

A photograph of a dense forest with tall, thin trees. In the background, a yellow logging machine is visible, partially obscured by the trees. The ground is covered with brown pine needles and some green moss on the tree trunks.

Ecological Forestry Case Studies

Dan Stonington

Northwest Natural Resource Group

Land Camp

April 14, 2015

Presentation Overview

- Part 1: Ecological Forestry
 - What is it?
 - What does it mean for land trusts?
 - Examples of restoring young stands
- Part 2: Forest Stewardship Council® (FSC®)
 - What is it?
 - What does it mean for land trusts?



Photo by Matt Freeman-Gleason



Photo by Matt Freeman-Gleason



Photo by Matt Freeman-Gleason



Photo by Matt Freeman-Gleason

Ecological Forestry

- Careful forest stewardship that provides a sustainable supply of timber and other ecosystem services while also restoring ecosystem functions and connectivity across the forested landscape.

Ecological Forestry

- Resilience through diversity:
 - Structural diversity
 - Species diversity
 - Age-class diversity
 - Genetic diversity

Ecological Forestry

- What Ecological Forestry means for land trusts:
 - Achieve your restoration and stewardship objectives with active forest management
 - Generate revenue to reinvest in your mission
 - Implement adaptive management in a time of global warming

Family Forest Owner



Family Forest Owner



Family Forest Owner





Hawax-Rd-S

Mountain-Dr-E


Family Forest Owner



Lanwax Rd S

Mountain Park Dr E

Family Forest Owner

An aerial photograph of a dense forest. A road, labeled 'Panwax Rd S' and 'Mountain Park Dr S', runs along the left side. A small, irregularly shaped area within the forest is highlighted in a light brown color, indicating the study site. The text 'Results' is overlaid in white on the upper left portion of the image.

Results

- Year: 2012
- Size: 17 acres
- Net to landowner: \$450 per acre
- Thinning strategy: 30% BA, 50% stems
- Ecological benefits: reintroduction of structural, species, and age-class diversity

Public Forest Land



Public Forest Land



Public Forest Land

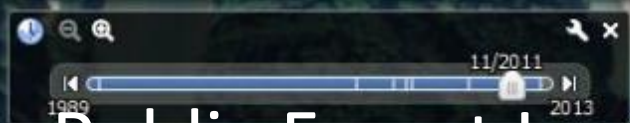


Public Forest Land



Public Forest Land





Public Forest Land



7/2013

Public Forest Land



Results

- Year: 2013
- Size: 34 acres
- Net to landowner (forecast): \$~220 per acre
- Thinning strategy: heavy thin with openings
- Ecological benefits: Wildlife habitat improvements, greater complexity and diversity

Family Forest Owner



Family Forest Owner



Family Forest Owner



Family Forest Owner

400th St S



Family Forest Owner

400th-St-S



Results

- Year: 2013
- Size: 17 acres
- Net to landowner: \$650 per acre
- Thinning strategy: 30% BA, 50% stems
- Ecological benefits: reintroduction of structural, species, and age-class diversity

400th St S

Land Trust Manager



Land Trust Manager



Land Trust Manager

04/11/2014 04:30 PM

Land Use Manager

04/11/2014 04:30 PM

Results

- Year: 2014
- Size: 15 acres
- Net to landowner: \$1K per acre
- Thinning strategy: reduce stand density by salvaging broken, defective or suppressed trees
- Ecological benefits: accelerate trajectory toward old-growth conditions

Forest Stewardship Council® (FSC®)

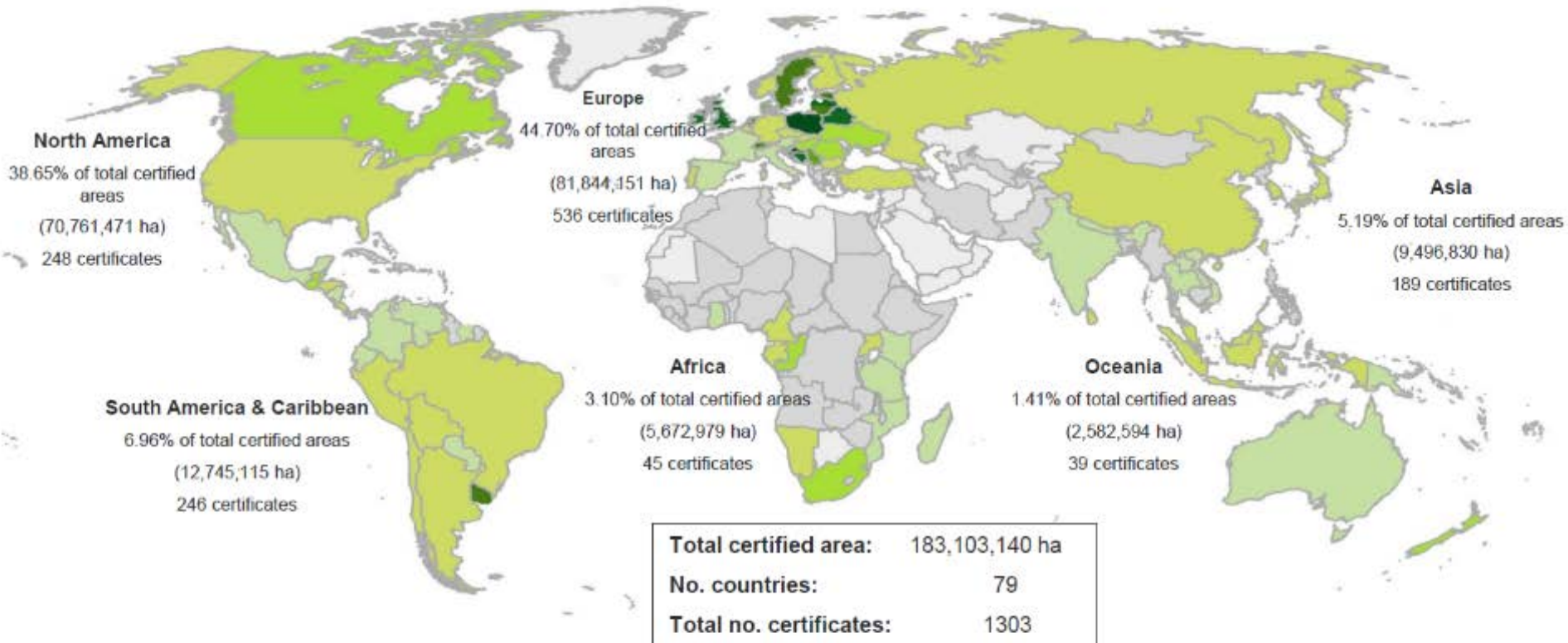
- A global, not-for-profit organization dedicated to the promotion of responsible forest management worldwide.



