

Attachment 1: NPS Response to Public Concerns on the Lava Beds National Monument Draft General Management Plan and Environmental Assessment

INTRODUCTION

The planning team reviewed all comments submitted on the Lava Beds National Monument Draft General Management Plan (DGMP). The following substantive comments were organized and analyzed by topic areas that proved to be a particular area of concern in the public comments. The comments were coded by topic and entered into a database. The planning team grouped similar comments before providing the National Park Service response. Substantive comments are defined by NPS Director's Order 12 (DO-12, Section 4.6A) as one that does one or more of the following:

- (a) questions, with reasonable basis, the accuracy of information in the environmental analysis
- (b) questions, with reasonable basis, the adequacy of environmental analysis
- (c) presents reasonable alternatives other than those presented in the environmental analysis
- (d) causes changes or revisions in the proposal

ACCESS

Public Concern: Concern that the DGMP gave the impression that the Schonchin Butte Research Natural Area would lead to closures.

NPS Response: The monument would continue to manage this site as it has in the past. Currently visitor access is minimal, as this area is not connected to visitor areas and facilities.

Public Concern: Concern that accessibility improvements at Captain Jack's Stronghold could destroy the rugged flavor of the Stronghold and, probably, be extremely costly while benefiting a very small percentage of visitors.

NPS Response: The monument would initiate Section 106 compliance to ensure that accessibility improvements would not have an adverse effect on Captain Jack's Stronghold. Trail improvements would be evaluated in a trail management plan.

Public Concern: What about a shuttle system like at Zion National Park for busy weekends? Could the monument borrow vans from another park that has a different high season?

NPS Response: Monument visitation is too low to financially sustain a shuttle service in any season.

Public Concern: The monument should cooperate with federal, state, county, and local entities to consider upgrading -- perhaps to the point of paving -- the MacDoel-Gold Digger Pass Road as a major entry route to the monument. Saving nearly two hours of travel for visitors from the south, it would also open up the scenic views and resources of adjacent Wildlife Refuge and other lands now virtually impossible for monument visitors to experience.

NPS Response: Developing and improving access to the monument from the Macdoel-Gold Digger Pass Road would have high costs (over one million dollars per mile) and resource impacts. Highway 161 presently provides adequate access for visitors approaching from the west and south.

Public Concern: With more tribal involvement, will sites considered sacred be restricted?

NPS Response: Tribal involvement would not necessarily cause an increase in restrictions to sacred sites. NPS policy recognizes archeological sites as sensitive resources. As such NPS management policies are already somewhat restrictive.

AIR QUALITY

Public Concern: Some commenters expressed concern about the existing impacts of controlled burns on local air quality.

NPS Response: On page 62 of the DGMP, the monument states that it will coordinate with surrounding agencies and private landowners regarding fire management. It should also be noted that the NPS follows federal, state, and county smoke management regulations, policies, and permitting processes regarding smoke management when implementing prescribed fires. The current procedures for prescribed fires over 10 acres are:

- Complete a Smoke Management Plan and obtain a Siskiyou Air Pollution Control District (APCD) permit. The plan and permit contain specific implementation requirements, procedures, and mitigations.
- Prescribed fires will only be conducted on declared days or with additional Siskiyou APCD approval.
- Coordinate prescribed fires with neighboring burners by sending an e-mail to Northeast Air Alliance (NEAA) members a minimum of 1 day prior to burning.
- Participate in the 1300 burn conference call a minimum of 1 day prior to ignition.

Public Concern: On page 170, the DGMP states that "Most air pollution ... comes from external sources as a result of population growth, agricultural burns,"... [but] there has been no population growth here in over 70 years.

NPS Response: The DGMP acknowledges that air quality in the region is very good. This is largely because of the remote nature of area. However, monument air quality is impacted by a region broader than Modoc County. While the Tule Lake basin communities (Tulelake and Newell) may not have experienced population growth, the larger area within a 30+-mile radius continues to grow. Nearby counties such as Siskiyou and Klamath counties, have experienced population growth. Together, Modoc, Siskiyou, and Klamath counties saw a 6% growth rate from 1990-2000. A more modest (4%) growth rate is anticipated between 2005 and 2020.

ALTERNATIVES

The following section includes general concerns regarding the alternative concepts presented in the DGMP. Comments on specific components of the alternatives and suggestions for additional actions to be included in the preferred alternative are described by area or resource-specific topics (e.g. Cave Loop, Petroglyph Point, wilderness).

Public Concern: Several commenters expressed a preference for alternative A, the no action alternative. Primary reasons cited include, the costs associated with the action alternatives, the desire to preserve the character of the monument, concern about development impacts to wildlife.

Response: The NPS has identified alternative B as the environmentally preferred alternative because of its emphasis on research, restoration, education, and resource protection and the beneficial effects of such actions. Although there would be some impacts associated with proposed new facility developments in alternative B, most proposed development activity is located in existing developed areas. Additionally, many of the impacts would be short-term. New facilities and trails would be located only after careful survey and analysis to determine which areas would have the least impact to monument resources. Any impacts would be mitigated per pages 103-108 of the DGMP.

Regarding costs, the implementation of the approved plan does not guarantee that the funding and staffing needed will be forthcoming. The monument will explore alternative means of funding projects if necessary (e.g. partnerships and increased volunteer efforts). Additionally, the plan covers a period of 15-20 years, which represents an investment spread out over time. Within that time frame, it is likely that the federal budget outlook could change.

