Teaching Students to Analyze Agency Actions via a NEPA Analysis Approach

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Abstract

Future recreation professionals need the ability to analyze the effects of proposed management actions and stakeholder concerns to make good decisions, maintain public support, and comply with state and federal laws. Importantly, when federal funds, lands, permits or licenses are involved, federal law requires consideration of environmental and social effects of proposed actions via the National Environmental Policy Act (NEPA). Many states have similar environmental laws. This paper describes application of a NEPA analysis approach framework as a holistic method for teaching students how to analyze proposed management actions in terms of interested and affected stakeholders' concerns and environmental and social effects. Such a review will allow these future managers to develop recommendations that consider these issues in agency decision-making processes and comply with laws and agency mission.

KEYWORDS: Environment, issue analysis, NEPA, public concern, social values, stakeholder.

Future recreation professionals need the ability to analyze proposed management actions, environmental and social effects, and stakeholder concerns in order to make good decisions, maintain public support, and comply with relevant state and federal laws. Many public and private agencies are required to analyze proposed actions in site development, agency operations, and resource management to address public concerns, zoning, environmental management systems (EMS), and laws. Additionally, when federal funds (e.g., US Department of Transportation funds) or federal licenses, permits, are involved, or actions occur on federal lands, federal law requires analysis of proposed actions to comply with using the National Environmental Policy Act (NEPA) and other federal laws. Importantly, NEPA, other federal laws, and many state laws allow citizen lawsuits for agency fail-

ure to meet procedural requirements or conduct adequate analysis of environmental and social effects and alternatives to the proposed action. Inadequate analysis can result in lost court decisions and preclude implementation of proposed actions. An understanding of the NEPA process and effects analysis has broad application as many laws and requirements at various levels are similar to NEPA.

Foundation and Description of NEPA Analysis Approach Framework

A NEPA analysis approach can be implemented as a holistic methodology in teaching students to analyze proposed management actions and to develop recommendations for agency decision-making processes that comply with relevant laws and agency mission. This approach was developed by the author for use in a split level undergraduate/graduate course on outdoor recreation and environmental issues.

Orientation to Conceptual and Legal Foundations

Students begin the course by learning about the diverse and conflicting views of nature held by stakeholders. Students view a graphic of a tree and list all the values and benefits that come to mind. Student lists of values are combined and the purposes or "end" values identified as human-centered (e.g., timber) or nature-centered (e.g., habitat). Through discussion, students learn that views of nature are social constructions, that many values emerge for a single resource, and that views often conflict regarding how, why and for what purposes resources should be managed. The class reads the *Multiple-Use Sustained-Yield Act* (1960) to understand the values that many federal agencies must balance in decision-making and management actions.

The class proceeds to read the National Environmental Policy Act (1969) in order to facilitate an understanding of the act and its relationship to proposed management actions. Students examine key components of NEPA and implementing regulations via a flowchart that describes the NEPA process, categorical exclusion, environmental assessment, Finding of No Significant Impact (FONSI), environmental impact statement, and key NEPA requirements. NEPA requires federal agencies to analyze "major actions" and "consider" "significant" impacts on the environment and humans in balancing beneficial uses of the environment while also preserving important historic, cultural, and natural resources (e.g., Council on Environmental Quality, n.d.; National Environmental Policy Act, 1969; USDA Forest Service Content Analysis, n.d.). NEPA focuses on the manner in which proposed actions impact the environment as well as the social and economic requirements of future generations. During NEPA analysis, agencies must use a systematic interdisciplinary approach that integrates natural and social sciences as well as environmental considerations in the planning and decision-making processes. For major actions, agencies provide public notice, engage in public involvement, consider stakeholder comments, and conduct an environmental assessment or environmental impact analysis of the proposed action and alternatives. The remainder of the paper describes this educational framework.

Developing Student Understanding of Environmental and Social Effects

During the first few weeks of the course, students learn about recreation resource uses and management actions and their environmental and social effects. Students examine recreation activities and agency management actions in terms of environmental (e.g., soils, timber, vegetation, wildlife, water) and social (e.g., economic, preservation, utilitarian, social, environmental justice, spiritual, user conflict, visitor satisfaction) effects and values as well as monitoring and management strategies via selected readings (e.g., Cahn & O'Brien, 1996; Cordell & Bergstrom, 1999; Dennis, 2001; Hammitt & Cole, 1998; Knight & Bates, 1995; Manning, 1999). Students analyze readings by identifying the central thesis, key terms and propositions, developing discussion questions, and facilitating discussions based on methods adapted from King (1990). Social issues and effects are explored using several videos (e.g., "The Wilderness Idea: John Muir, Gifford Pinchot, and the First Great Battle for Wilderness - Part I") and discussions of key concepts such as wilderness value, water rights, resource dependent communities, endangered species, and Native American rights, among others. Students also monitor an agency or interest group website for environmental and social issues with federal lands and provide weekly updates to classmates on hot issues. For direct experience, students engage in tours of public lands led by agency staffs who discuss current management issues, environmental and social considerations, and management actions. Later in the semester, students engage in negotiation of multi-party interests in forest and natural resources planning based on a teaching case adapted from Cormick (1990). Of particular importance, students conduct NEPA analysis research and engage in NEPA interdisciplinary team analysis simulations as focal learning activities throughout the semester.

