



U.S. Department of the Interior
Bureau of Land Management

NATIONAL WILD
HORSE & BURRO
ADVISORY BOARD

Grand Vista Hotel
2790 Crossroads Blvd.
Grand Junction, Colorado

October 18 – 19, 2017

Executive Summary

U. S. Department of the Interior
Bureau of Land Management

Executive Summary

The Wild Horse and Burro Advisory Board (Board) (Table 1) advises the Secretary of the Interior, the Bureau of Land Management (BLM) Director, the Secretary of Agriculture, and the Chief of the U. S. Forest Service (FS) on matters pertaining to the management and protection of wild, free-roaming horses and burros on the Nation's public lands.

NATIONAL WILD HORSE & BURRO ADVISORY BOARD MEMBERS	
Board Member	Representing
Mr. Fred T. Woehl, Jr. (Chair)	Public Interest (Equine Behavior)
Ms. Ginger Kathrens	Humane Advocacy
Mr. Ben Masters	Wildlife Management
Mr. Steven Yardley	Livestock Grazing
Ms. Jennifer Sall	Public Interest
Dr. Julie M. Weikel	Veterinary Medicine
Ms. June Sewing	Wild Horse & Burro Advocacy
Mr. James French	Natural Resources Management
Dr. Sue M. McDonnell (Vice Chair)	Wild Horse & Burro Research

Table 1 - National Wild Horse and Burro Advisory Board Members

During its October 18 – 19, 2017, meeting held in Grand Junction, Colorado, the Board received updates from BLM on several different areas pertaining to the management of wild horses and burros, which are summarized below.

In her opening remarks, Ms. Kristen Bail, BLM's Assistant Director for Natural Resources and Planning and the Board's Designated Federal Official stressed the importance of private/public partnerships in the future of BLM's wild horse and burro program. She noted that Congress (1) granted BLM authority to establish a new tool, the BLM Foundation, which will assist the agency in meeting its multiple use mandate and (2) charged BLM in the Fiscal Year (FY) 2017 Appropriations Act, to prepare and submit a plan to "achieve long-term sustainable populations on the range in a humane manner." In turn, the President's FY 2018 Budget Request asks Congress several crucial and difficult questions (below) about the program.

- What tools provided in the *Wild Free-Roaming Horses and Burros Act of 1971* (Public Law 92-195) does Congress want BLM to use?
- How can BLM achieve and maintain AML?
- How can we reduce program costs?
- How can we have a sustainable, long-term future that has healthy horses on healthy rangelands for the long-term?

Mr. Greg Shoop, BLM Colorado's acting State Director welcomed the Board to Colorado and provided an overview of BLM Colorado, which is responsible for managing over 8 million surface acres of public land and 27 million acres of subsurface Federal mineral estate. BLM Colorado's public lands contributed more than \$4 billion and 23,000 jobs to the Colorado economy in 2016, including energy development and recreation, which are large economic drivers in Colorado.

Mr. Shoop stressed the importance of working closely with a diverse group of stakeholders, partners, and advisory boards and councils to ensure a thriving natural ecologic balance between wild horses and the many other uses outlined in the agency's multiple-use mandate. Mr. Shoop highlighted efforts of the Great Escape Mustang Sanctuary (GEMS) and the Sand Wash Advocate Team (SWAT), which greatly increased what can be done on the ground to benefit wild horses and the land on which they live.

Mr. Shoop was followed by Ms. Laria Lovec, BLM Colorado’s Wild Horse and Burro State Lead, who addressed BLM Colorado’s wild horse and burro program in more detail. In summary, there are three Herd Management Areas (HMA) (Piceance-East Douglas, Sand Wash, and Spring Creek Basin) and the Little Books Cliff Wild Horse Range northeast of Grand Junction.

Ms. Lovec highlighted eight BLM partnerships who provide vital assistance and resources to the agency as well as the animals both on and off the range. Off-range activities include establishment of the state’s first “store front” program, working with GEMS and Colorado Correctional Industries in training and adopting animals into good homes, and forming the *Spirits of the West 4-H Club*. On-range partnerships provide critical assistance in monitoring animals on the ground as well as implementing population growth control programs.

Ms. Kristen Bail explained that the BLM postponed taking specific action on the Board’s September 2016 recommendations until the Board could provide input and feedback concerning the Report to Congress addressing the future for a sustainable wild horse and burro program.

In addressing BLM’s national wild horse and burro program, Mr. Dean Bolstad, Chief of BLM’s Wild Horse and Burro Division in Washington, D. C., provided an overview of BLM’s history and mission, various legal mandates pertaining to the wild horse and burro program, BLM’s land use planning process, and program specifics [i.e., population numbers, removal and population growth trends, AML, management tools, and challenges (overpopulation, rangeland degradation, animals leaving management areas, etc.) facing the program.]

Mr. Alan Shepherd, BLM’s On-Range Branch Chief in Reno, NV, provided an overview of BLM’s on-range activities including removal of 4,209 animals and providing immune-contraception to 841 animals in FY 2017. While a complete FY 2018 gather schedule cannot be developed until BLM receives its FY 2018 budget, the agency is moving forward on removing 1,623 animals from rangelands prior to December 8, 2017. Mr. Shepherd’s update also addressed BLM’s research efforts and ongoing litigation.

Ms. Holle' Waddell, BLM’s Off-Range Branch Chief, provided updates addressing several areas including off-range facilities, Internet adoption website, adoption demand study, private care placement team activities, development of an adoption and sale brochure, eco-sanctuaries, correction center programs, the Mustang Heritage Foundation partnership, and FY 2015 to FY 2017 adoption and sale figures.

Mr. Michael Reiland, Wild Horse and Burro Program Budget Analyst in BLM’s Washington Office, provided an overview of BLM’s FY 2017 program expenditures, budget implications of recent actions (i.e., moving animals from short-term to long-term holding facilities), and the average “per unit” cost for several program elements.

Ms. Hope Woodward from the FS provided an overview of the agency’s national wild horse and burro program, which involves 34 active territories encompassing approximately 2.1 million acres. Ms. Woodward also summarized the agency’s staffing and budget, management capacity and planning, on- and off-range activities, program updates and accomplishments, administration, grants and agreements, and litigation.

In the afternoon of Day 1, Dr. Chad Boyd from the United States Department of Agriculture (USDA) Agricultural Research Services gave a presentation addressing the effects of feral horses on soils and vegetation in sagebrush and riparian plant communities.

Dr. Albert Kane, a veterinarian from the USDA Animal and Plant Health Inspection Service addressed currently available contraceptives and sterilization techniques for wild horses and burros.

Colorado Wild Horse Partnerships

<u>Organization</u>	<u>Focus</u>
Great Escape Mustang Sanctuary	Off-Range
Sand Wash Advocate Team.....	On-Range
Friends of the Mustangs	On-Range
TJ Holmes.....	On-Range
Burro Base Camp	Off-Range
Spirits of the West 4-H Club	On-Range
Mustang Heritage Foundation	Off-Range
Colorado Correctional Industries.....	Off-Range

In closing the first day of the meeting, 51 speakers were given opportunity to address the Board with their thoughts, comments, and concerns during the meeting's public comment period.

The second day of the meeting began with a joint presentation by Ms. TJ Holmes, Ms. Michelle Sander (GEMS), Ms. Stella Trueblood (SWAT), and Ms. Stephanie Linsley (GEMS), addressing the fantastic accomplishments of their respective organizations in working in partnership with BLM.

Dr. Terry Messmer from Utah State University provided a summary of the *National Wild Horse and Burro Summit* held in Salt Lake City, Utah on August 24, 2017, including the results of a survey of Summit attendees in addressing questions related to managing wild horses and wild burros.

Ms. Mary Jo Rugwell, BLM Wyoming's State Director, gave a presentation entitled *What are the Key Elements of a Sustainable Wild Horse and Burro Program?* addressing BLM's approach to developing a Report to Congress, which was requested by Congress in the FY 2017 Appropriations Act. The presentation asked the Board for feedback on nine important questions.

1. How can the BLM achieve AML within all HMAs with 5 – 10 years?
2. How can the BLM sustainably maintain AML within all HMAs?
3. How can the BLM reduce and control holding costs for excess animals?
4. How can the BLM significantly increase annual adoptions and sales of wild horses and burros?
5. How can the BLM continue to ensure humane treatment of wild horses and burros?
6. How can the BLM use best available science to improve management of wild horses and burros?
7. What humanitarian assistance opportunities exist for wild horses and burros?
8. How can the BLM better provide information to the public?
9. How can the BLM increase public participation and financial support in the management of wild horses and burros on and off the range?

After the presentation, the Board completed a brainstorming process identifying different ideas that responded to each of the nine questions.

Following the brainstorming session, the Board developed six formal recommendations, which will be presented to the BLM, addressing various aspects of the wild horse and burro program.

Recommendation #1: The National Wild Horse and Burro Advisory Board recommends the Wild Horse and Burro National Advisory Board have their next meeting in Washington, D.C., and present their most recent recommendations, including those presented in September 2016, to agency officials. Tentatively to be scheduled early in the calendar year, but before the middle of March 2018.

Recommendation #2: The National Wild Horse and Burro Advisory Board recommends BLM phase out long-term holding over the next 3 years and apply that budget to on-range management and adoptions.

Recommendation #3: The National Wild Horse and Burro Advisory Board recommends BLM create funding mechanisms to maximize adoptions and/or sales, especially through successful programs, and to include international adoptions and/or sales.

Recommendation #4: The National Wild Horse and Burro Advisory Board recommends BLM increase wild horse and burro funding for reversible fertility control by \$3M in FY 2019.

Recommendation #5: The National Wild Horse and Burro Advisory Board recommends BLM immediately (within the next 3 years) follow the Wild Horse and Burro Act and remove excess animals from the range to achieve AML. Further, BLM will use the help and assistance of all state and local agencies, organizations, and individuals in achieving AML.

Recommendation #6: The National Wild Horse and Burro Advisory Board recommends BLM maintain AML by using fertility control to slow population growth at levels where removals equal the adoption demand.

Recommendation #7: The National Wild Horse and Burro Advisory Board recommends BLM adjust AML where appropriate.

Acronyms

The following acronyms were used during the meeting and listed in alphabetical order.

<u>Acronym</u>	<u>Meaning</u>
AML.....	Appropriate Management Level
BLM.....	Bureau of Land Management
FS.....	U. S. Forest Service
GEMS.....	Great Escape Mustang Sanctuary
FY.....	Fiscal Year
HMA.....	Herd Management Area
SWAT.....	Sand Wash Advocate Team
USDA.....	U. S. Department of Agriculture



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Volume 1

Day 1 Meeting Minutes

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Wednesday, October 18, 2017

Welcome and Introductions

Dr. Julie Weikel, Chair, acting Wild Horse and Burro Advisory Board

Dr. Julie Weikel called the meeting to order at 8:05 a.m. by welcoming everyone and noting that there were many exciting topics to address. Dr. Weikel expressed the Board’s appreciation to the *Friends of the Mustangs* organization for yesterday’s fantastic field tour, which clearly demonstrated their love for the animals as individuals.

Dr. Weikel introduced the Board members (Tab 1 and Attachment 1). Mr. Woehl and Ms. Sall were unable to participate in the meeting, while Dr. McDonnell participated via telephone. While each member represents a different interest, Dr. Weikel stressed that all Board members understand and comprehend all aspects of the wild horse and burro program (Program).

NATIONAL WILD HORSE & BURRO ADVISORY BOARD MEMBERS	
Board Member	Representing
Mr. Fred T. Woehl, Jr.	Equine Behavior
Ms. Ginger Kathrens	Humane Advocacy
Mr. Ben Masters	Wildlife Management
Mr. Steven Yardley	Livestock Grazing
Ms. Jennifer Sall	Public Interest
Dr. Julie M. Weikel	Veterinary Medicine
Ms. June Sewing	Wild Horse & Burro Advocacy
Mr. James French	Natural Resource Management
Dr. Sue M. McDonnell	Wild Horse & Burro Research

Table 1 - National Wild Horse and Burro Advisory Board Members

Mr. Dean Bolstad acknowledged the Bureau of Land Management (BLM) employees in the room as well as representatives of other Federal agencies (U. S. Forest Service (FS) and U. S. Animal and Plant Health Inspection Service, (APHIS). Mr. Bolstad also recognized Mr. Jim Dollarshell of the *Friend of the Mustang* organization for his dedication to the wild horse and burro program. In his 42-year career with BLM, Mr. Bolstad has never seen such dedication and cooperation in working with BLM as he saw during yesterday’s field tour. The *Friends of the Mustang* organization have been working closely with BLM for the past three years, donating over 2,000 to 4,000 volunteer hours annually to accomplish Porcine Zona Pellucida (PZP) darting operations to help control the growth of the horse population.

Agenda Review

Kathie Libby, Facilitator, BLM

Ms. Libby, serving as the meeting’s facilitator, introduced herself and noted that the Board has serious issues to address but it is important to interject humor and smiles into the conversation. Everyone in the room are human beings trying to make progress in difficult areas. The Board greatly appreciates those who attend in person as well as those watching via livestreaming on the Internet. To ensure everyone is heard, Ms. Libby reminded the Board and speakers to use their microphones. She reviewed the rules of the meeting, which included the importance of being respectful of others to ensure work can be accomplished, voices can be heard, and respect can be paid.

Ms. Libby reviewed the agenda for the meeting and noted the public comment period will begin at 3 p.m. this afternoon. Two hours have been set aside for the public comment period; therefore, the amount of time each speaker will be given may be limited to approximately two to three minutes depending on the number of individuals wishing to speak. Individuals wishing to provide comments to the Board were asked to sign up no later than 2:45 p.m.

Opening Remarks

Kristin Bail, Designated Federal Official, Assistant Director for Resources and Planning, BLM



Ms. Kristin Bail

Ms. Bail thanked the Sand Wash Advocate Team (SWAT), who donated over 2,000 volunteer hours in 2016, for yesterday's field tour of the Little Book Cliffs Herd Management Area (HMA). During the tour, the successes, logistical challenges, and on-the-ground realities were discussed. It was a very informative and Ms. Bail appreciated hearing from the people completing the work on-the-ground.

People locally as well as many others across the United States work with the Bureau of Land Management (BLM) to achieve and maintain Appropriate Management Levels (AML). Private/public partnerships are crucial and will be more crucial as we address the future of the wild horse and burro program. Congress granted BLM authority to establish an important new tool, the BLM Foundation (Foundation), which will assist the agency in meeting its multiple use mandate. Ms. Bail believes the wild horse and burro program will have a strong relationship with the Foundation long into the future. She is looking forward to working with the Foundation's Board of Director once they are established to expand the agency's capacity for partnership efforts across the nation.

Congress also charged BLM, in the Fiscal Year (FY) 2017 Appropriations Act, to prepare and submit a plan to "achieve long-term sustainable populations on the range in a humane manner." The plan will be developed using input and feedback from many sources, including the Board's discussions at this meeting. Ms. Bail is looking forward to hearing the Board's discussions and contributions on this very important matter.

Since the Board last met in November 2016, in Elko, Nevada, there have been some important changes – a new Board member (Mr. James French), two members (Mr. Fred Woehl and Dr. Sue McDonnell) were reappointed; and a new Administration including a new Secretary of the Interior who has been interested and engaged in the wild horse and burro program. Discussions have addressed what has been done in the past, what is being done now, and what might be possible in the future.

Ms. Bail offered her personal welcome to Mr. French and expressed her appreciation for everyone's flexibility and patience with the recent nomination/selection process.

The President's FY 2018 Budget Request asked Congress several crucial and difficult questions (below) about the program.

- What tools provided in the *Wild Free-Roaming Horses and Burros Act of 1971* (Public Law 92-195) does Congress want BLM to use?
- How can BLM achieve and maintain AML?
- How can we reduce program costs?
- How can we have a sustainable, long-term future that has healthy horses on healthy rangelands for the long-term?

Ms. Bail looks forward to the Board's discussions concerning the program, its challenges, creating a sustainable future, and opportunities for involving private/public partnerships. She believes it very important to have dialogue about the challenges facing the program. Everyone involved in the program has strong, passionate, and important perspectives and the Advisory Board serves as an important tool for sharing those perspectives. The future of the program will require everyone's personal involvement and commitment, which is being demonstrated by everyone in the meeting today.

Dr. Weikel thanked Ms. Bail for her comments and her continued participation at Board meetings as BLM's highest-ranking representative in the room. Dr. Weikel indicated that Ms. Bail will be an asset in helping the Board to navigate the process leading to effective change.

Welcome & Introduction to Colorado

Greg Shoop, Acting Colorado State Director, BLM



Mr. Greg Shoop

Mr. Greg Shoop, welcomed the Board by expressing his appreciation of the magnitude of the challenges that are before the Board and the Board's dedication and service to the Program.

Mr. Shoop expressed his pleasure for being able to travel and work within a state that has such diverse landscapes and issues, and to work with staff and managers who are so well qualified and dedicated to meeting the agency's mission. He believes the diversity of landscapes and uses in

Colorado reflect the resources across BLM's national landscape, but believes they are better in Colorado. BLM Colorado manages over 8 million surface acres of public land and 27 million acres of subsurface Federal mineral estate.

The lands in Colorado that are managed for the public vary from red rock canyons to wide open sagebrush country as well as some 14,000-foot peaks, which is unique in BLM. These lands and the activities on them are important contributors to the economy in Colorado. BLM Colorado's public lands contributed more than \$4 billion and 23,000 jobs to the Colorado economy in 2016. Energy development is a large economic driver in Colorado to which the BLM contributes significantly. Recreation is also a growing economic driver, which has phenomenal recreation resources and a growing population that lives here to enjoy the great outdoors. The BLM in Colorado is proving to be a great investment in recreation dollars contributing approximately \$200 in economic output for every \$1 of recreation budgeted for BLM Colorado.

BLM has responsibility for managing and protecting America's wild horses and burros on areas of the public lands where they existed when the act¹ was passed. In Colorado, there are three HMAs (Piceance-East Douglas, Sand Wash, and Spring Creek Basin) and the Little Books Cliff Wild Horse Range, northeast of Grand Junction.

BLM has the most challenging mandate of any Federal land management agency, managing lands for everything from energy development to recreation to wilderness, grazing, wildlife habitat, and many other resource programs and resources. The decisions made to manage the public lands affect many people. We simply can't manage these lands without working closely with our diverse stakeholders, partners, advisory boards, and advisory councils. We work to ensure a thriving natural ecologic balance between wild horses and the many other uses outlined in our multiple-use mandate. To achieve this, we work with many partners and friend groups on a variety of programs and projects such as trail clearing; spring development and maintenance; tracking horse numbers, locations, and range conditions; and training horses and hosting adoptions. In 1986, BLM and the Colorado Department of Corrections formed a partnership creating the Wild Horse Inmate Program in Canon City, where select mustangs are trained by inmates who undergo both classroom and on-the-job training through an accredited college curriculum. Since inception of the program, more than 3,000 inmates have gentled or trained more than 5,000 animals gathered from western rangelands.

Our partnership with groups such as SWAT and Great Escape Mustang Sanctuary (GEMS) have greatly increased what can be done on the ground to benefit wild horses and the land on which they live. Given the relatively small size and geography of some areas, fertility control has shown promise as an effective method to manage reproduction levels within many of our HMAs. We are working with multiple partners to apply fertility control treatments to mares in the Spring Creek Basin and Sand Wash HMAs as well as the Little Book Cliffs Wild Horse Range. Mr. Shoop gratefully acknowledged the assistance of committed and engaged members of the public, such as those in the room today, who

BLM's Mission Statement

"is to manage the public lands to sustain the health, diversity, and productivity of the public lands for the use and enjoyment of present and future generations."

¹ Wild Free-Roaming Horses and Burros Act of 1971.

believe in BLM's mission, love the public lands, and are willing to invest time and energy to help BLM complete its important work.

Mr. Shoop also thanked the Board for their continuing cooperation and dedication to improving wild horse management on the public lands. Mr. Shoop encourage the Board and others to take an extra day to enjoy the public lands in Colorado, where there are tremendous recreation and other resources to enjoy, including several National Conservation Areas and the Colorado National Monument managed by the National Park Service.

Colorado Wild Horse & Burro Program

Laria Lovec, Wild Horse and Burro Specialist, BLM



Ms. Laria Lovec

Ms. Laria Lovec welcomed the Board to colorful Colorado and introduced Mr. Steve Leonard (off-range) and Ben Smith (on-range), who collectively with Ms. Lovec comprise BLM Colorado's wild horse and burro team responsible for overseeing the State's program.

HMA & Wild Horse Range Overview

BLM Colorado is responsible for managing three HMAs - Piceance-East Douglas, Sand Wash, and Spring Creek Basin and the Little Books Cliff Wild Horse Range all of which are in the western portion of the state (Figure 1).

Sand Wash Basin HMA

SWAT has actively been involved with the PZP darting program during which 100 mares were vaccinated in 2017. A bait-trap gather was completed in 2017 removing 42 animals, which were adopted through two adoption events sponsored by GEMS.

Piceance – East Douglas HMA

This is Colorado's largest and most challenging HMA. There is a partnership group being formed with the intention of implementing a PZP darting program, which will be challenging considering the rugged terrain.

Spring Creek Basin HMA

The single grazing allotment in the Spring Creek Basin HMA, which is the smallest of the three HMAs, has either been closed to livestock grazing or is considered a vacant allotment.

Little Book Cliffs Horse Range

The Little Book Cliffs Horse Range was established in 1980 following removal of all livestock grazing in the late 1970s. The *Friends of the Mustangs* group was formed in 1982, and have been extremely involved in management of the horse range since its formation.

Table 2 (next page) provides more detailed information on each HMA and the Little Book Cliffs Horse Range.

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Figure 1 - Colorado HMAs and Horse Range

General Herd Management Area Information								
HMA	Acreage	Appropriate Management Level		Estimated Population	Grazing Allotments Involved	Habitat Concerns	Partnerships	Implemented Actions
		Low	High					
Sand Wash Basin	154,940	163	362	650	4	Priority & General Sage-Grouse Habitat	Sand Wash Advocate Team	PZP Darting Program
Piceance – East Douglas	190,130	135	235	740	4	General Sage-Grouse Habitat	None	None
Spring Creek Basin	21,932	35	65	65	1	None	TJ Holmes	PZP Darting Program
Little Book Cliffs Horse Range	36,113	90	150	155	None	None	Friends of the Mustangs	PZP Darting Program

Table 2 - General Herd Management Area Information

Drought Outlook

Based on National Oceanic and Atmosphere Administration’s Climate Prediction Center, a small area of Colorado is experiencing drought (Figure 2), which affects the Little Book Cliffs Horse Range and the Piceance – East Douglas HMA.

BLM and its partners continually monitor animals and on-the-ground conditions and will request appropriate action, if and when needed.

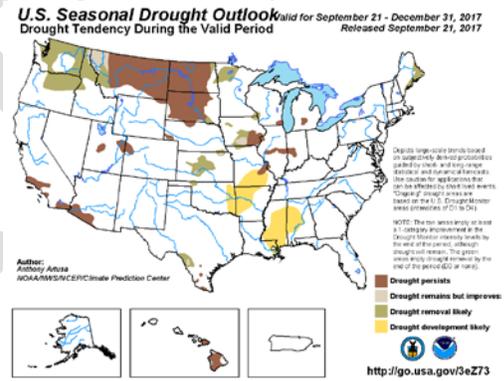


Figure 2 - Drought Index

Colorado Wild Horse Partnerships

<u>Organization</u>	<u>Focus</u>
Great Escape Mustang Sanctuary.....	Off-Range
Sand Wash Advocate Team	On-Range
Friends of the Mustangs	On-Range
TJ Holmes	On-Range
Burro Base Camp	Off-Range
Spirits of the West 4-H Club.....	On-Range
Mustang Heritage Foundation.....	Off-Range
Colorado Correctional Industries	Off-Range

Partnerships

BLM Colorado has partnerships with eight great organizations (inset).

GEMS and the Mustang Heritage Foundation (MHF) partnered with BLM to establish the State’s first “store front” program, which has been very successful in finding good homes for gathered animals. With GEMS assistance, BLM Colorado went from adopting 150 animals in 2015 to over 400 in 2017.

GEMS was also instrumental in forming the *Spirits of the West 4-H Club*. Mr. Leonard established a 4-H project in Idaho in 2009, which was continued in Colorado. Through the *Spirits of the West 4-H Club*, in 2017, seven weanlings were trained and adopted into good homes.

Mr. Leonard has worked closely with the MHF and GEMS to add a full adoption component to their “store front” program, which offers untrained horses as well as horses trained through MHF’s Trainer Incentive Program (TIP).

BLM Colorado has had a partnership with Colorado Correctional Industries since 1986, which is commonly referred to as the Wild Horse Inmate Program. Mr. Leonard oversees the 3,000-animal capacity facility in Canon City where inmates are responsible for feeding, providing care for, and training wild horses and burros. The training program offers animals

for adoption that have been halter, pack, and/or saddle trained. Adoptions of trained and untrained animals are held at the facility, which, on average, adopts three animals monthly. While that may not appear to be many animals, cumulatively, over 5,000 animals have been adopted since 1986.

Challenges

Even though the program faces several challenges including weather extremes (i.e., drought, long winters, dry summers); it is difficult to compete with other States' for gathers due to agency priorities such as sage-grouse; conducting fertility control in steep, rugged terrain; and wild horses trespassing onto private land as population levels increase.

Innovations

The program continues to address challenges through innovative approaches such as the *Spirits of the West 4-H Club*; assisting BLM Montana in establishing a 4-H project, training horses for other Federal, state, and county agencies; utilizing partners to foster horses for adoption, and adding a full adoption component to the Store Front program.

After her presentation, Ms. Lovec addressed questions from the Board.

Mr. French inquired as to how long the Piceance – East Douglas HMA has been over three times the AML and if there has been documentation of long-term impacts to sage-grouse habitat and, more specifically, lek habitat. Ms. Lovec indicated that the HMA has not been at AML for quite some time. Regarding impacts to sage-grouse habitat, she was not prepared to address that question and suggested contacting the local field office. **ACTION ITEM:** Ms. Lovec agreed to contact the White River Field Office to obtain the information requested by Mr. French (the length of time the Piceance – East Douglas HMA has been over AML and if there is documentation of long-term impacts to sage-grouse habitat (especially lek habitat) from the horse overpopulation).

Mr. Yardley inquired as to the State's plan for reaching AML in the Piceance – East Douglas HMA. Ms. Lovec noted that gathering the Piceance – East Douglas HMA is one of the State's top priorities in 2018, which is an area difficult to gather due to tree cover and steep terrain. Mr. Yardley inquired as to the range trend in that area. Ms. Lovec indicated that she has not seen the range data but, based on her personal observations, believes rangeland health standards are not being met and the area is in a downward trend.

Dr. Weikel noted there are four grazing allotments within the Piceance – East Douglas HMA and asked if those permittees had been put on grazing restrictions. Ms. Lovec noted that the permittees have voluntarily adjusted their livestock numbers. The Piceance – East Douglas HMA contains portions of the four grazing allotments, which limits the permittees' flexibility to move elsewhere.

Ms. Kathrens expressed her appreciation for having a Board meeting in her home state of Colorado. She inquired as to the livestock population authorized in the Piceance – East Douglas HMA. **ACTION ITEM:** Ms. Lovec was not prepared to address Ms. Kathrens' question and promised to provide an estimate of the livestock authorized in the Piceance – East Douglas HMA and the total authorized livestock use in the four allotments. Ms. Kathrens indicated that she believes the Piceance – East Douglas HMA could be divided into two or three areas where volunteers could implement PZP darting programs.

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Approval of September 2016 Minutes

Dr. Julie Weikel

DECISION: In a vote of five in favor, none against, and two abstentions,² the Board approved a motion made by Ms. Kathrens and seconded by Mr. Masters to approve the September 8 – 9, 2016 meeting minutes as presented.

BLM Response to Advisory Board's September 2016 Recommendations

Kristin Bail

Ms. Bail explained that BLM normally provides feedback to the Board on how the Board's formal recommendations, made at the previous meeting, were addressed. If recommendations were not addressed (either in total or partially), BLM normally discusses why the recommendation(s) were not addressed.

As noted in Ms. Bail's opening remarks, the agency has experienced changes (i.e., Board members, new Administration, etc.) and has a very important task ahead – delivering a Report to Congress in November 2017 concerning the future for a sustainable wild horse and burro program. When examining the Board's September 2016 recommendations, it was decided those recommendations speak to the issues being discussed at this meeting and will be subsequently be considered and possibly included in the Report to Congress. Therefore, after considerable discussion, BLM postponed taking specific action on the September 2016 recommendations until after this Board meeting and the Report to Congress has been submitted.

While this is a different approach, BLM did not want to make decisions or close future opportunities before hearing from the Board during this meeting. Therefore, BLM will not be responding to the Board's September 2017 recommendations today. This difficult decision by BLM's senior leadership in Washington, was made in the hopes that there will be a meaningful process resulting in real-time recommendations that will inform what is sent forward to Congress.

Mr. Bolstad added that during tomorrow's portion of the meeting, BLM Wyoming State Director Mary Jo Rugwell will present key elements of a strategy, which the Board will be asked to provide input on how BLM should consider those key elements as it (BLM) develops the Report to Congress. BLM continues to work on the Report to Congress and would like to ensure the Board has opportunity to provide feedback on the key elements of that report.

Dr. Weikel concluded the discussion by noting that this is an ongoing discussion and encouraged the Board to carefully review the September 2016 meeting minutes concerning the Board's formal recommendations, which should inform tomorrow's discussion for moving forward in developing cohesive, implementable recommendations.

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² Mr. James French and Dr. Sue McDonnell.

Wild Horse and Burro Program Update

Dean Bolstad, Division Chief, Wild Horse & Burro Program, BLM



Mr. Dean Bolstad

General National Update

Considering the numerous people locally, nationally, and internationally interested in the BLM's wild horse and burro program, Mr. Bolstad began his presentation by discussing BLM's mission (Figure 3), various legal mandates pertaining to the wild horse and burro program, which will be followed by specifics of the program (i.e., program status by the numbers, AMLs, management tools, challenges, etc.)

BLM's Mission Statement

"is to manage the public lands to sustain the health, diversity, and productivity of the public lands for the use and enjoyment of present and future generations."

Figure 3 – BLM's Mission Statement

Agency History & Legal Mandates

BLM is responsible for managing 245 million acres of land and 700 million acres of mineral estate both of which are integral to the lives and livelihoods of communities and families across the Nation.

BLM was established in 1946 but its roots go back to the years after America's independence when the young nation began acquiring additional lands, which were used to encourage homesteading and westward migration. The General Land Office (GLO) was created in 1812 to support these goals.

Over time, the values and attitudes regarding public land shifted and Congress merged the GLO and the United States Grazing Service to create the BLM in 1946.

Today, BLM is governed by a series of laws (Figure 4) passed by Congress, of which none is more important or critical to BLM's multiple-use and sustained yield mandate than the Federal Land Policy and Management Act (FLPMA) under which sustained yield is defined as maintaining the productivity and health of the land over time. Multiple use is defined as the management of public lands and their resource values (one of which is wild horses) so that they are utilized in the combination that will best meet the present and future of the American people.

Laws Governing BLM Management

*1867 Mining Act
1934 Taylor Grazing Act
1964 Wilderness Act
1970 National Environmental Policy Act
1971 Wild Free-Roaming Horses and Burro Act
1973 Endangered Species Act
1976 Federal Land Policy and Management Act
1978 Public Rangelands Improvement Act*

Figure 4 - Laws Governing BLM Management

FLPMA identifies six major uses of public lands – (1) domestic livestock grazing, (2) fish and wildlife, (3) mineral exploration and utilization, (4) Rights-of-Way, (5) outdoor recreation, and (6) timber production. If one of the identified major uses is eliminated or proposed to be eliminated from tracts of land 100,000 acres or more, BLM must have Congressional approval.

