## RANGE ANALYSIS

Requirements to perform analysis of rangeland suitability are found in NFMA at 16 U.S.C. 1604(g)(2)(A) and 36 CFR219.20. FSM 1905 contains a definition of "Lands Suitable for Grazing and Browsing" as lands with vegetation that can be used by grazing animals, both domestic and wild herbivores, without damage to the soil and water values.

The Code of Federal Regulations (CFR) contains several provisions dealing with rangeland capability and suitability. Specifically, 36 CFR 219.3 provides definitions as follows:

- Capability: The potential of an area of land to produce resources, supply goods and services, and allow resource uses under an assumed set of management practices and at a given level of management intensity. Capability depends on current conditions and site conditions such as climate, slope, landform, soils, and geology, as well as the application of management practices, such as silviculture, or protection from fire, insects and disease.
- Suitability: The appropriateness of applying certain resource management practices to a particular area of land, as determined by an analysis of the economic and environmental consequences and the alternative uses foregone. A unit of land may be suitable for a variety of individual or combined management practices.

The 36 CFR 219.20 contains the following direction about grazing resources in Forest planning:

- In Forest planning, suitability and potential capability of NFS lands for producing forage for grazing animals and for providing habitat for indicator species shall be determined as provided in paragraphs (a) and (b) of this section. Lands so identified shall be managed in accordance with direction established in Forest plans.
- (a) Lands suitable for grazing and browsing shall be identified and their condition and trend shall be determined. The present and potential supply of forage for livestock, wild and free roaming horses and burros, and the capability of these lands to produce suitable food and cover for selected wildlife species shall be estimated. The use of forage by grazing and browsing animals will be estimated. Lands in less than satisfactory condition shall be identified and appropriate action planned for their restoration.
- (b) Alternative range management prescriptions shall consider grazing systems and the facilities necessary to implement them; land treatment and vegetation manipulation practices; evaluation of past problems; possible conflict or beneficial interactions among livestock, wild free-roaming horses and burros and wild animal populations, and methods of regulating these; direction for rehabilitation of ranges in unsatisfactory condition; and comparative cost efficiency of the prescriptions.

The process used for determining rangeland capability and suitability is outlined in the Region 2 desk guide "Rangeland Suitability for Livestock Grazing at the Forest Plan Level and Standards for NEPA display

Capability and suitability were determined through the use of Geographic Information Systems (GIS) technology. Based on the nature of GIS, acreage for each feature considered not capable or unsuitable is systematically eliminated from the suitable base one layer at a time. Overlapping features are subtracted only once to prevent double counting of acres. As an example, on a heavily forested developed recreation site, if the site is entirely forested, all the acres are eliminated at the dense forest canopy layer, once subtracted those same acres are no longer available to be subtracted at subsequent levels (i.e. under the developed recreation site layer). This explains why the acreage deducted in Table B-24 and Table B-25 for a specific feature may be somewhat less than the total acres for that feature.

***Rangeland capability***

Capable rangelands are those lands that are accessible to livestock, produce forage, or have inherent forage producing capability, and can be grazed on a sustained basis.

To determine acres capable of supporting livestock, land was systematically eliminated from the gross National Forest System (NFS) lands in the following order.

**Table B-43**
Acres of land Capable of Livestock Use.

| | Acres by classification | Running total after deductions |
|---|---|---|
| Total White River National Forest | 2,481,950 | 2,481,950 |
| Private land | 195,510 | 2,286,440 |
| **Non-vegetated** | | |
| Barren, erosive, low forage production | 250,816 | 2,049,575 |
| Lakes, reservoirs, ponds, and major rivers | 11,901 | 2,023,723 |
| Perennial Streams | 1,910 | 2,021,813 |
| Roads | 4,199 | 2,017,614 |
| Inaccessible areas | | |
| Slopes greater than 60% (inaccessible to sheep) | 158,971 | 1,858,643 |
| Slopes between 41% and 60% (Inaccessible to cattle) | 371,843 | 1,486,800 |
| **Total acres capable of supporting sheep** | **1,858,643** | |
| **Total acres capable of supporting cattle** | **1,486,800** | |

Rangeland capability does not vary by alternative.

***Rangeland Suitability***

Suitability is the appropriateness of applying certain resource management practices to a particular area of land, as determined by an analysis of the economic and environmental consequences and the alternative uses foregone. A unit of land may be suitable for a variety of individual or combined management practices.

***Environmental Suitability***

The suitability analysis is presented in two parts: current suitability and suitability by Forest Plan alternative.

