

## Rangeland Resources

### Introduction

The Monongahela National Forest currently manages 46 grazing allotments comprising approximately 6,000 acres. The average size of an allotment is 140 acres; allotments range in size from 18 to 993 acres. Not all allotments are actively grazed every year. An allotment may intentionally be excluded from grazing due to resource concerns or ongoing repairs to facilities. All grazing on the Forest is seasonal, from May to October. These allotments are offered under competitive bidding, with the highest bidder receiving the grazing permit. Grazing permits are 1 to 10 years in length depending on the type of permit issued.

Grazing allotments on the Monongahela National Forest are unusual in that they offer large, mostly non-forested openings in an otherwise forested setting. They provide livestock owners with a place to graze their livestock during the summer months so that they may use their own lands to produce winter feed for their herds. They also provide visual diversity and vistas in the primarily forested landscape of West Virginia; allow for wildlife viewing; and are popular hunting areas for some game species.

In FY06, the Range Program was restructured so that the Forest Soil Scientist is now also the Forest Range Program Manager. The Assistant Forest Soil Scientist is the Assistant Range Program Manager; however this position is vacant, and currently a successful partnership with the USDA Natural Resource Conservation Service has resulted in a shared employee position. This employee specializes in pasture management and conservation practices in West Virginia. This partnership has existed for 2 years with a commitment to continue into FY11.

### 2010 Program Accomplishments

The following Range Program activities were accomplished in FY 2010:

1. District technicians worked cooperatively with permittees or contractors and:
  - a. Administered **27 fee credit agreements** (27 allotments) worth approximately **\$18,112**,
  - b. Advertised available allotments, awarded high bidders, prepared and processed annual operating instructions for all operable allotments, and
  - c. Conducted compliance checks on allotments.
2. Completed and tracked range bills.
3. Updated the Range INFRA database with year-end reporting information.
4. Conducted program management activities in range, noxious weeds, and rangeland vegetation (work planning, budget tracking and input, accomplishment reporting, and the Annual Monitoring Report).
5. Administered **4,994 acres** to standard (140 percent of target acres).
6. Improved over **1900 acres** of habitat/range condition by mowing brush and noxious weeds in range allotments. Wildlife also provided input to the above allotments for the mowing so as to enhance range allotment habitat for sensitive species such as the golden-winged warbler.

7. Completed a total of 18,000 feet of fencing maintenance and repair projects .

FY 10 Range Accomplishments Forest Wide Summary			
Activity	Fund Code	Acres	Comments
Hazardous Fuels Reduction in Range	NFRG	2,586	
Fertilization and Liming	NFRG and NFVW	157	
Seeding and Planting	NFRG	12	
Range Vegetation Control/Manipulation/Tree Encroachment	NFRG, NFVW, Fee Credits, WRHR	1900	
NNIS Treatment	NFVW	49	
Engineering Staff Assistance	NFRG	N/A	Preformed maintenance on ponds, culverts, and access roads on Cheat-Potomac RD

The 2011 budget was developed. The Range Program Manager worked with the Forest Program Managers and District Rangers to help prioritize where limited funds should best be used across the Forest in order to meet assigned targets. The 2010 targets were monitored and reported to the RO at the end of the FY.

The 2010-2011 NEPA schedule for range was negotiated and developed by the District Rangers. In FY10, the Forest completed an environmental assessment (EA) for 8 allotments in the South Zone of the Forest on the Marlinton District. This EA completes the schedule for NEPA for the allotments in the south zone. The decision for the 2010 EA was delayed at the request of the Regional Office until the first quarter of FY11. This delay resulted in a shift of the NEPA Range schedule and adjustments were made to the MNF Five Year Plan. The North Zone will start surveys in FY11 for the last round of NEPA on the Cheat/Potomac District but completion is not anticipated until FY12.

**Monitoring and Evaluation**

**FOREST PLAN MONITORING ITEMS FOR RANGE RESOURCES**

There are no monitoring questions in the 2006 Forest Plan that are specific to Range Resources. However, there are three required monitoring questions applicable to Range Management that come from the Code of Federal Regulations, as follows:

1. *How close are projected outputs and services to actual?* [from CFR 219.12(k)(1)]
2. *How close are projected costs to actual costs?* [from CFR 219.12(k)(3)]
6. *Are the effects of Forest management, including prescriptions, resulting in significant changes to productivity of the land?* [from CFR 219.12.(k)(2)].

Monitoring results for these items are reported below.

