

United States  
Department of  
Agriculture

Forest Service

Intermountain  
Region



Caribou-Targhee  
National Forest

# TARGHEE NATIONAL FOREST ROADS ANALYSIS

October, 2002





United States  
Department of  
Agriculture

Forest  
Service

Caribou-Targhee  
National  
Forest

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To the Readers of this Roads Analysis:

In order to help you better understand the enclosed Targhee National Forest Roads Analysis, and the Roads Analysis process, there are a number of resources available that need to be used when reviewing the Analysis on the Targhee National Forest.

- \* Final Environmental Impact Statement, 1997 Revised Forest Plan Targhee National Forest
- \* Final Environmental Impact Statement, Open Road and Open Motorized Trail Analysis, (Motorized Road and Trail Travel Plan, 1999).

Roads analysis is not a decision document. The analysis provides information to line officers to aid in decisions, or to focus efforts in managing the National Forest Transportations System.

The document titled, "Roads Analysis: Information Decisions about Managing the National Forest Transportation System (USDA Forest Service 1999)," outlines steps to follow and questions to answer for a roads analysis. This process was followed for the Targhee National Forest Road Analysis.

The products (opportunities) of the enclosed Roads Analysis are for use by those doing sub-Forest scale analysis. These opportunities should be investigated thoroughly for application and use to improve road and motorized trail system management of the Forest. Those conducting subsequent analysis should review the 71 analysis questions and findings (Step 4) of this Report for a more complete understanding of the suggested opportunities and how they may be relevant to the subsequent project. The references to previous analysis documents contained in Appendix 3 of this report would also be a valuable tool to help in finding Forest Plan direction or RFP and OROMTR-FEIS analysis information relevant to each of the 71 resource questions.

The Targhee National Forest feels that they did do a sufficient Roads Analysis in the process of completing the, "Final Environmental Impact Statement," "1997 Revised Forest Plan" and the "Final Environmental Impact Statement, Open Road and Open Motorized Trail Analysis." This Roads Analysis addresses the analyses done in these previous documents.

Sincerely,

JERRY B. REESE  
Forest Supervisor



Caring for the Land and Serving People

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# **Executive Summary**

## **Introduction**

On January 12, 2001, the Forest Service issued the final National Forest System Road Management Rule (see Analysis File). This rule revised regulations concerning the management, use, and maintenance of the National Forest transportation system.

The final rule is intended to help ensure: 1) that additions to the National Forest system road network are essential for resource management and use; 2) that construction, reconstruction, and maintenance of roads minimize adverse environmental impacts; and 3) that unneeded roads are decommissioned and restoration of ecological process is initiated. Implementation direction for this Rule is provided by Forest Service Publication FS-643, "Roads Analysis: Informing Decisions About Managing the National Forest Transportation System" (see Analysis File).

This Roads Analysis Report documents analysis procedures used by the Targhee National Forest to implement requirements of the Road Management Rule. Roads analysis is not a decision making process, nor does it constitute a major federal action requiring National Environmental Policy Act (NEPA) documentation. This report is intended to provide decision makers with information to assist in managing a road and motorized trail system that is safe and responsive to public needs and desires, while also being affordable, and efficiently managed to produce minimal adverse effects on other resources.

Motorized trails and travel management were included in this Roads Analysis because they were already addressed in a recent Revised Forest Plan (RFP) and Open Road and Open Motorized Trail Analysis (OROMTR) and their associated FEIS. They were also included because they are an integral part of the transportation system. Previous analyses determined that environmental consequences and management concerns from motorized trails were similar to those of roads and should be included in the total impact. The combination of roads and motorized trails was used to form the Open Motorized Access Route Density (OMARD) and the Total Motorized Access Route Density (TMARD) indicators, which were used in the RFP and OROMTR-FEIS.

Implementation of the new rule requires use of a six-step process that includes evaluation of numerous questions concerning public issues, concerns, and resource management needs and resource conditions and effects. This report documents the analysis process conducted by the Targhee National Forest to address the six-step method required by the rule.

## **Analysis Products**

The Analysis Findings from Step 4 and the Opportunities and Priorities from Step 5 are the main products of this analysis. The products of previous analyses applicable to road system



management were the Revised Forest Plan (1997) and the Forest Travel Plan (Maps—1999, revised 2001). The directions in those plans (see Step 2-Describing the Situation--Meeting Forest Plan Objectives) established management Standards and Guidelines; established open, motorized route densities; specified routes open or closed; and identified routes to be decommissioned. These management decisions have already addressed most opportunities for change. However as a result of this roads analysis, some management directions of the Revised Forest Plan have been identified that have not been fully implemented. These, along with a few other potential considerations have been noted as opportunities for improvement. The following two groups of opportunities have been identified:

- Opportunities for improvement related to Forest Plan Goals and Objectives implementation, monitoring implementation, and analysis of decommissioning.
- Opportunities identified from this current, Forest-wide Roads Analysis concerning improving the existing inventory, County maintenance, improved monitoring, coordination of roads analysis with other resource analysis, options for funding of projects by watershed, fisheries or wildlife, road maintenance being performed by special use permit holders, and addressing the lack of maintenance funding with a maintenance priority system.

These products (opportunities) are for use by those doing sub-Forest scale analyses. These opportunities should be investigated thoroughly for application and use to improve road and motorized trail system management on the Forest. Those conducting subsequent analyses should review the 71 analysis questions and findings (Step 4) of this Report for a more complete understanding of the suggested opportunities and how they may be relevant to the subsequent project. The references to previous analysis documents contained in Appendix 3 of this Report would also be a valuable tool to help in finding Forest Plan direction or RFP and OROMTR-FEIS analysis information relevant to each of the 71 resource questions.

## **Background**

This Roads Analysis was somewhat unique, because it was done following the Forest Plan Revision process. That Revised Forest Plan (RFP—see Analysis File) was directed at determining the basis for a new Travel Management Plan and resolving resource issues. On April 15, 1997, the Targhee National Forest completed its Forest Plan Revision and documented the analysis in a Final Environmental Impact Statement (FEIS-see Analysis File). That analysis and revised management plan considered seven key issues, one of which was road and motorized trail access. Effects of motorized access on wildlife, water quality, and other resources were a driving influence in the development and analysis of route densities for Forest Plan management prescriptions.

The FEIS alternatives analyzed for the Revised Forest Plan (RFP-see Analysis File) were created by mapping proposed management prescriptions for protection or improvement of various resources, in response to the issues identified. Each of the management prescriptions contained a route density for open roads and motorized trails. After the prescriptions were applied to various

parts of the Forest to form the alternatives, each Ranger District applied the route densities of the prescription areas to determine which roads and trails would remain open to meet those densities. The initial route inventory sheets (see sample in Analysis File) were prepared in accordance with the mapping directions and key codes established in the Road Analysis Process--October 1994 (see Analysis File). This process was used to develop the Geographic Information System (GIS) maps for Forest Planning analysis (see sample in Analysis File). The resulting maps and inventory sheets were used to create Appendix C of the RFP-FEIS, which further describes this process. The complete set of inventory sheets and maps is contained in the RFP Analysis File.

The number of miles of open motorized routes in each alternative was used as one of the analysis indicators for comparison of alternative consequences in the RFP-FEIS. Other analysis indicators and GIS data used to evaluate environmental consequences in the RFP-FEIS relative to road and motorized trail impacts are shown in Table I. The selected alternative from this analysis became the Revised Forest Plan.

One of the management directions of the Revised Forest Plan was to prepare a Travel Plan Map (see Analysis File) to implement the route densities established by the Forest Plan. A Final Environmental Impact Statement for the Open Road and Open Motorized Trail Analysis (OROMTR-FEIS, see Analysis File), which determined the new Forest Travel Plan, was approved in October 1999. This FEIS considered three key, motorized access issues. These included:

- Adverse effects of specific roads and trails open for summer motorized travel on: wildlife and fisheries (cutthroat trout) and their habitat; on roadless areas and recommended wilderness; and on water quality.
- Adverse effects of specific closed roads and trails on recreation and other access opportunities.
- RS-2477 road access. This issue involves potential access rights the Counties may have on roads and trails that may have existed prior to the establishment of the Forest.

During issue analysis for the OROMTR-FEIS, the public was asked to comment on specific routes they wanted open or closed in the new Travel Plan that would result from the analysis. These comments were used to develop and evaluate five alternatives that would respond to the comments and to the issues identified, and are within the maximum open route densities allowed by the 1997 Revised Forest Plan. Appendix C of the OROMTR-FEIS describes this process. Environmental consequences for each FEIS alternative were analyzed using resource-specific indicators (Table I) similar to those used for the RFP-FEIS.

A road decommissioning process (Appendix B of the OROMTR-FEIS) was also developed with the benefit of public input. Alternative routes to be decommissioned were displayed and analyzed in this OROMTR-FEIS. The result of this FEIS was a new Travel Plan Map (see Analysis File and Appendix A of the OROMTR-FEIS) and Legal Order No. 04-15-25 published April 14, 2000. The Travel Plan maps (see Analysis File) were printed and placed into full use in the summer of 2001. The plan initially resulted in a local, public uproar, but has been accepted over time.

**Table I. Environmental Consequences Indicators & GIS Data Used for  
Analysis of Alternatives in RFP or OROMTR-FEIS**

| RFP | OROMTR | Resource             | Description of Analysis Indicator   |
|-----|--------|----------------------|---|
| X   |        | Soils                | Acres removed from productive land base   |
|     | X      | “                    | Acres removed from productivity—short-term  |
|     | X      | “                    | Acres removed from productivity—long-term   |
| X   | X      | “                    | Miles of road/trail on unstable soils   |
|     | X      | “                    | Miles of road/trail on unstable soils on >40% slopes  |
| X   | X      | “                    | Area of Forest open for cross-country summer motorized use  |
| X   |        | “                    | Acres placed back into productive land base   |
|     | X      | “                    | Acres placed back into productivity—short-term  |
|     | X      | “                    | Acres placed back into productivity—long-term   |
| X   | X      | Water                | Number of stream crossings  |
| X   |        | “                    | Acres of road surface in AIZ <sup>1</sup>   |
|     | X      | “                    | Acres of road and trail surface in AIZ  |
|     | X      | “                    | Miles of road and trail in AIZ  |
|     | X      | Fisheries            | Miles of open and closed rd./tr. w/in cutthroat AIZ's   |
|     | X      | “                    | Number of stream crossings of open and closed rd./tr. within cutthroat habitat  |
| X   | X      | Terrest. Wildlife    | Elk vulnerability (EV) model based on open motorized route density and motorized cross-country access   |
| X   | X      | “                    | Elk Habitat Effectiveness (EHE) based on open motorized route density   |
| X   | X      | “                    | Grizzly Bear Model-based on OMARD and TMARD   |
|     | X      | Furbearer Habitat    | Open motorized route density  |
| X   | X      | Summer Access        | Miles of roads open to summer motorized use   |
| X   | X      | “                    | Miles of trails open to summer motorized use  |
| X   |        | “                    | Acres open to summer cross-country motorized use  |
|     | X      | “                    | Miles of seasonally restricted roads  |
|     | X      | “                    | Miles of yearlong restricted roads  |
|     | X      | “                    | Miles of road decommissioned inside & outside the BMU's   |
|     | X      | “                    | Miles of seasonally restricted trails   |
|     | X      | “                    | Miles of yearlong restricted trails   |
| X   | X      | Winter Access        | Miles of groomed trails for snowmachines  |
| X   | X      | “                    | Acres open to winter cross-country snowmachines   |
| X   | X      | Inventoried Roadless | Acres of inventoried roadless   |
|     | X      | “                    | Miles of motorized road & trail in inventoried roadless   |
| X   | X      | Socioeconomic        | Jobs, employee compensation, property income, transfer payments, Forest expenditures, PNV/economic efficiency, cash receipts, lifestyles, attitudes/beliefs/values, sense of control/self-sufficiency, and social organization/community cohesion and stability |

Note: All of the above indicators were created from Geographic Information Systems (GIS) map data during the RFP-FEIS and OROMTR-FEIS preparation. Maps are referenced throughout this Report, and are contained in the Analysis File for this Report.

<sup>1</sup> Aquatic Influence Zone (AIZ—see Glossary)

Due to administrative appeals of the new Travel Plan, the Intermountain Regional Forester directed that the decommissioning work approved be reviewed by subsequent environmental analysis and documentation prior to any additional decommissioning being conducted. He also directed that all decommissioning efforts already done (within Forest Plan direction), would be reviewed, and steps would be taken to ensure that the methods used were appropriate for the situation. This review of decommissioning methods was to be conducted through the environmental analysis process and documented in required NEPA decision documents. None of this NEPA work for decommissioning has been completed.

The Forest Plan and Travel Plan analyses were ecosystem based, and included extensive analysis of road and motorized trail inventories, wildlife, aquatic, water, vegetation, soils, roadless, and other resources. The analysis indicators (Table I) used in these two previous analyses were very similar to those suggested for use in the Roads Analysis process (FS-643). Therefore, the objective of this Forest-wide Roads Analysis was to review the two previous planning analyses, which were focused upon route densities and decommissioning, and consider their adequacy in terms of FS-643 and the new Road Management Rule issued in 2001.

## **Process**

The six-step process described in the new Roads Analysis publication (FS-643) was used to conduct this review. The six steps were as follows:

1. Setting up the analysis
2. Describing the situation
3. Identify the issues
4. Assessing the benefits, problems and risks
5. Describing opportunities and setting priorities
6. Reporting, including key findings

## **This Report**

This Report documents the roads analysis procedures used, and resulting information and findings. The findings are intended to guide future roads analysis at the sub-forest scale of analysis for the Targhee portion of the Caribou-Targhee Forest.



## **Step 1-Analysis Process**

### **Analysis Objective**

The objective of this roads analysis was to review the 1997 Revised Forest Plan and 2001 Travel Plan and their corresponding environmental analyses (FEIS) and consider their adequacy in terms of the required roads analysis outlined in the FS-643 publication. The findings will be used to support continued implementation of the Forest Plan, Travel Plan (map), and subsequent sub-forest level roads analyses and project level planning.

This roads analysis was done to identify and prioritize opportunities that would address future road and motorized trail construction, reconstruction, maintenance, decommissioning, and watershed or ecosystem health (related to roads). Motorized trails and travel management were included in this Roads Analysis because they were already addressed in a recent Revised Forest Plan (RFP) and Open Road and Open Motorized Trail Analysis (OROMTR) and their associated FEIS. They were also included because they are an integral part of the transportation system. Previous analyses determined that environmental consequences and management concerns from motorized trails were similar to those of roads and should be included in the total impact. The combination of roads and motorized trails was used to form the Total Motorized Access Route Density (TMARD) indicator, which was used in the RFP-FEIS.

### **Analysis Scale**

To meet the objectives of this analysis, the review was:

- Conducted at the Forest Scale
- Specific to the ecosystem subsections identified in the Revised Forest Plan (RFP), where possible
- Conducted using existing Geographic Information System (GIS) maps and data where possible
- Conducted using existing information and data from the 1997 RFP-FEIS, RFP-AMS (Analysis of the Management Situation), 1999 OROMTR-FEIS, 2001 Forest Travel Plan (map), and the FEIS for the Targhee National Forest Oil and Gas Leasing Analysis (Feb. 2000)

## **Analysis Team Members**

The Interdisciplinary Team (IDT) and their roles and responsibilities included the following:

|               |   |
|---------------|---|
| Leon Bleggi   | Team Leader, Forest Transportation Planner,<br>Contract Officer Representative                    |
| Randy Tepler  | Forest Soil Scientist   |
| James Capurso | Forest Fisheries Biologist  |
| Lee Leffert   | Forest Hydrologist  |
| Mark Orme     | Forest Wildlife Biologist   |
| Alan Silker   | Contractor, Recreation Management and<br>Environmental Planning Specialist, Report<br>Preparation |

In addition to the above specialists who participated in this Roads Analysis, there were numerous others representing all interdisciplinary skills (soils, hydrology, timber and range management, landscape architecture, botany, land use planning, and engineering), who participated in the RFP-FEIS and the OROMTR-FEIS (see List of Preparers in each document in the Analysis File).

## **Analysis Plan**

As indicated in the Executive Summary of this report, this roads analysis used the 71 questions from Step 4 of the Roads Analysis process (publication FS-643—see Analysis File) to review the analyses and findings of the Revised Forest Plan (RFP); RFP-FEIS; OROMTR-FEIS; and subsequent Monitoring Reports. This review of these previous analyses was done to determine adequacy and compliance with the more recent national Roads Analysis direction contained in FS-643. The Interdisciplinary Team used the findings of this review to identify potential road and motorized trail management needs and activities, as well as opportunities and priorities for future analysis or management projects.

## **Information Needs**

The following items were available from the files of the referenced planning or analysis projects. The Interdisciplinary Team (IDT) determined these sources (see Analysis File) were adequate for this analysis:

- 1997 Revised Forest Plan (management prescriptions, standards and guidelines, etc)
- 1997 Revised Forest Plan Final Environmental Impact Statement
- 1999 Open Road And Open Motorized Trail Analysis—Final Environmental Impact Statement
- 2001 Targhee National Forest Travel Management Plan Map

- Preliminary road analysis sheets done at the time of road inventory for GIS
- Analysis of the Management Situation (AMS) developed for the Revised Forest Plan EIS
- Priority schedule for supplemental environmental analysis for decommissioning roads
- Annual Monitoring Reports for the Targhee Forest Plan implementation
- Project or watershed level roads analyses completed to date
- Road Management Objectives prepared to date
- Geographical Information Systems (GIS) maps for: Forest Travel Plan; decommissioned roads as approved by the Forest Plan and Travel Plan; road and trail intercepts and crossings of streams; roads and trails on unstable soils
- FEIS for the Targhee National Forest Oil and Gas Leasing Analysis (Feb. 2000)

As stated in the Executive Summary, analysis information displayed in Table I (which was created from the above documents) already addressed most of the suggested analysis indicators for the Roads Analysis process.

## **Public Involvement**

The interdisciplinary team reviewed the potential need for additional public involvement for determination of issues, or review of consequences analysis. It was determined that there were no significant, new issues or concerns that were not addressed in previous Forest-level environmental analysis. Therefore, no public scoping or review for this analysis was conducted. Copies of this Report will be posted on the Forest web site, and will be made available to agencies and organizations or members of the public upon request. The referenced Analysis File documents will be maintained at Forest Offices in Idaho Falls, Idaho, and will be available for public review.

## **Legal Requirements/Compliance**

All of the legally mandated processes for NFMA<sup>2</sup>, NEPA<sup>3</sup>, ESA<sup>4</sup>, FACA<sup>5</sup>, etc. were complied with during the preparation of the RFP-FEIS and the OROMTR-FEIS. The most notable area or project-specific requirement applicable to those analyses was the 1994 Greater Yellowstone Coalition /vs./ Jack Ward Thomas Settlement Agreement (United States District Court For the District of Idaho). This lawsuit was concerning possible impacts to grizzly bear habitat, (see

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<sup>2</sup> National Forest Management Act

<sup>3</sup> National Environmental Policy Act

<sup>4</sup> Endangered Species Act

<sup>5</sup> Federal Advisory Committee Act



Analysis File) and was the primary factor that initiated reduced open motorized route densities on large portions of the Forest. The Agreement required formal consultation with the U.S. Fish and Wildlife Service concerning the Forest Plan amendment proposed at that time.

## **Step 2-Describing the Situation**

### **The Analysis Area**

The Targhee National Forest (hereafter usually referred to as ‘ the Forest’) is an administrative unit of the Department of Agriculture, Forest Service, encompassing 1.8 million acres. Established by President Theodore Roosevelt in 1908, the Forest is named in honor of a Bannock Indian warrior. The Shoshone-Bannock Tribe has ancestral Treaty Rights to uses of the Forest.

The Targhee Forest (administratively combined with the Caribou National Forest on March 10, 2000) is now referred to as the Caribou-Targhee Forest. Forest Headquarters for the combined Forests are located in Idaho Falls, Idaho. Forest Supervisors Offices are also maintained in St. Anthony, Idaho. District offices for the Targhee portion of the Forest are in Dubois, Ashton, Idaho Falls, and Driggs, Idaho. The Forest is bordered by five other National Forests and Yellowstone and Grand Teton National Parks. The Bridger-Teton Forest administers part of the Targhee Forest. This Roads Analysis addresses only the Targhee portion of the recently combined Caribou-Targhee National Forest.