To determine acres present environmentally suitable for livestock grazing, land was systematically eliminated from the net National Forest System Lands using GIS technology as shown in Tables B-25a and B-25b.

**Table B-44**
**Acres Currently Suitable for Cattle Use**

| Classification/Description | Acres Deducted | Running Totals |
|---|---|---|
| Net National Forest System Acres | | 2,286,440 |
| Deductions for other than Capable Acres | 799,637 | 1,486,803 |
| Deductions for other than Suitable Acres | | |
| Existing Canopy> 70% | 381,784 | 1,105,019 |
| Excluded recreation sites | 1154 | 1,103,865 |
| Railroad ROW – excluded from grazing | 0 | 1,103,865 |
| Areas not within allotments or areas closed to grazing by decision | 142,734 | 961,131 |
| Road ROW – excluded from grazing | 290 | 960,841 |
| TES habitat permanently excluded from grazing | 0 | 960,841 |
| **Currently Suitable Acres (cattle)** | | **960,841** |

**Table B-45**
**Acres Currently Suitable for Sheep Use**

| Classification/Description | Acres Deducted | Running Totals |
|---|---|---|
| Net National Forest System Acres | | 2,286,440 |
| Deductions for other than Capable Acres | 427,796 | 1,858,644 |
| Deductions for other than Suitable Acres | | |
| Existing Canopy> 70% | 474,796 | 1,383,848 |
| Excluded recreation sites | 1204 | 1,382,644 |
| Railroad ROW – excluded from grazing | 0 | 1,382,644 |
| Areas not within allotments or areas closed to grazing by decision | 215,068 | 1,167,261 |
| Road ROW – excluded from grazing | 315 | 1,167,261 |
| TES habitat permanently excluded from grazing | 0 | 1,167,261 |
| **Currently Suitable Acres (sheep)** | | **1,167,261** |

*Note: No TES habitat excluding grazing has been identified on the WRNF. Administrative, mineral production, and special use sites, fenced cultural properties and permanent exclosures that have been administratively excluded to grazing are not mapped in the GIS system. Review of known information indicates insignificant acres exist within these categories that have not already been subtracted during the GIS suitability determination.*

### Suitability by alternative

Livestock grazing has been identified as an appropriate activity in all management areas with the exception of RNAs. Grazing is not appropriate in these management areas as it conflicts with the purpose for which the areas were established. Acres suitable for grazing vary by alternative, based on the allocation of proposed RNAs. Acres removed from those lands considered suitable for domestic livestock grazing due to allocation to RNA's are shown in Tables B-46 and Table B-47.

Bighorn Sheep Habitat (M.A. 5.42) is prohibited domestic sheep grazing unless adequate temporal or spatial separation can be demonstrated. If temporal or special separation can occur domestic sheep grazing is allowed. This analysis of temporal or special separation is conducted on a case by case based at the site-specific level.

### Vacant Allotment Analysis

There are 51 vacant allotments on the White River National Forest. Information collected on these allotments, includes:

- Acres suitable of supporting livestock
- Kind of livestock the allotment is suited for
- Accessibility
- Past stocking levels and last year of recorded use
- Adjacency to existing active allotments
- Value to aid in future management flexibility
- Demand for grazing in that area.
- Present level of recreational use
- Range improvement needs
- Potential conflicts with adjacent landowners
- Presence of threatened and endangered species
- Presence of bighorn sheep, and Colorado Cutthroat Trout
- If the allotment is in areas recommended for wilderness, RNAs, wild and scenic rivers, or special interest areas.

