# UNITED STATES DEPARTMENT OF THE INTERIOR

Bureau of Land Management Burns District Office Andrews Resource Area Finding of No Significant Impact

South Steens
Herd Management Area
Population Management Plan
Environmental Assessment
DOI-BLM-OR-B070-2013-0027-EA

#### INTRODUCTION

The Burns District has prepared an environmental assessment (EA) to analyze gathering and removal of excess wild horses and implementation of population control measures on wild horses from the South Steens Herd Management Area (HMA) in order to achieve a thriving natural ecological balance and manage the wild horse population within appropriate management level (AML) over a 10-year time frame. Various methods of gathering and removal of wild horses are available (i.e. helicopter drive trapping, bait/water trapping, horseback drive trapping). The method(s) to be used will be determined by the authorized officer.

## SUMMARY OF THE PROPOSED ACTION

The proposed action, Alternative A, is designed to manage wild horse populations over a 10-year time frame and will incorporate 2 to 3 gather cycles. Implementation of the proposed action will begin in the fall of 2015.

Based on the June 2012 census, which counted 383 horses, and assuming a 20 percent population growth rate, the estimated wild horse population by fall 2015 will be approximately 662 adult wild horses (plus 132 foals). An exact annual population growth rate is not available for this herd so a 20 percent population growth rate is used based on the National Academy of Sciences (NAS) (2013) explanation that growth rates approaching 20 percent or even higher are realized in many horse populations (p. 55). This annual population growth rate includes both survival and fecundity rates (NAS 2013, p. 55). The first portion of the proposed action will be to gather 90 percent of the total wild horse population and remove excess horses down to the low end of AML. Ninety percent of the herd is gathered in order to 1) select horses to return to the HMA to re-establish the low end of AML and 2) to remove excess wild horses that will be prepared for the adoption program. This will mean if horses were gathered in 2015, approximately 715 horses, roughly 90 percent of the estimated herd size based on current estimates, will be gathered using the helicopter-drive method. Approximately 503 excess adult wild horses will be removed from the South Steens HMA, included those that have strayed outside the HMA boundary, to reestablish the herd size at the low end of AML (159 animals). No horses found outside of the HMA will be returned to the range. For future helicopter gathers under this 10-year plan, the number of horses gathered and excess removed will be adjusted based upon the estimated herd

size at the time of the gather. Each helicopter gather will take approximately 1 week. The Bureau of Land Management (BLM) will plan to gather as soon as holding space becomes available and BLM's Washington D.C. Office (WO) gives authorization. The gather will be initiated following public notice on the Burns District webpage <a href="http://www.blm.gov/or/districts/burns/index.php">http://www.blm.gov/or/districts/burns/index.php</a>.

Bait/water as well as horseback and helicopter drive trapping would be used as tools to remove excess horses in areas where concentrations of wild horses are detrimental to habitat conditions or other resources within the HMA, to remove wild horses from private lands or public lands outside the HMA boundary, to selectively remove a portion of excess horses for placement into the adoption program, or to capture, treat, and release horses for application of fertility control. Bait/water, horseback or helicopter drive trapping would be conducted as needed between normal helicopter drive gather cycles. Bait/water trapping and horseback and helicopter drive trapping operations could take anywhere from 1 week to several months depending on the amount of animals to trap, weather conditions, or other considerations. Operations would be conducted either by contract or BLM personnel.

Site-specific removal criteria were never set for South Steens HMA; therefore, animals removed from the HMA will be chosen based on a selective removal strategy set forth in BLM Manual Section 4720.33.

Captured wild horses will be released back into the HMA under the following criteria:

