Rangeland Health Standards Assessment

Squaw Lake Allotment #418

and

Fenced Federal Range Allotment #401
Allotment Overview
Squaw Lake #418

Allotment Boundaries and Pastures: See Attached Map

7.5 Minute Topographic Maps: Christmas Lake, Egli Rim, Sheeplick Draw, St. Patrick’s Mountain.

AUMs of Authorized Use: 834

Permitted Season: Spring, 302 Cattle 3/10-6/1

Grazing System: The planned grazing system is a spring grazing period with three pasture rest rotation system. The grazing system has not yet been implemented because of several years of non-use. Adjustments are recommended to fit into the current permittees overall grazing operation. Overall the majority of grazing use has been in the Squaw Lake pasture, although trials of use in the Juniper Canyon and Black Hills pastures were done in 1994-1996. Cattle drifted between the two pastures during these trials.

The Squaw Lake Allotment is located approximately 33 miles north of Paisley, Oregon adjacent Highway 31, on both the east and west sides of the highway. Land status includes 43,269 acres of public land administered by the BLM and 520 acres of private land. Part of the allotment is within the Paisley Desert Wild Horse Management Area (HMA), however no horses have been seen this far west in the HMA for several years. The allotment is currently categorized as an M, Maintain. The rating as of 1983 was based on the following:

Present range condition is satisfactory.
Forage production potential is moderate to high and present production is near normal.
No serious resource use conflicts or controversy occur. Resource concerns include deer winter range in the west portion of the allotment.
Opportunities exist for positive economic returns. Some areas for example Sheep Lake Basin, could be treated to improve production. Additional water developments would allow use of existing forage not fully utilized.
Present management is satisfactory.
Narrative: Management has been by placement of livestock in different portions of the allotment on an annual basis. This has worked fairly well. Also stocking levels have been low. Monitoring of consistently used areas such as Squaw Lake and Sheep Lake, should be initiated.
Allotment Overview
Fenced Federal Range (FFR) Allotment #401

Location: See attached map.

7.5 Minute Topographic Map: Sheeplick Draw

AUMs of Authorized Use: 16

Permitted Season: Spring, 26 cattle 3/1-4/30
Grazing System: The grazing system on this allotment is spring use every year.

The FFR Allotment is located approximately 33 miles north of Paisley, Oregon is the Summer Lake Valley.
Acreage within the allotment includes 160 acres of public land and 520 acres of private land. The allotment is categorized as C, Custodial, based on the 1982 rating form summarized as follows.

Range condition is not satisfactory.

Forage production potential is low and present production is near potential. High pH limits potential.

No serious resource use conflicts or controversy exist.

No opportunity exists for positive economic returns.

Present management is satisfactory or is the only logical practice.
**STANDARD 1 - Upland Watershed** - Upland soils exhibit infiltration and permeability rates, moisture storage, and stability that are appropriate to soil, climate, and landform.

The standard is met overall on the #418 and #401 Allotments.

Indicators used to evaluate this standard are Soil Surface Factor (SSF) which documents erosion class and soil susceptibility to accelerated erosion; plant community composition which indicates the root capacity of the soil profile; grazing management, and existing vegetation monitoring (forage utilization studies). Please refer to the attached maps and site writeup forms from the Ecological Site Inventory (ESI) for North Lake County. This data is preliminary, may be edited and is used for estimation purposes only.

Overall the Squaw Lake Allotment is meeting the standard and is functioning properly as indicated by the amount and distribution of ground cover, observations from the ESI including SSF and existing upland forage utilization surveys.

The majority of the allotment (45%) has an SSF rating of moderate, 38% of the allotment has SSF rating of stable or slight, and 2% of the allotment has an SSF rating of severe. 15% of the allotment is not rated and represents vegetative communities to small to be mapped, transition zones and rock outcrops.

The recommended grazing system in the Lakeview Grazing EIS is rest rotation. The system has basically been followed through several years of non-use. Overall grazing management is maintaining a healthy perennial vegetative cover which assists in properly functioning soil properties. However Squaw Lake has been a concentration area for livestock. Rest is recommended for the Squaw Lake pasture for 2003.

Part of the Squaw Lake pasture burned during the summer of 2002. Vegetative cover is reduced in this area and two years growing seasons rest will be recommended in the Tool Box Complex Emergency Stabilization and Rehabilitation (ESR) plan. Other recommendations in the ESR plan are to seed catlins for soil stabilization and to provide vegetative competition with medusahead rye which is present in the area.

Overall the standard is met on the FFR Allotment #401. The area is low elevation in a closed basin, with high salinity and very low vegetative cover of perennial species. Grazing is not impacting the allotments ability to meet the standard. The public acreage within the FFR allotment is small and has been managed as a custodial allotment. This parcel is recommended for disposal pending completion of the Lakeview Resource Management Plan/ EIS.
STANDARD 2 - Riparian/Wetland-Riparian-wetland areas are in properly functioning physical condition appropriate to soil, climate, and landform.