Dr. Weikel asked if wild horses and burro were one of the six major uses listed in FLPMA. Mr. Bolstad indicated that wild horses and burros were not one of the major uses but are among the resource values BLM must consider as the agency manages for those major uses. BLM and the FS are to consider managing for wild horses and burros where they were found on public lands when the *Wild Free-Roaming Horses and Burros Act of 1971*³ act (Act) was passed to maintain a thriving ecological balance in support of BLM's multiple-use mission.

³ Public Law 92-195.

The Act allows for the designation of wild horse and burro ranges on which wild horses and burros would be given principle status over other uses. Nationally, there are three wild horse ranges (of which the Little Book Cliffs Wild Horse Range is one) and one wild burro range in Nevada.

The Act has been amended three times:

1. In 1976, FLPMA authorized BLM to use (a) helicopters in capture and management of wild horses and burros and (b) motorized vehicles to transport animals;
2. In 1978, the *Public Rangelands Improvement Act* clarified BLM’s responsibility to immediately remove excess animals and to achieve AML either by removal or destruction, or some other means such as sterilization. A stipulation was included in the *Public Rangelands Improvement Act* that BLM is to destroy those animals for which no adoption demand exists.
3. In 2005, the *2005 Appropriations Act* directed BLM to allow the sale without limitation of those animals that are offered three times unsuccessfully for adoption or animals that are over ten years old.

BLM has maintained a policy to not sell without limitation or humanely destroy healthy animals. Likewise, from 1988 to 2004 and from 2010 to the present, Congress has prohibited use of funds to sell without limitation or to destroy healthy animals.

Current State of the Wild Horse & Burro Program

In ten western States (Figure 5), BLM manages wild horses and burros in 177 HMAs totaling 26.9 million acres. This acreage does not represent all areas where wild horses and burro existed in 1971, but are areas where wild horse and burro use is compatible with other uses and the land’s capacity to manage for those uses.



Figure 5 - Western States with Wild Horses & Burros

The national AML, which is essentially the target population size based on what the land can sustainably support along with other allowed activities on that land, is 26,715 animals. As of March 2017, there are an estimated 72,674 animals on the range of which half are in Nevada. Since March 2017, an additional 13,000 foals have been born on the range.

In addition to the animals on the range, BLM maintains approximately 10,925 and 32,888 animals (total of 43,813 animals) in short-term corrals and long-term pastures, respectively, at a cost of \$1.97 per day and \$5.19 per day, respectively. In 2016, the cost of holding animals in short- and long-term facilities cost the agency over \$47 million. Mr. Bolstad noted that 90 percent of the animals in short- and long-term holding facilities are five years and older. Only 10 percent of the animals are younger than five, which is the age of animal the public finds desirable for adoption.

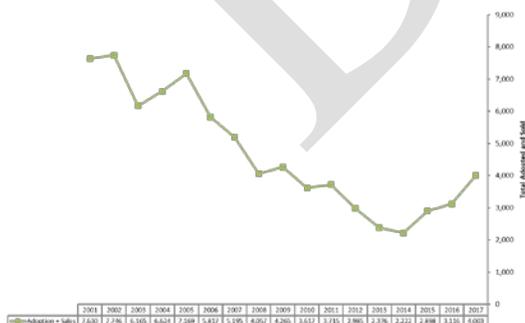


Figure 6 - Adoption & Sale Trends

Approximately, 4,183 animals were either adopted or sold in 2017. Adoption and sale numbers have declined since a high of 7,746 in 2002 to a low of 2,222 animals in 2014, but are slowly rebounding because of wild horse training programs that offer more desirable animals. In 2017, 4,209 animals were removed from the range (Figure 6).

Figure 7 depicts the 177 HMAs where purple represents wild horse HMAs, green are wild horse and burro HMAs, and yellow represents HMAs managed strictly for wild burros.

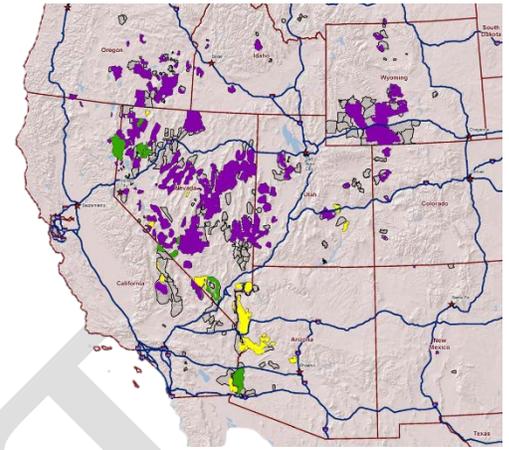


Figure 7 - HMA Locations

In 2016, BLM utilized its Geographic Information System technology to estimate the number of livestock Animal Unit Months⁴ (AUM) that were licensed within HMAs, which was compared to the 2017 wild horse and burro population estimate. In 2016, an estimated 793,000 AUMs were consumed by wild horses and burros compared to 582,000 AUMs of licensed livestock use.

Figure 8 depicts wild horse removal (green line and axis on the right) and population growth (red line and axis on the left) trends since 2001. In recent years where 2,500 to 4,500 animals have been removed, population levels on the range have increased significantly.

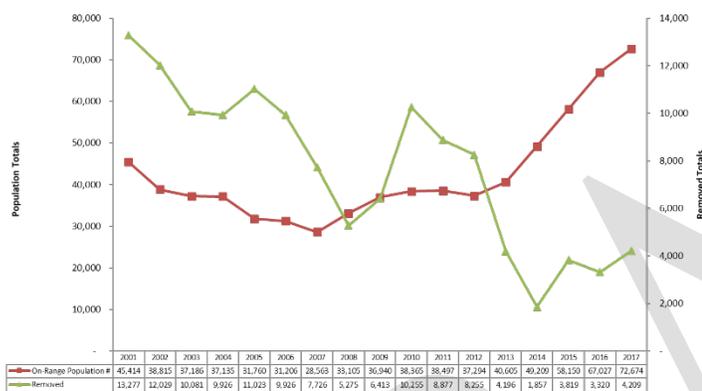


Figure 8 – Removal & Population Trends

Wild Horses & Burros in the Land Use Planning Process

In BLM's land use plans, there is one principle decision to be made in relation to the wild horse and burro program – to manage for wild horses and burro or not – which leads to designation of HMAs.

During the land use planning process, BLM considers wild horses and burros in a comparable manner to other resource values such as wildlife, cultural and historic sites, natural scenic values, minerals, wilderness, watershed services, etc. In a comparable manner is defined as using the same process.

BLM's land use plans are commonly referred to as Resource Management Plans (RMP). Activity plans are umbrella management plan that outline and implement RMP goals and objectives, but at a more site-specific level (HMA, grazing allotment, etc.) RMPs and activity plans are developed through a National Environmental Policy Act (NEPA) process with the intent of achieving a thriving ecological balance, which means taking care of the land and providing for its health and productivity.

Wild horse and burro AMLs may be established either through the RMP process, or the more-site specific activity (management) plans. AML is typically depicted as a population range that identifies a low and high AML (i.e., low of 50 to a high of 350 animals) for which forage is allocated along with other resource uses (i.e., livestock, wildlife, natural processes, etc.) to maintain a thriving ecological balance.

When developing forage allocations for the public land uses (i.e., wild horses and burros, livestock, wildlife, etc.), BLM relies on rangeland monitoring data (i.e., utilization, ecological condition and trend, actual use, climate, weather, etc.) BLM utilizes a monitoring process known as Assessment, Inventory, and Monitoring, which incorporates satellite imagery and randomly selected plots across the western United States.

⁴ The amount of forage required by one animal unit (AU) for one month is called an **Animal Unit Month** (AUM). One animal unit is defined as a 1,000 lb. (450 kg) beef cow with or without a nursing calf with a daily requirement of 26 lb. (11.8 kg) of dry matter forage.

Once an AML is established, BLM works to maintain the herd size within the established AML range using two principle tools for population control on the range – removal of animals and fertility control vaccines, which typically have a one-year efficacy period unless a booster vaccine is administered. Unless animals can be darted, it is necessary to gather the animals to hand administer vaccines. To stabilize the population growth of 73,000 animals currently on the range, it would be necessary to contracept (administer vaccines) 30,000 animals ranging over 27 million acres – a difficult challenge.

Challenges

Regardless of the source of overgrazing, it has an adverse impact on the rangelands as well as other resource values. In some areas in Nevada, the wild horse and burro population have outgrown the water supply resulting in animals becoming imperiled. While not occurring throughout the western States, there are areas where wild horses and burros do not have sufficient resources to survive, resulting in the need for emergency gathers to avoid further damage to the land and to bring relief to suffering animals.

Overgrazing by any species over time will convert the perennial rangeland communities of the Great Basin to annual grasslands and increase their susceptibility to invasion by noxious weeds. Once that threshold is crossed and the perennial species are lost, those areas typically cannot be reclaimed by natural processes or by man-induced efforts (seeding). The very habitat on which wild horses and burros (and other uses of the public land) depend is lost, including the natural processes needed to maintain the health of the land (i.e., infiltration, soil stability, etc.)

Overpopulation in many HMAs are forcing animals to leave HMAs in search of food and water, which, in some areas, creates a public safety issue. In three counties in Arizona, since 2015, there have been nearly 190 vehicle collisions with wild burros. Conditions are similar throughout the West force animals to leave their ranges and are increasingly found on private property. Often, animals become habituated and established on private property, if action is not taken quickly to remove them.

The challenge is finding an appropriate avenue to communicate the importance of rangeland health and its association to all uses of the rangeland. It is critical that the uses of the public rangelands, including wild horses and burros, are managed to maintain the productivity and health of our rangelands.

The Way Forward

The President's FY 2018 budget proposal included a request to (1) remove the Appropriations rider prohibiting unrestricted sale and euthanasia of excess animals and (2) allow transfer animals to federal, state, and local governments for work animals. BLM's highest priority continues to be placing animals in good homes, but, absence of the ability to accomplish that, perhaps consideration should be given to other tools in the "tool box". Or, perhaps other legislative options that support responses to management challenges could be explored.

BLM needs to continue the 2015 research initiative for developing longer lasting fertility control tools.

It will be important to maintain existing partnerships (i.e., MHF and the inmate training programs). In addition, the agency needs to seek more partnerships to support on- and off-range management activities.

BLM will need to engage the private sector in assuming financial liability for the care of unadoptable animals.

Once AML is achieved, BLM will need to aggressively apply fertility control to ensure population levels are maintained.

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On-Range Branch Update

Alan Shepherd, On-Range Branch Chief, Wild Horse and Burro Program, BLM



Mr. Alan Shepherd

FY 2017 Overview

Mr. Shepherd noted that in FY 2017 BLM removed 4,209 animals by use of helicopters (3,399 animals) and bait/water trapping (810 animals) addressing three priorities - public safety emergencies, private land issues, and protecting sensitive wildlife habitat.

During gather operations involving fertility control treatments and darting programs alone, a total of 841 animals (607 and 234 animals, respectively) received a contraceptive vaccine application.

FY 2018 Summary

While a complete FY 2018 gather schedule cannot be developed until BLM receives its FY 2018 budget, the agency is moving forward on removing 1,623 animals from rangelands prior to December 8, 2017.

Research

Research studies continue to work toward development and/or improvement of population control vaccines and methods. There are 17 ongoing studies through the U. S. Geological Survey (USGS), two have been planned but not started, three have been cancelled, and five studies have concluded within the past year. BLM academia partners are engaged in seven additional studies that will eventually benefit BLM’s wild horse and burro program.

A complete list and summary of the studies can be found in the Board’s notebook under Tab 9.

Litigation

Since the Board’s September 2016 meeting, BLM has been involved in 30 different cases (Figure 9). A more detailed litigation summary can be found in the Board’s notebook under Tab 9.

Following his presentation, Mr. Shepherd addressed questions from the Board.

Ms. Sewing asked if the number of animals gathered and adopted was a current trend. Mr. Shepherd indicated that the agency’s goal is to balance the number of animals removed from the range with the number of animals leaving the program through adoptions, sales, natural mortality, etc. While balancing those figures helps the agency financially, it does not address the issue of reducing the overpopulation situation on the ground.

Mr. French inquired as to the agency’s policy concerning wild horses and/or burros that drift from HMAs on to non-HMA areas and how rangeland conflicts are being addressed. Mr. French noted that wild horses and burros in Nevada are moving off traditional HMAs into other areas due to changes in climate, vegetation, and fire cycles. Mr. Bolstad noted that the *Wild Free-Roaming Horses and Burros Act of 1971* requires the agency to remove animals from private land once a request have been made. Despite that direction, the agency has had to limit its gathers to the number of animals that leave the program through adoptions, sales, and natural mortality. If more animals were removed, there would be a corresponding negative financial impact resulting in insolvency of the program. The agency’s criteria for removals has

BLM Wild Horse & Burro Litigation

<u>State/Organization</u>	<u>Number of Cases</u>
Colorado	3
Idaho	1
Montana.....	4
Nevada	2
Oregon	8
Utah.....	4
Wyoming	
Forest Service (California).....	2

Figure 9 - BLM Litigation Summary

been, in priority order, (1) court orders, (2) public safety, (3) animals encroaching on private land, and (4) important sagebrush and sage-grouse habitats.

Mr. French summarized that removal of animals from private or other non-BLM lands requires a private entity, State, or other Federal agency to make a formal request. Mr. Bolstad indicated that BLM does its best to respond to formal requests, but are not able to in all cases.

Dr. Weikel noted that limited resources to conduct gathers has forced BLM to prioritize its efforts. Dr. Weikel asked where sagebrush focal areas (SFA) currently fell in the list of priorities. At one time, SFAs were a high priority. Ms. Bail noted that BLM has just begun a public comment period examining various elements of the Greater Sage-Grouse management plans completed in FY 2015, of which use of SFAs is one. Currently, there is active discussion addressing the future of SFAs (if subsets within priority habitat management areas are necessary) and BLM wanted to broaden the discussion to include State partners. With the ongoing conversation and the decision-making process that just started, BLM has been more general as to how removal priorities are articulated. If SFAs continue to be important, BLM will consider those areas carefully. Just because an area has been designated as a SFA, it does not automatically move up on the priority list. It will be considered as one factor in a difficult prioritization process completed in cooperation with BLM's State partners.

Dr. Weikel noted a second issue, which involves domestic animals that have strayed from Native American reservations onto public lands. Responsibility for gathering trespass animals typically falls to BLM and/or the FS. Mr. Bolstad provided an example where animals not covered by the *Wild Free-Roaming Horses and Burros Act of 1971* on the border between Oregon and Nevada have drifted off a Native American reservation on to public lands administered by the Vale (Oregon) and Winnemucca (Nevada) Districts as well as nearby FS lands.

Ms. Kathrens asked if the current FY 2018 gather target (under the Continuing Resolution) of 1,623 animals would include ongoing gathers. Mr. Shepherd indicated that animals gathered on or before September 30, 2017⁵ were included in the FY 2017 target; whereas, animals gathered on or after October 1, 2017 will be part of the FY 2018 target.

Mr. Masters inquired as to an estimate of the 2017 foal crop. Mr. Shepherd indicated that based on the number of animals projected to be on the ground in March 2017, he would estimate the 2017 foal crop to be approximately 13,000 animals. Gather statistics from the ongoing Wyoming gathers show a foal crop of approximately 22 percent as compared to the agency's average prediction of 20 percent.

Mr. Yardley noted that the population level is expected to double every four years, which would increase the current population of 73,000 animals on the rangeland to 146,000 animals by 2020 and 292,000 animals by 2024, if left unattended or natural mortality (dying of thirst, lack of forage, etc.) does not occur. With the limited number of animals being removed, he believes the rangelands are headed for disaster if something doesn't change. Mr. Shepherd noted that in many HMAs, population levels are two to three times the established AML, which has and will continue to result in degradation to the rangeland and water resources as well as the animals' condition. Animals will expand their ranges in search of forage and water. It is BLM's responsibility to monitor those changes (i.e., where the animals are going, impacts being caused, etc.) and keeping the animals out of trouble. Until a consistently effective mechanism is found to control population growth, BLM cannot make the gains needed to reduce on-the-ground population levels, especially considering the high cost of holding animals in facilities. Degradation of the rangelands will continue until AML is reached and maintained.

Mr. Yardley asked a follow-up question relating to the effect of overpopulation on rangeland resources. Mr. Shepherd indicated that any extended overpopulation situation (regardless of the species of animal) will begin to adversely impact key perennial forage species that are important to sustaining the health of the public lands. Repeated use of perennial

⁵ September 30, 2017 was the last day of FY 2017 and October 1, 2017 was the first day of FY 2018.

vegetation plants affects the health of individual plants, eventually resulting a transition to a more invasive species community (i.e., cheatgrass, Medusa head, etc.), which will adversely affect the animals' condition due to lower forage values (protein, etc.) of those invasive species. It is likely the lost perennial plant community will never be recovered either naturally or through the efforts of man.

Mr. French indicated that the "overpopulation and subsequent reduction in rangeland forage and water capacity" conversation typically has been framed around the horses' health. Mr. French suggested that as we continue to move toward an ecological disaster in some locations, we often neglect or forget the wildlife component, which competes directly with other herbivores for existing forage. In his experience, a collapse of a large herbivore (i.e., wild horses) will coincide with a collapse of other wildlife species (i.e., sagebrush-obligate species in northern Nevada), which compete for the same vegetation. This is more than a wild horse issue – it is an ecological disaster.

Off-Range Update

Holle' Waddell, Off-Range Branch Chief, Wild Horse and Burro Program, BLM

Off-Range Facility Update



Ms. Holle' Waddell

Ms. Waddell noted that the number of animals being held in off-range, short-term corrals (10,925 animals) has been reduced primarily due to the limited number of animals being removed from the rangeland. Long-term pastures are currently holding approximately 32,297 animals while Eco-Sanctuaries hold an additional 591 animals.

There have been five new off-range pasture awards from the October 2016 solicitation – four in Oklahoma and one in Kansas – which increases the long-term pasture capacity by 4,700 spaces (animals). Efforts to deliver the animals to the new long-term pastures are progressing well.

Since the September 2016 Board meeting, the Off-Range Branch has added one additional Project Inspector, which doubled the Branch's PI staff, who is responsible for visiting long-term pasture facilities, engaging with facility contractors, and working as representative of the Contracting Officer's Representative.

Internet Adoption Website Update

BLM will tentatively bring its new Internet Adoption website online in January 2018. The past website had limited capabilities and was not user friendly; however, the redesigned website will increase the number of online adoption events, from which animals can be picked up at Store Front locations and BLM's off-range corrals.

Adoption Demand Study Update

The Adoption Demand study has been extended since the last Board meeting. Review of the adoption program has been completed; however, BLM had not received approval from the Office of Management and Budget (OMB) regarding a comment card, so the process was put on hold. OMB approval has since been received.

BLM is moving forward with the survey at all off-range corrals where adoption and/or sale events are held. The comment cards have also been distributed to the States who will present the cards to the public between September 14, 2017 and July 31, 2018. At the end of the survey, comment cards will be analyzed by a contracting firm who will produce an evaluation report no later than FY 2019. A sample comment card is provided in the Board's notebook under Tab 8.

Private Care Placement Team Update

The Private Care Placement Team is continuing its efforts. Despite encountering challenges to include a Board member on the team, the team has continued to forge ahead by addressing feedback from the adoption/sales program comprehensive review. The agency is moving forward with Phase 1 of the effort (developing an Action Plan), which is currently under review.

Adoption and Sale Brochure Update

BLM has revised/recreated its adoption brochure to include sales. Previous versions of the brochure focused principally on adoptions. The new brochure is more user-friendly and provides additional quotes from past adopters as well as specific information about the process for adopting or purchasing an animal.

The brochure includes an adoption application, which also has been revised. These forms are updated on a periodic basis, which requires OMB approval. The application was revised to be more user-friendly and collect information necessary for meeting minimum requirements as well as providing clear information for staff who inspect adopted animals in the field.

Eco-Sanctuaries Update

BLM has three eco-sanctuaries – two in Wyoming and one in Oklahoma. An eco-sanctuary workshop was hosted by BLM in December 2016 addressing eco-sanctuary events, eco-tourism, educational outreach, and making sure events are well planned and effectively reach out to the public. The eco-sanctuaries have risen to the occasion by increasing the events as well as the number of people who visited eco-sanctuaries in FY 2017.

The Deerwood Agreement, which was BLM's first eco-sanctuary in Wyoming, has been renewed for a five-year period (2017 to 2022).

In addition, a new eco-sanctuary brochure is currently under development.

Correctional Centers

There are six correctional programs currently in place (Arizona, California, Colorado, Kansas, Nevada, and Wyoming). BLM is exploring opportunities for expanding the number of events occurring at these facilities. BLM has also been tasked with changing the format (or instrument) used to approve use of correctional facilities from agreements to contracts.

To date, the facilities have placed over 300 trained and 140 untrained animals into good homes. The number of events occurring at correctional facilities has also increased with additional open houses, expos, and adoption/sale events. Ms. Waddell noted the Wyoming correctional facility provided animals for an adoption event one of the Wyoming eco-sanctuaries.

Mustang Heritage Foundation (Partnership)

While BLM has Memorandum of Understandings (MOU) with several national partners, Ms. Waddell highlight the work completed by the MHF who has been successful in placing significant numbers of animals into good homes. In FY 2017, MHF hosted six Extreme Mustang Makeover (EMM) events, one Mustang Magic event, and continued the TIP program. EMM events and the TIP program were successful in placing over 1,800 trained animals into good homes. Three of the EMM events included sale-eligible, trained animals, which was new for 2017. Some EMM events provided a venue for educational seminars, which were well received.

The Assistance Agreement with MHF has been renewed for the period of 2017 through 2022.

Through the MHF partnership, the *America's Mustang Virtual Reality Trailer* was debuted at several events in 2017 including Cheyenne Frontier Days in Cheyenne, Wyoming; the Bartlesville, Oklahoma Off-Range Pasture Public Tour; and the Fort Worth EMM event. Five tours are planned for FY 2018. The 40-foot by 8.5-foot trailer has three different screens, LED TVs, virtual reality headsets, and stereo functionality.

2015 to 2017 Adoption & Sales Numbers

Between 2015 and 2017, 4,183 animals have been placed into good homes through BLM's wild horse and burro program (Figure 10.) The total number of animals sold is highlighted in blue while the number of animals adopted is depicted in red. The cumulative total of animals placed in good homes each year is depicted in the gray column.

Following her presentation, Ms. Waddell addressed questions from the Board.

Ms. Sewing noted that the number of animals gathered as well as the number adopted does little to affect what is occurring on the range. She inquired if the reduction in funding required to hold animals in short- and long-term facilities would have an impact on addressing conditions on-the-ground. Ms. Waddell indicated that the current cost savings would not have a significant impact because of the large number of animals still being held in holding facilities. The number of adoptions and the number of animals gathered from the range essentially cancel each other out. The agency is working to increasing the number of animals that are placed into private care, which, hopefully, someday may exceed the number of animals that are removed from the rangeland.

Budget Update

Michael Reiland, Budget Specialist, Wild Horse & Burro Program, BLM

Program Overview



Mr. Michael Reiland

Mr. Reiland provided an overview of the FY 2017 Wild Horse and Burro program expenditures (Figure 11) focusing on Program Elements HH (Long-Term Holding) and HI (Short-Term Holding)

that cost American tax payers \$23,254,395 (28%) and \$24,281,749 (30%), respectively, for a total of \$46,536,144. The overall percentage of these two program elements (as compared to the program's overall budget) has decrease from 65 percent in FY 2016 to 58 percent in FY 2017 due to the movement of animals from short-term holding facilities into long-term holding pastures. While the overall off-range population has remained steady, the cost of holding those animals has decreased allowing more funding for other aspects of the program.

Program Element KF, population growth suppression, is on an upward trend. Mr. Reiland noted that many people point to this program element as justification that BLM is not spending sufficient funding for fertility control; however, it is important to recognize that this program element does not reflect all costs attributed to actions related to fertility control but only those directly related to fertility control treatments. The program element does not address fertility control costs incurred during gather operations, which are captured in the JJ program element (Gathers). BLM spends more funding toward fertility control than the figure identified in the KF program element.



Figure 10 - 2015 to 2017 Adoption & Sales Numbers

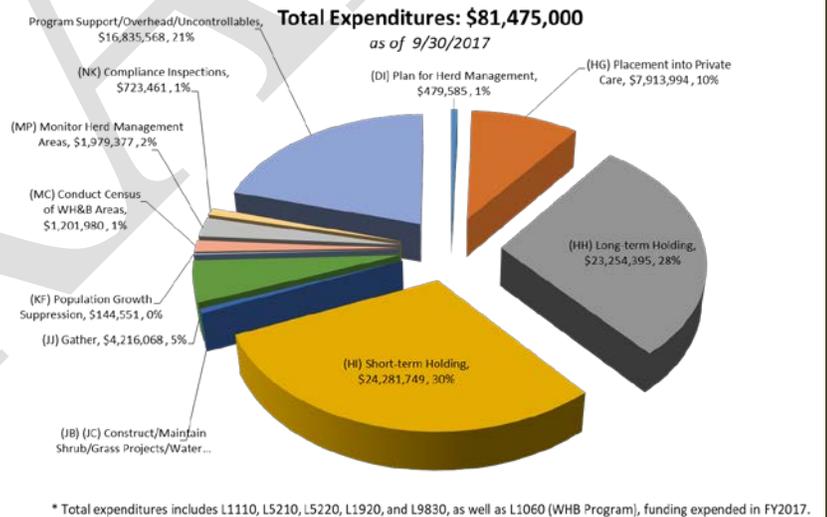


Figure 11 - FY 2017 Program Expenditures

BLM has recently entered into a contract with a company to provide PZP for the next several years. The cost per unit of PZP under the new contract has increased as compared to past prices.

Per Unit Costs

Mr. Reiland presented the FY 2017 national average “per unit” costs for several program elements. It is important to recognize that the “per unit” cost for a specific activity in a specific location may be higher (or lower) than the national average.

Gathers (JJ program element) average \$1,001 per head to remove animals from the rangeland, which has stayed relatively static over the past several years.

Fertility control (KF program element) averages \$2,500 per treated animal, which includes gather costs.

Adoption/Sale (HG program element) average \$1,891 per head, which dramatically decreased from FY 2016 when it averaged well over \$2,000 per head. Working with its partners, BLM has been able to increase the number of animals placed in good home while decreasing the cost to do so.

Holding animals in short- and long-term facilities (HI and HH program elements) average \$5.06 and \$1.97 per feed day, respectively, which has stayed relatively static as compared to prior years. Moving animals from short-term facilities to long-term pastures saves BLM approximately \$3.09 per head per day per animal moved.

Following his presentation, Mr. Reiland addressed questions from the Board.

Ms. Kathrens asked if Mr. Reiland was referring to PZP-22 when he stated PZP. Mr. Reiland indicated that was correct. Ms. Kathrens asked a follow-up question as to the amount of the budget spent on acquiring and administering PZP-22. Mr. Reiland indicated that he does not have a complete breakdown of those figures. Program element KF addresses all aspects of fertility control including use of PZP, GonaCon, etc. Mr. Reiland noted that the new contract for providing PZP was \$400,000 for approximately 450 doses over the next five years, which translated to approximately \$890 per dose. Ms. Kathrens noted that this should be considered a “drop in the bucket”. Mr. Reiland indicated that BLM completed slightly more than 800 treatments in FY 2017, which was up from FY 2016. BLM continues to explore where those funds can be most effectively used.

Ms. Kathrens was curious as to how much PZP could be developed considering there is only one source. Mr. Reiland was not able to answer Ms. Kathrens question, but indicated the company has committed to meeting the required doses for the initial contract obligation; however, discussions have not progressed to where the question of how much can be produced has been discussed. Ms. Kathrens thought the Board should know how much PZP can be produced. Mr. Reiland indicated that, at some point in the future, the BLM may ask for more than the company can supply.

Mr. Masters indicated that the average cost of \$2,500 to apply fertility control is incredibly high. He inquired as to the costs that are considered to derive the \$2,500 per animal average. He asked a follow-up question if the \$2,500 per animal average included volunteer costs or was just a BLM cost. Mr. Reiland noted that the \$2,500 per animal cost addressed treating animals during gather operations. Implementing fertility control through darting would be substantially lower than treating animals during gather operations and would be slightly higher than the cost of one dose.

Ms. Kathrens noted that the cost per dose acquired by volunteers is approximately \$25 per dose.

Dr. Weikel asked Mr. Reiland to expand on the difference in national averages for helicopter and bait trapping of animals. Mr. Reiland noted that in past years, there has been a significant difference in costs between helicopter gathers and water trapping of animals. In FY 2017, some water trapping operations experienced a higher “per head” cost due to the number of animals captured, accessibility and remoteness of sites, weather, etc. Costs have ranged from \$300 to \$1,600 per head depending on different factors. Dr. Weikel noted that she was aware of a successful bait gather where the average cost

was \$1,500 per animal. It is impossible to predict costs of an operation due to the variety of factors that influence the gather. It is important for the public to understand that bait trapping can be an expensive process, especially in remote areas.

Ms. Sewing noted that she read that the average income received from adopting or selling an animal is approximately \$1,000 per head. With a national average of \$1,891 per head to adopt/sell an animal, she asked if there was a deficit between the income derived and the cost to move an animal out of the system. Mr. Reiland indicated the income received from adoption and sale of animals are significantly less than the costs to adopt or sell those animals. But, when considering the funding saved when an animal is removed from either short- or long-term holding facilities, over the life of that animal, there is a significant cost savings to the government.

Mr. Yardley noted that Figure 11 does not depict the dollar amount associated with Program Element JB – Construct/Maintain Shrub/Grass Projects, Water Developments. Mr. Reiland did not have the specific dollar amount available and agreed to provide that information later. Mr. Yardley noted that the amount of funding spent for that program element is a very small proportion of the agency’s wild horse and burro budget, especially if maintaining the health of the rangeland is as important as Mr. Bolstad indicated (Challenges) earlier in the meeting. **ACTION ITEM:** Mr. Reiland will provide the Board with the specific dollar amount associated with the FY 2017 expenditure for JB program element - Construct/Maintain Shrub/Grass Projects, Water Developments.

United States Forest Service Program Update

Hope Woodward, Wild Horse and Burro Program Manager, USDA



Ms. Hope Woodward *Program Overview*

Ms. Hope Woodward began her presentation by indicating that there is a new Secretary of Agriculture, Sonny Perdue, and a new Chief of the FS, Tony Tooke, who are looking for solutions, creative ideas, and feedback that are based on science and involve community, volunteers, non-government and private partners as well as agency staff to solve challenges within the wild horse and burro program.

Nationally, there are 34 active wild horse and burro territories encompassing approximately 2.1 million acres on 19 national forests in 8 western states. There are 19 inactive territories (16 wild horse and 3 wild burro) on an additional 500,000 acres. Currently, there are approximately 7,100 wild horses and 900 wild burros on lands administered by the FS.

Staffing & Budget

The agency’s staff consists of a Program Manager (Ms. Woodward) in the Washington Office, three positions in Region 3 on the Carson National Forest, and one position in Region 4, which is currently vacant. The agency’s wild horse and burro program budget is \$1.5 million of which approximately \$700,000 is transferred to BLM for the care of animals in long-term holding that were gathered prior to 2015.

Management Capacity & Planning

Of the 34 active territories, six territories have completed NEPA decisions of which two are jointly managed with BLM. There are an additional six territories that are currently working on management plans of which four are jointly managed with BLM. Many of the territories overlap with livestock grazing allotments and are immediately adjacent to BLM HMAs. There are three inactive territories with signed NEPA planning decisions.

On- and Off-Range Management

Figure 12 provides an overview of different components of the agency’s on- and off-range management.

Population and Appropriate Management Levels

The agency’s national AML for wild horses and wild burros are 2,000 and 296 animals, respectively. As mentioned previously, AMLs have been established for the six territories where land use planning efforts have been completed, leaving 28 territories that will have their AMLs set in future planning efforts.

Territories with the largest wild horse populations include the Devil’s Garden and the Montgomery Pass territories both within the Region 5 in California. The Devil’s Garden territory (on Modoc National Forest) is approximately seven times over the established AML, while the Montgomery Pass territory (Inyo National Forest) is currently double the AML. Plans for fertility control and water development are being considered as the management plan is being revised.