BICYCLE FACILITIES

Public Concern: The monument should have a bicycle concession, including carts for people with disabilities.

NPS Response: Comment noted. The monument could consider this in implementing its goal to encourage more bicycle use in the monument.

Public Concern: Some commenters raised concerns about encouraging bicycle tourism at the monument and use of bicycles on trails and paths.

NPS Response: The DGMP does not propose bicycle paths or bicycle use on backcountry trails. The preferred alternative encourages bicycle use only on existing monument roads.

BOUNDARY ADJUSTMENTS

Public Concern: Adding a buffer zone along the southern edge of the monument would be better than asking the U.S. Forest Service to administer such a zone. The U.S. Forest Service mandates differ considerably from the NPS mandates.

NPS Response: The NPS does not establish buffer zones. Protection of areas adjacent to monument boundaries is typically accomplished through partnerships, cooperative agreements, and boundary adjustments. As discussed on page 109 of the DGMP, the NPS considered boundary adjustments but determined that cooperative resource management with the U.S. Forest Service was a superior management option.

Public Concern: Commenters presented suggestions for boundary adjustments including: 1) acquisition of a northern boundary strip to include restoration of a significant part of the Lava Beds-Tule Lake shoreline, 2) adjustment of the southeastern monument boundary so as to include a corridor of parkland between the intersection of Monument Road and the Petroglyph section, and 3) the peninsula.

NPS Response: As discussed on page 109, the NPS considered boundary adjustments but determined that cooperative resource management with partner agencies was a superior management option.

CAMPING/ OVERNIGHT ACCOMMODATIONS

Public Concern: New facilities could include expanded camping in the monument for tent campers with several group camp sites for schools, bikers, spelunkers, etc.

NPS Response: The monument will look at more site-specific solutions during implementation and this idea can be explored at that time.

Public Concern: Please do not include a lot of new lighting in the campground area.

NPS Response: NPS policies require that any new lighting be minimal, in order to protect natural lightscapes.

CAVE LOOP

Public Concern: A number of commenters stated that Cave Loop needed more interpretive opportunities and law enforcement/rangers. Suggestions included: in-place waysides, on-site rangers, and cave guides.

NPS Response: All of these suggestions are included in the DGMP's proposals for the Cave Loop. See pages 68 and 78 of the DGMP, *Cave Loop Road*.

Public Concern: The monument should close Cave Loop Road to vehicles and provide information and suggestions on alternate means to access this area.

NPS Response: The majority of visitors to monument use this road. The monument currently closes the road to motor vehicles at night. The monument will encourage other types of access and use (pedestrian and bicycle) through actions proposed in the GMP.

Public Concern: A few commenters suggested that a new foot path around Cave Loop, as proposed in alternative C, should be added to the preferred alternative.

NPS Response: The NPS has added this proposal to the selected alternative. See *errata* for pages 57 and 68 of the DGMP. Site planning and environmental compliance for this trail will be evaluated in a trail management plan.

CAVE MANAGEMENT

Public Concern: Cave research and survey activities are emphasized inadequately in the DGMP.

NPS Response: As found on pp. 67 and 51 of the DGMP, the preferred alternative envisions an expanded research program focused on lava caves. Additionally, cave research is mentioned on page 49, *Actions Common to all Alternatives*.

Public Concern: A number of commenters felt that recreational caving should have been featured more prominently in the DGMP.

NPS Response: Recreational caving will continue to a primary activity for visitors in the monument. Additional language has been added to the selected alternative to emphasize that recreational caving will continue to be a primary visitor opportunity. See *errata* for page 49 of the DGMP. Recreational caving will also be addressed in more detail in the cave management plan.

Public Concern: The monument should consider development of more of the 700 caves in the park.

NPS Response: The monument contains more visitor accessible caves than any other cave park in the national park system. LABE will not be expanding infrastructure in additional caves. Crowding is not an issue in visitor caves. Encouraging access to more caves would cause adverse impacts to those resources.

Public Concern: Preparation of a cave management plan should be stated as a top priority

NPS Response: The cave management plan is underway. Further opportunities for meaningful public input on this plan will be available.

Public Concern: The monument should enter into a Memorandum of Understanding (MOU) with local cave rescue personnel.

NPS Response: This type of action is too specific for the GMP, but could be addressed in the cave management plan.

Public Concern: The GMP should affirm the continued ability of organized cavers and cave researchers to access caves.

NPS Response: Partnerships with caving organizations conduct research will continue to be a priority. The GMP has been revised to acknowledge the past and future role NGOs in areas such as research and interpretation (see *errata*). Of course, access cannot be guaranteed to anyone due to the monument's legal mandate to respond to resource impacts in specific caves or generally.

CITATIONS AND REFERENCES

Public Concern: Concern that some of the photos and illustrations published in the DGMP, particularly those of the U.S. Geologic Survey, were not sourced. Specific references thought to be omitted include: Julie Donnelly-Nolan's geologic map of the monument, Walters and Donnelley, Charles Larson, and USGS Bulletin 1673.

NPS Response: The omission of proper citations was unintentional. The NPS has included proper references in the *errata* section.

CLIMATE CHANGE

Public Concern: The Shasta Group of the Sierra Club would like the monument to integrate the NPS "Natural Resource Adaptation Strategy" into the preferred alternative.