**Monitoring Question 1. How close are projected outputs and services to actual?**

The outputs and services projected in the 2006 Forest Plan (pages II-43 and II-44) are generally captured in the goals stated for Rangeland Resources:

Goal	RA01	Manage grazing allotments to provide open areas for forage, wildlife habitat, visual diversity, and dispersed recreation.
Goal	RA02	Establish grazing capacities based on sound range inventory and analysis processes. Vary forage utilization between allotments based on grazing management systems in use, Management Prescription emphasis, and other factors, such as the dominant forage species.
Goal	RA03	Manage grazing disturbance at levels that support movement toward desired ground cover conditions and maintenance or restoration of inherent soil quality and function.
Goal	RA11	Maintain or improve existing range allotments by: a) Refining or implementing more appropriate grazing systems, b) Applying lime and fertilizer where needed, c) Seeding to improve vegetation quality, and/or d) Selectively controlling undesirable vegetation, such as brush or non-native invasive species.

These goals are primarily achieved through NEPA and allotment planning and implementation. As noted above, in FY10 the Forest worked on NEPA planning and effects analysis for eight range allotments on the South Zone. The decision document for these allotments will be completed in FY11, and the activities, resource mitigation measures, and design features from the NEPA documents will be transferred into allotment management plans for implementation over the next 10-15 years.

The Outputs and Services section of this Monitoring Report shows that, for FY10, the Forest exceeded accomplishment targets for Acres of Grazing Allotments Managed to Standard and Acres of Rangeland Vegetation Improved. Particularly for Acres of Rangeland Improved, the Forest was able to greatly exceed the target due to funding received from the American Recovery and Reinvestment Act of 2009 (ARRA). The Forest was able to identify and implement approximately 1,900 acres that matched ARRA criteria in the allotments for mowing and wood vegetation removal.

Specific livestock-related outputs for FY10 are displayed in Table RA-1.

**Table RA-1. FY 2010 Livestock Outputs on the MNF**

Indicator	2010
Animal Unit Months (AUM) Grazed <sup>1</sup>	4,707
Head Months Grazed <sup>2</sup>	3,724
Permittees	33
Cattle Grazed	963
Horses Grazed	24
Sheep Grazed	0
Total Animals Grazed	987
Active Allotments	45

<sup>1</sup> An animal unit month is the amount of forage required by a 1,000-pound cow, or the equivalent, for one month. For example, a bull eats more than a cow. A mature cow eats more than a yearling.

<sup>2</sup> A head month is the time in months that livestock spend on National Forest System land.

**Monitoring Question 1. Evaluation, Conclusions, and Recommendations**

The numbers shown in Table RA-1 are quite a bit lower than historic levels of grazing, which reflects that the need for allotments on federal land is not as great as in the past, and that the Forest has taken some allotments out of grazing for resource protection and other reasons. However, the table figures also indicate that the Range program is gradually moving toward more stability and equilibrium as livestock numbers and grazing capacities are adjusted to strike a balance between providing social and economic outputs and services while executing the program in a sustainable manner in order to meet a number of resource needs.

**Recommendations:** Continue working to meet Range Resources desired conditions in the revised Forest Plan. Desired conditions describe the goal of having well-maintained and operated allotments and properly functioning ecosystems.

**Figure RA-1. ARRA Funded Shrub Removal in FY10**

**Monitoring Question 2. How close are projected costs to actual costs?**

Costs of management practices, such as those done under fee credit agreements (fence repair, pond restoration, etc.) and those repairs that are done by district staff, volunteers, and regular permittee maintenance are tracked by district technicians. At the Supervisor's Office level, we budget for yearly projects to be done by Forest personnel or contractors, such as herbicide application and brush-hogging. The cost of administering the range program has gone down since 2008, as there is no longer one full-time position dedicated to running the program.

In FY 2010, the Range program received funding through the ARRA to address hazardous fuels buildup in range allotments. These dollars were unexpected but greatly needed. Over the decades, range allotments have been slowly giving way to encroaching vegetation, both native and non-native. The Range program had an identified need of restoring the vegetative condition across all allotments, reducing the buildup of fine fuels defined as hazardous fuels for wildfire, and treating noxious invasive shrubs/weeds and some native shrubs that had invaded the allotments. We have been slowly working toward addressing this need via multiple avenues such as fee credit agreements, small contracts, and district staff work. Also, the allotments were

losing habitat structural characteristics that are needed for many bird species especially neotropical birds that migrate to or through the Forest each year and may nest here. The Forest was able to identify approximately 1,900 acres that matched ARRA criteria in the allotments for mowing and wood vegetation removal.

