

# Lava Wilderness Study Area

## 1. The Study Area -- 23,680 acres

The Lava WSA (ID-56-2) is located in Lincoln County two miles northeast of Shoshone, Idaho. The WSA includes 23,680 acres of BLM-administered lands. There are no split estate lands within the area (see Table 1). The WSA is bounded on the north by a paved county road, the Burmah Road. Unnamed, nonsystem dirt roads along with private and state lands form the eastern, western and remainder of the northern boundary. The southern boundary is formed by the Union Pacific Railroad right-of-way and private lands.

The Lava WSA is located on a flat plain. The majority of the WSA is an older lava flow exhibiting examples of pressure ridges and pahoehoe lava. (Pahoehoe lava has a smooth or ropey surface spread chiefly through tubes and characterized by round vesicles. Pahoehoe is the Hawaiian word for "ropey coils.") The Big Wood River channel lies along portions of the WSA's western boundary. Most of the river's flow is diverted for irrigation use before it reaches the WSA boundary.

The dominant vegetation is sagebrush and grasses. There are small shrubs which resemble ferns in shaded portions of the WSA and many lichens of different colors on the exposed surfaces of the lava. Several species of wildlife including deer, coyotes and sage grouse are found within the WSA.

The WSA was studied under Section 603 of the Federal Land Policy and Management Act (FLPMA) in the Shoshone/Sun Valley Final Environmental Impact Statement, Wilderness (EIS), filed in April 1986. Two alternatives were analyzed in the EIS: a no wilderness alternative, which is the recommendation of this report; and an all wilderness alternative.

## **2. Recommendation and Rationale**

**0 acres recommended for wilderness**

**23,680 acres recommended for nonwilderness**

The recommendation for the Lava WSA is to release all 23,680 acres for nonwilderness uses. The environmentally preferable alternative is the all wilderness alternative. It would cause the least change from the natural environment over the long term. The recommendation would use all practical means to avoid or minimize adverse environmental impacts. All 23,680 acres of federal land within the WSA are recommended nonsuitable for wilderness designation and are shown as the Lava WSA on the Lava Proposal map.

