

**Point Arena Mountain Beaver Habitat Protection Project
Manchester State Park
Conditions and Mitigation Monitoring and Reporting Plan
November 2005**

Condition/Mitigation Measure	Timing	Responsible for Implementing Mitigations and Conditions	Responsible for Insuring Implementation	Required for Task to be Complete	Date Completed	Status / Comments
Air Quality						
<u>Air Condition 1</u>						
All active construction areas will be watered at least twice daily during, dry, dusty conditions.	Duration of Project	Contractor	DPR Construction Manager and/or Inspector			
All trucks hauling soil, sand or other loose materials on public roads will be covered or required to maintain at least two feet of freeboard.	Duration of Project	Contractor	DPR Construction Manager and/or Inspector			
All equipment engines will be maintained in good condition, in proper tune (according to manufacturer's specifications), and in compliance with all State and federal requirements.	Duration of Project	Contractor	DPR Construction Manager and/or Inspector			
Excavation and grading activities will be suspended when sustained winds exceed 25 mph, instantaneous gusts exceed 35 mph, or dust from construction might obscure driver visibility on public roads.	Duration of Project	Contractor	DPR Construction Manager and/or Inspector			
Earth or other material that has been transported onto paved streets by trucks, construction equipment, erosion, or other project-related activity will be promptly removed.	Duration of Project	Contractor	DPR Construction Manager and/or Inspector			
Biological Resources						
Mitigation Measure 1 - PAMB						
DPR Environmental Scientist staff will supervise or direct the supervision of all construction/demolition activities for all phases of this project to ensure that all vehicles and equipment avoid PAMB habitat.	Duration of Project	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
Demolition and removal of pit toilets, and filling the holes with crushed rock or sand; construction activities for the proposed connecting road between campsites 9 and 39; and all noise related construction and ground disturbing activities (including manipulation of vegetation, construction of fences, digging, and excavation) between 25 and 100 feet of occupied habitat will occur between July 1 and December 14 to avoid the PAMB breeding season.	July 1- December 14	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			

Excavation and removal of bollards in campsites 12 through 30 and campsites 2 through 46 will be conducted under the guidelines of a Section 10(a)(1)(A) Recovery Permit.	According to the Guidelines of the Section 10(a)(1)(A) Recovery Permit.	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
All ground disturbing activities (including manipulation of vegetation, construction of fences, digging, and excavation) within occupied habitat or within a 25 foot buffer of occupied habitat will be conducted under the guidelines of a Section 10(a)(1)(A) Recovery Permit.	According to the Guidelines of the Section 10(a)(1)(A) Recovery Permit.	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
Removal of asphalt and de-compaction of soil within the existing campground shall be conducted under the guidelines of a Section 10(a)(1)(A) Recovery Permit.	According to the Guidelines of the Section 10(a)(1)(A) Recovery Permit.	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
No trees or other potential predator perching structures will be added to the project area to protect PAMB from aerial predation.	Duration of Project	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
DPR staff will install animal-proof trash and recycling containers throughout the campground and day-use areas to minimized attracting predators to sensitive wildlife areas.	Duration of Project	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
DPR staff will strictly enforce a "no dogs allowed" restriction within PAMB habitat at all times to reduce harassment of PAMB.	Duration of Project	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
In the event that unoccupied PAMB habitat within 100 feet of campsites becomes occupied, these campsite(s) will be relocated to an alternate location within the park. The alternate location will be within the southeast section of the new campground area.	As Necessary	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
To assess impacts to Point Arena mountain beavers and perform, as necessary, measures identified and described by USFWS in the PAMB Recovery Plan and subsequent consultations with USFWS biologists required to avoid "take", DPR staff will perform annual surveys along 100 feet of trails that approach within 100 feet from suitable PAMB habitat to assess project impacts. Surveys shall be conducted to protocol level as specified by USFWS.	Annually	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			