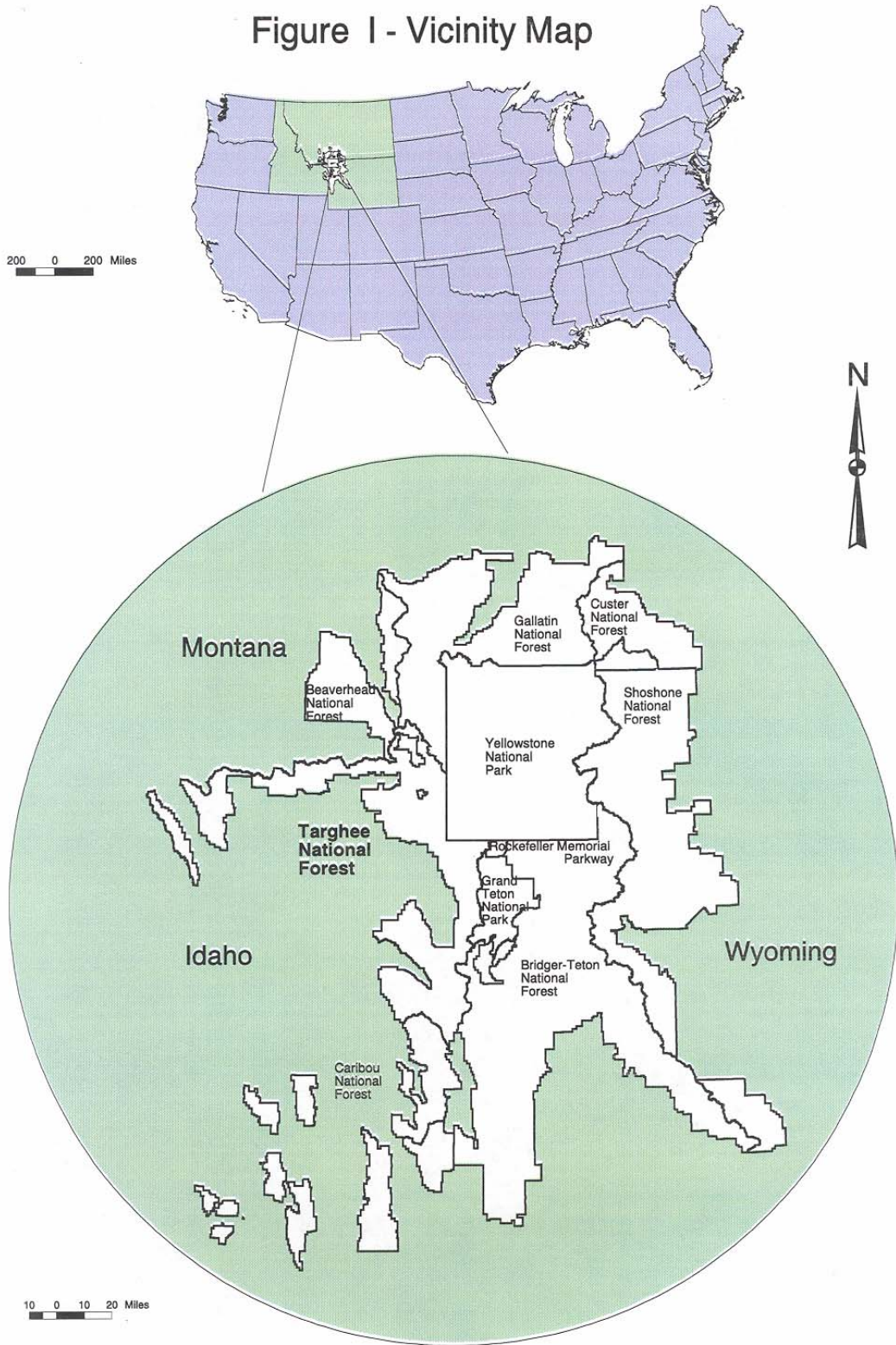
The majority of the Targhee Forest lies in eastern Idaho and the remainder in western Wyoming (Figure I). Situated next to Yellowstone and Grand Teton National Parks, the Forest is home to a diverse number of fish and wildlife (including Threatened and Endangered species), wilderness, scenic panoramas and intensively managed forest.

The Forest lies almost entirely within “the Greater Yellowstone Area” (GYA) or “the Greater Yellowstone Ecosystem,” an area of 12 million acres and the largest remaining block of relatively undisturbed plant and animal habitat in the contiguous United States. The area continues to garner prominence for its ecological integrity.

On a larger scale, the Forest lies entirely within the Upper Columbia River Basin, an ecosystem of 40 million acres extending from western Washington to the southeastern Idaho border and encompassing parts of Montana, Wyoming, Nevada and Utah. The Forest includes all or portions of several distinct mountain ranges, including the Lemhi, Beaverhead, Bitterroot, Centennial, Henry’ s Lake, Teton, Big Hole, Caribou, and Snake River Ranges. Elevations range from near 5,000 feet on the Snake River to over 12,000 feet on the Forest’s western-most reaches. The Forest contains the Island Park Caldera (large volcanic feature) and several reservoirs. Topography ranges from rolling foothills to rugged, glaciated mountain peaks.

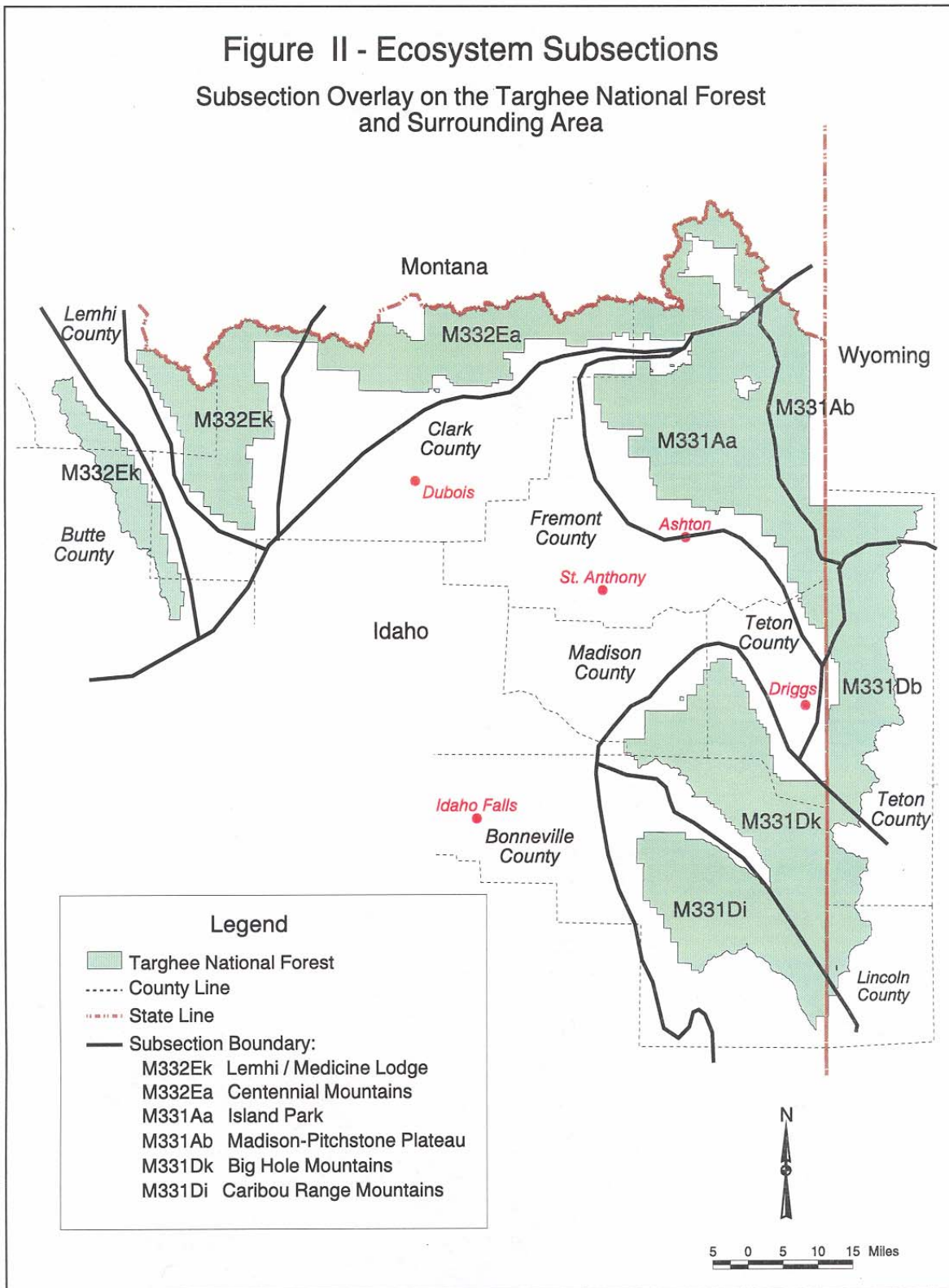
Forest resources are described and considered on an ecological subsection basis for many of the key issue factors in the Forest Plan and Travel Plan EIS (Ch. III in both EIS). Subsections are shown in Figure II.

Figure I - Vicinity Map



## Figure II - Ecosystem Subsections

Subsection Overlay on the Targhee National Forest and Surrounding Area



## **The National Forest Transportation System**

The Targhee Forest road and motorized trail system provides access for recreation, industry and administration. Land transportation by motorized vehicles is the principle means of travel on the Forest. Seven major highways run through the Forest and all primary access begins from one of these highways. Average daily traffic counts collected by the Idaho State Highway Department (Gillespie, 1994—see RFP-FEIS References Cited) suggest the heaviest traffic occurs on the highways between Idaho Falls and the northeast part of the Forest (Figure III).

Many of the Forest's roads were constructed from the mid-1970's to late 1980's as part of the timber salvage program. They have provided access to recreation, firewood and hunting opportunities. The roads have also proved useful for fire suppression activities. Roads have also had some detrimental effects on wildlife, fish and watersheds.

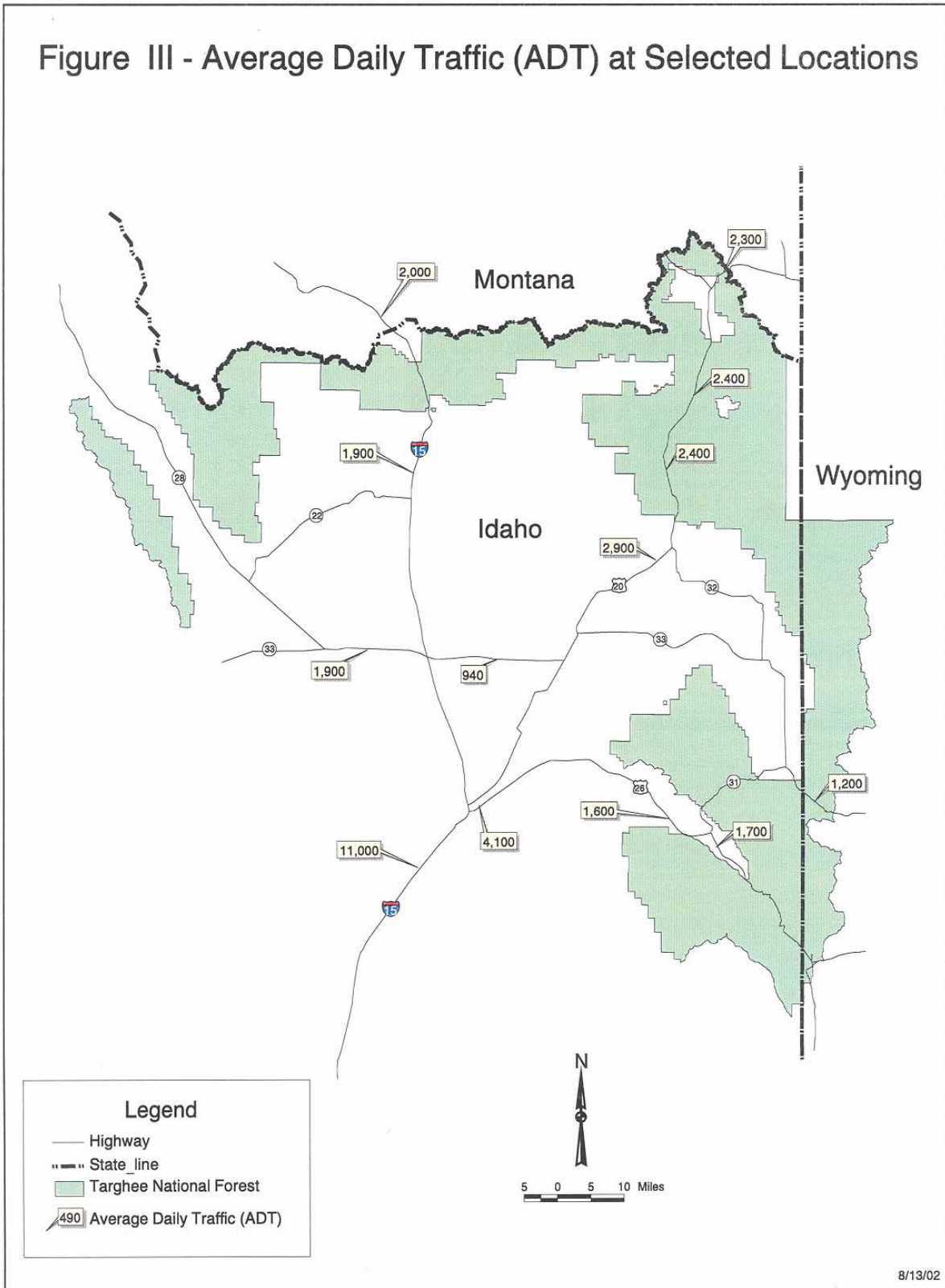
As a result of the 1997 Targhee Forest Plan Revision and the 1999 Travel Plan EIS, there are a total of approximately 2,950 miles of inventoried, classified road and 540 miles of motorized trails on the Forest. These routes are a result of the inventory process described in the Executive Summary-Background section of this Report. The routes are displayed in the RFP-FEIS Map #4 in the Analysis File. Of the roads inventoried in the Forest Plan, there are 1,756 miles of open road; 61 miles of road with seasonal restrictions; 309 miles of road with yearlong restrictions; and 830 miles of road planned for decommissioning by the Travel Management Plan (Map 6a—OROMTR-FEIS in the Analysis File).

Of the miles scheduled for decommissioning, 400 miles were completed in the bear management units (BMU) of the Island Park-Ashton District, and 90 miles have been done on the Dubois District. Much of this work was done prior to the direction by the Regional Forester to reanalyze the decommission methods. A schedule for completion of the site-specific NEPA analysis on road decommissioning was submitted to the Regional Forester on March 24, 2000. This schedule (Appendix 1) determined the geographic areas and priorities for completing the analysis required. A few of the roads to be decommissioned have been used in the summer for non-motorized travel, and in the winter for snowmachine travel.

The Targhee Forest road system is essentially in good shape, with annual maintenance on most arterial and collector roads and some local roads, depending on resources needs and forest uses. Further information on the Forest Development Road System is located in the Transportation section of the Analysis of the Management Situation (AMS—see Analysis File) for the Forest Plan EIS.

Of the approximately 2,100 miles of classified road on the Targhee that are to remain open, 10 percent are classified as arterials. They are often two-lane and are usually paved or have a good gravel surface and can handle unrestricted traffic at moderate speeds. About 25 percent of the roads are classed as collectors. Collector roads are stable enough for most traffic during normal season of use. Single lane roads, known as local roads, are found throughout the Forest and make up 65 percent of the road system. Local roads provide access for specific purposes such as harvesting timber; maintaining electronic communication sites; and access to trailheads, and developed campgrounds.

Figure III - Average Daily Traffic (ADT) at Selected Locations



Many unclassified (two-track) roads (“ghost roads”) were inventoried and mapped. These low standard roads were not designed or maintained for public use. They were created by repeated cross-country travel. Most of these two-track roads (cross-country routes) were closed to motorized vehicles as a result of the Revised Forest Plan and Travel Plan.

Of the approximately 1,400 miles of trails in the system, the Revised Forest Plan designates about 540 miles as motorized routes. Of these 540 miles of open motorized trails, numerous trails are designated (Map 6a—OROMTR-FEIS in the Analysis File) as being open and designed for use by all-terrain-vehicle (ATV <50 inches in width).

There are approximately 580 miles of road and 430 miles of trail that are inventoried as RS-2477 assertions by Counties. The majority of the routes with assertions would be open under the Forest Plan and Travel Plan, and none of these inventoried routes are planned for decommissioning prior to administrative resolution.

Approximately 18 miles of road construction and 12 miles of reconstruction were scheduled (over the next decade) in the Revised Forest Plan (RFP-p. IV-1-10). No Standards or Guidelines were developed (in the RFP) for specific construction methods. However, the Forest Plan and the Open Road and Open Motorized Trail (OROMTR) FEIS selected an alternative that had NO NET INCREASE in road and motorized trail density. Thus, the Forest Plan would use a system of varying the amount and location of decommissioned and new or reconstructed roads, or motorized trails to provide access where needed, while maintaining prescribed motorized route density levels within the management prescription areas. The overall Forest Plan and OROMTR Travel Plan determined there would be considerably fewer open roads and motorized trails than existed prior to those plans--thus assisting in protection of the ecological attributes of the area.

In recent years, funding for special project proposals (TRTR fund—10% return of Forest Receipts) has been received and projects have been completed to improve several roads as follows:

- 1998—Teton Canyon—5 miles of reconstruction--\$100,000
- 1999—June Creek—culvert installation to replace ford--\$60,000
- 2000—Rainey Creek—1.5 miles of reconstruction--\$30,000
- 2001—Table Rock and Kelly Canyon reconstruction--\$50,000

All unroaded areas on the Forest were evaluated for roadless (areas greater than 5,000 acres containing no classified roads useable by normal highway vehicles) potential during the Forest Plan and Travel Plan EIS analyses. The 1993 roadless inventory done for the Forest Plan Analysis of the Management Situation showed a net increase in qualifying acres over the inventory in the 1985 Forest Plan. This occurred because several of the roading and timber harvest projects proposed in that Plan were never completed. Some of these unroaded areas adjacent to previously inventoried roadless areas were added to the roadless inventory. Thus, any unroaded areas that would qualify for consideration for special protection such as wilderness designation were previously identified. Other “unroaded areas” also existed, but were so small and isolated, that it would be difficult to manage them for the characteristics, which make inventoried roadless areas valuable as an ecological or wilderness-like resource. The inventoried

roadless map was included in the Analysis File for this Report as Revised Forest Plan-FEIS Map #25.

Sub-forest scale roads analyses conducted to date include: Fall Creek (Palisades District) Watershed and Roads Analysis, Big Bend Ridge (Ashton-Island Park District) Timber Sale Roads Analysis, and the Anderson Mill (Ashton-Island Park) Timber Sale Roads Analysis. Fall Creek is the only watershed that has had 6<sup>th</sup> level watershed analysis done for it. A priority list for conducting watershed analysis on the Forest is in the Analysis File for this Report.

A few Road Management Objectives (RMO) have been written (see Analysis File) in conjunction with the Big Bend Ridge Timber Sale Roads Analysis. Road Management Objectives were also written during timber sale analyses for Miner's Creek, Walking Fish, Bishop West, Chick Creek, Ripley Butte, and Island Park Siding (see Analysis File). Road Management Objectives for all roads on the Forest have not been completed. These will be done in conjunction with future analyses, or separately as part of the roads management policy.

In addition to summer travel on roads and trails, there is extensive use of the system (mostly on roads) for winter, snowmachine travel. There are approximately 450 miles of groomed snowmachine trails, which receive intensive grooming and visitor use.

### **National Road Management Policy**

Direction contained in the Forest Service Manual states: "Determine and provide for the minimum forest transportation system that best serves current and anticipated management objectives and public uses of National Forest System (NFS) lands, as identified in the appropriate land and resource management plans (FSM 1920). In managing the forest transportation system for access, Responsible Officials must coordinate with other public and private transportation system agencies to integrate transportation information and to balance transportation facility investments and maintenance costs against the need to maintain land health and water quality".

The analysis guidelines provided in Forest Service Publication 643 outlined the process for evaluation of the road system to determine need for change, and opportunities for improved management of the system. This roads analysis process was used as the basis for preparation of this Report.

