

## **5. COMMENTS ON THE DRAFT EA AND RESPONSES**

A total of four comment letters (A-D) were received following circulation of the Draft EA. Copies of these letters are presented on the following pages of this section of the Final EA. On each letter are notations that identify specific substantive comments (A.1, A.2, C.2, D.5, etc.) on the Draft EA.

NEPA requires comments on the Draft EA to be considered in this section provides responses to environmental issues raised regarding the environmental effects of the proposed project. Comments that state opinions about the overall merit of the project or comment on the project description are generally not responded to unless a specific environmental issue is raised within the context of the specific comment made. DOE, the decision-maker in relation to the Proposed Action, considers these comments and responses to these comments on the Draft EA.

The following letters were received:

- A. United States Department of the Interior, Fish and Wildlife Service, Ecological Services, Colorado Field Office, LeRoy W. Carlson, Colorado Field Supervisor. Letter dated March 27, 2003.
- B. Southern Ute Indian Tribe, Tribal Information Services, Edna Frost, Director. Letter dated February 25, 2002.
- C. Jefferson County Planning and Zoning Department, Michael Smyth, AICP, Planner. Letter dated April 14, 2003.
- D. Sentinel and Transcript Newspapers, Golden Transcript, Sabrina Henderson, Golden Editor. Email Message March 24, 2003.

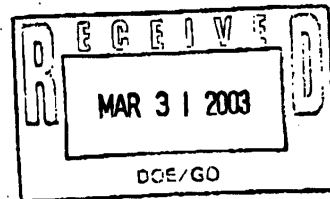
The following discussion provides a response to each substantive comment on the Draft EA. Some responses (A.2, C.29, C.31, C.32 and C.41) involved revising the text presented in the Draft EA. The other comments and responses did not require revising the text of the Draft EA. The text of this Final EA includes the entire text of the Draft EA and the appropriate revisions.

A



United States Department of the Interior

FISH AND WILDLIFE SERVICE  
Ecological Services  
Colorado Field Office  
755 Parfet Street, Suite 361  
Lakewood, Colorado 80215



IN REPLY REFER TO:  
ES/CO: T&E/  
Mail Stop 65412

MAR 27 2003

Ms. Roselle Drahushak-Crow  
NEPA Document Coordinator  
DOE Golden Field Office  
1617 Cole Boulevard  
Golden, Colorado 80401-3393

Dear Ms. Drahushak-Crow:

The U.S. Fish and Wildlife Service (Service) received your Draft Environmental Assessment dated March 5, 2003, regarding the proposed addition and operation of the South Table Mountain Complex in Jefferson County, Colorado. These comments have been prepared under the provisions of the Endangered Species Act of 1973, as amended (16 U.S.C. 1531 et. seq.), the Bald Eagle Protection Act of 1940 (BEPA), as amended (16 U.S.C. 668 et. seq.), and the Migratory Bird Treaty Act of 1918 (MBTA), as amended (16 U.S.C. 703 et. seq.).

Based on the information contained on the disk, the Service believes that the proposed action is not likely to adversely affect any Federally listed species. However, the operation of the complex could have an adverse affect on migratory birds and raptors that utilize the area. Antennas, wind driven turbines and lighting may all have a negative affect on the birds by causing direct mortality and disrupting breeding, nesting and foraging behaviors. In addition, nests may be disturbed during the construction phase and less area will be available for nesting after the complex is completed. The Service recommends that best management practices be implemented to address these issues.

A.1

A.2

Thank you the opportunity to comment on your project. If the Service can be of further assistance, please contact Jeff Peterson at (303) 275-2370.

Sincerely,

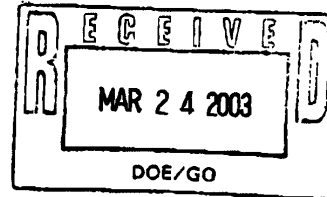
LeRoy W. Carlson  
Colorado Field Supervisor

B



# SOUTHERN UTE INDIAN TRIBE

T R I B A L   A F F A I R S   B U I L D I N G



March 18, 2003

NEPA Document Manger  
Attn: Roselle Drahushak-Crow  
DOE Field Office  
1617 Cole Boulevard  
Golden, CO 80401-3393

Subject: National Renewable Energy Laboratory's South Table Mountain  
Complex (DOE/EA 1440)

Dear Ms. Drahushak-Crow:

I have reviewed your letter of March 5, 2003, and, at this time, believe there are no known impacts to areas of Native American cultural sites that are sensitive to this Tribe in regards to the proposed actions noted on the above location. In the event of inadvertent discoveries of Native American sites, artifacts, or human remains, this Tribe would appreciate immediate notification of such findings.