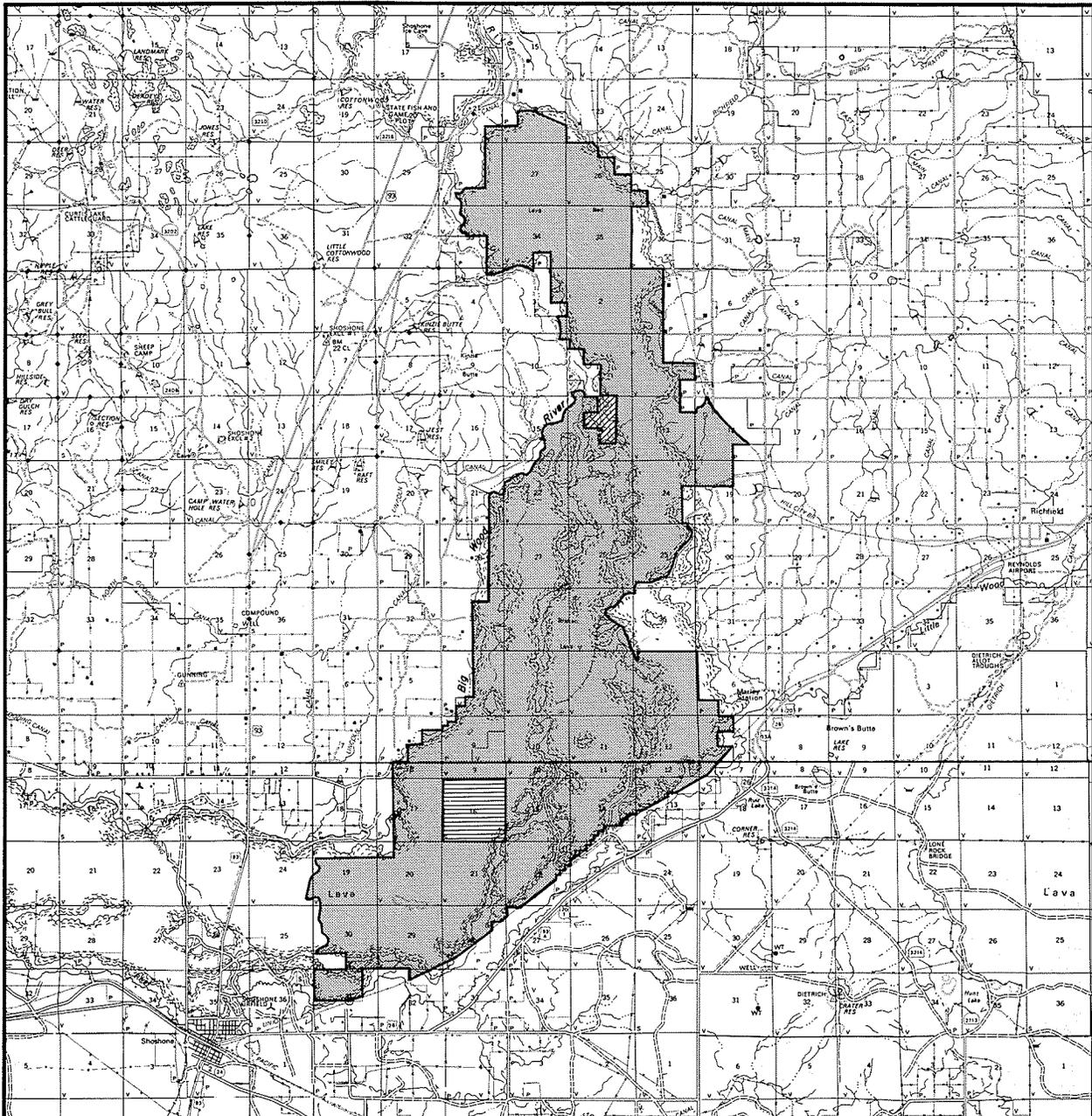
The most significant factor considered in making the nonwilderness recommendation for the WSA is the relatively low quality of the existing wilderness values. While the WSA contained the wilderness values necessary for study, these values marginally qualified the area for WSA status. Although the Lava WSA's overall appearance is generally natural, several areas in the WSA have been visibly impacted by the works of humans. Naturalness along portions of the eastern boundary has been reduced by the dull reddish color exposed after removal of the surface lava rock. Vehicle trails and range developments including pipelines and corrals also detract from natural values in the central part of the WSA. Agricultural activity and boundary roads are obvious from all edges of the WSA.

The Lava WSA is predominantly an older soil covered lava flow which, because of its size, provides outstanding opportunities for solitude and isolation as well as primitive camping and hiking. The quality of these opportunities, however, is comparable to those found in older lava flows of similar size throughout the Shoshone District. The WSA contains no special features that would benefit from wilderness designation.

The Great Basin Province/Desert Ecosystem (3130-39) is the only ecosystem represented in the WSA. The Craters of the Moon Wilderness (43,243 acres) administered by the National Park Service (NPS) currently represents this ecosystem in the NWPS. Designation of the Lava WSA as wilderness would not add an unrepresented ecosystem to the NWPS.

The potential for unauthorized agricultural and mineral uses along the Lava WSA's boundaries would complicate management as wilderness. Boundary fences, signs and intensive patrols by personnel with law enforcement capability would be required to maintain the Lava WSA's existing marginal wilderness values.

The WSA requires intensive grazing management to maintain existing uses. With the recommendation, existing levels of grazing can be maintained through brush control and seeding with mechanical equipment.



T. 3 S.

T. 4 S.

T. 4 S.

T. 5 S.

T. 5 S.

T. 6 S.

R. 17 E. | R. 18 E.

R. 18 E. | R. 19 E.



RECOMMENDED FOR WILDERNESS



RECOMMENDED FOR NONWILDERNESS



LAND OUTSIDE WSA RECOMMENDED FOR WILDERNESS



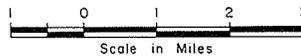
SPLIT ESTATE



STATE



PRIVATE



ID-56-2  
LAVA  
PROPOSAL

MARCH 1988



**Table 1 -- Land Status and Acreage Summary of the Study Area  
LAVA WSA**

**Within Wilderness Study Area**

BLM (surface and subsurface)	23,680
Split Estate (BLM surface only)	0
Inholdings (state, private)	0
<b>Total</b>	<b>23,680</b>