The anticipated cost of treating all acres designated as part of the range allotments was more than expected because of the specialized equipment needed to clear the woody vegetation and the number of acres that needed treatment. However, the 1,900 acres that were treated were the acres of most value to address interdisciplinary livestock, wildlife, and botany (non-native invasive species control) needs. The accomplishment of this work has greatly improved range allotments and vegetation for livestock and wildlife use.

The ARRA funds were separated out into multiple contracts for the districts and according to the specialized equipment needs for vegetation treatment. A single Appalachian family-owned small business won all six bids and was awarded the contracts. Approximately 90 percent of the work was completed in FY10 and reported in accomplishments for Range, Wildlife, and Hazardous Fuels (Fire) for the Region.

### **Implementation of Fee Credit Agreements**

In FY10, the Forest Supervisor directed Ranger Districts to maximize efforts with permittees to enter into Fee Credit Agreements (FCA). The Range Assistant worked with each District to develop an approach for each allotment and its permittee to establish a viable FCA that would result in improvements to the allotment. The Marlinton District was very successful with this strategy and initially received 100 percent participation by its permittees. The Cheat-Potomac and Greenbrier Districts had some success but some permittees in these parts of the Forest are not local landowners and live outside the region, or they had other reasons for not participating.

One benefit of FCAs is that dollars obtained for the permit are not sent to the National Treasury but rather are directly reinvested into the allotment. Thus, it would appear that FCAs provide a direct boost in project dollars for the Range program. However, the cost of administering FCAs is not accounted for in work plans. FCAs are time-intensive for oversight and inspection. District technicians reported a large increase in time spent in administering oversight for allotments this FY. Seven FCAs did not actually occur, and an additional amount of time was spent on disciplinary letters, rebilling permittees, and collecting funds. It was acknowledged by the Forest that even though FCAs result in on-the-ground improvements in Range, the Forest is short-handed in staff to oversee these agreements from beginning to end. If the strategy to continue to engage permittees in FCAs is to continue, more salary days will need to be provided for administration. However, the Forest will continue to pursue FCAs with permittees that are willing and eager to reinvest in the maintenance and improvement of their permitted allotment.

### **Monitoring Question 2. Evaluation, Conclusions, and Recommendations for Costs**

Prior to this year, there has developed a large backlog of range improvements/facilities that need replacement. Inventories indicate there are an estimated 132 miles of boundary and interior fences on Forest allotments. At the end of FY09, the Forest was able to take advantage of

unobligated regional NFVW funds and purchase \$30,000 worth of fencing material to be utilized across the Forest in range allotments. Multiple types of fencing were purchased with the intent to build according to need and maintain or replace fencing that has deteriorated to the point of making several allotments unusable.

Range staff members have worked with permittees, adjoining land owners, and local small contractors to install an estimated 18,000 feet of new fence line and make multiple repairs elsewhere across the allotments. Labor was provided through fee credit agreements, cost challenge agreements with adjacent private landowners, and other sources. These efforts were just the beginning of upgrading existing fence line and addressing much-needed repairs.

For example, there are 26 corrals on the Forest, so only about half of the allotments have corrals/loading chutes. Many livestock watering facilities, such as ponds or spring developments, are also in need of work. Since FY09, the Range Staff has been planning Engineering Staff time to assist with some of the repairs particularly with ponds and access roads. It is more affordable to conduct this work in-house and provide salary funding on Forest with budget short falls. Additional watering facilities are needed on some allotments but must first be approved through the NEPA process.

The future costs of maintaining these improvements and vegetation treatments exceed projected funding in the Range budget. Unless, a substantial change is made in the distribution of NFRG funds nationally, and the MNF receives greater funding in the years to come, these vegetation improvements will not be sustainable.

In September of FY10, the Range Program Manager and Forest Supervisor met with the Washington Office Range Staff to discuss budgets, eastern range issues, and strategies for how to continue to manage range in the east with limited budget and resources. Ultimately, the Forest and Region sees a need to examine how the Range budget is distributed nationally. From a 34 million dollar budget, less than 1 million dollars are allocated to the East (both Regions 8 and 9). If more funding does not come to the East, the Range program will be in jeopardy of dissolving slowly away as a result of not being able to keep pace with allotment maintenance needs. Lack of maintenance will eventually result in no use. This meeting resulted in the need for a FY11 Washington Office field trip to the Forest planned for the spring of FY11.

