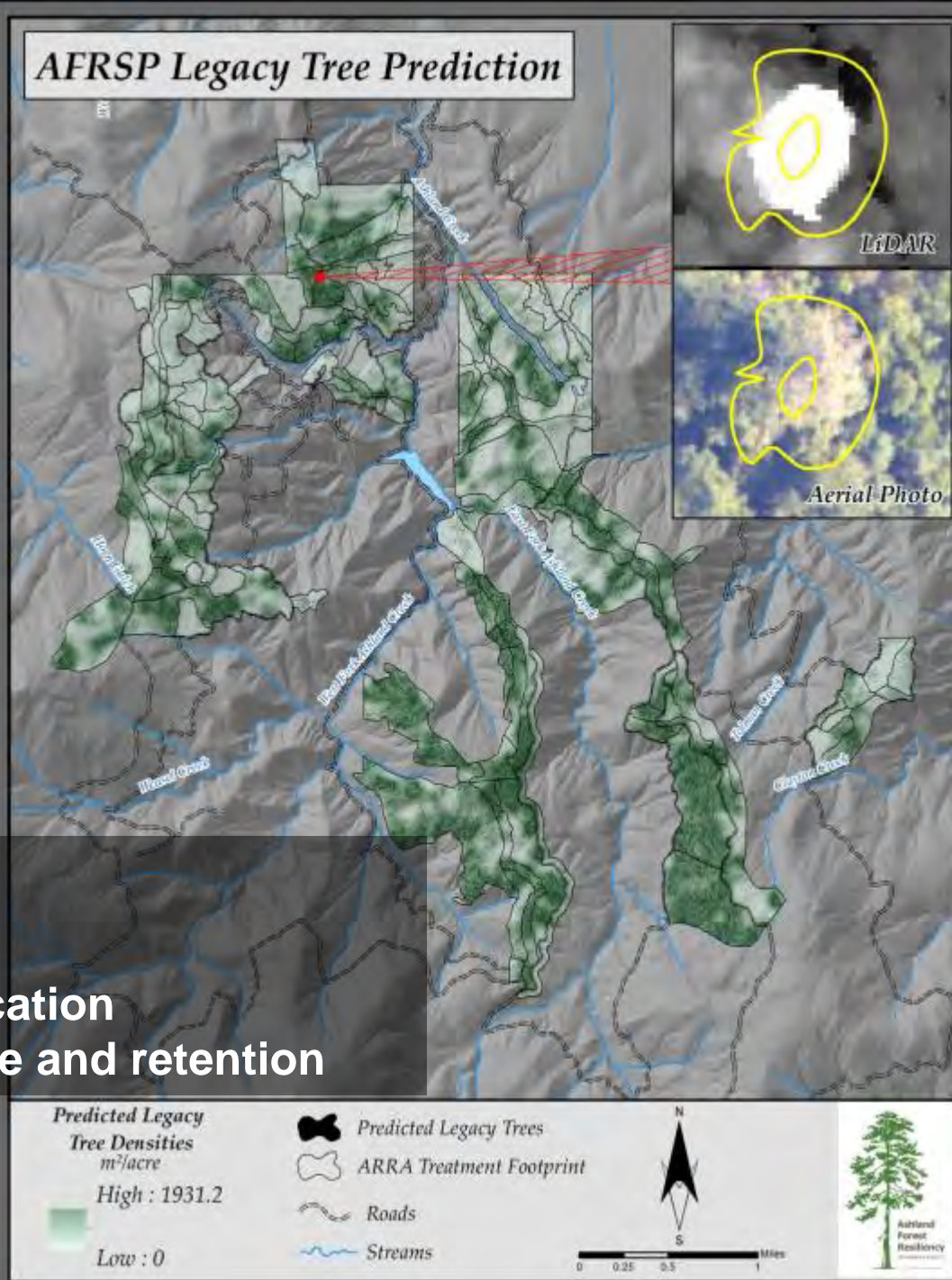
Apparent occupancy and the reproductive rates of Northern Spotted Owls in the Ashland Watershed, Siskiyou Mountains, southern Oregon 1993-1997, 2005-2008, and 2010-2011: a preliminary report. Katie M. Dugger, Jason W. Schilling, Robert G. Anthony, and L. Steven Andrews.

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# Large tree retention and survival

## ■ Indicators

- cut-tree size distribution
- legacy tree patch identification
- legacy tree vigor response and retention



# Social Monitoring – Public Learning

## ■ Indicators

- Survey respondent project support – Mark Shibley
- Survey respondent understanding of forest issues
- Feedback from the Implementation Review Team





# Herbaceous Recovery and Response

- **Indicators**

- **herbaceous cover in Common Stand Exam plots**

# Building Capacity, Accountability, and Support



- Clarify objectives
- Monitor compliance, treatment effectiveness, and increase accountability
- Engage public and build trust
- Convene partners and volunteers from diverse stakeholder groups
- Inspire collective action
- Leverage stakeholder expertise to increase agency capacity
- Advocate for agency funding and procure outside funding
- Provide framework for additional questions



Southern Oregon Forest  
Restoration Collaborative



Applegate  
Partnership &  
Watershed Council



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