During the application of herbicides, DPR staff will follow all Manufacturers' Safety Data Sheet (MSDS) procedures for the safe handling of herbicides during application to prevent exposure to workers, the public and the environment (specifically Point Arena mountain beaver).	Duration of Project	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
Bio Condition 1 – Wildlife						
To prevent trapping wildlife, all holes and trenches will be covered at the close of each working day with plywood or similar materials, or will include escape ramps constructed of earth fill or wooden planks; all pipes will be capped. A DPR Environmental Scientist, or other staff trained by a DPR Environmental Scientist will inspect trenches and pipes for these species at the beginning of each workday. If a trapped animal is discovered, they will be released in suitable habitat outside the project area.	Duration of Project	DPR Contractor and/or DPR qualified Staff	Project Manger, Resource Ecologist, Construction Supervisor and/or Park Staff			
Mitigation Measure Bio 2 – Behren's Silverspot and Lotis Blue Butterflies						
Trail mowing, brush pruning, and trail maintenance activities that could potentially impact the butterflies will be minimized during larval development. See Appendix C - Manchester State Park Maintenance Parameters to Avoid "Take" of Federally Listed Species.	Duration of Project	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
DPR staff will annually monitor the populations of these plants to determine the extent of potential impacts, positive or negative, this project has on these host plants.	Annually	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
In agreement with USFWS, DPR Environmental Specialists will complete seasonally appropriate field surveys to document presence of the Behren's silverspot. Peak phonological season for the host plant species is typically February through May. Surveys will include geo-referenced spatial information.	February through May	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			

DPR will continue to consult with USFWS and follow their directives for avoiding impacts. In addition, DPR is completing a native Endangered and Threatened Species Recovery Permit application for portions of the project, including the removal of asphalt in the closed campground loop and the treatment of exotic weeds. The Recovery permit will further identify specific measures for monitoring and impact avoidance that DPR will be required to follow	According to the Guidelines of the Recovery Permit	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
Mitigation Measure Bio 3 - Coastal Act-defined Wetlands						
Vehicles will stay on dry ground when accessing the site for Monterey pine removal. A DPR biologist or other trained staff will designate such areas. Vehicles will not enter into the 100-foot buffer from occupied PAMB habitat, unless authorized by USFWS through the recovery permit process. Only vehicles with rubber tires (no tractors or heavy equipment with tracks) will be permitted into the area for tree removal.	Duration of Project	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
Debris of felled trees will be removed from the site. Some larger trunks (greater than 12 " dbh) of felled trees will remain on site, although the branches will be cut and removed from the site.	Duration of Project	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
Some slash will be burned on site once the site has been examined by a State Park biologist. Site examination will include review of the site for special-status plant species. No slash will be burned within a 200-foot buffer of occupied PAMB habitat or where special-status plant species occur.	Duration of Project	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			
Bio Condition 2 - Mendocino County Policy - ESHA						
All facility development, including campsite, restroom, road, and fence installation will be restricted to the area outside of the 100 ft. ESHA	Duration of Project	DPR Contractor and/or DPR qualified Staff	Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff			

<p>Work within the 100 ft. wetland and ESHA will be restricted to habitat restoration activities including removal of invasive trees and removal of paved surfaces and fire rings; reduced maintenance of existing trails as described in the Appendix C "Maintenance Parameters to Avoid Take"; and installation of two interpretive signs, one adjacent to the trail overlooking Davis Lake and a second adjacent to the paved road at Alder Creek. The interpretive signs will be located outside of, but within 50 ft. of the wetland habitat, and will be mounted on posts.</p>	<p>Duration of Project</p>	<p>DPR Contractor and/or DPR qualified Staff</p>	<p>Project Manger, Environmental Scientist, Construction Supervisor and/or Park Staff</p>			
--	----------------------------	--	---	--	--	--