- Released horses will be selected to maintain a diverse age structure of 80 mares and 79 stallions (159 total = low AML), approximately a 50/50 sex ratio.
- Released horses will be selected to maintain the saddle horse conformation. The
  most common colors of pinto-variations, buckskins, duns, and rcd duns will have
  higher priority over the less common colors present.
- Approximately 60 mares (75 percent), age 2 or older, will be selected to be returned to the HMA after receiving fertility control treatment. These mares will be transported to the Burns Wild Horse Corrals Facility (Burns Facility) where they will receive the first injection (primer dose) of their 2-injection native porcine zona pellucida (PZP) treatment. PZP is the most common form of immuno-contraception which stimulates the production of antibodies that bind sperm receptors on the egg's surface, thereby preventing sperm attachment and fertilization (AG Sacco 1977, Nunez et. al. 2010). Mares will be held at the Burns Facility and provided hay and water for 2-6 weeks until given the second liquid PZP injection as well as 3- and 12-month time-release pellets (PZP-22). This holding period is derived from The Science and Conservation Center's protocol for initial PZP treatment (2006). Mares treated with PZP will be documented via physical description or will be hip marked for future identification. The BLM will then return the mares to the HMA. After an initial primer and booster vaccination, any mare captured during future gather operations will receive a booster of native PZP or time release pellets and be immediately returned to the range, unless population objectives cannot be achieved without the removal of a previously treated mare. This type and method of fertility control treatment will be used in the initial gather but may be adjusted as advancements are made in available and

approved fertility control treatments and methods. PZP will be administered following Instruction Memorandum (IM) No. 2009-090, Population-level Fertility Control Field Trials: Herd Management Area (HMA) Selection, Vaccine Application, Monitoring and Reporting Requirements.

Post-gather, every effort will be made to return released horses to the same general area from which they were gathered.

A list of specific project design elements is included in the proposed action.

BLM will conduct 1 to 2 future gathers, 4 to 5 years following the initial proposed gather, over a period of the next 10 years (following the date on the decision record (DR) for this document). This 10-year timeframe enables BLM to determine the effectiveness of the proposed action at successfully maintaining population levels within AML in South Steens HMA. During the 10-year time frame, helicopter gathers will be carried out under the same (or updated) standard operating procedures (SOP) as described in the Wild Horse and Burro Gathers: Comprehensive Animal Welfare Policy (IM No. 2013-059) and the same selective removal criteria, population control measures, release criteria, and sex ratio adjustment strategies will be applied as described in the section above. Adaptive management will be employed that incorporates the use of the most promising methods of fertility control (as long as they are approved for use and available). Future gather dates and target removal numbers for gathers within the next 10 years will be determined based on future population surveys and a determination that "excess" horses exist within the HMA. A notice to the public will be sent out 30 days prior to any future gather.

Following the initial proposed gather to return the population to within AML, adaptive management will be used to maintain a thriving natural ecological balance with periodic gathers within the HMA over the next 10 years. "Adaptive management is about taking action to improve progress toward desired outcomes." (<a href="www.doi.gov/initiatives">www.doi.gov/initiatives</a> 2007). Knowing that uncertainties exist in managing for sustainable ecosystems and healthy wild horse populations, adjustments to the location and populations of wild horses within the HMA may be implemented. Examples of "adjustments to locations and populations of wild horses" may include: to supplement normal helicopter gather cycles, bait/water, horseback or helicopter drive trapping may be used to relocate or remove horses outside the HMA or to reduce wild horse numbers in areas experiencing heavy utilization levels (>50 percent current year's standing crop) or other documented resource damage due to excessive concentrations of wild horses. Bait/water, horseback or helicopter drive trapping could also be used to apply fertility control to reduce the population growth rate between gathers.

#### Monitoring would include:

A. The BLM contracting officer's representative (COR) and project inspectors (PIs) assigned to the gather will be responsible for ensuring contract personnel abide by the contract specifications and the gather SOPs described in the Wild Horse and Burro Gathers: Comprehensive Animal Welfare Policy (IM No. 2013-059).

- B. Aerial population surveys as well as ongoing monitoring of forage condition and utilization, water availability, and animal health would continue on the South Steens HMA. Aerial inventories are conducted every 2-3 years for each HMA on Burns District. Population estimates for South Steens will be updated as inventories are conducted in the future.
- C. Genetic monitoring will also continue following gathers and/or trapping. If genetic monitoring indicates a loss of genetic diversity, the BLM will consider introduction of horses from HMAs in similar environments to maintain the projected genetic diversity.
- D. Fertility control monitoring will be conducted in accordance with the population-level fertility control treatments SOPs found in IM No. 2009-090, Population-Level Fertility Control Field Trials: Herd Management Area [HMA] Selection, Vaccine Application, Monitoring and Reporting Requirements.

## DETERMINATION OF SIGNIFICANCE

The Council on Environmental Quality's (CEQ) regulations provide that the significance of impacts must be determined in terms of both context and intensity (40 CFR §1508.27). An analysis of the context and intensity of the proposed action follows.