**Recommendations:** Continue to prepare environmental analyses for grazing allotments to allow for additional improvements to be made to grazing allotments and to comply with the Rescissions Act of 1995.

Continue to use fee credit agreements as well as Forest Service funds to replace, repair, and/or upgrade range improvements. Place more emphasis on using fee credit agreements to replace fence, to upgrade other failing facilities, and to lime and fertilize pastures. District technicians should continue to encourage, develop, and administer fee credit agreements each year with permittees on their units. The Forest Supervisor gave special direction in FY09 to Range Staff to prepare to undertake as many fee credit agreements in FY10 as possible and this effort had varying degrees of success.

The Forest should request additional funding in range through the out-year budget process and through Congressional requests. The Forest should request from the Regional Office that deferred maintenance funding be provided for range work, in addition to deferred maintenance funding for roads. In cooperation with the Regional Office, the Forest is moving toward a more direct strategy for bringing the needs of Eastern Range Management to the attention of the Washington Office that generates the National budget and distributes regional allocations.

**Figure RA-2. New Fence Constructed in FY10**



**Monitoring Question 6. Are the effects of Forest management, including prescriptions, resulting in significant changes to productivity of the land?**

This item is primarily monitored through on-site allotment visits or inspections. Each year selected allotments are visited/inspected by Forest technicians. In many instances, these visits are done specifically to inspect the allotment and are referred to as compliance checks.

Examples of the questions that the inspectors look to answer during compliance checks include:

- Have range improvements/facilities—such as fences, watering facilities, gates, mineral feeders, and corrals—been maintained by the permittee, and are they functioning properly?
- Has there been vandalism to improvements or facilities?
- Have any livestock escaped the allotment?
- Is the permittee complying with the permit and annual operating instructions regarding number and kind of livestock permitted and season of use?
- If the annual operating plan calls for rotational grazing, are livestock being properly rotated?
- Is the area being overgrazed?
- Are erosion, slides and slumps occurring?
- Are riparian areas being damaged?
- Is woody brush encroachment or non-native invasive species infestation a problem?

Observations are recorded in field notes or inspection reports. If technicians discover problems, they report them to the District Ranger and the District contacts the permittee if immediate action is needed. Problems that require repair to facilities are placed on a list of future improvement work to be accomplished. Depending on such factors as the timing, available funding, and

personnel availability, repair work may be scheduled and accomplished that fiscal year or placed in future year work plans for accomplishment. Work may be done by the permittee through fee credit agreements, by the Forest Service through contracts, or by Forest employees.

Sometimes technicians visit allotments in conjunction with other duties. For example, while Forest Service personnel are on an allotment inspecting a contractor's eradication of non-native brush, they also look at other aspects of the allotment. The entire allotment may not get inspected as it would under a compliance check, but portions of the allotment and its facilities are observed, and problems are noted and reported as needed.

Due to other duties and lack of range funds, not every allotment is visited or inspected every year. However, some allotments are visited more than once in a particular year. Most visits to allotments are done during the grazing season, but some occur before or after the grazing season.

#### **Monitoring Question 6. Evaluation, Conclusions, and Recommendations**

There were no significant effects or changes to land productivity reported from FY10 inspections. A number of minor concerns were noted (NNIS, improvement needs, etc.), and these will be addressed through a combination of operational processes described above. There is still a need in some allotments to address restricting livestock from riparian areas. The South Zone Range EA documented several affected riparian areas in FY10, and it also proposed to move allotment perimeters based on pasture management and riparian concerns. The results should be reflected in the 2011 Monitoring Report.

**Recommendations:** Continue allotment visits/inspections to document conditions of concern and needed repairs as a basis for future work project priorities.

Continue to control noxious weeds, non-native invasive species and brush by cutting/mowing until the use of more effective and longer-lasting control measures such as herbicides is approved through the environmental analysis process.

Work more closely with Wildlife staff to continue to implement methodologies for improving sensitive species habitat that coincides with grazing objectives.

Implement decisions from recent NEPA documents. Continue to build partnerships with entities that are interested in sponsoring conversation practices in openings.

Follow-up on Ours Allotment resource concerns as documented in the 2006 Monitoring Report – and to be addressed in FY 2011 NEPA.

Work in the fall and summer of FY 2011 to GPS and document existing conditions of allotments that are scheduled for the FY 2012 NEPA in the North Zone (Greenbrier RD) of the Forest.