**Table B-46**
**Vacant Allotment Information Part 1**

| District | Allotment Name | Kind of Livestock | Past Stocking CM / SM | Last Year Recorded Use | Year AMP Scheduled | Could Converted to Different Kind of Livestock | Suitable Acres | Access to Allot. Yes, No or Limited | Needs Improvements | Could be added to adjacent Allotment |
|---|---|---|---|---|---|---|---|---|---|---|
| **ASPEN** | Brush/E. Snowmass | S&G | 3116 | 1994 | 2004 | NO | 7957 | LIMITED | NO | NO |
| | Grizzly/Tabor | S&G | 2250 | 1990 | 2004 | NO | 8030 | YES | NO | NO |
| | Hunter/Midway | S&G | 1380 | 1966 | 2004 | NO | 12902 | LIMITED | NO | YES |
| | Independence | S&G | 1228 | 1964 | 2004 | NO | 3408 | YES | NO | NO |
| | No Name | S&G | unknown | unknown | 2004 | NO | 8321 | LIMITED | NO | YES |
| | Richmond/Difficult | S&G | 2125 | 1978 | 2004 | NO | 10669 | LIMITED | NO | NO |
| | Conundrum | C&H | unknown | unknown | 2004 | NO | 2762 | NO | NO | NO |
| | Red Mountain | C&H | 216 | 1979 | 2004 | NO | 5544 | NO | NO | YES |
| | Woody Creek | C&H | 378 | 1980 | 2004 | YES | 1516 | YES | NO | YES |
| **BLANCO** | Park Creek | S&G | 1875 | 1983 | 2001 | NO | 17358 | LIMITED | NO | YES |
| **DILLON** | Argentine | S&G | 2430 | 1973 | 2010 | NO | 14785 | YES | YES | NO |
| | Baldy | S&G | 2032 | 1972 | 2010 | NO | 5873 | YES | NO | YES |
| | Buffalo Mountain | S&G | 2509 | 1968 | 2010 | NO | 7637 | YES | NO | NO |
| | Copper Mountain | S&G | 2383 | 1977 | 2010 | NO | 4793 | NO | NO | NO |
| | Corral | S&G | 2133 | 1977 | 2010 | NO | 3010 | YES | NO | YES |
| | Officer's Gulch | S&G | 2133 | 1968 | 2010 | NO | 4773 | YES | NO | NO |
| | Ptarmigan | S&G | unknown | unknown | 2010 | NO | 7358 | YES | NO | NO |
| | Searl | S&G | unk | 1992 | 2010 | NO | 3922 | YES | NO | YES |
| | Acorn | C&H | 400 | 1991 | 2010 | yes | 3013 | LIMITED | YES | YES |
| | Black Creek | C&H | 782 | 1992 | 2010 | NO | 5965 | YES | YES | NO |
| | Boulder Creek | C&H | 262 | 1991 | 2010 | NO | 4209 | LIMITED | YES | YES |

| District | Allotment Name | Kind of Livestock | Past Stocking CM / SM | Last Year Recorded Use | Year AMP Scheduled | Could Converted to Different Kind of Livestock | Suitable Acres | Access to Allot. Yes, No or Limited | Needs Improvements | Could be added to adjacent Allotment |
|---|---|---|---|---|---|---|---|---|---|---|
| **DILLON** | Maryland Creek | C&H | 205 | 1991 | 2010 | NO | 1687 | LIMITED | YES | YES |
| | MC | C&H | 79 | unknown | 2010 | NO | 188 | LIMITED | YES | NO |
| | Pioneer | C&H | 660 | 1987 | 2010 | YES | 5376 | YES | YES | NO |
| | Soda Creek | C&H | 447 | 1975 | 2010 | YES | 3451 | YES | YES | NO |
| | Tenderfoot | C&H | 360 | 1984 | 2010 | NO | 3254 | YES | YES | NO |
| | Willow Cr. | C&H | unknown | unknown | 2010 | NO | 4247 | YES | YES | NO |
| **EAGLE** | East Lake Creek | S&G | 45 | 1978 | 2010 | NO | 10705 | LIMITED | YES | NO |
| | North W Mountain | S&G | 2039 | 1979 | 2001 | NO | 2848 | LIMITED | YES | YES |
| | South W Mountain | S&G | 1600 | 1979 | 2001 | NO | 3319 | LIMITED | YES | YES |
| | Squaw Creek | C&H | 150 | 1985 | 2010 | NO | 2436 | LIMITED | YES | YES |
| | Sweetwater | C&H | 630 | 1987 | 2001 | YES | 10363 | YES | YES | YES |
| **HOLY CROSS** | Homestake | S&G | 1983 | 1973 | 2010 | YES | 22502 | YES | YES | NO |
| | Spring Creek | S&G | 63 | 1988 | 2004 | YES | 2219 | YES | YES | YES |
| | Tennessee Pass | S&G | 1350 | 1980 | 2007 | NO | 5630 | YES | YES | YES |
| | Beaver Creek | C&H | 1500 | 1981 | 2010 | YES | 9439 | LIMITED | YES | NO |
| | Berry Creek | C&H | 63 | 1988 | 2004 | YES | 2275 | YES | YES | YES |
| | Lake Creek | C&H | 135 | 1978 | 2010 | NO | 1336 | LIMITED | YES | NO |
| | Northside | C&H | 387 | 1988 | 2004 | YES | 3786 | YES | YES | YES |