B.1

B.2

Should you require additional comments or have any questions, feel free to contact me, at the number listed below, extension 2209.

Sincerely,

*Neil B. Cloud*  
Neil B. Cloud  
NAGPRA Coordinator

Cc: Howard D. Richards Sr., Chairman  
Southern Ute Indian Tribe

**C**

**Jefferson County Planning and Zoning Department,  
Michael Smyth, AICP, Planner, April 14, 2003.**

April 14, 2003

Roselle Drahushak-Crow  
NEPA Document Manager  
DOE Golden Field Office  
1617 Cole Boulevard  
Golden, CO 80401-3393

Re: Draft Site-Wide Environmental Assessment of NREL South Table  
Mountain Complex (DOE/EA 1440)  
Jefferson County Case # 02-015051RP

Review of the materials provided yielded the following comments:

**Current Planning:**

Development in this area should be compatible with the goals and objectives outlined in the *Jefferson County General Land Use Plan* and the *Jefferson County Zoning Resolution*.

} C.1

The area in question is zoned as an A-2 District within Jefferson County. Any development may be reviewed as a Site Approval process, and the applicable permits obtained for any projects undertaken.

} } C.2  
C.3

Estimation of traffic impacts within Jefferson County is generally made with a 20-year horizon. County response to traffic generation and future capital project budgets is based in part on these projections. It would be helpful to have traffic and level of service projections for both major and adjacent local intersections.

} C.4

Development in areas with high visual impact is problematic. Introduction of new structures, lighting, and other development activity on the mesa top or in the areas dedicated as conservation easements will have significant impacts. As was noted in the EAS, both local government and the public are sensitive to development that intrudes into the South Table Mountain viewshed as it currently exists. Confining larger structures to Zones 3 through 6 is a thoughtful approach. Limiting the height, bulk, and visibility of structures in Zone 1 is also helpful.

} C.5

Please consider including a member of the Jefferson County Planning and Zoning Department in the Advisory Committee for NREL development.

} C.6

**Jefferson County Department of Health and Environment:**

We have completed our review of the Environmental Assessment for site wide expansion of NREL and have the following comments and questions about these specific sections:

Page 2-15 Laboratory Gases / Fuels:

The second paragraph describes hydrogen tank storage outside of the building, a dedicated Silane storage area located on the north side of the building, and a liquid storage cylinder site located outside of the building. The applicant needs to describe the methods that will be used to secure the storage areas of these tanks.

C.7

Page 2-17 Construction of New and Modification of Existing Facilities and Research Areas:

Along with the Spill Prevention Control and Countermeasure (SPCC) Plan, are there any other protective devices to be added to monitor this system?

C.8

Page 2-21 Operation and Maintenance of New and Modified Facilities:

This section states that environmental monitoring on the site would be performed on an as needed basis and could include the monitoring of off-site control areas. This Department believes that there should be some type of environmental monitoring done on a continual basis due to the materials stored and used on site.

C.9

Page 3-25; Section 3.4.2 Existing Noise Levels and Sources:

It appears that even without a study, the noise issues are of concern to NREL. They have identified and researched this issue. Outside of any alterations to the construction process or traffic flows, the noise levels have been addressed. This Department believes that it would be advantageous to the applicant to monitor these levels both during and after the construction process.

C.10

C.11

Page 3-59, Section 3.10.1 Hazardous Materials:

Page 3-60, Section 3.10.2 Hazardous and Non-Hazardous Wastes:

NREL has developed a comprehensive plan for waste storage, recycling, and disposal in order to reduce and eliminate waste that must be removed and taken to the landfill. The applicant needs to address how these materials are tracked.

C.12

Page 3-67, Section 3.11.4 Sewage Disposal System:

The existing mesa top facility has a septic tank and leach field system, which serves one toilet, one hand sink and one janitor's sink. The Jefferson County Department of Health and Environment (JCDHE) has no record of this system. If possible, it would be appreciated if copies of old permits and other associated paperwork would be forwarded to JCDHE at 1801 19th Street, Golden Colorado 80401, to the attention of Mindi Ramig.

C.13

Page 4-3, Section 4.1.2 Compatibility with Applicable Local Plans, Policies, and Anticipated Future Development:

As stated in the document, local government plans and policies are not applicable to federal lands such as this site. It was explained that South Table Mountain wants to work with local governments and others. They did send out requests for input from these parties concerning the construction. This Department might have missed the fact that the contracted fire service provider was also notified of the changes to the site. From our understanding the contracted agency is West Metro Fire Protection District. We would like to see their comments, or point out to us the section that we missed that includes input from them.