Cultural Resources
Cultural Condition 1- Previously Unknown Cultural Resources

<p>In the event that previously unknown cultural resources (including but not limited to dark soil containing shellfish, bone, flakes stone, ground stone, or deposits of historic trash) were encountered during project construction by anyone, the state representative will put work on hold at that specific location and contractors will be redirected to other tasks. A DPR-qualified archaeologist will record and evaluate the find and work with the state representative to implement avoidance, preservation, and recovery measures as appropriate prior to any work resuming at that specific location.</p>	<p>Duration of Project</p>	<p>DPR Contractor and/or DPR Archaeologist</p>	<p>Project Manger, Cutlural Resource Specialist, Construction Supervisor and/or Park Staff</p>			
<p>In the event that significant cultural resources were found in a project location, a qualified historian, archaeologist and/or Native American representative (if appropriate) will monitor all subsurface work including trenching, grading and excavation in that area.</p>	<p>Duration of Project</p>	<p>DPR Contractor and/or DPR Archaeologist</p>	<p>Project Manger, Cutlural Resource Specialist, Construction Supervisor and/or Park Staff</p>			
<p>In compliance with the Mendocino County Code (Coastal Plan Policy 3.5-10 and Chapter 22.10), if archaeological resources are discovered during construction, work within 100 feet will cease and the Director of Planning and Building Services will be notified.</p>		<p>DPR Contractor and/or DPR Archaeologist</p>	<p>Project Manger, Cutlural Resource Specialist, Construction Supervisor and/or Park Staff</p>			

Cultural Condition 2 - Culturally Sensitive Areas						
"Culturally sensitive" areas designated in the General Plan (Map 4 in GP) will be protected with a 20 meter "buffer zone". No ground disturbing activities including but not limited to staging areas, trail and facilities construction, trenching, and grading will be allowed in these protected areas	Duration of Project	DPR Contractor and/or DPR Archaeologist	Project Manger, Cutlural Resource Specialist, Construction Supervisor and/or Park Staff			
Prior to the start of construction, flagging will be placed around restricted areas to redirect and insure that ground disturbing activities do not inadvertently stray into those zones designated as "culturally sensitive."	Construction	DPR Archaeologist	Project Manger, Cutlural Resource Specialist, Construction Supervisor and/or Park Staff			
Cultural Condition 3 - Plant Removal in Culurally Sensitive Areas						
Hand pulling to remove the ice plant or other invasive plant species will only be allowed in those areas that have received recent archaeological survey coverage for this project. Refer to the archaeological survey report associated with this project for those areas that have received archaeological clearance for hand removal methods of invasive plant species.	Construction	DPR Archaeologist and DPR Environmental Scientist	Project Manger, Cutlural Resource Specialist, Construction Supervisor and/or Park Staff			
Ground disturbing methods (hand pulling) to remove invasive plant species in those areas lacking appropriate archaeological survey coverage will not be allowed in the APE. Only chemical treatments will be allowed in those areas lacking appropriate archaeological survey. If chemical treatments are not suitable then plant removal will not be allowed until an archaeological survey has been conducted in the area.	Construction	DPR Archaeologist and DPR Environmental Scientist	Project Manger, Cutlural Resource Specialist, Construction Supervisor and/or Park Staff			
The method to remove invasive conifer species from the project area will be limited to cutting trees down to ground level. Removal of the roots will not be allowed because of the invasiveness of this technique and the ambiguity of archaeological deposits which most often are contained in subsurface deposits.	Construction	DPR Archaeologist and DPR Environmental Scientist	Project Manger, Cutlural Resource Specialist, Construction Supervisor and/or Park Staff			