Conducting NEPA Analysis Research and Interdisciplinary Team (IDT) Analysis Simulations

Each student selects a proposed federal management action for NEPA analysis. During this analysis process, students engage in NEPA analysis research, serve as an IDT leader and facilitate NEPA analysis among their classmates, and produce a 5-10 page term paper on their selected management action. The selected issue must be a current and actual proposed management action (e.g., proposed ATV trail) on a specific federal land area (e.g., a national forest). The proposed management action must be "significant" regarding potential environmental, social, and/ or economic effects. It must also be potentially controversial, involve at least two stakeholder groups with divergent views, and be within the agency's authority and "within scope." "Notice" of proposed actions can be found on the websites of specific public land management units as they publicly announce proposed NEPA actions. (In some cases, information for specific public lands is posted on national websites such as the National Park Service's Planning, Environment, and Public Comment; USDA Forest Service Ecosystem Management Coordination; and the US Department of Interior Bureau of Land Management Land Use Planning, webpages.) For example, each national forest posts a quarterly Schedule of Proposed Actions (SOPA) while national parks often post proposed actions under

"management" via a link to a "planning" section. The instructor provides lists of issues analyzed in past classes (e.g., bison management in Yellowstone National Park) as examples to guide students, and works with them to ensure selection of appropriate proposed federal actions.

During real NEPA analysis, a recreation specialist may serve as an IDT leader or member, or support IDTs in environmental analysis. For this course, students engage in NEPA analysis research on their selected issue during the first few weeks and conduct NEPA IDT analysis simulations typically after the fourth week or so of the semester. The goal is to have the student IDT leader and class IDT members function as autonomously as possible with the instructor stepping in as needed, to correct major errors, and at the end to offer major laws and or effects that should be considered. The following sections describe components of NEPA analysis research, IDT analysis simulations, and the term paper.

IDT leader and members. Each student serves as an IDT leader for analysis of their proposed management action. The IDT leader identifies agency specialists that should be on the IDT, and stakeholders that will likely be interested or affected by the proposed management action. Other students volunteer to take roles as IDT members (e.g., recreation specialist, planner, natural resource specialist, etc.) or stakeholder representatives (e.g., industry, environmental group, land owner, etc.). Participants' input and comments must reflect their role.

Description of management issue/proposed action. The IDT leader briefs the class on the management situation, "need for action" (e.g., need for recreation facility), and the "proposed action." The IDT leader identifies and describes the proposed management action as published in a "notice" by a federal land management agency. The leader describes the management issue, need for change, proposed management action, relevant laws, etc., and rationale the agency provides, as published, and describes the agency mission. The notice often explains the problem, environmental and social effects, agency mission, and relevant laws (e.g., Wilderness Act), executive orders (e.g., E.O. 12898 on Environmental Justice), etc., that impact decision-making.

Description of interested and affected stakeholders. The IDT leader facilitates IDT identification of stakeholders and solicits public "comments" from role-play stakeholders. The IDT identifies at least two stakeholder groups with divergent views on the specific issue (e.g., Sierra Club and timber industry), describes the mission and interests of the groups, and describes their perspectives on the proposed management action. Environmental and industry groups typically publish information about proposed agency actions, the stakeholder organization's perspective on the action, and rationales that support/oppose implementation of the proposed management action. The IDT solicits public "comments" from students role-playing as the respective stakeholders. The stakeholders provide verbal comments to the IDT consistent with their respective roles. The IDT then considers the comments in analysis processes.

Analysis and description of issues and environmental and social effects. The IDT leader facilitates IDT analysis of stakeholder comments and environmental and

social effects of the proposed action using methods adapted from the USDA Forest Service Content Analysis Team (CAT) (n.d.a, n.d.b) (now known as the Content Analysis Service Center). CAT methods enable the analyst to identify issues and "public concerns" from public comments as statements of "what" the agency should do (i.e., management action). Each public concern is stated as—the _____ (agency) "should"/"should not" do _____ (e.g., Public Concern: The National Park Service should allow snowmobile use in Yellowstone National Park). Environmental and social effects and values emerge as "subconcern" statements of "why" the agency should/should not implement a management action (e.g., to provide winter recreation, benefit the disabled and elderly, and benefit the local economy). Using CAT's approach, students identify public concerns and new issues and alternatives and environmental and social effects for further IDT analysis.

IDT analysis and staff recommendation(s). The IDT leader facilitates IDT analysis of the proposed action, "a reasonable range" of "alternatives," environmental and social effects and values, and develops recommendations for decision consideration by the "responsible official" (e.g., forest supervisor, etc.). The recommendations must include rationales that reflect agency mission, appropriate laws, science, environmental and social effects, and that demonstrate stakeholder concerns and a reasonable range of alternatives were considered and why the "preferred alternative" is most appropriate. Following development of the IDT's recommendation, the student IDT leader briefs students on the current status of the issue, and in the event that the agency has issued a decision, the student describes the "record of decision" (ROD), how the agency considered public comments, the "response to comments," the agency's explanation of the decision, and provides information on any updates.

Outcomes of Student Engagement in NEPA Analysis

Student learning typically expands well beyond NEPA and the specific management action and environmental and social effects addressed. Analysis of a single proposed action often involves additional issues such as Native American Rights, environmental justice, economic issues, national vs. local control, other federal environmental laws, etc., which expand learning opportunities. Through a NEPA analysis approach framework, students gain an understanding of management issues, recreation impacts, NEPA analysis, environmental and social effects, relevant laws, and the use of collaboration in recreation and resource planning. Importantly, many states have planning and environmental review laws similar to NEPA, and the knowledge and skills developed through this NEPA analysis approach framework may benefit future recreation professionals in nearly any type of agency and context.

Recommendations for Use by Others

The key to success is ensuring that students select real-world, on-the-ground proposed federal management actions at a specific national park, etc. Proposed actions on federal land trigger NEPA and typically involve divergent stakeholder perspectives. Importantly, general issues (e.g., climate change) are not actionable by

a specific park, etc., and would be "out of scope" and inappropriate for class NEPA analysis. Similarly, programmatic issues (e.g., national rulemaking) do not work well due to their abstraction and lack of on-the-ground impacts.

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