### **Meeting Forest Plan Objectives**

Knowledge of the status and degree of success of Forest Plan implementation of Revised Forest Plan (RFP) management direction and monitoring is important in forming a base for this Roads Analysis. The following is the forest-wide management direction concerning road and motorized trail management, contained in the 1997 Revised Forest Plan and Travel Plan. Status of implementation (as determined by the IDT following review of the 1997-99 and 2000-01



monitoring reports—see Analysis File) is shown in ***bold italics*** at the end of each section of Forest Plan management direction, which follows:

### Access – General (RFP-p.III-23)

#### Goals

1. The Forest road and trail system is cost effective and integrates human needs with those of other resource values, particularly grizzly bear, elk, and native cutthroat trout
2. Elk vulnerability is decreased and grizzly bear security is increased
3. Native cutthroat trout habitat is restored through effective road closures, obliterations, reclamations, redesign, and improved maintenance practices

***Significant progress has been made in achieving Goals 1 and 2. Most of the road decommissioning in grizzly habitat has been accomplished. However, there is considerable decommissioning remaining to be done (outside of grizzly habitat areas) following NEPA work. This decommissioning would contribute additional elk and grizzly bear security. Additional gains may also be possible for cutthroat trout habitat adjacent to roads and motorized trails based on opportunities identified in Step 5 of this Report. Although funding is still inadequate, the road system is more in balance with funding.***

#### Objective

Motorized access standards in each management prescription will be achieved as soon as practicable

1. Within three years of the ROD for Bear Management Units (BMU)
2. By the year 2007 for all other areas

***Motorized access standards in each management prescription area of the Forest Plan were implemented with the 2001 Travel Plan. Some decommissioning in the Teton BMU remains to be done. When all road decommissioning, signing, education, and law enforcement programs are in place, it is anticipated that these new standards will be very effective in producing desired resource management improvements (Appendix 1).***

#### Standards and Guidelines

1. Road Closure
  - a. Road closures will be located and designed to effectively control motorized use (S)

- b. Restrict or reclaim roads not needed for future management as determined in site-specific analysis, at the end of project use. Consider historic recreation use before closure (G)

**Road closures, as required by the Forest Plan and Travel Plan are approximately 50% complete. The remainder of the closures and decommissioning will be implemented as directed by subsequent environmental analysis conducted in accordance with the March 24, 2000 priority schedule (see Analysis File).**

2. Administrative Use on Restricted Roads and Trails and in Restricted Areas

- a. The Open Road and Open Motorized Trail Route Density (OROMTRD) Standards prescribed for each prescription area do not restrict responses to emergency events to protect human life, property values and structures, and forest resources. Responses to emergency events include law enforcement, search and rescue, and fire suppression (S)
- b. Prudent cross-country motorized access is allowed to implement projects consistent with prescription objectives, in all prescription areas except for grizzly bear core areas and designated wilderness. Administrative uses including but not limited to planned project work such as firewood harvest, timber sales, tree planting, prescribed burns, wild-land survey or fish and wildlife habitat improvements on restricted roads, trails or areas will only be allowed under the following conditions
  - 1) Any motorized vehicle access on a restricted road or trail or in a restricted area will be for official administrative business only and must be approved by the District Ranger
  - 2) When motorized vehicle access on a restricted road or trail or area is necessary, a sign will be posted while project work is being accomplished
  - 3) Motorized vehicle access on a restricted road or trail or area will be allowed by permit under the following conditions when approved by the Forest Supervisor or District Ranger
    - a) Project work is one mile or 30 minutes walk or greater
    - b) Equipment is being used that is unreasonable to carry to the project work site
    - c) Contract inspectors working with contractors who have motorized equipment and vehicles that are necessary for the contract work

This direction (in item 2 b above) supersedes direction in access tables for individual prescriptions (S)

- c. Needs for motorized cross-country administrative access will be presented and considered in analysis documents for proposals including, but not limited to prescribed burning, fish and wildlife habitat improvement, timber sales, and personal use firewood harvest. The proposal will limit access to that reasonably needed to conduct the project. Prudent cross-country access to implement these projects may be allowed consistent with project-level NEPA decisions and prescription objectives in all prescription areas except for grizzly bear core areas and designated wilderness. This direction supersedes direction in access tables for individual prescriptions (S)
- d. During the big game hunting seasons, persons with disabilities may be permitted to use motorized vehicles, if needed for mobility, on restricted roads and trails, which are designated for such use, with an authorized motor vehicle hunting permit issued by the District Ranger. These persons must have a Disabled Hunting Permit issued from the State Fish and Game Departments (G)

**Administrative use on restricted roads and trails is being handled very effectively, and with only minor difficulties. The same is true for prudent administrative cross-country access and for disabled hunter access on restricted roads and trails.**

- 3. Figures appearing in the access tables for individual prescriptions represent direction for those prescription areas. If no figure appears refer to the following direction (S)

|   | Henry's Lake<br>BMU Subunit 1 | Henry's Lake<br>BMU Subunit 2 | Plateau BMU | Bechler-Teton<br>BMU |
|---|-------------------------------|-------------------------------|-------------|----------------------|
| TMARD   | 1.0 MI/SQ. MI.                | 1.0                           | 1.0         | 1.0                  |
| OROMTRD   | 0.6 MI/SQ. MI.                | 0.6                           | 0.6         | 0.6                  |
| Henry's Lake 1 – The Targhee National Forest portion of the Henry's Lake 1 subunit, excluding Management Situation 3 (MS3) grizzly habitat.<br>Henry's Lake 2 – The Targhee NF portion of the Henry's Lake 2 subunit.<br>Plateau BMU – The Targhee NF portion of this Bear Management Unit (BMU), excluding MS3 habitat.<br>Bechler/Teton BMU – The Targhee NF portion of this BMU. |                               |                               |             |                      |

The access density measurements TMARD and OROMTRD are defined in the Glossary. Access densities are based on open and restricted roads and trails.

**No significant management concerns have been noted with the above direction.**

#### 4. Travel Plan

The Forest Travel Plan was developed from individual prescription access tables and the elk and deer winter range map. The following application dates were developed to respond to local resource and travel conditions. This direction supplements and is to be used in conjunction with the applicable direction in individual prescription access tables.

- a. Snow-Free Season -The snow-free season direction takes effect yearly in the Spring as local conditions become suitable to support wheeled vehicle traffic on roads and trails without damage. Where legally permitted, snowmachines may use designated roads and trails shown on the travel plan as open to motorized use. Cross-country snowmachine travel is allowed only where the snow-free season direction allows cross-country motorized travel after June 1 except in Prescription 5.1.4 (C).(S)
- b. Snow Season -The snow season direction takes effect yearly on Thanksgiving Day. Where legally permitted, snowmachine travel is allowed consistent with the travel plan map. Cross-country snowmachine travel is permitted from Thanksgiving Day through June 1 except on the Palisades Ranger District, which permits said usage from December 15 through June 1 and except in (inventoried) winter range as shown on Forest Plan Map #24. Cross-country snowmachine travel is allowed in Prescription area 5.1.4 (c) (Big Bend Ridge) from January 1 until April 30. (S)

**A new Travel Plan was implemented in 2001, and is working well. The definitions of “snow-free” and “snow” seasons of use in that plan have caused considerable confusion. These definitions have been re-written, and should be ready for implementation by the winter of 2002, or spring of 2003.**

## Access – Winter Recreation (RFP-p.III-25)

### Goals

1. Provide a quality winter recreation experience while minimizing conflicts between motorized and non-motorized use and wintering big game.
2. Establish a linear capacity for two-way snowmachine trails for purposes of safety and quality of the recreation experience.
3. Provide networks of marked, designated, and groomed snowmachine, cross-country ski, and other winter travel routes and trailhead facilities.
4. Provide winter recreation user information to educate users of wildlife needs and promote backcountry safety.
5. Promote opportunities for backcountry winter recreation.

**These goals are generally being met, as quality winter recreation experiences are continuing, and potential conflicts with wintering big game have been further reduced by management efforts. A linear capacity for snowmachine trails has not been completed as proposed. This task is still needed for determination of management needs for the future. Adequate networks of winter snowmachine trails are being supplied, but management of cross-country ski trails is still inadequate, due to inadequate funding. Some educational**

**information has been produced to educate recreation users about wintering wildlife, but this goal could use more attention and funding. No promotion or marketing of backcountry opportunities has been done to date, but this may not be necessary, since people seem to be discovering the opportunities on their own.**

## Objective

Within three years, establish by prescription, travel plan designation or other method a few non-motorized winter recreation activity areas with easy access for users such as telemark skiers, snowshoers, and snowboarders. Conform to results anticipated from the Greater Yellowstone Winter Visitor Use Management (GYWVUM) Assessment currently underway.

**This objective has not been met. This has been identified as an issue in this roads analysis report. There is a growing need for restrictions on snowmachine activity in a few Nordic skiing areas, such as Teton Pass and possibly Targhee Pass, to improve safety and visitor satisfaction.**

## Standards and Guidelines

1. Develop or provide trailhead facilities to match the desired trail capacity. These facilities may be public or private depending on location. (G)
2. Management of winter trails should be done where feasible by cooperative agreements with agencies and groups. (G)
3. Snowmachine, snowshoes, and dogsleds are prohibited within designated groomed cross-country ski trails. Snowmachines and dogsleds are prohibited within designated cross-country ski areas. (S)
4. Those areas mapped as winter range on the Revised Forest Plan elk and deer winter range map are closed to cross-country snowmachine travel. This direction supersedes direction in access tables for individual prescriptions. (S)

**These standards and guidelines are being complied with and effectively managed as needed.**

## Access – OHV (RFP-p.III-26)

### Goal

Provide a network of OHV trails while minimizing the effects of OHV use on soils, wildlife and other users.

**See note below the S&G section for achievements for this Goal.**

## Standards and Guidelines

1. Discourage OHV use on slopes greater than 40 percent, except on designated routes and except for snowmachine use. Roads and trails, however, may cross slopes that exceed 40 percent (G)
2. Areas with slopes of 25-40 percent may require travel restrictions if soil erosion factors warrant them (G)
3. Restrict OHV use on identified areas of unstable soils (except for snowmobiles) (G)
4. No motorized vehicles over 50 inches wide are allowed on trails unless the trails are specifically designed for such vehicles (S)

**The OHV Goal and standards and guidelines are not currently being met due to lack of funding and management personnel to monitor, evaluate, and plan for this activity. Indications are that there may be problems in several parts of the Forest that need management attention to provide controls or constructed trails needed to meet Forest Plan direction.**

## Access – Trails (RFP-p.III-27)

### Goals

1. Trails for motorized/mechanized use would be sufficient to sustain use over long periods of time and minimize requirements for maintenance or reconstruction. These conditions would be achieved within subsections in the following sequence: Big Hole Mountains, Caribou Range Mountains, Lemhi-Medicine Lodge, Centennial Mountains, Madison-Pitchstone Plateaus, Island Park, and Teton Range.
2. Trails for non-motorized/mechanized use would be sufficient to sustain use over long periods of time with minimal requirements for maintenance or reconstruction. These conditions would be achieved within subsections in the following sequence: Teton Range, Big Hole Mountains, Centennial Mountains, and Caribou Range Mountains.

**See status note after the following Objective for achievements for this Goal.**

### Objective

Complete an interdisciplinary review of five to ten percent of the system trails each year to determine rehabilitation needs.

**The Goals and Objective for trail management are being effectively implemented. Considerable effort has been made to plan for and manage motorized trails. However, more planning is needed to create a better network of motorized trails as identified in the OHV Goal.**

In addition to the previous Forest-wide Plan direction, there is more road and motorized trail management direction in Chapter III-Part 2-Subsection Descriptions and Direction, and Chapter III-Part 3-Management Prescriptions of the Forest Plan. These sections include route densities, standards and guidelines, etc. Most of this management direction is also being implemented successfully. **However, there are some Guidelines on pages III-110-111, 133-134, 149 that need to be considered during management and maintenance activities.**

The ID Team reviewed the existing issues and resource conditions against those of the Revised Forest Plan and Travel Plan. It was determined there were no changed conditions concerning the road and motorized trail system that would warrant Forest Plan revision at this time.

### **Federally Designated Forest Highways, and Scenic Byways**

The Forest is working with the Federal Highway Administration on improving Forest Highways. Funding provided by the Federal Highways Administration allows the Forest to make improvements on roads, which normally could not be made. Roads that are identified for improvements are required to accommodate current conditions and impending future growth and road uses. Without improvements, the highways are not capable of satisfying current and future traffic demands, safety requirements, Forest Service land and resource management objectives and maintenance capabilities of the various agencies.

Forest Highway 62, Mesa Falls and the Wyoming portion of Forest Highway 76 (Fred's Mountain or Grand Targhee) road projects are complete, and these roads are now receiving increased recreational travel due to the improved road widths and paved surfacing. Part of the Yale-Kilgore road (Ft. Henry Historic Byway) is being submitted as a project for reconstruction.

The National Forest Scenic Byways and Idaho State Scenic and Historic Byways programs are the result of attempts to increase public awareness and understanding of National Forest and State activities and recreation opportunities. Presently there are two Scenic Byways and one Historic Byway that pass through the Forest. These include the Mesa Falls Scenic Byway (National Forest designation), Teton Scenic Byway (State designation) and Fort Henry Historic Byway (State designation). Corridor management plans are required for all of these Byways, prior to funding requests being granted for interpretive, or other management needs. To date, there are no approved corridor plans for any of the Byways.

The Mesa Falls Scenic Byway follows State Highway 47 from Ashton north to US Highway 20, near Harriman State Park. About 20 of the 29 designated miles are located on the Forest. The Teton Scenic Byway Route travels east from Idaho Falls to Swan Valley along Highway 26, and then north to Victor on Highway 31, and from Victor to Tetonia on Highway 33 to the intersection of Highway 32, and then to Ashton on Highway 32. The most recently designated Fort Henry Historic Byway follows Forest Road #030 from the Elk Creek Station, west for approximately 10 miles on the National Forest, and then continues west on County road to Kilgore and south down the Red Road towards St. Anthony, Idaho. Approximately 22 miles of this Byway are on the Targhee Forest.

## **Condition Surveys**

Condition Surveys for maintenance level 3, 4, and 5 roads and a sample survey of maintenance level 1 and 2 roads were completed in 1999 for the Targhee Forest using Global Positioning System (GPS) data. In 2002, 50% of the level 3,4, and 5 roads and a sample of the level 1 and 2 roads were re-surveyed using the Electronic Road Log (ERL-3) system. These condition surveys documented annual maintenance, deferred maintenance, and capital improvement needs.

Photographic examples of each road maintenance level and a decommissioned road are provided at the end of this Section (Step 2). The maintenance level photographs are arranged in order from the highest levels of maintenance (4 and 5) to the lowest levels (1 and decommissioned).

## **Budget**

The Forest budget allocation for planning, construction, and maintenance of roads is currently (fiscal year 2002), approximately \$700,000. The annual costs to maintain the entire road system to standard (see Table II below) are over five times higher than the annual budget allocated by Congress. Table II also identifies that significant road improvement funding (deferred maintenance and capital improvements) is needed. Therefore, there is a need to identify new cost-share maintenance opportunities or prioritize additional reductions in the road and motorized trail system (or combinations), to enable achievement of proper management. If the Public Forest Service Roads (PFSR) program continues to develop, funding for maintenance will probably increase significantly, and could effectively reduce the budget deficit.

**Table II. Summary of Needed Funds for Road Maintenance and Operations**

| Maintenance Level | Total Miles | Annual Maintenance |           | Deferred Maintenance |            | Capital Improvements |            |
|-------------------|-------------|--------------------|-----------|----------------------|------------|----------------------|------------|
|                   |             | \$/mile            | Total \$  | \$/mile              | Total \$   | \$/mile              | Total \$   |
| 1                 | 503         | 44                 | 22,188    | 483                  | 243,038    | 0                    | 0          |
| 2                 | 858         | 217                | 185,907   | 2,719                | 2,333,244  | 0                    | 0          |
| 3                 | 334         | 9,375              | 3,134,153 | 69,014               | 23,072,652 | 80,750               | 26,996,313 |
| 4                 | 144         | 11,302             | 1,632,632 | 79,772               | 11,523,097 | 103,629              | 14,969,184 |
| 5                 | 54          | 12,324             | 666,731   | 84,534               | 4,573,270  | 180,995              | 9,791,824  |
| Total             | 1,894       | 33,262             | 5,641,611 | 236,522              | 41,745,301 | 365,374              | 51,757,321 |

Source: INFRA data table (see Analysis File)



**Road Maintenance Level Photographs**



**Maintenance Level 4**



**Maintenance Level 5**

**Road Maintenance Level Photographs (continued)**



**Maintenance Level 2**



**Maintenance Level 3**

**Road Maintenance Level Photographs (continued)**



## Step 3-Identifying Issues

### Issue Identification

An extensive issue identification process (Appendix 2-Process Paper A) was conducted during the 1997 Revised Forest Plan (RFP) environmental analysis. That issues analysis found over 70 issues and concerns that were consolidated into seven key issues as follows:

- Sustainability, Fire and Natural Disturbances
- Riparian (including water quality and aquatic habitat)
- Security for Elk
- Grizzly Bear Management
- Access (roads and trails)
- Management of Roadless Areas
- Timber Harvest

During the 1999 Travel Plan FEIS analysis, three additional issues specific to road and motorized trail management were identified as follows:

- Adverse effects of specific roads and trails open for summer motorized travel on: wildlife and fisheries (cutthroat trout) and their habitat, on roadless areas and recommended wilderness, and water quality.
- Adverse effects of specific closed roads and trails on recreational and other access opportunities.
- RS 2477 road access. This issue involves potential access rights the Counties may have on roads and trails that may have existed prior to the establishment of the Forest.

The issues identified in these two planning processes were the result of numerous public meetings, and thousands of public comments in response to the Notices of Intent to prepare environmental statements, and in response to the draft documents submitted for public review. These issues were addressed and analyzed thoroughly in respect to the roads and trails system in previous analysis.

In addition to these issues, there appear to be a few issues or concerns that are currently unresolved or have recently arisen. These include:

- How roads scheduled for decommissioning are to be treated to affect the desired result.
- RS-2477 routes remain to be administratively resolved.

- Determination of which motorized trails are to be reconstructed for access by vehicles less than 50 inches width.
- Where are winter motorized uses to be separated from non-motorized uses?
- Recent concern by several organizations that expansion of the “Byways” program may have adverse effects on natural resources due to increased travel and recreational use of these routes and surrounding area.

The ID Team reviewed the existing issues and resource conditions against those of the Revised Forest Plan and Travel Plan. It was determined there were no changed conditions concerning the road and trail system that would warrant Forest Plan revision at this time.

### **Questions for Analysis and Possible Issue Identification**

The 71 resource questions in publication FS-643 were considered in light of the analyses previously conducted for the RFP and OROMTR and their related FEIS. The analysis process used by the IDT was to identify and document analysis references from the previous planning documents that would verify analysis had already been conducted that would address the concerns in each of the 71 questions.

A tabular display (Appendix 3) was prepared to identify the location references for documents, which contain the analysis related to each of the 71 questions. The analysis references cited are located in the following documents:

- 1997 Revised Forest Plan (RFP)
- Analysis of the Management Situation (AMS) for the RFP
- RFP-FEIS
- 1999 Open Road and Open Motorized Trail Analysis-FEIS (OROMTR-FEIS)
- 2001 Targhee Forest Travel Plan Maps
- Geographic Information System (GIS) data and maps
- FEIS for the Targhee National Forest Oil and Gas Leasing Analysis (Feb. 2000)

The interdisciplinary team (IDT) determined the previous analysis from the 1997 Forest Plan and 1999 Travel Plan and respective Environmental Impact Statements adequately addressed the 71 resource questions. The IDT also determined that the analysis indicators used in the previous analyses (Table I) were almost the same as those suggested for use in this Roads Analysis (FS-643).

The answers (analysis findings) for the 71 resource questions were documented in Step 4 of this Report, which follows. The analysis findings in response to each of the 71 questions were used as the basis for identifying: benefits, problems, and risks (Step 4); and opportunities (Step 5), which follow.

## **Step 4-Assessing Benefits, Problems and Risks**

The 71 questions from publication FS-643 were used in this Roads Analysis to assess how well benefits, problems, and risks were addressed by the Revised Forest Plan and Travel Plan analyses. The questions were answered using analysis findings from: the Analysis of the Management Situation (AMS); Revised Forest Plan (RFP) and RFP-FEIS; the Open Road and Open Motorized Trail FEIS; Forest Travel Plan (Map); and the FEIS for the Targhee National Forest Oil and Gas Leasing Analysis.

The answers to the questions represent the analysis findings for this Report. The documentation of the answers to the 71 questions follows in this Section of this Report. It was determined from these answers, that the environmental analysis conducted during the Forest Plan and Travel Plan processes adequately addressed most of the 71 questions.

### **Ecological, Social, and Economic Considerations (71 Questions)**

#### **Ecosystem Functions and Processes (EF)**

**EF-1.** What ecological attributes, particularly those unique to the region, would be affected by roading of currently unroaded areas?

**Analysis Findings** -- The 1997 Revised Forest Plan FEIS and the Open Road and Open Motorized Trail (OROMT) FEIS are ecosystem based and provide a thorough analysis for this question. For example, page III-1 of the OROMTR-FEIS discusses the principles of ecosystem management and adaptive management that are contained in the Revised Forest Plan. Page III-2 of the OROMTR-FEIS presents the attributes of the ecological subsections that were used for the resource analysis in that EIS. Other pages referenced in Table II detail the unique ecological attributes, which were thoroughly considered in the analysis. Unique wildlife resources are the driving factors in the motorized roads and trails analysis conducted for the two FEIS.

Some new roading (approximately 18 miles during the next decade) was proposed in the Revised Forest Plan EIS. However, the Forest Plan and the Open Road and Open Motorized Trail (OROMTR) FEIS analyzed alternatives and selected an alternative that had NO NET INCREASE in road and motorized trail density—but rather, would use a system of varying the amount and location of decommissioned and new or reconstructed roads, or motorized trails to provide access where needed, while maintaining prescribed motorized route density levels within the management prescription areas. The overall Forest Plan and OROMTR Plan directed considerably less open roads and motorized trails than existed prior to those plans--thus assisting in protection of the ecological attributes of the area. Forest Plan management prescriptions and standards and guidelines also contributed to the protection of these unique attributes. If

additional roading in currently unroaded areas were allowed, it could have some relatively minor potential for:

1. Affecting Yellowstone cutthroat trout populations in some watersheds.
2. Contributing to the spread of invasive vegetation species such as noxious weeds.

**EF-2.** To what degree do the presence, type and location of roads increase the introduction and spread of exotic plant and animal species, insects, diseases, and parasites? What are the potential effects of such introductions to plant and animal species and ecosystem function in the area?