<p>A DPR-qualified archaeologist will monitor all plant removal activities in the sand dunes and when determined appropriate in more culturally sensitive areas of the park. If potentially significant resources are unearthed, work in the immediate area of the find will be temporarily halted or diverted until identification and proper treatment are determined and implemented.</p>	<p>Construction</p>	<p>DPR Archaeologist</p>	<p>Project Manger, Cutlural Resource Specialist, Construction Supervisor and/or Park Staff</p>			
<p>The DPR archaeologist assigned to the project will be notified a minimum of three weeks prior to the start of this phase of the project to schedule monitoring, unless other arrangements are made in advance.</p>	<p>Construction</p>	<p>DPR Archaeologist</p>	<p>Project Manger, Cutlural Resource Specialist, Construction Supervisor and/or Park Staff</p>			
<p>Cultural Condition 4 - Human Remains</p>						
<p>In the event that human remains are discovered, work will cease immediately in the area of the find and the project manger/site supervisor will notify the appropriate DPR personnel. Any human remains and/or funerary objects will be left in place or returned to the point of discovery and covered with soil. The DPR District Superintendent (or authorized representative) will notify the County Coroner, in accordance with 7050.5 of the California Health and Safety Code, and the Native American Heritage Commission (or Tribal Representative). If a Native American monitor is on-site at the time of the discovery, the monitor will be responsible for notifying the appropriate Native American authorities.</p>	<p>Duration of Project</p>	<p>DPR Contractor and/or DPR Archaeologist</p>	<p>Project Manger, Cutlural Resource Specialist, Construction Supervisor and/or Park Staff</p>			
<p>If the coroner or tribal representative determines the remains represent Native American interment, the Native American Heritage Commission in the Sacramento and/or tribe will be consulted to identify the most likely descendants and appropriate disposition of the remains. Work will not resume in the area of the find until proper disposition is complete (PRC 5097.98). No human remains or funerary objects will be cleaned, photographed, analyzed, or removed for the site prior to determination.</p>	<p>Duration of Project</p>	<p>DPR Contractor and/or DPR Archaeologist</p>	<p>Project Manger, Cutlural Resource Specialist, Construction Supervisor and/or Park Staff</p>			

<p>If it is determined the find indicates a sacred or religious site; the site will be avoided to the maximum extent practicable. Formal consultation with the State Historic Preservation Officer and review by the Native American Heritage Commission/Tribal Cultural representatives will also occur as necessary to define mitigation measures or future restrictions.</p>	<p>Duration of Project</p>	<p>DPR Contractor and/or DPR Archaeologist</p>	<p>Project Manger, Cutlural Resource Specialist, Construction Supervisor and/or Park Staff</p>			
<p>Geology and Soils Geo Conidtion 1 - Seismic Hazards</p>						
<p>The new, prefabricated restroom buildings will conform to earthquake design requirements for Seismic Zone 4 and a Type A Fault source, as specified in the current edition of the California Building Code. Foundations will be designed to accommodate string ground shaking and possible differential settlement.</p>	<p>Working Drawings, Construction</p>	<p>DPR Contractor or qualified DPR Engineer</p>	<p>DPR Construction Manager and/or Inspector</p>			
<p>State Park staff will inspect the campground facilities, including utility corridors, for damage as soon as feasible after a large earthquake.</p>	<p>As Necessary</p>	<p>Qualified DPR Staff</p>	<p>DPR Construction Manager and/or Inspector</p>			
<p>Geo Condition 2 - Erosion Control</p>						
<p>BMPs will be used in all areas to control soil and surface water runoff during excavation, grading, and trenching. Grading and excavation activities will not be planned during the rainy season (October 31 to May 1), but if storms are anticipated during construction or if construction must occur during winter months, "winterizing" will occur, including the covering (tarping) of any stockpiled soils and the use of temporary erosion control methods (BMPs) to protect disturbed soil. DPR-approved BMPs, such as silt fences, fiber rolls, mulch or other applicable techniques will be utilized. Information on approved BMPs can be found in the Stormwater Best Management Practice Handbook for Construction, available on-line at www.cabmphandbooks.com.</p>	<p>Duration of Project</p>	<p>DPR Contractor</p>	<p>DPR Construction Manager and/or Inspector</p>			

