

Restoration Principles Leading to Large Documents, Grand Plans,  
Visionary Legislation,  
OR,  
Hopefully,  
Implementation of Landscape Scale Restoration Projects  
or even small projects if that's the best you can do

- Development of principles is only means to an end
- Primary objective, goal, strategy, or tactic of restoration principles is to;

DEVELOP “ZONE OF AGREEMENT”<sup>\*</sup> THAT WILL ENABLE ACTUAL RESTORATION WORK TO TAKE PLACE ON THE GROUND.

- Anything else you have planned for this process will fail, lead to depression, and ultimately cause the end of the world.

<sup>\*</sup>“Zone of Agreement” is fully protected, trademarked, and wholly owned by Gila WoodNet. If you use it please pay up.

## ECOLOGICAL RESTORATION OF SOUTHWESTERN PONDEROSA PINE ECOSYSTEMS: A BROAD PERSPECTIVE

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*Abstract.* The purpose of this paper is to promote a broad and flexible perspective on ecological restoration of Southwestern (U.S.) ponderosa pine forests. Ponderosa pine forests in the region have been radically altered by Euro-American land uses, including livestock grazing, fire suppression, and logging. Dense thickets of young trees now abound, old-growth and biodiversity have declined, and human and ecological communities are increasingly vulnerable to destructive crown fires. A consensus has emerged that it is urgent to restore more natural conditions to these forests. Efforts to restore Southwestern forests will require extensive projects employing varying combinations of young-tree thinning and reintroduction of low-intensity fires. Treatments must be flexible enough to recognize and accommodate: high levels of natural heterogeneity; dynamic ecosystems; wildlife and other biodiversity considerations; scientific uncertainty; and the challenges of on-the-ground implementation. Ecological restoration should reset ecosystem trends toward an envelope of “natural variability,” including the reestablishment of natural processes. Reconstructed historic reference conditions are best used as general guides rather than rigid restoration prescriptions. In the long term, the best way to align forest conditions to track ongoing climate changes is to restore fire, which naturally correlates with current climate. Some stands need substantial structural manipulation (thinning) before fire can safely be reintroduced. In other areas, such as large wilderness and roadless areas, fire alone may suffice as the main tool of ecological restoration, recreating the natural interaction of structure and process. Impatience, overreaction to crown fire risks, extractive economics, or hubris could lead to widespread application of highly intrusive treatments that may further damage forest ecosystems. Investments in research and monitoring of restoration treatments are essential to refine restoration methods. We support the development and implementation of a diverse range of scientifically viable restoration approaches in these forests, suggest principles for ecologically sound restoration that immediately reduce crown fire risk and incrementally return natural variability and resilience to Southwestern forests, and present ecological perspectives on several forest restoration approaches.

# A Citizen's Call for Ecological Forest Restoration: Forest Restoration Principles and Criteria

by Dominick A. DellaSala, Anne Martin, Randi Spivak,  
Todd Schulke, Bryan Bird, Marnie Criley, Chris van  
Daalen, Jake Kreilick, Rick Brown, and Greg Aplet



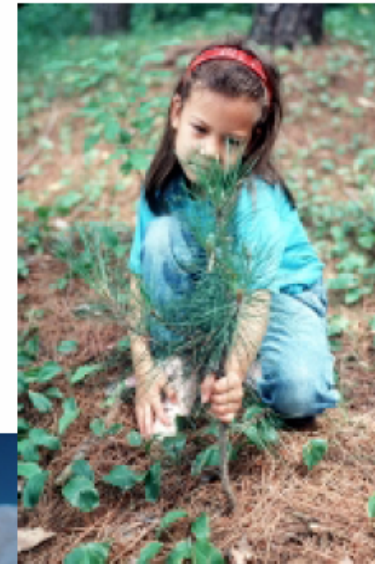
Western  
Governors'  
Association

- **Enlibra**
- ARCHIVE -- This page no longer being updated.
- What is Enlibra?
- Enlibra is the name of a set of principles for protecting air, land and water. The principles have proven effective in resolving environmental and natural resource disputes in a more inclusive manner. The word Enlibra was coined by the Western Governors to symbolize balance and stewardship. This site is designed to provide background information on Enlibra and links to other resources.