NPS Response: The monument would follow the recommendations of the NPS Natural and Cultural Resource Adaption Strategy to address the potential impacts of climate change. Additional language has been added to the DGMP. See *errata* for page 57 of the DGMP.

Public Concern: The monument should consider information from the Sierra Club's Resilient Habitats Program to address issues that the monument is working on in the GMP. Citation provided:
<http://www.sierraclub.org/habitat/overview/default.aspx>

NPS Response: The NPS appreciates the information provided. The NPS will consider this information as it moves towards implementation of the general management plan.

Public Concern: The Sierra Club urges the monument to work with Modoc NF staff to protect resources outside the monument, especially to the east and west, on the Modoc NF's Callahan and Lavas Inventoried Roadless Areas (IRAs). Both IRAs are contiguous with Monument Wilderness Areas, challenging NPS and USFS with opportunities to work together to protect large blocks of the landscape across agency boundaries.

NPS Response: This suggestion is consistent with the DGMP. The preferred alternative for the GMP calls for more coordination with the U.S. Forest Service to protect resources.

COLLECTIONS

Public Concern: The GMP should provide for storage of all archival materials and museum collections in one place, on-site.

NPS Response: Some museum collections storage in the monument would be expanded where feasible, but may be more cost-effective to retain off-site storage locations, and leverage opportunities with other partner organizations.

Public Concern: Access to collections for the public and interested groups should be increased. Some commenters suggested that more of the monument's museum collections should be displayed to the public, as it was in the past (at the monument's old rock museum).

NPS Response: Greater electronic access to collections is proposed in the preferred alternative. This action is more cost-effective than building a new museum or creating more museum display space. More replicas and photos would be available for educational use and programming. Many of the items (rock samples) that were on display in the old rock museum are currently on display along the Mushpot Cave Trail.

COSTS AND FUNDING

Public Concern: Several commenters expressed concern about the ability to fund actions proposed in the GMP, given the current economic environment. Some commenters suggested that the monument continue current conditions, while others recommended alternative funding approaches such as greater use of volunteers and partnership efforts.

NPS Response: Approval of the general management plan does not guarantee that the funding and staffing needed will be forthcoming. The monument will explore alternative means of funding projects if necessary (e.g. partnerships and increased volunteer efforts). Additionally, the plan covers a period of 15-20 years. Within that time frame, it is likely that federal budget outlooks would change.

Public Concern: The costs presented in the draft are substantially low and would not be appropriate for the final document. A document that will be used in the future to determine additional monument facilities will need to be more accurate or it may not be accomplished.

NPS Response: GMP cost estimates are Class C costs used for comparative purposes only. Additional, more detailed, cost estimates will be completed during implementation.

EDUCATION AND INTERPRETATION

Public Concern: The monument should expand its interpretation of caves and geologic resources. Specific suggestions included: more virtual cave tours, introductory booklet(s) on cave resources, site bulletins on geologic processes, more guided cave tours, visitor center displays, more signage, and cave-specific brochures/guides.

NPS Response: Each of the suggestions is compatible with the DGMP desired conditions for education and interpretation as outlined in the preferred alternative. See pages 64 *Interpretation and Education* and 68 *Cave Loop Road* of the DGMP. It should be noted that general management plans provide broad guidance on interpretation and education. More specific guidance is provided through the monument's Long Range Interpretive Plan (LRIP), completed in September 2010, which identifies priorities and strategies for a 5-10 year time frame. Priorities identified in the current LRIP include: Provide more developed cave tours (more caves, more seasons); increase roving interpretation in caves; create a 3D model virtual cave tour; produce guides & maps for popular caves; and develop new, or adapt existing trail, to become a self-guiding geology trail.

Public Concern: The monument should place more emphasis on cultural resource topics such as prehistory and archeology and cultural landscapes in its interpretation and educational programs. Specific suggestions included: more integrated archeological elements, expanding on the "Time Line"/living history events, and more guided tours focused on rock art, prehistory, etc.

NPS Response: This suggestion is consistent with the preferred alternative desired conditions identified for interpretation and education. The monument will explore more opportunities for expanding living history in implementing the GMP. Additionally, the monument's Long Range Interpretive Plan includes expansion of living history as a short-term (1-3 year priority) for the monument's interpretive program.

In both alternatives B and C of the DGMP, the monument proposes expanding interpretation of cultural landscapes and more recent cultural history. See pages 62 and 75 *Historic Structures and Cultural Landscapes* of the DGMP.

Public Concern: The monument should develop self-guided auto tours to highlight areas of special interest for the visitor. One commenter suggested linking to the National Wildlife Refuge auto-tour.

NPS Response: Development of a self-guided auto tour would be consistent with that goal and could be implemented by the staff over the course of the GMP. The monument is currently considering the development of a geology auto tour or podcast.

Public Concern: Additional brochures at each cave feature will only add to litter and expense.

NPS Response: The monument has received numerous requests over the years from visitors and commenters on the GMP to develop more cave-specific guides which is the reason for including this action in the DGMP. The monument will monitor litter in caves as part of its user capacity program, and will take appropriate management steps if cave guides become a source of litter. The monument would also explore new technologies and media to avoid use of paper as stated on page 64 of the DGMP

FOUNDATION STATEMENT

Public Concern: The Foundation Statement does not adequately address the importance of cave research.