**Analysis Findings** -- Forest-wide, there is not likely to be any significant or adverse affect on noxious weed management, and since miles of open road are to be reduced, spread of noxious weeds may be reduced. Monitoring of road decommissioning would be needed, to determine if noxious weeds are developing on disturbed soils. Likewise, levels of insect and disease activity will not be affected significantly from past forest plan activities, including roading and timber harvest. Pest-caused mortality would be expected to increase as mature timber stands continue to become over mature. Pest-caused mortality of timber stands would likely increase as vegetation management decreases. Overall, the potential for significant or adverse effects of the road system on spread or increase of exotic species or insects and disease appears to be minimized by the proposed roads and motorized trail system

**EF-3.** To what degree do the presence, type, and location of roads contribute to the control of insects, diseases, and parasites?

**Analysis Findings** -- As noted in EF2 (above), the Forest roads and motorized trails system is not expected to cause an increase in levels of insect and disease activity. The access maintained, and the management flexibility in prescription area route density levels provide sufficient flexibility to manage most timber stands and vegetation, and thus control incidence levels.

**EF-4.** How does the road system affect ecological disturbance regimes in the area?

**Analysis Findings** -- Because the new Forest Plan and Open Road and Motorized Trail Plan result in a transportation system with less open roads and less overall route density in most areas of the Forest, there will be less opportunity to use prescribed fire as a management tool. In some ecosystems this will result in susceptibility to fires of higher severity and intensity. It is also possible that some natural wildfires could become somewhat larger or more intense in areas with decommissioned roads than would normally occur if road access were maintained at previous levels (see OROMTR-FEIS, p. IV-4-Air Quality paragraph).

**EF-5.** What are the adverse effects of noise caused by developing, using, and maintaining roads?

**Analysis Findings** -- The adverse effects of noise considered in the analysis were those affecting wildlife species such as elk and grizzly bear. Displacement of elk and grizzly bear were found to be the result of the high motorized route density of previously existing management plans. Management prescriptions with varying open motorized route densities were analyzed in alternatives of the 1997 Revised Forest Plan and the 1999 Open Road and Open Motorized Trail Plan. The reduced open road and motorized trail system in the new Forest Plan and Travel Management Plan will result in considerably reduced effects to wildlife species, and allow for maintaining or increasing habitat quality and effectiveness.

Noise impacts upon campers and other users would probably be of little concern, because such users expect to hear some noise from motorized travel, which is necessary to reach recreation sites.

### Aquatic, Riparian Zone, and Water Quality (AQ)

**AQ-1.** How and where does the road system modify the surface and subsurface hydrology of the area?

**Analysis Findings** -- Direct channel encroachment by roads and water flows and sediment delivery from ditches and road surfaces are probably the most common modifications. Modification occurs mainly where roads intersect streams or areas of aquatic influence along streams. These areas are inventoried and analyzed in the 1997 Revised Forest Plan and the 1999 Open Road and Open Motorized Trail Plan EIS's. These areas are shown on Maps entitled Alt3M+--Motorized Roads and Trails AIZ and Roads and Trails Stream Crossings, which are part of the Analysis File for this report. Specific roads and trails of concern are identified on pages IV-6-7 of the OROMTR-FEIS.

Stream crossing structures can modify in-stream flow velocities and influence channel migration in some cases. Unprotected stream crossings (fords) may cause accelerated sediment delivery to streams via five major processes (OROMTR-FEIS, p. IV-5): 1) bank undercutting; 2) rutting; 3) backwashing; 4) track erosion; and 5) compaction. Road prisms (fill slopes) may also modify stream-flow. Additionally, sedimentation may have an indirect effect on the hydrology of streams.

The current Forest Plan and Travel Plan transportation systems should reduce potential for adverse effects to surface and subsurface hydrology.

**AQ-2.** How and where does the road system generate surface erosion?

**Analysis Findings** -- Surface erosion occurs in areas of disturbed soils during construction and from the surface of the road, following construction. Surface erosion would also occur where roads intersect areas of unstable soil. The potential for surface erosion is thoroughly analyzed in the Forest Plan and OROMTR – FEIS'. Open roads and trails have the potential to produce



continued cumulative impacts on soil and water quality (erosion and sedimentation). Of particular concern is the potential for mass erosion occurring along roads that are constructed through soils having mass instability concerns (especially on those where side slopes are greater than 40 percent). However the potential for this latter concern is reduced, because few new roads would be built in such areas under the Revised Forest Plan. Implementation of these plans would also result in reduced surface erosion from that presently occurring, as roads are decommissioned and soils are stabilized and put back into productivity. Overall, soil quality on the Forest should improve over the existing situation.

**AQ-3.** How and where does the road system affect mass wasting?

**Analysis Findings** – Soil areas with mass instability concerns were mapped and analyzed in relation to the existing and planned roads and trails system. Instability areas, on slopes greater than 40 percent, were also identified since those have the highest potential for mass wasting. Specific ecosystem subsections with mass wasting concerns were described on page III-25 of the RFP-FEIS. Implementation of the new Forest Plan and Travel Management Plan will result in significantly reduced potential for mass wasting as roads are decommissioned and soils are reclaimed.

**AQ-4.** How and where do road-stream crossings influence local stream channels and water quality?

**Analysis Findings** – Road and stream crossings were mapped during the Revised Forest Plan and OROMTR-FEIS analyses and analyzed for potential consequences to soils, streams, aquatic, and riparian resources. Pages III-6-10 of the OROMTR-FEIS discussed the analysis of specific roads that may have an affect on in-stream flows or channel stability. Many roads and trails in the AIZ (aquatic influence zone) would be closed as these new plans are implemented. As a result of implementation of these new plans, there would be short-term impact to riparian areas and water bodies, lasting approximately three years (until disturbed sites were stabilized). These closures would, however, provide a long-term benefit to aquatic and riparian resources once they become effective (i.e.-when vegetation is established). There would be a decrease in potential for sediment delivery to streams; for delivery of other pollutants; and for detrimental impacts to riparian areas. Also, see the discussion in AQ-1 (above) for further analysis of effects of stream crossings on channels and water quality. State water quality standards would be met Forest-wide, if management plans were implemented properly. Also see AQ-9, which follows, for more analysis related to this question

**AQ-5.** How and where does the road system create potential for pollutants, such as chemical spills, oils, de-icing salts, or herbicides, to enter surface waters?

**Analysis Findings** – The biggest pollutant on the Forest is sediment, derived from within-channel erosion and upland erosion reaching stream channels. The highest potential for other pollutants is along major State and Federal Highways, and along Forest arterial roads (adjacent

to streams), where there is heavy traffic and where snowplowing and hauling of potential pollutants occurs. These activities can result in some chemicals being deposited on road surfaces and into nearby drainage areas as rain and snow wash pollutants from road surfaces and vehicles. However, a decrease in roads and trails in the AIZ would result in a decrease in potential for delivery of pollutants--although this would be relatively small since the routes closed have much lighter traffic and less potential exposure to pollutants.

**AQ-6.** How and where is the road system “hydrologically connected” to the stream system? How do the connections affect water quality and quantity (such as, the delivery of sediments and chemicals, thermal increases, elevated peak flows)?

**Analysis Findings** – (see AQ-2, 4, and 5 for related analysis). The road system is hydrologically connected to the streams in areas shown on analysis maps entitled “Roads and trails/AIZ”; and “Roads & Trails Stream Crossings” (see copies in Analysis Files). Pages III-6-10 of the OROMTR-FEIS discusses the analysis of specific roads that may have an affect on water quality or channel stability. Effects on roads adjacent to streams are discussed in AQ-9, which follows. As stated in AQ-4, previously, State water quality standards would be met Forest-wide, if management plans were implemented properly.

**AQ-7.** What downstream beneficial uses of water exist in the area? What changes in uses and demand are expected over time? How are they affected or put at risk by road-derived pollutants?

**Analysis Findings** – See AQ-2-6 for related analysis. The Forest has abundant water resources of high quality. Downstream beneficial uses include: fisheries, wildlife and aquatic and riparian ecosystems, water storage and irrigation transmission systems, hydropower dams, recreational reservoirs, and domestic water supply. These resources are very important to the attractiveness of the area for agricultural uses, wildlife and overall ecosystem health, and for the overall economy of the area. Demand for these resources is expected to continue to increase due to the attractiveness of the area for recreational activities, and from increasing numbers of yearlong residents. As stated in AQ-4, State water quality standards would generally be met Forest-wide, if management plans are implemented properly. Therefore, the analysis suggests that none of the downstream beneficial uses of water will be put at risk by road-derived pollutants. However, as indicated in EF-1 previously and AQ-9 below, there is some concern over maintenance of habitat quality for cutthroat trout in some watersheds.

**AQ-8.** How and where does the road system affect wetlands?

**Analysis Findings** – Wetlands, which could be impacted by roads, were considered to be primarily the same as those related to the aquatic influence zone areas adjacent to streams. Therefore, wetlands effects were also analyzed from the GIS (Geographic Information System) maps--Roads and Trails/AIZ; and Roads & Trails Stream Crossings (see the Analysis File). Due to the reduced number of open roads in the new road system, impact potential to wetlands will be minimal. Forest-wide Standards and Guidelines in the Revised Forest Plan and the aquatic

influence zone (AIZ) management prescription (Rx 2.8.3) standards and guidelines are adequate to protect wetland areas (see RFP Comment-Responses-p. XVIII-21, p.XX-16, and p.XX-24). Potential impacts from new road construction (on wetlands other than those in the AIZ) would be addressed in project-specific environmental analysis.

**AQ-9.** How does the road system alter physical channel dynamics, including isolation of floodplains; constraint on channel migration; and the movement of large wood, fine organic matter, and sediment?

**Analysis Findings** – See analysis for AQ-1-6 for analysis for this question. The analysis indicates that roads located within stream floodplains can effectively reduce the size and alter the shape of the floodplain. When a stream no longer has access to its floodplain, stream energy is adjusted by increasing stream velocity, which can result in down-cutting or lateral scour of the stream channel. When roads impinge on stream floodplains, stream sinuosity can be reduced. Pool quality and quantity are reduced when stream courses are straightened. Sediment can be increased through road construction and maintenance and through stream erosion caused when roadbeds confine streams. When trees and shrubs are removed within road rights-of-way, woody debris is removed from the stream ecosystem. This reduces the amount of woody substrate in the stream—thus affecting aquatic habitat and channel processes. After considering all of these potential effects, the analysis of the selected alternative finds that management may result in a decrease in road and trail impacts due to elimination of cross-country motorized use, which includes stream crossings in some areas, and due to some road decommissioning.

**AQ-10.** How and where does the road system restrict the migration and movement of aquatic organisms? What aquatic species are affected and to what extent?

**Analysis Findings** – The road system affects the movement of aquatic organisms primarily at crossings. These areas are shown on Maps entitled Alt3M+--Motorized Roads and Trails AIZ and Roads and Trails Stream Crossings, which are part of the Analysis File for this report. Specific roads and trails of concern are identified on pages IV-6-7 of the OROMTR-FEIS. Of all the crossing structures (fords, culverts, bridges), the type with the highest potential to affect aquatic species movement is a culvert. Culverts often constrict flow, increasing water velocity within the pipe and scouring the streambed below the outlet. The increased water velocity through the pipe may act as a barrier to upstream migrating organisms. The scouring downstream of the culvert outlet may result in a decrease in streambed elevation, creating a falls at the culvert outlet. The falls may not be navigable for upstream migrating aquatic organisms such as fish, amphibians, and macro-invertebrates. Some poorly placed culverts are upstream migration barriers upon their original placement.

Road crossing barriers to upstream migrating aquatic species have the potential to affect populations upstream of the road crossing. These barriers can decrease genetic interaction between populations and preclude re-founding of extirpated populations. These barriers can also serve to preserve desirable genetic stock upstream when non-native species occur downstream of

the barrier. A professional fisheries biologist should always be consulted prior to replacing a crossing structure that is currently a barrier to upstream migrating aquatic species.

In addition to considering road-crossing barriers, roads have the potential to affect amphibian migration routes through direct mortality to individuals when they cross road surfaces. In constricted migration corridors, the level of mortality has the potential to be significant at the population level. Amphibian migration is not identified as being adversely affected in previous analyses.

According to the previous analysis (OROMTR-FEIS-p.IV-10), culverts may halt fish movements during low water conditions and during spawning migrations. Cutthroat trout have the most potential for being adversely affected. Most of the healthy cutthroat trout populations occur within unroaded or slightly roaded drainages. According to the analysis, it is unlikely that the proposed road and motorized trail system would threaten the population viability of native cutthroat trout over the next 10-15 years. The current Forest Plan and Travel Plan would result in a moderate rate of recovery of degraded habitats and slightly higher levels of fish habitat quality.

**AQ-11.** How does the road system affect shading, litter-fall, and riparian plant communities?

**Analysis Findings** – In some cases, roading directly removes vegetation, and thus reduces shading of streams and riparian communities. This reduces litter-fall, increases temperatures, and changes vegetative composition. These adverse effects should be reduced somewhat, as roads are decommissioned. Closure of roads and trails within the aquatic influence zone (AIZ) would create new sediment sources due to ground disturbance under all alternatives. This would be a short-term impact to riparian areas and water bodies, lasting approximately three years (until the disturbed sites were stabilized). These closures would, however, provide a long-term benefit to aquatic and riparian resources once they became effective (i.e.-when the vegetation is re-established). If road prisms are not removed where they exist in floodplains, even with road closures, floodplain and stream functions could be adversely affected by the confinement presented by these features.

**AQ-12.** How and where does the road system contribute to fishing, poaching, or direct habitat loss for at-risk aquatic species?

**Analysis Findings** – Direct habitat loss is discussed in AQ 4, 6, 7, 9, and 10. The road and trail system allows good access to most streams for fishing, and does provide considerable potential for poaching. Fishing and poaching are controlled by State agencies, and are only affected indirectly by access opportunity. Poaching is not an issue.

**AQ-13.** How and where does the road system facilitate the introduction of non-native aquatic species?

**Analysis Findings** – Non-native species and noxious weeds can be transported on many types of vehicles. This is not identified as a significant issue or concern on the Forest as a result of the road or trail system. Also see the discussion in response to question EF2 for additional analysis.

**AQ-14.** To what extent does the road system overlap with areas of exceptionally high aquatic diversity or productivity, or areas containing rare or unique aquatic species or species of interest?

**Analysis Findings** – As indicated in AQ4, 6, 8, and 11, roads and motorized trails cross or parallel areas of aquatic influence zones. These zones are mapped and analyzed extensively in the two previous FEIS. Two unique resources are identified as having potential for disturbance in some limited areas. These include cutthroat trout habitat and Ute ladies'-tresses (threatened plant species). With the planned reduction in roading, and implementation of the new Forest Plan standards and guidelines, potential impacts to aquatic species will be reduced.

## Terrestrial Wildlife (TW)

**TW-1.** What are the direct effects of the road system on terrestrial species habitat?

**Analysis Findings** – Direct effects included disturbance, and displacement of elk and grizzly bear due to motorized travel and removal of habitat for other species due to roads. Elk vulnerability (EV), elk habitat effectiveness (EHE) and the grizzly bear cumulative effects model (CEM) were used to analyze the effects of various road density levels that would occur as a result of the management area prescriptions of the Revised Forest Plan. Implementation of the 1997 Forest Plan and 1999 Travel Plan will result in wider distribution of elk into areas of the Forest, which are underutilized. There would also be increased potential for grizzly bear utilization and occupation in some Bear Management Units (BMU's). This would result from decreased miles of open roads and motorized trails in key habitat, and the decommissioning of many miles of roads.

**TW-2.** How does the road system facilitate human activities that affect habitat?

**Analysis Findings** – In the past, roads and trails facilitated motorized travel and access to areas of habitat that are essential to provide the security, which enables wildlife to occupy areas without disturbance. The analysis determined that road density levels were too high in certain key habitat areas of the Forest. As a result, management prescriptions were created with lower motorized route densities and implemented on the Forest in a manner that would specifically reduce the impacts to elk and grizzly bear habitat. These management changes will also provide positive effects to other wildlife species.

**TW-3.** How does the road system affect legal and illegal human activities (including trapping, hunting, poaching, harassment, road kill, or illegal kill levels)? What are the effects on wildlife species?

**Analysis Findings** – See TW-1 and 2 for effects of the road system on wildlife. Hunting access will be reduced as a result of the new plans, but it will not significantly affect ability to manage wildlife through hunting. Harassment and road kill potential will be reduced. Illegal hunting does not appear to be affected by degree of road access, although the potential due to access will be reduced as a result of the new management plans. The overall result will be increased security for wildlife.

**TW-4.** How does the road system directly affect unique communities or special features in the area?

**Analysis Findings** – The newly approved road and motorized trail system will have little or no adverse effect on unique communities or special features of the area. No areas of adverse effects were identified in the analysis.

## Economics (EC)

**EC-1.** How does the road system affect the agency's direct costs and revenues? What, if any, changes in the road system will increase net revenue to the agency by reducing cost, increasing revenue, or both?

**Analysis Findings** – Cash receipts for the Forest have gone down significantly, since timber harvest has declined significantly. The reductions in timber harvest are directly attributable to the management prescriptions that favor wildlife habitat protection. The reduction in miles of open roads and trails in the transportation system is also an indirect result of the reduction in timber harvest. However, there should be an increase in net revenue, due to the reduced amount of road maintenance that would be required. This is a very positive benefit, since the Forest does not have anywhere near enough funding to perform adequate road maintenance—especially without a timber harvest program matching previous levels. Additionally, costs for signing designated routes; rehabilitation of old alignments; decommissioning; and providing law enforcement and signing will increase significantly for implementation of the new management plans.

**EC-2.** How does the road system affect the priced and non-priced consequences included in economic efficiency analysis used to assess net benefits to society?

**Analysis Findings** – Economic efficiency analysis was conducted by comparing Present Net Values (PNV). Dollar values were identified for recreation, timber, livestock grazing and water. Included in the analysis are all costs of managing the Forest, including firefighting, law enforcement, and monitoring. The difference in the range of alternatives considered was quite small (see Table IV-17-RFP-FEIS). The predominant reason for this small range was that recreation and water benefits, which comprise the great bulk of dollar-valued benefits, were not expected to vary by alternative. The most significant change in benefits would occur from

changes in the range and timber programs. Variations in costs have occurred over time. These are associated with different levels of timber harvest, increasing road restrictions and associated law enforcement requirements and increasing costs for firefighting. Overall, implementation of the road and motorized trail system approved in the 1997 Revised Forest Plan and the 1999 Travel Management Plan would result in the following changes in lifestyles and attitudes, beliefs, and values:

Lifestyles:

- Fewer opportunities to make a living off the Forest from timber products or livestock
- Restrictions on those management activities that leave lasting visual reminders
- Increasing the possibility of lasting visual reminders due to unmanaged occurrences like wildfires
- Reduced incidence of livestock grazing
- Fewer roads and trails
- Fewer roads and trails open to motorized use
- Less cross-country motorized use
- More non-motorized recreation opportunities
- Greater protection of wildlife habitat
- More recommended wilderness
- Less need for reforestation
- Faster watershed improvement

Attitudes, Beliefs, & Values:

- Greater accommodation of those who feel the Forest's resources should be left to change with no human intervention
- Less accommodation of those who feel the Forest's resources should be used for the benefit of humans
- Greater trust that developments which occur without human intervention will benefit the ecosystem

In addition, since the road and trail system would have fewer miles of road and trail open for motorized use, there would likely be increased concentrations of motorized use on the miles remaining open. There would also be some increases in non-motorized recreation, or some combination thereof. Finally, the changes in management could result in stresses on the local community's social organizations. Also, see EC1 for additional analysis for this economics question.

**EC-3.** How does the road system affect the distribution of benefits and costs among affected people?

**Analysis Findings** –See EC-1 and 2 for earlier analysis concerning distribution of benefits and costs. The reduction in open roads and open motorized trails is causing a shift in benefits and costs to users. The motorized access situation is particularly troublesome in that for a number of years, roaded access on the Forest was continually increasing—largely as a consequence of

logging activity. People have come to expect more and more motorized access. In recent years, that access has been decreasing in order to provide better habitat for wildlife. Restricting motorized access can adversely or beneficially affect how people pursue their customs and traditions. Closing a route to motorized access may deny one family access to a traditional wood-gathering site, for instance—while at the same time, another family may gain a mountain bike trail or unroaded area for wildlife viewing, or other activity. These shifts are having a significant affect on the distribution of benefits and costs. Finally, the development of a more recreation and wildlife appreciation based economy is much slower to develop than one based around a “priced” resource like the timber industry creates. This time lag in economic development has the potential to create serious social and economic stress on local communities.

## Timber Management (TM)

**TM-1.** How does road spacing and location affect logging system feasibility?

**Analysis Findings** - Road spacing would not significantly affect logging system feasibility. The road system remaining open within the 1997 Revised Forest Plan and 1999 Travel Management Plan is adequate to allow logging at the levels approved in the Forest Plan. The reduction in timber harvest levels is due to environmental constraints to meet wildlife habitat and other resource needs, rather than availability of access. The Forest Plan would use a system of varying the amount and location of decommissioning, construction, and reconstruction of roads, or motorized trails to provide access where needed, while maintaining prescribed motorized route density levels within the management prescription areas.