| District | Allotment Name | Kind of Livestock | Past Stocking CM / SM | Last Year Recorded Use | Year AMP Scheduled | Could Converted to Different Kind of Livestock | Suitable Acres | Access to Allot. Yes, No or Limited | Needs Improvements | Could be added to adjacent Allotment |
|---|---|---|---|---|---|---|---|---|---|---|
| **RIFLE** | Blue Lake | S&G | 2916 | 1981 | 2001 | NO | 5158 | YES | YES | YES |
| | Dolan | S&G | 1200 | 1998 | 2001 | NO | 2477 | YES | YES | YES |
| | Transfer | S&G | 1200 | 1998 | 2001 | NO | 2918 | YES | YES | YES |
| | Grizzly Creek | C&H | 352 | 1987 | 2001 | YES | 2631 | YES | NO | YES |
| | Horsethief | C&H | unknown | 1950 | 2007 | NO | 1497 | YES | NO | NO |
| | No Name | C&H | 1064 | 1987 | 2001 | YES | | YES | YES | YES |
| **SOPRIS** | Ivanhoe | S&G | 2250 | 1981 | 2004 | NO | 9944 | YES | NO | YES |
| | Last Chance | S&G | 2250 | 1981 | 2004 | NO | 6219 | YES | YES | YES |
| | Upper Crystal | S&G | 2550 | 1981 | 1999 | YES | 4962 | YES | NO | YES |
| | Gal.Ras.Uhl | S&G | 2000 | unknown | 1999 | NO | 8944 | YES | NO | YES |
| | Fryingpan | C&H | 770 | 1989 | 2004 | YES | 10703 | YES | NO | NO |
| | Wheatley | C&H | 205 | 1979 | 2004 | NO | 1162 | NO | NO | NO |

**Table B-47**
**Vacant Allotment Information Part 2**

| District | Allotment Name | Value to aid Mgmt. Flexibility | RNA's by Alt. | Conflicting Special Interest Area | Wilderness Recommended by Alt. | Big Horn Recommended by Alt. | Recreation Use Low/Mod/High | Potential For Landowner Conflict | TES Conflict | Expressed Interest |
|---|---|---|---|---|---|---|---|---|---|---|
| **ASPEN** | Brush/E. Snowmass | NO | NO | NO | NO | C, D, E, F, I, K | HIGH | YES | NO | NO |
| | Grizzly/Tabor | NO | NO | NO | NO | NO | HIGH | NO | NO | NO |
| | Hunter/Midway | YES | NO | NO | NO | NO | MODERATE | YES | NO | NO |
| | Independence | NO | NO | E | NO | NO | HIGH | NO | NO | NO |
| | No Name | YES | C, D, F, I | NO | C, I | NO | MODERATE | YES | NO | NO |
| | Richmond/Difficult | NO | D, I | NO | NO | NO | HIGH | YES | NO | NO |
| | Conundrum | NO | NO | NO | NO | (High) CATTLE | HIGH | YES | NO | NO |
| | Red Mountain | YES | NO | NO | NO | NO | HIGH | YES | NO | NO |
| | Woody Creek | YES | NO | NO | D | NO | HIGH | YES | NO | NO |
| **BLANCO** | Park Creek | NO | E, ? | YES | N/A | (Medium) CLOSE | LOW | NO | NO | NO |
| **DILLON** | Argentine | YES | NO | NO | NO | NO | LOW/HIGH | YES | NO | YES |
| | Baldy | NO | NO | NO | NO | NO | MODERATE | YES | NO | NO |
| | Buffalo Mountain | NO | NO | NO | NO | (High) DON'T FILL | LOW | NO | NO | NO |
| | Copper Mountain | NO | NO | NO | NO | NO | HIGH | YES | NO | NO |
| | Corral | YES | NO | NO | NO | NO | MODERATE | NO | NO | YES |
| | Officer's Gulch | NO | NO | NO | NO | (High) DON'T FILL | /MODERATE | NO | NO | NO |
| | Ptarmigan | NO | C, D, I | C, D, E, F | NO | NO | LOW | YES | NO | NO |
| | Searl | YES | NO | NO | NO | NO | MODERATE | NO | NO | YES |
| | Acorn | YES | NO | NO | C, I | NO | MODERATE | YES | NO | YES |

