

Mormon Meadow

CA-010-094

MORMON MEADOW WILDERNESS STUDY AREA (WSA)

(CA-010-094)

1. THE STUDY AREA — 8,354 acres

The Mormon Meadow Wilderness Study Area (WSA) is located in northeastern Mono County, approximately nine miles southeast of Bridgeport, California. The WSA includes 7,721 acres of Bureau of Land Management (BLM) lands, 633 acres of private inholdings, and no State land (see Map 1 and Table 1).

The northern boundary of the WSA follows private lands easterly in the Mormon Meadow area. The boundary turns south on Bridgeport Canyon County Road and proceeds south skirting private land at two locations until it rejoins the road. The boundary abruptly jogs south and east near Goat Ranch until it intersects a 60-kV transmission line right-of-way. The boundary turns and proceeds southwest along the right-of-way and some private land until Rancheria Gulch. The boundary then leads northwest cross-country and around private land until reaching Little Mormon Meadow Road. The boundary continues north along the road to Little Bodie Mine and then follows a perennial tributary of Clearwater Creek to private land in Mormon Meadow. The WSA occupies the southwestern corner of the Bodie Hills, which straddles the transitional zone of the Basin and Range geomorphic province and the Sierra Nevada geomorphic province. The WSA encompasses an area of steep, rounded volcanic hills dissected by a few intermittent drainages. Elevation ranges from 6,800 feet to 8,600 feet. The southern quarter of the unit is uniformly covered with stands of pinyon-juniper while the remainder is dominated by desert shrub species. Grasses occupy the meadow areas. A few spring sources are located in the WSA. The southern portion of the WSA provides picturesque and scenic vistas of Mono Lake and its basin which is a few miles south of the unit.

The WSA was studied under Section 603 of the Federal Land Policy and Management Act (FLPMA). Various suitability recommendations were analyzed in the Draft and Final Environmental Impact Statements (EIS) for the Benton-Owens Valley/Bodie-Coleville Wilderness Study Areas. A summary of the area's wilderness values was included in the Final EIS. Two different suitability recommendations were analyzed in the EISs: all wilderness, and no wilderness.

2. RECOMMENDATION AND RATIONALE — 0 acres recommended
for wilderness
7,721 BLM acres recommended
for non-wilderness

No wilderness is the recommendation for this WSA. The entire acreage in this WSA is released for uses other than wilderness. The all-wilderness alternative is considered to be the environmentally preferred alternative as

it would result in the least change from the natural environment over the long term. The no-wilderness alternative will be implemented in a manner which will use all practical means to avoid or minimize environmental impacts.