There are nine territories in Nevada that are at or below AML, some of which are jointly managed by BLM. An additional eight territories are between two and six times over AML. The agency is working on management plans for four of the eight territories.

Of the territories where management planning efforts are underway, one territory in Oregon is twice the AML and one in Utah is 2.5 times over the AML. There are approximately 8,000 animals on the 4 active territories, which have a combined AML of approximately 2,300 animals, translating to an average of three times over AML. It will be necessary to fine tune information to identify where higher populations are located, sage-grouse issues and degraded rangelands exist, and opportunities for management are possible, which will include community involvement and input.

Program Updates and Accomplishments

Management Planning

As mentioned earlier, six territories (below) have completed NEPA decisions of which three are jointly managed with BLM.

- Carson National Forest (2 territories)
- Modoc National Forest
- San Bernardino National Forest
- Humboldt-Toiyabe National Forest (Joint Management Area)
- Custer-Gallation National Forest (Joint Management Area)

There are six additional National Forests working to develop management plans (Figure 13).

Population Surveys

Aerial surveys of wild horse and burro population levels on jointly managed lands follow the USGS “double observer analysis” protocol. Similarly, the protocol is also followed on territories managed strictly by the FS, and are supplemented with formal annual horseback surveys, formal and informal ground counts (i.e., game cameras), and permittee observations.

Since FS separated its management of wild horses and burros from BLM efforts in FY 2015, the agency has and continues to work on developing their management tools and operational protocols.

Fertility Control, Gentling, Gathers, Adoptions and Sales

<i>Components of the Wild Horse & Burro Program</i>	
<u>Component</u>	<u>Territories</u>
<i>On-Range Fertility Control.....</i>	<i>4</i>
<i>Gentling/Training Contracts.....</i>	<i>3</i>
<i>Friends/Advocacy Groups.....</i>	<i>5</i>
<i>Short-Term Off-Range Facilities.....</i>	<i>2</i>
<i>Removals.....</i>	<i>3</i>
<i>Adoptions/Sales</i>	<i>4</i>

Figure 12 - Program Components

Territories working on management plans
• Heber WH EIS (A-S NF, AZ, R3, 19,673 acres) Scoping for proposed action planned for 1 st /2 nd qtr FY 2019
• North Hills WH JMA EA (Dixie NF, UT, R4, 23,518 USFS acres) Scoping planned for January 2018, BLM as lead planning agency
• Hickison WB JMA EA (HTNF, NV, R4, 16,579 USFS acres) Notice Opportunity to Object- EA, dDN/FONSI due January 2018
• Spring Mountains WHB JMA EA (HTNF, 163,804 USFS acres) EA planned for public comment in December 2018
• Big Summit WH EIS (Ochoco NF, OR, R6, 27,069 USFS acres) Scoped June 2017. DEIS planned June 2018, decision October 2018
• Murderers Creek WH JMA EIS (Malheur NF, OR, R6, 73,545 USFS acres) Scoping planned on EIS for January 2018

Figure 13 – National Forests Working on Management Plans

Ms. Woodward presented a slide addressing the agency’s fertility control, gentling, gather, adoptions, and sale efforts (Figure 14).

Action	Territory	Number of Animals	Comments	
PZP Fertility Control	Devil’s Garden	52		
	Jarita Mesa	2		
	Jicarilla	6		
Gathers	Aerial	Devil’s Garden	292	221 sent to BLM’s Litchfield Corrals and 50 - 60 returned to the territory
		Jarita Mesa	26	
	Bait Trap	Jicarilla	24	
Nuisance	Murderer’s Creek		9	
	Horses sent for gentling	Devil’s Garden	15	Modoc Mustang Training (MMT) program
Jarita Mesa		3		
Adoptions	Devil’s Garden	116	44 of the adopted animals completed the MMT program	
	Jicarilla	11		
	Jarita Mesa	15		
	South Dakota	2		
	Ochoco	1		
Sales	Devil’s Garden	36		
	Jarita Mesa	16		
	Spring Mountain	3		
	South Dakota	22		

Figure 14 - Fertility Control, Gentling, Gather, Adoptions, and Sales

When discussing gentling, adoptions, and sales, Ms. Woodward highlighted the efforts of the Modoc National Forest in developing a training program known as the Modoc Mustang Training (MMT), which successfully trained 44 animals that were provided good homes through adoptions.

As mentioned in her opening remarks (Staffing & Budget), FS uses approximately half of its annual wild horse and burro budget to pay for animals in BLM’s long-term holding facilities. To reduce that cost over time, the agency has been working to remove animals from those facilities. In FY 2016 and FY 2017, the Carson National Forest was instrumental in removing 73 FS animals from BLM facilities, which were later sold. The Carson National Forest is the only national forest with an off-range facility, which accepted 36 horses from the Devil’s Garden territory that were successfully placed into good homes through sale.

Administration

The agency has developed procedures to collect fees for adoptions and sales. The *Wild Free-Roaming Horses and Burros Act of 1971* directed funds from the sale of animals should be transferred to BLM; in the absence of FS authority to collect funds through adoption, they are given to the U. S. Treasury. FS has developed avenues for the disposition of the funds as directed by the Act.

The agency is also working on developing a process to obtain OMB-approved forms for adoption and certificate of title.

Grants & Agreements

The Service First agreement addressing transfer of funding from the FS to BLM for holding animals in long-term holding facilities has been renewed. Local field units of both agencies are developing individual interagency agreements that will provide additional options for managing herds across agency boundaries.

An MOU was developed as guidance for BLM and FS staff for the 24 jointly managed wild horse and burro territories.

A Service First agreement was used to authorize the Modoc National Forest access to BLM's Litchfield corrals for gathers and adoption events.

The FS has signed an MOU with the Humane Society of the United States (HSUS) to facilitate coordination and cooperation on the use of immuno-contraceptives as a key component of the agency's wild horse and burro management program.

Litigation Update

The Modoc National Forest in northern California has been involved in two litigation cases for the several years. An overview of those related cases and their status is summarized below.

On March 24, 2014, the *American Wild Horse Preservation Campaign* and others filed a lawsuit against the Secretary of Agriculture and the FS alleging that the agency violated several acts and their implementing regulations by (1) modifying the territory boundary for the Devil's Garden Wild Horse Territory and (2) adjusting the existing AMLs to new upper and lower limits. The District Court ruled in favor of the FS on September 30, 2015. On November 25, 2015, the plaintiffs filed a notice of appeal to the D. C. Circuit.

On August 4, 2017, a panel of the Court of Appeals found that the FS 2013 decision to eliminate the Middle Section of the Devil's Garden Wild Horse Territory was arbitrary and capricious under the Administrative Procedures Act (and violated NEPA), and remanded the decision. On appeal, the appellants did not pursue their argument as to the AMLs. Appellants' petitioned for a panel rehearing to clarify the remedy, and the FS responded to that petition. On September 29, 2017, the panel filed an amended judgment, which vacated the FS exclusion of the Middle Section and the related Finding of No Significant Impact, and remanded the case.

Ms. Woodward summarized the efforts of the Carson National Forest to promote and implement the agency's wild horse and burro program. Key points raised included being the first Forest to treat animals with PZP and entering into partnerships for on-range remote and bait trapping darting programs. Next steps for the Forest include expanding their partnerships, improving facilities, fostering inter-forest technology exchange, and improving forage and water availability to improve the health and distribution of animals.

Following her presentation, Ms. Woodward addressed questions from the Board.

Ms. Kathrens inquired as to what is meant by an "inactive territory". Ms. Woodward explained that it was determined that there were no wild horses or burros on those territories. Of the 19 inactive territories, 3 have completed management planning determining why it is appropriate not to have wild horses on those territories. Specific information and documentation associated with the land use plans are maintained in the local Ranger District office. The remaining 16 inactive territories do not have management plans.

Ms. Kathrens asked if there might be opportunity to place non-reproducing wild horses from long-term holding facilities into inactive territories as a solution to reducing the agency's holding costs. Ms. Woodward indicated that Chief Tooke asked the Washington Office staff to gather different, creative ideas for consideration. Ideas that may have been rejected in the past may be considered under this administration. Considering the need to place additional emphasis on wild horse management, the agency is willing to entertain suggestions for management solutions from the Board. Ms. Kathrens indicated that there are people willing to explore the possibility of placing non-reproductive animals on inactive territories. Depending on the location of the inactive territories, there may be volunteer groups interested in working with the agency in the management of those areas, if the idea becomes reality.

Building off Ms. Kathrens question, Mr. Yardley suggested that there could be potential of enlarging an existing problem that the agency is already struggling to overcome by introducing additional animals into other areas. Ms. Woodward indicated there are various factors/conditions (i.e., forage capacity, existing rangeland conditions, rangeland health standards, etc.) that would be addressed when a proposal is considered.

Mr. Yardley asked how overpopulation in the Devil’s Gate territory has affected the habitat used by livestock and wildlife. Ms. Woodward noted that some permittees have taken reductions in grazing use up to as much as 50 percent of their permit. While there are wild horses within the territory, others have left the territory and are impacting other lands (i.e., private land). The Devil’s Gate territory does have a management plan outlining strategy for addressing identified issues, which has been presented to the Regional office. All partners (i.e., private landowners, permittees, County Commissioners, Congressional delegations, etc.) are aware of the situation and are working with the agency to find solutions.

Influence of Feral Horses on Native Wildlife in the Great Basin

Lucas Hall, Keck Science Department, Claremont McKenna College



Mr. Lucas Hall

Mr. Hall began his presentation by acknowledging the assistance of others who participated in the study and/or its design – Mr. Brock R. McMillan and Mr. Randy T. Larsen, both from Brigham Young University and Mr. Robert N. Knight from the U. S. Army Dugway Proving Ground.

The influence of water over desert landscapes never ceases to amaze Mr. Lucas. Although one cannot necessarily see water on a desert landscape, there is always evidence of water’s influence. Water shapes desert ecosystems by providing the foundational resource for life whether it be for vegetation or animals.

Water resources are utilized for many different purposes – drinking water for the increasing human population; pumping of water from groundwater aquifers many of which do not appear to be replenishing at the same rate as historically seen; irrigation and other agricultural practices; livestock consumption, invasive species (i.e., tamarisk); and drought. The combination of these factors is limiting this normally powerful resource from providing essential life-giving properties to wildlife, vegetation, etc.

Water is a limiting factor in desert environments both temporally (seasonal availability) and spatially (distance between water sources). Temporal and spatial limits often coincide with the physiological demands (i.e., animals lactating during summer months) of animals, which also increases competition for water when sources are limited. Mr. Hall used an African example to emphasize his point. When water is limited, other animals give elephants access to the water. Over time, animals develop different strategies/behavioral adjustments (i.e., coming to water at night, using different water sources, etc.) for obtaining water.

Mr. Hall asked if wild horses were serving the same role as elephants in Africa. As stressed in previous presentations, wild horses exceed the AML in many (most) areas. In the Cedar Mountain study area, the high end of AML is 390 animals and had a population of 654 horses in 2016. Are wild horses adding an additional constraint to an already limited and constrained resource for native wildlife?

The study’s (Figure 15) primary objective was to determine the influence of wild horses on water use by native wildlife, utilizing three metrics.

- **Richness** – total count of species that are observed at a water source (i.e., 10 different species);
- **Diversity** – considers richness as well as evenness (number of animals within each species); and,
- **Temporal activity** – frequency, duration, and timing of use.

Methods utilized in two previous studies were used in this study. One involved use of remote cameras at 25 different water sources to monitor species visitation.

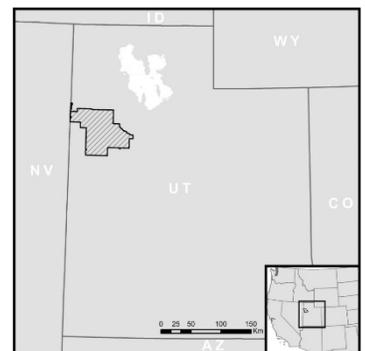


Figure 15 - Cedar Mountain Study Area

Horse-included (HI)
(N = 12)



Horse-excluded (HE)
(N = 13)

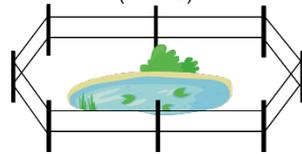


Figure 16 - Study Methods

Ground for several decades, but occasionally there is some limited trespass.

There were 101,496 photographs of animals taken of which 48,268 photographed native wildlife at 25 water sites and 53,228 photographed only wild horses at 12 water sources. There were distinct differences between the HI and HE sites as described below.

From a richness standpoint, at HE sites, there was a two-fold difference in species richness (number of species) (Figure 17). Far fewer wildlife species were detected at HI sites. There was a sharper contrast in species richness when considering avian (bird) species at HE and HI sites, but not quite as much a difference (as compared to avian) when examining mammalian species. From an overall species diversity standpoint, on HI sites, approximately half the diversity of wildlife species was observed as compared to HE sites.

Using non-metric, multi-dimensional scaling, the study found a shift in wildlife communities (species composition and abundance) where wild horses were present.

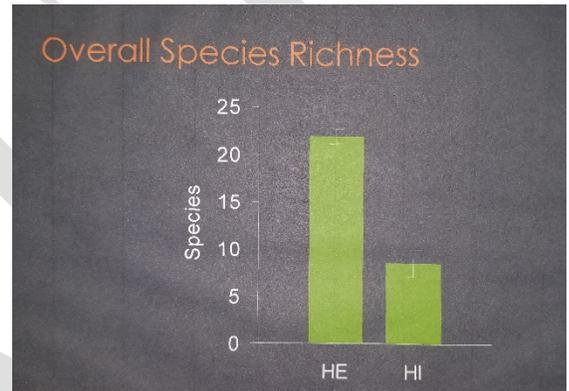


Figure 17 - Overall Species Richness

Each point in Figure 18 represents a water source. Where the water source lies on the graph depends on the species that were present and their relative abundance. Based on the presence (or absence) of wild horses, there is a good grouping of the water sources, which describes a shift in wildlife communities (species composition and abundance) when wild horses were present.

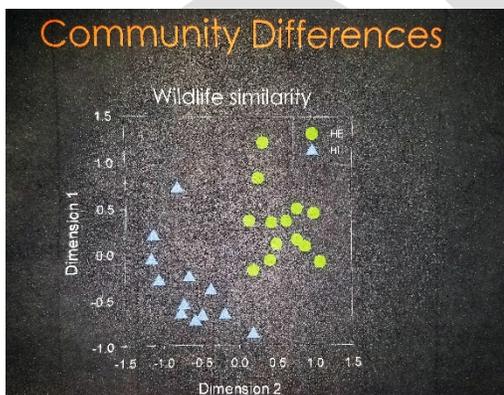


Figure 18 - Community Differences

During its peer review, the study received criticism that suggested the differences being observed may be due to habitat characteristics. A variety of habitat characteristics were included in the analysis, which found there was no grouping of species based on the presence (or absence) of wild horses. While the water sources had differing habitat characteristics, it was not possible to determine a significant pattern or grouping.

At HE sites, the number of wildlife visits per day was significantly higher than at HI sites. Wildlife also tended to stay longer (approximately two minutes on average) at HE sites as compared to HI sites. When considering time between visits to water sources, HI sites was significant longer as compared to HE sites. On average, wildlife spent approximately 24 minutes per day at HE sites as compared to five minutes per day at HI sites.

There is a strong correlation between the average minutes per day spent by wildlife at water sites and temperature. The average minutes spent by wildlife at water sites was higher during the summer (warmer) months as compared to winter (cooler) months. During extremely warm months such as July and August, wildlife usage of water sites peaked out at approximately 60 minutes per site per day. When use of water sites by wild horses is overlaid with the wildlife use, the time wild horses spent at water sites greatly overshadowed the time spent by wildlife. In July and August, wild horse use

of water sites was approximately 550 to 600 minutes per day. At some water sources, wild horses were spending up to 75 percent of the day at those sites, which makes it challenging for wildlife to access the site some of which were very small in size.

Using information gained over three years in a larger study area, competition between wild horses and other large ungulates (antelope and mule deer) was studied. The study's database contains over 2.5 million photographs of animals (all species) of which 72 percent were wild horses, which is an indication of how often wild horses used water sites.

The study found the relative use of water sites by antelope and mule deer to be approximately half at HI sites as compared to HE sites. As temperatures and wild horse activity increased at water sites, there is a corresponding decreased use of water sites by both antelope and mule deer.

The study showed that antelope utilized water sites between 9 and 10 a.m. in areas where there were fewer wild horses. In areas where wild horses were common, it was difficult to identify a specific timeframe when antelope would come to water. Antelope came to water at varying times of the day. The initial rationale for this finding is believed to be related to drinking pattern of wild horses. Wild horses did not have an optimal watering period so times when antelope would come to water also varied. There was not a similar pattern for mule deer, which are typically nocturnal animals. The presence (or absence) of wild horses did not affect mule deer watering patterns, which typically was before or shortly after dawn.

Mr. Hall concluded that fewer native wildlife species used water sources where horses were present. The richness, diversity, and temporal activity factors all decreased on sources where wild horses were present. There is a "water foundation" affect – everyone can get a drink of water from a water fountain but not at the same time. In the study area, there is a long line to access water sources – when a band of wild horses (Band A) is located on a water source, typically, there is a second band (Band B) waiting to come into the source. Once the Band A leaves, Band B will come into the source while Band C waits nearby. Where does wildlife come into the "pecking" order? The study found that wildlife prefers to locate other sources of water; rather than compete with horses at a water source.

Research shows the southwestern United States will continue to get hotter and dryer. What does that mean for native wildlife species where water sources are already overcrowded?

In summary, the studies indicated that wild horses displace native wildlife from water sources and negatively influence native wildlife.

Following his presentation, Mr. Hall addressed questions from the Board.

Mr. French asked if long-term (camping) occupation of water sources by wild horses changed in how wildlife used those water sites, which has been the case in northern Nevada. Mr. Hall indicated that the study addressed the time between wildlife visits to water sources and the overall visits per day. He provided one example where he observed wild horses occupying one water source continually for four or five days in July. During that period, no wildlife was observed using that source of water.

Mr. French asked a follow-up question relating to the aggressiveness of wild horses and becoming territorial in defending a water source from being used by other horses or wildlife. Mr. Hall noted that the study's data did not support such a conclusion, which might be attributed to using photographs that document a single point in time. The study found that wildlife species did not use water sources when wild horses were present. Other studies have shown that aggressive behavior in wild horses can deter use of water sources by wildlife (elk, antelope, mule deer, big horn sheep, etc.) Typically, animals don't like to compete for resources. Competition introduces potential for harm, long-term injury, and mortality. Many species will avoid potential conflict, which is supported by their study.

Mr. French asked if the study documented the exclusion of other obligate species (i.e., neo-tropical birds, amphibians, and small mammals) from water sources. Mr. Hall noted that previous work by Eric Beaver in the early 2000s demonstrated that any species that makes a burrow has difficulty coexisting with wild horses due to the trampling effect and soil compaction. Mr. Hall indicated that they did not find evidence of burrowing activity in areas with active horse use, but it wasn't something measured during their study.

ACTION ITEM: Dr. Weikel asked Mr. Hall to resubmit his Power Point slides using a different color format, which is easier to reproduce and read. The copies provided in the Board's notebooks were difficult to read.

Dr. Weikel noted that the presentation slides displayed improved water sites (reservoirs), which are different than mud holes, springs, or riparian areas. Dr. Weikel also inquired as to the how many of the 53 water sites in the second study were natural versus improved. She asked if there was an avenue for separating the effect of horses staying at a seep up to ten hours per day, which results in limited water being available in hoof prints; rather than in a pool or stream. Mr. Hall indicated that approximately one-third of the study sites were natural seeps and one spring. The remainder were improved water sources. Mr. Hall indicated the outcome of wild horses using unfenced developed water sources versus natural sources are essentially the same. In the summer, horses will consume all the water in hoof prints leaving nothing available for other species. Likewise, Mr. Hall summarized an instance where a band of wild horses consumed all the water in an unfenced wildlife guzzler, again, leaving nothing for other species. Not surprisingly, their study found that wildlife did not approach or use that source of water.

Dr. Weikel asked if Mr. Hall was aware of conflicts where groups have installed and maintained wildlife water sources (i.e., wildlife guzzler), which, to the frustration of the group, are later destroyed by wild horses using the water source. Mr. Hall understand such conflicts exist, but is not aware of specific groups with those concerns. Their study documented wild horses coming into and drinking unfenced guzzlers dry and, in some instances, causing damage to the facility, which was reported to the State of Utah.

Mr. Masters inquired as to the species of birds that avoided water sites where wild horses were present. Mr. Hall noted that of the 53-species observed in the study, over 40 were birds. Rather than address species that avoided sites, Mr. Hall noted that cow birds and ravens did not avoid sites with wild horses, while many other species (Golden Eagles, Red-Tailed Hawks, Great-Horned Owls, etc.) did avoid horse-related sites.

Mr. Masters asked a follow-up question if there is data on fawn survival, ungulate mortality, and age structure from the study area that could be compared to data on similar areas. Mr. Hall indicated noted that both ungulates and mule deer are not doing well in the Great Basin. He would like to be involved in a study that addresses the questions raised by Mr. Masters.

Dr. McDonnell asked how large the exclosures were in the study. Mr. Hall indicated the exclosures were approximately 50 feet square with the water source located in the center. Dr. McDonnell followed up on Mr. French's question on inter-species aggression by asking if he was aware of or had personal knowledge of horse-to-horse aggression at water sites. Mr. Hall indicated that horse-to-horse aggression was often documented during the study. Dr. McDonnell noted that wild horses typically don't fight over water unless it is extremely limited.

Ms. Kathrens indicated that she is familiar with exclosures used in the Pryor Mountains in Montana, where water typically runs out of an exclosure into a tank/trough. She inquired if the water sources used in the study were like the Pryor Mountain exclosures. Mr. Hall indicated that the improved water sources (guzzlers) consisted of a fenced catchment pad that is located approximately 40 to 50-feet away from an underground water tank that has a small area exposed to the surface to allow drinking. Water lands on the catchment pad, drains into the underground tank, which provides the water for drinking. Ms. Kathrens indicated the developed sites in the study were like those in the Pryor Mountains.

Ms. Kathrens noted that aggression between wild horses is a natural phenomenon or way of life for those animals, especially where they are near each other. Ms. Kathrens asked if the study's conclusion was that wild horses in their legally designated ranges were diminishing habitat for other species. Mr. Hall indicated that in terms of water usage, wild

horses were restricting or constraining access to water by wildlife. Ms. Kathrens noted that the dominant species in the Pryor Mountains are bears and mountain lions, who cause different water use patterns in wild horses and mule deer when they (predators) are near. In the Pryor Mountains, bears and mountain lions served the role of the elephants in Africa.

Ms. Kathrens noted that wild horses are not diurnal in nature. Based on her experience, wild horses are as active at night as they are during the day. Mr. Hall noted that based on the study's data, the animals were primarily diurnal with most of their activity occurring during the day with less activity during the night. Most nocturnal activity tends to correlate with the availability of water, particularly in summer months.

Mr. Bolstad noted that the study's data base contains a tremendous number of photographs and asked if there were plans for additional analysis and new publications. If so, what will be the primary emphasis? Mr. Hall indicated that their second paper addressing the temporal and spatial aspects should be published soon. There are many other aspects that will be examined in the future.

Effect of Feral Horses on Soils and Vegetation in Sagebrush and Riparian Plant Communities

Dr. Chad Boyd, Rangeland Ecologist, Research Leader, USDA Agricultural Research Services



Dr. Chad Boyd

Dr. Boyd provided a brief background addressing his childhood in central Texas, his lifelong interest in wildlife, his educational achievements, and professional experience. Dr. Boyd is the Research Leader at the Agriculture Research Service (ARS) in Burns, Oregon located at the Eastern Oregon Agricultural Research Center, which also includes staff from Oregon State University and The Nature Conservancy. The Research Center is different than most ARS locations as it conducts research on overarching ecosystem issues such as invasive annual grasses, increasing wildfires, expanding native conifer populations, etc., that affect multiple values including sage-grouse and wild horses. The Center has a diverse customer based consisting of ranchers, State and federal land management agencies, environmental groups, and non-governmental organizations.

Dr. Boyd indicated that he is before the Board today as a scientist; not to offer opinions on policy or serve as an advocate for (or against) wild horses on rangelands. He will address information that explores the relationship between free-ranging horses on the Sheldon National Wildlife Refuge (Refuge) and their habitat.

Dr. Boyd recognized Dr. Kirk Davies with the ARS and Ms. Gail Collins of the U. S. Fish & Wildlife Service (FWS) who are co-authors with Dr. Boyd in this study.

Sheldon National Wildlife Refuge Study Area

The Refuge consists of 490,000 acres in northwestern Nevada and is managed by the FWS. Historically, the area was grazed by livestock and wildlife; however, livestock were removed in 1994. Since removal of livestock, the Refuge, which contains minimal interior fencing, has been grazed by 700 to 1,200 free-ranging horses. In FY 2014, FWS removed excess wild horses from the Refuge.

Research Objectives & Study Design

The objective of the research study was to evaluate horse use on plant community structure and composition/soil properties focusing on riparian communities and associated uplands.

The study focused on the southern 200,000 acres within the Refuge, which was occupied during the study by approximately 500 horses.

Five sites were randomly selected from a total of 60 springs and seeps. Two 50 by 60-meter plots were established at each of the five sites. By a flip of a coin, one plot was selected to be fenced and the other would be accessible to horse grazing (unfenced). Both plots had riparian and upland components.

In 2008, fencing was constructed, and pre-treatment data was collected to characterize pre-treatment differences between grazed and non-grazed areas,⁶ after which post-treatment data was collected between 2009 and 2013.

Study Data

Dr. Boyd noted that the data being presented today is not comprehensive of all data collected during the study. There simply isn't enough time to address it all. The presentation will address highlights that characterize major themes coming from the research.

Upland Plots

Utilization

Utilization is defined as the percentage of forage consumed by a horse relative to the plant biomass on the site. It was noted that the sites were also grazed by antelope and mule deer, which might have a minimal impact on the vegetation. Mr. Yardley asked if antelope and mule deer had access to the areas within the enclosure. Dr. Boyd indicated that they did have access to those areas and referenced a Utah study that documented mule deer use within the enclosures; however, such use was minimal.

Upland utilization ranged from 14 to 61 percent on the five study sites. Two sites received low utilization in the uplands while three received moderate to heavy utilization.

Perennial Grass & Sagebrush Cover

Except for Mountain Big Sagebrush, herbaceous species were grouped into two primary categories – perennial grasses and other shrubs (i.e., bitterbrush and rabbitbrush).

The percent change in cover for the three categories (Mountain Big Sagebrush, perennial grasses, and other shrubs) within the enclosure areas increased over the five-year study and was statistically significant in the perennial grass category and for Mountain Big Sagebrush.

Sagebrush Density

In examining sagebrush density (number of plants per square meter), three primary categories were identified – mature sagebrush (ARTR(M)), juvenile sagebrush plants (ARTR(J)), and other shrubs.

In areas where horse use was excluded, there was a statistically significant increase in the number of mature sagebrush plants. While there was an increase in density of juvenile sagebrush plants, it was not statistically significant. Mature sagebrush plants were producing reproductive structures, which could be a two-year old shrub. After fences were constructed, there was an increase in the number of shrubs coming into the system resulting in the increase of mature sagebrush plants. The exclusion of horse grazing did not have a significant impact on the number of other shrubs.

There was 20 percent increase in overall floral diversity, which is a combination of richness (number of species) and equitability (how well the abundance is spread across species) in areas that were excluded from horse grazing.

⁶ There were not any pre-treatment differences in the major variables measured in the study between grazed and non-grazed plots.

Soil Properties

Two soil properties – soil aggregate stability (how well the soil surface horizon stays together) and soil surface penetration (how hard is the soil surface) – were measured at the end of the study in 2013. Soil aggregate soil stability was approximately 20 percent higher in areas excluded from horse grazing while areas where grazing occurred had a lower soil surface penetration reading (i.e., less water would penetrate the harder soils).

Riparian Plots

Riparian areas are defined as plant communities that are influenced annually or seasonally by water.

Utilization

Utilization data averaged over a five-year period ranged from 27 to 83.9 percent in riparian areas. The standard of error for the lowest two sites was high because horse use varied significantly between years. Riparian data from four of the five study sites were used in the study. The riparian zone in the fifth site underwent anthropogenic modifications where the spring migrated back to its natural channel, which desiccated the study plot vegetation; therefore, the riparian data was not used.

Percent Change in Perennial Grass and Sagebrush Cover

Ground Cover

Ground cover can be (1) bare ground, (2) litter that was previous years' plant growth, or (3) the area covered by the base of the plant (basal cover).

There were higher percentages of bare ground in the areas grazed by horses. A larger percentage of the ground was covered by litter in areas that were not grazed by horses. Interestingly, the plant basal cover was higher in areas open to horse grazing as compared to areas that were not grazed (Figure 19). Dr. Boyd explained that the increase in litter accumulation in the exclosures was so ecologically significant that it prevented establishment of new plants.

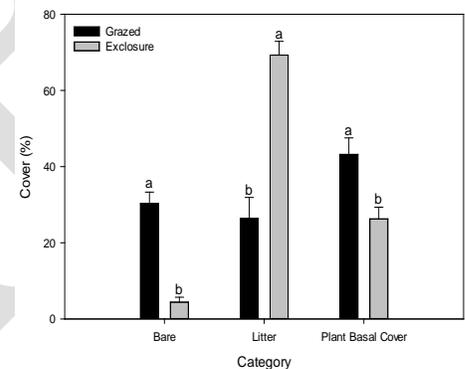


Figure 39 - Riparian Ground Cover

Species Grouping of Plants

Riparian species were placed into five functional groups – sedges, rushes, eleocharis,⁷ grasses, and forbs - that include species that play similar ecological roles. Density (number of plants per unit area) was measured for each grouping at the end of the study (2013). There was essentially no change in the density of sedges between areas grazed and not grazed, which was an unexpected result. Rushes and eleocharis were more abundant in the grazed areas, which was expected. There was not a statistically measurable difference in density between grazed and non-grazed areas for either grasses or forbs.

Shrubs

The expectation entering the study was to observe an increase in the number of shrub species in areas where grazing was excluded. Shrubs were found in only one of the five sites where wild rose was the only species present. On the one site, there was a significantly higher density and increase in plant height in areas without horse grazing when compared to the area receiving grazing. With only one site, it is difficult to make definitive conclusions on the effects of horse grazing on the shrub component.

⁷ **Eleocharis acicularis** is a species of spikerush known by the common names needle spikerush and least spikerush. It is widespread across Europe, central and southeastern Asia, North America and northeastern South America as far south as Ecuador.

Habitat Structure

The largest changes observed between grazed and non-grazed areas involved habitat structure (how tall and thick is it). When considering stubble height (height of vegetation at the end of the grazing season), there was a 40-cm height difference between grazed and non-grazed areas in 2012. There was a similar but less dramatic response in stubble height in 2013.

Visual obstruction was defined as the degree of difficulty to see through vegetation. The visual obstruction scores were approximately three times higher in non-grazed areas as compared to grazed areas.

Conclusions

The following is a summary of the conclusions reached.

- Upland areas experienced a reduction in sagebrush and other woody species with horse grazing, which could be a concern in areas containing sage-grouse habitat. There was not a large enough sample size in riparian areas to reach any conclusions.
- Diversity of species decreased in upland areas that were grazed by horses. Species diversity was not measured within riparian areas.
- There is higher potential for erosion in upland areas where horses grazed. The dramatic increase in bare ground in riparian areas where horse grazing occurred will increase the susceptibility of those areas to erosion (rain drop and wind).
- Alteration of riparian habitat structure in areas grazed by horses was the largest single change observed in the study.

Final Thoughts

Five years is a short timeframe to observe rangeland recovery. Three of the five years would have been considered drought years. Would there have been different responses if there had been more moisture?

Springs versus Streams

All sites were located close to a spring source and had predictable energy patterns. For the most part, there was a predictable energy (water) flow through the system throughout the year. This type of system should be contrasted with a channel (stream) system, which is very different.