| District | Allotment Name | Value to aid Mgmt. Flexibility | RNA's by Alt. | Conflicting Special Interest Area | Wilderness Recommended by Alt. | Big Horn Recommended by Alt. | Recreation Use Low/Mod/High | Potential For Landowner Conflict | TES Conflict | Expressed Interest |
|---|---|---|---|---|---|---|---|---|---|---|
| **DILLON** | Black Creek | NO | C, D, E, F, I | NO | C, I | (High) CONSULT | MODERATE | YES | NO | YES |
| | Boulder Creek | NO | NO | NO | NO | (High) CONSULT | MODERATE | YES | NO | NO |
| | Maryland Creek | NO | NO | NO | NO | (High) CONSULT | MODERATE | YES | NO | NO |
| | MC | NO | NO | NO | NO | NO | LOW | YES | NO | NO |
| | Pioneer | YES | NO | NO | NO | NO | MODERATE | YES | NO | NO |
| | Soda Creek | NO | NO | NO | NO | NO | LOW/HIGH | YES | NO | NO |
| | Tenderfoot | NO | C, D, I | NO | NO | NO | HIGH | YES | NO | NO |
| | Willow Cr. | NO | NO | NO | NO | (H) CONSULT | LOW | YES | NO | NO |
| **EAGLE** | East Lake Creek | NO | I | NO | I | future transplant | MODERATE | YES | NO | NO |
| | North W Mountain | NO | I | NO | NO | (Low)DON'T FILL | LOW | NO | NO | NO |
| | South W Mountain | NO | I | NO | C, D | (Low)DON'T FILL | LOW | NO | NO | NO |
| | Squaw Creek | YES | NO | NO | NO | NO | LOW | YES | NO | NO |
| | Sweetwater | YES | NO | NO | NO | (Low)DON'T FILL | MODERATE | YES | NO | YES |
| **HOLY CROSS** | Homestake | NO | NO | NO | I | future transplant | HIGH | YES | NO | YES |
| | Spring Creek | YES | NO | NO | NO | NO | MODERATE | YES | NO | YES |
| | Tennessee Pass | YES | NO | NO | I | future transplant | LOW | NO | NO | YES |
| | Beaver Creek | NO | I | NO | I | future transplant | MOD./HIGH | YES | NO | NO |
| | Berry Creek | YES | NO | NO | NO | NO | MODERATE | YES | NO | YES |

| District | Allotment Name | Value to aid Mgmt. Flexibility | RNA's by Alt. | Conflicting Special Interest Area | Wilderness Recommended by Alt. | Big Horn Recommended by Alt. | Recreation Use Low/Mod/High | Potential For Landowner Conflict | TES Conflict | Expressed Interest |
|---|---|---|---|---|---|---|---|---|---|---|
| **HOLY CROSS** | Lake Creek | NO | NO | NO | I | NO | LOW | YES | NO | NO |
| | Northside | YES | NO | NO | NO | NO | LOW | NO | NO | YES |
| **RIFLE** | Blue Lake | YES | NO | NO | NO | NO | LOW | NO | NO | YES |
| | Dolan | YES | NO | C, D | NO | NO | LOW | NO | NO | YES |
| | Transfer | YES | NO | C,D | NO | (Low) FILL | MODERATE | YES | NO | YES |
| | Grizzly Creek | YES | NO | NO | NO | (Low) NO SHEEP | LOW | NO | NO | YES |
| | Horsethief | NO | C, D, E, F, I | NO | NO | (High) NO SHEEP | LOW | NO | NO | NO |
| | No Name | YES | NO | NO | NO | (Low) FILL | LOW | NO | NO | YES |
| **SOPRIS** | Ivanhoe | YES | NO | C | I | NO | MODERATE | NO | NO | NO |
| | Last Chance | YES | NO | NO | I | NO | MODERATE | NO | NO | NO |
| | Upper Crystal | YES | C, D, E, F, I | NO | NO | (High) KEEP ACCESS | LOW | YES | NO | YES |
| | Gal.Ras.Uhl | YES | NO | NO | NO | NO | MODERATE | NO | NO | YES |
| | Fryingpan | YES | NO | NO | NO | NO | LOW | NO | NO | NO |
| | Wheatley | NO | NO | NO | E, I | NO | LOW | YES | NO | NO |

Based on the analysis of the information collected for each vacant allotment, the results of public scoping, and the emphasis of each Forest Plan alternative under consideration, recommendations were developed by Alternative as to which allotments should be retained as vacant until a site-specific can be completed, which allotments should be partially retained, and which allotments should be permanently closed to domestic livestock grazing. Once closed, these areas would be removed from the suitable land base.