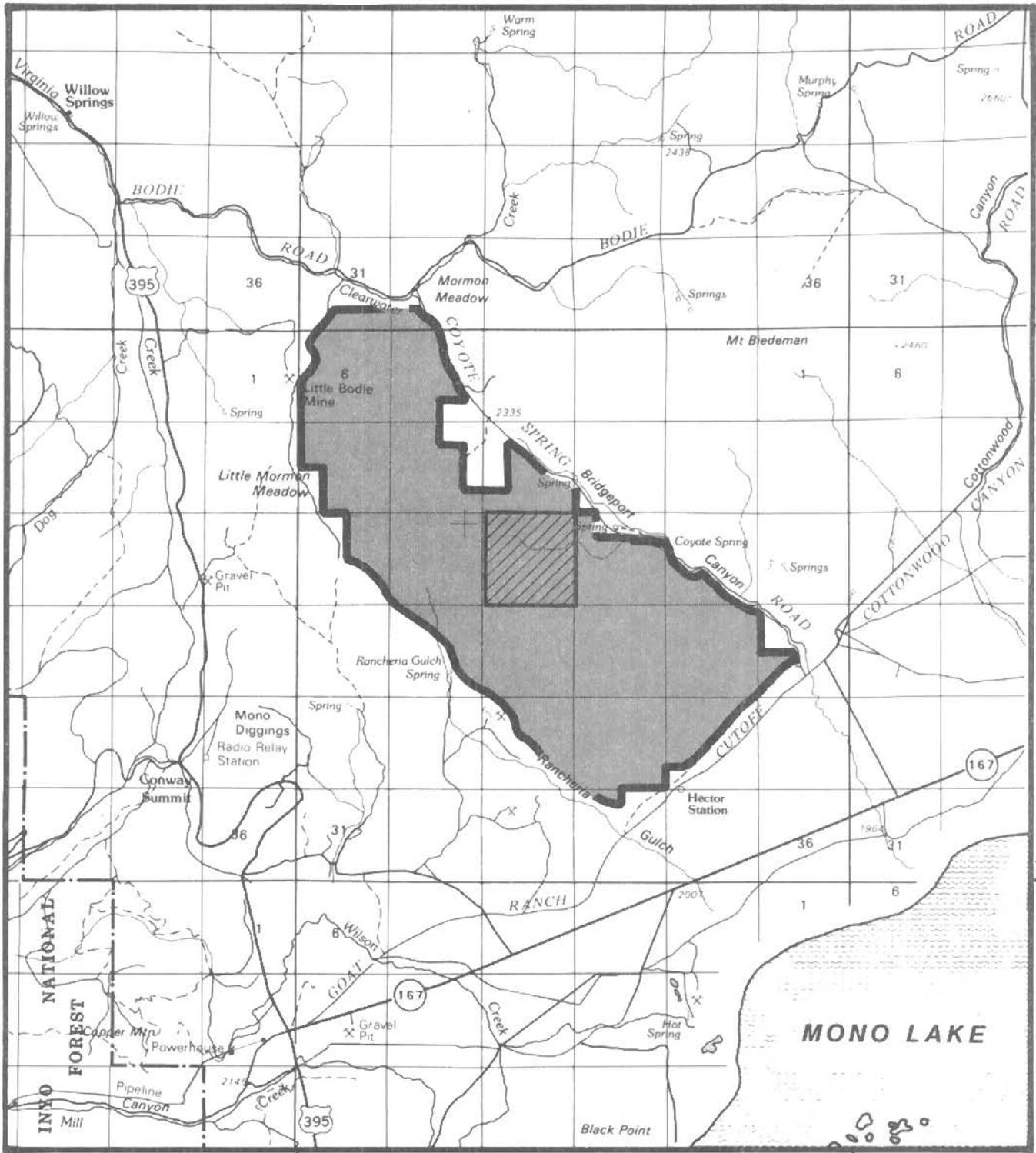
The WSA is recommended nonsuitable because its potential for mineral occurrence outweighs the area's marginal wilderness values. Within this WSA, wilderness values are considered low due to the lack of significant wilderness features or characteristics unique to the region. Manageability was a secondary consideration in the non-suitable recommendation.

Resource conflicts in the WSA include high potential for metallic minerals in the north edge of the unit. This high potential area contains approximately 24 mining claims with moderate probability for determination of valid existing rights. Development of mining claims which are found to have valid existing rights could impair the area's wilderness values with or without wilderness designation. The WSA also contains high potential for geothermal resources. Geothermal lease applications are pending along the WSA's southeast corner. Development potential for geothermal resources is moderate.

The WSA reflects an environment that contains wilderness values which are not considered significant or unique to the area. Although the unit is topographically varied, the landform reflects an environment that is visually mediocre in relation to the rest of the Bodie Hills and other nearby areas. The most visually appealing portion of the WSA is located on a large private inholding within the unit. As a result, wilderness values are considered low and would provide little or no significant enhancement to the National Wilderness Preservation System (NWPS).

The WSA's lack of natural barriers along portions of its boundaries and the potential for mining claim development in areas of high mineral value would limit management of the area as wilderness. Additionally, a large private inholding within the WSA may further hinder manageability.

There are approximately four miles of primitive ways which will remain available for vehicular use.