Photo by Matt Freeman-Gleason

Photo by Matt Freeman-Gleason

Global FSC certified forest area: by region



Percentage of total FSC certified forest area



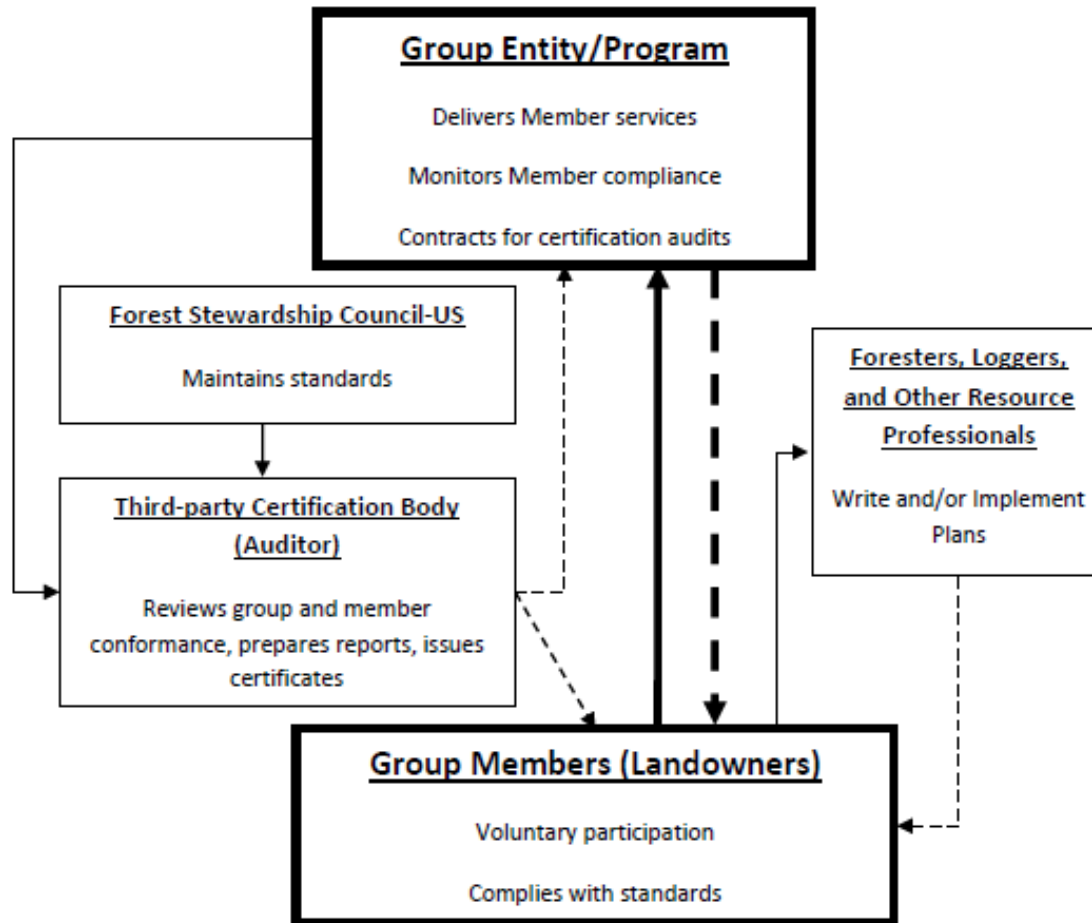
EXPLANATION

Country name
Hectare certified forest

(= % of total forest cover / % of production forest cover)
% increase or decrease since August 2012

Based on numbers from FSC International and FAO Forestry Paper
February 2013

FSC Group Certification



FSC Group Certification

Two types of landowners within our group certificate

- Small: a Forest Management Unit of 1,000 hectares (2,470 acres) or less
- Low Intensity:
 - a) the rate of harvesting is less than 20% of the mean annual increment (MAI), AND
 - b) annual harvest is less than 5000 cubic meters (2.1 million board feet)

Land Trusts with Forests certified via NNRG

- Great Peninsula Conservancy
- Hoh River Trust
- Jefferson Land Trust
- Nisqually Land Trust
- San Juan County Land Bank
- The Nature Conservancy
 - Oregon
 - Washington



The mark of
responsible forestry

What does FSC mean for land trusts?

- Principles to guide your forest management
- Social license to practice forestry
- Market access



Photo by Matt Freeman-Gleason



Thank you!

Dan Stonington
Northwest Natural Resource Group
dan@nnrg.org
206-715-2368