} C.14  
C.15

Page 4-15, Section 4.3 Air Quality:

If for an unknown reason emissions were to exceed expected ambient air quality standards or substantially impact regional air quality, a tool should be available to notify the Colorado Department of Public Health and Environment (CDPHE) and the JCDHE.

} C.16

Page 4-16, Section 4.3.2 Construction Impacts:

NREL's Particulate Emissions Control Plan will be an essential part of the construction process due to the high winds the area is noted to have, which usually blow across the site into residential areas. Their plan has been approved by the State and assigned Permit Number 00JE0009L. Please provide information as to whether this will be monitored on a continual basis after construction.

} C.17

Page 4-24, Section 4.6.1 Surface Water and Stormwater Impacts:

This Department did not observe in this section that the Jefferson County Stormwater Coordinator had been consulted by NREL or had reviewed this assessment. We would suggest that a copy of this report be forwarded to the coordinator, Michelle Delaria (303.271.8454), for review and input.

} C.18

Page 4-35 SPCC Plan:

NREL has developed a SPCC plan to have on site in the case of spills or releases. No further mention was made as to the amount of training employees would have to implement this plan. It would be advantageous to JCDHE that a copy of this plan and training procedures or policies be forwarded to JCDHE 1801 19th Street Golden, Colorado 80401 to the attention of Mindi Ramig.

} C.19  
C.20

These were the items that were noted as we reviewed the document, if there are any questions or concerns please feel free to contact us.

Mindi Ramig, REHS  
Environmental Health Services Division  
Department of Health and Environment  
mramig@jeffco.us  
303.271.5736  
303.271.5760 fx

**Zoning Administration:**

We do not exercise jurisdiction over any Federal projects, and we would not review any plans or issue any permits on the STM site. The following except is from the document that pertains to the County zoning issue.

C.21

*"4.1.2 Compatibility with Applicable Local Plans, Policies, and Anticipated Future Development*

*Although the local government plans and policies are not applicable to federal lands such as the STM site, the following discussions compare the proposed development with local government zoning designations and characterize land use and planning issues that future on-site and off-site development may present.*

*The planned improvements would be considered office or research and development uses, which is inconsistent with the A-2 zoning designation placed on the site by Jefferson County. However, since the proposed uses are consistent with historical and anticipated uses of the site and given that local government policies do not apply to the site, this difference would not be considered a significant impact. In addition, it is anticipated that building setbacks, particularly within Zones 3, 5, and 6, would be generally consistent with local zoning standards and would provide adequate transitions between residential uses and new buildings. These setbacks will vary and will be determined during the site planning process and/or during the final design processes for individual buildings. The conservation easement, as well as utility and trail easements throughout the site, will be preserved. Access via the trail easement corridor through the unsecured portions of the site between the mesa top and off-site residential and park areas will remain open to the public."*

**Engineering Geologist:**

I have reviewed the Draft Site Wide Environmental Assessment for the NREL at South Table Mountain and I have no additional comments.

**Long Range Planning:**

Recommendations and Comments:

- The General Land Use Plan does not make a specific recommendation for this area. Rather, it is labeled as Camp George West. The proposed expansion does not seem to be out of compliance with the Plan's recommendations or assumption that this area would remain the same type of use as it is currently.

C.22

C.23

Site Planning Process...

- We would like a copy of the draft Site Development Plan mentioned in this section.

C.24

Site Development Zones

- Zone 1 should not allow for additional office or laboratory space. We feel that the expansion of SRRL would cause a lot of community concern and anger. Any facilities or equipment should not be lighted.
- Zone 7- Is this area (or will this area be) accessible to the public? How are these cultural resources integrated in the 25-year master plan?

C.25

C.26

C.27

Science and Technology Facility

- Will the expanded facility be reliant on water from Consolidated Mutual? The EA mentions upgrade of domestic water system (p. 2-20) Did the EA consider the availability of water in the entire region?

C.28

C.29

Site Development, Occupancy, and Phasing

- The increase in employment is in compliance with the County's recent efforts to increase the number of jobs in Jefferson County

C.30

Applicable Local Plans, Policies and Anticipated Future Development  
Jefferson County

- The first paragraph is incorrect, as it confuses GLUP with zoning. It should read:  
The Jefferson County General Land Use Plan (GLUP), adopted in 1986, provides policies and land use recommendations for the STM site. GLUP does not provide a specific land use recommendation for the STM site, rather it states the area as Camp George West. The General Land Use Plan is currently being updated, and is expected to be adopted in Fall 2003.  
  