Channel systems are “pulse driven” systems – a large pulse of energy (water) enters the system when snowmelt is occurring. A high level of utilization and/or hoof action in a channel system results in flattening out of the stream’s banks, which results in lowering the water table. In this study, sedges were not impacted by horse grazing as they can withstand more utilization and the study addressed springs; not streams. Sedges cannot withstand a loss of water in the soil (i.e., lowering of the water table) and eventually will be eliminated from the system and losing the “glue” that holds the channelized system together.

It is important to remember that results of this system (study) may not accurately reflect impacts from horse grazing in other types of riparian areas that have a channelized, pulse-driven nature.

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Heterogeneity

There is a management context behind the terms “good” and “bad”. One issue observed by the study team was the extent of the landscape that had been heavily grazed by horses. Figure 20 displays habitat heterogeneity that may support a diversity of uses; however, when most riparian areas in a larger area look like the area on the left, the benefits of that heterogeneity are diminished.

There is another aspect that is likely more difficult to manage – how animals are distributed across the landscape. Distribution relates to seasonal habitat preferences (i.e., horses spending more time in riparian areas as summer temperatures increase), which is difficult to manage. The study found that horses may create heterogeneity that benefits some species; however, managing that effect is difficult when animals are on the rangeland twelve months out of the year, which could lead to a majority of the landscape looking like the left side of Figure 20.



Figure 20 - Heterogeneity

After his presentation, Dr. Boyd addressed questions from the Board.

Mr. French asked if the team observed a trend of plants entering an early seral stage where non-native, noxious species may be invading sites. Mr. French also inquired as to the elevation of the study plots, which may influence the risk of invasion by aggressive species in areas of heavy use. Dr. Boyd noted elevation for all sites was above 6,000 feet where there is a high resistance to annual grass species invasion. Invasive species were only sporadically encountered during the study. If the plots were at lower elevations, the results could have been much different with the possibility of an increase in invasive annual grasses (i.e., cheatgrass) in uplands exposed to horse grazing.

Dr. Weikel noted that other species (pronghorn and mule deer) are in direct competition with horses for the resources and that the Refuge was initially reserved for Big Horn Sheep. In the planning process for the Refuge, the relationship between the Big Horn Sheep and horses was a major contributing factor considered when looking at management alternatives. Dr. Weikel wondered why Big Horn Sheep were not referenced in the presentation. Dr. Boyd noted that the study did not address the wildlife aspect in the study except to document habitat conditions.

Mr. Yardley noted that if vegetation was left in the enclosure (Figure 20) and not grazed, it could lead to an unhealthy situation where plants will crowd themselves out. Mr. Yardley suggested having a balance would be important. Dr. Boyd noted that, generally, seeps are relatively high producing systems, which create a heavy litter layer. The litter layer can serve as an impediment to recruitment of new plants over time. Dr. Boyd also noted that, historically, fire frequency at this elevation was higher, which helped reduce the accumulation of litter. Without fire, over time, Dr. Boyd would expect to see a decrease in the density of plants recruited into the system with an increasing litter layers. Dr. Boyd also noted that with an increase in litter, there is tendency to see bigger plants in non-grazed areas that were more robust at the base of the plant. Dr. Boyd indicated that during the last year of the study (2013), utilization cages were placed in grazed areas, which produced the same amount of vegetation as compared to non-grazed areas. There were still equal amounts of plant production but a follow up question will be if the production in grazed areas will decline over time.

Mr. Yardley indicated that there are livestock management tools (i.e., distribution, season-of-use, intensity and duration of grazing, etc.) and asked if those tools might impact the grazed versus non-grazed areas. Dr. Boyd noted that there was a lack of shrub species on the sites. As with cattle grazing, a system grazed too late or hard in the season will result in an increased utilization of woody species once the sedges have died. The same thing occurred in this study with horses. If the season-of-use can be controlled over time, it would be interesting to see the riparian woody species response. There are significant differences between well-managed livestock grazing systems and what occurs on the Refuge with horses. The stocking density of livestock can be controlled as well as the season-of-use and distribution of animals across the landscape, which is difficult on the Refuge.

Dr. McDonnell asked if the exclosures bisected seeps to allow part of the seep to be inside and outside of the exclosure. Dr. Boyd noted that the exclosures did not exclude entire seeps. The study essentially explored a microcosm of five different drainage systems with the grazed and non-grazed 50 by 60-meter plots.

Dr. McDonnell inquired as to the proportion of the drainage system that was excluded from grazing use. Dr. Boyd indicated that a small percentage of the system was excluded from grazing. The plots stayed relatively close to the head water spring because the farther you travel from the spring, the earlier in the growing season you'll get below the water potential needed to support riparian-obligate vegetation.

Ms. Kathrens commented that during the 1990s, Linda Markle-Coates was the Wild Horse and Burro Specialist for the Pryor Mountains where a tremendous amount of research had been conducted by Colorado State University, which is bound in a book that should be made available to the Board as a reference source. The Pryor Mountains vary from 3,000-foot desert ecosystems up to subalpine areas. The season-of-use in that area is driven by the season of the year. Conclusions reached through those studies include the reliance of range condition on the amount of moisture received. There was a greater density of foliage outside of exclosures, but the diversity of species was greater inside the exclosures.

Currently Available Contraceptives and Sterilization Techniques for Wild Horses and Burros

Dr. Albert J Kane, USDA APHIS/BLM Wild Horse & Burro Partnership



Dr. Al Kane

While attending the National Wild Horse & Burro Summit in Salt Lake City, Utah, Dr. Kane indicated that someone stated they didn't understand the wild horse and burro problem. Everyone loves wild horses so why get rid of them? Dr. Kane suggested the answer to that question is straight forward, at least for him. No one wants to get rid of all the horses – the problem is there are too many excess horses. Too many in holding facilities because the adoption demand is too low compared with the supply and too many animals on the range because population growth is too high compared with natural losses. What we need is a way to reduce the number of EXCESS horses at hand.

Population Growth Control Goal

The population growth rate, which is typically between 15 and 20 percent per year with uncontrolled reproduction, is controlled by three factors – (1) foaling rate, (2) ingress and egress out of the system or land area, and (3) mortality and animal removals. In contraception studies, typically, in untreated (control) situations, 60 to 75 percent of mares will foal on the range; whereas, in captive trials, 85 to 90 percent of the untreated mares (control animals) in their prime reproductive age will produce a foal.

The goal of fertility control is population growth suppression, which requires two things to be successful.

1. Fertility control agents with high efficacy, which, ideally, results in approximately ten percent of treated mares producing a foal annually; and,
2. Need to treat approximately 75 to 95 percent of the mares to affect the population growth.

Fertility Control History

Fertility control research began in the late 1970s and early 1980s when both male and female contraception was explored. Most research involved hormone treatments, which had two undesirable aspects – (1) short acting and (2) leaving residues that persisted in the environment. Also at that time, it was determined that female contraception was more promising (as compared to male contraception).

Wild horse bands are dynamic and polygynandrous, which means harem structures are not static and change over time and given the opportunity, multiple males will breed multiple females within a given harem. Genetics and observations

on the range suggested that typically 10 percent and perhaps as high as 30 percent of foals in each population (without fertility control treatment) can be sired by secondary stallions. It is Dr. Kane's opinion that even with fertility control, female animals, if not becoming pregnant in the first or second heat, will continue to cycle for many months. Even with sterilizing most male animals, eventually, the 10 or 20 percent of male animals that cannot be caught and sterilized will breed the mares that are not contracepted, which is why the focus shifted to female contraception and, more specifically, to the use of PZP.

Porcine Zona Pellucida (PZP)

PZP is a glycoprotein harvested from pig ovaries. The antigen, which is the target for the immune system, is mixed with adjuvants to stimulate the animal's immune system. The mare will make PZP antibodies that (1) block fertilization of the egg and/or (2) bind to proteins within the ovary, which modifies the ovary's function. Studies have shown that ovaries shrink when under the influence of the PZP vaccine and there is a reduction in estrous cycling.

Zonastat-H®

Zonastat-H is a liquid PZP, typically used in BLM's darting programs, registered with the Environmental Protection Agency and produced by the Science and Conservation Center at Zoo Montana. Treatment involves two injections – a primary injection which is followed by a 30-day booster injection, which significantly increases the number of antibodies. The efficacy of Zonastat-H is very good once the booster injection is administered. Ideally, the treatment should be administered one to two months prior to the breeding season. BLM's cost is approximately \$30 per injection. Application costs for darting animals vary greatly but can be up to around \$500 per mare as compared to an average cost of \$2,500 per mare when treating and releasing mares as part of a removal process.

Zonastat-H has been proven to be safe and effective at the mare level. If it can be injected into a mare annually, the majority can be prevented from foaling. Zonastat-H results in 7 to 18 percent of mare's foaling, which is a good efficacy rate. It is being successfully used by BLM in five or six HMAs, which greatly reduces the gather frequency when a high percentage of mares are treated.

Dr. Kane provided an overview of the successful use of Zonastat-H on Assateague Island from 1993 through 2006. Key points stressed in the presentation include:

- Population foaling rates dropped to seven percent (with a +/- two percent margin of error) per year;
- Thirteen years were required before the first decrease in the population size was observed.

Many ask, “why not do what was done at Assateague Island?” Dr. Kane indicated that a typical BLM HMA in the West is approximately 32 times larger than Assateague Island, which is 8,850 acres in size, an AML of 120 animals, and very good road access. In contrast, the Jackson Mountains HMA in northern Nevada is 283,000 acres in size with an AML of 170 animals and has very limited (or no road) access to many areas. What works for Assateague Island may not work in a typical BLM HMA.



Typical BLM HMA



Assateague Island

PZP-22

PZP-22 is a pelleted PZP, which is a longer lasting treatment, consisting of a liquid primary injection and a pellet injection given simultaneously. The pellet injection contains three pellets that release PZP in one, three, and 12-months following administration. The cost for a PZP-22 injection was approximately \$300 but, recently, the contract price rose to about at \$450 to \$500 per dose.

In the first PZP-22 study, in 2004, approximately 50 percent of the untreated, control mare foaled, which is low for an untreated group. After applying PZP-22, between 6 to 18 percent of treated mares produced a foal in the first two years and, in the third and fourth years, 30 to 40 percent of treated mares were foaling. The reduction in foaling rates during the first 2 years was promising; however, the level of efficacy in this study has never been repeated. Subsequent studies have had more variable results.

PZP-22 has the same safety profile as PZP; however, in Dr. Kane’s opinion, its efficacy has been too variable to make it a useful tool. PZP-22 is the best treatment available if the mare can be treated only once. A study in the Sand Wash Basin HMA using PZP-22 with a booster injection after the initial injections resulted in 18 to 40 percent of treated mares foaling for three years. A similar study in the Cedar Mountain HMA resulted in 15 percent foaling rates in the first three years. More work is needed to see if the Cedar Mountain HMA results can be duplicated. Dr. Kane noted that there were mild injection site reactions in 68 percent of the mares in one study.

SpayVac®

SpayVac is a single injection, long acting PZP product developed in the 1990s. It uses liposome technology for a sustained release of PZP, which blocks fertilization of the egg and reduces ovarian tissue mass and function. It has been successfully used in deer. There was a captive study using SpayVac in Carson City, Nevada, in 2008 that resulted in no foaling in the first year followed by a 17 percent foaling rate in the second, third, and fourth years. This was a relatively small trial treating 12 mares with a control group of 8 mares.

Two subsequent studies were performed to try to reproduce the results from the Carson City trial. One trial resulted in foaling rates of 13 to 17 percent in the first year and 45 percent in the second, third, and fourth years. The second trial, which raised the PZP dose and added a stronger adjuvant, resulted in 50 to 70 percent of the treated mares foaling, which was very disappointing. There was no apparent explanation for the highly variable and worsening results so the SpayVac trials were ended.

Dr. Kane noted that there were formulation changes in the amount of PZP antigen and type of adjuvant after the first trial, but no one could really explain why the results were so poor in the later studies. The product was difficult to obtain as the manufacturer lost interest in its production. SpayVac is not currently available; however, there is a new manufacturer interested in returning to it and producing a product close to the original formula. This would require EPA approval.

Dr. Kane believes SpayVac has promise. New, larger efficacy studies that demonstrate reliability and repeatability will be needed before there is enough confidence in the product to try for field application.

GonaCon™

GonaCon is a vaccine against the hormone GnRH, which is a sex hormone that regulates two other sex hormones essential for contraception. GonaCon is registered with EPA and is meant to be a single injection, multi-year vaccination produced by APHIS Wildlife Services. It is safe for treated animals and their offspring and has been used in rabbits, elk, deer, and horses.

In captive pen trials in Carson City, GonaCon was effective in the first year with a foaling rate of six percent, which was followed by 40 percent in the second and third years. Field trials were not pursued by BLM in 2011 because the National Park Service was pursuing a study in the Theodore Roosevelt National Park, which found 45 to 50 percent foaling rates in the first two years of the study. After a booster was given in the third year, the foaling rate dropped to 0 percent in the third year and 16 percent in the fourth and fifth years. With a booster, GonaCon appears promising. The Park Service work is continuing to try to work out a good booster schedule, and we are watching the results.

GonaCon is a one-shot, pre-mixed vaccine that can be darted or hand injected. It is being used in a small BLM pilot study in Nevada.

EPA Registration

Regulation of contraceptives for free-ranging wild or feral horses was transferred from the Food and Drug Administration to EPA in 2009. The EPA considers contraceptives as a restricted use pesticides. These products do not require the label to address the mechanism of action, side effects, or complications in detail like an FDA approved drug would.

The EPA's primary burden is to address environmental and non-target animal toxicity. Requirements for efficacy studies are usually waived unless there is a public health or food safety claim for a product. EPA registration is required but does not guarantee that a product will be effective. EPA approval primarily addresses the product's safety; not its effectiveness.

Intrauterine Devices (IUD)

Marbles

Marbles have been used to reduce signs of estrus in domestic horses. Over time, the marbles fracture causing problems for the mare. When mares are placed with stallions, the marbles have fallen out 100 percent of the time.

Silastic Ring

Studies in the 1980s reported efficacy rates over 80 percent for IUDs made from silastic material in the shape of a ring. The rings were safe to use and reversible (mares returned to fertility when the rings were removed.).

Similar studies in 2017 found about 60 percent of the IUDs were lost when bred. When the IUD stayed in the mare during breeding, it was effective as a contraceptive. There were no adverse effects during the early phases of the study. The IUDs are being redesigned so they are more likely to stay in the mares' uterus during breeding.

One limitation is IUDs can only be placed in an open (not pregnant) mare. Unfortunately, wild horse mares are usually pregnant most of the time.

Surgical Sterilization

Female Surgical Sterilization

Spaying by ovariectomy is done occasionally in domestic mares. The two most common surgical approaches are colpotomy, which takes approximately 15 minutes per mare, and laparoscopy, which requires 60 to 90 minutes. Colpotomy has been used in wild horse mares. The survival rates are influenced by the experience of the surgeon, but it can be done by an experienced surgeon. Usually, only open mares are spayed so the safety and practicality of these methods for mares at all stages of gestation is unknown.

With wild mares being pregnant most of the time, BLM pursued studies focused on spaying mares in different stages of pregnancy using colpotomy. Those studies were stopped due to objections from concerned public and threats of litigation.

Tubal ligation and other techniques that don't involve removal of ovaries are relatively untested. Some techniques are limited to non-pregnant mares, and BLM was interested in pursuing these areas of research in wild horses at various stages of pregnancy. These studies were also stopped due to objections from concerned public and threats of litigation.

Male Surgical Sterilization

Surgical vasectomy has been performed on feral horses and the procedure itself is successful. The effectiveness of male surgical sterilization in reducing the population growth rate is questionable due to the challenges of treating every stallion in a population. The limited studies done on this technique demonstrated limited effect on population growth in the first year, but the effects greatly diminished in subsequent years.

Chemical vasectomy was described as something that “should have high efficacy” and “should not be difficult to adapt”⁸, which Dr. Kane believes was an unfortunate disservice to the community as the one study that tried chemical vasectomy initially reported success then later reported that it failed in 100 percent of the animals treated. There is no established technique for chemical vasectomy.

Castration

Regardless of the male sterilization approach (vasectomy or castration), it will be difficult if not impossible to catch and treat enough stallions to affect population growth over time. Replacing mares with geldings will result in fewer foals, but, on an overall population basis, it is questionable if enough stallions can be caught and treated to have a measureable effect over a period of several years. The behavioral and ecological consequences to gelding a large percentage of a herd are unknown. BLM, through research being conducted by the USGS, is currently addressing some of the questions associated with gelding a large percentage of the herd.

Summary

Currently, Zonastat-H is the best product available for small, closed populations that are at or slightly above AML. Animals must be cataloged by appearance and approachable for annual darting. With annual darting, efficacy rates should be good especially if 90 percent or more of the population's mares can be treated. Stabilization of population growth rates will occur; however, decreases in population size may require a significant amount of time (decades) where herds are greatly over AML

GonaCon-equine is promising, particularly when followed by a booster and used in smaller populations that are at or near AML. It is necessary to treat animals at least two times. Dr. Kane would expect efficacy to increase with subsequent doses, but the ideal boosting schedule and efficacy duration are unknown at this time.

⁸ 2013 study by the National Academy of Sciences.

PZP-22 has good efficacy the first year as a “one shot” primer and booster. It has better efficacy with repeated boosters, but the reliability and duration of efficacy are uncertain.

SpayVac may be promising, but the ideal formulation and reliability are still unknown.

Spaying and other surgical techniques in pregnant mares need to be explored in terms of their practicality and usefulness at the population level.

Following his presentation, Dr. Kane addressed questions from the Board.

Dr. McDonnell asked if most gather operations that included PZP treatment were helicopter or bait trapping. Dr. Kane indicated that PZP treatments have been used with both gather approaches. The majority of PZP treatment has been done with helicopter gathers as the goal is to treat as many mares as possible. Bait trapping is principally used in areas where the population is significantly over AML and captured mares need to be removed. Catch, treat, and release is rarely done with bait trapping, but is being used with burros.

Dr. McDonnell asked if the integrity of the harem is maintained after animals are released during helicopter gathers. Dr. Kane indicated the integrity of the harem is probably not maintained and there is usually expected to be a reorganization immediately after release. Once that settles down, some horses will probably return to their original harem, but anything that disrupts the population causes re-mixing of dominant stallions and harems. The notion that harems are usually stable and held over long periods of time by one stallion is incorrect. Harems are more dynamic than most people realize.

Dr. McDonnell inquired if we know how gathering animals on an annual basis for PZP treatment would disrupt the population over time. Dr. Kane indicated that gathering animals annually has several logistical challenges. Apart from what it does to the social structure of the harem, regardless of the gather method used, some degree of reorganization of the animals should be expected. The animals also become harder to gather each time they are gathered. One year after a gather many are much harder if not impossible to catch. After two or three years of gathering, one should expect that many will be impossible to catch.

Dr. McDonnell inquired if the GonaCon treatment was a single shot without a booster. Dr. Kane indicated the original formulation was one injection. Dr. Kane indicated that to achieve good efficacy, a booster should be given. Work done on the Theodore Roosevelt National Park found the efficacy after one shot to be poor; however, it improved after a booster was administered. The study originally followed the label with the primary injection. The booster schedule was irregular due to the course of the study, budget, etc. The initial boosters were given about three years after the first dose which resulted in no foals being born the year following the booster.

Public Comment Period

A public comment period was conducted from 3 p.m. to 5 p.m. allowing 51 speakers opportunity to address the Board. Each speaker was asked to limit their presentation to two minutes to ensure all speakers had opportunity within the timeframe identified for public comment. Speakers were encouraged to submit their comments in a written format.

The following provides a list of individuals who spoke during the public comment period. A summary of the individual presentations and written comments submitted at the meeting as well as public comments submitted to BLM through the U. S. Postal Service or BLM’s e-mail address at whbadvisoryboard@blm.gov are provided in Volume 2 (not attached).

Speaker

Representing

Varlin Higbee.....	Lincoln County Commission
Tom Allen	Public Lands Foundation
Stella Trueblood.....	SWAT
Dr. Terry Sweet.....	Rocky Mountain Elk Foundation

Holly Kennedy	Wyoming Farm Bureau
Tammy Pearson	Self
Kerry O'Brian	Self
Callie Hendrickson.....	White River & Douglas County Conservation Districts
Kat Wilder.....	Spring Creek Basin Mustangs
Janet Smith.....	Self
Nick Creasey.....	Self
Ann Evans.....	Cloud Foundation
Kevin Bunnell.....	Utah Division of Wildlife
Randy Parker.....	Utah Farm Bureau
Kayah Swanson.....	Cloud Foundation
Peggy Coleman Taylor.....	Self
Bonnie Brown.....	American Sheep Industry Association & Colorado Wool Growers Association
Steve Raftopoulos.....	Self
Les Owen.....	Colorado Department of Agriculture
Maggie Cason.....	Self
Lon Ball.....	Rancho Khasan
Melinda Kersten.....	Black Hills Wild Horse Sanctuary
Charlotte Roe.....	In Defense of Animals
Kimberly Airhart.....	Self
Patti Williams.....	Self
Ginger Fedak.....	WELCO
Suzanne Roy.....	American Wild Horse Campaign
Ken Brown.....	Western Counties Alliance
Tracey Scott.....	Steadfast Steeds Mustang Sanctuary
Blaine Scott.....	Steadfast Steeds Mustang Sanctuary
Dustin Huntington.....	Self
Allyson Woods.....	Mustang Camp
Toni Moore.....	Self
Jon Hill.....	Self
Randi Blasienz.....	Mustang Heritage Foundation
Gary Moyer.....	White River Conservation District
	Colorado National Association of Conservation Districts
Kali Sublett.....	Mustang Heritage Foundation
Ann Elliott.....	Self
Lia Biondo.....	National Horse and Burro Rangeland Coalition
J. Paul Brown.....	La Plata County Farm Bureau
Richard Connell.....	Colorado Farm Bureau
Mark Wintch.....	Public Lands Council & National Cattlemen's Beef Association
John Harris.....	Self
Lucy Powers.....	Self
Jim Hyrup.....	Self
Chris Colflesh.....	White River & Douglas Creek Conservation Districts
Patty Painter.....	Self
Rea Rutledge.....	Self
Mike Berry.....	Self
Mary Markey.....	Self

First Day Adjournment

The first day of the meeting was officially adjourned at 5:03 p.m.

Summary of Board Decisions and Actions

A summary of decisions made by the Board and actions committed to during the meeting is provided in Attachment 2.

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DRAFT

Acronyms

The following acronyms were used during the meeting and listed in alphabetical order.

<u>Acronym</u>	<u>Meaning</u>
AML.....	Appropriate Management Level
APHIS.....	Animal and Plant Health Inspection Service
ARS.....	Agricultural Research Service
BLM.....	Bureau of Land Management
EMM.....	Extreme Mustang Makeover
FLPMA.....	Federal Land Policy and Management Act
FS.....	U. S. Forest Service
FWS.....	U. S. Fish & Wildlife Service
FY.....	Fiscal Year
GEMS.....	Great Escape Mustang Sanctuary
GLO.....	General Land Office
HMA.....	Herd Management Area
HSUS.....	Humane Society of the United States
IDT.....	Interdisciplinary Team
IUD.....	Inter-Uterine Device
MHF.....	Mustang Heritage Foundation
MOU.....	Memorandum of Understanding
NEPA.....	National Environmental Policy Act
OMB.....	Office of Management and Budget
PZP.....	Porcine Zona Pellucida
RMP.....	Resource Management Plan
SFA.....	Sagebrush Focal Area
SWAT.....	Sand Wash Advocate Team
TIP.....	Trainer Incentive Program
USGS.....	U. S. Geological Survey

Attachment 1 – Wild Horse and Burro Advisory Board

National Wild Horse & Burro Advisory Board



Fred T. Woehl, Jr.

Public Interest

Term Expires: October 16, 2020



Dr. Sue McDonnell

Wild Horse & Burro Research

Term Expires: October 16, 2020



Ginger Kathrens

Humane Advocacy

Term Expires: March 28, 2019



Ben Masters

Wildlife Management

Term Expires: March 28, 2019



Steven Yardley

Livestock Grazing

Term Expires: March 28, 2019



Jennifer Sall

Public Interest

Term Expires: March 30, 2018



Dr. Julie Weikel

Acting Chair

Veterinary Medicine

Term Expires: March 30, 2018



June Sewing

Wild Horse & Burro Advocacy

Term Expires: March 30, 2018



James French

Natural Resource Management

Term Expires: October 16, 2020

Attachment 2 – Summary of Decisions Made and Committed Actions

The following is a summary of the decisions by the Board.

General Topic	Decision	Page of Meeting Minutes
Approval of the September 8 – 9, 2016 Meeting Minutes	In a vote of five in favor, none against, and two abstentions, ⁹ the Board approved a motion made by Ms. Kathrens and seconded by Mr. Masters to approve the September 8 – 9, 2016 meeting minutes as presented	8 (Sept 2016 Minutes Approval)

The following is a summary of actions committed to during the meeting.

General Topic or Action	Action	Party Assigned Action	Page of Meeting Minutes
Colorado Wild Horse and Burro Program Overview	Contact the White River Field Office to obtain the information requested by Mr. French (the length of time the Piceance – East Douglas HMA has been over AML and if there is documentation of long-term impacts to sage-grouse habitat (especially lek habitat) from the horse overpopulation).	Laria Lovec	7 (Action Item 1)
Colorado Wild Horse and Burro Program Overview	Provide an estimate of the livestock authorized in the Piceance – East Douglas HMA and the total authorized livestock use in the four allotments to Ms. Ginger Kathrens.	Laria Lovec	7 (Action Item 2)
FY 2017 Wild Horse & Burro Budget	Provide the Board with the specific dollar amount associated with the FY 2017 expenditure for JB program element - Construct/Maintain Shrub/Grass Projects, Water Developments.	Michael Reiland	19 (Action Item 3)
Influence of Feral Horses on Native Wildlife in the Great Basin	Resubmit the Power Point presentation slide using a different color format, which is easier to reproduce and read.	Mr. Lucas Hall	26 (Action Item 4)

⁹ Mr. James French and Dr. Sue McDonnell.



U.S. Department of the Interior
Bureau of Land Management

NATIONAL WILD
HORSE & BURRO
ADVISORY BOARD

Grand Vista Hotel
2790 Crossroads Blvd.
Grand Junction, Colorado

October 18 – 19, 2017

Volume 2

Day 2 Meeting Minutes

U. S. Department of the Interior
Bureau of Land Management

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Thursday, October 19, 2017

Ms. Kathie Libby opened the second day of the Bureau of Land Management's (BLM) National Wild Horse and Burro Advisory Board meeting by welcoming everyone and reviewing the agenda for the day.

Colorado Collaborative Partnerships

TJ Holmes



Ms. TJ Holmes

Ms. TJ Holmes, who is the darter and documenter of the Spring Creek Basin mustangs, thanked the Board for the opportunity to present her efforts to the Board. Ms. Holmes acknowledged that it takes a village of very active advocacy groups to do what they do on America's public lands and it is no different in southwest Colorado. Ms. Holmes and Ms. Wilder, who joined her at the speaker's table, represent that entire village.

The Colorado Chapter of the National Mustang Association (NMA-CO) has been advocating for the Spring Creek Basin herd since the late 1990s. Ms. Holmes has been on the NMA-CO Board since 2007. In early 2008, she was a founding member of the "Wild Bunch" coalition group consisting of representatives from NMA-CO, Four Corners Back Country Horsemen, Mesa Verde Back Country Horsemen, and Disappointment Valley, which is where the Spring Creek Basin Herd Management Area (HMA) is located. The philosophy of these groups to help to keep the wild horse mustangs on their home range. Working together and with BLM has led to that reality.

Ms. Holmes referenced a brochure that provides information about Spring Creek Basin. There are similar brochures for all HMAs in Colorado.

The Spring Creek Basin HMA is the southern-most and smallest HMA in Colorado with 22,000 acres and an Appropriate Management Level (AML) of 35 to 65 adults. The HMA's current population is 60 animals. Ms. Holmes explained that Spring Creek and Spring Creek Basin are not the same and are not interchangeable terms. Spring Creek is an intermittent drainage that (with its tributaries) drain Spring Creek Basin, which is a large geographic basin where the Spring Creek Basin HMA is located.

Ms. Holmes provided a summary of her background, which included serving as a journalist in Durango, Colorado who was invited to write a feature article about the mustangs in Spring Creek Basin. After writing the article, she continued to visit the basin for several years. A month after reporting on the 2007 Spring Creek Basin gather, she attended a gather in the Little Book Cliffs Wild Horse Range, where the active participation and calm presence of the volunteers impressed her. They knew the horses as they entered the pens and which ones should be offered for adoption. This is where Ms. Holmes learned the importance of documentation and volunteer/advocate partnerships with BLM.

After visiting those gathers, Ms. Holmes travelled to the Pryor Mountains Wild Horse Range where she learned about bait trapping and fertility control using Porcine Zona Pellucida (PZP). It occurred to her during that visit that BLM didn't have an overpopulation problem, but a reproduction issue. By the time she returned home, she knew PZP implementation and bait trapping would require time and BLM buy-in. Based on her experience in working with and documenting the Spring Creek Basin mustangs, she knew that was the place to start a PZP darting program as they knew the animals and that the animals could be managed to achieve the goal of having healthy horses on healthy ranges.

Since 2008, NMA-CO has many partnerships that benefit the wild horses in the Spring Creek Basin. In 2010, a Memorandum of Understanding (MOU) between the Wild Bunch and BLM was developed. Through quarterly meetings with BLM, range improvement projects were discussed and implemented including fence maintenance, improving an existing water catchment system, and installing a new catchment system, vegetation monitoring, and PZP darting. Wild Bunch members volunteered during the 2011 gather and were instrumental in the success of the adoption event after the gather. Wild Bunch has also held educational events about wild horse management. In addition to Wild Bunch volunteers, the San Juan Mountain Association, University of Missouri, FS, Southwest Conservation Corp, Serengeti Foundation, and private citizens have contributed to vital projects that have benefited the horses.

Establishment of partnerships was the early focus associated with the Sand Creek Basin herd. In 2010, Ms. Holmes met Dr. Jacob Kirkpatrick of the Science and Conservation Center who certified Ms. Holmes for darting wild horses with PZP. In 2010, in cooperation with BLM, Wild Bunch, and the Science and Conservation Center, the PZP darting program was begun at the 2011 gather. In the six years that Ms. Holmes has been documenting horses in the Sand Creek Basin HMA, it has become easier to dart the animals. Before implementing the PZP program, the foaling rate was approximately 21 animals per year. In 2015, there were 3 foals born on the range and four more in 2016 and 2017. Since inception of the PZP program in 2011, no horses have been removed from the Spring Creek Basin HMA.

Due to the collaborative efforts of all partners, there are healthy horses on healthy rangelands and a thriving, ecological balance has been achieved. In 2012, the Serengeti Foundation bought the ranch that included the livestock grazing allotment in Spring Creek Basin HMA. A few years of non-use was taken for resource protection due to drought. The 2015 RMP included a clause indicating that when the permittee in the Spring Creek Basin relinquished their permit, BLM would permanently close the allotment to ease competition the competition between cattle and wild horses. Since the relinquishment and closure, the range has improved remarkably. Fertility control using PZP combined with ending competition with livestock has contributed to recovery of the range as indicated by land health assessments and other vegetation monitoring conducted in the Spring Creek Basin over the last two years.

Ms. Holmes' goal is to enable the Spring Creek Basin mustangs to stay wild on their home range. With the help of PZP, we have proved that it works. What works on the 22,000 acres in Spring Basin area can be applied to small areas of larger HMAs. We employ the philosophy of "want to – can do" and with PZP, the horses in Spring Creek Basin can stay wild on their home range.

Ms. Holmes expressed her gratitude to several individuals for being her inspiration as well as other individuals and organizations for their assistance and efforts in working toward having all Colorado HMAs in the same situation as the Spring Creek Basin HMA.

Following her presentation, Ms. Holmes addressed questions from the Board.