- A. Context: In accordance with CEQ regulations found at 40 CFR §1508.27(a), the significance of an action must be analyzed in several contexts such as society as a whole (human, national), the affected region, the affected interests, and the locality. Significance varies with the setting of the proposed action. For instance, for a site-specific action, significance would usually depend upon the effects in the locale rather than in the world as a whole. Both short-term and long-term effects are relevant.
  - The BLM has determined that the context of the proposed action is 423,640 acres which include the South Steens HMA (134,490 acres) and a 5-mile buffer (289,150 acres) surrounding the HMA boundary. This area includes interspersed State, private and U. S. Fish and Wildlife Service (USFWS) lands. The proposed action only applies to 1 HMA out of 6 in Burns District, 17 in Oregon, and a total of 179 in the United States.
- B. Intensity: The following analyzes the intensity of the proposed action utilizing the 10 significance criteria described in CEQ regulations found at 40 CFR §1508.27(b):
  - Impacts that may be both beneficial and adverse. The EA considered potential beneficial and adverse effects. Project Design Elements were incorporated to reduce impacts (EA, p. 13).

Livestock Grazing Management (EA, p. 58): Reducing and maintaining the wild horse population within AML would result in some level of reduced competition between livestock and wild horses for available forage and water. The combination of returning a 50/50 sex ratio and fertility treatment on 75 percent of the mares would result in a slower increase in the wild horse population, allowing livestock to fully utilize all of their permitted animal unit months (AUM) for a maximum period of time. Helicopter gather activities could result in direct effects by disturbing and dispersing the livestock present for a period of 5 to 7 days.

Noxious Weeds (EA, p. 67): Reducing and maintaining the wild horse population within AML would allow the desirable vegetation to be more vigorous and competitive and provide less opportunity for new weed infestations. The fertility treatment may lengthen the time before horse numbers return to high AML which would allow the vegetation a longer time period in which to recover. Trap sites would be highly disturbed but would be monitored for 2 years, with any noxious weeds found treated in a timely manner using the most appropriate methods.

Fish and Special Status Species, Riparian Zones, Wetlands, and Water Quality (EA, p. 52): The proposed action would reduce the number of horses in and near riparian areas. As a result, riparian areas would continue to make progress toward achieving Rangeland Health Standards. In turn, fish habitat improves as riparian conditions improve. Achieving AML for wild horses would also accelerate improvements of upland plant communities and increase capture and infiltration capability.

Social and Economic Values (EA, p. 70): Comments received from the public for BLM gathers over the past few years have emphasized the desire for BLM to increase the use of fertility control in order to reduce the number of wild horses that have to be removed from the range or maintained in long term holding. Costs associated with the proposed gather and implementation of the fertility control would be incurred under the proposed action. However, the cost and frequency of gathers would decrease if more effective fertility control treatments become approved and available for use on BLM wild horses.

Livestock permittees would be able to continue grazing their cattle at permitted levels if the wild horse population was maintained within AML, further securing the possibility of economic benefits (i.e. income) for those permittees. This would contribute to the local economy through taxes, the purchase of supplies, and other contributions to the local communities.

When horse numbers are kept within AML, BLM is able to manage for a natural ecological balance. Horses would have enough forage and water to maintain a healthy body condition throughout the year, which is what the public wants to see, no matter if they are opposed to or proponents of gathers.

Soils and Biological Soil Crusts (BSC) (EA, p. 77): Removal of excess wild horses would prevent large areas of compaction and BSC loss and the application of fertility treatment would slow down the reproduction rate with the same outcome. Removal and slowing the growth rate would also prevent over-grazing by wild horses. Loss of vegetation exposes soils and BSCs to wind and water erosion which would lead to excessive loss.

<u>Upland Vegetation (EA, p. 61)</u>: Reducing wild horse numbers to the low end of the AML would reduce the chance of over-grazing of vegetation after livestock are removed from the pastures. Applying the fertility vaccine would slow down the reproductive rate which would reduce the grazing pressure over a longer period of time, giving native vegetation a greater stronghold and preventing annual grasses from becoming more firmly established.