NPS Response: Research is implied in the park purpose statement (. . . protects and interprets features of scientific interest). Research will continue to be a core component of the monument's resource management efforts. The selected alternative recommends a science advisor position be created to facilitate more research opportunities at the monument.

Public Concern: The Foundation Statement does not adequately address the importance of recreational caving.

NPS Response: Recreational caving is included in the monument's fundamental resources and values, one of which is "Public understanding, enjoyment and access to significant park features." Cave resources are significant resources at the monument.

GEOLOGIC RESOURCES

Public Concern: Page 186, *Geologic resources-Impacts from alternative B:* After stating, "The monument staff and Cave Research Foundation (CRF) would likely continue to use existing trails and social trails throughout the monument . . ." why was CRF singled out and other institutions working in the monument ignored?

NPS Response: The monument did not intend to single out any one organization or user group in this analysis. The statement will be modified. See *errata* for page 186 of the DGMP.

LAW ENFORCEMENT AND SAFETY

Public Concern: Some commenters expressed a desire to see goals for safety and law enforcement addressed in the GMP.

NPS Response: The GMP calls for additional staffing to address law enforcement needs. See *Staffing Requirement*, pages 69 and 79. Additionally, the increased educational and interpretive efforts proposed in the DGMP preferred alternative will help to improve visitor safety.

Public Concern: The GMP should address structural fire protection.

NPS Response: Like many NPS units, the monument realized around 2006-7, that a small park could not safely or cost effectively maintain a structural firefighting brigade. The monument thus adopted a more sustainable and cost-effective program of:

- Aggressive fire prevention (annual chimney cleaning in residences, fire extinguisher inspections/recharging in all buildings, smoke alarms etc.)
- Maintaining clear and or irrigated landscape zones around structures to reduce wildfire risks (all roofing is already fire resistant).
- Fire prevention education among employees and residents
- Installation of sprinklers in all monument occupied buildings that did not already have sprinkler systems. In 2009, with the passage of the American Recovery and Reinvestment Act (ARRA), the monument received funding for the sprinkler installation. All of the monument's occupied buildings with the exception of campground restrooms, a curatorial storage building, an entrance station, and a paint storage shed are now sprinkled and equipped with interconnected alarms. .

LEVEL OF DEVELOPMENT

Public Concern: Several commenters expressed a preference for no additional building or structures in the monument. Reasons cited include cost, impacts on the wildness and character of the monument, and potential impacts on wildlife. These commenters generally supported the no action alternative.

NPS Response: The DGMP proposes very few new structures for the monument, including the Petroglyph Point seasonal contact station, and vault toilets at Petroglyph Point and Cave Loop. All other facility improvements would be modest expansions in existing developed areas.

Public Concern: Several commenters suggested that the monument include a rock museum, built in the "old park style" that would include more displays of artifacts. This museum would be similar to one that historically existed within the monument.

NPS Response: The proposed GMP does not propose any new structures (other than vault toilets) in the main monument in an effort to protect viewsheds and monument resources. The DGMP proposes to use the existing visitor center, alternative media, and partnerships with other organizations to provide more displays of artifacts. It should also be noted that many of the rock displays from the old museum are currently on display along the trail to mushpot cave.

NATIVE PLANTS

Public Concern: All alternatives are short on details as to plans/improvements to plant and animal populations. Increased efforts [prescribed burning, juniper cutting and burning, reseeding native grasses and forbs, biological control of invasive, etc.] should be conducted to increase native plants and animal populations while decreasing non-native populations.

NPS Response: General management plans are general in nature because they provide broad guidance for 15-20 years. Specific plans and improvements will be addressed in various implementation plans (e.g. vegetation management plan, resource stewardship strategy, fire management plan).

PALEONTOLOGICAL RESOURCES

Public Concern: There is barely a mention of paleontological resources in the monument. Despite an NPS study reiterating that there are few significant deposits in the monument's caves, the potential for further such deposits are fairly high and should be studied. While such deposits are known from several caves, their remoteness does afford them some protection. Conservation of these deposits is part of the NPS mission, one wonders why nothing has been done to prevent further degradation of these deposits.

NPS Response: Paleontological resources are identified as a fundamental resource and value in the monument's foundation statement. Policies and management direction for paleontological resources are addressed in the *Service-wide laws and policies* section of the DGMP on page 25. More specific management actions will be included in the monument's Resource Stewardship Strategy.

PARTNERSHIPS

Public Concern: The GMP should explicitly recognize the past and ongoing work of NGOs in the monument, including the Cave Research Foundation's contributions to research, knowledge, and the funding of the research center. Persons from the Cave Research Foundation and the various chapters of the National Speleological Society are, and should continue to be, major players for commenting and consulting on monument planning.

Response: The GMP has been revised to acknowledge the past and future role of NGOs in areas such as research and interpretation (see *errata*). The monument looks forward to working with members of the Cave Research Foundation and the various chapters of the National Speleological Society in the implementation of the GMP, and highly values their past participation. Participation of these organizations in the GMP process is documented in Chapter 8 of the DGMP, *Consultation and Coordination*.

Public Concern: The GMP should provide more detail on how interagency collaboration will be achieved. How will the monument facilitate the many steps toward joint interagency management of important issues, e.g., key species, caves and plant communities?

NPS Response: Implementation plans which follow the GMP such as the resource stewardship strategy and the cave management plan will address these topics in more detail. The GMP is meant to provide broad guidance for the monument.