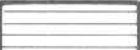
T4N
T3N

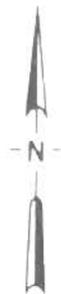
T3N
T2N

R25E R26E

R26E R27E

-  NONE RECOMMENDED FOR WILDERNESS
-  RECOMMENDED FOR NONWILDERNESS
-  LAND OUTSIDE WSA RECOMMENDED FOR WILDERNESS

-  SPLIT ESTATE
-  STATE
-  PRIVATE



**Mormon Meadows
Proposal
MAP-1**



010-094
JUNE, 1988

TABLE 1 - Land Status and Acreage Summary of the Study Area

<u>Within Wilderness Study Area</u>		<u>Acres</u>
BLM	(surface and subsurface)	7,721
Split Estate	(BLM surface only)	0
Inholdings		
	State	0
	Private	633
Total		<u>8,354</u>
<u>Within the Recommended Wilderness Study Boundary</u>		<u>Acres</u>
BLM	(within WSA)	0
BLM	(outside WSA)	0
Split Estate	(within WSA)	0
Split Estate	(outside WSA)	0
Total BLM Lands Recommended for Wilderness		<u>0</u>
Inholdings		
	State	0
	Private	0
<u>Within the Area Not Recommended for Wilderness</u>		<u>Acres</u>
BLM	(surface and subsurface)	7,721
Split Estate	(BLM surface only)	0
Total BLM Land Not Recommended for Wilderness		<u>7,721</u>

3. CRITERIA CONSIDERED IN DEVELOPING THE WILDERNESS RECOMMENDATIONS

A. Wilderness Characteristics

1. Naturalness: The WSA has retained its primeval character and influence. The WSA consists of rounded volcanic hills and predominantly brush covered slopes that have been incised by some ephemeral drainages. Summit elevations approach 9,000 feet. A few springs can be found in the unit. Meadow areas associated with the springs' sources contain grasses while Great Basin desert shrubs blanket the drier areas. Pinyon pine, Utah juniper, and quaking aspen are also located in the unit. The south quarter of the unit is dominated by pinyon-juniper associations. To the north, small isolated groves of aspen inhabit the higher elevations.

The works of man are substantially unnoticeable in the WSA as a whole. These works include approximately four miles of primitive

vehicle routes, one spring development and some localized impacts to wetland areas from excessive livestock utilization in these areas. These imprints are imperceptible within the overall confines of this WSA.

2. Solitude: Outstanding opportunities for solitude are readily available throughout the WSA. The unit's size, interior valleys, and vegetative screening allow visitors to experience primitive recreation activities out of the sights and sounds of others. Solitude is visually limited along the eastern boundary by occasional vehicle use on Bridgeport Canyon Road.

This WSA may be overflowed in the future by military aircraft as part of the national defense mission during approved military operations. The visual intrusions and associated noise create temporary effects on solitude which are deemed acceptable and necessary as a part of the defense preparedness of the nation.

3. Primitive and unconfined recreation: Most primitive recreation activities would be well accommodated within the area. These include hunting, camping, horseback riding, etc. Scenic views of Mono Lake are available from within the southern fringes of the WSA.
4. Special features: The WSA contains some special features including a population of Phacelia monoensis, which is on the United States Fish and Wildlife Candidate Species list.

In addition, the WSA includes several wildlife species such as sage grouse, a recovering species of game birds that has been historically over-harvested; mule deer and pronghorn antelope which rely on this intact natural environment for their forage and cover requirements. The WSA serves as crucial nesting habitat for sage grouse as well as a crucial deer fawning area. These game animals rely on the unit's natural cover for nesting and fawning activities.

B. Diversity in the National Wilderness Preservation System (NWPS)

1. Assessing the diversity of natural systems and features as represented by ecosystems: The WSA contains 5,000 acres of the Intermountain Sagebrush/Great Basin Sagebrush and 2,721 acres of the Intermountain Sagebrush/Juniper-Pinyon Woodlands ecosystems. The Mormon Meadow WSA would not increase the diversity of the types of ecosystems represented in the NWPS.

Table 2 - Ecosystem Representation

Bailey-Kuchler Classification Domain/Province/PNV	NWPS Areas		Other BLM Studies	
	areas	acres	areas	acres
<u>NATIONWIDE</u>				
Intermountain Sagebrush/ Great Basin Sagebrush	1	32,407	55	1,200,045
Juniper-Pinyon Woodland	4	81,301	74	2,148,579
<u>CALIFORNIA</u>				
Intermountain Sagebrush/ Great Basin Sagebrush	0	0	19	215,579
Juniper-Pinyon Woodland	3	61,701	18	363,109

2. Expanding the opportunities for solitude or primitive recreation within a days driving time (five hours) of major population centers: The WSA is within a five-hour drive of nine major population centers. Table 3 summarizes the number and acreage of designated areas and other BLM study areas within a five-hour drive of the population centers.