Wild Horses (EA, p. 30): Reducing and then maintaining wild horse numbers within AML during the 10-year time frame of the proposed action using approved and available fertility control along with gathers when horses are found to be in excess of the high end of AML would reduce the risk of horses experiencing periods of diminished available forage and/or water (i.e. during drought). Having a plan in place would allow BLM staff to monitor and take appropriate action when needed, before an emergency situation arises. Using adaptive management that involves incorporating the use of the most promising methods of fertility control (as long as they are approved for use and available) may allow BLM to extend the years between gather cycles while continuing to maintain numbers within AML and providing for a thriving natural ecological balance. Extending a gather cycle based upon a slowing of the population growth would extend the time between stressful events, such as gathers, put on horses.

Wild and Scenic Rivers (WSR) (EA, p. 78): Returning the wild horse population to AML would ensure overall outstanding resource values (ORV) for WSR segments in the South Steens HMA are maintained for the following reasons:

Scenic: Gathering operations would have no effect on the Scenic ORV because gathering wild horses does not affect landforms or naturalness. Geologic: Gathering operations would have no effect on the Geologic ORV because gathering wild horses has no impact on rare, unusual, or unique geological features.

Recreational: The effects to the Recreational ORV would be helicopter over-flights while wild horses are being gathered which would affect

recreation activities during the gather operation. The sights and sounds of helicopters herding or searching for horses could disturb visitors who may be hunting or bird-watching or searching for solitude. Once the wild horse gather has been completed there would be no more impacts to the Recreational ORV.

Fish: Gathering operations would have no effect on the Fish ORVs because trap locations typically are placed on dry land. However, horses crossing the South Fork of Donner und Blitzen WSR while being herded may disturb the bank and river bottom while they are crossing. The impact to fish ORVs is not measurable because the disturbance is small relative to the size of the river. See Fish section for further details on individual fish populations.

Wildlife: Gathering operations would have no effect on the Wildlife ORV as they would have no effect to diversity and overall population of wildlife. The ORV would remain unchanged and therefore unaffected.

Vegetation: Gathering operations would have no effect on the Vegetation ORV because the diversity of plant communities would remain unchanged during and after the gather.

Wilderness (EA, p. 82): The proposed action would enhance a unique wilderness value by managing the wild horse population in a manner that imposes the least impact onto wilderness character. Under the proposed action, helicopter drive trapping and bait/water and horseback drive trapping would occur in the wilderness. The 2012 BLM 6340 Management of Designated Wilderness Areas (Section 1.6.C.20) allows normally prohibited uses when they are necessary to meet the minimum requirements for administering the area for the purpose of the Wilderness Act or where the uses are required under the Wild Free-Roaming Horse and Burro Act of 1971.

Wilderness Study Areas (WSA) (EA, p. 87): Helicopter drive trapping, bait/water and horseback drive trapping would occur in WSA. The 2012 BLM Manual 6330 Management of Wilderness Study Areas provides for wild horse and burro populations to be "[M]anaged at appropriate management levels so as to not exceed the productive capacity of the habitat (as determined by available science and monitoring activities), to ensure a thriving natural ecological balance, and to prevent impairment of wilderness characteristics, watershed function, and ecological processes. The BLM should limit population growth or remove excess animals as necessary to prevent the impairment of the WSA" (BLM Manual 6330, Chapter 1.6.D.10.a.).

Wildlife and Locally Important Species (EA, p. 65): Some wildlife could be temporarily disturbed or displaced by the helicopter or by placement of traps. Impacts would be short term (2 weeks) and many species of wildlife would return to regular use of the areas after the disturbance has passed.

Reduction of wild horse numbers to AML would reduce utilization of forage and water resources by horses, reducing competition for these resources and allowing for improvement of habitat conditions for wildlife species.

Special Status Species and Habitat - Sage-grouse (EA, p. 93): Horse numbers would be reduced to AML reducing occurrences of large areas of uniform utilization at heavy intensities on a year-round basis. Residual grass cover provides horizontal screening at nest sites, in addition to screening from shrubs, which is believed to reduce predation. Maintaining wild horse numbers within AML would aid BLM land managers in their ability to provide quality sage-grouse habitat in the quantities needed for their survival and the growth of populations.