PETROGLYPH POINT

Public Concern: The proposed new road at Petroglyph Point should be paved. Local trucks stir up a great amount of dust on the current road. Placing the parking area well away from the road will not entirely eliminate dust generation.

NPS Response: The primary reasons for choosing to keep the access road to Petroglyph Point unpaved are cost and safety. The cost to pave the road would be more than one million dollars more than an unpaved road. Given the amount of heavy trucks that use this road, the road pavement would need to be exceptionally thick. Additionally, a paved road could encourage increased speeds which could impact safety and wildlife.

Public Concern: The Petroglyph Point fence should allow young birds to cross.

NPS Response: The GMP stipulates that a new fence at Petroglyph Point would allow for wildlife movement. See pages 68 and 78 of the DGMP.

Public Concern: The current parking area at Petroglyph Point is better for individuals who have trouble walking or are further disabled.

NPS Response: Existing access to the petroglyphs is not compliant with the American Disability Act. The DGMP would make access to the petroglyphs compliant. It should also be noted that the proposed site changes at Petroglyph Point are conceptual. Through implementation, the monument will evaluate site-specific alternatives in which accessibility would be a primary goal. There will be opportunities for the public to participate in this process.

Public Concern: Concern about impacts on archeological sites near Petroglyph Point as a result of development proposed in alternatives B and C.

NPS Response: The monument is currently in the process of completing an archeological survey of this area. The results of survey will help to ensure that site design will not impact archeological sites. Additionally, separate environmental compliance will be completed on the site-specific design.

Public Concern: Presently there are no buildings at Petroglyph Point. Erecting structures would totally destroy the experience of the natural wildness of the area for tourists and also for those living near this site.

NPS Response: Petroglyph Point is surrounded primarily by private lands, some of which have large structures that impact the viewshed and feeling of natural wildness. Proposed facilities would not represent a significant change from the current amount of development at Petroglyph Point. Moving facilities away from the petroglyphs will make them less intrusive on the visitor experience. It should also be noted that the proposed site changes at Petroglyph Point are conceptual. There will be opportunities for the public to participate in this process.

Public Concern: Why is night lighting necessary for the proposed structures proposed at Petroglyph Point? Is the development proposed going to be that large and invite vandalism?

NPS Response: The NPS has not yet determined if any lighting would be necessary for the proposed development at Petroglyph Point. This will be determined during implementation as the monument explores more site-specific designs. Any lighting at Petroglyph Point would use low-impact lighting, such as diffused light bulbs, and techniques such as downlighting to prevent light spill and preserve the natural lightscape. See page 104 of the DGMP.

Public Concern: Concern about whether the monument would create a trail that traverses the entire base of the tuff cone itself.

NPS Response: The monument would consider the feasibility of this option during implementation through careful site planning and environmental impact analysis. There will be opportunities for the public to participate in this process.

Public Concern: Petroglyph Point now has a small parking area [on the eastern side] that is difficult for vehicles that do not have a high ground clearance to access. Perhaps a parking area could be located more to the south end of the area since it looks as if that would be a bit more level allowing for easier access and could accommodate a few more vehicles than does the current one.

NPS Response: As described in the DGMP on page 68, the monument would “replace the existing inadequate parking pull-out and improve visitor access to the Coppock Flag.” The monument will explore this suggestion when evaluating more site-specific options for replacing this parking area.

Public Concern: Building a raptor viewing platform here [at Petroglyph Point] would be a waste of resources. Owls are generally found only after checking many nooks and crevasses and a single platform would not be much use for that. As for the other raptors, except for Prairie Falcons, visitors should not expect to be awed by what they see at this location. The basin has many places that are better for viewing raptors.

NPS Response: This proposal has been removed from the selected alternative (see *errata* for pages 57 and 68 of the DGMP). During implementation, the monument will evaluate other means of improving wildlife viewing in this area.

RESEARCH

Public Concern: The GMP should prioritize cave and geologic research, including surveying, as among the most important research objectives of the monument.

NPS Response: Research in the monument, including cave research, will continue to be an important component of resource management. See page 49 of the DGMP, *Actions Common to All Alternatives*. Implementation plans and monitoring efforts will more specifically address specific research topics.

Public Concern: The monument should address, and the GMP should acknowledge, specific research needs (specific topics mentioned include bat maternity actions, ice cave dynamics, cave entrances, cinder cones, and bat roosts).

NPS Response: The GMP wouldn't address these specifically or prioritize specific research projects in order to retain flexibility to meet future management needs. Research needs are better outlined in separate documents such as the resource stewardship strategy and the cave management plan.

ROADS AND PARKING

Public Concern: Do not destroy Powerline-Hardin Butte road, let it go to natural abandonment. People enjoy hiking here.

NPS Response: In the selected alternative, the monument would cease use administrative use of Powerline road and would restore it to natural conditions. It is not part of the monument trail system.

Public Concern: The monument should pave Medicine Lake Road.

NPS Response: Current NPS policy discourages adding additional paved roads to national park units. It should also be noted that the NPS only manages 2.6 miles of this road. The other portions of the road located on U.S. Forest Service land would continue to remain unpaved. Paving Medicine Lake Road would also increase traffic speeds which could result in more wildlife mortality.

Public Concern: Support the repair and paving of Forest Service Road 10.