The STM site is currently zoned A2, which permits "general farming, ranching, intensive agricultural uses and agriculturally related uses while protecting the surrounding land from any harmful effects." The minimum lot size for the A2 zone district is 10 acres. ....

C.31

- The intent of the PD AMD district in the City of Lakewood is not listed. It would be different than Jefferson County's PD zone district intent.

C.32

- Lakewood and Golden have an Intergovernmental Agreement designating the areas that will be annexed into either city. The STM site is dissected in this agreement. The County does not compel properties to annex in order to develop.

C.33

Traffic and Circulation

- Does the traffic study identify the need for access to the main gate from Isabell Street? Does Isabell need to be completed to help traffic flow? Can I get a copy of the traffic study? Completing Isabell Street will be studied in the process for updating GLUP.

C.34



Cultural Resources

- This section states the DOE/NREL is consulting with the State Historic Preservation Office. I recommend also consulting with Jefferson County Historical Commission.

} C.35

Environmental Consequences

Land Use Impacts

- Who comprises the NREL Design Advisory Board? It may be good to include a representative from Jeffco on this Board (for unclassified project review).
- A five-story height limit exceeds other uses in the area. A five-story building may block views to South Table Mountain.
- More thought to the impacts to the existing homes should be included in the EA. This will be a big point of controversy with the public.

} C.36  
} C.37  
} C.38  
} C.39  
} C.40

Social and Economic Impacts

- The EA states that no concentrations of minority or low-income populations are located in the vicinity of the site. This is incorrect. The median household income for the area south of the Visitors Center is \$52,422 while the County median household income is \$57,339.

} C.41

Matrix

The increase of impervious surfaces does not seem to be considered in the EA or the matrix. Impervious surfaces contribute to non-point pollution, changes to natural drainage flow, ground water recharge, and urban heat.

} C.42

**Jefferson County Open Space:**

The Open Space Department reviewed this case and had no comments.

**Conclusion:**

Please call me at 303.271.8719 or e-mail at [msmyth@jeffco.us](mailto:msmyth@jeffco.us) with any questions.

Sincerely,

Michael Smyth, AICP

**Sentinel and Transcript Newspapers, Golden Transcript, Sabrina Henderson, D  
Golden Editor, Email Message March 24, 2003.**

-----Original Message-----

From: Sabrina Henderson [mailto:shenderson@jeffconews.com]

Sent: Monday, March 24, 2003 10:14 AM

To: Drahushak-Crow, Roselle; Schmitz, Gary; Public Affairs; Barba, Sarah

Subject: <no subject>

Can someone please give me some information about this proposed new construction on the slope and side of South Table Mountain? I've heard from a stakeholder you all contacted, and I'd like some kind of press release if you have one. Also, please let me know if you have scheduled any public meetings to discuss the proposal. Thanks.

--

Sabrina Henderson

Golden Editor

Sentinel and Transcript Newspapers

303-279-5541, ext. 233

1000 10th Street, Golden, CO 80401

D.1

D.2

**A. United States Department of the Interior, Fish and Wildlife Service, Ecological Services, Colorado Field Office, LeRoy W. Carlson, Colorado Field Supervisor, March 27, 2003.**

**A.1 Response:** The comment is noted.

**A.2 Response:** The following response provides additional information about the Migratory Bird Treaty Act and then provides background information, impact findings and mitigation measures in response to this comment. The related text from Sections 3.8 and 4.8 of the Draft EA have been revised as a result of the following response to this comment.

The Migratory Bird Treaty Act implements various treaties and conventions between the U.S. and Canada, Japan, Mexico and the former Soviet Union for the protection of migratory birds. Under the Act, taking, killing or possessing migratory birds is unlawful. Jefferson County, Colorado encompasses a diverse array of habitats in which 246 bird species have been identified (NDIS, 2000). In and around Golden, Colorado, at least 235 species of birds have been identified and about 90 of those species have been observed on or near North Table Mountain (Foster, 2001). Thirty-five bird species have been identified as present or likely to occur on the STM project area (see Table 3-9). Of these 35 species, 33 are protected under the MBTA, which protects bird species native to North America (USDI/USFWS, 2001). The migratory status of these birds in Colorado includes 20 residents, 5 altitudinal migrants, 7 short distance migrants and 3 neotropical migrants. Additional species, especially during migration, may be present in the STM area. A formal survey of the STM site for migratory birds protected by the MBTA has not been conducted.

Spring migration generally occurs between March and May and fall migration generally occurs between August and October. Migratory bird use on or adjacent to the STM area may include breeding, nesting, foraging, perching and roosting activities. Species most likely to nest in the grasslands include killdeer, common nighthawk, horned lark, and western meadowlark. Species that typically nest in shrubland include green-tailed towhee, Brewer's blackbird, and mourning dove. Other species may nest in trees on or near the STM area including red-tailed hawk, American robin, blue jay, black-capped chickadee, and black-billed magpie.