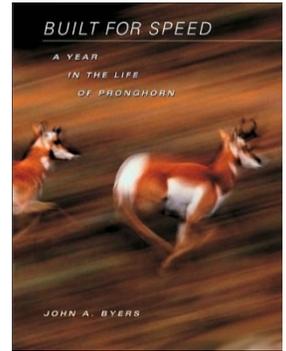
Ms. Kathrens noted that in her experience in darting horses on the Pryor Mountain Range, the horses became harder to dart; rather than easier as described by Ms. Holmes. Ms. Holmes indicated that when she began darting, the hardest mare to dart required six hours and approximately 10 miles of hiking after which she made a 40-yard shot. Ms. Holmes indicated that she is on the range all the time. Those horses are as much a function of the Sand Creek Basin as anything else. She thinks it is respect. She recognizes that darting the animals will hurt, but it is for their own good, which is why she does it.

Ms. Kathrens asked if genetic diversity was an issue for the Sand Creek Basin herd and, if so, how is it being addressed. Ms. Holmes indicated that horses have been introduced into the herd since the 1990s on the recommendation of Dr. Gus Cochran who has completed genetic testing on the Sand Creek Basin herd. In 2001 and 2008, three mares were introduced into the herd. With the relinquishment and closing of livestock grazing, BLM is working on an environmental assessment to update the HMA's management plan to potentially increase the AML from 35 to 65 animals to possibly 50 to 80 animals.

Mr. Yardley acknowledged Ms. Holmes efforts and noted that her approach is what is needed to make progress in reaching and maintaining a thriving, ecological balance. He agrees that the goal of having healthy horses and healthy rangelands is being accomplished in the Spring Creek Basin HMA. Mr. Yardley asked if there had been removal of animals prior to initiating the darting program. Ms. Holmes noted that there had been gathers in the 1990s, 2001, 2005, 2007, and 2011. The 2011 gather reduced the population from 82 to 40 animals at which time the PZP darting program was initiated.

Mr. Yardley added that it appears the animals have diversity in terms of color and character. Recognizing that the Sand Wash Basin HMA is smaller in terms of size and number of animals, he asked how Ms. Holmes how a PZP program could be initiated where there is less diversity and it is difficult to recognize animals based on their characteristics. Ms.

Holmes suggested just start. She referenced a book entitled *Built for Speed: A Year in the Life of Pronghorn* (inset) by John A. Byers who completed a 20-year study of pronghorn on the national bison range in Montana. In that study, they could identify each pronghorn by shape, body, and confirmation. In a theoretical setting, starting a darting program doesn't seem possible, but it has been done in several areas including one with 3,000 animals on the Virginia Range in Nevada. Subdividing larger areas into smaller, more manageable units is a good approach.



Mr. Yardley noted that the one permittee had sold his base property. Ms. Holmes noted that there were originally two livestock grazing permits. In 1990s, NMA-CO bought one permit and worked with BLM to retire that permit. BLM completed a range analysis from which the grazing use was reduced to 326 AUMs and changed the season-of-use to the dormant season (December 1 through February 28). The permit was subsequently purchased by the Serengeti Foundation.

Mr. Masters thanked Ms. Holmes for everything that she has done. Mr. Masters suggested that there are criteria for a successful darting program including (1) being at or close to AML, (2) having approachable animals that are well documented, (3) having a dedicated volunteer staff, and (4) a BLM staff willing to work with volunteers. If we can achieve this level of management in HMAs across the West, the agency would have to complete less gathers, the number of animals removed from the range would probably equal the number of animals being adopted annually, long-term holding would not be necessary, and discussions relating to killing potentially 10,000 animals would not take place. Mr. Masters identified one major challenge that would need to be overcome – how do we get enough volunteers for the darting programs. Ms. Holmes indicated that the challenge of getting a sufficient number of volunteers may not be as large as one would think. She provided examples of darting programs that addressing larger number of animals and volunteers interested in being trained. She stressed the “want to – can do” attitude. We need to start somewhere.

Mr. Masters suggested the Board should discuss or consider (1) BLM providing financial support for the volunteer PZP darting programs (i.e., BLM will give the volunteer organization \$250 for each mare darted) and (2) how to scale the process to other areas that have different record keeping systems. Mr. Masters suggested developing an app that could be used in the field to determine if animals have been treated. Ms. Holmes indicated that there would still need to be a human presence on the ground to differentiate between animals with similar characteristics. She also indicated that each HMA is unique in some aspect (i.e., how animals are documented, keeping track of darting, volunteer darters, etc.) Ms. Holmes stressed that starting small (i.e., one herd per state) is a way of getting started.

Mr. French also expressed his appreciation for what Ms. Holmes has done. Mr. French noted Ms. Holmes' reference of putting a man on the moon and the fact that it required 97,000 people in some fashion to accomplish that action. Mr. French believes the solution to this issue is linking our arms and utilizing the talent and passion of all involved in the wild horse program. We must get passed the paradigm that the only options available are those listed in the *Wild Free-Roaming Horses and Burros Act of 1971*. The Board is trying to initiate a paradigm shift that involves bringing the population level to AML and establish a balance between the animals removed and the animals adopted/sold. The solution will involve our ability to communicate with each other and recognize that each person has a job to accomplish and a commitment to the program. The solution will require using the immense volunteer support base and the passion they bring to the program.

Mr. French noted that it costs the agency, on average, \$50,000 from the time a horse is gathered to when it leaves the system. Recognizing that that \$50,000 will spent in the future, it seems ludicrous to Mr. French that the agency would have concern with expending funding now to avoid spending \$50,000 in the future.

Ms. Sewing noted that she is associated with the National Mustang Association. Ms. Sewing indicated that the Spring Creek Basin effort would not have been started without the participation of the National Mustang Association. The Association fought long and hard with BLM to develop a partnership agreement, the first such agreement to be put in place. In addition, the Association provided seed money for the Spring Creek Basin effort.

Great Escape Mustang Sanctuary & Sand Wash Advocacy Team

Michelle Sander (Great Escape Mustang Sanctuary); Stella Trueblood (Sand Wash Advocate Team); Stephanie Linsley (Great Escape Mustang Sanctuary)



Ms. Michelle Sander

Ms. Michelle Sander from the Great Escape Mustang Sanctuary (GEMS) and Ms. Stella Trueblood from the Sand Wash Advocate Team (SWAT) jointly addressed their respective organizations and efforts.

Ms. Sander recognized Ms. Holmes for her mentoring efforts with SWAT and GEMS. Ms. Sander is excited to address the Board concerning an idea she had in 2011 of providing on- and off-range support modelled in one HMA.



Ms. Stella Trueblood

Their motto is “collaborative solutions to protect the resources and save our mustangs”, which plays into the notion that the land is an important resource for every competing interest and making sure there are healthy horses on health rangelands.

Today, GEMS is that innovative model working with BLM and other key organizations (i.e., Mustang Heritage Foundation (MHF)) for both on range and off range collaboration for healthy herds, lands, and homes for mustangs. It is GEMS’ vision that this model of support be replicated in other HMAs. GEMS is a non-profit organization formed in 2010, which rely 100 percent on public donations, fund-raisers, and grants to implement their programs.

Off range, GEMS provides training and adoption of mustangs and burros, while providing a sanctuary for animals in need. GEMS also fosters a connection with children and adults through community outreach, tours, field trips, overnight retreat programs, therapeutic programs, and horsemanship clinics to increase public awareness and education.

On range, the GEMS organization is responsible for herd documentation, fertility control, special range projects, and promotion of proper wild horse management for the Sand Wash Basin HMA.

On-Range Support

SWAT is an on-the-range project of GEMS, formed in 2012, recognizing the need to organize the energy and efforts of individuals and groups in supporting the Sand Wash Basin land and wild horses. SWAT is 100% volunteer driven. Ms. Trueblood referenced a comment made earlier about getting more volunteers interested in the darting programs, especially on the larger HMAs. Ms. Trueblood indicated that when she started darting in 2014, she was the only qualified person to dart animals.

Services provide by SWAT include:

- herd documentation and database implementation for tracking herd genetics;
- Implementing a PZP fertility control program developed in 2014 by SWAT working with BLM;
- Provide bait and trap gather support;
- Assisting with special projects; and,
- Promoting the Sand Wash Basin mustangs.

When discussing SWAT’s darting program, Ms. Trueblood noted that prior to her efforts, the HSUS was implementing darting operations in the Sand Wash Basin HMA. SWAT assumed responsibility for the darting program in 2014. In 2015, another person (Connie) became certified to dart and they now work as a team. In 2017, a PZP training was held in Grand Junction, doubling our number of trained volunteer darters.

A bait trapping removal operation was initiated in November 2016 and ended in January 2017, during which 43 animals were removed from the Sand Wash Basin HMA. Ms. Trueblood expressed her appreciation to BLM Colorado and, more specifically, the Little Snake Field Office for their forward thinking and willingness to have a bait trap gather; rather than the traditional helicopter operation. There were two adoption events after that gather that were successful in finding good homes for the 43 animals.

SWAT worked closely with BLM during the 2016 National Public Lands Day event, resulting in the construction of one mile of fencing before the weather put a stop to efforts. Some volunteers place nearly 1,000 reflectors on the fence for protection of sage-grouse.

Ms. Trueblood summarized four slides that addressed (1) foals born per month in 2017, (2) the number of mares treated by SWAT volunteers from 2014 through 2017, (3) the number of mares treated, and the foals born to those mares the following year, and (4) the number and breakdown of mares darted through primary and booster injections between 2014 and 2017.

Off-Range Support

Training



Ms. Stephanie Linsley

Ms. Stephanie Linsley addressed the off-range support provided at Great Escape Mustang Sanctuary and Training Center. As horses are removed from the rangelands, it is important they receive the support they need in finding good homes. It is not always easy for an inexperienced adopter to gentle and/or train a wild animal, so GEMS provides gentling services, so the animals may be handled by veterinarians and farriers. Halter and saddle training is also offered by GEMS.

In addition, GEMS utilizes trained Ambassador mustangs and burros that are used in their programs for the public to understand and experience the animal's potential once trained.

GEMS has found that training increases the success of adoptions, which decreases the rate at which adopted animals are returned to GEMS.

Ms. Linsley noted that, working closely with the MHF, the GEMS training facility became the first TIP Store Front in Colorado. TIP trainers cannot pick up wild horses at the Canon City facility, so they can only access horses through the GEMS Store Front. Approximately 250 horses have been moved through the training facility since inception of the Store Front program. Approximately 50 trainers rely on the training center to access horses for the TIP program. Ms. Linsley learned yesterday that only 20 horses are scheduled to be provided to the center this fiscal year, which they will be able to move within the first month.

Adoptions

To complement the training program, the training center also host adoption events.

Due to the Canon City BLM Holding Facility is located, the center works throughout the year to partners with Stephen Leonard to host adoption events. This is another avenue of public exposure to wild horse adoptions, making them as accessible and available as possible. This year, the center plans to host monthly open house/adoption events to invigorate the adoption market. The center offers continued support, even after adoptions, to ensure a long-lasting relationship with adopters and their horse.

The center hosted the 2017 Colorado TIP Challenge...a "mini Extreme Mustang Makeover" where 20 trainers participated (18 adult, 2 youth). The trainers picked up animals from the center at the beginning of June, which were

shown during the “mini-Extreme Mustang Makeover” event in the beginning of September. Afterwards, the Center hosted an additional adoption event.

Outreach

Public outreach is another important arm of GEMS.

GEMS travel to schools bringing wild horses and burros presentations to children of all ages, from Pre-School to High School, and Career Development Centers - all while discussing the issues utilizing age appropriate materials and conversations. In addition, GEMS accompanies schools willing to dive in even further to visit the wild herds of Sand Wash Basin.

GEMS hosted a BLM Compliance Check Training utilizing volunteers to fill in where BLM may not have the funding to do so. GEMS has set up booths and maintains a presence at Expos and other community events including bringing trained Ambassador Mustangs to participate in events and outside clinics to showcase the versatility and abilities of the mustang.

Educational Programs

GEMS hosts a myriad of educational programs involving clinicians and other groups. In addition, GEMS offers day tours of their training center and sanctuary herds; conduct horsemanship clinics; offer ranch riding and cow work clinics; through a partnership with Mike’s Camera in Denver, photography workshops; and host children’s field trips.

In collaboration with Stephen Leonard, GEMS started a new type of 4-H club in Boulder City known as the 4-H Mustang Weanling Training Program. The *Spirits of the West Mustang Training Club* focus on teaching children the important skill of natural horsemanship through min-clinics with guest instructors, going to instructor’s facility for an obstacle course clinic, and providing mentors. There were 24 children and 7 weanling mustangs involved in the program in 2016. The one consistent lesson learned by the children was patience.

Sanctuary Pasture

GEMS provide a sanctuary pasture for animals that aren’t receptive to training and were meant to live wild. The pasture currently serves as home to 27 animals.

Retreat

The primary purpose of the retreat center is to expose the public to mustangs. The retreat facility is available for rental and is host to many health and wellness programs such as yoga workshops, women’s retreats, mindfulness and meditation retreats, and therapeutic programs focused on children.

Following the presentation, the speakers addressed questions from the Board.

Mr. Bolstad thanked Ms. Holmes, GEMS, and SWAT for being exemplary examples of what partners can achieve. Mr. Bolstad indicated that BLM should do everything possible to financially support such efforts, but has multiple competing funding priorities (i.e., on-range and off-range activities, etc.). While recognizing that GEMS and SWAT utilize grants and their partnership with MHF, Mr. Bolstad asked if they are able to utilize private funding sources. Can they engage the private sector to provide additional funding? Ms. Sander indicated that they are a non-profit organization and already utilize funding received from other sources (i.e., Colorado Unwanted Horse Alliance, etc.) Costs associated with training animals are expensive and is a losing proposition for GEMS, but some costs are offset through training grants. Much of their work is supported by the public (i.e., fund raising events, donations, etc.) Ms. Sander noted that ecosanctuaries are funded by BLM, but GEMS doesn’t have such a partnership. GEMS continues find the funding necessary to provide off-range support. Mr. Bolstad noted that there is need of volunteers to find the financial resources needed to continue such efforts.

Dr. Weikel inquired as to the Serengeti Foundation and GEMS relationship to that organization. Ms. Holmes indicated that the Serengeti Foundation purchased and held the livestock grazing permit until it was relinquished and closed. In 2010, the Foundation was exploring opportunities in the United States to help animals or to address important issues. After the Foundation bought the ranch and its associated grazing permit in 2011, Ms. Holmes was hired by the Foundation to manage the sanctuary with the understanding that her employment was primarily due to her volunteer work with BLM. Ms. Sander added that everything that has been accomplished through GEMS and SWAT have been accomplished by two full-time employees in GEMS and one in SWAT and, more importantly, with the assistance of many volunteers.

Mr. Yardley indicated that the two organizations are doing many good things, particularly with children who can learn from working with horses including many life lessons that carry over into human relationships. He, personally, learned patience while working with horses in his childhood. Mr. Yardley is encouraged by those willing to work with the animals and the rangelands to achieve positive results while not tying up agency financial resources in litigation, which keeps BLM from meeting their responsibilities.

Utah Summit Presentation

Dr. Terry Messmer, Utah State University



Dr. Terry Messmer

Dr. Terry Messmer expressed his appreciation for the opportunity to address the Board concerning the outcome from the National Wild Horse and Burro Summit. Dr. Messmer's presentation addressed several questions raised during that Summit.

Background

Dr. Messmer provided an overview of his background and why he is addressing the Board today. Dr. Messmer is a professor at Utah State University and is Director of the Jack H. Berryman Institute. He comes from a small farm background in South Dakota. Dr. Messmer entered the field of wildlife management by obtaining degrees in wildlife management, biology, community regional planning, and animal range science – all of which focused on human-dimension aspects. Dr. Messmer indicated that in addition to his wildlife-related work, he retired from the military in 2014 after a 41-year career that focused on preventive medicine, and, more specifically, combat stress control.

The Jack H. Berryman Institute (Institute) was contacted to assist in organizing and conducting a national summit on wild horse and burro management. The Institute is a “think tank” focusing on the science of managing and mitigating human/wildlife conflicts – applying science, management, and education to develop policies through teaching education that enhances human/wildlife interactions while reducing those conflicts. This work is done through outreach, engagement, national symposiums, etc. Over the past 20 years, the Institute has hosted over 20 national symposiums addressing a variety of topics. Dr. Messmer noted that the Institute also publishes the *Human-Wildlife Interactions* journal.

Dr. Messmer addressed three human/wildlife interactions that were included in the *Human-Wildlife Interactions* journal. The first interaction was someone feeding a squirrel. Several years ago, the Institute completed a random, stratified national survey of 1,500 households in the United States, which discovered that 66 percent of those households had a negative wildlife experience within the previous five years. Their relationship with wildlife in the urban environment was negative (i.e., deer in the garden, deer hit by car, etc.)

Individual experiences and observations shape our values and perceptions about wildlife and the management of wildlife. In the absence of those types of experiences, participants were asked where they received their information to which the responses were family, friends, and social media. Research suggests that 87 percent of the public in the United States receive their news from social media outlets.

The second human/wildlife interaction focused on the concept of “one health”, which refers to the interaction between human beings, wildlife, and the environment, each of which influences the others. You cannot examine human health, wildlife health, or environmental health separately as they are intertwined.

The third human/wildlife interaction focused on large carnivores, particularly predatory animals. In the last 50 years, the number of wildlife predatory attacks on human beings has increased. The publication focused on peer-reviewed science of (1) what are the attacks, (2) why are they occurring, and (3) how can those attacks be mitigated by our behavior. Many of the attacks are caused by human ignorance. A national survey was completed on the public’s response to predators and predation management (what does the public think about predators and the role of managers in managing predation). The survey involved describing scenarios where a predatory animal was preying on a specific species on which the respondent could make decisions based on the animal, information, their knowledge of the scenario, and their perception of the value of the predatory animal. The survey found the public to be sophisticated – if provided the correct information/science, the public could see “shades of grey” (i.e., understand the role of target management to address the issue.) Information and education are part of the knowledge base that helps in making decisions, but are also related to how values affect outcomes.

National Wild Horse and Burro Summit

The National Wild Horse and Burro Summit (Summit) held in Salt Lake City, Utah on August 24, 2017, was attended by approximately 230 individuals and over 100 organizations from 30 different States who were concerned about issues and implementation of the *Wild Free-Roaming Horses and Burros Act of 1971*. Those individuals invited to attend were identified by a steering committee consisting of 20 organizations.

Organizers of the Summit received criticism on the Summit’s logo (Figure 1), which was designed to reflect the concern, despair, and frustration of participants. Dr. Messmer noted that over the course of the Board’s meeting, there were many personal, individual values and perceptions expressed – all of which are valid – and should be valued.

Presentations given at the Summit are available on the web at www.wildhorserange.org/summit-presentations.html. The Summit’s principal focus was to establish an understanding of the basic science. The metric of determining what science is appropriate and acceptable is having science that has been peer reviewed by the scientific community – having undergone review and evaluation of its methodology and techniques using standard scientific process. If the study withstands the rigor of such review and evaluation, it is published in a recognized peer-review journal.



Figure 1 - National Wild Horse & Burro Summit Logo

Dr. Messmer noted that the survey conducted at the Summit represents a sample of individuals attending the Summit, which is a cross-section of individuals, organizations, and interests concerned with the issues. It was not a random survey; therefore, it did not contain the rigor commonly found in national surveys. Dr. Messmer urged the Board to use caution when hearing statements about a percentage of people supporting “X” or “Y”, unless there is documentation that the survey was conducted, and the questions asked followed a standard rigorous protocol developed by sociologists and people experienced in survey techniques. Dr. Messmer encouraged the Board to consider a good national survey about public perceptions concerning wild horse and burro management and policy.

The Summit’s survey was conducted on the last day of the Summit. Presentations were given to create a level of understanding – not agreement – of the issues (i.e., what has happened historically, what is the science and policies, etc.) It is important that people recognize that science is never done. As new techniques or products are developed, science

will change. Using a clicker/question response methodology, specific questions (developed by social scientists) were presented to the audience¹ after which the respondents pressed their clicker as appropriate providing instantaneous results.

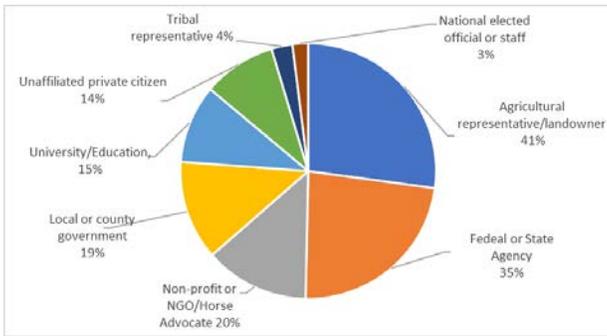


Figure 2 - Summit Survey Respondent Affiliation

The first question asked respondents to identify an affiliation (Figure 2). Dr. Messmer noted that the percentages will not add up to 100 percent because respondents could identify more than one interest.

The second question focused on what respondents were doing. Results found that 55 percent of respondents associated with an organization that had a policy or position statement on wild horse and burro issues. Sixty-nine per cent of respondents indicated an interest in having their organization commit staff time or other resources to wild horse and burro issues beyond their current level of involvement.

Respondents were also asked what actions they might take after the Summit. Responses included public education/outreach, lobbying/advocacy, calls to action shared with members/constituents, devoting staff time to coordination or committees, and research.

Seventy-five percent of respondents felt a similar conference in the future would be of value.

In the category “Why are you here”, respondents were asked to respond to the statement “I care about making sure horses are treated humanely”. Ninety-two percent indicated that it was the reason they attended the Summit.

(The rest of this page was left blank intentionally.)

¹ Not all attendees of the Summit participated in the facilitated session.

A series of questions were asked to which the respondents could either strongly agree, agree, have no opinion, disagree, or strongly disagree. The following summarizes the responses to those questions.

Question	Strongly Agree (%)	Agree (%)	No Opinion (%)	Disagree (%)	Strongly Disagree (%)
I am concerned about the impact of current horse population numbers on the health of rangeland resources	99	1	0	0	0
I am concerned about the impact of current horse population numbers on wildlife.	78	21	1	0	0
I am concerned about the impact of current horse population numbers on rural economies.	57	35	7	1	0
I am concerned about the impact of current horse population numbers on individual horse health.	36	56	5	3	1
I am concerned about the cost to taxpayers of holding horses.	76	20	3	0	1
I believe that achieving “Thriving Natural Ecological Balance” requires maintain a diversity of plant and animal species on the range.	78	21	1	0	0
I believe that achieving “Thriving Natural Ecological Balance” requires achieving rangeland health standards on federal lands.	56	34	7	3	1
I believe it is possible to increase adoptions enough to meet the current supply of excess horses.	0	3	1	25	71
I believe that no-kill solutions alone can adequately address off-range populations under current conditions.	1	4	3	21	71
I believe that no-kill solutions alone can adequately address on-range populations which are over AML. (Clarification: Under current conditions, no imposed \$ limit, no kill anywhere)	1	3	1	15	80
I believe that a combination of temporary and permanent fertility control can reduce (current) horse populations enough, within the foreseeable future, to alleviate impacts to rangeland health. (Clarification: Under current law, and not in combination with euthanasia)	1	3	1	14	80

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A second series of questions were asked to which the respondents were completely supportive, moderately supportive, no opinion or don't know, moderately opposed, or completely opposed. The following summarizes the responses to those questions.

Question		Completely Supportive (%)	Moderately Supportive (%)	No opinion or don't know (%)	Moderately Opposed (%)	Strongly Opposed (%)
How supportive are you of...	...the status quo situation (i.e., horse populations increasing despite management efforts)?	1	2	0	1	96
	... commercial use of horses (and burros) for protein for zoo animals?	78	18	1	2	1
	... commercial use of horses (and burros) for protein in pet food?	86	13	0	1	0
	... developing additional opportunities for adoption within the United States? (Clarification: assumes additional resources would be dedicated to it)	67	18	5	8	2
	... developing additional opportunities for adoption outside the United States? (Clarification: assumes we can't control anything after adoption, but it is focused on "adoption")	58	29	10	3	1
	... permanent sterilization (spaying) of mares?	71	18	1	7	3
	Maintaining non-reproducing herds in HMAs? (Clarification: herds in these areas would not die but rather be supplemented by sterile horses from elsewhere)	32	28	22	10	8
	... BLM allowing individual states to manage the horses within their boundaries? (Clarification: states would develop their own policies, not just use federal regulations)	55	21	5	8	11
	... gathering and removing excess horses to place them on private leased pastures off federal land? (Clarification: regardless of costs; more capacity for where off-range horses could be placed)	15	28	13	15	28

(The rest of this page was left blank intentionally.)

Question		Completely Supportive (%)	Moderately Supportive (%)	No opinion or don't know (%)	Moderately Opposed (%)	Strongly Opposed (%)
How supportive are you of...	... reducing the age of "sale without restrictions" from 10+ years old to 5+ years old.	67	26	6	0	1
	... euthanizing for population control for unadoptable horses?	81	15	1	3	1
	... adding mules to horse herds to control herd growth? (Clarification: this would be behavioral control so sterile males collect harems of mares and prevent breeding by stallions)	8	13	31	10	38
	... expanding the size of current HMAS?	3	1	4	12	80
	... increasing the number of HMAS? (Clarification: this would add new acreage via new areas)	0	1	6	8	86
	... allowing the horses to self-regulate on the range (i.e., take no management actions at all)?	0	1	0	1	98
	... maintaining horses in BLM holding facilities (about \$1,800/year/animal) for the remainder of their lives?	1	1	1	19	78
	... creating a clearinghouse for information and resources on management options?	46	27	19	4	5

The March/April 2018 edition of the *Human-Wildlife Interaction* journal will be dedicated to addressing wild horse and burro management. The issue will address the science behind the issue as well as commentaries. Dr. Messmer encourage the previous speakers at the Board meeting to provide a manuscript documenting their efforts and successes.

A call for papers has been released seeking contributed original science and/or synthesis and review papers for the special edition. The goal is to synthesize the science, management, and policy regarding implementation of the *Wild Free-Roaming Horses and Burros Act of 1971* and the management of wild horses and burros worldwide.

The submission deadline for contributing a research article, case study, opinion, commentary, or other manuscript for the special edition is January 1, 2018. Documents may be submitted online at www.digitalcommons.usu.edu/hwi.

Following his presentation, Dr. Messmer addressed questions from the Board.

Ms. Kathrens thanked Dr. Messmer for his presentation and indicated that it would have been nice to meet him at the Summit; however, those who are actively involved in wild horse advocacy weren't invited. Ms. Kathrens asked who had contacted him to begin the Summit process. Dr. Messmer indicated that initial contact came from the Summit's Steering Committee that included environmental interests, sportsmen, and state and federal agencies. A complete list of organizations involved in charting and planning the Summit is available on the Jack H. Berryman Institute's website.

Ms. Kathrens asked if there was a person or organization which initiated the proposal. Dr. Messmer indicated that the Summit was an off-shoot of work done by the Institute three years prior in looking at developing the Utah plan. The initial conversation came from the Utah Department of Natural Resources, which wanted to revisit the issue.

Ms. Kathrens asked if any of the previous speakers (at the Board meeting) had been invited to attend. Dr. Messmer noted that the individuals who attended were nominated by the Steering Committee. There were individuals representing horse advocates and suggested many who attended had a strong interest and support for horses and horse welfare. Ms. Kathrens indicated that she was not familiar with those organizations, to which Dr. Messmer noted the American Mustang Foundation of which Ms. Sewing is a member was invited. Mr. Masters asked if the Humane Society of the United States (HSUS) was invited to which Dr. Messmer indicated that they were invited as was the Defenders of Wildlife. Both of those organizations were unable to attend the event, but were interested in maintaining contact and receiving follow up information. Note: Later in the meeting, it was clarified that HSUS had not be invited to attend the Summit.

Ms. Kathrens noted that, in her experience as a political media consultant doing qualitative and quantitative research, the results presented today spoke to a not having a broad representation of interests invited to the Summit, which was, in her experience, unusual and suggested the right kind of sampling was not done. Dr. Messmer emphasized that during his presentation, he expressly stated that the survey did not represent a rigorous representative sample of America. He noted his extensive background and experience in social science and that he understands the public input process. The results were presented as a reflection of the cross section of individuals that participated in the Summit and identified the demographics, but, in no way, indicated that it represented the United States public. At the same time, the idea that someone can say the public supports a specific viewpoint or a certain percentage of people support an issue without having presented the proper demographics and without a rigorous survey, is inappropriate.

Ms. Kathrens suggested that in the future it would be great to invite people who share disparate views. She indicated that she and others would like to participate in future conferences. There are people in the room that deserve to be at the table. Dr. Messmer noted that his recommendation to the Board would be to support a rigorous random, stratified survey that clarifies the American public's knowledge and understanding of the wild horse and burro program, its options, and how things are integrated. Without such a survey, everything that is said is based on personal observation. By quantifying and/or qualifying the information presented today, it can be said there was strong support for issues but, again, it represents the demographics of a select audience, and, is not a random, stratified sample of the American public.

Dr. Weikel asked Mr. Bolstad to address the status of the national survey being funded by the BLM. Mr. Bolstad reported that the national survey has not been initiated. Mr. Jason Lutterman noted the national survey, known as the *Knowledge and Values: Wild Horse and Burro Study*, is in BLM's Washington Office, who is responding to over 6,000 comments that were received during the public comment period. Once BLM completes its process, the survey will be submitted to the Department of the Interior who, in turn will forward it to OMB for approval. Once OMB approval is received, BLM will develop focus groups to develop the survey questions. Dr. Weikel noted that this has been a slow process. Mr. Lutterman noted that, typically, four or five public comments are received for these types of notices, whereas BLM received thousands in this instance.

Mr. French asked when the survey process had been initiated. Mr. Lutterman indicated that the process was initiated in 2015. Mr. French asked when the public could expect to see the survey released. Mr. Lutterman indicated that the contract for the survey has been extended for an additional two years, but expectations are the focus group work will be completed within one year with release of the survey the following year.

Dr. Messmer noted that many surveys done in the past have been mail surveys with follow up responses, and, if a survey response was not received, the individual was contacted by phone. The demographics and complications associated with a true survey is difficult. There are several organizations and groups that specialize in preparing and analyzing such surveys. He isn't sure of the process used by BLM, but offered a word of caution about polling results. Internet surveys are suspect in terms of the results due to how they can be influenced by social media. There are standard techniques and organizations that are well-versed in conducting such surveys.

Dr. Weikel asked Dr. Messmer to clarify the differences between two questions (below) and address the degree to which the audience understood those differences.

1. How supportive are you of maintaining horses in BLM holding facilities (about \$1,800/year/animal) for the remainder of their lives?
2. How supportive are you of gathering and removing excess horses to place them on private leased pastures off federal lands?

Dr. Messmer indicated that private leased pastures off federal lands would not be a holding facility. It would be an alternative mechanism where working with local ranchers is stressed. There has been interest from some Utah ranchers who would like to be more of a partner in the management process with the goal of preserving desired physical traits of the traditional Spanish mustang (i.e., body characteristics, etc.) Those ranchers suggested working with BLM to assume more of the management role (i.e., removing, culling, etc.) and would be willing to pay BLM for the Animal Unit Months (AUM) for having the horses on their federal permit. This concept is doing something different than current long-term pasture strategies and creates more freedom in terms of how populations are managed.

Dr. Weikel suggested there might be some confusion in the respondents between long-term pastures, long-term holding, and partnerships that allow a local group to guide genetics for cultural reasons. Mr. Bolstad indicated that BLM currently leases private pastures on which excess animals are placed. What is not currently available is the involvement from the private sector in managing those herds. Dr. Weikel suggested the wording in the second question (above) is the definition of BLM's existing long-term pastures; however, the intent of the question as outlined by Dr. Messmer is a different approach, which may not have been fully understood by the respondents. Dr. Messmer noted that, during the Summit, there was a tour of the Delta, Utah short-term holding facility, which gave the Summit participants an understanding of that type of facility versus the involvement of landowners looking at a leased-pasture option.