This standard does not apply to the Squaw Lake Allotment or the FFR Allotment because there are no perennial streams or wetlands on the area.

STANDARD 3 - Ecological Processes-Healthy, productive, and diverse plant and animal populations and communities appropriate to soil, climate, and landform are supported by ecological processes of nutrient cycling, energy flow, and hydrologic cycle.

Indicators used to evaluate this standard include vegetative composition, presence of weeds, ecological status, OAT, current plant composition as compared to a defined Potential Natural Community (PNC) for the soil type and precipitation zone. SSF, OAT, Range Site, Seral Stage and PNC are from the North Lake ESI inventory. Concerns in the Squaw Lake Allotment include a population of medusahead rye. Mediterranean sage is nearby the allotment and is being treated and monitored. A dozer line bladed as a fire break on the Toolbox fire will be monitored for weed invasion.

The largest vegetative component in the Squaw Lake Allotment #418 is low sagebrush, bluebunch wheatgrass, Sandberg's bluegrass shown as MUN 179C on the attached maps. Presently bluebunch wheatgrass is reduced in much of the area as indicated by seral stage in early or mid for this map unit. Please refer to Table 1 for the overall status of the allotment for seral stage determined by ESI. A wide variety of other range sites and vegetative communities are found on the allotment as shown on the ESI Range Site Map and described on the site writeup forms. A review of the range monitoring data (photos, trend transects, climate, field observations, OAT) and professional judgement indicate the majority of the allotment is meeting this standard.

<table>
<thead>
<tr>
<th>Seral Stage</th>
<th>Percentage Comparability to Potential Natural Community</th>
<th>% of Allotment</th>
</tr>
</thead>
<tbody>
<tr>
<td>Early</td>
<td>0-25%</td>
<td>1%</td>
</tr>
<tr>
<td>Mid</td>
<td>26-50%</td>
<td>24%</td>
</tr>
<tr>
<td>Late</td>
<td>51-75%</td>
<td>35%</td>
</tr>
<tr>
<td>PNC</td>
<td>76-100%</td>
<td>15%</td>
</tr>
<tr>
<td>*Unknown</td>
<td></td>
<td>25%</td>
</tr>
</tbody>
</table>

* Unknown areas include transition zones, vegetative communities to small to be mapped and areas without data.

The main vegetative component on the FFR Allotment is greasewood with little perennial understory vegetation and some cheatgrass invasion.
Overall the standard is being met on the Squaw Lake Allotment and the FFR Allotment. The areas not meeting the standard on the 418 Allotment are located in the Squaw Lake pasture represented by Map Unit Number (MUN) portions of 179C and B680, and in the Black Hills represented by MUN 916B, 072, 047, 539A, and 624C. The presence of cheatgrass and increase in juniper contribute to the downward trend in areas not meeting the standard. Grazing is impacting approximately 5% of the allotment not meeting the standard in the Squaw Lake Allotment, and is only contributing to not meeting the standard in the Squaw Lake pasture. Recommendations to improve livestock grazing are to fence the burned portion of the Toolbox Fire and rest this area for a minimum of two growing seasons. The fence should remain in place to assist in improving livestock distribution. The entire Squaw Lake pasture should be rested for one full year and then a deferred or rest rotation system should be implemented. A change of season to fall use would be beneficial to enhance the ability of the area to meet this standard.

STANDARD 4 - Water Quality Standards- Surface water and groundwater quality, influenced by agency actions, complies with State water quality standards.

This standard is not applicable to the Squaw Lake or FFR Allotments. These allotments are not within areas that would be guided by State water quality standards.

STANDARD 5 - Biological Diversity-Habitats support healthy, productive, and diverse populations and communities of native plants and animals (including special status species and species of local importance) appropriate to soil, climate, and landform.

This standard is being met on the Squaw Lake #418 and FFR #401 Allotments. Overall the allotments support a diverse population of plant and animal species.

No special status species are known to occur on the #401 Allotment. The small acreage under federal ownership in this allotment is likely to support a variety of small mammals, birds, and reptiles common to south central Oregon.

Two BLM Bureau Sensitive plants occur in the Black Hills, an area which has been proposed in the new RMP as an ACEC/RNA which is within the Squaw Lake Allotment #418. The plants that occur there are *Eriogonum cusickii* (Cusick's buckwheat) and *Cymopteris nivalis* (snowline cymopteris); and a Conservation Agreement is being written with the Burns BLM District, Lakeview Resource Area and US Fish and Wildlife Service for conservation of the two species. Cusick’s buckwheat has a very limited range in Oregon and only occurs on ash soils around the Fork Rock Basin and on the upland area west of Burns. Snowline cymopteris is much more widely distributed in Montana and Idaho; however, in Oregon it only occurs in Lake, Harney and Grant Counties. At present livestock grazing does not appear to have a negative effect on the two plant species at the Black Hills; however, the area has not been used extensively in the last ten years. The plants will continue to be monitored on an annual basis and effects will be recorded, especially with possible changes in grazing time tables.

