



COLORADO

Parks and Wildlife

Department of Natural Resources

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Colorado Parks and Wildlife
State Trails Program Motorized Grant Cycle
2022-2023 Southwest Region Grant Application Review

There are thirty-two (32) Motorized grant applications within the Southwest Region requesting funding from the State Trails Program for the 2022-2023 process. These applications were sent to Colorado Park and Wildlife (CPW) staff (Area Wildlife Managers, District Wildlife Managers, and Biologists) for review and comment. In addition, the comments were reviewed and discussed by SW Region Staff including Regional Manager Cory Chick, Deputy Regional Manager Matt Thorpe, Regional Land Use Coordinator Peter Foote, and Regional Trails Coordinator Josh Stoudt.

The background information provided below is not intended to be comprehensive discussion on the best available science regarding trail development, trail use, and the subsequent impacts to wildlife. It is, rather, a brief overview of the wildlife management issues CPW Staff considers when evaluating the individual trail grant proposals with the intent to inform and educate the Statewide Trail Committee members and trail grant applicants. Additionally, the CPW published Planning Trails with Wildlife in Mind document (available [here](#)) should be referenced and incorporated into trail planning and stewardship implementation. Finally, individual grant comments and CPW staff recommendations are detailed below.

Background information on trail-related impacts to wildlife

Overall, the public and trail users are poorly informed on the potential impacts of non-motorized trails on wildlife, and how those impacts can manifest themselves into complex management issues for CPW. Surveys have shown that approximately 50% of recreationists felt that recreation was not having a negative effect on wildlife. Furthermore, recreationists tend to blame other recreation groups for adverse impacts to wildlife rather than themselves.

Big Game winter habitats and migratory corridors are known to be limiting factors on big game populations in western Colorado and other high mountain areas of the western United States (Sawyer et al. 2009, Bishop et al. 2009). The protection and conservation of mule deer and elk winter range habitat is one of the foremost management objectives for CPW. These habitats are important for a variety of reasons, including:

1. Deer and elk tend to concentrate at lower elevations during winter months as snow accumulates at higher elevations.
2. Mule deer and elk typically display strong site fidelity to winter range, preferring to use the same areas year-after-year. CPW maps these areas as winter range, severe winter range and winter concentration areas for elk and deer.
3. Winter habitats for big game provide essential forage and thermal cover to help mule deer and elk minimize energy expenditure. Mule deer and elk are in a nutritional negative energy balance during the winter months, making energy conservation critical for calf and fawn survival and adult female reproductive fitness.



Trail Use Impacts

Outdoor recreation associated with trails influences a variety of wildlife species in multiple ways. Impacts to wildlife from trail use are often negative and are associated with increased direct disturbance and displacement from optimal habitat due to the avoidance of human activities (Larson et al. 2016). Elk and deer increase their daily activity levels and movements in the presence of mountain biking and hiking which reduces the time spent feeding and resting (Naylor et al 2009, Wisdom et al. 2004). This increased energy demand occurs simultaneously with decreased forage intake and displacement to areas with poorer quality forage. The net result is a decrease in body condition, which affects individual health, survival and reproduction (Bender et al 2008). Higher energy demand effectively decreases the carrying capacity of an area (Taylor and Knight 2003) and increases stress on individual animals. Many wildlife species also avoid areas of human disturbance completely, which decreases the amount of available habitat (Taylor and Knight 2003). Elk and deer generally do not become habituated to hiking or mountain biking (Wisdom et al. 2004, Taylor and Knight 2003). Cumulatively, this leads to both immediate and long-term effects on individual animals and populations by decreasing the available energy for winter survival, growth, and reproduction, reducing the fitness of wildlife, and by displacing wildlife into marginal habitats (Miller et al 2001, Anderson 1995).

There is a large body of evidence documenting displacement of big game from roads and trails (including non-motorized trails) and a decline in habitat effectiveness from big game as road and trail densities increase (Wisdom et al. 2018, Ciuti et al. 2012, Rogala et al. 2011, Phillips and Alldredge 2000, Preisler et al. 2013). The presence of a dog with a recreationist is likely to result in a greater area of negative influence from trail use, including amplified avoidance distances of mule deer movements (Miller et al 2001).

2022-2023 Motorized Grant Comments: The following are grant specific comments received from CPW Wildlife staff.

4 OHV Trail Dozer Maintenance Program/ GM08 OHV Ouray Trail Crew 2024 (FS): CPW staff recommends that no motorized trail maintenance occurs prior to the seasonal wildlife closure dates.

10 Archuleta ATV Trail Project (Phase 2) (FS): CPW appreciates the ongoing maintenance in this area as the impacts show its need. CPW requests that the Conejos District prioritizes this project with the goal of completing all work prior to the start of big game season. The 741 trail offers one of the few opportunities in the area to access the high country via motorized travel which is popular among many users including hunters.