**TM-2.** How does the road system affect managing the suitable timber base and other lands?

**Analysis Findings** – See TM-1 for the main answer to this question. In addition, management of suitable timber base lands is limited only slightly for such activities as pre-commercial thinning due to constraints (RFP-p. III-148-Wildlife) on access dates necessary to meet grizzly bear security habitat management standards. Other access restriction dates for species such as the Peregrine Falcon, or Goshawk could limit management of the suitable timber base in isolated areas, due to constraints on construction or maintenance activities for roads.

**TM-3.** How does the road system affect access to timber stands needing silvicultural treatment?

**Analysis Findings** – See the restriction dates referred to in TM-2 for partial answer to this question. Overall, the road system would be adequate for managing all timber stands. The RFP-FEIS and OROMTR-FEIS selected an alternative that had NO NET INCREASE in road and motorized trail density. The Forest Plan would use a system of varying the amount and location of decommissioning, construction, and reconstruction of roads, or motorized trails to provide access where needed, while maintaining prescribed motorized route density levels within the management prescription areas.



## Minerals Management (MM)

**MM-1.** How does the road system affect access to locatable, leasable, and salable minerals?

**Analysis Findings** – The probability of mineral resource development is marginal given the current geologic knowledge of the Forest. However, access would be limited somewhat for future exploration or development, if future claims were to be located and developed. This would be due to closed or decommissioned roads and the reduced road density allowed by the Revised Forest Plan and Travel Management Plan. The lowest density of roads occurs in the areas of highest potential for oil and gas activity (discovery and development). Much of this area is inventoried roadless. The low density of roads would generally require new construction for exploration or development, although no developments have occurred to date.

## Range Management (RM)

**RM-1.** How does the road system affect access to range allotments?

**Analysis Findings** – The road and motorized trail system is designed to provide adequate access to all range allotments. In some cases, a permit system is required to access certain areas, but it will not prevent needed access.

## Water Production (WP)

**WP-1.** How does the road system affect access, constructing, maintaining, monitoring, and operating water diversions, impoundments, and distribution canals or pipes?

**Analysis Findings** – The analysis found no adverse effects on access for such uses.

**WP-2.** How does road development and use affect water quality in municipal watersheds?

**Analysis Findings** – As indicated in AQ-4, State water quality standards would be met Forest-wide, if management plans were implemented properly. Therefore, there would be no affect on municipal watersheds. Teton Canyon is the only municipal watershed on the Forest, and there are no significant changes in road or trail development planned in that location that would affect the watershed.

**WP-3.** How does the road system affect access to hydroelectric power generation?

**Analysis Findings** – The system would have no adverse affects on such access.

## Special Forest Products (SP)

**SP-1.** How does the road system affect access for collecting special forest products?

**Analysis Findings** – There is generally good access throughout the Forest for such products. However, due to less open roads and motorized travel, there would be somewhat less access for collecting special forest products such as firewood, berries, mushrooms flowers, etc. This would not be a significant adverse affect, however, except in limited or unusual cases.

## Special-Use Permits (SU)

**SU-1.** How does the road system affect managing special-use permit sites (concessionaires, communications sites, utility corridors, and so on)?

**Analysis Findings** – There would be no adverse effects. All such sites remain accessible. However, the maintenance costs for access to these special use sites is high, and there may be opportunities for more participation in maintenance costs.

## General Public Transportation (GT)

**GT-1.** How does the road system connect to public roads and provide primary access to communities?

**Analysis Findings** – The connection of the road and motorized trail system to public roads was displayed and considered in all maps and analyses. Major access routes were noted and maintained as access to public and private lands within or adjacent to the Forest. A good access network connecting to most major Federal, State, or County roads was maintained. Very few Forest roads serve as primary “through-routes” that connect communities.

**GT-2.** How does the road system connect large blocks of land in other ownership to public roads (ad hoc communities, subdivisions, in-holdings, and so on)?

**Analysis Findings** – (see GT-1 above). An adjacency analysis (Process Paper P—see Analysis File) was conducted in which consideration of adjacent land ownership and access to other ownership lands was analyzed. Other ownerships were appropriately addressed by the RFP and Travel Plan.

**GT-3.** How does the road system affect managing roads with shared ownership or with limited jurisdiction? (RS 2477, cost-share, prescriptive rights, FLPMA easements, FRTA easements, DOT easements)?

**Analysis Findings** – (see GT-1 and 2 above). In addition, RS 2477 assertions were mapped and considered in all alternatives. The open road and motorized trail system selected will not adversely affect any RS 2477 assertions. The majority of the assertions would be open to motorized travel. None of these routes would be decommissioned prior to administrative resolution.

**GT-4.** How does the road system address the safety of road users?

**Analysis Findings** – Overall safety of the roaded transportation system is expected to improve, because fewer open roads mean fewer miles to maintain. Limited Forest road maintenance dollars would be used over fewer roads, and the quality and frequency of maintenance would be expected to improve, and with this, the traveler safety. In addition, road condition surveys are identifying critical health and safety concerns for improvements needed.

As roads are decommissioned, there is a slight potential risk to summer, non-motorized travelers. This is because previous road conditions, which provided relatively unimpeded access, would be modified by earth berms, surface ripping, or other physical barriers, such as trees or rocks. These modifications would make access more difficult and potentially, could increase risk to motorized user safety in the near term. However, to the prudent non-motorized traveler, this risk would be expected to be as manageable as any other risk associated with cross-country travel on primitive trails. The closure methods (gates, earth berms, etc.) would normally be concentrated toward the decommissioned road's terminus at the junction with an adjacent open route. Because of this, risks to non-motorized travelers or livestock would not vary much from normal cross-country travel. It may actually be more safe because many roads are not decommissioned their entire length, and they could provide safe travel opportunities similar to or better than primitive trails because of wider surfaces.

For winter, motorized users such as snowmachiners, there would be a slight elevated risk to safety in the early snow season when snow depths are low and physical barriers are most exposed. This would likely occur the first year or two following decommissioning. Many roads that are to be decommissioned in bear management units (BMU's) are already gated. Therefore, there would be very little change from previous management within those areas, because snowmachiners have long been accustomed to maneuvering around closed gates in the early season. Also, as winter users become more familiar with closure barrier locations, the potential risk would be expected to diminish to levels prior to implementing the new Forest Plan and Travel Plan.

Forest Travel Plans and maps consistently note potential risks and hazards to public safety. Additionally, Forest administrative activities such as signing, posting safety notices, and public information efforts are expected to reduce or minimize safety risks. Overall, decommissioned roads are not expected to pose unreasonable safety risks to prudent travelers or their equipment and livestock.

## Administrative Use (AU)

**AU-1.** How does the road system affect access needed for research, inventory, and monitoring?

**Analysis Findings** – The road and motorized trail system will be more than adequate for any needed research, inventory, or monitoring. Some delay in time of access may be required to accommodate grizzly bear standards, or other requirements that may arise, but these should have little effect on the ability to access the Forest for such activities.

**AU-2.** How does the road system affect investigative or enforcement activities?

**Analysis Findings** – The ability to conduct such activities should not be adversely affected. However, the need and cost for enforcement will increase to properly manage closed areas or routes.

## Protection (PT)

**PT-1.** How does the road system affect fuels management?

**Analysis Findings** – Overall, the low number of acres scheduled for timber harvest in the Forest Plan and the restricted motorized access across the Forest will limit the use of prescribed fire—especially in the forested cover types. For community types where fire intervals are outside their historic range, the Forest Plan and transportation system are expected to delay a return to more natural fire regimes for at least the next decade. See the RFP-FEIS, page IV-6-8 for a discussion of effects by ecosystem.

**PT-2.** How does the road system affect the capacity of the Forest Service and cooperators to suppress wildfires?

**Analysis Findings** – Emergency access for initial attack fire suppression would be reduced. However, this should not be a significant effect, because much of initial attack is now done with helicopter access. In severe cases, the inability to get through a decommissioned road area quickly may increase the potential for large fire growth. However, in most cases, the decommissioned roads could be opened in a short period of time for fire suppression access.

**PT-3.** How does the road system affect risk to firefighters and to public safety?

**Analysis Findings** – See GT-4 for analysis concerning public safety. Similarly, risk to firefighters would not increase. Also, see PT-2.

**PT-4.** How does the road system contribute to airborne dust emissions resulting in reduced visibility and human health concerns?

**Analysis Findings** – Intermittent and localized decrease in air quality may result due to dust from road construction and maintenance. This is an “Irreversible and Irretrievable” commitment of resources (OROMTR-FEIS, p. IV-38). Approximately 75% of the maintenance level 3, 4, and 5 roads need dust abatement treatments to improve visibility and reduce airborne particulates. High use roads needing such treatments should be prioritized for dust abatement.

### Unroaded Recreation (UR)

**UR-1.** Is there now or will there be in the future, excess supply or excess demand for unroaded recreation areas?

**Analysis Findings** – This question was not analyzed directly at the time of previous environmental analyses, because the terms “unroaded area”, or “unroaded recreation” were not in use at that time. The National Roads Analysis Process Team developed these terms subsequently.

There was no issue identified in previous or current analyses that would suggest a demand for such areas or recreation activity. However, there has always been a portion of the public that feels that inventoried roadless areas (greater than 5,000 acres and no classified roads) should be maintained or enhanced by adding unroaded areas, so there is some indication of desire for additional “unroaded” areas—but, not necessarily for recreational purposes. It would be difficult to say whether there was an excess demand or supply, since that would be a subjective estimate, until capacity and utilization levels were determined by the best methods possible.

**UR-2.** Is developing new roads into unroaded areas, decommission of existing roads, or changing the maintenance of existing roads causing substantial changes in the quantity, quality, or type of unroaded recreation opportunities?

**Analysis Findings** – See UR-1 for additional analysis. The approved roads and motorized trails system will probably have no significant adverse effect on “unroaded recreation” opportunities. If new roads were developed in unroaded areas, the minimal potential for unroaded recreation to occur in those areas would be somewhat reduced. As indicated in UR-1, most recreation users don’t even recognize or value these areas (unroaded) specifically. They generally only recognize an area for its primitive recreational value if it is a significantly larger area, such as those that qualify as inventoried roadless areas (greater than 5,000 acres and no classified roads).

**UR-3.** What are the adverse effects of noise and other disturbances caused by developing, using and maintaining roads, on the quantity, quality, and type of unroaded recreation opportunities?

**Analysis Findings** – See UR-1 and UR-2. Basically, noise from motorized use or maintenance of such routes is not desirable, or acceptable to those desiring unroaded recreation opportunities. Therefore, the existence of road noise and disturbances would disqualify an area from classification as an “unroaded recreation area”. This question is basically “moot” and self-answering.

**UR-4.** Who participates in unroaded recreation in the areas affected by constructing, maintaining, and decommissioning roads?

**Analysis Findings** – (see UR-1-3). No one can participate in unroaded recreation in areas affected by constructed or maintained roads. Decommissioned roads are used by a few hikers and horseback riders in the summer, and snowmachiners in the winter. Safety of users of decommissioned routes is a significant issue and is addressed on page IV-32 of the OROMTR-FEIS.

**UR-5.** What are these participants’ attachments to the area, how strong are their feelings, and are alternative opportunities and locations available?

**Analysis Findings** – The few participants who use decommissioned roads feel very strongly about the opportunity to continue using them. Snowmachiners, hikers, and horseback riders are all very concerned that the decommissioning not be so intense as to prevent them from continuing to use these closed roads as historic access routes. Alternative routes are readily available; however, some local recreation users have historically used some of the routes to be decommissioned, and thus they have strong personal interest in continued accessibility.

### Road-Related Recreation (RR)

**RR-1.** Is there now or will there be in the future, excess supply or excess demand for roaded recreation opportunities?

**Analysis Findings** – Overall, it is questionable whether there will be enough designated motorized routes and cross-country motorized areas remaining open to travel to meet the needs of increasing motorized access demand. The 1997 Revised Forest Plan and 1999 Travel Management Plan have eliminated much of the motorized cross-country travel previously allowed. This will place additional burden on the open road and motorized trail system, which contains less open roads than previously.

**RR-2.** Is developing new roads into unroaded area, decommissioning of existing roads, or changing maintenance of existing roads causing substantial changes in the quantity, quality or type of roaded recreation opportunities?

**Analysis Findings** – Very few new roads would be developed under the recently approved Revised Forest Plan (approximately 18 miles), so no significant changes would result in roaded recreation opportunities as a result. However, decommissioning of existing roads would result in significantly less roaded and motorized recreation opportunities. Due to high demand, increased use on the remaining open motorized routes, would likely result in reduced quality experiences for those users, due to crowding, dust, etc.

**RR-3.** What are the adverse effects of noise and other disturbances caused by constructing, using, and maintaining roads on the quantity, quality, or type of roaded recreation opportunities?

**Analysis Findings** – These effects are negligible, since most users of roaded and motorized trail areas expect to see and hear noise and other disturbances associated with motorized activity. A few public comments indicate concern that the traffic levels on Forest roads are becoming too much like urban areas outside the Forest. There are many alternative motorized recreational access opportunities for both ends of the recreational value scale within the system of roads and trails on the Forest.

**RR-4.** Who participates in roaded recreation in the areas affected by road constructing, changes in road maintenance, or road decommissioning?

**Analysis Findings** – Motorized users (both summer and winter) of many types participate in road and trail recreation use in areas affected by road construction and maintenance. Non-motorized summer recreation users and snowmachine users (winter) utilize decommissioned roads. Only violators of road closures would use motorized vehicles on decommissioned routes in the summer.

**RR-5.** What are these participant's attachments to the area, how strong are their feelings, and are alternative opportunities and locations available?

**Analysis Findings** – These participants are strongly attached to use of the area, and strongly oppose any loss of motorized access opportunities. There are many alternative motorized recreational access opportunities for both ends of the recreational value scale within the system of roads and trails on the Forest.

### Passive-Use Value (PV)

**PV-1.** Do areas planned for road construction, closure or decommissioning have unique physical or biological characteristics, such as unique natural features and threatened or endangered species (TES)?

**Analysis Findings** – Yes—in addition to the references in Table 1, see TW-1 for analysis findings concerning wildlife and TES. In addition, see EF-1 and AQ-14 for findings concerning unique features and TES.

**PV-2.** Do areas planned for road construction, closure, or decommissioning have unique cultural, traditional, symbolic, sacred, spiritual, or religious significance?

**Analysis Findings** – The road and motorized trail system does access such areas, but would have very little adverse effect upon cultural or religious sites. Local Tribes are mostly concerned about being able to maintain their historic access. Motorized recreation users are the group that would be most impacted in terms of traditional passive values, due to the reduction of motorized road and cross-country use opportunities.

**PV-3.** What if any, groups of people (ethnic groups, subcultures, and so on) hold cultural, symbolic, spiritual, sacred, traditional, or religious values for areas planned for road entry or road closure?

**Analysis Findings** – The Shoshone-Bannock Tribes have many sites of value within areas of the road and trail system. As indicated in PV-2, there would be little adverse impact to such sites by the reduced road system.

**PV-4.** Will constructing, closing, or decommissioning roads substantially affect passive-use values?

**Analysis Findings** – Management of the roads and trails system will not substantially affect passive-use values adversely. Passive values will increase as the open road system decreases.

## Social Issues (SI)

**SI-1.** What are people's perceived needs and values for roads? How does road management affect people's dependence on, and desire for roads?

**Analysis Findings** – The area surrounding the Forest is experiencing significant population increases. The proportion of the area's population, which is interested in the Forest for its recreational uses is expected to increase as recreational use continues to grow. The proportion of the area's population, which is interested in the Forest for timber and livestock production, is expected to decline. Wildlife, fisheries, and water quality values, and other ecological concerns are expected to remain high. The issues analyzed in the 1997 Revised Forest Plan and 1999 Travel Management Plan FEIS' address these values and interests. The decrease in open road and motorized trail route density in the new management plans may reduce people's dependence on roads for access to some areas of the Forest over time.



**SI-2.** What are people's perceived needs and values for access? How does road management affect people's dependence on, need for and desire for access?

**Analysis Findings** – (see SI-1 findings). Access needs and values are similar to those for roads and trails. The previous road and trail system created some dependence for access. However, that dependence can be eased, as types of recreation, and other activities change.

**SI-3.** How does the road system affect access to paleontological, archaeological and historical sites?

**Analysis Findings** – See PV1-4 for information. Adequate access exists, or could be developed where it is needed, according to Forest Plan management direction. Major areas of contiguous archaeological or historical interest are protected by the Special Management Area prescription 2.1.1, which restricts motorized roads and trails. The approved road and motorized trail system will not have adverse effects on these sites.

**SI-4.** How does the road system affect cultural and traditional uses (such as plant gathering, and access to traditional and cultural sites) and American treaty rights?

**Analysis Findings** – See PV 1-4 for information. Some traditional access areas might be restricted due to road closures or decommissioning, but there are optional areas of similar features, that would be available opportunities for plant gathering, hunting, etc. The overall effect would be that more time would be required to access some areas or sites than previously required. The Shoshone-Bannock tribe feels their treaty rights have been violated by road closure gates, which prevent them from having motorized access to the Forest on some routes.

**SI-5.** How are roads that constitute historic sites affected by road management?

**Analysis Findings** – The only road, which is a historic feature, is the Yale-Kilgore road between Island Park and the Camas Creek area. This road is considered part of the Nez-Perce National Historic Trail. The route is signed and maintained by Fremont County for this historic use, and will not be adversely affected by road management. A portion of this route recently became a designated State Historic Byway. The BLM and County provide the trail signs. The County installs the signs.

**SI-6.** How is community social and economic health affected by road management (for example, lifestyles, businesses, tourism industry, and infrastructure maintenance)?

**Analysis Findings** – The reduced open roads system and increased environmental management restrictions have significantly impacted timber harvesting and lumber production as analyzed in the Forest Plan FEIS. However, the reduction in timber harvest is also due to the completion of

the bark beetle salvage program. Overall, the reduction in timber harvest has caused a significant delay in economic development in local communities dependent on the timber industry. This effect is slowly being overcome by recreational and tourist activity, and other industry such as agriculturally related businesses; information technology (computer) businesses; and educational institution growth. The delay in this transformation has created significant stress on the social organization of local communities, however this has begun to ease somewhat.

**SI-7.** What is the perceived social and economic dependency of a community on an unroaded area versus the value of that unroaded area for its intrinsic existence and symbolic values?

**Analysis Findings** – See UR-1-5 for analysis findings. There would have been no perceived dependency, because there was no clear perception of the term “unroaded” at the time of the previous analysis, and there is still no such perception. There is a strong desire by some local residents for maintaining inventoried roadless (non-motorized and unroaded areas over 5,000 acres) areas, but the existence of such areas does not create a social or economic dependency.

**SI-8.** How does road management affect wilderness attributes, including natural integrity, natural appearance, opportunities for solitude, and opportunities for primitive recreation?

**Analysis Findings** – The current road system will not have an adverse effect on wilderness attributes. If anything, the decommissioning of some roads will have a positive effect on natural values adjacent to designated wilderness.

**SI-9.** What are the traditional uses of animal and plant species in the area of analysis?

**Analysis Findings** – See PV-1-2 for findings. Traditional uses include big-game hunting and forest products such as medicinal plants, berries, firewood, posts, poles, and saw-timber. Most of these products are still available and accessible, although in lesser quantities in some cases, due to management restrictions.

**SI-10.** How does road management affect people’s sense of place?

**Analysis Findings** – See PV-2-4 and SI-1-6 for findings. Those who believe “access rights” have been taken away by road closures or decommissioning would have a feeling of loss of control over their interests and values. Those who believe they have gained by having roads and areas closed to motorized use would have an increased value in their sense of place.

## Civil Rights and Environmental Justice (CR)

**CR-1.** How does the road system, or its management, affect certain groups of people (minority, ethnic, cultural, racial, disabled, and low-income groups)?

**Analysis Findings** – There is no significant adverse effect on any of these groups. All users would have somewhat less ease of access to a few areas, but the vast majority of the Forest remains open for motorized travel, and is available for all groups of users. Disabled access for hunting is provided for under policies of the Revised Forest Plan (RFP p. III-24—item D and OROMTR-FEIS p. IV-37—Civil Rights).

## **Step 5-Describing Opportunities and Priorities**

### **Purpose**

The purpose of this step is to identify management opportunities and technical recommendations and set priorities for those options for future management of the road and motorized trail system. These opportunities are intended to respond to the issues, concerns, benefits, problems and risks identified in the analysis findings of Step 4. The objective is to compare the current transportation system with Forest Plan direction and with what is desirable or acceptable, and describe options for modifying the road or motorized trail system (or its management) that would achieve desirable conditions.