Special status wildlife species or their habitats that are present within the Squaw Lake Allotment include
peregrinus), burrowing owl (Speotyto cunicularia), and pygmy rabbit (Brachylagus idahoensis). There are also two species with high public interest. These are sage-grouse (Centrocercus urophasianus) and mule deer (Odocoileus hemionus).

No nesting habitat exists within this allotment for the peregrine falcon or bald eagle. It is suspected that they are occasional visitors to the area. There are no good foraging areas within the allotment for peregrine falcons. Bald eagle foraging does occur within the allotment, however it is probably restricted mostly to road killed deer adjacent to the major roadways and occasional carrion scattered through the allotment. There are no resource conflicts for peregrine falcons or bald eagles.

Habitat is present for ferruginous hawk, burrowing owl and pygmy rabbits, but locations for these species are not known. No specific inventories have been conducted to date for these species within these allotments, however there are sightings within the surrounding area and they are suspected to occur within the allotments. There are no resource conflicts for these species.

The western third of this allotment is within mule deer winter range. No conflicts exist between mule deer and cattle grazing within this allotment at this time. If fall grazing is allowed, pastures with bitterbrush should only be grazed one out of every three years. Grazing use on bitterbrush would not exceed 15% on two of the three years and would not exceed the current years production on the third year. In addition, watering sites would be kept away from bitterbrush areas to reduce bitterbrush use by cattle as well. Intensive monitoring of bitterbrush use is recommended to determine if this standard can be met.

There are two known sage-grouse lek sites within this allotment. Western juniper has expanded its range in the southern portion of the allotment as well as along several of the rocky rims throughout the area. This is having small impacts to sage grouse now, but could have long term impacts if current trends continue. Approximately 8% (2,900 acres) of habitats within the allotment are considered non-suitable for sage-grouse. This is primarily due to expansion of western juniper, areas of salt desert shrub and natural rock formations like the black hills. Of the remaining 92% of the allotment, 27% (1,200 acres) meets the definition of suitable for nesting habitat, 60% (26,500 acres) meeting the definition of suitable for brood rearing habitat, and 5% (2,200 acres) meets the definition of suitable for winter habitats. No major conflicts exist between cattle grazing and sage-grouse within this allotment at this time.

Overall, this standard is being met for wildlife species within these allotments. Past use from grazing, control of wildland fire and invasion of exotic plants has made a few portions of these allotments unuseable for some species of wildlife. Some areas could benefit from removal of western juniper and/or prescribed fire.
Current Management and Recent Management Changes

This area is managed for livestock grazing, wildlife and wild horses and is monitored for noxious weed invasions. Recent fires in 2002 will require more intensive monitoring and possibly treatment for weed invasions. A fire protection fence is recommended for the area burned in the Toolbox fire. Two growing seasons rest is recommended within the burned area. The Fire protection fence should remain in place to assist in improvement of cattle distribution. One year of rest is recommended in the Squaw Lake pasture, followed by grazing management providing more spring/summer rest to this pasture. Juniper treatment should enhance the areas ability to meet many of the standards. Team members suggest the federal land within the 401 be considered for disposal.

Team Members

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<thead>
<tr>
<th>Name</th>
<th>Title</th>
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<tbody>
<tr>
<td>Theresa Romasko</td>
<td>Rangeland Management Specialist (RMS)</td>
</tr>
<tr>
<td>Todd Forbes</td>
<td>Wildlife Biologist</td>
</tr>
<tr>
<td>Lucile Housley</td>
<td>Botanist</td>
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<tr>
<td>Erin McConnell</td>
<td>Natural Resource Specialist (NRS) Noxious Weeds</td>
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<td>Robert Hopper</td>
<td>Supervisory RMS</td>
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<tr>
<td>Ken Kestner</td>
<td>Supervisory NRS</td>
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Determination

(✓) Existing grazing management practices or levels of grazing use on the Squaw Lake and FFR Allotments promote achievement of significant progress towards the Oregon Standards and Guidelines for Rangeland Health and conform with the Guidelines for Livestock Grazing Management.

() Existing grazing management practices or levels of grazing use on the Squaw Lake and FFR Allotments will require modification or change prior to the next grazing season to promote achievement of the Oregon Standards and Guidelines for Rangeland Health and conform with the Guidelines for Livestock Grazing Management.

Acting Manager, Lakeview Resource Area

Date

7/27/11
ESI Seral Stage
FFR Allotment #401

Allotment Boundary

- Early
- Mid

115A

0.5 0 0.5 1 Miles

N

W E S N
Land Status
Squaw Lake Allotment #418
Oat Down
Squaw Lake Allotment #418
ESI Seral Stage
Squaw Lake Allotment #418

Allotment Boundary
Seral Stage
- Early
- Late
- Mid
- PNC
Ownership
- BLM
- PV
- ST

grey = no rating