**Table B-48**
**Vacant Allotment Recommendations by Alternatives**

| *District* | *Allotment Name* | *Alternatives* | | | | | | |
|---|---|---|---|---|---|---|---|---|
| | | ***B*** | ***C*** | ***D*** | ***E*** | ***F*** | ***I*** | ***K*** |
| ***ASPEN*** | Brush/E. Snowmass | Retain | Close | Close | Close | Retain | Close | Close |
| | Grizzly/Tabor | Retain | Close | Close | Close | Retain | Close | Close |
| | Hunter/Midway | Retain | Retain | Retain | Close | Retain | Close | Retain |
| | Independence | Retain | Close | Close | Close | Close | Close | Close |
| | No Name | Retain | Close portion | Close portion | Retain | Close portion | Close | Close portion |
| | Richmond/Difficult | Retain | Close | Close | Close | Retain | Close | Close |
| | Conundrum | Retain | Close | Close | Close | Close | Close | Close |
| | Red Mountain | Retain | Retain | Retain | Retain | Retain | Close | Retain |
| | Woody Creek | Retain | Retain | Retain | Retain | Retain | Retain | Retain |
| ***BLANCO*** | Park Creek | Retain | Close | Close | Close | Close Portion | Close | Close |
| ***DILLON*** | Argentine | Retain | Close | Close portion | Close | Close Portion | Close | Close portion |
| | Baldy | Retain | Close | Close | Close | Close | Close | Close |
| | Buffalo Mountain | Retain | Close | Close | Close | Close | Close | Close |
| | Copper Mountain | Retain | Close | Close | Close | Retain | Close | Close |
| | Corral | Retain | Close Portion | Close Portion | Close | Retain | Close | Close Portion |
| | Officer's Gulch | Retain | Close | Close | Close | Close | Close | Close |
| | Ptarmigan | Retain | Close | Close | Close | Close | Close | Close |
| | Searl | Retain | Close Portion | Close Portion | Close | Retain | Close | Close Portion |
| | Acorn | Retain | Close Portion | Retain | Close | Retain | Retain | Close Portion |
| | Black Creek | Retain | Close | Close portion | Close | Close Portion | Close Portion | Close portion |
| | Boulder Creek | Retain | Close | Close | Close | Close | Close Portion | Close |
| | Maryland Creek | Retain | Close | Close | Close | Close | Retain | Close |
| | MC | Retain | Close | Close | Close | Close | Retain | Close |
| | Pioneer | Retain | Close | Close | Close | Retain | Close Portion | Close |
| | Soda Creek | Retain | Close | Close | Close | Close | Close | Close |
| | Tenderfoot | Retain | Close | Close | Close | Close | Close | Close |

| District | Allotment Name | Alternatives | | | | | | |
|---|---|---|---|---|---|---|---|---|
| | | B | C | D | E | F | I | K |
| DILLON | Willow Cr. | Retain | Close | Close | Close | Close | Close | Close |
| EAGLE | East Lake Creek | Retain | Close | Close | Close | Close | Close Portion | Close |
| | North W Mountain | Retain | Close | Close | Close | Retain | Close | Close |
| | South W Mountain | Retain | Close | Close | Close | Retain | Close | Close |
| | Squaw Creek | Retain | Close | Close | Close | Close | Retain | Close |
| | Sweetwater | Retain | Close | Close portion | Close | Retain | Retain | Close portion |
| HOLY CROSS | Homestake | Retain | Close | Close | Close | Retain | Close | Close |
| | Spring Creek | Retain | Close Portion | Retain | Close | Retain | Retain | Retain |
| | Tennessee Pass | Retain | Close | Close portion | Close | Close Portion | Close | Close |
| | Beaver Creek | Retain | Close | Close | Close | Close | Close | Close |
| | Berry Creek | Retain | Close portion | Retain | Close | Retain | Retain | Retain |
| | Lake Creek | Retain | Close | Close | Close | Retain | Retain | Close |
| | Northside | Retain | Retain | Retain | Retain | Retain | Retain | Retain |
| RIFLE | Blue Lake | Retain | Retain | Retain | Retain | Retain | Retain | Retain |
| | Dolan | Retain | Retain | Retain | Retain | Retain | Retain | Retain |
| | Transfer | Retain | Retain | Close portion | Retain | Retain | Retain | Retain |
| | Grizzly Creek | Retain | Close Portion | Close Portion | Close | Close Portion | Retain | Close Portion |
| | Horsethief | Retain | Close | Close | Close | Close | Close | Close |
| | No Name | Retain | Retain | Close portion | Retain | Retain | Retain | Retain |
| SOPRIS | Ivanhoe | Retain | Retain | Close portion | Close | Retain | Close | Retain |
| | Last Chance | Retain | Retain | Retain | Close | Retain | Close | Retain |
| | Upper Crystal | Retain | Retain | Close portion | Close | Retain | Close | Retain |
| | Gal.Ras.Uhl | Retain | Retain | Retain | Close | Retain | Close | Retain |
| | Fryingpan | Retain | Retain | Retain | Close | Retain | Retain | Retain |
| | Wheatley | Retain | Close | Close | Close | Close | Retain | Close |
| Summary | **Retain** | **51** | **13** | **12** | **8** | **28** | **17** | **15** |
| | **Partial Closure** | **0** | **7** | **12** | **0** | **6** | **4** | **8** |
| | **Close** | **0** | **31** | **27** | **43** | **17** | **30** | **28** |