Table 3 - Wilderness Opportunities for Residents of Major Population Centers

Population Centers	NWPS Areas		Other BLM Studies	
	areas	acres	areas	acres
<u>California</u>				
Chico	16	1,286,873	13	430,822
Fresno	35	4,048,852	28	460,790
Merced	33	3,957,550	25	348,753
Modesto	36	4,126,963	81	1,722,326
Sacramento	46	5,001,817	87	2,479,541
Stockton	35	4,061,833	46	601,496
Vallejo-Napa-Fairfield	44	4,832,667	74	2,100,862
Yuba City	44	4,951,805	85	2,495,500
<u>Nevada</u>				
Reno	39	4,647,230	170	6,904,809

3. Balancing the geographic distribution of wilderness areas: The WSA is within 50 air miles of one BLM WSA recommended for wilderness designation. The Hoover Wilderness, 15 miles to the west, is the nearest designated wilderness area. This wilderness area is administered by the Toiyabe and the Inyo National Forests. Other

nearby designated wilderness areas include Yosemite National Park which is managed by the National Park Service, the Ansel Adams Wilderness which is managed by the Inyo National Forest, and the Carson-Iceberg Wilderness which is managed by the Toiyabe National Forest.

C. Manageability

Although the area is manageable as wilderness, it would be difficult due to a lack of easily identifiable boundaries along the western edge. Additionally, the lack of topographic or vegetative barriers along Bridgeport Canyon Road would make the WSA susceptible to indiscriminate off-highway vehicle use, particularly snowmobiles. The northern edge of the unit may become altogether unmanageable because of high metallic mineral potential with numerous mining claims located in this area. Although the probability is moderate, a determination of valid existing mineral development rights in this portion of the unit may completely impede wilderness management in this area. Wilderness values of naturalness, solitude and opportunities for primitive recreation experiences could be permanently impaired in this area.

The centralized location of private inholdings virtually bisects the WSA. This portion of the WSA is less than one-half mile in width. Although no development activities are foreseen, incompatible uses on this private inholding could additionally hinder wilderness management.

Considerable signing, patrolling, and fencing substantial portions of the WSA would be required to maintain the area's natural integrity. Purchase of the private inholding would be necessary in order to enhance wilderness manageability.

Military overflights in this WSA must be considered to maintain the integrity of the existing and future national defense mission as well as the wilderness resource.

D. Energy and Mineral Resource Values

1. Summary of information known at the time of the preliminary suitability recommendation: The Mormon Meadow WSA is in the BIM Bodie Geology-Energy-Mineral (G-E-M) Resource Area (GRA). An overview of the mineral potential of the WSA is addressed in the Affected Environment section of the Wilderness Recommendations, Benton-Owens Valley/Bodie-Coleville Study Area EIS prepared in 1987. The EIS states that the WSA has a high resource potential for metallic minerals in the north margin of the WSA and a low resource potential for metallic minerals for the remainder of the area. The resource potentials for non-metallics and uranium are low. There is no resource potential for oil and gas. The geothermal resource occurrence potential is high for the entire 8,354 acres of the WSA ("Lands Valuable for Geothermal Resources", USGS unpublished map, revised 1985).

The mineral information in the EIS is supported by the BLM Bodie G-E-M report. This report includes extensive references and personal communications with mining companies active in the area.

The Mormon Meadow WSA encompassing 7,721 acres of public land is located five miles southwest of the Bodie mining district and approximately 13 miles south of the Masonic mining district. The general area is underlain by Tertiary lava flows, plugs, and pyroclastic deposits of principally dacitic composition. Pre-Tertiary metasedimentary rocks overlain by the Tertiary volcanics are exposed in a few places in the WSA. Production of gold and silver in the mining districts came from several systems of quartz veins. They are closely associated with hydrothermal alteration widespread in the mining districts. This hydrothermal alteration is common in the WSA.