**Within the Recommended Wilderness Boundary**

BLM (within WSA)	0
BLM (outside WSA)	0
Split Estate (within WSA)	0
Split Estate (outside WSA)	0
<b>Total BLM Land Recommended for Wilderness</b>	<b>0</b>
Inholdings (state, private)	0
State land (outside WSA)	0

**Within the Area Not Recommended for Wilderness**

BLM	23,680
Split Estate	0
<b>Total BLM Land Not Recommended for Wilderness</b>	<b>23,680</b>
Inholdings (state, private)	0

### **3. Criteria Considered in Developing the Wilderness Recommendations**

#### **Wilderness Characteristics**

##### **A. Naturalness**

Seven vehicle trails totaling 10.8 miles are present in the Lava WSA. Many of these are extremely faint and receive little vehicle use. One trail is used regularly to place livestock salt in the WSA. The trails are screened by brush and most are not visible when viewed from a few feet away. They do not noticeably affect the naturalness of the WSA. The pipelines and corrals within the WSA do detract from naturalness in the vicinity of the developments.

Small areas along the WSA's eastern boundary have been damaged by unauthorized removal of veneer basalt. Areas where the rock has been removed are distinguished by the dull reddish surface exposed after removal of the overlying black lava. These areas total about 40 acres and are obvious at close range.

Natural stream channels along the east and west boundaries of the WSA have been used as part of a canal system. No structures have been built in these streambeds but the water level fluctuates greatly.

##### **B. Solitude**

The WSA offers opportunities for solitude, primarily because of its relatively large size. Although the topography is basically flat, some topographic relief is provided by the lava formations in the WSA. However, the lack of good screening lessens opportunities for solitude when several users are in the same part of the WSA.

Agricultural land is adjacent to the WSA along large sections of the western and southeastern boundary. Farming activities can be seen and heard from several places within the WSA. The sites and sounds of agricultural activity adjacent to the WSA are overwhelming and detract from a feeling of solitude.

##### **C. Primitive and Unconfined Recreation**

The WSA provides a diversity of primitive recreation opportunities. These include photography, hiking, camping and nature study. Some lava tubes within the WSA are available for exploring and study. The rugged terrain and harsh conditions enhance the challenge of hiking and camping. However, the lack of destinations diminishes the quality of these opportunities for some users.

##### **D. Special Features**

The WSA has no significant special features.

## Diversity in the National Wilderness Preservation System

### A. Assessing the Diversity of Natural Systems and Features as Represented by Ecosystems

Wilderness designation of the Lava WSA would add an ecosystem presently represented in the National Wilderness Preservation System (NWPS) by one designated area with 30,245 acres. There are 11 other BLM areas in the state under study with this ecosystem. This information is summarized in Table 2.

**TABLE 2**

#### Ecosystem Representation

Bailey-Kuchler Classification	<u>NWPS Areas</u>		<u>Other BLM Studies</u>	
	areas	acres	areas	acres
Intermountain Sagebrush Province/Desert vegetation largely absent				
	<u>NATIONWIDE</u>			
Desert Ecosystem	1	30,245	12	870,403
	<u>IDAHO</u>			
Desert Ecosystem	1	30,245	11	646,687
	<u>NEVADA</u>			
Desert Ecosystem	0	0	1	223,716

**B. Expanding the Opportunities for Solitude or Primitive Recreation  
Within a Day's Driving Time (Five Hours) of Major Population Centers**

The Lava WSA is within a five-hour drive of two 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 center.

**Table 3**

**Wilderness Opportunities for Residents  
of Major Population Centers**

Population Centers	<u>NWPS Areas</u>		<u>Other BLM Studies</u>	
	areas	acres	areas	acres
Boise, Idaho/Salt Lake City, Utah <sup>1</sup>	16	4,741,570	141	5,374,250

<sup>1</sup>Salt Lake City, Utah, and vicinity includes other cities of Provo, Orem and Ogden, Utah.