The STM area provides foraging habitat for all of these species and may be used for perching or roosting by these and other bird species during migration. Raptors may perch on trees while hunting for small mammals and birds located in the grassland and shrubland areas. Other smaller birds, such as the western meadowlark, consume insects that occur in the grassland area.

Breeding generally occurs between May and July. Courtship may begin as early as March for species such as the horned lark. Young birds generally fledge from the nest in August but some species may fledge as late as September (Kingery, 1998).

### **Best Management Practices**

NREL's site planning, decision protocol, and environmental management commitments are described in Section 1.2.3 of the EA. DOE's natural resource commitments are described in Section 1.2.6. In response to potential impacts on migratory bird species, DOE will implement the following BMPs to protect migratory bird species on the site:

- DOE will conduct a field survey of the site for migratory birds and raptors to update existing data and establish general BMPs for the STM site.
- As more specific site plans are developed, DOE will identify any appropriate field surveys needed to clarify potential future impacts and will develop customized BMPs to be applied during and after construction, if necessary. An example of a customized BMP may involve delaying construction until identified nests are no longer being used for the season.

The implementation of these measures is consistent with NREL's overall practices at the STM site and will be incorporated into NRELs environmental management policies and practices.

**Table 5-1. Migratory bird species observed and/or likely to be present within National Renewable Energy Laboratory South Table Mountain Site, Golden, Colorado<sup>1</sup>**

Common Name	Scientific Name	Migratory Status in Colorado <sup>2</sup>	Nest Site			
			Grass/ ground	Shrub	Tree	Other <sup>3</sup>
American crow	<i>Corvus brachyrhynchos</i>	Resident		X	X	
American goldfinch	<i>Carduelis tristis</i>	Resident		X	X	
American kestrel	<i>Falco sparverius</i>	Resident			X	
American robin	<i>Turdus migratorius</i>	Altitudinal migrant			X	
Black-billed magpie	<i>Pica pica</i>	Resident			X	
Black-capped chickadee	<i>Parus atricapillus</i>	Resident			X	
Blue jay	<i>Cyanocitta cristata</i>	Resident			X	
Brewer's blackbird	<i>Euphagus cyanocephalus</i>	Altitudinal migrant		X		
Brown-headed cowbird	<i>Molothrus ater</i>	Short distance migrant			X	
Chipping sparrow	<i>Spizella passerina</i>	Short distance migrant		X	X	
Common nighthawk	<i>Chordeiles minor</i>	Neotropical migrant	X			
Common raven	<i>Corvus corax</i>	Resident				X
Cooper's hawk	<i>Accipiter cooperii</i>	Resident			X	
Dark-eyed junco	<i>Junco hyemalis</i>	Resident	X			
European starling <sup>4</sup>	<i>Sturnus vulgaris</i>	Resident			X	X
Great-horned owl	<i>Bubo virginianus</i>	Resident			X	
Green-tailed towhee	<i>Pipilo chlorurus</i>	Short distance migrant		X		
Horned lark	<i>Eremophila alpestris</i>	Resident	X			
Killdeer	<i>Charadrius vociferous</i>	Altitudinal migrant	X			
Lark bunting	<i>Calamospiza melanocorys</i>	Short distance migrant	X			
Lark sparrow	<i>Chondestes grammacus</i>	Short distance migrant	X	X		
MacGillivray's warbler	<i>Oporornis tolmiei</i>	Neotropical migrant	X	X		
Mountain bluebird	<i>Sialia currucoides</i>	Altitudinal migrant			X	
Mourning dove	<i>Zenaida macroura</i>	Altitudinal migrant		X		
Northern flicker	<i>Colaptes auratus</i>	Resident			X	
Northern harrier	<i>Circus cyaneus</i>	Resident	X			

Common Name	Scientific Name	Migratory Status in Colorado <sup>2</sup>	Nest Site			
			Grass/ ground	Shrub	Tree	Other <sup>3</sup>
Prairie falcon	<i>Falco mexicanus</i>	Resident				X
Red-tailed hawk	<i>Buteo jamaicensis</i>	Resident			X	
Red-winged blackbird	<i>Euphagus cyanocephalus</i>	Resident	X	X		
Rock dove <sup>4</sup>	<i>Columba livia</i>	Resident				X
Say's phoebe	<i>Sayornis saya</i>	Short distance migrant				X
Vesper sparrow	<i>Pooecetes gramineus</i>	Short distance migrant	X	X		
Western bluebird	<i>Sialia mexicana</i>	Resident foothills			X	
Western kingbird	<i>Tyrannus verticalis</i>	Neotropical migrant			X	
Western meadowlark	<i>Sturnella neglecta</i>	Resident	X			