### **Products**

#### **Previous Analyses**

The products of the previous RFP-FEIS and OROMTR-FEIS analyses are the Revised Forest Plan (1997) and the Forest Travel Plan (Map—1999, revised 2001). The directions in those plans established management Standards and Guidelines; established open, motorized route densities; specified routes open or closed; and identified routes to be decommissioned. These management decisions already address most opportunities for change. However, there do appear to be some management directions of the Revised Forest Plan that have not been fully implemented. Therefore, the following are opportunities noted:

- ❖ Not all Forest Plan Goals and Objectives for roads and motorized trail management have been fully met. There is opportunity to review these and determine if revisions or adjustments are warranted, and if priorities are still appropriate.
- ❖ The monitoring requirements of the Revised Forest Plan have still not been fully implemented. Thus, there is an opportunity to improve monitoring and possibly re-establish methods or priorities for monitoring.
- ❖ Appendix 1 displays the priority schedule for completion of the site-specific NEPA analysis on road decommissioning, which was submitted to the Regional Forester on March 24, 2000. This re-analysis of decommissioning will provide an opportunity to determine appropriate methods to close roads effectively, with minimal impacts on resources or Forest users. Since these NEPA analyses are to be done by watershed, there is the possibility of combining efforts and doing roads analysis; watershed analysis; and the decommissioning analysis at the same time for a more complete process, unless there is a desire to complete the roads and watershed analyses prior to the decision making process required for decommissioning.

## Roads Analysis for this Report

The following opportunities were identified as a result of this Roads Analysis and the findings, which resulted from review of the 71 analysis questions:

- ❖ Improve/update the Forest Plan inventory of roads/motorized trails by using information from the original inventory forms and oracle database done prior to the RFP. The process paper (“Targhee National Forest—Road Analysis Process—October 1994 in the Analysis File) contains a “key” to codes used on the forms. This update could be performed at the time of sub-forest scale roads analysis.
- ❖ Increase monitoring as required in the RFP to determine effects of route densities, etc. and need for continuation of closures. There is potential for formal research of effects on wildlife with the current management implementation (e.g.-motorized trail impacts to wildlife have no research basis). Thus, research could determine if trail impacts are equal to road impacts as assumed in the RFP-FEIS.
- ❖ Increase County participation in maintenance responsibilities as they assume RS-2477 routes (see County Road Agreement lists in Analysis File).
- ❖ Coordinate sub-forest scale roads analyses with 5<sup>th</sup>/6<sup>th</sup> level watershed analysis as appropriate.
- ❖ There is an opportunity for future analysis teams to refer to the AIZ map (see Analysis File) for areas of concentration of road and motorized trail interface that are “hot spots” for consideration.
- ❖ As roads are analyzed for decommission work, consider converting them to motorized (within approved route density) or non-motorized trails in areas where recreational interest or potential is high.
- ❖ Develop forest-wide capital improvement, road management, and general guidelines for reconstruction or construction of roads and trails to improve management and reduce maintenance costs.
- ❖ Complete RMO’s for all roads on the Forest and use the IDT process to review or create them as much as possible.
- ❖ There is an opportunity to gather more accurate or detailed information as new condition surveys are done. Include culvert surveys, with an emphasis on identification of aquatic passage obstacles. Consider classifying stream-flow levels through culverts to help clarify areas of potential aquatic impact. Conduct condition surveys on motorized trails also.
- ❖ Utilize the data shown in the Culvert Replacement Opportunities Table (see Analysis File) in all future analysis and planning. This data is a good example of projects that could enhance passage of aquatic species through culverts.

- ❖ Identify maintenance class 1 & 2 (ghost roads) that could be used to develop additional OHV trail system in limited areas of Forest, within approved route densities.
- ❖ Prioritize watershed analysis based on roads analysis needs--giving attention/priority to water quality or cutthroat trout analysis needs (see AQ1, AQ-10—Appendix 3 for references). Coordinate these priorities with the decommissioning NEPA, which is also to be done by watershed.
- ❖ Look for ways to coordinate with the fuels reduction initiative EIS. For example, it might be important (in terms of providing fire access or fuel breaks around subdivision areas) to leave some roads open that were previously considered for decommissioning.
- ❖ Consider ways to improve access or road condition to allow better access to portions of the Forest.
- ❖ Work with S.U. permittees to develop road maintenance agreements within the terms of the S.U. permits for access to areas such as electronic sites, water transmission structures, and possibly even concession recreation sites, so the permittee takes on more responsibility for access to their permitted site.
- ❖ Since the road maintenance budget is not adequate, consider developing road classification and maintenance summary tables with information from Roads Analyses and RMO's as they are completed. This would help identify priorities and funding needs.
- ❖ In planning for new road construction, consider the tables in RFP---p. IV-1-10, which show proposed road reconstruction and construction, and try to better identify where these might occur, and what the tradeoff's would be in terms of decommissioning other existing open roads to maintain route density for the prescription areas. This could be done Forest-wide at one time, or as individual roads analysis is done—but should be considered. This would be an opportunity to more accurately determine feasibility of future timber harvest, and other activities.
- ❖ Routes identified as still needing improvement as major travel corridors include the Yale-Kilgore, Flagg Ranch, Big Springs Loop, Teton Canyon, Cave Falls, and Green Canyon roads. The Yale-Kilgore and Flagg Ranch roads could be done under the Federal Highway Administration program, providing proper coordination occurs. The Big Springs Loop, Teton Canyon, Cave Falls, and Green Canyon roads could all be done under the Public Forest Service Roads (PFSR) program. Project Summaries for these PFSR routes are shown in the Analysis File.
- ❖ Look for funding opportunities from other than Forest Service sources for the Scenic Byways program to improve signing, maintenance, etc.
- ❖ Establish a winter, linear capacity for groomed snowmachine trails.
- ❖ Continue to develop TRTR projects to address site-specific resource concerns.

- ❖ Complete corridor management plans for all Scenic and Historic Byways through a coordinated planning effort with State, County, Byway Committee members, and other agencies as needed. This is needed prior to obtaining funding for further enhancement of these Byway programs.
- ❖ See the following specific OROMTR-FEIS concerns (from p. IV-6 thru IV-10) for some of the water quality and cutthroat trout opportunities that could be addressed in subsequent road, watershed, or environmental analysis. It is suggested that project proposals to address the following concerns be prepared to request watershed or fisheries funding, rather than doing it all with road maintenance or reconstruction funding:

Water Quality--

- ❖ Proposed open roads and trails in Fritz Creek are in the headwaters of a perennial stream, whose lower reaches are listed as Water Quality Limited (Dubois District).
- ❖ Approximately one mile of road along Cow Creek (added to WQL list in 1998) may be of concern (Dubois District).
- ❖ Two roads/trails exist along intermittent tributaries to West Camas Creek, which flows into Camas Creek, which is a WQL listed stream (Dubois District).
- ❖ The 1.5 miles of proposed road in Garner Canyon should be evaluated carefully for water quality impacts (Ashton-Island Park District).
- ❖ The ½ mile of proposed road in the Packsaddle Lake area should also be carefully evaluated for potential water quality impacts (Teton Basin District).
- ❖ A road/trail crosses the headwaters of tributaries to Horseshoe Creek, which is WQL listed (Teton Basin District).
- ❖ Patterson Creek road is confining the stream and is frequently flooded at the lower end. This could use some attention (Teton Basin District).
- ❖ Henderson Creek is cited in the AIZ inventory forms as being confined by the road. Closing it would benefit-riparian dependent resources (Teton Basin District).
- ❖ Murphy Creek, Pole Canyon, and Patterson are included in the WQL reach of the Teton River that includes the area from the headwaters down to Trail Creek confluence (Teton Basin District).
- ❖ The motorized trail along Fish Creek, Hawley Gulch, and Kirkham Hollow is an area that has been identified as having road and trail related concerns that are impacting water resources. A culvert at Road 318 may also be causing adverse impacts in this area (Palisades District).

- ❖ Elimination of the motorized use along the North and South Indian Creek trails would benefit riparian-dependent resources. These streams were added to the 1998--303(d) list for Idaho. The 046 cutoff trail is also of concern (Palisades District).
- ❖ Motorized trails in the North and South Fork of Indian Creek, and the Long Spring Canyon road and trail should be further evaluated for potential water quality impacts (Palisades District).
- ❖ The one-mile of proposed road adjacent to lower Taylor Creek should be evaluated for potential water quality impacts (Island Park-Ashton).

#### Fisheries--

- ❖ Road crossings should be inventoried to determine their ability to pass aquatic organisms upstream. Culverts in cutthroat trout and other native species habitat should be given first priority. Lower stream reaches should be evaluated first, and then middle and upper reaches as time allows. Findings should be documented on forms provided by the Forest Fisheries Biologist. Roads and streams identified in the specific opportunities listed below should be given consideration for top priority in evaluation of road crossings.
- ❖ Threemile Creek and West Rattlesnake Creek (Dubois District) are believed to have culverts that block cutthroat trout migration. These should be evaluated with the fisheries biologist for modification or replacement.
- ❖ Ching Creek and Moose Creek (Dubois District) were identified as streams of concern that should be evaluated as future roads analysis is done.
- ❖ Indian and Pine Creeks (Palisades District) were also identified as streams of concern due to identified open motorized routes.
- ❖ Motorized trails along Calamity, Rainey, North Indian and South Indian Creeks (Palisades District) were also identified for future evaluation in relation to trail use and proposed trail modifications.
- ❖ Road decommissioning in cutthroat habitat should include culvert and culvert fill removal and seeding of bare soil adjacent to streams, but not road fill removal within the stream floodplain.

### **NEPA Analysis Needs**

As indicated previously, the analyses done in the RFP-FEIS and OROMTR-FEIS are adequate for: the route density determination; choice of specific open and closed routes; and decisions on routes to be decommissioned. However, additional NEPA is needed to respond to direction from the Regional Forester to address methods of decommissioning to be used, and the priorities for that analysis. This direction is outlined in Step 2 and Appendix 1. Also, some of the specific



opportunities listed in this Step may require additional NEPA processes, depending on the scope of projects identified.

## **Step 6-Report Summary**

The Analysis Findings from Step 4 and the Opportunities and Priorities from Step 5 are the main products of this analysis. The Analysis File and information in the Report provide all of the documentation for the five previous roads analysis steps. The following discussion is a summary of Key Findings and Opportunities identified along with the process for application of these findings in future analysis.

### **Key Findings**

This roads analysis has determined that the FEIS analyses and management actions of the Forest Plan and Travel Plan are complete and adequate to address the six steps of the Roads Analysis process. There is not sufficient need for change in management to warrant a Forest Plan revision at this time.

There will be very few adverse ecological consequences as a result of these new management plans. However, there is still a need to address the deficiency in funding for maintenance of this road and motorized trail system. There is also need to address a few key resource concerns from the FEIS analyses that may not have been fully addressed by the Revised Forest Plan, or its implementation and monitoring. These needs are identified in the following summary of opportunities.

### **Opportunities**

Opportunities for improvement are related to Forest Plan Goals and Objectives implementation, monitoring implementation, and analysis of decommissioning. As noted above, there is a significant need to better identify and address the lack of maintenance funding with a maintenance priority system. In addition, there are a number of opportunities identified concerning: improving inventory; County maintenance; improved monitoring; coordination of roads analysis with other resource analysis; options for funding of projects by watershed or fisheries; and road maintenance being performed by special use permit holders.

### **Application of Findings**

These products (opportunities) are for use by those doing sub-Forest scale analyses. These opportunities should be investigated thoroughly for application and use to improve road and motorized trail system management on the Forest. Those conducting subsequent analyses should review the 71 analysis questions and findings (Step 4) of this Report for a more complete

understanding of the suggested opportunities and how they may be relevant to the new analysis. The references to previous analysis documents contained in Appendix 3 of this Report would also be a valuable tool to help in finding Forest Plan direction or RFP and OROMTR-FEIS analysis information relevant to each of the 71 questions.

## Analysis File-Document List

The following documents, which are available for public review at Caribou-Targhee Forest Offices in Idaho Falls, comprise the Analysis File referred to throughout this Roads Analysis:

1. National Forest System Road Management Rule (Federal Register / Vol. 66, No. 9 / Friday, January 12, 2001 / Rules and Regulations)
2. Forest Service Publication 643, August 1991 ("Roads Analysis: Informing Decisions About Managing the National Forest Transportation System.
3. 1997 Revised Forest Plan (RFP)—Targhee National Forest.
4. Final Environmental Impact Statement (FEIS)—1997 Revised Forest Plan—Targhee National Forest
5. Maps 1-29 for the FEIS for the Revised Forest Plan—Targhee National Forest
6. Record of Decision (FEIS for the Revised Forest Plan)
7. FEIS for the Open Road and Open Motorized Trail Analysis (Motorized Road and Trail Travel Plan)—Targhee National Forest—October, 1999.
8. Record of Decision-FEIS-Open Road and Open Motorized Trail (OROMTR) Analysis
9. Maps Index and Maps 1—6(a-c) for the OROMTR—FEIS
10. Caribou—Targhee National Forest TRAVEL MAPS (2001) for the Dubois, Island Park-Ashton, and Palisades and Teton Basin Ranger Districts.
11. Targhee National Forest Roads Analysis Process, October, 1994
12. Samples of initial Road and Trail Inventory Sheets and initial GIS maps (all originals are kept in the RFP Analysis File)
13. Grizzly Bear Settlement Agreement (Greater Yellowstone Coalitions: et al., /vs/ Jack Ward Thomas, et al.—Civil No. 93-0303-E-HLR)
14. Analysis of the Management Situation (AMS) Targhee National Forest, November, 1992
15. Caribou-Targhee National Forest—Forest Plan Monitoring and Evaluation Reports for 1997-1999 and 2000-2001.
16. Roads Analysis (R.A.) and Road Management Objectives (RMO's) completed previously are:
  - a. Big Bend Ridge Timber Sale R.A. and RMO's
  - b. Fall Creek Watershed Analysis and R.A.
  - c. Anderson Mill Timber Sale R.A
  - d. RMO's for Miner's Creek, Walking Fish, Bishop West, Chick Creek, Ripley Butte, and Island Park Siding timber sale analyses.
17. GIS analysis maps from the RFP and OROMTR-FEIS referenced in this analysis are:
  - a. Alt3mplus Motorized Roads & Trails AIZ (Targhee RFP)
  - b. Alt3mplus Motorized Roads & Trails Stream Crossings (Targhee RFP)
  - c. Unstable Soils and Slopes >40%
18. FEIS for the Targhee National Forest Oil and Gas Leasing Analysis (Feb. 2000)
19. County Road Agreement Lists
20. Proposed Public and Forest Service Roads Project Summaries (top 4 priorities)
21. Watershed Analysis Priority List for the Targhee National Forest

Analysis File—Document List (continued)

22. Process Paper “P” –Adjacent Land Use Patterns (from the RFP-FEIS)
23. Forest Cost Per Mile Deferred Maintenance Summary (INFRA printout table)
24. Caribou-Targhee N.F. Culvert Replacement Opportunities table (only the Targhee portion is applicable to this analysis, and all data displayed are estimates).

## **Appendix**

APPENDIX 1. Targhee Strategy & Schedule for NEPA Analysis on Road Decommissioning

APPENDIX 2. Process Paper A--Issue Identification and Public Involvement (RFP-FEIS process)

APPENDIX 3. Roads Analysis Document References (Step 4)



**Appendix-1**

Targhee Strategy & Schedule for NEPA Analysis on Road  
Decommissioning







United States  
Department of  
Agriculture

Forest  
Service

Caribou-Targhee  
National  
Forest

P.O. Box 208  
420 No. Bridge St.  
St. Anthony, ID 83445

File Code: 1570-1  
Route To: Staff

Date: March 24, 2000

Subject: Targhee Strategy and Schedule for NEPA Analysis on Road Decommissioning  
To: Regional Forester

Enclosed please find the schedule we have developed for completion of the site specific NEPA analysis on the road decommissioning on the Targhee. As directed by you in your Appeal Decision on our Travel Plan (1-27-00), this schedule describes the geographic areas, by priority, beginning with the roads closed under the emergency actions in 1998. We understand that the site specific NEPA analysis is only required where soil disturbance is necessary to insure effective closures. Actions such as ripping and seeding, culvert removal, constructing earthen berms, and other earth disturbance requiring heavy equipment will require this analysis. Additional analysis is not needed for signing, gating, placing rocks, planting a screen of trees with a tree spade, felling trees and administrative actions.

While this schedule encompasses the entire Targhee portion of the Forest, we do plan to analyze road decommissioning in some of our ongoing analyses, where appropriate. For instance, some of the closures along the Teton Front will be analyzed in the Teton Front Vegetation Management NEPA analysis this year. The East Beaver-Miners Creek EIS will also document the effects of road decommissioning within the analysis area for the project.

If you have questions on the schedule or would like additional notes or maps, please contact Cheryl Probert at 542-5809 or 523-1412. Thank you for your assistance with this project.

JERRY B. REESE  
Forest Supervisor  
Enclosures (2)



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**SCHEDULE FOR SITE-SPECIFIC NEPA ANALYSIS**  
of the  
**TARGHEE TRAVEL PLAN**  
March 17, 2000

| PRIORITY MAP NUMBER | NAME/DESCRIPTION   | PRIMARY ISSUE                 | DECISION DATE | REASONING FOR GROUPING AND PRIORITY RANKING   |
|---------------------|--|-------------------------------|---------------|---|
| 1                   | Watersheds 8 and 9<br>(Henry's Lake)                     | Grizzly Habitat               | Spring 2001   | <ul style="list-style-type: none"> <li>• Encompasses the entire Henry's Lake BMU</li> <li>• Average number of roads (70) with similar issues</li> <li>• 3 roads are not yet decommissioned because they are outside of the BMU</li> <li>• About 1/2 of #009 is south of Island Park Res., this would combine better with watersheds 11 and 14 because outside of BMU and elk habitat is the emphasis</li> </ul>   |
| 2                   | Watershed 10, 12, and 13<br>(Madison-Pitchstone Plateau) | Grizzly Habitat               | Spring 2002   | <ul style="list-style-type: none"> <li>• Encompasses the entire Madison-Pitchstone Plateau BMU</li> <li>• Larger number of roads (110); not all have been decommissioned</li> <li>• Watersheds 10 and 13 are small so it was logical to combine them with 12, which is in between.</li> <li>• The whole area is mostly flat, winter recreation safety is the biggest public issue, and other concerns are similar.</li> <li>• 7 roads are not decommissioned yet because they are outside of the BMU but it should all be done together because we'd have to analyze them in cumulative effects anyway.</li> <li>• If this proves too large, Watershed 10 would be done on its own, (next or concurrently)</li> </ul> |
| 3                   | Watersheds 15, 16 and 21<br>(Bechler-Teton)              | Grizzly Habitat               | Spring 2003   | <ul style="list-style-type: none"> <li>• Small number of roads (45) have been decommissioned; approximately 25 roads have not been decommissioned</li> <li>• Size of the geographic area would not be unwieldy for site specific analysis</li> <li>• Encompasses Bechler-Teton BMU and must follow the BO definitions for decommissioning. Will finish out the BMU decommissioning</li> <li>• Has a variety of issues aside from grizzly: fish, recreation, safety, soils, RS 2477 roads</li> <li>• Logical to combine for field review purposes</li> </ul>   |
| 4                   | Watersheds 025 and 026<br>(Dubois Centennials)           | Elk Habitat<br>High Road Dens | Spring 2004   | <ul style="list-style-type: none"> <li>• Elk security is the main RFP prescription emphasis</li> <li>• Comparatively large number of roads to be obliterated</li> <li>• Several landscape analyses (3) have used similar groupings</li> <li>• Ecological types similar</li> <li>• Unstable and highly erodible soils</li> </ul>   |

| PRIORITY<br>MAP NUMBER | NAME/DESCRIPTION  | PRIMARY ISSUE          | DECISION<br>DATE | REASONING FOR GROUPING AND PRIORITY RANKING  |
|------------------------|---|------------------------|------------------|--|
| 5                      | Watersheds 011, 014, part 009<br>(Big Bend/Davis Lakes) | Elk Habitat            | Spring<br>2005   | <ul style="list-style-type: none"> <li>Elk security habitat is the important issue also</li> <li>Some landscape analyses are already using this grouping.</li> <li>Similar secondary issues: recreation, summer homes, intermingled lands</li> <li>Fewer soils problems and fewer roads to decommission so lower in priority than Dubois Centennials</li> </ul>  |
| 6                      | Snake River and Big Holes Ecological<br>Subsections     | Yellowstone CT<br>WQLS | Spring<br>2006   | <ul style="list-style-type: none"> <li>Few roads in both Subsections so combination would be manageable</li> <li>Similar issues: Yellowstone cutthroat trout (YCT), water quality limited streams (WQLS) and heavy recreational use</li> <li>If YCT are listed or more emphasis put on them, this could move to priority #4</li> </ul>   |
| 7                      | Caribou Ecological Subsection                           | Recreation             | Spring<br>2007   | <ul style="list-style-type: none"> <li>Forest planning unit</li> <li>Largely unroaded, relatively isolated with few roads to decommission</li> <li>Heavy recreational use (hunting) also has WQLS and YCT</li> </ul>   |
| 8                      | Lemhi/Medicine Lodge Ecological<br>Subsection           | Range                  | Spring<br>2008   | <ul style="list-style-type: none"> <li>Very similar soils, vegetation type: open sagebrush, steep, narrow canyons, unstable and highly erodible soils</li> <li>Few roads, managed for range or primitive recreation</li> <li>Few options for obliteration because the area is so open</li> <li>Does include the western-most part of the Centennial Ecological Subsection (Conglomerate Mtn. area) because it fits in with the terrain and vegetation of the L/ML subsection better.</li> <li>Locally important recreation area but lower concentration of people</li> </ul> |
| 9*                     | Watersheds 017, 018, 019, and 020<br>(Teton Front)      | Recreation             | Fall<br>2000     | <ul style="list-style-type: none"> <li>*Teton Basin RD proposes to cover the few roads in the Teton Front</li> <li>Vegetation Mgt Plan that they are doing NEPA on now</li> <li>Very few roads and/or issues</li> <li>Most of the area is Wilderness; the small area needing decommissioning is open to cross country motorized travel so decommissioning should not make much difference</li> </ul>   |



## **Appendix-2**

Process Paper A—Issue Identification and Public Involvement (RFP-  
FEIS process)



## PROCESS PAPER A ISSUE IDENTIFICATION AND PUBLIC INVOLVEMENT

### PROCESS

Background and Initial Steps The Record of Decision for the existing Forest Plan was signed in October of 1985. The two main objectives of that plan for the decade of the 1980's were to harvest the thousands of acres of lodgepole pine that had been killed by the Mountain Pine Beetle and to reforest them. The Plan was to have been released in 1981. However, it was delayed to allow time for additional analysis of roadless areas so a wilderness recommendation could be made to Congress. Timber salvage operations went ahead. By 1985, five years of harvesting had already occurred and the main objectives of the existing Plan were well on their way to completion.