NPS Response: In 2010, a U.S. Forest Service road repair project applied a new double chip seal surfacing to the southernmost 5 miles of the 10 mile route. While this has significantly improved the driving experience and safety of the road, this treatment is considered temporary (it is only ½" to ¾" thick), and likely will last approximately five years before beginning to deteriorate. The northernmost 5 miles remains in fair to poor condition. The U.S. Forest Service currently does not have any programmed projects to address the remainder of the road, or to re-apply the treatment on the southern portion of the road. NPS policy generally prohibits spending of NPS maintenance project funds outside the park boundaries, so the NPS is not in a position to assist the USFS with these needs.

Public Concern: The monument should construct more pull-outs along the main monument road as proposed in alternative C. Specific suggestions included: 1) along the main road between Canby's Cross and the Stronghold, 2) at the spot where the "Shepherd Trail" meets the main road, 3) between the Devils Homestead Overlook and Gillems Camp, 4) the dirt road between Heppe Cave parking area and the main road, need one or two pull-outs. Pullouts could be paved curbed areas or dirt or gravel areas along the road blocked with big rocks.

NPS Response: If feasible, the monument would provide several parking pull-outs in the vicinity of removed the existing wildlife overlooks to maintain wildlife viewing opportunity in the northern end of monument. Adding additional parking pull-outs to the main monument road would conflict with the monument's goal to reduce visitor reliance on the automobile to enjoy the monument's sites and attractions.

STAFFING

Public Concern: Some commenters expressed the need for increased staff to implement the GMP. Specific suggestions include: 1) staffing at Petroglyph Point, 2) more seasonal staffing, and 3) more interpreters and staff with a background in earth sciences and biology.

NPS Response: The GMP calls for additional staffing to address new needs at Petroglyph Point and to expand staff in the following areas: law enforcement, resource management (including a physical scientist), interpretation and education, and maintenance. See *Staffing Requirements*, pages 69 and 79 of the DGMP.

Public Concern: The monument should establish a program whereby well-educated and trained volunteers could assist in educational and interpretative programs.

NPS Response: The monument will continue to work with volunteers in implementing the GMP. Additional language about volunteers has been included in the selected alternative. See *errata* for page 69 of the DGMP.

Public Concern: The GMP should acknowledge the volunteer contribution of the Cave Research Foundation.

NPS Response: The monument values the volunteer contribution of the Cave Research Foundation. Additional language has been added to the selected alternative to acknowledge this contribution and the role which it will continue to play in implementing the new general management plan. See *errata* for pages 47, 57, 66, and 183 of the DGMP.

SUSTAINABILITY/GREEN TECHNOLOGY

Public Concern: Within the existing disturbed areas, I think much expanded solar [on roof tops] and geothermal energy production could and should be developed without any negative impact to monument resources or programs. All monument needs should be covered and surplus electricity sold on the commercial grid.

NPS Response: The NPS would only consider disturbed areas and existing roofs for the location of solar panels in the administrative and developed zones. Geothermal energy would not be considered due to potential impacts of monument resources and would not be cost-effective given the great depth to hot water and the monument's small amount of energy use.

Public Concern: Suggest adding to the section *Service-wide Laws, Policies and Desired Conditions, Sustainable Facility Design*, on page 27: "All new and rehabilitated facilities shall be fully evaluated based on a full life cycle cost analysis and an appropriate feasibility study."

NPS Response: Life cycle cost analysis for new facilities is already a requirement under existing NPS management policies and is included in bullet ten on page 27 of the DGMP.

Public Concern: Suggest adding to the section *Service-wide Laws, Policies and Desired Conditions, Sustainable Facility Design*, on p.27, bullet 8: "Develop a plan for the establishment, implementation, and maintenance, a "full graphical interface" energy monitoring system for Lava Beds National Monument." Note: It is understood that this is not a "cheap" recommendation. When properly evaluated with a full "life cycle cost analysis", the system will be a major asset for the Monument's entire energy monitoring program and a significant additional asset for the Monument's maintenance staff when problems first occur.

NPS Response: As stated on page 27, the monument will monitor energy usage. The recommended language is too specific for the DGMP which provides broad guidance in this area. However, the monument will carefully consider this suggestion as it works to implement energy goals for the DGMP.

TRAILS

Public Concern: Commenters provided specific suggestions on future trails and trail connections, including a trail along Sheepy Ridge, interagency coordination on trail connections and maintenance, and new trails in wilderness (old Telephone Road alignment and the eastern-Big Crack areas).

NPS Response: The preferred alternative proposes additional coordination with the U.S. Forest Service and U.S. Fish and Wildlife Service to coordinate trail connections and maintenance. Specific trail proposals will be evaluated in a trail management plan.

Public Concern: Concerns about impacts associated with trail expansion were expressed.

NPS Response: The trail locations proposed in the preferred alternative will be further analyzed for feasibility in a trail management plan. The monument will consider potential impacts in determining which trail opportunities are appropriate.

TULE LAKE SEGREGATION CENTER

Public Concern: Several features within the monument have direct bearings on themes related to the World War II Valor in the Pacific National Monument. Perhaps further study on these sites and cooperative education could be encouraged.

NPS Response: In both alternatives B and C of the DGMP, the monument proposes expanding interpretation of 20th century monument history, see pages 62 and 75 of the DGMP, *Historic Structures and Cultural Landscapes*.

Public Concern: How will this plan address Camp Tulelake?