1 Sources: NREL (Dames & Moore) 1999; ERO, 1998; NDIS, 2000; Kingery, 1998; Forum, 1987.

2 Sources: Andrews and Righter 1992, DeGraaf and Rappole 1995

3 Other category includes cliffs, manmade structures, etc.

4 Not protected under the Migratory Bird Treaty Act

## References:

Andrews, R. and R. Righter. 1992. Colorado Birds: A Reference to their Distribution and Habitat. Denver, Colorado: Denver Museum of Natural History.

DeGraaf, R.M. and J.H. Rappole. 1995. Neotropical Migratory Birds: Natural History, Distribution, and Population Change. Ithaca, New York: Comstock Publishing Associates.

DOE and Dames & Moore. 1999. National Renewable Energy Laboratory Site Conservation Easement Baseline Inventory.

ERO Resources Corporation. 1998. South Table Mountain Conservation Easement Baseline Inventory.

Foster, M. 2001. Birds of the Golden, Colorado Area. Table Mountains Conservation Fund, Inc. Available: <http://www.tablemountains.org>. (Accessed April 21, 2003).

Kingery, H. 1998. Colorado Breeding Bird Atlas. Denver, Colorado: Colorado Bird Atlas Partnership and Colorado Division of Wildlife.

Colorado National Diversity Information Source (NDIS). 2000. Jefferson County Species Level Occurrence and Abundance. Available: <http://ndis.nrel.colostate.edu/countyab/index.html>. (Accessed April 21, 2003).

United States Department of the Interior (USDI), Fish and Wildlife Service. 2001. General Provisions; Revised List of Migratory Birds. 50 CFR Part 10. RIN 1018-AB72.

Solar Energy Research Institute, The Forum Associates, Inc. 1987. *Wildlife Report*.

**B. Southern Ute Indian Tribe, Tribal Information Services, Edna Frost, Director, February 25, 2002.**

**B.1 Response:** The comment is noted.

**B.2 Response:** The comment is noted.

**C. Jefferson County Planning and Zoning Department, Michael Smyth, AICP, Planner, April 14, 2003.**

**C.1 Response:** Page 3-7 of the Draft EA states the following: "Although the land use plans and policies of local governments are not applicable to federal lands, these plans and policies set forth important affected environment context for the site and surrounding areas. The Draft EA summarizes applicable local government policies and clarifies how the project would relate to those policies. As stated elsewhere in the Jefferson County letter (Comments C.14 and C.21), Jefferson County does not "exercise jurisdiction over any Federal projects."

**C.2 Response:** The comment is noted (see Response to Comment C.1).

**C.3 Response:** The comment is noted (see Response to Comment C.1).

**C.4 Response:** The traffic study conducted as part of this EA process looked at higher occupancy figures than those presented in the EA (see Section 1.5.1). Although speculative, this higher occupancy could represent a 20-year projection. A copy of the traffic study has been provided to Jefferson County.

**C.5 Response:** The comment is noted. There is no construction proposed in the area designated as a conservation easement. The only development likely in the conservation easement area will be trail construction and maintenance performed by Jefferson County according to the terms of the Conservation Easement Agreement. At this time Jefferson County has not identified any specific trail plans. The visual impact analysis in Section 4.5.1 of the Draft EA is summarized as follows:

The Proposed Action would modify existing facilities and add new features to the STM site that would increase development scale and density at the site, thereby increasing site visibility from numerous off-site vantage points. Although future changes might be noticeable from off-site vantage points, they would not be considered significant adverse visual impacts for the following reasons: 1) the new facilities and features would be reasonably consistent with existing development in the vicinity, 2) views of the mesa top and slopes would not be substantially altered from public vantage points, 3) views from primary public vantage points would not be blocked or substantially degraded, 4) further development of the site as a renewable energy research facility has been anticipated since the STM site was given to DOE by the State of Colorado, and 5) final designs for new development would be subject to review by NREL's DAB and their recommendations would be followed to address visual and aesthetic impacts.

**C.6 Response:** The comment is noted.

**C.7 Response:** Information pertaining to NREL's operations and safeguards can be found on NREL's ES&H website at [www.nrel.gov/esh](http://www.nrel.gov/esh). Specific questions pertaining to areas of Jefferson County jurisdiction can be directed to Maureen Jordan, Senior Environmental Engineer, at 303-275-3248.