- 2. Degree to which the proposed action affects public health and safety. Every gather day is considered a public observation day unless the agency representative/authorizing officer has made a decision to temporarily close or restrict access on public lands due to availability of gather observation sites, safety concerns, or other considerations relevant to individual gather observations. Gather operations involve some level of inherent risk due to both the nature of working with wild animals and risks associated with normal helicopter operations. Risks are highest near the trap-site area. The BLM generally allows members of the public an opportunity to safely view gather operations from designated observation areas near the trapsite and at temporary holding facilities, but they must be escorted to those areas by BLM personnel. The BLM follows the policy and procedures established in IM 2013-058 Wild Horse and Burro Gathers: Public and Media Management for safe and transparent visitation by the public/media at wild horse and burro gather operations.
- Unique characteristics of the geographic area such as proximity to historic or cultural resources, park lands, prime farmlands, wetlands, wild and scenic rivers, or ecologically critical areas. Other unique characteristics for the South Steens HMA include the Redband Trout Reserve (RTR), Fish and Riparian Areas, Special Status Species (SSS), Livestock Grazing Management, Wild and Scenic Rivers (WSR), Wilderness, and WSAs. See Section 1 above for related impacts.
- 4. The degree to which effects on the quality of the human environment are likely to be highly controversial. Controversy in this context means disagreement about the nature of the effects, not expressions of opposition to the proposed action or preference among the alternatives. The most common controversies identified through scoping are the effects of the application of PZP and the argument that bait trapping is safer for the horses than helicopter drive trapping. The effects of treating mares with PZP are fully analyzed in the EA starting on page 37. The effects of bait

- trapping as compared to helicopter drive trapping are discussed in the EA starting on page 31.
- 5. Degree to which possible effects on the human environment are highly uncertain or involve unique or unknown risks. Helicopter drive trapping as well as bait/water and horseback drive trapping are not new methods of capturing wild horses and have been successfully completed for decades. There are no uncertain or unknown risks to the human environment associated with these capture methods. PZP and other fertility control treatments may involve controversy (see question 4 above) but there are no uncertain or unknown risks to the human environment associated with their application.
- 6. Degree to which the action may establish a precedent for future actions with significant impacts or represents a decision in principle about a future consideration. This project neither establishes a precedent nor represents a decision in principle about future actions outside the 10-year time frame analyzed. The proposed action only applies to wild horse population management in the South Steens HMA over a 10-year time period. The Steens Act provided a unique opportunity to conserve, protect, and manage the long-term ecological integrity of the CMPA. In addition, gathering, removal, and other approved methods of population control of wild horses are ongoing and expected actions as outlined in the AMU/CMPA RMP/ROD (2005) and as analyzed in other EAs. No long-term commitment of resources causing significant impacts was noted in the EA or RMP.
- Whether the action is related to other actions with individually insignificant but cumulatively significant impacts. The environmental analysis did not reveal any cumulative effects with significant impacts as discussed starting in Chapter III of the EA (p. 20).
- 8. Degree to which the action may adversely affect districts, sites, highways, structures, or objects listed in or eligible for listing in the National Register of Historic Places. There are no features within the project area listed or eligible for listing in the National Register of Historic Places. However, as part of the project design features identified in the attached EA, trap sites would be inventoried for cultural resources prior to being set up. Sites eligible for listing in the National Register of Historic Places within the areas of effect of trap sites would be avoided to mitigate potential effects.
- The degree to which the action may adversely affect an endangered or threatened species or its habitat. There are no known threatened or endangered species or their habitat affected by the proposed action or alternatives.

10. Whether an action threatens a violation of Federal, State, or local law or requirements imposed for the protection of the environment. The proposed action and alternatives do not threaten to violate any law. The proposed action is in compliance with the AMU/CMPA RMP (2005), which provides direction for the protection of the environment on public lands.

## FINDING

On the basis of the information contained in the EA and all other information available to me, it is my determination that: 1) The proposed action and alternatives are in conformance with the AMU/CMPA RMP/ROD (August 2005); 2) There would be no adverse societal or regional impacts and no adverse impacts to affected interests; and 3) The environmental effects, together with the proposed project design features, do not constitute a major Federal action having a significant effect on the human environment as defined by the tests of significance found at 40 CFR 1508.27. Therefore, an EIS is not necessary and will not be prepared.

Rhonda Karges

Andrews/Steens Resource Area Field Manager