



United States  
Department  
of Agriculture

Forest Service

Rocky Mountain  
Research Station

Research Note  
RMRS-RN-20-5-WWW

September 2004

## Fuels Planning: Science Synthesis and Integration

### Economic Uses Fact Sheet: 5

# NEPA and Economics



Pacific Northwest  
Research Station



North Central  
Research Station

### Synthesizing Scientific Information for Fire and Fuels Project Managers

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Fuels planning: Science synthesis and integration, an interagency research/management partnership to support the Ten-Year Fire Plan, led by Russell T. Graham, RMRS, and Sarah M. McCaffrey, NCRS.

### What Is NEPA?

The National Environmental Policy Act (NEPA) is considered the “Stop and Think” statute—it is a law that requires Federal agencies to consider the environmental impacts of their actions, involve the public in the decisionmaking process, and



**Rough skinned newt** in its river habitat (photo courtesy of USDA Forest Service).

disclose information, starting at the initial stages of planning. This includes direct agency actions such as implementing fuel treatments, or any time an agency grants a permit or license for someone else to do the work, such as a private contractor or citizen group. NEPA helps ensure that managers are fully aware of the potential beneficial and harmful consequences of Federal actions.

### Should I Consider Economics in the NEPA Process?

From a practical standpoint, managers will want to know how much each alternative action will cost in dollars. But in the formal NEPA process, when, if ever, should economic considerations weigh in? Simply put, economics should *not* be a factor in deciding whether or not an action has a significant impact on the environment, and likewise should *not* be weighed against environmental impacts when considering alternative actions. NEPA, however, does not mandate which action should be selected (although other statutes may—see below), so managers will be interested in knowing the economic costs associated with all of the alternatives.

### When to Do an Analysis

So when should a detailed analysis and disclosure of economic impacts be performed? Economic analysis and disclosure should occur when it is important to make an informed choice among alternatives. The responsible line officer determines the scope, appropriate level, and complexity of the social and economic analysis needed to make an informed decision. The scope of any economic analysis should be done in context of full interdisciplinary team (IDT) participation. A basic premise is that most physical and biological issues important in making an informed decision also have social and economic effects. For further direction, refer to the Forest Service Manual (FSM 1970) and the Forest Service Handbook (FSH 1909.17).

## Do I Need an Economist To Do a Detailed Analysis of Impacts?

Maybe, or maybe not! The required skill level of the interdisciplinary team depends on the nature and complexity of the needed analysis. Proposals for less complex actions may be done by the collective knowledge of the interdisciplinary team. This means the team will consider the economic issues identified and determine the level of analysis needed to provide a meaningful disclosure of the site-specific consequences for each alternative. Also see FSM 1905, 40 CFR (Code of Federal Regulations) 1508.14, for more economic discussion relevant to planning. When an Environmental Impact Statement (EIS) is prepared and natural and physical effects are interrelated, the EIS should discuss all of these effects on the human environment (40 CFR 1508.14).

## What Other Statutes Should I Be Aware of?

While NEPA requires that managers take a hard look at the consequences of alternative actions, other laws, statutes, and regulations may mandate that certain actions be taken or avoided. The following statutes and regulations may have substantial impacts on decisionmaking:

- Clean Air Act
- Clean Water Act
- Data Quality Act
- Endangered Species Act
- Multiple Sustained Yield Act
- National Forest Management Act
- Organic Act
- Wilderness Act

## For More Information

Existing Forest Plans include a comprehensive analysis of the economic and social environment for your National Forest, consistent with the National Forest Management Act (NFMA). For more information on these or other policies and the economics of fuels treatments, the following references may provide helpful insights:

Cleaves, David A.; Brodie, J. Douglas. 1990. Economic analysis of prescribed burning. Pp. 271–282 *in* Natural and prescribed fire in Pacific Northwest Forests, J. D. Walstad et al., eds. Oregon State University Press, Corvallis, OR.

Cleaves, David A.; Haines, Terr K.; Martinez, Jorge. 1999. Prescribed burning costs: trends and influences in the National Forest System. P. 227 *in* Proceedings of the symposium on fire economics, planning and policy: bottom lines. USDA Forest Service Gen. Tech. Rep. PSW-GTR-173.

Rideout, Douglas B.; Omi, Philip N. 1995. Estimating the cost of fuels treatment. *Forest Science* 41(4): 664–674.

USDA Forest Service. 1993. The principal laws relating to Forest Service activities. 21 p. U.S. GPO, Superintendent of Documents.

USDA/USDI. 1995. Federal wildland fire management policy and program review report. U.S. Department of the Interior, U.S. Department of Agriculture. Washington, DC. 41 p.

## Economics Team Fact Sheets

Look for fact sheet topics from the Economics Team including prescribed fire costs, harvesting, log hauling, NEPA and other regulations, wood utilization, economic impacts on communities, markets for wood, and harvest equipment requirements.

## Fuels Planning: Synthesis and Integration

This fact sheet is one in a series being produced as part of a larger project supported by the USDA Forest Service to synthesize new knowledge and information relevant to fire and fuels management. Fact sheets address topics related to stand structure, environmental impacts, economics, and human responses to these factors. Information in the fact sheets is targeted for the dry forests of the Inland West, but is often applicable across broad regions of the country. For more information, please visit our Web site at:

[www.fs.fed.us/fire/tech\\_transfer/synthesis/synthesis\\_index](http://www.fs.fed.us/fire/tech_transfer/synthesis/synthesis_index)

*The Fuels Planning fact sheets are based on preliminary findings. Information from fact sheets will be synthesized in an upcoming publication.*