NPS Response: A separate GMP will be completed for Camp Tulelake as part of the Tule Lake Unit of the World War II Valor in the Pacific National Monument. This GMP is scheduled to begin in 2011/2012.

USER CAPACITY

Public Concern: Page 96, *Visible condition of cave features and floors:* Any use will impact these features. Minimizing them will require restoration of CCC-built walkways and trails. Visitors will usually stay within these trails when in the caves and along the approaches to the more well-known caves.

NPS Response: The user capacity indicator and standard for visible condition of cave features and floors suggests: Better marking of established trail systems and evaluation of trail realignment to minimize the formation of social trails. See page 99 of the DGMP. The monument's priority will be to maintain the current condition of trails and the current marking of trail systems. Some trails will also be evaluated for safety.

VISITOR EXPERIENCE

Public Concern: The monument should consider providing areas to view bat flights.

NPS Response: Mass bat flights are among the monument's most spectacular events, but sharing them with the public may endanger the bat population. The monument is exploring the use of filming and other audio-visual means to share bat flights with the public.

Public Concern: The GMP should have considered allowing access to gated wilderness caves such as Post Office using a wilderness pass type system that provides some accountability (to eliminate/reduce vandalism).

NPS Response: Access to specific caves will be addressed in the monument's cave management plan which will be available for public review in the near future. The cave management plan would establish guidelines for long-term management strategies and set resource condition goals for the monument's caves.

Public Concern: Suggest the monument conduct a weekend-long event over the holidays that would integrate various aspects of the monument features with adjoining areas such as the Wildlife Refuge and the Modoc National Forest, e.g. overnight transect of the Medicine Lake Volcano.

NPS Response: This idea is consistent with the monument's preferred alternative which calls for new opportunities to coordinate with surrounding agencies in providing recreational, interpretation, and educational opportunities. The monument will be able to explore this idea during implementation of the DGMP.

VISITOR SERVICES – PUBLIC INFORMATION

Public Concern: A number of commenters suggested that greater attention should be paid to regional tourism.

NPS Response: Further outreach to the tourism community to raise the regional profile of the monument was proposed in alternative C. Although alternative B does not specifically have this goal, expanded regional opportunities and coordination with surrounding agencies may improve the visitor experience and result in new opportunities for regional tourism.

Public Concern: The monument should correct incorrect grammar on its current signage (e.g. the signs for Captain Jack's Stronghold and Canby's Cross since neither indicates plural usage).

NPS Response: The lack of apostrophes is not a grammatical error. The lack of apostrophes follows the U.S. Geological Survey's Principles, Policies, and Procedures for Domestic Geographic Names, by Donald J. Orth, Executive Secretary, Domestic Geographic Names (emeritus) and Roger L. Payne, Executive Secretary, United States Board on Geographic Names and Domestic Geographic Names Online Edition (revised), 2003.

The policy for apostrophes is as follows: Apostrophes suggesting possession or association are not to be used within the body of a proper geographic name (Henry's Fork: not Henry's Fork). The word or words that form a geographic name change their connotative function and together become a single denotative unit. They change from words having specific dictionary meaning to fixed labels used to refer to geographic entities. The need to imply possession or association no longer exists.

WILDERNESS AND BACKCOUNTRY

Public Concern: Given the amount of visitation to backcountry caves, cave exploration and cave research should be paramount in management of the monument.

NPS Response: Cave exploration and research will continue to be an important part of the monument's resource management efforts. Additionally, the monument would take appropriate steps to mitigate initial impacts and monitor use through the user capacity indicator and standards identified in the DGMP.

Public Concern: The monument should have included a wilderness suitability study in the Draft General Management Plan and recommended that the majority of the undeveloped portions of the Lava Beds NM be designated as wilderness. Wilderness designation is one of the best natural resource climate change adaptation strategies.

NPS Response: The monument completed a Wilderness Stewardship Plan in 2006. As a result of that plan, the monument recommended several changes to the current wilderness boundary. The GMP, which began in 2006, adopted the recommendations of the Wilderness Stewardship Plan. It should be noted that although additional wilderness is not proposed or evaluated in this GMP, the vast majority of the monument will be managed as wilderness through the management zoning identified in this plan.

Public Concern: The monument should consider access to the eastern boundary area of the monument. At present, it remains a remote, seldom visited area. With careful planning, perhaps an access point could be made along its length and access made via a minimally developed gravel surface road. Perhaps this could be made in conjunction with a small, minimally developed campsite (dry, but with a vault toilet).

NPS Response: Accessing U.S. Forest Service roads in this area is difficult. Additionally, this portion of the monument is zoned as backcountry. Facilities permitted in the backcountry zone include primitive trails, minimal trail signs, primitive campsites, unobtrusive administrative markers, and temporary monitoring equipment. A primitive campground would be allowable in this zone, but vehicle access to the eastern boundary would not be permitted. Note that the monument will be coordinating with the U.S. Forest Service to explore opportunities for better trail connections across agency boundaries.

WILDLIFE OVERLOOKS

Public Concern: Suggest linking the West Wildlife Viewing area to the Wildlife Refuges' Tule Lake auto tour. Visitors would be able to travel to the refuge area where they are nearest to the water's edge and also get to Captain Jack's Stronghold in the shortest time.

NPS Response: Given the grade difference between the two sites, connecting the roads could cause considerable resource damage.