Permanent BMPs for erosion control will consist of properly compacting disturbed areas and re-vegetation of appropriate disturbed soil areas with native species using seed collected locally. Final design plans will include BMPs incorporated into the project.	Duration of Project	DPR Contractor	DPR Construction Manager and/or Inspector			
Hazards and Hazardous Materials						
Hazmat Condition 1						
Staging and stockpile areas will be designated and/or located within the existing maintenance yard area or existing roads and campsites to prevent leakage of oil, hydraulic fluids, etc. into native vegetation or sensitive wildlife areas.	Duration of Project	DPR Contractor	DPR Construction Manager and/or Inspector			
All equipment will be inspected for leaks prior to the start of construction, and regularly inspected thereafter until equipment is removed from park premises.	Construction	DPR Contractor	DPR Construction Manager and/or Inspector			
The contractor(s) and/or DPR will prepare an emergency Spill Prevention and Response Plan prior to the start of construction and maintain a spill kit on-site during project construction. The plan will include a map that delineates construction staging areas, where refueling, lubrication, and maintenance of equipment may occur. In the event of any spill or release of any chemical in any physical form at the project site or within the boundaries of Manchester SP during construction, the contractor will immediately notify the appropriate DPR staff (e.g., project manager, supervisor, or State Representative).	Working Drawings and Construction	DPR Contractor and/or DPR qualified Staff	DPR Construction Manager and/or Inspector			
Equipment will be cleaned and repaired (other than emergency repairs) outside of the park boundaries. All contaminated water, sludge, spill residue, or other hazardous compounds will be disposed of outside of park boundaries, at a lawfully permitted or authorized destination	Construction	DPR Contractor and/or DPR Construction Supervisor	DPR Construction Manager and/or Inspector			
Hazmat Condition 2						
Prior to the start of construction, the contractor will develop a DPR-approved fire safety plan.	Working Drawings	DPR Contractor	DPR Construction Manager and/or Inspector			
Spark arrestors or turbo-charging, which eliminates sparks in exhaust, and fire extinguishers will be required for all heavy equipment.	Construction	DPR Contractor	DPR Construction Manager and/or Inspector			
Vehicles and heavy equipment will be parked away from flammable material, such as dry grass or brush.	Construction	DPR Contractor	DPR Construction Manager and/or Inspector			
Fire suppression equipment will be available within Manchester SP.	Construction	DPR Staff	DPR Construction Manager and/or Inspector			

Hydrology and Water Quality

Hydro Condition 1

Best Management Practices (BMPs) will be used to control erosion and runoff during project construction and post-construction. All storm water inlets in the project vicinity will be protected during ground disturbing activities with silt fences, straw bales, or rice straw wattles as necessary (Refer to Geo Condition 2).	Construction	DPR Contractor or qualified DPR Engineer	DPR Construction Manager and/or Inspector			
The project will comply with all applicable water quality standards as specified in the NCRWQCB Basin Plan.	Construction	DPR Contractor or qualified DPR Engineer	DPR Construction Manager and/or Inspector			
Integration of Hazmat Condition 1 will reduce impacts to water quality from possible pollutants (fuels and other vehicle fluids) released from vehicles and heavy equipment during construction.	Construction	DPR Contractor or qualified DPR Engineer	DPR Construction Manager and/or Inspector			

Noise

Noise Condition 1

Construction activities will generally be limited to the daylight hours, Monday – Friday. No work will occur on holidays or weekends.	Duration of Project	DPR Contractor	DPR Construction Manager and/or Inspector			
Internal combustion engines used for any purpose at the job site will be equipped with a muffler of a type recommended by the manufacturer. Equipment and trucks used for construction will utilize the best available noise control techniques (e.g. engine enclosures, acoustically-attenuating shields, or shrouds, intake silencers, ducts, etc.) whenever feasible and necessary.	Duration of Project	DPR Contractor	DPR Construction Manager and/or Inspector			
Stationary noise sources and staging areas will be located as far away from sensitive receptors as possible. If they must be located near sensitive receptors, stationary noise sources will be muffled to the extent feasible and/or, where practicable, enclosed within temporary sheds	Duration of Project	DPR Contractor	DPR Construction Manager and/or Inspector			