**C.8 Response:** Please see response to Comment C.7.

**C.9 Response:** Please see response to Comment C.7.

**C.10 Response:** The comment is noted.

**C.11 Response:** Construction noise impacts are addressed in Section 4.4.1 of the Draft EA, and post-construction operational noise is addressed in Section 4.4.2. NREL construction project managers are sensitive to noise issues and the potential affect on neighbors. Outdoor construction activities that generate noise will be conducted only during daylight hours.

**C.12 Response:** Please see response to Comment C.7.

**C.13 Response:** Pursuant to State of Colorado requirements for Independent Sewage Disposal Systems with a capacity of less than 2,000 gallons per day, NREL/DOE obtained Jefferson County Permit Number 17787 on September 17, 1998 for the sewage disposal system at the Solar Radiation Research Laboratory. A copy of the permit with the County Engineer's signature certifying final inspection has been sent to the Jefferson County Department of Health and Environment as requested.

**C.14 Response:** The comment is noted. Please see response to Comment C.1.

**C.15 Response:** West Metro Fire Protection District (West Metro) is on the distribution list and did receive notification of the Draft EA. West Metro did not provide scoping input and did not comment on the Draft EA. David Abbink, Fire Marshall/Division Chief, provided input to the preparers of the Draft EA in August 2002 (see Sections 3.11.5 and 4.11.5 Emergency Response and Fire Protection). In the referenced conversation, Mr. Abbink stated that no additional off-site infrastructure upgrades would be needed, and the capacity of on-site and local infrastructure and service would not be disrupted by the proposed improvements or new demands for fire protection services.

West Metro routinely inspects the South Table Mountain site and has issued hazardous materials permits to NREL/DOE for every building in which hazardous materials are used or stored.

**C.16 Response:** Please see response to Comment C.7.

**C.17 Response:** Following construction, no ambient air monitoring will be conducted. However, inspections by trained NREL staff to prevent particulate emissions will continue until areas disturbed by construction are permanently revegetated or otherwise stabilized. In compliance with NREL/DOE's coverage under EPA's general permit for storm water discharge associated with construction, NREL's Storm Water Pollution Prevention Program requires that all areas disturbed by construction be permanently stabilized to prevent erosion and airborne particulate emissions (See Section 1.2.3).

**C.18 Response:** Please see response to Comment C.7.

**C.19 Response:** Please see response to Comment C.7.

**C.20 Response:** Please see response to Comment C.7.

**C.21 Response:** The comment is noted. Please see response to Comment C.1.

**C.22 Response:** The comment is noted.

**C.23 Response:** The comment is noted.

**C.24 Response:** The Site Development Plan will be outdated with the completion of the 25-Year General Development Plan (GDP), expected early this summer. NREL will send a copy of the 25-Year GDP to Jefferson County when it is complete.

**C.25 Response:** The comment is noted. The development planned in Zone 1 is limited and associated with specialized activities such as solar collection and solar radiation (see Sections 2.1.1, 2.1.3 and 2.1.4). The Proposed Action includes potentially expanding the SRRL by approximately 1,350 square feet, one-half of its current size. No other buildings are proposed. The other mesa top components of the proposed action could include equipment and infrastructure modifications. All of these changes will "be of minimal size, low occupancy, and designed for minimal disruption to views of the mesa."

One letter expressing community concern about potential development of the mesa top was received during the scoping process (see Appendix B). Except for this comment from Jefferson County, DOE received no other comments reflecting community concern during the public comment period for the Draft EA.

**C.26 Response:** There are currently no plans to make Zone 7 accessible to the public.

**C.27 Response:** NREL has no development plans that would impact these resources and plans to leave them in place as they are today (see Sections 2.1.1, 2.1.3 and 2.1.4).

**C.28 Response:** As stated in the Final EA, NREL plans to obtain water for the S&TF and other development from Consolidated Mutual (see Sections 3.11.3 and 4.11.3).

**C.29 Response:** The EA addressed water supply questions based on information available at the time the Draft EA was prepared, including incremental and cumulative impacts on Consolidated Mutual's water supplies (see Sections 3.11.3 and 4.11.3). Based on consultation with Neal Santangelo, Project Engineer with Consolidated Mutual on April 30, 2003, the water supply issue for the S&TF and other future development is as follows:

- Consolidated Mutual has a tap moratorium in place that applies to new users only.
- NREL's STM Complex is an existing user not subject to the tap moratorium.
- Water supplies, taps and service are available for the proposed S&TF and the other STM Complex development described in the Draft EA.



**C.30 Response:** The comment is noted.

**C.31 Response:** The text of the Final EA has been revised to include the proposed text recommended by Jefferson County (see Section 3.1.2 of the Final EA).