Mr. Bolstad asked if it might be similar in concept to the proposal made to BLM by Madeline Pickens. Dr. Messmer indicated that he was familiar with the Pickens proposal. The Utah rancher alternative is trying to create more capacity (i.e., creating more horses available to be placed on private-leased ranches). Looking at the dispersion between responses to this specific question, Dr. Messmer suggested the responses may reflect confusion concerning the question. Dr. Messmer noted questions used in a national survey will be vetted through a focus group to ensure the respondents understand the terminology and what the questions mean.

Ms. Kathrens asked as to the validity of the statistics and conclusions when the Summit was started with a logo that depicts a horse and burro that appear to be starving. Dr. Messmer indicated that the logo was developed by responses from the Steering Committee and reflects the general concern of the sense of urgency and responsibility. The Steering Committee discussed having a healthy free-roaming horse, but it would reflect an image that everything is right with the world, which it is not the case. It was the consensus of individuals at the Summit, and, based on what Dr. Messmer heard during yesterday's comment period, everyone is not happy. Everyone wants to see the right thing being done, but we differ on what that right approach should be. Dr. Messmer indicated that he understood and shared Ms. Kathrens concern, but the idea reflected and came out of the Summit is that we can't continue to "kick the can down the road". Things that have been done over the past 20 years have exacerbated the situation, which is becoming more tense, volatile, and emotional. Dr. Messmer noted that the Summit participants were open to new ideas, new partnerships, but there is a sense of urgency and that something needs to be done now.

Ms. Kathrens agreed that something needs to be done. She indicated that it would be nice to include those who are not "kicking the can down the road" – who are doing something. Including the "non-can kickers" would have been a good thing. Dr. Messmer appreciated Ms. Kathrens' comments and the work being done by the previous speakers.

Mr. Yardley responded to Ms. Kathrens comment regarding the logo. Mr. Yardley believes the logo portrays what we are up against right now with the wild horse and burro population. Mr. Yardley is proud of the work being done by Ms. Holmes, GEMS, and SWAT and doesn't feel the work they've done should be overlooked. Without some type of natural disaster, the current wild horse and burro population, which significantly exceeds the AML, in most HMAs, is reality – that's what we're up against. In the next four years, that number will double without intervention of some kind. No one wants to see animals die of thirst or starvation, but, unfortunately, that will happen if the status quo continues. There are tough decisions that need to be made right now, decisions that should have been made many years ago.

What are the Key Elements of a Sustainable Wild Horse & Burro Program?

Mary Jo Rugwell, BLM Wyoming State Director

Background

Ms. Rugwell indicated that she had been asked by the acting BLM Director, Mike Nedd, and the acting Deputy Director, John Ruhs, to serve as a co-leader in developing a Report to Congress (Report), which will outline key elements to sustainability for the wild horse and burro program.

Ms. Rugwell recognized the previous speakers, T J Holmes, GEMS, and SWAT, for their presentation, which are shining examples of passion combined with meaningful advocacy and action, which will be one of the key elements to achieving sustainability in the wild horse and burro program.

Secretary Zinke held initial conversations with a variety of advocacy groups to obtain their input on the challenges being faced by the agency. Those were initial conversations and she believes there will be additional conversations with advocacy groups.

Language in the *Consolidated Appropriations Act of 2017*² requested BLM develop “a plan to achieve long-term sustainable populations on the range in a humane manner”. Ms. Rugwell emphasized that BLM’s goal is to maintain healthy horses on healthy rangelands. Gathers are very difficult for everyone and not something the agency would like to continue to do. An avenue needs to be found which maintains the appropriate number of wild horses (and/or burros) as well as maintaining a healthy rangeland, which is what everyone in the room would like to achieve.

Key Elements

An Interdisciplinary Team (IDT) has been working to identify key elements (inset) that will be addressed in the Report. The purpose of this presentation is (1) to present the key elements identified at this point and (2) provide the Board opportunity to provide input as to different avenues for achieving the key elements, which will be included in the Report.

Element 1: Achieve AML

The *Wild Free-Roaming Horses and Burros Act of 1971* outlines “Where the Secretary determines ... that an overpopulation exists on a given area of public lands and that action is necessary to remove excess animals, he shall immediately remove excess animals from the range so as to achieve appropriate management levels.” This is important not

Key Elements of the Report to Congress

Achieve AML

Maintain AML

Reduce Holding Costs

Placing Excess Animals
into Private Care

Ensure Humane
Treatment

Use Best Available
Science

Provide Economic
Development and
International Aid

Provide Public
Information

Increase Partnerships

² Passed by Congress on May 5, 2017.

only for the health of the rangelands but for the health of the wild horses and burro as well. It is not just the right thing to do, but the agency is mandated by law to do it.

There were approximately 25,000 animals (wild horses and burros) living on the public lands in 1971. The national AML is approximately 27,000 animals. The current population estimate of animals on the range is approximately 73,000, which does not include the 2017 foal crop (estimated to be approximately 13,000 animals).

Figure 3 depicts the wild horse and burro population nationally versus animals removed from 2001 through 2017.³ The on-the-ground population level was close to the national AML in 2007; however, without effective long-term population growth suppression tools and the inability to gather large numbers of animals due to the lack of holding capacity, the national population increased to a high of 72,674 animals in 2017.

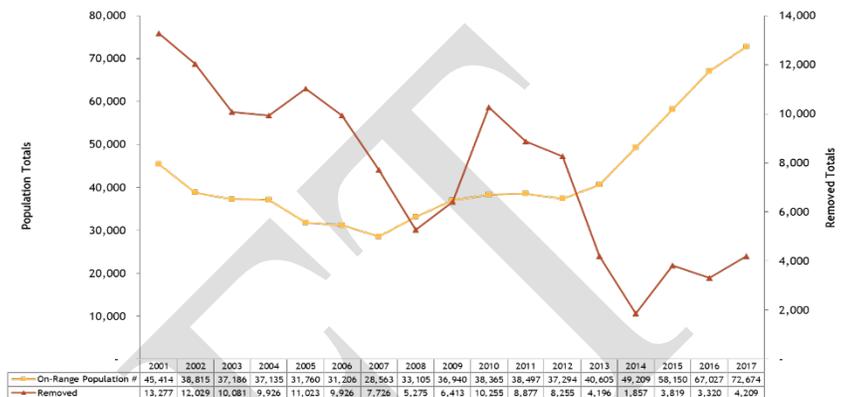


Figure 3 – Wild Horse & Burro Population & Removal Trends

In summary, the BLM is mandated to maintain wild horses and burros at the established AML; however, estimated populations currently exceed AML by approximately 46,000 animals and existing fertility-control vaccines are ineffective at achieving AML in overpopulated HMAs.

Element 2: Maintain AML

Without population growth suppression, the number of animals on the range will double in size every four years, which exponentially increases over time. There are few natural predators for wild horses and burros; therefore, if the herds are not managed, there will be a devastating impact to the rangeland and the wild horses and burros. Approximately 84 percent of the 177 HMAs are above AML. In addition, BLM is mandated by the *Federal Land Policy and Management Act of 1976*⁴ to manage the public lands for multiple use and sustained yield of which wild horses and burros are one of the many uses of the public lands. Without having controlled wild horse and burro populations, other uses and users of the public lands are being adversely impacted.

Two avenues are available to the agency for maintaining AML – (1) gather, remove, and adopt/sell animals and (2) fertility control. Use of PZP darting programs have been successful in controlling population growth on smaller HMAs such as the Book Cliffs HMA, which the Board toured this week, and the McCullough Peaks HMA in Wyoming; however, such programs are difficult to administer on large HMAs with the challenges of approaching animals and the drug’s short-term efficacy. A more practical approach, which BLM does not like, is to gather and administer PZP vaccines by hand, which costs, on average, \$2,500 per animal. An effective, long-lasting vaccine would benefit the agency’s efforts to control population growth.

In summary, without use of population growth control tools, wild horse and burro populations increase between 15 and 20 percent annually. BLM must maintain populations within AML in 177 HMAs. Existing fertility-control vaccines are effective for approximately one year and there are limited budget and staffing resources for fertility-control operations and maintaining animals in off-range facilities.

³ As of October 5, 2017.

⁴ Public Law 94-579, 90 Stat.2743 signed by the President Ford on October 21, 1976.

Element 3: Holding Costs

In 2017, BLM spent \$47.5 million to maintain animals in short- and long-term holding facilities, which is almost two-thirds of the agency’s wild horse and burro budget.

The President’s Budget for Fiscal Year (FY) 2018 proposed to reduce the wild horse and burro budget by approximately \$10 million, which, Ms. Rugwell believes, prompted Congress to request the Report.

To hold animals in off-range pastures (long-term holding) and off-range corrals (short-term corrals) is \$2 and \$5 per animal per day, respectively. With approximately 43,800⁵ animals currently being held in short- and long-term holding, these costs would total \$1 billion to hold the animals for the remainder of their lives.

Although off-range, short-term corrals are more expensive, they are a necessary component as animals are taken to the facilities when they are removed from the range for freeze branding, vaccination, aging, de-worming, blood drawn for analysis, etc. In addition, the short-term facilities host adoption/sale events, which would be difficult in off-range pastures or on the rangeland.

In summary, holding costs for excess animals in FY 2016 accounted for approximately two-thirds of the agency’s wild horse and burro program budget. In moving forward, BLM must reduce current holding costs and not add to off-range populations. More expensive short-term holding corrals are necessary for program functions.

Element 4: Private Care

When the agency was close to AML in the early 2000s, the agency adopted approximately 7,500 animals per year. Over time, the number of animals adopted or sold decreased dramatically to a low of 2,222 animals in FY 2014 (Figure 4). In the last three years, the adoption/sale trend has reversed primarily through partnerships with groups/organizations such as GEMS and the Mustang Heritage Foundation, which makes animals more adoptable through training and gentling programs.

In summary, adoption and sale have restrictions on age, use, and facility requirements put in place by laws, regulation, and policy. BLM placed nearly 8,000 animals in private care in FY 2002 as compared to 3,100 animals in FY 2016. BLM is on track to place more than 4,000 animals into private care in FY 2017, which is up from FY 2016, but still insufficient to address the program’s needs.

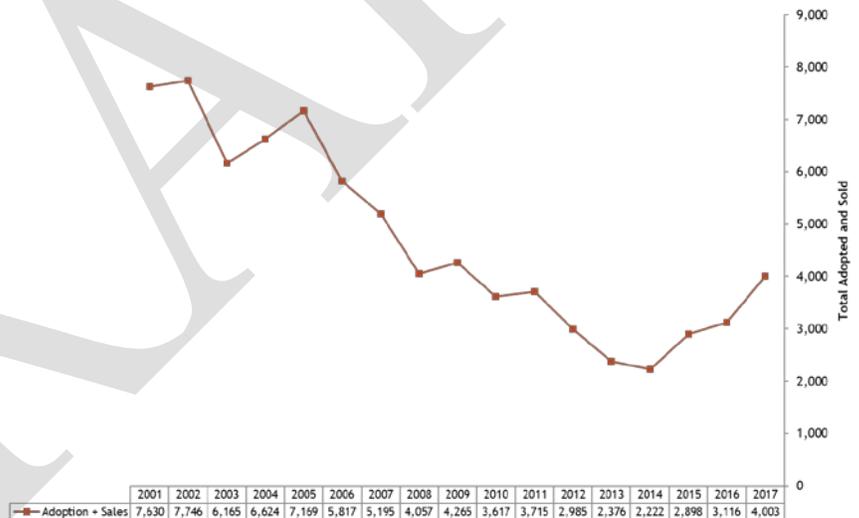


Figure 4 – Wild Horse & Burro Adoption/Sale Trend

⁵ 10,900 in 26 holding corrals and 32,900 in long-term pastures.

Element 5: Humane Treatment

BLM has a comprehensive animal welfare policy in place for gathers, which requires a veterinarian be present during gather operations. Ms. Rugwell re-emphasized BLM's goal is to establish and maintain a balance between the population's growth on the ground and the number of animals leaving the program through adoption, sales, and natural mortality. Maintaining that balance would eliminate the need for gathers in the future.

In addition to the animal welfare policy for gathers, BLM is developing additional policies for transportation, holding facilities, and adoption events.

Element 6: Best Science

In FY 2017, BLM supported 24 research studies spending \$13 million. Of the 24 studies, half (12) are directly related to population control methods (spay/neuter and longer-lasting contraceptive vaccines) with United States Geological Survey (USGS), the research arm of the Department of the Interior, non-governmental organizations, and several universities. The remaining 12 studies address other management techniques such as more accurate population models and survey techniques, which are being conducted by the USGS and a population genetics research study being completed by the Texas A&M University.

In summary, in 2014, BLM implemented the National Academy of Sciences recommended population survey methods to increase accuracy of BLM's population estimates. In 2015, BLM launched a wild horse and burro research initiative, which includes twelve on-going research studies for improved contraceptives and spay/neuter techniques.

Element 7: Economic Development and International Aid

BLM believes there is a market for animals being held in long-term holding facilities, which may assist in partnerships with Tribal governments and foreign countries that could put animals to beneficial (non-consumptive) uses. Dr. Weikel asked if BLM was aware of approximately 100,000 excess feral horses on Native American reservations. Ms. Rugwell indicated that the agency was aware of that fact and that there are reservations that would not benefit from a partnership with BLM; however, there may be many other Native American reservations that may benefit from such a partnership.

Element 8: Public Information

With an increase in social media platforms, BLM is engaged with Facebook and Twitter trying make information about upcoming adoption events, wild horse and burro viewing opportunities, etc., available to the public as well as providing the public with detailed information and statistics. BLM recently changed its platform for distribution of external information and is working to overcome several challenges. In addition, brochures, flyers, and other promotional materials are produced for different public events.

Element 9: Partnerships

Partnerships is an area where the agency needs to improve to have success in meeting the program's goals. The Mustang Heritage Foundation has been and continues to be a fantastic partner with their training and gentling programs. There is need to have more partnerships with local groups/organizations interested in training, adoptions, and on-the-ground management such as PZP darting programs.

Mr. Yardley asked if Ms. Rugwell would include partnerships with local and State agencies as part of Element 9. Ms. Rugwell indicated partnerships with local and State agencies would be part of this element. Ms. Rugwell indicated BLM is interested in partnering with anyone or organization that is interested in moving the program forward.

If the agency did not have to place animals in short- and/or long-term holding facilities, there would be significantly more money available for other aspects of the program including on-range management, which is the agency's preference.

In summary, BLM partners with local citizen groups as well as national organizations in management of wild horses and burros. Partners, like the Mustang Heritage Foundation have helped place significant numbers of animals into private care. Other partners have helped with on-range management activities.

Discussion Questions

The IDT developed nine discussion questions (below) that are directly related to the nine key elements and will serve as the basis for the Board's afternoon discussions as well as finalizing the Report.

1. How can the BLM achieve AML within all HMAs with 5 – 10 years?
2. How can the BLM sustainably maintain AML within all HMAs?
3. How can the BLM reduce and control holding costs for excess animals?
4. How can the BLM significantly increase annual adoptions and sales of wild horses and burros?
5. How can the BLM continue to ensure humane treatment of wild horses and burros?
6. How can the BLM use best available science to improve management of wild horses and burros?
7. What humanitarian assistance opportunities exists for wild horses and burros?
8. How can the BLM better provide information to the public?
9. How can the BLM increase public participation and financial support in the management of wild horses and burros on and off the range?

Following the presentation, Ms. Rugwell addressed questions from the Board.

Dr. Weikel suggested the Board spend the remainder of the morning asking clarifying questions concerning Ms. Rugwell's presentation and, following lunch, brainstorm ideas, suggestions, etc., for each of the nine discussion questions. Dr. Weikel stressed that the results of the brainstorm session would not be an official Board recommendation but providing information that should be considered as the Report is developed. After the brainstorming session, the Board will have opportunity to discuss official recommendations to the BLM as has been done in past meetings.

Ms. Ginger Kathrens noted that Ms. Rugwell indicated that the wild horse and burro population in 1971 was approximately 25,000 animals. The national AML is currently 26,710 animals. When the *Wild Free-Roaming Horses and Burros Act of 1971* was created, those involved in writing the Act used language like "fast disappearing from the American West". There was a perception that there was a critical under-population of wild horses and that we could lose wild horses and burro forever. Mr. Kathrens recognized Hope Ryden, a Cloud Foundation board member who passed away this year, who was instrumental in creation of the *Wild Free-Roaming Horses and Burros Act of 1971*. Ms. Kathrens suggested that achieving the national AML of 26,710 animals would, once again, put the wild horse and burro population in jeopardy or at a critical mass. Ms. Rugwell indicated the agency is willing to reexamine AML, which is set through BLM's land use planning process for each HMA at the field office level of the organization.

While discussing the key elements within the IDT, the IDT discussed the potential of adjusting AML; however, the agency's concern right now is having too many animals in short- and long-term holding and having the on-the-range population growing without effectively being managed. Ms. Rugwell indicated that population control efforts on the Little Book Cliffs HMA have inspired her to explore the use of such efforts on smaller areas within larger HMAs in Wyoming. Ms. Rugwell does not believe AML is "set in stone". The life span of a Resource Management Plan (RMP) is approximately 20 years at which time they need to be re-examined. Even during the 20-year period, RMPs can be amended or revised depending on changing conditions. It is important the agency determine the population size that best meets the needs of the wild horses (and burros) and the rangelands.

Ms. Kathrens noted that Ms. Rugwell is responsible for managing the wild horse and burro populations in some of the most beautiful wild horse country (Red Desert) in the country. She is dismayed at the AML in the Stewart Creek HMA, which equates to one wild horse for every 6,000 acres. Ms. Kathrens was pleased to hear that there could be a re-examination of what she believes are unfair and unsustainable populations in some cases. It is difficult to maintain a specific characteristic such as a Spanish genetic component with such a small AML.

Mr. Jim French noted that when HMA boundaries and AML were established in the early 1970s considering existing wildlife populations and existing livestock AUMs. Since the 1970s, fire cycles have changed significantly, invasive weeds have resulted in vegetation type conversions, and wild horse drift off HMAs has occurred to follow available forage. Mr. French believes it is appropriate to readdress AMLs, which could include changing AMLs and/or HMA boundaries. In response, Ms. Rugwell noted that she neglected to address that one issue - over-population that has resulted in rangeland degradation, which has resulted in animals moving outside of HMAs. The agency is open to making adjustments that make sense on the ground. Ms. Rugwell described the checkerboard area in Wyoming where it is incredibly complex to manage HMAs where every other section of land is privately owned. Private land owners have taken exception when there are a lot of wild horses on private lands, which, in that situation, cannot be effectively fenced or managed. BLM has been sued and, when there is a Consent Decree or a Court Order, the amount of decision space available to the agency is narrowed. Ms. Rugwell reiterated that BLM is open to exploring changes to HMAs that make sense, but those changes would have to be made through the land use planning process at the local field office level. Mr. French also suggested exchange-of-use agreements might be another tool to consider in those situations.

In relation to making more animals available for adoption, Mr. French referenced a “balanced sheet” approach that he raised earlier in the meeting. There is a significant amount of money on the table if we can control the number of animals being held in short- and long-term facilities. With the amount of money being allocated in the budget for short- and long-term holding (\$47 million), Mr. French is bewildered as to why there is a \$125 adoption fee and why there are so many regulatory rules in place on adoptions in terms of age restriction, classification of animals available for adoption, etc. He also is bewildered on why international adoptions have not been done. Mr. French indicated that western Europe is highly interested in American mustangs; not only for consumption purposes, but also for the same reasons as the people in this room. He believes one of the solutions to the over-population issue is international adoptions and making sure interested parties are thoroughly vetted to ensure animals are humanely handled when title is transferred.

Mr. French raised a proposal discussed by then-Director Neil Kornze at a Western Governor’s Association and the National Association of Counties meeting in Jackson Hole, Wyoming where after a person has successfully adopted and is given title to an animal they also be handed a check for \$10,000. Recognizing that it requires approximately \$54,000 to house an animal in holding for the remainder of its life, there would be a net gain of \$40,000 to the United States Treasury. Mr. French noted that the people in attendance at that meeting were interested in the proposal but has not heard anything since that time. In response, Ms. Rugwell indicated that there is an international adoption market, which would require many logistical challenges to be overcome, but BLM believes it is a viable option worth pursuing. In addition, the IDT has identified incentivizing adoptions as another option worth pursuing. Ms. Rugwell believes people want to solve this problem and are open to considering unique solutions.

Dr. Weikel noted that under the Element 2 – Maintain AML, every bullet and sub-bullet addressed immunocontraception. Dr. Weikel asked why permanent sterilization was not included as a bullet under fertility control. Ms. Rugwell indicated that permanent sterilization is an option being considered; however, the agency has not found an effective avenue for doing it well on the range. There is ongoing research on this avenue. If implemented, it would be important to consider genetics, ability to maintain sustainable populations on the range, etc. Mr. Bolstad agreed that permanent sterilization should be considered as an option.

Dr. Weikel also asked if Ms. Rugwell was aware of a December 2015 proposal submitted by the Southeast Oregon Resource Advisory Council (RAC) that asked BLM to gather all Oregon HMAs down to the low end of their AML and, based on genetic selection and opportunities to maintain optimum genetic diversity, be allowed to reproduce. Animals proposed to be returned to the range that did not contain identified genetic characteristics would be permanently sterilized with the goal of prolonging the need for future gathers. Ms. Rugwell indicated that she personally was not aware of that specific proposal but was confident the National office would be aware of it. Mr. Bolstad indicated that he was aware of the proposal and was considering an approach where research would be completed to ensure safety and efficiency of implementing the proposal. The research studies were stood down for the time being. Ms. Weikel indicated that the techniques outlined in the proposal don’t qualify as research proposals, but are standard procedures in the equine industry today. In the proposal, Oregon was willing to serve as a model for maintaining a sustainable population. Ms. Rugwell indicated that it was an interesting proposal and worthy of consideration. Dr. Weikel summarized that the proposal would allow a maximum amount of reproduction in terms of diversity while slowing the population’s actual reproduction.

Mr. Masters asked Dr. Weikel to expand on that approach as it applies to a Sheldon National Wildlife Refuge study regarding the statistics of mortality and injury and how that compares to castration of stallions. Dr. Weikel indicated that permanent sterilization of male and female animals is a field operation that has been performed at the Sheldon National Wildlife Refuge. The results of that study are included in a published, peer-reviewed paper that she brought to the Board's attention.

She was amazed that the BLM has not further investigated use of permanent sterilization as a population growth control tool. Dr. Weikel indicated that there are two types of risk when performing male horse castration – anesthetic and surgical, which are additive in nature. Spaying of mare only involves surgical risk, which is less than gelding of stallions. Dr. Weikel recommend the entire paper be read, which also addresses the re-gather rate on spayed mares. Dr. Weikel found BLM's unwillingness to conduct a thorough vetting and examination of the Sheldon study inexcusable. Dr. Weikel shared a graph (Figure 5) with the audience. The observed foaling rate (red columns) dropped from a high of 18 percent in 2008 to a low of 6 percent in 2013. During that time, 110 mares were spayed, and 250 stallions vasectomized. One-half of the 250 stallions were vasectomized chemically, all of which were unsuccessful. The remaining 125 stallions were surgically vasectomized, which was 100 percent successful. The blue columns represent the percent of the population that were sterilized, which never exceeded 28 percent.

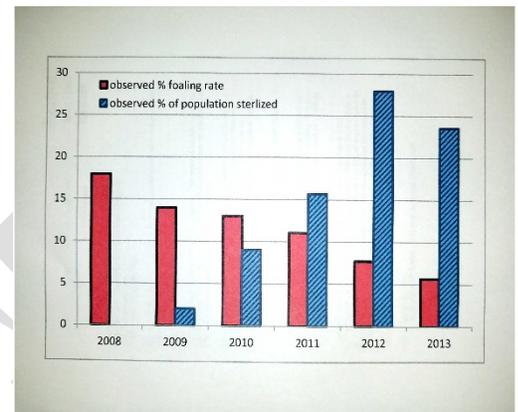


Figure 5 – Comparison of Foaling Rates and Percent of Population Sterilized

Mr. Masters inquired as to the morality of the mares in the Sheldon study. Dr. Weikel indicated of the 110 mares that were spayed, two mares died were known to have died. One mare bled to death, which was a spay-related death. The second mare was killed while in the corral and no cause of death was determined. This study was set up to decrease the number of wild horses on the Refuge and was not a spay trial. No horse was returned to the range sexually intact.

Mr. Masters inquired as to the male castration mortality. Dr. Weikel indicated that it was less (as compared to the mare deaths). Dr. Weikel noted that castration of animals at BLM holding facilities involves all ages of animals; whereas, in the Sheldon study castration only involved older animals, which have a higher risk of complications during the vasectomy procedure. In general, castration-related deaths in the field on wild horses should be around two percent.

Mr. French noted that the parties involved with the Southeast Oregon RAC's proposal including livestock permittees were 100 percent in favor of working with the BLM on the proposal and was surprised the effort hasn't gained more traction within the agency.

Mr. Yardley asked if consideration has been given to allocating more money to range rehabilitation projects that will be required to improve range conditions to a point where it will sustain AML. Ms. Rugwell indicated that the approach is to reduce the number of animals in short- and long-term holding facilities, which would make more funding available for other aspects of the program, including rangeland rehabilitation. One challenge for the agency is the unknown nature of the program's future budget, which is appropriated through a process involving the President's proposed budget that is considered by Congress. To date, BLM has been fortunate to receive sufficient funding to maintain animals in short- and long-term facilities and to complete some on-range management. When a significant amount of the program's budget is dedicated to short- and long-term holding, the ability to complete on-range improvements is reduced. BLM is engaged in several rehabilitation projects for many reasons (i.e., sage-grouse habitat improvement, etc.); however, areas with an over-population of wild horses are not likely to receive funding for rehabilitation projects until the population levels are reduced and are sustainable.

Mr. Yardley asked a follow-up question if consideration would be given to reducing AML in HMAs to compensate for rangeland deterioration due to excessive wild horse populations, pinon/juniper expansion, annual invasive species, etc. Ms. Rugwell indicated that BLM would consider rangeland condition and possibly adjust all uses, as appropriate. Mr.

Yardley asked that consideration be given to moving a herd in an HMA to another area to allow a restoration project to become established. At the appropriate time in the future, the herd could be moved back into the HMA from which it came. Ms. Rugwell was not sure if such a proposal had been considered in the past, but BLM will adjust management when an area is being restored (i.e., adjusting grazing after wildfires and/or prescribed burns.) Dr. Weikel described an example (i.e., where wild horses were gathered from the Jackies Butte HMA in Oregon after a wildfire) during which the original Environmental Assessment called for the animals to be returned after the reseeding efforts were successful. She thought there might be other examples.

Dr. Weikel noted that the *Wild Free-Roaming Horses and Burros Act of 1971* makes no mention of long-term holding of animals. She asked how use of long-term holding began. Mr. Bolstad summarized that, based on his knowledge, the first wild horses to be pastured off public land was at the Black Hills Wild Horse Sanctuary in South Dakota in 1988, where unadoptable wild horses were provided with the intent of developing a self-sustaining operation funded through tourism dollars.

BLM developed an initiative and strategy in 2001/2002, which was presented in Congress, as a mechanism to bring wild horses populations down to AML. The strategy involved three separate avenues – (1) aggressive gather of animals to quickly reduce population levels, (2) adopt as many animals as possible, and (3) place unadoptable animals in long-term holding. The plan was accepted and funded by Congress and implemented by BLM.

Unfortunately, some of the underlying assumptions were faulty – BLM assumed it would be able to adopt 8,000 animals per year, which was not possible while removal of animals was aggressively pursued. BLM assumed there were 8,000 excess animals on the range when the initiative was implemented. Unfortunately, BLM's population census efforts grossly under-estimated the number of animals on the range. Since, BLM has implemented new and improved population survey methods that account for unseen animals.

In summary, a strategy was developed and executed. The strategy did not work and now we're contemplating a new path forward. Dr. Weikel noted that the agency continues to expand the unsuccessful strategy, even in FY 2017, by approving more long-term holding facilities for an additional 4,700 animals. Mr. Bolstad noted that the number of animals in holding has not been expanded and there have been discussions to holding the number of animals removed to the number that can be placed in private care and natural mortality of those in holding facilities. The addition of the long-term holding for 4,700 animals will reduce the number of animals held in short-term corrals where costs are significantly higher than long-term pasture per day costs thus making additional funding available for other aspects of the program.

Advisory Board Brainstorming Discussion

Dr. Weikel reviewed the process for the afternoon, which includes (1) brainstorming the nine questions raised in Ms. Rugwell's presentation to ensure the maximum or optimum number of ideas are generated, after which, (2) the Board will develop specific final recommendations to be presented to BLM.

Brainstorming Session

The Board 'brainstormed' nine questions raised in Ms. Rugwell's presentation (Attachment 1). Each question was addressed individually and fully before moving on to the next question. The ideas raised during the brainstorming session were recorded by the facilitator as they were raised. Individual discussion associated with each idea are not summarized in these minutes.

After the brainstorming session, the Board was provided a written copy of the brainstorming results, which she explained would be a "stand alone" product that will be provided to the BLM "committee" working to develop the Congressional report.

The Board then began discussions relating to its formal recommendations that should be made to BLM. Early in that discussion, Mr. Yardley asked if the brainstorming results would be presented as a consensus of the Board. Dr. Weikel suggested that would not be possible because there are Board members with diametrically opposed positions.

Ms. Libby summarized that the Board's brainstorming ideas would be provided as a working document to Ms. Rugwell's team; whereas, the Board's formal recommendations would be presented to the BLM's Wild Horse and Burro Division. Before the brainstorm ideas are turned over to Ms. Rugwell's team, the Board was given opportunity to ensure their ideas were correctly captured or to identify ideas that they personally could not support.

Mr. Yardley indicated that he could not support or wish to forward three ideas – (1) phase-out helicopter round-ups in lieu of bait and water trapping (Question 5), (2) allow people to buy AUMs and transfer those for wild horse use (Question 2), and (3) evaluating if any areas that again could contain wild horses (Question 2) – which initiated the following discussion.

Dr. Weikel asked Mr. Bolstad to address Mr. Yardley's second concern. Mr. Bolstad noted that grazing permittees have a grazing preference that is attached to base (private) property or water. To have a grazing preference, one must control/own the base property to which the preference is attached. Once preference is obtained, it is possible to convert the preference to domestic horse use, or, as was mentioned in earlier presentations, propose a different use and purpose (wild horses) for that grazing preference to BLM, which is a land use plan decision. Such a change is possible, but it is a discretionary action for BLM. Ms. Bail noted that it is possible from a policy standpoint, but is not an easy process. Mr. Bolstad reiterated that if the proposal is to eliminate one of the six principle uses outlined in FLPMA on an area over 100,000 acres, Congressional approval is required.

Dr. Weikel noted that Mr. Yardley's concerns address three ideas presented by Mr. Kathrens. Dr. Weikel asked Ms. Kathrens if there was wording that could be changed to address Mr. Yardley's concerns and that would also be acceptable to her. Mr. Masters noted that one of the identified concerns addressed an idea he suggested.

Mr. Masters referenced the Sand Creek Basin HMA where the livestock grazing preference was purchased by the Serengeti Foundation as an example where an argument could be made to convert livestock grazing preference to wild horse use and, possibly, increase the HMA's AML. In other situations, it might be possible to establish a wild horse range where grazing preference is purchased, and livestock grazing is eliminated.

Mr. Yardley asked if the converse could also occur – where wild horse use could be converted to livestock grazing preference. Ms. Libby noted that the reverse of Mr. Masters' idea would not be appropriate considering the question being addressed – How can the BLM sustainably maintain AML within all HMAs?