# A Collaborative Approach for Reducing Wildland Fire Risks to Communities and the Environment

## 10-Year Comprehensive Strategy

August 2001



# A Collaborative Approach for Reducing Wildland Fire Risks to Communities and the Environment

*10-Year Strategy  
Implementation Plan*



*December 2006*

# Arizona

## **GUIDING PRINCIPLES FOR FOREST ECOSYSTEM RESTORATION AND COMMUNITY PROTECTION**

Arizona Forest Health Advisory Council

# Guiding Principles for A New Economy Based on Forest Restoration

Restoration Economy Subcommittee of the  
Arizona Forest Health Advisory and Oversight Councils

**GUIDING PRINCIPLES FOR FOREST ECOSYSTEM RESTORATION AND  
COMMUNITY PROTECTION:  
WILDLIFE HABITAT**



# Statewide Strategy for Restoring Arizona's Forests



# Analysis of Small-Diameter Wood Supply in Northern Arizona



FCSFP



S. Joy



S. Allred



FCSFP



FCSFP

*May 2007– February 2008*

# N AZ Wood Supply Results

- 2.4 Million Ac. Analysis area
- Agreement on 67% of area (987,000 acres)
- 26% not available for wood supply
- 41% agreement (70% of WUI, 35% rest)
- Fire or no treatment for rest
- Strategically Placed Treatments
- No agreement to cut large trees outside of WUI (16" – less than 10% not meeting objectives, 3% by volume)
- Approximately 850 Million cubic feet of wood

# New Mexico - CFRP

- **H.R.2389** (Pub. L. No. 106-393)
- **Secure Rural Schools and Community Self-Determination Act of 2000 (Enrolled Bill (Sent to President))**
- **TITLE VI--COMMUNITY FOREST RESTORATION**
- **SEC. 605. ESTABLISHMENT OF PROGRAM.**
- (a) **FOREST RESTORATION PROGRAM-** The Secretary shall establish a cooperative forest restoration program in New Mexico in order to provide cost-share grants to stakeholders for experimental forest restoration projects that are designed through a collaborative process (hereinafter referred to as the '**Collaborative Forest Restoration Program**'). The projects may be entirely on, or on any combination of, Federal, Tribal, State, County, or Municipal forest lands. The Federal share of an individual project cost shall not exceed 80 percent of the total cost. The 20-percent matching may be in the form of cash or in-kind contribution.
- (b) **ELIGIBILITY REQUIREMENTS-** To be eligible to receive funding under this title, a project shall--
  - (1) address the following objectives--
    - (A) reduce the threat of large, high intensity wildfires and the negative effects of excessive competition between trees by restoring ecosystem functions, structures, and species composition, including the reduction of non-native species populations;
    - (B) re-establish fire regimes approximating those that shaped forest ecosystems prior to fire suppression;
    - (C) preserve old and large trees;
    - (D) replant trees in deforested areas if they exist in the proposed project area; and
    - (E) improve the use of, or add value to, small diameter trees;

# **The New Mexico Forest and Watershed Health Plan**

**An Integrated Collaborative Approach to  
Ecological Restoration**



**Developed by  
The New Mexico Forest and Watershed Health Planning  
Committee**

**For  
The State of New Mexico  
Governor Bill Richardson**

**December 15, 2004**

**NEW MEXICO FOREST RESTORATION PRINCIPLES**



Center for Biological Diversity

**Preamble:** These principles were collaboratively developed by a team of dedicated professionals representing industry, conservation organizations, land management agencies, and independent scientists. These principles for restoration should be used as guidelines for project development and they represent the “zone of agreement” where controversy, delays, appeals, and litigation are significantly reduced. They may be appropriate for application to specific restoration projects in the southwestern United States. Projects using these principles should be driven primarily by ecological objectives while promoting economic and social benefits.