**C.32 Response:** The intent of both the Lakewood and Jefferson County PD Districts was discussed in Section 3.1.2 of the Draft EA in the subsection titled, "Jefferson County." In the Final EA, the intent of the PD District in the City of Lakewood has been moved to the subsection titled, "Lakewood, Golden, Denver West, Pleasant View."

**C.33 Response:** The comment is noted.

**C.34 Response:** The traffic study indicated that the projected growth rate for the STM Complex over the long term (beyond the 5-year time frame of this EA), DOE would need to consider another access route to help traffic flow, in addition to its current Denver West Parkway main entrance. Completion of Isabell Street would be one possible way for DOE to meet this long-term need. DOE has provided Jefferson County with a copy of the traffic study (see response to Comment C.4), and would like to remain informed on the progress of the County's Isabell Street study.

**C.35 Response:** Ms. Stephanie O'Hara from the Jefferson County Planning and Zoning Department is the County Liaison for the County's Historical Commission. Ms. O'Hara was contacted on April 30, 2003. Based on this consultation, a letter summarizing the project's related issues and impacts was requested and then submitted to Ms. O'Hara. No further consultation and coordination was requested.

**C.36 Response:** As described on page 1-15 of the Draft EA, the Design Advisory Board is comprised of professionals in the fields of architecture, landscape, and building design and planning; a member of the Pleasant View community; DOE representatives; and NREL staff.

**C.37 Response:** The comment is noted.

**C.38 Response:** The comment is noted.

**C.39 Response:** The comment is noted. Section 4.5 of the Draft EA states that views from primary public vantage points would not be blocked or substantially degraded. Figure 4-4, photographs 1 and 2, illustrate the approximate perimeter of anticipated development under buildout conditions. The Draft EA states that views of the slopes of South Table Mountain from certain private properties would be blocked and clarifies that those impacts would not be considered significant because development of the site and related infill of the property have been anticipated and the changes would be reasonably consistent with other nearby development on the STM site and elsewhere in the vicinity. Final designs for new development would be subject to review by NREL's DAB, and their recommendations would be followed to address visual and aesthetic impacts.

**C.40 Response:** The comment is noted. The existence of a substantial controversy over the proposed improvements is not supported by scoping letters or by comment letters on the Draft EA. Please see response to Comment C.25 regarding the absence of letters received expressing community concern.

When specific facilities are proposed in the future, additional visual analysis will be conducted through the NEPA process. This analysis will consider the overall NREL planning process, including the work of the DAB.

**C.41 Response:** Based on additional consultation with Jefferson County representatives (Newman, 2003), the actual median household income for Census Tract 101 is \$40,872, not \$52,422 as stated in the letter from Jefferson County. Text in Sections 3.1.4 and 4.1.3 of the Final EA has been modified to indicate that Census Tract 101 should be considered a concentration of low income persons.

**C.42 Response:** Impacts from increased impervious surface at the STM site were addressed qualitatively within the Draft EA. Section 4.6.1 Surface Water and Stormwater Impacts addresses stormwater quantities, runoff, and surface water quality caused by increases in impervious surface. Related impacts on groundwater were addressed in Section 4.6.2 Groundwater Impacts.

Urban heat was not a relevant issue identified during scoping, so impacts on urban heat from an increase in impervious surface were not addressed in the Draft EA.

**D. Sentinel and Transcript Newspapers, Golden Transcript, Sabrina Henderson, Golden Editor, Email Message March 24, 2003.**

**D.1 Response:** Ms. Henderson was contacted by telephone by Mr. John Horst of the DOE Golden Field Office on March 24, 2003. Mr. Horst explained that NREL was opening its Draft STM Site-Wide EA on proposed future development up for public comment. Ms. Henderson determined that she did not need a press release.

**D.2 Response:** No public meetings were scheduled or held specifically for the purpose of discussing the Draft EA. According to Council on Environmental Quality regulations and DOE NEPA implementing guidance, a public meeting is warranted if there is:

- substantial environmental controversy concerning the proposed action, or
- substantial interest in holding a hearing or meeting, or
- a request for a hearing or meeting by another agency with jurisdiction over the action, supported by reasons why it would be useful (40 CFR 1506.6(c)).

DOE's scoping letter and the comments received are presented in Appendix B of the Final EA. The letter distributing the Draft EA for public comment and comments received are presented in Appendix D of the Final EA. All issues identified by the public during scoping or public review of the Draft EA have been addressed in this Final EA.

DOE holds public meetings on a regular basis for the purpose of discussing NREL's initiatives and site development proposals. These meetings are open to all interested member of the public.