By 1990 interested groups and individuals were appealing many more of the projects that were called for in the Forest Plan. Forest personnel found that they could not produce the outputs specified in the Plan and still comply with its standards and guidelines.

In June of 1990 the Forest published a Notice of Intent in the Federal Register announcing its interest in identifying changed conditions. Subsequently a second Notice of Intent was issued on December 31, 1990 announcing the decision to revise the Forest Plan. The public was asked to provide their views on five topics by April 30, 1991:

- The mix of vegetation types and ages and the management practices needed to achieve the desired mix;
- Transportation;
- Determination of lands not suitable for timber production and the Allowable Sale Quantity (ASQ) for timber;
- Management requirements for mineral leasing, exploration and development with respect to oil and gas;
- Compatibility with the Greater Yellowstone Coordinating Committee document, A Framework for Coordination of National Parks and National Forests in the Greater Yellowstone Area.

Recognizing that most people do not subscribe to the Federal Register, the Forest took the following additional steps to stimulate input from the public.

- Forest employees were trained to take comments from the public.
  - Six public meetings were held (one in every community where the Forest has an office) to brief the public on the Planning process and to provide an open house at which members of the public could speak to Forest personnel and submit comments.
  - Flyers were sent permittees and to all others on forest lists explaining opportunities for participating in the Revision.
  - Newsletters were sent Forest employees soliciting their comments.
  - Letters were sent to all federal, state and local government agencies offering to brief them on the Revision.



- Meetings were also held with the Clark County Agricultural Stabilization and Conservation Service Committee, the Wildlife Council, and the Citizens for Teton Valley.

- The Forest developed a mutual problem solving approach for working with the public, relying heavily on the counsel of Bill Shands. The principles of that process are outlined later in this Appendix.

## PUBLIC INVOLVEMENT

Meetings - The Forest held a series of meetings with the public to determine their respective visions of what the Targhee should be like, or should look like in the future. In response to needs identified during the meetings the Forest also conducted a series of field trips to heighten communication and increase understanding among the public, other government agencies and Forest personnel.

- |                         |   |
|-------------------------|---|
| - October 16, 1991      | Introduction to the Revision<br>Youth Services Center outside St. Anthony                                     |
| - February 1, 1992      | Regional Forester Visit with the Public<br>Sugar-Salem High School, Sugar City                                |
| - March 18, 1992        | Winter Recreation Focus Trip<br>Big Springs Warming Hut   |
| - May 28, 1992          | Fish & Wildlife Focus Trip, Swan Valley   |
| - June 27, 1992         | Timber Focus Trip, Island Park  |
| - July 25, 1992         | Range Focus Trip, Dubois  |
| - August 13, 1992       | Recreation Focus Trip<br>Grand Targhee Ski Resort   |
| - November 12, 1992     | Desired Future Condition<br>National Guard Armory, Rexburg  |
| - March 6, 1993         | Details - Analysis of the Management Situation<br>South Fremont High School, St. Anthony                      |
| - April 21, 1993        | Community Center, Ashton  |
| - August 26, 1993       | Forestwide Standards and Guidelines<br>Management Prescriptions<br>Eagle Rock Junior High School, Idaho Falls |
| - October 2, 1993       | Prescription Allocations in the Existing<br>Forest Plan, South Fremont High School<br>St. Anthony             |
| - January 5, 1994       | Access Seminar, Madison County Veterans<br>Memorial Building, Rexburg   |
| - May 21, 1994          | Alternatives, Lindy Ross Elementary School, Dubois  |
| - September 20-21, 1994 | Island Park Ranger District<br>Work Session on the Alternatives   |

- September 21-22, 1994 Palisades Ranger District  
Work Session on the Alternatives
- September 22-23, 1994 Dubois Ranger District  
Work Session on the Alternatives
- September 28-29, 1994 Ashton Ranger District  
Work Session on the Alternatives
- September 28-29, 1994 Teton Basin Ranger District  
Work Session on the Alternatives
- October 6, 1994 Access Meeting, Westbank Inn, Idaho Falls
- October 25, 1994 Alternatives, Teton County Fairground, Driggs
- June 6, 1995 Alternatives, Community Center, Ashton
- June 8, 1995 Alternatives, Westbank Inn, Idaho Falls

Besides meeting with various individuals, Forest personnel also responded to various requests for presentations or meetings on the Revision with various organizations including:

- Alpine Hiking Club
- Sugar-Salem High School
- Region 6 Wildlife Council
- Teton County Commissioners
- Shoshone-Bannock Indian Tribes
- Jefferson County Commissioners
- Bonneville County Commissioners
- Citizens for a User-Friendly Forest
- Henry's Fork Watershed Council
- Idaho Department of Fish and Game
- Wyoming Game and Fish Department
- USDI Fish and Wildlife Service

In working with the public on the Revision, numerous concerns surfaced which were best addressed outside the Revision process—such as day-to-day management of Forest trails. Those concerns were handled by other Forest personnel. For instance, when some members of the public indicated their desire to work to improve trail conditions, the Palisades Ranger District coordinated efforts to respond to those concerns. By March of 1992 the issues listing had taken the following form.

1. Availability of Oil and Gas for Leasing
2. Biological Diversity and Landscape Ecology: Fish, Wildlife, Plants, Forage
3. Greater Yellowstone Area Coordination and Administrative Concerns
4. Livestock
5. Recreation
6. Roads and Access

7. Social and Economic Concerns
8. Soil and Water
9. Timber
10. Wilderness and Roadless Areas

Over the years, the list of issues changed many times. In retrospect, some of these changes can probably be viewed more as exercises in semantics, or classification, rather than as newly-emerging issues. Others, like Wilderness and Roadless Areas emerged because Roadless Area evaluation is a "must-do" for a Revision. Oil and Gas Leasing, one of the original five issues, is now being addressed in a separate environmental analysis. The final listing of issues shown in Chapter 1 of the EIS is the end product.

Principles of Public Involvement - Here follow some principles we tried to practice when working with the public.

#### **Openness**

In the past, we often did not share information with the public because the information was classified as Working Papers; and under the Freedom of Information Act (FOIA) we did not have to share it. In some cases that made sense. No one wants to release information that has not been adequately checked or reviewed. For instance, or simply isn't completed.

In our particular case, we resolved early on to provide working papers on request. Working papers were labeled as such, or as Drafts. Providing the information seemed to allay suspicions and increase dialogue. It also served to improve the quality of the final products because the public was frequently able to point out a better way to do things. We caught problems and errors more quickly than if we had delayed the dialogue.

#### **Fostering Public Discussion**

In the past, we held traditional meetings - with Forest Service personnel speaking and everyone else listening or asking questions. The Forest Service was basically trying to educate the public. For some types of meetings, it was, and is, the appropriate format.

During the Revision we actively tried to engage the public in the process. We set up the meetings so as to facilitate public-to-public dialogue. In this type of setting, we expected Forest personnel to facilitate that public discussion rather than dominating it or controlling it.

#### **Mutual Problem Solving**

In the past, people brought their conflicting interests to us and we tried to work out solutions. Of course, we never met their needs fully because their respective needs were in conflict. People normally remonstrated that we hadn't listened.

During the Revision we have worked to get the public talking with one another, and to recognize one another as human beings rather than as abstract position statements. We have worked to see to it that the public understands the problem lies in their differences of view; and that it is to their advantage to help work out a solution rather than simply laying the problem in the lap of a government decisionmaker.

This gives the public the opportunity to identify some middle ground that we might miss. It also heightens their appreciation of the task facing the Forest Service if together we are unsuccessful in working things out.

## **Appendix-3**

### Roads Analysis Document References (Step 4)



### Appendix 3. Roads Analysis Document References (Step 4)

| Question Number | Addressed in Analysis (Y/N) | If addressed directly, page number and document.   | If addressed indirectly, page number and document  | If not addressed, rationale. |
|-----------------|-----------------------------|--|--|------------------------------|
| EF-1            | Yes                         | RFP-FEIS <sup>6</sup> -p.III-5-19, III-31-60; p.IV-1-12, IV-17-44, Maps 22-26 and 28-29; RFP <sup>7</sup> -p.III-5-72; OROMTR-FEIS <sup>8</sup> -p.III-4-18, p.IV-4-29 | RFP-p.III-5 (G&O's and S&G's), III-65-157, p.IV-1-10; RFP-p.V-1-47; OROMTR-FEIS-p.III-21-22, and p.IV-33-34; RFP-FEIS-p.III-16, p.IV-11; RFP-AMS <sup>9</sup> -Ch.3-Biological Diversity, p.1-19 |                              |
| EF-2            | Yes                         | RFP-FEIS p.III-14-15, 46, p. IV-8-9, and IV-27; OROMTR-FEIS-p. IV-15   | RFP-AMS-Ch.3-Range, p. 8, 13, 16-18; Ch.3-Insects and Disease, p.1-3   |                              |
| EF-3            | Yes                         | RFP-p.III-6; RFP-FEIS-p.III-14, 46, and p. IV-8-27; OROMTR-FEIS-p.IV-15  | RFP-p.III-5; also see RFP-AMS as in EF-2   |                              |
| EF-4            | Yes                         | RFP-FEIS-p.III-13, p.IV-4-8; OROMTR-FEIS-p.IV-32-33  | RFP-p.III-6; RFP-FEIS map 23; OROMTR-FEIS maps 2-6; RFP-AMS, Ch.3.-Fire, p. 1-4  |                              |
| EF-5            | Yes                         | RFP-FEIS-p.III-52, 57 and p. IV-27-38; OROMTR-FEIS-p.III-14-16, p.IV-16-26   | RFP-FEIS map 24, and Alternative maps  |                              |
| AQ-1            | Yes                         | RFP-FEIS-p.III-23-30, p.IV-14(2 <sup>nd</sup> paragraph-mass instability, p.IV-17-21; OROMTR-FEIS-p.III-4-10, p.IV-4-8; RFP-FEIS maps 22-23; and OROMTR-FEIS maps 1-6  | RFP-p.III-106-111; RFP-FEIS-p.IV-19-20; OROMTR-FEIS-p.III-6-11, p.IV-4-8; Analysis maps of Roads and trails/AIZ; and Roads & Trails Stream Crossings – (see the Analysis File)                   |                              |
| AQ-2            | Yes                         | RFP-FEIS-p.III-17-19, 23-26, p.IV-14,19-20; OROMTR-FEIS-p.III-2-4, 6-10; p.IV-2-8; RFP-FEIS maps 22-23; and OROMTR-FEIS maps 2-6; Also, see AQ-1 references            | Analysis maps of Roads and trails/AIZ; and Roads & Trails Stream Crossings; Soils Instability Map (see the Analysis File)  |                              |
| AQ-3            | Yes                         | See AQ-2—also, see RFP-FEIS-p.III-25; OROMTR-FEIS-p.III-4-10   | See map references in AQ-2   |                              |
| AQ-4            | Yes                         | RFP-FEIS-p.III-26-31, p.IV-12-15, 19-21; OROMTR-FEIS-p.III-4-10, p.IV-2-10; RFP map 22; OROMTR-FEIS maps 2-6;  | See map references in AQ-2   |                              |

<sup>6</sup> Revised Forest Plan-Final Environmental Impact Statement

<sup>7</sup> Revised Forest Plan

<sup>8</sup> Open Road and Open Motorized Trail-Final Environmental Impact Statement

<sup>9</sup> Revised Forest Plan-Analysis of the Management Situation

| Question Number | Addressed in Analysis (Y/N) | If addressed directly, page number and document.  | If addressed indirectly, page number and document   | If not addressed, rationale. |
|-----------------|-----------------------------|---|---|------------------------------|
| AQ-5            | Yes                         | RFP-FEIS-p.IV-20, 26; OROMTR-FEIS-p.IV-5; also see AQ-1 and AQ-4  |   |                              |
| AQ-6            | Yes                         | See AQ-2, 4, 5 for related analysis. Also see Analysis maps of Roads and trails/AIZ; and Roads & Trails Stream Crossings –(see the Analysis File)   |   |                              |
| AQ-7            | Yes                         | See AQ2—6 for analysis references; in addition-RFP-FEIS-p.III-26-30, p.IV-17-23; OROMTR-FEIS-p.III-4-13, p.IV-4-14  |   |                              |
| AQ-8            | Yes                         | See AQ-1, 4, and 6; RFP-AMS-Ch.III-Riparian & Wetlands, p.1-9; RFP-p.III-106; OROMTR-FEIS-III-14 (1 <sup>st</sup> paragraph), IV-13 (spotted frog habitat), and p.IV-14 (Ute ladies'-tresses) | Analysis maps of Roads and trails/AIZ; and Roads & Trails Stream Crossings –(see the Analysis File) |                              |
| AQ-9            | Yes                         | RFP-FEIS-p.IV-17, 20 (2 <sup>nd</sup> paragraph); OROMTR-FEIS-p.III-6-10, p.IV-4-8; also see AQ-1-6 for other references  | Analysis maps of Roads and trails/AIZ; and Roads & Trails Stream Crossings –(see the Analysis File) |                              |
| AQ-10           | Yes                         | RFP-FEIS-p.IV-17-23; OROMTR-FEIS-p.III-6-12, p. IV-4-10; also, see AQ-4 and AQ-6  | Analysis maps of Roads and trails/AIZ; and Roads & Trails Stream Crossings –(see the Analysis File) |                              |
| AQ-11           | Yes                         | RFP-FEIS-p.III-23-25, p.IV-19-21; OROMTR-FEIS-p.III-4-10, p.IV-4-8; also see AQ-1-6 for additional references   | Analysis maps of Roads and trails/AIZ; and Roads & Trails Stream Crossings –(see the Analysis File) |                              |
| AQ-12           | Yes                         | OROMTR-FEIS-p.III-10-12, p.IV-8-11; also see AQ-7, 9, 10 for direct habitat loss discussion   |   |                              |
| AQ-13           | Yes                         | RFP-FEIS-p.III-46, p.IV-27  |   |                              |
| AQ-14           | Yes                         | See AQ-4,6,8,11 for analysis references; also see RFP-FEIS-p.IV-17-20, and OROMTR-FEIS-p.III-14, p.IV-14  | Analysis maps of Roads and trails/AIZ; and Roads & Trails Stream Crossings –(see the Analysis File) |                              |
| TW-1            | Yes                         | RFP-FEIS-p.III-39-70, p.IV-27-43; OROMTR-FEIS-p.III-13-18, p.IV-15-28   | RFP-p.III-15-23, p.III-98-104, III-146-152; RFP-FEIS maps 23-24; OROMTR-FEIS maps 2-6               |                              |

| Question Number | Addressed in Analysis (Y/N) | If addressed directly, page number and document.   | If addressed indirectly, page number and document                         | If not addressed, rationale. |
|-----------------|-----------------------------|--|---|------------------------------|
| TW-2            | Yes                         | Same as TW1, plus RFP-FEIS-p.III-73-100, p.IV-44-72; OROMTR-FEIS-p.III-18-26, p.IV-29-38                                       | RFP-FEIS-map 10-prescription map for alternative 3M; OROMTR-FEIS maps 2-6 |                              |
| TW-3            | Yes                         | See TW-2   | See TW-2  |                              |
| TW-4            | Yes                         | See TW-1-2 for analysis findings; RFP-FEIS-p.III-71, p.IV-44; OROMTR-FEIS-p.IV-29  |   |                              |
| EC-1            | Yes                         | RFP-FEIS-p.IV-46, 59; OROMTR-FEIS-p.III-18, p.IV-30-31 36  |   |                              |
| EC-2            | Yes                         | RFP-FEIS-p.IV-53-60; OROMTR-FEIS-p.IV-35-37 note that economic efficiency was measured by Present Net Value (PNV)—see p. IV-57 |   |                              |
| EC-3            | Yes                         | See EC-2   |   |                              |
| TM-1            | Yes                         | OROMTR-FEIS-p.IV-37  | RFP-FEIS-p.III-97-98, p.IV-67   |                              |
| TM-2            | YES                         | See TM-1, also—RFP-p.III-148-Wildlife--access dates  | See TM-1  |                              |
| TM-3            | Yes                         | RFP-p.III-148-Wildlife--access dates   |   |                              |
| MM-1            | Yes                         | RFP-FEIS-p.III-22, p.IV-16; OROMTR-FEIS-p.IV-4   |   |                              |
| RM-1            | Yes                         | RFP-FEIS-III-98-100, p.IV-69-73; OROMTR-FEIS-p.III-26, p.IV-38.  |   |                              |
| WP-1            | Yes                         | RFP-FEIS-p.III-79, p.IV-60   |   |                              |
| WP-2            | Yes                         | OROMTR-FEIS-p.IV-8   |   |                              |
| WP-3            | Yes                         | See WP-1—would not adversely affect  | Revised Forest Plan, p.III-157  |                              |
| SP-1            | Yes                         | RFP-FEIS-p.III-87, IV-45; OROMTR-FEIS-p.IV-37  |   |                              |
| SU-1            | Yes                         | See WP-1   |   |                              |
| GT-1            | Yes                         | RFP-FEIS-p.III-73-75, p.IV-44-46; OROMTR-FEIS-p.III-18-20, p.IV-29-32, Appendix C(M)-1   | RFP-FEIS maps 26-27; OROMTR-FEIS maps 1-6                                 |                              |
| GT-2            | Yes                         | RFP-FEIS-p.III-16-17 (Process Paper P); RFP-FEIS maps 26-27; OROMTR-FEIS maps 1-6; also, see GT-1                              | See GT-1 maps   |                              |
| GT-3            | Yes                         | See GT-1 and 2; also- OROMTR-FEIS-p.III-20, p.IV-31-32   | OROMTR-FEIS Map #1  |                              |
| GT-4            | Yes                         | OROMTR-FEIS-p.IV-32-33   |   |                              |
| AU-1            | Yes                         | OROMTR-FEIS-p.IV-29  |   |                              |



| Question Number | Addressed in Analysis (Y/N) | If addressed directly, page number and document.  | If addressed indirectly, page number and document                                | If not addressed, rationale. |
|-----------------|-----------------------------|---|--|------------------------------|
| AU-2            | Yes                         | RFP-FEIS-p.IV-44-46;<br>OROMTR-FEIS-p.III-19,<br>p.IV-29-30   |  |                              |
| PT-1            | Yes                         | RFP-FEIS-p.III-11-14, p.IV-5-8  |  |                              |
| PT-2            | Yes                         | OROMTR-FEIS-p.III-18,<br>p.IV-31-32   | RFP-FEIS-p.IV-15-air<br>quality discussion                                       |                              |
| PT-3            | Yes                         | See PT-2 and GT-4 plus,<br>OROMTR-FEIS-p.IV-32-33   |  |                              |
| PT-4            | Yes                         | OROMTR-FEIS-p.IV-4, 38  |  |                              |
| UR-1            | Yes                         | This was not addressed directly, since there was not an issue identified—this is a new topic developed by the National, Roads Analysis Process Team | RFP-FEIS-p.S-5-6, p.IV-45-46, 49-50, 55-56, 58<br>OROMTR-FEIS-p.IV-31, 33, 36-37 |                              |
| UR-2            | Yes                         | This was not addressed directly, since there was not an issue identified—this is a new topic developed by the National, Roads Analysis Process Team | OROMTR-FEIS-p.III-21-22, p.IV-33; also see UR-1 reference                        |                              |
| UR-3            | Yes                         | This was not addressed directly, since there was not an issue identified—this is a new topic developed by the National, Roads Analysis Process Team | See UR-1 and 2   |                              |
| UR--4           | Yes                         | This was not addressed directly, since there was not an issue identified—this is a new topic developed by the National, Roads Analysis Process Team | See UR-1 and 2;<br>OROMTR-FEIS-p.IV-31<br>cumulative effects, IV-32<br>Safety    |                              |
| UR5             | Yes                         | This was not addressed directly, since there was not an issue identified—this is a new topic developed by the National, Roads Analysis Process Team | See UR-1, 2, and 4;<br>OROMTR-FEIS-p.I-4;<br>p.IV-31; Appendix E-<br>p.182-194   |                              |
| RR-1            | Yes                         | RFP-FEIS-p.IV-46;<br>OROMTR-FEIS-p.IV-36  | OROMTR-FEIS-maps 6<br>a—6c   |                              |
| RR-2            | Yes                         | RFP-FEIS-p.IV-46;<br>OROMTR-FEIS-p.IV-31  |  |                              |
| RR-3            | Yes                         | This was never identified as an issue—so, was only considered indirectly in analysis of Public Comments   | OROMTR-FEIS-<br>Appendix A-Comment-<br>Responses-p.55-56,                        |                              |
| RR-4            | Yes                         | RFP-FEIS-p.III-74-75;<br>OROMTR-FEIS-p.III-18-21  |  |                              |