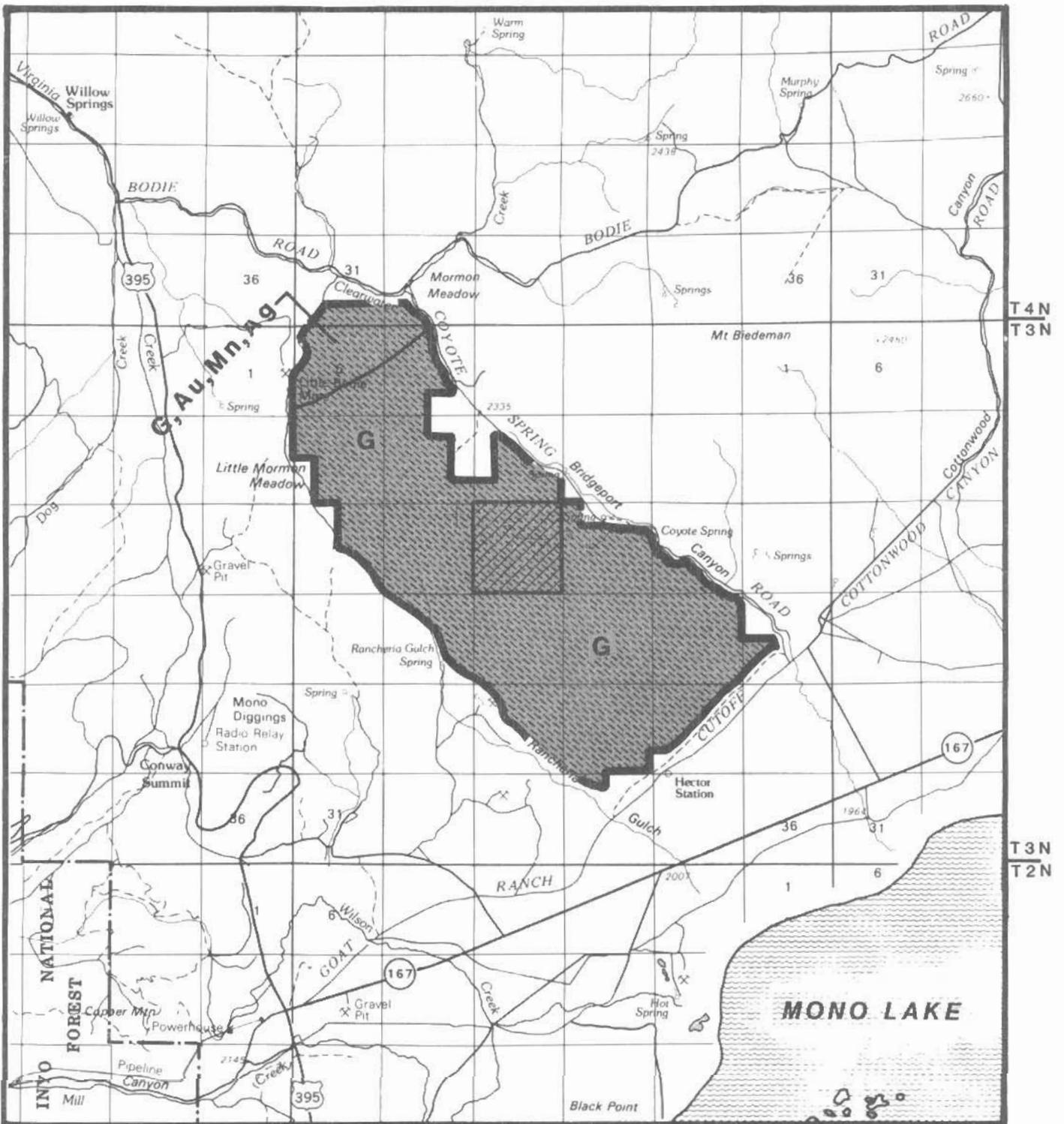
BLM records in 1983 identified approximately 30 mining claims in the high potential areas in the north margin of the WSA and a few pending geothermal lease applications around the southeast corner of WSA.

2. Summary of significant new mineral resource data collected since the suitability recommendation which should be considered in the final recommendation: Because this WSA was recommended non-suitable by BLM, no U.S. Geological Survey nor U.S. Bureau of Mines mineral surveys were conducted in this WSA. No new mineral data in the WSA has become available since the preparation of G-E-M report in 1983.