***Economic Analysis***

Forest-wide standards and guidelines for grazing identify desired resource conditions across all alternatives. To achieve these desired resource conditions, specific grazing systems, stocking rates, needed structural, non structural range improvements and coordination with other resources are developed at the allotment management planning level based on the site specific conditions. Presently there are numerous grazing systems being use on the forest, including but not limited to, multi pasture rotational, deferred rotational, rest rotational, alternate year, once over lightly, high intensity, short duration and to a limited degree continuous. Since livestock grazing was not identified as a major revision topic in this Forest Plan and differences between alternatives are primarily based on the total acreage available for permitted livestock grazing rather than how those livestock are to be managed, a detailed examination of every available grazing systems, across the112 active allotments and 51 vacant allotments for each of the seven alternatives was not warranted. For purposes of analysis, the financial and economic consequences of two grazing prescriptions are compared in Table B-49.

**Prescription A:** This prescription is representative of lands managed under active grazing. This prescription looks at Forest-wide standards and guidelines and management area direction needed meet resource goals and objectives. Grazing systems are developed within this direction at the site-specific level. Range improvements are maintained at grazing permittees expense. Existing improvements that have reached the end of their physical life span would be reconstructed as needed or removed. New improvements are approved on a case-by-case basis. Forest-wide standards and guidelines are designed to improved unsatisfactory range condition. Areas in unsatisfactory condition become satisfactory through mitigation identified during site-specific analysis. Noxious weed management would continue at present levels. Vegetation treatment with prescribed fire would be conducted primarily for wildlife habitat improvement and fuels reduction. In general, forest-wide stocking is expected to remain fairly constant at or near 5.9-acres/head month. Vacant allotments remain in vacant status until site-specific analysis can be completed.

**Prescription B**. Currently grazed lands would be managed without grazing. Current grazing permits would be cancelled or not reissued at end of current term. All existing range improvements not needed for other resources or needed to prevent livestock trespass from adjacent lands would be removed. Noxious weed management would continue at present levels.

**Table B-49**

**Financial and Economic Comparison of Grazing Prescriptions**

| Grazing Prescriptions | Average Profile for Lands Managed for Active Grazing | Average Profile for Lands Currently Grazed, but No Longer Managed for Grazing |
|---|---|---|
| Estimated Grazing (Annual Average, 2001-2010) | | |
| Sheep: Head Months per Acre | .346 | 0 |
| Animal Unit Months per Acre | .104 | 0 |
| Cattle: Head Months per Acre | .182 | 0 |
| Animal Unit Months per Acre | .224 | 0 |
| Financial Analysis (taxpayer/agency perspective) | | |
| Revenues per Acre per Year | | |
| Sheep | $0.47 | -- |
| Cattle | $0.25 | $0.00 |
| Costs per Acre per Year | | |
| Sheep | $0.47 | -- |
| Cattle | $1.02 | $0.27 |
| Net Revenue per Acre per Year | | |
| Sheep | $0.00 | --- |
| Cattle | -$0.77 | -$0.27 |
| Present Net Value Per Acre in Decade 1 | | |
| Sheep | -$3.34 | --- |
| Cattle | -$6.82 | -$2.31 |
| Economic Analysis (society perspective) | | |
| Benefits per Acre per Year | | |
| Sheep | $1.11 | -- |
| Cattle | $2.40 | $0.00 |
| Costs per Acre per Year | | |
| Sheep | $2.23 | -- |
| Cattle | $3.11 | $0.27 |
| Net Benefit per Acre per Year | | |
| Sheep | -$1.12 | -- |
| Cattle | -$0.71 | -$0.27 |
| Present Net Value per Acre in Decade 1 | | |
| Sheep | -$10.15 | -- |
| Cattle | -$6.98 | -$2.31 |