| Question Number | Addressed in Analysis (Y/N) | If addressed directly, page number and document.  | If addressed indirectly, page number and document                | If not addressed, rationale. |
|-----------------|-----------------------------|---|--|------------------------------|
| RR-5            | Yes                         | RFP-FEIS-p.IV-55<br>OROMTR-FEIS-p.I-2-4, p.IV-36, Appendix A-Comment-Responses-p.55-61  |  |                              |
| PV-1            | Yes                         | RFP-FEIS-p.III-31,33,34,37,38,42,47,53,57, 60-71, p.IV-21-23, 25-41; OROMTR-FEIS-p.III-10-18, p.IV-8-29; also see TW-1, EF-1, and AQ-14 for other analysis references | See TW-1, EF-1, and AQ-14 for other analysis references and maps |                              |
| PV-2            | Yes                         | RFP-FEIS-p.III-85-90, p.IV-53-60; OROMTR-FEIS-p.III-23-25, p.IV-35-37; also see RR-2 and 4.   |  |                              |
| PV-3            | Yes                         | See PV-2  |  |                              |
| PV-4            | Yes                         | See PV-1 & 2  |  |                              |
| SI-1            | Yes                         | Also, see PV-1 & 2; RR-4-5; AQ-12; EC-2-3; WP-3; SU-1 and GT-1-4  |  |                              |
| SI-2            | Yes                         | See SI-1  |  |                              |
| SI-3            | Yes                         | See RFP-p.III-79; RFP-FEIS-p.III-88-90, p.IV-54; and RFP management prescription map #10  |  |                              |
| SI-4            | Yes                         | See PV1 & 2; also, RFP-FEIS-p.IV-54, and OROMTR-FEIS-p.IV-36  |  |                              |
| SI-5            | Yes                         | RFP-FEIS-p.III-89   |  |                              |
| SI-6            | Yes                         | See analysis references in EC-1-3 and PV1 & 2   |  |                              |
| SI-7            | Yes                         | This was not addressed directly, since there was not an issue identified—this is a new topic developed by the National, Roads Analysis Process Team                   | See UR-1-5 for analysis references.                              |                              |
| SI-8            | Yes                         | RFP-FEIS-p.III-76, p.IV-47-49; OROMTR-FEIS-p.III-21, p. IV-33   |  |                              |
| S-9             | Yes                         | See PV1-2   |  |                              |
| SI-10           | Yes                         | See PV2-4, and SI-1-6 also RFP-FEIS-p.III-90  |  |                              |
| CR-1            | Yes                         | RFP-FEIS-p.III-90, p.IV-54  |  |                              |



## Glossary

This glossary contains terms that are utilized throughout the document or are terms that are common to road or motorized trail management. A consistent and understandable use of these terms is important to understand road and trail management. Definitions contained within the glossary have been extracted from Forest Service Manuals and Handbooks (7700 and 2300), the Code of Federal Regulations, the United States Code, and a glossary developed by the San Dimas Technology and Development Center (publication 9777 1806-SDTDC).

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**All Terrain Vehicles (ATV)**: Motorized, off-highway vehicle 50" or less in width, having a dry weight of 600 pounds or less that travels on 3 or more low-pressure tires with a seat designated to be straddled by the operator. Low-pressure tires are 6" or more in width and designated for use on wheel rim diameters of 12" or less, utilizing an operating pressure of ten pounds per square inch (psi) or less as recommended by the vehicle manufacturer.

**Annual Maintenance**: Work performed to maintain serviceability, or repair failures during the year in which they occur. Includes preventive and/or cyclic maintenance performed in the year in which it is scheduled to occur. Unscheduled or catastrophic failures of components or assets may need to be repaired as a part of annual maintenance.

**Aquatic Influence Zone (AIZ)**: The area of water influence adjacent to streams, lakes, ponds, reservoirs, and wetlands. These are delineated by the 2.8.3 Management Prescription of the Revised Forest Plan. The boundary widths from water sources are shown on page III-8 of the Revised Forest Plan.

**Arterial Road**: A road that provides service to large land areas and usually connects with other arterial roads or public highways.

**Bear Management Unit (BMU)**: Geographical habitat area for protection and management of the grizzly bear. There are 5 recognized BMU's on the Targhee Forest (Figure III-6 of the RFP-FEIS)

**Capital Improvement (road/trail)**: The engineering, survey, design, construction, installation, or assembly of a new fixed asset, or the significant alteration, expansion, or extension of an existing fixed asset to accommodate a change of purpose.

**Classified Road**: Roads wholly or partially within or adjacent to National Forest System lands that are determined to be needed for long-term motor vehicle access, including State roads,

county roads, privately owned roads, National Forest system roads, and other roads authorized by the Forest Service.

**Classified Trail:** A trail wholly or partly within, or adjacent to and serving National Forest system lands which is necessary for the protection, administration, and utilization of the National Forest and the use and development of its resources.

**Closed Road:** A road closed to vehicular traffic exceeding one year and maintained at a level 1 standard. Basic custodial maintenance is performed to keep damage to adjacent resources to an acceptable level and to perpetuate the road to facilitate future management activities. Emphasis is normally given to maintaining drainage facilities and runoff patterns. Planned road deterioration may occur at this level. Appropriate traffic management strategies are "prohibit" and "eliminate". Closed roads may be of any type, class, or construction standard, and may be managed at any other maintenance level during the time they are open for traffic. However, while being maintained at level 1, they are closed to vehicular traffic, but may be open and suitable for non-motorized uses.

**Collector Road:** A road that serves a smaller land area than an arterial road. Usually it connects forest arterial roads to local forest roads or terminal facilities, such as trailheads, campgrounds, etc.

**Condition Survey:** Information needed to determine if a road is meeting resource management objectives and access needs.

**Critical Vehicle:** The vehicle, normally the largest (by weight, size, or unique configuration) whose limited use on the road is necessary to complete the planned activity, and for which the road is designed. (FSH 7709.56, section 4.1)

**Culvert:** A conduit or passageway under a road, trail, or other obstruction. A culvert differs from a bridge in that it is usually constructed entirely below the elevation of the traveled way. (EM 772-100R and EM 7720-100LL, section 102)

**Decommission:** Removal of a road from the Forest Transportation road system. This may include demolition, dismantling, removal, and obliteration, and/or disposal of a deteriorated or otherwise unneeded asset or component, including necessary cleanup work. This action eliminates the deferred maintenance needs for the fixed asset. Decommissioning is done to travel ways that are no longer needed for resource management. Portions of an asset or component may remain if they do not cause problems or require maintenance. Decommissioning includes meeting the following objectives, as a minimum:

- Motorized access is signed closed and/or access is physically blocked.
- The road is hydrologically self-maintaining.
- The road prism is revegetated.
- Slopes are stabilized.

**Deferred Maintenance:** Maintenance that was not performed when it should have been or when it was scheduled and which, therefore, was put off or delayed for a future period.

**Design Speed:** The speed determined for design and correlation of the physical features of a road or road segment that influence vehicle operation. It is the maximum safe speed that the design vehicle can maintain over a specific segment of a road when conditions are so favorable that the design features of the road, rather than operational limitation of the vehicle, govern. The design speed is the safe speed for the design situation only. (FSH 7709.56, section 4.25)

**Design Standards:** The definitive lengths, widths, and depths of individual elements, such as a 12-foot traveled way, 2-foot shoulders, 3/4:1 cut slopes, 3-foot curve widening, and 6 inches of crushed aggregate, that define a road template. (FSM 7721.05. Also see FSH 7709.56, section 4.05)

**Design Vehicle:** The vehicle frequently using the road that determines the minimum standard for a particular design element. (FSH 7709.56, section 4.1)

**Ecosystem:** A complex system of living and nonliving components that interact and change continually. Healthy ecosystems are those that are in proper functioning condition (PFC). Healthy ecosystems retain all of their parts and functions for future generations even though vegetation patterns, human uses or other conditions may change. These may be large-scale (regional) complexes, or local-scale (watersheds).

**Ecosystem Subsection:** An ecological unit that exhibits unique patterns in soils, landform, topography and potential natural vegetation, among other characteristics. The Forest encompasses all or part of seven subsections.

**Ecosystem Sustainability:** The ability to sustain diversity, productivity, resilience to stress, health, renewability, and/or yields of desired values, resource uses, products, or services from an ecosystem while maintaining its integrity over time.

**Federal Highway Administration:** (FHWA) is part of the Department of Transportation and performs its mission through the following programs:

- The Federal-Aid Highway Program provides federal financial assistance to the States for construction and improvement of the National Highway System, urban and rural roads, and bridges. The program provides funds for general improvements and developments of safe highways and roads.
- The Federal Land Highway Program provides access to and within the National Forests, National Parks, Indian Reservations and other public lands by preparing plans, letting contracts, supervising construction of facilities, and conducting bridge inspections and surveys.

**Forest Roads:** A road wholly or partly within, or adjacent to, and serving the National Forest System and which is necessary for the protection, administration, and utilization of the National Forest System and the use and development of its resources (23 U.S.C. 101).

**Forest Service Road:** A forest road under the jurisdiction of the Forest Service. The term "Forest Service roads" is synonymous with the term "forest development roads" as used in 23 U.S.C. 205.

**Forest Transportation Facility:** A classified road, designed trail, or designated airfield, including bridges, culverts, parking lots, log transfer facilities, safety devices and other transportation network appurtenances under Forest Service jurisdiction that is wholly or partially within or adjacent to National Forest System lands.

**Forest Transportation System:** Those facilities, including Forest Service roads, bridges, culverts, trails, parking lots, log transfer facilities, road safety and other appurtenances, and airfields, in the transportation network and under Forest Service jurisdiction.

**Four-wheel Trail/Road:** A forest road included in the Forest Development Transportation Plan and commonly used by four-wheel drive, high-clearance vehicles having a width greater than 50 inches.

**Fuels reduction initiative:** This is a national program to evaluate and address fire hazard potential affecting other ownerships within the National Forest System lands. Efforts are being made to identify areas of heavy fuel loadings that could be a fire hazard that could be reduced, thus minimizing potential fire effects to properties within the National Forests.

**Geographic Information Systems (GIS):** A computerized system of mapping geographic features of the Forest to aid in management planning.

**Indicator of environmental consequences:** A measureable or identifiable factor which is used to display differences in alternative management choices. Indicators are used in environmental analysis documentation to compare alternatives.

**Intermittent Service:** A road developed and operated for periodic service and closed for more than one year between periods of use.

**Local Road:** A single purpose road that connects terminal facilities with collector or arterial roads.

**Long-term Continuous (constant) service:** A long-term facility (road) developed and operated for continuous or annual recurrent service.

**Long-term intermittent (closed road):** An intermittent service road in maintenance level 1 (low level) that is closed to all vehicular traffic for more than one year.

**Maintenance level:** The level of service provided by, and maintenance required for, a specific road, consistent with road management objectives and maintenance criteria. The five levels are as follows:

Level 1—these roads are not maintained, and are closed more than one year.

Level 2—these roads are maintained for high-clearance vehicles.

Level 3—these roads are maintained for passenger vehicles, but the road surface does not have to be smooth.

Level 4—these roads are maintained for passenger vehicles, with a smooth surface

Level 5—these roads are maintained for passenger vehicles, and are to be dust-free and possibly paved.

**Maintenance (road/trail):** The act of keeping fixed assets in acceptable condition. It includes preventive maintenance, normal repairs, replacement of parts and structural components, and other activities needed to preserve a fixed asset so that it continues to provide acceptable service and achieves its expected life. Maintenance excludes activities aimed at expanding the capacity of an asset or otherwise upgrading it to serve needs different from, or significantly greater than those originally intended. Maintenance includes work needed to meet laws, regulations, codes, and other legal direction as long as the original intent or purpose of the fixed asset is not changed.

**Management Prescription:** Management practices and intensity selected and scheduled for application on a specific area to attain multiple-use and other goals and objectives. Management Prescriptions are used in Forest Planning to determine how portions of a Forest are to be managed.

**Motorized:** Those identified travel routes that allow motorized use on them and are managed as trails. There are three types of motorized trails:

- A single (1) track (12-24" tread) trail that can be used for 2-wheeled motorized travel (foot, horse, mountain bike, and/or 2-wheeled motorized).
- A single (1) track (50-60" tread) trail that can be used for ATV motorized travel (foot, horse, mountain bike, 2-wheeled motorized, and/or ATV).
- A double (2) track (50-80" center line separation) primitive type road that can be used for high clearance motorized travel (foot, horse, mountain bike, 2-wheeled motorized, ATV's, and/or high clearance 4X4's). These are classified roads that are managed as trails.

**National Forest System:** As defined in the Forest Rangeland Renewable Resources Planning Act, the "National Forest System" includes all National Forest lands reserved or withdrawn from the public domain of the United States, all National Forest lands acquired through purchase, exchange, donation, or other means, the National Grasslands and land utilization projects administered under title III of the Bankhead-Jones Farm Tenant Act (50 Stat. 525, 7 U.S.C. 1010-1012), and other lands, waters or interests therein which are administered by the Forest Service or are designated for administration through the Forest Service as a part of the system.



**Need for Change:** Term used to suggest a need for change in management of a National Forest or management area therein. Need for change is determined by evaluating public issues and concerns, and determining the magnitude of difference between existing and desired resource or ecosystem conditions.

**New road construction:** Activity that results in the addition of forest classified or temporary road miles.

**Non-motorized:** Those identified travel routes that do not allow motorized use on them. Non-motorized routes are normally a single (1) tract (12-24" tread) trail that can be used for non-motorized travel (foot, horse, and/or mountain bike).

**Obliteration:** The reclamation and/or restoration of land to resource production from that of a transportation facility. The objective of obliteration is to return the land to as near a natural condition as possible by restoring long-term soil productivity and hydrologic function. (This term has now been replaced with "decommission" as of January 12, 2001 36 CFR 212.1.)

**Off-Highway Vehicle:** A motorized vehicle of any width or size, capable of travelling cross-country over land that has not been modified or constructed in any way for travel. Snowmachines, all terrain vehicles, high clearance four-wheel drive pickups, and trail bikes and motorcycles are all off-highway vehicles.

**Open road:** A classified road that is open to continuous use, except when it may be closed due to seasonal conditions.

**Open Road and Open Motorized Trail Route Density (OROMTRD):** A measure of motorized route density that includes all open roads and motorized trails. Density may be displayed as follows: 1)Density (miles/square mile) for an analysis area (such as a watershed or management prescription area), 2)Density as a percentage of the analysis area in a defined density category (example: 20% >2.0 miles per square mile). OROMTRD was used in calculating indicators of Elk Habitat Effectiveness (EHE), and Elk Vulnerability (EV).

**Oracle database:** Oracle is a computer software program designed to develop intense databases such as road inventories.

**Public Forest Service Roads (PFSR) program:** A Forest Development Road (FDR) that is designated "open to public travel" in accordance with 23 USC 101(a). As the public road authority, the Forest Service may propose Forest Development Roads for PFSR designation as such roads are identified and are determined to be appropriately safe for continuous public access.

**Public roads:** Any road or street under the jurisdiction of and maintained by a public authority and open to public travel (23 U.S. C. 101(a)).

**Realignment**: Investment in construction activity that results in the new location of an existing road or portions thereof. The investment may include decommissioning the abandoned sections of roadway.

**Record of Decision (ROD)**: Document which records the formal decision concerning implementation of a selected alternative from an environmental analysis. This decision document is signed by the Responsible Official for the agency conducting the analysis.

**Restricted road**: A road that is open to recurrent service (closed for a given period of time to meet a management and/or resource need) and is allowed to be closed by seasonal conditions or open only to specific types of vehicles.

**Return to production**: To allow a Forest road or trail to return to a productive capacity (near to natural) either through decommissioning or through physical obliteration. Return to production through decommissioning occurs over very long periods as soil productivity and hydrologic function recover while return to production through obliteration restores hydrologic function and soil productivity immediately through mechanical means. By definition "total soil resource commitment", which is considered to be a loss in soil productivity below 40% of natural, is an effect that is sustained for a minimum of 50 years. Roads and trail that have been obliterated (soil productivity and hydrologic function returned to near natural levels) are not longer considered part of "total soil resource commitment" calculations. Roads and trails that are returned to production through decommissioning, however, are not (by definition) removed from the total soil resource commitment condition for a minimum of 50 years following closure.

**Riparian**: Areas of water influence on vegetation and soils adjacent to water sources such as streams.

**Road**: A motor vehicle travelway over 50 inches wide, unless classified and managed as a trail. A road may be classified, unclassified or temporary (36 CFR 212.1, Jan. 12, 2001).

**Roaded area**: An area that contains any classified, unclassified, or temporary roads.

**Road Decommissioning**: Activities that result in the stabilization and restoration of unneeded roads to a more natural state.

**Road Improvement**: Activity that results in an increase of an existing road's traffic service level, expansion of its capacity, or a change of its original design function.

**Road Maintenance**: The ongoing upkeep of a road necessary to retain or restore the road to the approved road management objective (FSM 7712.3).

**Routine Maintenance**: Work that is planned to be accomplished on a continuing basis, generally annually or more frequently. (FSH 7709.54)

**Road Management Objective (RMO):** Road management objectives establish the intended purpose of an individual road based on management area direction (Forest Plan) and access management objectives. Road management objectives contain design criteria, operation criteria, and maintenance criteria.

**Road Reconstruction:** Activity that results in improvement or realignment of an existing classified road as defined below:

- Road Improvement: Activity that results in an increase of an existing road's traffic service level, expands its capacity, or changes its original design function.
- Road realignment: Activity that results in a new location of an existing road or portions of an existing road and treatment of the old roadway.

**Road Realignment:** Activity that results in a new location of an existing road or portions of an existing road and treatment of the old roadway (36 CFR 212.1).

**Roads Subject to the Highway Safety Act:** National Forest System roads that are open to use by the public for standard passenger cars. This includes roads with access restricted on a seasonal basis and roads closed during extreme weather conditions or for emergencies, but which are otherwise open for general public use.

**Route density:** The average density in terms of miles/square mile of the total of all open travel routes within a selected area.

**RS-2477:** Revised Statute 2477 (1866 Act) allows local Counties and other Public Road Agencies to maintain access over and through routes that had been used historically prior to designation of the National Forest.

**Scenic Byway:** These are formally designated routes of scenic or recreational interest that are selected by a coordinated evaluation by local, State, and Federal agencies.

**Special Use permittee:** An individual or agency who holds a Special Use Permit authorizing occupancy and use of National Forest lands. This includes such activities as grazing domestic livestock, water or power transmission lines, electronic sites, etc.

**Standards and Guidelines:** Requirements and guidance found in a Forest Plan which impose limits or provide direction for natural resource management activities, generally for environmental protection.

**System Road:** See classified road.

**System Trail:** See classified trail.

**Temporary roads:** Roads authorized by contract, permit, lease, other written authorization, or emergency operation not intended to be part of the forest transportation system and not necessary for long-term resource management.

**Total Motorized Access Route Density:** Includes all open and restricted roads and open and restricted trails. See Route Density and OROMTRD for additional information on calculations.

**TRTR fund:** This is a special road and trail fund to be used for maintenance of the transportation system for passenger cars, high clearance vehicles, and trails. It is funded by 10% of the total Forest Receipts.

**Trail:** A general term denoting a way for purposes of travel by foot, stock, or trail vehicles.

**Trail vehicle:** Vehicles designed for trail use, such as bicycles, snowmobiles, trail bikes, trail scooters, and all terrain vehicles.

**Transportation Facility Jurisdiction:** The legal right to control or regulate use of a transportation facility derived from fee title, an easement, an agreement, or other similar method. While jurisdiction requires authority, it does not necessarily reflect ownership.

**Two-wheeled vehicle:** Non-motorized or motorized, off highway vehicles with one wheel in front of the other (typical mountain bike or motorcycle).

**Unclassified roads:** Roads on the National Forest System lands that are not managed as part of the forest transportation system, such as unplanned roads, abandoned travelways, and off-road vehicle tracks that have not been designated and managed as a trail; and those roads that were once under permit or other authorization and were not decommissioned upon the termination of the authorization.

**Unroaded area:** An area that contains no classified, unclassified, or temporary roads

**Watershed Analysis:** Science based analysis regarding the existing condition of watershed ecosystems as well as the impacts of previous, current, and future management activities.