Mr. French asked for clarification concerning the requirement to obtain Congressional approval if a principal use outlined in *Federal Land Policy and Management Act* (FLPMA) is being eliminated on lands over 100,000 in size. He asked if an entity bought the base property and its associated grazing preference and proposed to convert that use to wild horses or wildlife use, if under 100,000 acres are involved, could the proposal be approved by BLM, or, if over 100,000 acres would require Congressional approval. Mr. Bolstad indicated that the decision to convert livestock grazing preference to another type of use belongs to the BLM; not the person (or organization) holding the permit. Under 100,000 acres, BLM has the discretion to approve such a conversion. Mr. French noted that if the agency is involved in an amendment of an RMP, the conversion could be addressed during the amendment process. Mr. Yardley asked if an HMA were over 100,000 acres but the grazing allotment was less than 100,000 acres, would a proposal to convert the grazing preference to wild horse use require Congressional approval. Mr. Bolstad indicated that if the allotment is less than 100,000 acres, BLM would not have to report to Congress.

Mr. Masters suggested the idea may want to be deleted as it can currently be done and involves a complex process. Mr. French indicated that it is a pathway to accomplish what the Board wanted to do. The tool (in the toolbox) is to work with BLM as the proposal is being pursued.

Ms. Bail read the FLPMA citation (Section 202(e)(2) addressing elimination of the identified principal uses (below).

(2) Any management decision or action pur-suant to a management decision that excludes (that is, totally eliminates) one or more of the principal or major uses for two or more years with respect to a tract of land

of one hundred thousand acres or more shall be reported by the Secretary to the House of Representatives and the Senate...

Mr. Bolstad noted that reporting such a proposal to Congress is different than approving it, as he had suggested earlier.

Ms. Sewing addressed a specific situation where the American Mustang Association has four grazing permits in the Ely District (Nevada) of which one permit is for one horse and three cows and the remaining three permits are in nonuse. Ms. Sewing asked if wild horses could be put on those permits. Mr. Bolstad indicated that the Association would need to apply to BLM to convert the type of livestock (cattle) to domestic horse use. Ms. Sewing indicated that the permits will be up for renewal and the Association has been wondering what to do with them. A question was asked if the Association could put purchased wild horses on the permit. Mr. Bolstad indicated that if the intent was to graze private horses on the BLM permit, a request to change the kind of livestock would have to be submitted to BLM, which will be reviewed through the National Environmental Policy Act process. Ms. Libby stopped the discussion at this point as it was addressing a specific action and was not addressing the suggestion to remove the brainstorming idea from the list.

Alternative language was suggested by Dr. Weikel stating “remove impediments that result in the change-of-use from cattle to horses within HMAs that fit within existing law”. Mr. French noted that the recommendation (idea) is allowed within the context of the law; therefore, he suggested leaving the recommendation (idea) in the list.

Mr. Masters recommended removing the word “wild” as someone may own a horse purchased through the sale authority, which is no longer considered a Congressionally-designated wild horse.

Ms. Bail noted that there is a distinction between the Sand Creek Basin HMA example where the allotment was closed and no longer considered to be an allotment versus a transfer of class-of-livestock, where the area would remain an allotment. Mr. Bolstad noted that Ms. Sewing situation did not include an HMA and is very different to the Sand Creek Basin HMA example.

When discussing Dr. Weikel’s alternative language - remove impediments that result in the change-of-use from cattle to horses within HMAs that fit within existing law - Mr. Yardley indicated that he hated to see the door opened in which people or organizations could buy a livestock grazing preference and have it converted to wild horse use and, subsequently, increasing the HMA’s AML. Mr. Masters indicated that was exactly what he intended when identifying the suggestion (idea) during the brainstorming process. Mr. Yardley indicated that he was concerned there could be a collusion factor where BLM is trying to get the horse population to AML and this approach would be a means of reaching AML while getting rid of livestock. Ms. Kathrens indicated that the grazing permit holder would have to agree to the conversion from livestock to wild horses, so she thought the idea was alright as written.

The Board agreed to use Dr. Weikel’s alternative language - remove impediments that result in the change-of-use from cattle to horses within HMAs that fit within existing law.

In addressing Mr. Yardley’s third concern – evaluate if any areas that again could contain wild horses – Ms. Kathrens indicated that the idea was not appropriately captured. Ms. Kathrens suggested modifying the language to read “evaluate if there are any areas that have been zeroed out that could contain wild horses”.

Mr. Yardley indicated that the areas have been zeroed out for a reason. He would rather see existing HMAs brought down to AML; rather than expanding and/or opening new areas. Mr. Masters suggested adding “non-reproducing wild horses”. Mr. French indicated that would make sense, but the area was probably zeroed out because the intent was to exclude wild horses.

Dr. Weikel reminded the Board that the recommendation (idea) asks BLM to review currently zeroed out areas for the potential of re-populating the area with non-reproducing herds, which has been a formal Board recommendation several times in the past. Ms. Sewing noted that it is her understanding that previous Board recommendations would not be part

of the Report to Congress. Dr. Weikel agreed with Ms. Sewing and, again, noted that leaving the idea on the list doesn't really change what has been strongly stated in the past, to which BLM has already responded. Mr. Bolstad summarized the response referred to by Dr. Weikel as BLM periodically revisits its land use plans using a standard process, which includes reviewing Herd Areas (HA) to determine if they should be reactivated as well as reviewing HMAs to determine if they should continue as HMAs. BLM is not planning to review all HAs wholesale at one time.

Dr. Weikel asked Mr. Yardley if adding the term "non-reproducing" and knowing that this has come forward as a formal Board recommendation in the past would address his concern. Mr. Yardley is concerned with having the potential of opening areas that have been closed or new areas to wild horse grazing when there are HMAs where the livestock permittees have had been required to reduce their AUMs because wild horse over-population. Mr. Bolstad re-emphasized his statement that BLM periodically revisits land use plans to determine if HAs and HMAs should be continued as designated.

The Board agreed to revise the language to read "continue to re-evaluate if any areas that again could contain non-reproducing wild horses".

When addressing Mr. Yardley's first concern - phase-out helicopter round-ups in lieu of bait and water trapping - Dr. Weikel also objected to including this idea. She noted that the original *Wild Free-Roaming Horses and Burros Act of 1971* prohibited use of helicopters for which BLM had a strong need. The law was subsequently amended to allow the use of helicopters. She noted that there are some HMAs where use of helicopters is essential.

Mr. French agreed with Dr. Weikel that use of helicopters should be part of the tool box. Mr. French noted conflicting ideas (Question 1 - third bullet (use helicopter gathers) and Question 5 - second bullet (phase-out helicopter round-ups in lieu of bait and water trapping) have been identified. Mr. French suggested incorporating the words "use a more appropriate" as use of helicopters should not be the agency's highest priority in every gather. He doesn't think BLM uses helicopters as their highest priority, but believes it should be retained as a tool in the tool box.

Mr. Bolstad noted that, in 2016, BLM removed 800 horses using bait and water traps, which is unprecedented and the five-year contract for bait and water trapping has recently been renewed. BLM would like to continue use of bait and water trapping as part of the program.

Mr. Yardley asked if one of the issues with using helicopters was their expense, but noted there are times when bait and water trapping can also be expensive. Mr. Bolstad stated that the cost of bait and water trapping varies widely depending on the location, remoteness, etc. Mr. Bolstad indicated that BLM should use the best tool for the job. Mr. Bolstad noted that when Congress was considering changing the law to allow use of helicopters, Thelma Johnson (Wild Horse Annie) took the position that BLM needed to have that tool available.

Mr. Kathrens suggested modifying the language to read "Use helicopter round-ups if bait and water trapping are not feasible and economical". From an adopter's standpoint, animals are far less likely to be damaged and less stressed when using bait and water trapping (as compared to helicopter gathers). If bait and water trapping is feasible and economical, it should be used. The idea prioritizes the use of bait and water trapping (when feasible and economical) over the use of helicopters.

Ms. Libby suggested replacing the language "phase-out helicopter round-ups in lieu of bait and water trapping" with "increase the use of bait and water trapping where economically feasible."

Ms. Kathrens and Mr. French agreed to Ms. Libby's suggestion.

Mr. Masters indicated that many good ideas had been suggested; whereas' other ideas had significant issues or problems. Some ideas involve past Board recommendations to BLM. He asked as to the purpose of this effort of addressing (1) major glaring concerns or (2) items that were completely unacceptable to some Board members.

Dr. Weikel indicated that the result of the brainstorming session will be a summary of the Board's ideas that will serve as a working document for the IDT developing the Report. She recognized that there are contradictory ideas raised in the brainstorming session. Ms. Rugwell noted that the brainstorming product will inform the IDT as they develop the Report, which will include information and input from many different sources (i.e., the IDT team, the Board, BLM staff, etc.)

Mr. Yardley asked if it would be possible to have the Report presented to the Board at its next meeting. Ms. Rugwell noted that once the final Report is approved by the Secretary of the Interior and presented to Congress, it would be presented to the Board.

Mr. French asked if it was possible for the Board to see the Report before it is presented to Congress. Ms. Bail indicated that that decision would have to be made by the Department. Ms. Bail noted that the OMB would also want to review the Report before it is officially transmitted to Congress. **ACTION ITEM:** Ms. Bail indicated that BLM can ask the question if the Board can review the Report before being submitted to Congress; however, the final Report is essentially the product from the President, and the Administration will determine when it should be shared externally.

Mr. French noted that his concern was the Report will reflect the information provided by the Board to the IDT. He is uncomfortable representing himself as a member of the Board without having made sure the representation is accurate. Ms. Rugwell noted that part of the process will involve a review by the Solicitor's Office to ensure that it is legally sound and defensible.

Mr. Yardley noted that the brainstorming suggestions were identified by members of the Board; however, the Board does not necessarily endorse all suggestions. Ms. Rugwell indicated she understood that concern as well as Mr. French's desire to review the Report once it is finalized. Ms. Rugwell was not exactly sure how the Board's suggestions will be addressed in the Report but suggested there could be a section of the Report addressing the process used to obtain the Board's input and what that input was. Exactly how that will be portrayed in the Report is unknown. One option was suggested to allow the Board to review the pertinent section(s) of the Report that addresses their input. Ms. Bail indicated that she could discuss the request with BLM leadership but doesn't see the Board's suggestions being a verbatim insertion in the record but more of a reflection of what was heard, particularly those items that may be new or haven't already been provided.

Dr. Weikel asked the Board if they were comfortable forwarding the document with the identified modifications as a work product to be used by the IDT in preparing the Congressional Report. Dr. Weikel made a motion that "The Board present the discussion results from Points 1 through 9 of Mary Jo Rugwell's presentation as an accurate reflection of the discussion relevant to these questions acknowledging that there are inherent contradictions and concerns."

Before a vote on the motion was taken, Mr. Masters asked if it was worth wasting people's time for them to look at the recommendation. Mr. Masters didn't think it was worth the Secretary of the Interior's time. Ms. Libby indicated that the purpose of voting on the motion was to obtain the Board's approval to provide BLM with the document summarizing the brainstorming results. Mr. Masters thought recommendations from the BLM Wild Horse and Burro Advisory Board went to the Secretary of the Interior. Ms. Bail indicated that Mr. Masters is correct in that if this is an official recommendation from the Board, it will be shared forward. Mr. Masters asked if a recommendation that includes inherent contradictions and concerns should be forwarded to the Secretary. Ms. Libby reiterated that Dr. Weikel was trying to get the Board to vote on whether (or not) it is alright to submit the document to BLM. Dr. Weikel asked if it was possible to submit the results to the IDT, instead of the Secretary. Ms. Bail indicated that it would not be a formal recommendation as per the usual recommendation process, but could be a group consensus to have the brainstorming summary document sent to the IDT for consideration as it develops the Report. BLM would not respond to the group consensus at the Board's next meeting as it normally does for formal Board recommendations.

DECISION: The Board unanimously approved a motion made by Ms. June Sewing and seconded by Mr. Steven Yardley to forward the brainstorming summary document to the Congressional preparation committee as an accurate reflection of the Board's concerns.

Mr. Bolstad noted that the motion is not an unprecedented action. The Board has previously made requests of the program that were not formal Board recommendations.

Advisory Board Formal Recommendations

Dr. Weikel initiated the formal recommendation discussion by indicating that the Board is requesting BLM address their September 2016 formal recommendations made in Elko, Nevada, and she expressed the Board's disappointment that they (the September 2016 recommendations) were not addressed that this meeting.

Mr. French noted that he was not present at the September 2016 meeting in Elko, but has heard about the Board's recommendations. When coming to this meeting, it was his hope that the Board would have a meaningful discussion concerning the September 2016 formal recommendations. Recognizing almost one year has elapsed and there was a change in administrations, which has delayed appointment of several senior Departmental and agency leadership, Mr. French felt the Board's recommendations and the justifications were straight-forward and clear. Having talked with Board members who were at that meeting, it is clear those recommendations were difficult to make, and many Board members were conflicted in reaching those recommendations. Mr. French expressed his disappointment that BLM did not address the recommendations and that there was not further discussion at this meeting. He felt BLM missed an opportunity. During dinner last night, Mr. French asked other Board members if they felt BLM had the power and the will to follow through with the September 2016 recommendations. The other Board members immediately, without any further thought, responded no. Mr. French was not surprised by this response since BLM was not willing to engage in additional discussion concerning the 2016 recommendations at this meeting. Mr. French believes the September 2016 meeting was substantive.

Recommendation 1

Mr. French recommended the next Advisory Board meeting be held in Washington, D. C. where the September 2016 Board recommendations should be discussed with representatives of the Department, BLM staff, and Congressional delegations. Mr. French believes this is an important issue and that we're making a paradigm shift where we've "tapped the rudder and began moving the ship" in a different direction. He believes BLM senses this paradigm shift with the brainstorming exercise the Board just completed. It is an opportunity for us (BLM and the Board) to link arms as a team to sell this proposal.

Dr. Weikel asked if Mr. French would be willing to put a timeframe on his recommendation. Mr. French suggested in early January 2018 (first of the year) but felt a timeframe would be more appropriately identified by BLM. Mr. Bolstad noted that traditionally the holidays have been avoided, but we can meet whenever we want. The Designated Federal Official and the Department have a desire to convene as well as a need for the information the Board can provide.

Ms. Bail indicated that there needs to be sufficient time to complete the required pre-meeting actions (i.e., publication of the meeting in the Federal Register for 30 days, etc.) Mr. French asked if the first week of January would provide the agency sufficient time to complete pre-meeting actions. Ms. Bail indicated that would be possible. Mr. French indicated that his desire would be to allow people sufficient time to prepare for the meeting. Ms. Bail noted that the timing for placement of a BLM Director may also be a consideration.

Dr. Weikel read the recommendation (below):

"That the National Wild Horse and Burro Advisory Board have their next meeting in Washington, D. C., and review their most recent recommendations, including those presented in September 2016."

Dr. Weikel asked if there was interest in adding a timeframe to the recommendation. Mr. French suggested January 2018. Ms. Sewing suggested the meeting be held before the end of March 2018, as she and Dr. Weikel will be leaving the Board and have been integrally involved in the process.

Mr. French was asked by Ms. Libby if he would like to clarify his original recommendation in terms of the word “review” and including language concerning dialogue with BLM. Mr. French indicated that the Board wishes to present their recommendations face-to-face to discuss the agency’s position on the September 2016 recommendations, and, if there will be forward movement with substantive changes.

Ms. Kathrens asked Mr. French to clarify what he meant by “sell” this proposal. Mr. French noted that the word “sell” may not have been the most appropriate word, but felt BLM understood that there are times when a recommendation with strong justification may run into a “brick wall” two or three levels above us. In terms of “selling” the recommendations, Mr. French believes such discussion will allow the Board to explain their position (why the recommendations were made), describe what was presented to the Board at this meeting, and “make our case” for the changes recommended by the Board.

The recommendation was revised to read:

“That the WH&B NAB have their next meeting in Washington DC and present their most recent recommendations, including those presented in September 2016, to agency officials. Tentatively to be scheduled early in the calendar year, but before the end of March 2018.”

When taking a vote on the recommendation, Ms. Kathrens noted that making such a recommendation should be the last step; not the first, as she doesn’t know what other recommendations will be made later in this meeting. Mr. French noted that there were significant recommendations made during the September 2016 meeting that he believed were going to be discussed during the 10 a.m. agenda item yesterday, which BLM chose not to address. He would like to have the opportunity to ensure the Board can debate and discuss the merits (or lack of merit) of the recommendations, but the Report to Congress played off the recommendations, which, ultimately, will segue into the recommendations that will be made today. It has taken significant effort to get to this point and the only thing worse than having to go through the process is to not have it listened too. The September 2016 recommendations and the suggestions made in this meeting could lead to significant changes in policy that are important enough to be addressed in Washington. Mr. French believes this ultimately will be the solution to a problem that we’ve had for a long time.

Mr. Masters noted that the September 2016 Advisory Board made a recommendation to allow for the destruction and sale of healthy horses, which everyone has been referring to but not specifically addressing.

Ms. Kathrens noted that she believes there were Board members, in September 2016, who knew in advance what they were going to recommend, and she did not feel there was adequate opportunity for discussion.

Mr. Masters noted that making that recommendation was one of the hardest things that he has ever had to do. He indicated that he felt like BLM didn’t care about the Board when BLM didn’t want to address such a difficult topic at this meeting. He personally felt “blown off” about that, which is part of the reason why the Board wants their next meeting to be in Washington, D. C. If BLM isn’t taking the Board’s time (as well as the public’s time) seriously, maybe someone higher up will.

Dr. Weikel asked if Dr. McDonnell would care to comment on the Board’s first recommendation. Dr. McDonnell asked if the recommendation included time for the Board to discuss their approach prior to the meeting or go straight into the meeting prepared to present the recommendations and their rationale. Dr. Weikel indicated that it would be a regular Board meeting. Dr. McDonnell indicated that there would be time for the Board to discuss things as a group before meeting with others. Dr. Weikel indicated that was her understanding and noted that the BLM officials in the room were nodding their heads in agreement. Dr. McDonnell noted that she would prefer the meeting be held sooner than later, suggesting no later than March 15, 2018.

The recommendation was revised to read:

“That the WH&B NAB have their next meeting in Washington DC and present their most recent recommendations, including those presented in September 2016, to agency officials. Tentatively to be scheduled early in the calendar year, but before the middle of March 2018.”

Ms. Kathrens asked if that meant the Board would not discuss the recommendation about killing horses today. Dr. Weikel noted that that the recommendation has already been made. Ms. Kathrens indicated that there wasn't anything to discuss except that she did not feel there was adequate discussion in September 2016.

Dr. Weikel explained that she has a blanket proxy vote from the two missing members (Mr. Woehl and Ms. Sall), but BLM has advised Dr. Weikel that proxy votes can only be used for a given recommendation after a phone call with respect to that recommendation has been completed with members not in attendance. The Board currently has a quorum and decided to move forward.

DECISION: The Board unanimously approved the recommendation as read and presented below.

“That the WH&B NAB have their next meeting in Washington DC and present their most recent recommendations, including those presented in September 2016, to agency officials. Tentatively to be scheduled early in the calendar year, but before the middle of March 2018.”

Recommendation 2

Mr. Masters recommended the Board consider the following recommendation.

“Phase out long-term holding over the next three years and apply that budget to on-range management.”

Ms. Kathrens inquired as to where the animals currently being held in long-term holding facilities would be placed. Mr. Masters indicated that they would be destroyed. Mr. Kathrens indicated that destroying the horses would be a “non-starter” for her.

Ms. Sewing indicated that she would like to include the adoption program to the recommendation. The language of the recommendation was revised to read:

“Phase out long-term holding over the next three years and apply that budget to on-range management and adoptions.”

Mr. Masters agreed to the revision.

Ms. Kathrens indicated that the recommendation should state that it will result in the destruction of the wild horses currently being held in long-term holding facilities.

Mr. Yardley noted that the Act states that animals (in short- and long-term holding facilities) be offered for adoption at least three times and all unadoptable wild horses be available for sale without limitation, or humanely euthanized. Those animals deemed unsuitable for sale should then be destroyed in the most humane manner and cost-efficient manner possible.

Mr. Masters noted that that was the Board's first recommendation made at the September 2016 meeting.

Dr. Weikel noted that it is not obligatory that the recommendation contain the mechanism. Mr. French noted that Dr. Weikel's point was a good one because destroying the animals is one of the options available and he would hope that

there is an opportunity to engage those organizations that have shown an interest in adoption, TIP training, etc., to take the animals currently being held in long-term holding facilities to be put into the system for training and adoption, which would be an option to explore before destroying animals.

Dr. Weikel suggested voting on the original recommendation and, if the Board so desires, add the operand “any BLM options that accomplish this” – short of returning animals to the rangeland.

Dr. Weikel believes addressing these issues “muddies the water.” Mr. Masters is correct in stating these are separate issues. Dr. Weikel referenced a proposal where Russia would like 20,000 mares and all we must do is pay the freight. Dr. Weikel does not want to preclude such options from the tool box.

Dr. Weikel read the revised recommendation as stated below:

“Phase out long-term holding over the next three years and apply that budget to on-range management and adoptions. BLM will use all options that accomplish this focusing on humane options.”

Mr. Yardley asked to add “excluding placing animals back on the range”, to which the Board disagreed.

Mr. Masters suggested revising the language to “Phase out long-term holding to the next three years.”

The recommendation was revised (again) to read as stated below:

“Phase out long-term holding over the next three years and apply that budget to on-range management and adoptions.”

DECISION: In a split vote of six in favor and one opposed (Ms. Kathrens), the Board approved the recommendation as read and presented below.

“Phase out long-term holding over the next three years and apply that budget to on-range management and adoptions.”

Recommendation 3

Mr. French suggested some of the savings realized from implementation of the Recommendation 2 (above) be used to enhance funding provided to the TIP program and, by policy, the BLM should increase the ability for those facilities to process additional animals.

Dr. Weikel noted that Recommendation 2 addressed adoptions of which the TIP program is a part. She asked Mr. French if he was suggesting an additional recommendation relative to adoption that accomplishes additional funding for the TIP program. Dr. Weikel suggested a separate recommendation concerning adoptions.

Mr. French noted that the intent of his motion would be lost if included in Recommendation 2. Mr. French would like to maximize the number of animals adopted and believes we should fully fund those organizations that are doing that work. He would like some of the savings realized from reducing the animals in long-term holding facilities into that process.

Ms. Libby suggested combining his intent with previous language – engage organizations with interest in current systems to take excess animals into training and adoption. Mr. French noted that was his intent but would like to include the funding mechanism to accomplish that. Mr. French noted the hard work being done in term of moving forward with long-term management, of which one option is to enhance the adoption program.

Ms. Sewing suggested amending the recommendation being developed to include adoption programs, which would include all aspects of the program.

Dr. Weikel inquired as to the phrase “incur systems”. Mr. French asked if there is a regulatory moratorium that limits the number of animals that organizations can take into their system. Ms. Bail noted that as one piece of the “budget” pie changes (increases or decreases), it affects the other pieces of the pie. Mr. French indicated that his intent is to increase the adoption (or TIP) portion of the pie. He would like to maximize the adoption piece of pie to enhance the number of animals that find good homes. Ms. Bail suggested that the pie can be grown (increased) or be reallocated. Mr. French would like to maximize the ability of organizations involved in the adoption program to adopt as many animals as possible.

Dr. Weikel suggested the following language, which will provide funding for foundations, receive donations, asks BLM to increase the size of the adoption piece of pie, etc.

“Create funding mechanisms to maximize adoptions.”

Mr. French would like to ensure the recommendation captures the organizations and, secondly, international adoptions and/or sales.

The language of the recommendation was revised as stated below:

“Create funding mechanisms to maximize adoptions, especially through successful programs, and to include international adoptions.”

Mr. Yardley asked if the recommendation as written would exclude newcomers to the program. Mr. French was hoping that would encourage involvement of newcomers. If the number of people that can perform those services increase, we should get after it.

Mr. Bolstad suggested adding sales in addition to adoptions. The motion was revised to read as follows:

“Create funding mechanisms to maximize adoptions and/or sales, especially through successful programs, and to include international adoptions and/or sales.”

Ms. Kathrens asked if additional language addressing the humane transfer of animals should be added. International adoptions/sales have been addressed before and she thought some type of protection for the animals should be incorporated into the recommendation. Mr. French asked if there was existing regulatory language that could be used. Mr. Bolstad indicated that the United States government cannot enforce U. S. regulations on the soils of foreign countries. Mr. French suggested an MOU might be a mechanism to ensure ethical standards are met; otherwise, the company would lose their contract. Mr. Bolstad indicated that Ms. Kathrens’ intent is that animals would be used in some manner other than human consumption. Mr. Bolstad cited an example where burros sent to Guatemala had third-party monitors to ensure their humane treatment. Mr. French suggested that the current recommendation language adequately addresses the animals’ protection, as demonstrated in the Guatemala example.

A suggestion to revise the recommendation (as stated below) was made.

“Create funding mechanisms to maximize adoptions and/or sales that meet basic humane standards, especially through successful programs, and to include international adoptions and/or sales.”

Mr. French indicated that if that provides direction to BLM in terms of how such adoptions are orchestrated, he believes it would address Ms. Kathrens’ concern. Ms. Kathrens asked if that term provided additional protection for the animals. Mr. Bolstad stated that the intent is the animals should be put to a productive use and purpose.

Ms. Sewing noted that the sale of an animal (or animals) is like any other sale where people can do as they wish once they've gained ownership of the animal.

Mr. French noted that if BLM has questions as to the intent of the Board's recommendation, they would access the minutes of the meeting, which reflect this discussion. Mr. French suggested that Ms. Kathrens concerns are documented in the meeting minutes.

Ms. Kathrens indicated that she had a conversation with the group suggesting relocation of wild horses to Russia, where there are three endangered cat species. One purpose for the relocation would be to establish a prey base for the endangered cats that currently does not exist. The horses would be entering an environment that is somewhat different than where they came from, and would be a prey species. Ms. Kathrens indicated that wild horses are a prey species to mountain lions in North America. Ms. Kathrens didn't have an issue with wild horses being a prey species, but they must be handled humanely. She isn't confident based on her discussions with the representative from Russia that that would occur.

DECISION: In a split vote of six in favor and one opposed (Ms. Kathrens), the Board approved the recommendation as stated below:

“Create funding mechanisms to maximize adoptions and/or sales, especially through successful programs, and to include international adoptions and/or sales.”

Recommendation 4

Ms. Kathrens recommended the percentage of funding for fertility control be increased. When determining the amount of increase, Mr. Masters inquired as to the amount of funding spent on long-term holding facilities. Mr. Bolstad indicated that it was approximately \$24 million. Mr. Masters suggested that if long-term holding is phased out over three years, he suggested splitting the savings equally between fertility control and adoptions.

Dr. Weikel noted that Recommendation 2 addressed using the cost savings for adoption and on-range management, which do not include fertility control. Mr. Masters indicated that on-range management includes fertility control.

Mr. Masters suggested \$3 million for next year, which could be used to purchase fertility control vaccines as well as address expenses to deliver (i.e., darting, volunteers, etc.) those vaccines.

The recommendation states:

“Increase wild horse and burro funding for fertility control in the next fiscal year to \$3 million.”

It was noted that approximately \$140,000 was spent in FY 2016, which does not capture all the costs associated with fertility control. Mr. Bolstad indicated that he would like broad discretion in implementing the intent of the Board's recommendation. He indicated that BLM will be maximizing the leverage of the funding through partnerships and other avenues. Mr. Masters indicated that the intent is to increase the amount of fertility control being implemented and expanding the program in a meaningful way.

Ms. Bail suggested that the federal government just began FY 2018 and that, by stating “next fiscal year”, the Board intends the increase to \$3 million would occur in FY 2019. The Board agreed with that statement. Ms. Kathrens asked if there was opportunity to move funding between different aspects of the program. Ms. Bail indicated that BLM could examine its discretionary funding, but with having to address a \$10 million decrease in the program's budget in FY 2018, most discretionary funding has been eliminated.

The recommendation was revised to read as follows:

“Increase wild horse and burro funding for fertility control in FY 2019 to enable goals for achieving AML.”

Mr. Masters suggested the language to replace “to enable goals for achieving AML” with “for attaining AML in appropriate HMAs”.

Dr. Weikel asked what happened to the \$3 million. Mr. Masters believes it would be good to identify a specific funding level.

The recommendation was revised to read as follows:

“Increase wild horse and burro funding for fertility control in FY 2019 increase to \$3 million.”

Mr. Bolstad suggested identifying the number of animals treated; instead of identifying a specific funding level. Ms. Bail asked if the recommendation would include private/public partnerships, which would allow increasing the number of animals treated by non-federal (outside) funds as well. Ms. Kathrens indicated that identifying the number of animals being treated is not the objective, which is to include additional funding for the entire program (i.e., volunteers, etc.)

Ms. Kathrens asked Mr. Masters what he meant by “appropriate HMAs”. Mr. Masters provided an example to explain his intent. If there are two HMAs where one is significantly over AML and the other is at AML, the HMA at AML would be more appropriate to treat as the HMA significantly over AML will likely be gathered in the future. Mr. Bolstad suggested the Sand Creek Basin HMA would be a good example of an “appropriate” HMA.

Ms. Kathrens applied Mr. Master’s example to the HMAs in the Red Desert (Wyoming) where the herds are over AML, which are relatively low (Lost Creek HMA AML ranges between 70 and 150). There are extenuating circumstances in play when herds have special characteristics, which can still be brought down to AML through fertility control efforts. Mr. Bolstad suggested the Sand Wash HMA would be a good example where funding could be focused toward contraception and improvements to increase current efforts; rather than go to another HMA (such as Antelope Valley (Nevada)) where there are thousands of animals. Mr. Masters agreed – areas where it is feasible to enact a successful fertility control program over the short-term. Ms. Kathrens suggested the Red Desert HMAs would fall in that category. Ms. Kathrens does not want AML to be the sole criteria.

Mr. Masters suggested removing everything after FY 2019.

Dr. Weikel suggested adding “such funding might be applied to permanent sterilization of male and/or females.” There was a concern such language would eliminate fertility control, to which Dr. Weikel agreed as the use of the term “fertility control” has been used to mean immuno-contraception. Fertility control is more than immune-contraception.

Mr. French asked if \$3 million would be sufficient if other types of fertility control are included. Ms. Kathrens indicated that her intent was that fertility control would address actions that are reversible, and can be taken back, if necessary. Dr. Weikel suggested inserting the word “reversible” in front of “fertility control.”

The recommendation was revised to read as shown below:

“Increase wild horse and burro funding for reversible fertility control by \$3 million in FY 2019.”

DECISION: In a split vote of six in favor and one opposed (Dr. Weikel), the Board approved the recommendation as stated below:

“Increase wild horse and burro funding for reversible fertility control by \$3 million in FY 2019.”

Recommendation 5

Mr. Yardley noted that the recommendations thus far do not address the overpopulation of animals on the range and the dire consequences occurring on the rangeland because of the overpopulation. If not addressed, the population will increase from the current population of approximately 75,000 animals to 150,000 animals in four years and 300,000 animals in eight years, assuming there is not a catastrophic population decline. Ranches and HMAs cannot sustain those numbers without having a population crash. A population crash is a gentler description of animals starving and dying of thirst, which is not humane. It is one of the least humane things that could be done to an animal. As an advocate for animals and someone who takes care of animals, Mr. Yardley believes and why he is on the Board is that we all are children of God who has given us stewardship over this earth and its animals. He expects us to take care of these animals, which, sometimes, means making hard decisions that is best for them.

Mr. Yardley recommended the Board follow the *Wild Free-Roaming Horses and Burros Act of 1971* in its entirety and must of his recommendation comes directly from the Act.

Mr. Yardley recommended the following:

“BLM will immediately follow the *Wild Free-Roaming Horses and Burros Act of 1971* in its entirety and shall remove excess animals (defined as animals over AML) from the range so as to achieve appropriate management levels. Such action shall be taken, in the following order and priority, until all excess animals have been removed so as to restore a thriving natural ecological balance to the range, and protect the range from the deterioration associated with overpopulation:

1. BLM shall order old, sick, or lame animals to be destroyed in the most humane manner possible;
2. BLM shall cause such number of additional excess wild free-roaming horses and burros to be humanely captured and removed for private maintenance and care for which the BLM determines an adoption demand exists by qualified individuals and groups. All animals should be offered for adoption three times and; thereafter, shall be made available for sale without limitation or humane euthanasia.
3. Those animals deemed unsuitable for sale should then be euthanized in the most humane manner possible.”