Public Concern: Some commenters expressed concern about the removal of the monument's wildlife overlooks. Reasons cited include the unique visitor experience offered at these sites (views, wildlife, wilderness/solitude, interpretive opportunities) and the need for parking in this area of the monument.

NPS Response: Removing the wildlife overlooks, facilities which were overdesigned for the amount of use they receive, will greatly reduce maintenance costs. To address the concerns of commenters that value wildlife viewing in this area of the monument, the monument will evaluate the feasibility of providing several parking pull-outs in the vicinity of the existing wildlife overlooks to maintain wildlife viewing opportunities in the northern end of the monument. Pull-outs would provide visitor opportunities with considerably less infrastructure. Potential parking pull-outs will be analyzed and assessed in a site planning study and environmental assessment.

WILDLIFE

Public Concern: Concern that noise from construction machinery would impact wildlife.

NPS Response: As stated on page 104 of the DGMP, the monument would mitigate potential noise impacts through the following measures:

- Implement standard noise abatement measures during monument operations, including: scheduling to minimize impacts in noise-sensitive areas, using the best available noise control techniques wherever feasible, using hydraulically or electrically powered impact tools when feasible, and locating stationary noise sources as far from sensitive uses as possible."
- Site and design facilities to minimize objectionable noise.
- Minimize idling of motors when power tools, equipment, and vehicles are not in use.
- Muffle above ambient noise whenever possible to reduce noise impacts.

Public Concern: The proposed Medicine Lake Geothermal Development will be an unmitigated disaster if it continues to production. In addition, with wildlife watering spots at a premium in the monument and adjacent Forest, removal of water and similar fluids from the porous volcanic soils and rock "upstream" from the monument may well severely impact these resources within the monument.

NPS Response: The monument acknowledges the potential impacts of this proposal on pages 167-8 of the DGMP.

Public Concern: Increased long term biological monitoring needs to be established such as, for example, song bird banding with Klamath Bird Observatory. I suspect increased, long term monitoring of bat numbers and distribution is also warranted.

NPS Response: Long-term monitoring efforts of bats and songbirds will be addressed through the Klamath Inventory and Monitoring Network which has established monitoring protocols and implementation plans for songbirds and bats.

Public Concern: The bat colonies are highly significant but no mention was made of efforts to maintain or increase them.

NPS Response: The preferred alternative states that habitat for all sensitive bat species at the monument would be protected to maintain sustainable population levels. Additionally, the DGMP establishes an indicator and standard for measuring and addressing any changes in the health of sensitive bat populations (see page 100 of the DGMP). Bat population management will be addressed in more detail in the upcoming Cave Management Plan and in the Resource Stewardship Strategy. Long-term monitoring efforts of bats and songbirds will be addressed through the Klamath Inventory and Monitoring Network which has established monitoring protocols and implementation plans for songbirds and bats.

Public Concern: Numerous commenters expressed concern about a statement in the User Capacity section of the DGMP that links the potential spread of White Nose Syndrome to cave visitation. White Nose Syndrome: There is

no scientific evidence of visitors spreading white nose syndrome among bat caves; hearsay "evidence", yes, but no verifiable scientific evidence.

NPS Response: White-nose syndrome (WNS) is recognized as an imminent threat to vulnerable wildlife (bat) resources at Lava Beds National Monument. Bats are a critical ecological component of both the monument's surface and cave environments. Presently WNS is understood to be principally communicable between bats, spread through migration and natural behaviors; however, lines of evidence provided by the U.S. Fish & Wildlife Service and the U.S. Geological Survey suggest the possibility of human to bat infectivity. As directed by the NPS Deputy Director on Sept 7, 2010, Lava Beds is implementing guidance provided in the Memorandum "Revised Guidance on White-nose Syndrome in Bats and Impacts on Cave Use" in order to reduce the chances of the human-assisted spread of WNS in bats. Through the Lava Bed's "2011 White-nose Syndrome Response Plan" the monument will endeavor to reduce the likelihood of any clothing or equipment that was used in or near WNS infected states from being brought to or entering any cave within the monument. This includes gear from staff, researchers, cavers, and visitors.

Public Concern: The GMP should be proactive in addressing White Nose Syndrome. The monument should establish the baseline information for bats and a strategy to address an epidemic.

NPS Response: The DGMP establishes an indicator and standard for measuring and addressing any changes in the health of sensitive bat populations (see page 100 of the DGMP). Management approaches specified include area and/or seasonal closures to protect bat populations. The monument will also be implementing agency-wide policy, as mentioned above, in an effort to prevent the possible spread of this disease to monument bat populations

Public Concern: Page 126-27 - Rare and Sensitive Species: the pika is not mentioned in this listing. Is it not a species of special concern within the monument since its habitat is rapidly shrinking statewide?

NPS Response: The species of pika on the state special animals list is different from the one that occurs at the monument.

Public Concern: The Townsend's Big-eared bat has remarkable roost fidelity. Therefore, it would behoove the monument to continue closure of caves associated with bat maternity activities.

NPS Response: The DGMP establishes an indicator and standard for measuring and addressing any changes in the health of sensitive bat populations (see page 100 of the DGMP). Management approaches specified include area and/or seasonal closures to protect bat populations. Long-term monitoring efforts of bats and songbirds will also be addressed through the Klamath Inventory and Monitoring Network which has established monitoring protocols and implementation plans for songbirds and bats.