14 BLM-SLVGO! OHV Trail Crew: The re-designation of trails in the area may face natural challenges due to the surrounding landscape. The landscape is very open and falls within pinyon pine and juniper forest. CPW staff feels that signage alone won't be enough to gain proper user compliance. CPW recommends placing physical barriers, such as rock or gate-restrictors, as limiters where trail use designations change. This would serve as a better deterrent in addition to signage. This may require the construction of turnaround areas for larger vehicles when they arrive at a different trail designation.

Local CPW staff is also seeing an increase of use in the Limekiln area during the winter months. Staff would like to share that information with the BLM field office and the potential need to strike a balance of recreation and wildlife which may include a seasonal wildlife closures for this area.

As the field office continues to look at re-designating routes, CPW requests to be a part of the decision making process and also recommends that these decisions be open for public input.

GM04 Columbine GM OHV Program (FS): In order to minimize displacement of elk in CPW mapped High Priority Habitat (HPH) - Elk Production Areas, CPW requests that all work on upper Jones and Pinkerton-Flagstaff trails does not commence until July 1st. The timing limitation recommendation for Elk Production Areas is May 15th to June 30th and can be found in the CPW's HPH table available [here](#).

We'd encourage early season work to happen on Dutch and Jones Creek trail which should be more ideal due to their lower elevation and drier conditions.

GM16 Divide GM Trail Crew/16 Divide Heavy Maintenance Trail Crew (FS): CPW staff greatly appreciates the communication we have had with the Divide Ranger District (DRD) over the years. Game Management Unit (GMU) 76 is a high quality special draw hunting opportunity with limited availability and is an area where the Divide District conducts trail work. The two agencies have communicated the importance of this area over the years and CPW greatly appreciates the steps the Divide District has taken to limit work in GMU 76. CPW has the following recommendations for GMU 76:

1. Prioritize work to be completed by August 31st. We would like to remind the DRD that archery hunting season starts the beginning of September and muzzleloader starts September 10th this year.
2. If completion of work by August 31st is not possible, work at higher elevations of these trails should be completed as early as possible and work after August 31st should be focused to the lower sections of the trails.
3. Local CPW staff has observed increased impacts on Trail 898 (Shady Creek Trail) due to high use and recent monsoonal rains. CPW recommends that the maintenance of this trail be a top priority this coming season.

GM18 Good Management Trail Crew (FS): The Long Canyon trail section falls within seasonal motorized closures for wildlife from Labor Day to July 1st. CPW Staff recommends that this timing limitation be applied to all trail work in this closure area.

Local CPW staff want to express the need for maintenance on the Beaver Dam trail which joins into Long Canyon. This trail section also falls within the seasonal motorized closures and staff recommends that maintenance is also completed outside of the seasonal closure dates.

Lastly, once the Upper Bench Boggy Trail reroute is completed, CPW staff recommends the old trail section receives reclamation and deterrence measures to prevent future use.

GM19 Uncompahgre (Montrose) OHV Crew 2024 (BLM): The grant application discusses the need to continue GPS inventory of motorized routes in the Paradox Valley ERMA. If this is not being completed

already, CPW staff would like to encourage the overlap with BLM's non-motorized staff so all routes on the Paradox Valley ERMA can be inventoried.

GM24 Dominguez-Escalante and McInnis Canyons National Conservation Areas Trail Crew: The grant application currently calls for new construction in two areas, Farmer's Canyon and the Ponderosa Trail. CPW staff found there to be low impact with the construction of Farmer's Canyon.

The addition of Ponderosa Trail will increase habitat fragmentation in this area which will displace wildlife. Specifically, new trails along the canyon rim leaves limited potential for escape opportunities for wildlife. To offset these impacts, CPW would like to recommend that current and future trails in this area be managed under the area's seasonal closure dates.

No wildlife specific comments were received on the following applications:

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| 01 Dozer 24 Project, Dolores Ranger District | 02 Calico North Trail Project Dolores Ranger District |
| 06 Canyon Creek Trail Reconstruction | 08 TMW Trail Support 2024 |
| 19 Pagosa Excavator 2023-2024 | 20 GJFO Equipment Operator |
| 24 GVRD Heavy Equipment Crew | 39 Subcontractor Trail Maintenance 23-24 |
| 40 Supply and Equipment Grant 23-24 | GM03 Good Management Trail Crew 20 |
| GM06 2024 BLM Gunnison OHV Trail Crew | GM14 Tres Rios OHV Crew 2024 |
| GM17 2 Person OHV Trail Management Crew | GM20 Grand Junction FO Good Management |
| GM25 OHV Gunnison Trail Crew 2024 | 05 STW COHVCO 2024 OHV Workshops |
| 22 STW Colorado 4x4 Rescue & Recovery | 30 STW Travel Management Signage |
| 31 STW Stay The Trail Education & Stewardship Alliance | 37 STW TPA Stewardship Videos |
| 38 STW BLM Statewide (OHV) Law Enforcement | GM21 STW OHV Statewide Trail Crew |

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