The economic analysis was completed from two perspectives: Financial efficiency and cost effectiveness. Financial considerations include only those revenues received by and costs incurred by the Forest Service. Economics considerations include the benefits and costs of grazing to all of society. Economically, actively grazed lands benefit society by providing food and fiber, and employment. These calculations do not include benefit or costs for which monetary values are unavailable

Historically many of the vacant allotments being considered for closure became vacant when Term Grazing Permit holders relinquished their permits back to the government with no preferred applicant. In most instances, the return of the permits was based on economic considerations in that the operations were not economically viable. This was due in part to distance to the allotment from private grazing lands, difficulties and expenses associated with obtaining qualified help, difficulties in managing livestock in remote and rugged terrain, and the general low return on investment. These vacant allotments have remained vacant for since the 1970's and 1980's do to a lack of demand. Since these permits were returned to the Forest Service, if anything, costs of doing business in remote rugged areas has increased while economic benefits have continued to decline. In addition, some allotment areas that are adjacent to or surrounded by urban sprawl are increasingly becoming economically infeasible to operate. The increasing urbanization, with newcomers who are not attuned to a rural lifestyle, results in conflict between livestock operations (trailing or hauling livestock, keeping gates closed and fences repaired) and recreationists/urban homesteaders. In some areas, the costs of conducting grazing operations while continuing to meet required standards is prohibitive. See Table B-49 for information on recreation use, potential conflict with adjacent landowner and other potential conflicts as well as interest is grazing by the livestock community. No additional acres were identified as economically unsuitable beyond those already subtracted during the vacant allotment analysis.

Based on the information discussed above, certain rangelands were determined to be suitable for livestock grazing. The results of this determination are summarized in Tables B-50 and Tables B-51. Not all of these lands will be stocked, but all are considered available for grazing.

**Table B-50**

**Acres suitable for cattle grazing by alternative**

| | Alt. B | Alt. C | Alt. D | Alt. E | Alt. F | Alt. I | Alt. K |
|---|---|---|---|---|---|---|---|
| Acres presently suitable for cattle grazing | **960,841** | **960,841** | **960,841** | **960,841** | **960,841** | **960,841** | **960,841** |
| Management Area Prescriptions excluding grazing (RNA's) | **0** | **19,069** | **23,421** | **11,009** | **16,180** | **32,220** | **4,324** |
| Acres proposed for full or partial closure in this alternative | **0** | **150,484** | **134,279** | **195,144** | **80,730** | **160,664** | **152,034** |
| Total Environmentally Suitable Acres (cattle) for this alternative | **960,841** | **791,288** | **803,141** | **754,689** | **863,931** | **767,956** | **804,483** |
| Economically unsuitable for Cattle | **0** | **0** | **0** | **0** | **0** | **0** | **0** |
| Suitable Acres for Cattle Grazing | **960,841** | **791,288** | **803,141** | **754,689** | **863,931** | **767,956** | **804,483** |

**Table B-51**

**Acres suitable for sheep grazing by alternative.**

| | Alt. B | Alt. C | Alt. D | Alt. E | Alt. F | Alt. I | Alt. K |
|---|---|---|---|---|---|---|---|
| Acres presently suitable for cattle grazing | **1,167,261** | **1,167,261** | **1,167,261** | **1,167,261** | **1,167,261** | **1,167,261** | **1,167,261** |
| Management Area Prescriptions excluding grazing (RNA's) | **0** | **22,268** | **27,772** | **12,020** | **18,151** | **38,335** | **6,374** |
| Acres proposed full or partial closure in this alternative | **0** | **200,472** | **178,781** | **264,026** | **108,261** | **218,004** | **198,428** |
| Total Environmentally Suitable Acres (sheep) for this alternative | **1,167,261** | **944,521** | **960,708** | **891,215** | **1,040,849** | **910,922** | **962,459** |
| Economically unsuitable for Sheep | **0** | **0** | **0** | **0** | **0** | **0** | **0** |
| Suitable Acres for Sheep Grazing | **1,167,261** | **944,521** | **960,708** | **891,215** | **1,040,849** | **910,922** | **962,459** |