## **C. Balancing the Geographic Distribution of Wilderness Areas**

The Lava WSA would not contribute to balancing the geographic distribution of areas within the NWPS. The NPS-administered Craters of the Moon Wilderness (43,243 acres), representing a similar landform and ecosystem, is a one-hour drive to the northeast. The lava flow wilderness values within the Craters of the Moon Wilderness are superior in every respect to those of the Lava WSA. Therefore, designation of the Lava WSA as wilderness would not help balance the geographic distribution of opportunities to attain diverse wilderness experiences.

### **Manageability**

The WSA could be managed as wilderness. There are no private rights or conflicts within the area which would affect the ability to retain wilderness values. Much of the WSA's southeastern, eastern and western boundaries are located along legal subdivisions adjacent to agricultural land. Farming trespass has occurred along these boundaries. Easily accessible, these areas have also been subject to unauthorized removal of veneer basalt.

There would be significant administrative problems and costs associated with management of the area. Wilderness management would require intensive patrols of the area by personnel with law enforcement capability, and boundary fences and signs surrounding the area.

### **Energy and Minerals Resource Values**

Except for the state land inholding, all surface and mineral estates in the WSA are in federal ownership and are open to mineral entry. The Lava WSA is considered prospectively valuable for both oil and gas and for geothermal resources. The entire WSA has a low-to-moderate favorability for low-to-intermediate temperature geothermal resources based on limited well data and by analogy with surrounding areas.

The WSA is classified as having low potential for other leasable minerals based on an unfavorable geologic environment (Frederickson and Fernette 1983). There are no mineral leases within the WSA. The WSA is classified as unfavorable for locatable mineral resources based on an unfavorable geologic environment. There are no mining claims within the WSA.

Veneer basalt of building stone quality occurs on the northern edge of the WSA and probably occurs elsewhere in the area. It has been illegally exploited. There have been no sales of building stone within the WSA.

### **Impacts on Resources**

The following comparative impact table summarizes the effects on pertinent resources for all the alternatives considered including designation or nondesignation of the entire WSA as wilderness.

**Table 4**  
**Comparative Summary of the Impacts by Alternative**  
**WSA ID-56-2 (LAVA)**

ISSUE TOPICS	PROPOSED ACTION (NO WILDERNESS/NO ACTION)	ALL WILDERNESS ALTERNATIVE
Impacts on Wilderness Values	The area's marginal naturalness and opportunities for solitude would be slightly reduced by new range developments, brush control and continued ORV use.	All wilderness values would receive long-term Congressional protection. Maintenance and construction of range developments would slightly reduce the area's marginal naturalness and opportunities for solitude. Elimination of ORV use would improve the area's naturalness and opportunities for solitude.
Impacts on Recreational ORV Use	There would be no impact on recreational ORV use.	Recreational ORV use of 100 visitor days would be foregone annually. The impact of shifting this use to other public lands would be negligible.
Impacts on Development of Mineral Resources	Potential mineral resources would be available for development. This includes low to moderate favorability for low temperature geothermal resources. There would be no impact on development of mineral resources.	Development of potential mineral resources would be foregone. This includes low to moderate potential for low temperature geothermal resources.
Impacts on Grazing Facility Maintenance and Construction	There would be no impact on grazing facility maintenance and construction.	There would be no seeding on 2,200 acres of brush control.

## **Local Social and Economic Considerations**

Social and economic factors were not considered a significant issue in the study.

## **Summary of WSA-Specific Public Comments**

Public involvement occurred throughout the wilderness review process. During public review of the Draft EIS, four comments supporting wilderness designation of the Lava WSA were received. Two of these contained no supporting reasons. Comments supporting wilderness cited preservation values and the area's contribution to expanding diversity in the National Wilderness Preservation System. Three comments opposed wilderness designation of the area. Two of these had no supporting reasons. The letter with supporting reasons cited the area's low wilderness potential.

The U.S. Department of Energy, Bureau of Reclamation, U.S. Fish and Wildlife Service, National Park Service, Federal Highway Administration, Environmental Protection Agency, the Idaho Department of Fish and Game, Idaho Department of Health and Welfare, Idaho Department of Lands, Idaho Transportation Department, Idaho Department of Water Resources and Idaho State Historical Society commented on the Draft EIS. None of the agencies' comments specifically addressed the Lava WSA.