As of March, 1988, BLM records indicate the following distribution of unpatented mining claims in the WSA:

Table 4 - Mining Claims

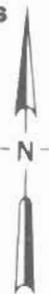
	NO.			ACRES		
	SUITABLE	NONSUIT.	TOTAL	SUITABLE	NONSUIT.	TOTAL
Mining Claims						
Lode	0	20	20	0	400	400
Placer	0	3	3	0	120	120
Mill Sites	0	1	1	0	5	5
Total	0	24	24	0	525	525



- NONE Recommended for Wilderness
- Recommended for Non Wilderness
- Land outside WSA Recommended for Wilderness
- Split Estate
- State
- Private

- Explanation**
- High Potential for the Occurrence of Energy and/or Non-energy Minerals
 - Moderate Potential for the Occurrence of Energy and/or Non-energy Minerals
 - M** Moderate Mineral Potential Location in a High Mineral Potential Area
 - H** High Mineral Potential Location in a Moderate Mineral Potential Area

- Commodity Symbols**
- Ag** Silver
 - Au** Gold
 - G** Geothermal
 - Mn** Manganese



**Mormon Meadows
Mineral Resource Potential**



**Map-2
010-094**

E. Impacts on Resources

The following table summarizes the effects on pertinent resources for all alternatives considered including designation or non-designation of the entire area as wilderness. (For a full explanation of this summary, refer to the Benton-Owens Valley/Bodie-Coleville Wilderness - Final Environmental Impact Statement.)

Table 5 - Comparative Summary of the Impacts by Alternative

ISSUE-RELATED RESOURCES	PROPOSED ACTION (NO-WILDERNESS/NO ACTION)	ALL-WILDERNESS ALTERNATIVE
Wilderness Values	Mining activities and geothermal development would result in a direct loss of naturalness, solitude and primitive and unconfined recreation on 302 acres. The perception of naturalness and solitude would be impaired on an additional 500 acres due to mining and geothermal activities. Continued motorized recreation use (350 visitor-days) would impact naturalness on 10 acres. Critical sage grouse habitat would be eliminated due to mining activities. <u>Phacelia monoensis</u> could potentially be impacted by mining activities.	Overall there would be a slight to moderate enhancement of wilderness values primarily due to the prohibition of geothermal development and elimination of 350 visitor-days of motorized recreation use. Due to the probability of valid existing rights, mining activities would impact wilderness values as described under the Proposed Action including a loss of naturalness, solitude, and primitive and unconfined recreation on 210 acres. The perception of naturalness and solitude would be impaired on an additional 400 acres by mining activities.
Motorized Recreation Use	Motorized recreation use is expected to remain stable at 350 visitor-days per year. There would be no impacts on motorized recreation use.	Motorized recreation use would be eliminated resulting in a loss of 350 visitor-days per year. This would be a slight adverse impact due to opportunities on public land outside the WSA.

Table 5 - Comparative Summary of the Impacts by Alternative

ISSUE-RELATED RESOURCES	PROPOSED ACTION (NO-WILDERNESS/NO ACTION)	ALL-WILDERNESS ALTERNATIVE
Geothermal Resource Development	Geothermal exploration and development could occur within the WSA. Development of a 50-Mw resource is projected. There would be no impacts on geothermal resource development.	Exploration and development of geothermal resources including a projected 50-Mw resource would be foregone. Over the long term this would result in a less than minor impact.

F. Local Social and Economic Considerations

No local social or economic considerations were identified in the Final EIS. Therefore, no further discussion of this topic will occur in this document.

G. Summary of WSA - Specific Public Comments

During the inventory phase, a few comments were received addressing the need for utility-line expansion needs and the area's potential for geothermal resources. An additional comment stated that the area's low to moderate mineral potential, its roads, non-public lands, and mines combine to limit the WSA's wilderness potential.

After the inventory, comments were received during the wilderness study process. One comment supported wilderness designation while another noted the area's use for mineral exploration and development. A similar respondent indicated that the area's geothermal leases, private land, and structures impaired the WSA's suitability for wilderness.

During the study phase, a public meeting and hearing were held in association with the draft EIS. The public meeting was held in Markleeville, California; the public hearing in Bishop, California. Comments were received both orally through the hearing and in writing during the 90-day public review period. A total of 83 written and oral comments were received. Forty comments supported the Bureau's no-wilderness recommendation. Forty-three comments supported the all-wilderness alternative.

No Federal or State agency comments were received specific to this WSA.

During the inventory, Mono County provided a comment which noted that the multiple use values and non-public holdings within the WSA precluded wilderness designation of the area.