**Participants:**

- |  |                                 |
|--|---------------------------------|
| The Nature Conservancy of New Mexico   | Bureau of Indian Affairs        |
| Natural Resources Conservation Service | New Mexico State Lands          |
| Bureau of Land Management              | Forest Guild                    |
| Sierra Club, Rio Grande Chapter        | Center for Biological Diversity |
| Forest Guardians                       | Restoration Solutions           |
| New Mexico State Forestry Office       | Public Service of New Mexico    |
| U.S. Forest Service                    |                                 |

**Principles:**

1. **Collaborate.** Landscape scale assessment, and project design, analysis, implementation and monitoring should be carried out collaboratively by actively engaging a balanced and diverse group of stakeholders.
2. **Reduce the threat of unnatural crown fire.** A key restoration priority must be moving stands toward a more natural restored condition and the reduction of the risk of unnatural crown fires both within stands and across landscapes. Specific restoration strategies should vary based upon forest vegetation type, fire regime, local conditions, and local management objectives. Forests and woodlands with historical fire regimes characterized by infrequent and mixed fire intensities should be maintained such that spatial arrangements of high-density stands are discontinuous at the landscape scale.
3. **Prioritize and strategically target treatment areas.** Key considerations for prioritizing restoration treatment areas are: degree of unnatural crown fire risk, proximity to human developments and important watersheds, protection of old-growth forests and habitats of federally threatened, endangered, or listed sensitive species, and strategic positioning to break up landscape-scale continuity of hazardous fuels. Treatments should be done at a landscape scale to decrease forest vulnerability to unnatural stand-replacing fire. This priority-setting should take place during fire management planning, land management planning, and community wildfire protection planning.
4. **Develop site-specific reference conditions.** Site-specific historical ecological data can provide information on the natural range of variability for key forest attributes, such as tree age structure and fire regimes that furnish local “reference conditions” for restoration



# Signal Peak Landscape Assessment

## Version 1

September, 2006

# Signal Peak Economic Projections

- 27, 000 NEPA
- 6000 acres mechanical treatment
- Current and Future Markets – 6000-7000 tons/year
- 4000-5000 tons for biomass heating
- 2000 tons for value added products
- 300-400 acres/year
- 15-20 years

- **Restoration Principles, Strategic Plans, and Landscape Assessments**
- **Scientific Journals**
- <http://biologicaldiversity.org/publications/papers/Allen-Restoration-2002.pdf>
- **National Principles and Plans**
- [http://americanlands.org/documents/1117211691\\_Forest%20Restoration%20Principles.pdf](http://americanlands.org/documents/1117211691_Forest%20Restoration%20Principles.pdf)
- <http://westgov.org/wga/initiatives/enlibra/default.htm>
- [http://www.westgov.org/wga/initiatives/fire/final\\_fire\\_rpt.pdf](http://www.westgov.org/wga/initiatives/fire/final_fire_rpt.pdf)
- <http://www.westgov.org/wga/publicat/TYIP.pdf>
- **Statewide Principles and Plans**
- **Arizona**
- [http://www.azgovernor.gov/dms/upload/NR\\_072507\\_Statewide-2\\_v2.pdf](http://www.azgovernor.gov/dms/upload/NR_072507_Statewide-2_v2.pdf)
- <http://www.azgovernor.gov/fhc/documents/FinalGuidingPrinciples.pdf>
- <http://www.azgovernor.gov/fhc/documents/RestorationEconomyGuidingPrinciples.pdf>
- <http://www.azgovernor.gov/fhc/documents/WildlifePrinciplesDraft051908.pdf>
- [http://www.forestera.nau.edu/project\\_woodsupply\\_finalreport.htm](http://www.forestera.nau.edu/project_woodsupply_finalreport.htm)
- **New Mexico**
- <http://www.fs.fed.us/r3/spf/nm-restor-principles-122006.pdf>
- <http://www.fs.fed.us/r3/news/releases/2006/0517-principles.shtml>
- <http://www.emnrd.state.nm.us/FD/FWHPlan/documents/FWHPLAN033005.pdf>
- <http://www.fs.fed.us/r3/spf/cfrp/>
- [http://frames.nbii.gov/niftt/docs/Signal\\_Peak\\_Landscape\\_Assessment.pdf](http://frames.nbii.gov/niftt/docs/Signal_Peak_Landscape_Assessment.pdf)
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