Mr. Yardley stated that we are facing one of the greatest travesties that has ever happened in our country regarding our rangeland resource. If we don't make hard decisions now, generations to come will be making much harder decisions. The damage that is currently occurring is nearly impossible to repair. There have been seedings that have been repeated three times unsuccessfully due to the arid nature of the ground. Now is the time to act! Unfortunately, the “can has been kicked down the road” for a long time, and now we need to make some hard decisions. If we continue to kick the can down the road, the decisions will be harder to make. Animals such as wild horses and burros as well as wildlife will suffer the consequences.

Dr. Weikel asked if the three-year period was identified in the Act. Mr. Yardley indicated that the word “immediately” is used in the Act and he would recommend we define that as “within three years”. Dr. Weikel asked that “within three years” be inserted parenthetically behind the word “immediately” and then insert the exact wording used in the Act. Mr. Yardley agreed with Dr. Weikel's suggestions.

Mr. Masters suggested the following wording - “To achieve the appropriate management level within three years to use fertility control to slow population growth to where the recruitment equals the adoption demand”, at which time there would be a sustainable solution.

Mr. Yardley thought that would be an excellent addition to his recommendation. Mr. Yardley also recommended adding “we further recommend the BLM utilize the help and assistance of all State and local governments, agencies, and individuals in achieving AML”. Mr. Yardley thought the end goal should be to have sustainable herds of healthy animals on healthy rangelands, which includes using fertility control, adoption, permanent sterilization, etc.

Dr. Weikel asked if Mr. Yardley’s recommendation could be shortened to include only the following language - “he shall immediately remove excess animals from the range to achieve appropriate management levels. Such action shall be taken, in the following order and priority,” – BLM is already obligated to follow the Act, even without the Board’s recommendation. She doesn’t know why the extra language is necessary. Mr. Yardley agreed with Dr. Weikel’s statement. Dr. Weikel suggested revising Mr. Yardley’s recommendation to include “BLM will immediately (within the next three years) follow the Wild Horse and Burro Act in its entirety and remove excess animals to achieve AML.” Mr. Yardley agreed to Dr. Weikel’s suggested wording.

Mr. Yardley added “we further recommend the BLM utilize the help and assistance of all State and local governments and agencies, and individuals in achieving AML. Thereafter, the goal should be to maintain herds at AML through darting, adoptions, and permanent sterilization”.

The recommendation was revised to read as follows:

“BLM will immediately (within the next three years) follow the Wild Horse and Burro Act and remove excess animals to achieve AML. Further, use help and assistance of all state and local agencies and individuals in achieving AML. Thereafter, the goal should be to maintain herds at AML through darting, adoptions, and permanent sterilization.”

Dr. Weikel asked if Mr. Yardley would be open to two additional recommendations of which one would address achieving AML and, the second, maintaining AML. Mr. Yardley agreed with Dr. Weikel’s suggestion. Dr. Weikel suggested revising Recommendation 5 to read “BLM will immediately (within the next three years) follow the Wild Horse and Burro Act and remove excess animals to achieve AML.” Mr. Yardley insisted on retaining the remainder of the revised motion.

Ms. Sewing suggested adding the word “organizations” to the recommendation. Mr. Yardley agreed with Ms. Sewing’s addition.

Ms. Kathrens asked who would do the killing. Dr. Weikel indicated that Recommendation 5 did not address processing of animals, but addresses getting the animals off the range. Dr. Weikel indicated that processing was a separate issue. Ms. Kathrens indicated that, in 2007, BLM had meetings that contemplated destruction of healthy wild horses. It was found that destruction of 1,000 to 2,000 annually could be accomplished before violating clean water standards and other EPA laws. They also discussed the number of psychologists that would be needed to counsel employees told to destroy healthy animals. Ms. Kathrens suggested that if the Board is willing to make such a recommendation it would have to assume the responsibility for taking part in the deed. Ms. Kathrens can’t imagine doing that.

Mr. Yardley indicated that is what is required in the Act.

DECISION: In a split vote of six in favor and one opposed (Ms. Kathrens), the Board approved the recommendation as stated below:

“BLM will immediately (within the next 3 years) follow the Wild Horse and Burro Act and remove excess animals from the range to achieve AML. Further, BLM will use the help and assistance of all state and local agencies, organizations, and individuals in achieving AML.”

Recommendation 6

Mr. Masters suggested a recommendation to maintain the AML by using fertility control to slow the population growth to where removals equal the adoption demand.

Dr. Weikel asked for clarification on the meaning of fertility control (all the tools in the tool box or immune-contraception only). Mr. Masters indicated that he would prefer a priority be given to immune-contraception, but understands that permanent sterilization may be a more realistic option. Dr. Weikel asked if the recommendation was defining the term “fertility control” to which Mr. Masters indicated that it was not.

The recommendation was read as follows:

“Maintain AML by using fertility control to slow population growth to where removal equals the adoption demand.”

Dr. Weikel suggested a few grammatical changes, which were agreed to by Mr. Masters.

The revised recommendation is shown below.

“Maintain AML by using fertility control to slow population growth at levels where removals equal the adoption demand.”

Ms. Kathrens noted that the national AML of 26,710 animals is virtually the same as the population level in 1971 when those who created the Act were afraid wild horses and burros would be lost forever. Ms. Kathrens is uncertain as to how we were stuck with the 26,710 animal AML, when most HMAs do not have an AML that meets the minimal level of 150 to 200 animals necessary to maintain a genetically viable herd. Ms. Kathrens inquired as to how the national AML was established. Mr. Bolstad indicated that the national AML level is a cumulative total of the AMLs established for the 177 HMAs. Ms. Kathrens noted that 150 times 177 equals 26,650, which is close to the national AML. She isn't sure there is a scientific basis for managing herds such as those in the Red Desert where there is one horse for every 6,000 acres. She believes the national AML needs to be re-evaluated. Ms. Kathrens recognizes that there are herds that are overpopulated, but what about the herds that are not overpopulated? Ms. Kathrens doesn't believe there is a scientific basis behind the national AML and she would like to see it re-evaluated to impart some level of fairness and common sense.

Mr. Masters suggested incorporating Ms. Kathrens concern and suggestion into the recommendation. Mr. Masters noted that the national AML has never been achieved, except when it came close in 2007. If AML could be reached, vegetation data could be re-evaluated with the intent of potentially adjusting AML over time.

Ms. Kathrens suggested the national AML in 2007 was not 26,710 animals. Mr. Bolstad did not know the national AML in 2007 from memory, but indicated that it could be found in the national statistics. He indicated that it was essentially the same and as not very changed significantly over time.

Dr. Weikel asked Mr. Masters and Ms. Kathrens to develop a separate recommendation to address Ms. Kathrens concern. Dr. Weikel recognized that Ms. Kathrens concern is slightly different and has been expressed many times. The Board has made past recommendations asking BLM to revisit AML.

Mr. French indicated that he agrees with Ms. Kathrens' concern. BLM should take every opportunity to reassess AML. Mr. French noted that many HMAs have suffered significant change (i.e., invasive weeds, annual grasses, etc.) in the past 20 years and where the current AML may not be appropriate for those locations.

Mr. Yardley asked if the AML is addressed each time a land use plan is revised. Mr. Bolstad indicated that AML is more appropriately addressed when land health standards are evaluated. If land health standards are not being met, a causal factor is determined, and appropriate changes made. If standards are being met, changes to AML could be made.

Mr. French noted that tying evaluation of AMLs to a land use plan revision is problematic as some revisions are 30 years apart. Review of AMLs needs to be timelier than every 30 years.

Mr. Bolstad was indicated that it is difficult to evaluate the validity of AML can if it hasn't been reached.

Dr. Weikel stopped the conversation by suggesting a vote on Recommendation 6 and, if necessary, craft another recommendation after the vote.

Ms. Sewing suggested identifying a level of AML to maintain. Dr. Weikel indicated that every HMA has an established AML, which Ms. Sewing understood; however, believes the current AML level (26,710 animals) should be included. Mr. Yardley suggested adding the word "current" before AML, but Mr. Masters recommended leaving the language as stated so the next recommendation could recognize that AML can change.

Ms. Sewing suggested Recommendation 6 was more focused at maintaining population growth levels (i.e., removals equaling the adoption demand); therefore, identifying a specific level of AML isn't important.

DECISION: In a split vote of six in favor and one opposed (Ms. Kathrens)⁶, the Board approved the recommendation as stated below:

"Maintain AML by using fertility control to slow population growth at levels where removals equal the adoption demand."

Recommendation 7

Mr. Masters suggested a recommendation which reads:

"Increase AML where appropriate."

Mr. Yardley suggested replacing the word "increase" with "adjust".

DECISION: The Board unanimously approved the recommendation as read and presented below.

"Adjust AML where appropriate."

⁶ Ms. Kathrens indicated that she agreed with maintaining AML, but objected to using techniques such as permanent sterilization of animals to maintaining AML.

Closing Comments

Mr. French thanked the Board and BLM for helping him through his first meeting, which was a trying experience, and is not something he takes lightly. While he is not happy with some of the decisions the Board had to address today, but he believes we're doing the right thing and understands that not acting today would have created a far worse situation in the future.

Mr. French, personally, thanked the wild horse advocates who took time to attend the meeting. He hopes that the recommendations made today will help in linking arms to adopt and process enough animals to allow removing additional animals from the public lands while maximizing the number that find good homes. The solutions for the issues can be found within this room.

Mr. Bolstad thanked everyone and provided a response to Mr. Masters' disappointment that the September 2016 recommendations were not addressed at this meeting. Mr. Bolstad reiterated that BLM is in transition from one administration to another, that there several key positions in the Department [of the Interior] that remain vacant, as well as the BLM Director position. As a result, there is a hesitancy to take permanent positions on some things. The President's budget did request Congress do certain things, while not a direct response to the Board's recommendation, the President's budget did, in part, address one of the recommendations.

Mr. Bolstad indicated that there isn't one solution to all issues. We're not at just "one fork in the road with two choices", it is more like trails leading into a water hole – there are many. The worst possible thing that we can do is to sit at the fork, be indecisive, and not make decisions. We will need to make decisions as we continue to reach other "forks in the road".

Meeting Adjournment

The meeting was formally adjourned at 5:15 p.m.

Summary of Board Decisions and Actions

A summary of decisions made by the Board and actions committed to during the meeting is provided in Attachment 2.

(The remainder of this page was left blank intentionally.)

Acronyms

The following acronyms were used during the meeting and listed in alphabetical order.

<u>Acronym</u>	<u>Meaning</u>
AML.....	Appropriate Management Level
AUM	Animal Unit Mont
BLM.....	Bureau of Land Management
FLPMA	Federal Land Policy and Management Act
FY	Fiscal Year
GEMS	Great Escape Mustang Sanctuary
HA.....	Herd Area
HMA	Herd Management Area
HSUS	Humane Society of the United States
IDT.....	Interdisciplinary Team
MHF.....	Mustang Heritage Foundation
MOU	Memorandum of Understanding
NAP.....	National Advisory Board
NMA-CO	National Mustang Association – Colorado
PZP.....	Porcine Zona Pellucida
RMP	Resource Management Plan
SWAT	Sand Wash Advocate Team
TIP	Trainer Incentive Program
USGS	U. S. Geological Survey
WH&B	Wild Horse & Burro

Attachment 1 – Brainstorming Summary

Question 1: How can the BLM achieve AML within all HMAs in 5 – 10 years?

- Cannot do this without humane destruction on the range
- Reduce cost of off-range matters so enough budget to get going on the range
- Helicopters gathers
- Holistic look at all things
- Round up and take off only adoption age animals and combine that with training component
- Water trap and bait gathers
- Dart and contraceptive in some way (PZP-22, etc.)
- BLM complete evaluation of each HMA and apply decision matrix – if above AML, preserve the adoptable age animals – utilize energy of concerned groups to help place animals—ex., Humane Society rescue animals from shelters and place in no-kill shelter
- non-adoptable animals are not put back on same HMA but processed differently
- WH&B Act- follow it in its entirety-excess will be removed to reach AML – Sec shall order old, sick and lame animals to be etc.—those can't be adopted shall be sold if more than 10 years or offered unsuccessfully more than 3 times, etc.
- Marketing strategy and way BLM talks about wild horses should be changed
- Prioritize HMAs with plan in place for maintenance post-gather to AML

Question 2: How can the BLM sustainably maintain AML within all HMAs?

- Permanent sterilization
- Non-breeding herds
- Vaccine fertility control
- Partner with local orgs
- Creation of volunteer orgs to monitor and control population growth
- Utilize Local and state government agencies
- Provide financial incentive to volunteer orgs
- Ask each BLM DO to do on-going surveys
- Plan in place for on-going maintenance of AML
- Reevaluate AML
- increase overall distribution within HMA
- evaluate spatial and temporal usage of HMA with eye to optimizing rangeland health for multiple use
- evaluate whether certain HMAs should be considered as a range
- allow people to buy AUMs and transfer those for wild horse use (this idea was further discussed by the Board - [Brainstorming Concerns](#))
- evaluate if some HMAs have all necessary attributes as HMA or should be zeroed out
- evaluate if any areas that again could contain wild horses use (this idea was further discussed by the Board - [Brainstorming Concerns](#))

(The remainder of this page was left blank intentionally.)

Question 3: How can the BLM reduce and control holding costs for excess animals?

- Rec #1 from 2016 NAB meeting
- Explore opportunities to place non-reproducing animals in zeroed-out HA/HMA/ and JMAs
- Increase adoptions
- Implement phase-out of all long-term holding
- Capture benefits from reduced herd reproduction
- Move to pastures sooner in the process
- Eliminate short term holding in 5 years

Question 4: How can the BLM significantly increase annual adoptions and sales of wild horses and burros?

- review procedures on adoption to increase adoption potential in country and internationally
- Prioritize dollars in areas of program that are working, e.g.
- create signage for all wild horse herd areas along highways and roads
- create brochure for specific herds
- remove impediments to sale and adoption
- improve stress and trauma to horses so they are more likely to be adopted
- increase adoption opportunities in Eastern US
- continue to pursue prison programs
- pilot test breeds being introduced in small herds and see how this works
- Manage for adoptability: e.g. select for riding desired genetics
- no age limitations on adoptions
- provide incentives to adopters
- increase funding for TIP programs and others that help adoptions
- initiate international adoptions

Question 5: How can the BLM continue to ensure humane treatment of wild horses and burros?

- BLMs comprehensive care program could be improved- protocols that improve handling through entire system
- phase-out helicopter round-ups in lieu of bait and water trapping use (this idea was further discussed by the Board [-Brainstorming Concerns](#))
- follow-up after adoptions_ use volunteers
- prepare emergency plan in case 1,000's starving in next few years
- capture and processing of wild horses should have 3rd set of eyes
- Enter into MOU agreements with international adoption brokers
- train (continue) local, state and government officials plus volunteers re humane treatment

Question 6: How can the BLM use best available science to improve management of wild horses and burros?

- expedite acquisition of information
- review existing projects, i.e., Sheldon
- Establish outside panel to review research sources BLM uses and maybe advise re others available and how to let wider group know what we are needing research on
- Create central location to house past and current research on WH&B
- adopt any and all survey methodologies for use- duplicate efforts of other wildlife agencies re this to get best possible accounts
- survey non-HMA fed lands re herd distribution and composition
- coordinate and utilize data sets used by other agencies who have used data for years
- utilize sound range science in management of wild horses

Question 7: What humanitarian assistance opportunities exist for wild horses and burros?

- therapy programs for vets
- prison programs-pursue in other states and mirror what has worked well
- expand 4H and FFA programs like SWAT ex
- provide food and sustenance

Question 8: How can the BLM better provide information to the public?

- put up signs on HMAs on roadways that identify these are wild horses and BLM office provides brochure with map
- An app showing herds, history, size AML, map, gathers, etc.
- local field office info for folks with contact info
- maps and signs that produce local pride in local horses, increasing interest in adoptions and general animal welfare
- Provide information to Chambers of Commerce and other educational opportunities including school systems
- better coordination with other stakeholder agencies to help educate hunters on presence of wild horses

Question 9: How can the BLM increase public participation and financial support in the management of wild horses and burros on and off the range?

- Find a way to accept \$\$ from foundations, etc.
- BLM Foundation now exists
- Directed donations can be accepted
- View public as valued partner –all interested groups valued
- Coordinate activities with other interests on the land—reach out to them
- Utilize and acknowledge donations of permittees on HMAs—all resources are valued
- social media page with all this info
- Reduce red tape and bureaucracy to extent possible-often deters others assisting on the range (range re-seeding, spike treatments, etc.)
- Educate public on what they can do

Attachment 2 – Summary of Decisions Made and Committed Actions

The following is a summary of the decisions by the Board.

General Topic	Decision	Page of Meeting Minutes
Brainstorming Session	The Board unanimously approved a motion made by Ms. June Sewing and seconded by Mr. Steven Yardley to forward the brainstorming summary document to the Congressional preparation committee as an accurate reflection of the Board's concerns.	27 (Brainstorming Decision)
Board Recommendations to BLM	Recommendation #1: The National Wild Horse and Burro Advisory Board recommends the Wild Horse and Burro National Advisory Board have their next meeting in Washington, D.C., and present their most recent recommendations, including those presented in September 2016, to agency officials. Tentatively to be scheduled early in the calendar year, but before the middle of March 2018.	30 (Recommendation 1)
	Recommendation #2: The National Wild Horse and Burro Advisory Board recommends BLM phase out long-term holding over the next 3 years and apply that budget to on-range management and adoptions.	31 (Recommendation 2)
	Recommendation #3: The National Wild Horse and Burro Advisory Board recommends BLM create funding mechanisms to maximize adoptions and/or sales, especially through successful programs, and to include international adoptions and/or sales.	33 (Recommendation 3)
	Recommendation #4: The National Wild Horse and Burro Advisory Board recommends BLM increase wild horse and burro funding for reversible fertility control by \$3M in FY 2019.	34 (Recommendation 4)
	Recommendation #5: The National Wild Horse and Burro Advisory Board recommends BLM immediately (within the next 3 years) follow the Wild Horse and Burro Act and remove excess animals from the range to achieve AML. Further, BLM will use the help and assistance of all state and local agencies, organizations, and individuals in achieving AML.	37 (Recommendation 5)
	Recommendation #6: The National Wild Horse and Burro Advisory Board recommends BLM maintain AML by using fertility control to slow population growth at levels where removals equal the adoption demand.	38 (Recommendation 6)
	Recommendation #7: The National Wild Horse and Burro Advisory Board recommends BLM adjust AML where appropriate.	38 (Recommendation 7)

The following is a summary of actions committed to during the meeting.

General Topic or Action	Action	Party Assigned Action	Page of Meeting Minutes
What are the Key Elements of a Sustainable Wild Horse and Burro Program?	Approach the Department with the question if the Board can review the Report to Congress before being submitted to Congress.	BLM Wild Horse & Burro Division	27 (Action Item 5)



U.S. Department of the Interior
Bureau of Land Management

NATIONAL WILD
HORSE & BURRO
ADVISORY BOARD

Grand Vista Hotel
2790 Crossroads Blvd.
Grand Junction, Colorado

October 18 – 19, 2017

Volume 3

Public Comments Verbally
Presented to the Board

U. S. Department of the Interior
Bureau of Land Management

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A public comment period was conducted from 3 p.m. to 5 p.m. on Wednesday, October 18, 2017, allowing 51 speakers opportunity to address the Board. Each speaker was asked to limit their presentation to two minutes to ensure all speakers had opportunity within the timeframe identified for public comment. Speakers were encouraged to submit their comments in a written format.

A summary of the individual presentations given, and written comments¹ submitted at the meeting as well as public comments submitted to BLM through the Advisory Board's e-mail address at whbadvisoryboard@blm.gov are provided below, and in Volume 4.

Public Comments Presented or Provided at October 18 – 19, 2017 Meeting

Varlin Higbee

Mr. Varlin Higbee introduced himself as a Lincoln County (Nevada) Commissioner. Lincoln County's tax base is solely based on the natural resource industries (i.e., livestock, mining, etc.) In the past several years, the wild horse populations have increased to such a significant number that it has adversely affected the County's tax base. Livestock have been removed to protect the resource, which has been BLM's only option. It has also had a major impact on the County's ability to function and provide services for the citizens of Lincoln County. The County is at a critical point where, if wild horses are not brought down to the Appropriate Management Levels (AML), the vegetative and rangeland resources will be lost for good. If that occurs, Lincoln County will be broke.

The resource has been degraded to a point in some areas that it will never recover. In the 1980s, when many areas were overrun with wild horses, the natural resources were adversely impacted and have never recovered in the 30 or 40 years since. If the wild horses are allowed to continually increase, there will be vast areas that are adversely affected

The two-minute warning was received, and Mr. Higbee stopped his comment.

Tom Allen

Mr. Allen is a member of the Public Lands Foundation's (PLF) Board of Directors whose membership represents thousands of years of professional experience in managing natural resources. Under currently policy, in 2022, there will be 150,000 wild horses on the range, which is approximately 125,000 animals over AML. Given that perspective, that is the same as adding 500 ranches enterprises to the public lands each having 500 horses for six months. No one believes that is a good idea and suggested that would be the same with horses.

Fertility control (i.e., Porcine Zona Pellucida (PZP)) is ineffective for managing most populations, is effective for only one year; gathering animals becomes increasingly difficult, especially when there are trees; tracking treated mares is difficult, etc. Even if the horse population were at AML, the reality is that sufficient budgets will be available to complete gathers is unlikely. A population reduction program based on PZP using darting and/or water and feed trapping will fail. The instances where these methods can be used are few and are not representative of the vast majority of HMAs and horse populations in the West.

The PLF is asking the Advisory Board to recommend that the BLM be supported in using all tools available under the *Wild Free-Roaming Horses and Burros Act of 1971*, as amended. Unrestricted sale of wild horses in holding facilities and

¹ Photos were removed from written comments to facilitate transmission of documents electronically. Original comments that include the photos are available from BLM, upon request.

excess animals on the rangeland is essential. Long-term fertility control drugs when they become available may be the answer.

The two-minute warning was received, and Mr. Alan stopped his comment.

Stella Trueblood

Ms. Trueblood introduced herself as the Field Manager for the Sand Wash Advocate Team (SWAT) who has administered 135 PZP treatments to date in 2017. Additional treatments are expected to be given prior to the end of 2017. The cost of PZP treatments is \$24 per dose or approximately \$30 if the cost of the dart and adjuvant are included. The cost of her labor when darting is free as are the vehicle costs (repair, fuel, maintenance, etc.) All are provided without receiving a salary.

If 250 mares were treated annually with two injections (a primary and booster), the cost would be \$15,000 or \$60 per mare. Cost would be \$1,200 per mare that live for 20 years as compared to the cost of \$45,000 to gather and warehouse a horse in holding, and it is a “no brainer” what we should be doing.

PZP should be the standard for population control; not large-scale gathers. Ms. Trueblood finds it easier to dart horses today than when she started four years ago. SWAT has an extensive data base of all animals in the Sand Wash HMA including when they were treated. She finds the animals aren't harder to dart, it gets easier each year.

In addressing the impact of wild horses to wildlife, Ms. Trueblood has never seen aggression by wild horses toward any wildlife, but observes antelope and elk drinking from the same source concurrently with wild horses, especially at night. She is curious as to what studies would should in regards having 2,000 to 3,000 head of domestic sheep that are camped at a water source over a period of days.

Dr. Terry Sweet

Dr. Sweet read from a prepared statement that is provided below.

ROCKY MOUNTAIN ELK FOUNDATION

October 5, 2017

National Wild Horse and Burro Program, WO-260

Attention: Ramona DeLorme

1340 Financial Boulevard,
Reno, NV 89502-7147

Ms. DeLorme,

The Rocky Mountain Elk Foundation (RMEF) serves as a member of the National Horse & Burro Rangeland Management Coalition. The purpose of this correspondence is to convey our significant concern related to the west's increasing number of feral horses. The Bureau of Land Management (BLM) estimates there are over 72,000 feral horses and burros on its lands, while the U.S. Forest Service estimates its lands have a population of 10,000 feral horses and burros. Recent scientific studies demonstrate that wild horse and burro populations increase at a rate of 18-20 percent per year, doubling the population every 4-5 years. The BLM has established a carrying capacity of only 27,000 feral horses and burros on its lands.

This situation unchecked is simply not sustainable. Significant long-term damage is occurring to vital range properties, including forage and water resources. Evidence suggests and supports the fact that horses are much harder on range resources than the wild ungulates they displace. Horses compact soils, degrade water sources and significantly impact forage production.

While the situation on western rangelands is dire, it is not the only problem reflected concerning feral horses and burros. The BLM continues to house over 44,000 feral horses in holding facilities, costing the American taxpayer \$50,000 per animal over its lifetime. Overall, the horse and burro program costs in excess of \$80 million per year. Imagine the wildlife habitat that could be conserved and enhanced with those resources.

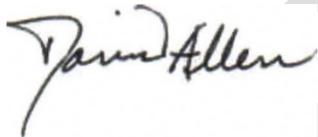
The BLM has made several attempts in recent years to solve this problem, up to and including culling and slaughter, adoption and fertility control. Unfortunately, Congress shut down all of

America's horse slaughterhouses and public demand for adoption of feral horses has evaporated. Last year, the BLM succumbed to the threat of litigation by feral horse advocates and abandoned its plans to conduct research into the viability of feral horse contraception and sterilization.

The FY 2018 Interior, Environment, and Related Agencies Appropriations Bill that was recently passed by the House of Representatives includes language authorizing BLM to utilize euthanasia to help control the growth of feral horse and burro populations. RMEF fully supports providing BLM this option and encourages the Senate to retain this provision in the bill.

Thank you for the opportunity comment on this important issue.

Sincerely,



David Allen
President & CEO

National Wild Horse and Burro Advisory Board, Talking Points

- The Rocky Mountain Elk Foundation is a national hunting and conservation organization based in Missoula, MT with over 222,000 members nationwide. Our mission is to ensure the future of elk, other wildlife, their habitat and our hunting heritage.
- RMEF is a member of the National Horse & Burro Rangeland Management Coalition, which advocates for commonsense, ecologically sound approaches to managing horses and burros.
- The Bureau of Land Management estimates there are over 72,000 feral horses and burros on its lands, while the U.S. Forest Service estimates its lands have a population of 10,000 feral horses and burros.

- Recent scientific studies demonstrate wild horse and burro populations increase at a rate of 18-20 percent per year, doubling the population every 4-5 years. The BLM has established a carrying capacity of only 27,000 feral horses and burros on its lands.
- Significant long-term damage is occurring to vital range properties, including forage and water resources.
- Evidence suggests and supports the fact that horses are much harder on range resources than the wild ungulates they displace. Horses compact soils, degrade water sources and significantly impact forage production.
- While the situation on western rangelands is dire, it is not the only problem reflected concerning feral horses and burros. The BLM continues to house over 44,000 feral horses in holding facilities, costing the American taxpayer \$50,000 per animal over its lifetime. Overall, the horse and burro program costs in excess of \$80 million per year. Imagine the wildlife habitat that could be conserved and enhanced with those resources.
- Public demand for adoption of feral horses has evaporated. Last year, the BLM succumbed to the threat of litigation by feral horse advocates and abandoned its plans to conduct research into the viability of feral horse contraception and sterilization.
- The FY 2018 Interior, Environment, and Related Agencies Appropriations Bill that was recently passed by the House of Representatives includes language authorizing BLM to utilize euthanasia to help control the growth of feral horse and burro populations. RMEF fully supports providing BLM this option and encourages the Senate to retain this provision in the bill.

Holly Kennedy

Ms. Kennedy introduced herself as representing over 12,000 associates and 2,700 agricultural producers of the Wyoming Farm Bureau Federation. While considered as an iconic of the West, these horses are often viewed with a level of admiration that is not provided to other animals, to the point of them being knowingly allowed to wreak havoc on our environment. AMLs were not arbitrarily determined or set at the level where multiple species could utilize the landscape without causing sustained or long-term harm.

By allowing wild horse and burro numbers to continually and increasingly exceed AML, a conscious choice is being made to knowingly allow this rangeland to be degraded, in some cases, beyond repair.

Our membership has dedicated both their lives and livelihoods to raising healthy animals. They advocated for the management of all animals. Knowingly allowing any animal to be deprived of adequate feed or water is not humane. Our members support methods of population control, including adoption, sterilization, birth control, sale, and humane destruction. Furthermore, they support utilization of a reliable basic and holistic approach of introducing mule jacks to produce sterile offspring.

At the current level of overpopulation, we must seek drastic steps to reach AML, and then take adequate steps to maintain a population at that sustainable level. We care about our western rangeland and all of the species that depend on them. We must allow BLM to utilize all management options, including unrestricted sale and euthanasia.

Tammy Pearson

Ms. Pearson is a County Commissioner from Weber County, Utah. Weber County is 77 percent public land administered by the federal government. The seven Herd Management Areas (HMA) in the county are from 300 to 600 percent over AML, which is adversely affecting livestock and wildlife interests as are the people and organizations associated with

those interested. Those people and organizations have sent pictures to and pleaded with the Board of Commissioners to do anything possible to encourage implementation of the *Wild Free-Roaming Horses and Burros Act of 1971*, including use of all the tools in the toolbox. The Board of Commissioners recommends BLM implement the *Wild Free-Roaming Horses and Burros Act of 1971*.

Ignorance is bliss for the majority of the public who don't understand what is occurring on the ground, which is harsh not only on the wildlife but riparian areas, springs, etc. We're intentionally devastating our rangeland. This will be the largest man-made ecological disaster and the worst case of inhumane treatment of animals in the history of the west, if we allow the status quo to continue.

Mr. Pearson commended the Board for the steps taken last year. She believes it important that there is now an Administration willing to take the hard choices. It's that time!

Kerry O'Brian

Ms. O'Brian thanked the Board for their generosity and service. She also personally thanked Dr. Kane for his presentation. Ms. O'Brian is an independent advocate for healthy horses on healthy rangelands.

Reduced to its lowest common denominator, we have a supply/demand problem. Right or wrong, informed or totally ignorant, the American people will not allow the decimation of wild horses. Mr. O'Brian doesn't want to go there. Instead, she asked some "elephant in the room" questions.

1. Why are herds managed with native PZP by volunteers producing higher efficacy rates than those being treated by BLM with PZP-22?
2. Why hasn't there been follow-up efficacy correlation studies of PZP-22 after treatment where some herds show little or no reduction in foal crop?
3. If the efficacy rate of PZP-22 is very close to no treatment at all, why has BLM, at great expense, continued to gather and treat with a vaccine that, apparently, has close to zero efficacy?
4. How many mares were actually treated by BLM versus advocacy groups in the past five years and this version of PZP?

We can't use PZP-22, ZonaStat, and SpayVac interchangeably. Where is the comparison data available? And, if not, why not?

Although Ms. O'Brian encourages each field office to have their own cultural and physical environment, where is there not a national direction to reduce populations in each field office using the tools as they see fit but also which demands accountability.

Normally, organizations fail for two reasons – lack of vision and lack of follow through. There is a community of visionaries in this room who are successfully implementing fertility control. They are passionate, committed, and view weather inconvenience and bureaucratic stonewalling as simply hurdles to overcome, keeping their eye on the prize. Fertility control by BLM is possible, but requires vision, accountability, and follow through.

Ms. O'Brien also presented a written statement, which is provided below:

WH&B Advisory Committee Meeting Public Statement O'Brien 2017

As always, thank you Board members for your generosity and your service. In light of the number of speakers, I'll be brief.

Reduced to its lowest common denominator, we have a supply/demand problem. Too much supply. No demand. Not going there.

Right-wrong, informed or totally ignorant, the American people are not going to allow the decimation of wild horses. Not going there either.

So, here's some "elephant in the room" questions:

We have fertility control tools. Imperfect, but they are the tools we have. Why are they being implemented so poorly?

Why are herds managed with Native PZP by volunteers, producing higher efficacy rates than those being treated by BLM with PZP

Why are there ZERO follow up efficacy studies of PZP 22 after treatment? Some herds show little or no reduction in foal crop. Why is that data not being correlated with treatment data?

If, as reported, the PZP 22 efficacy rate is somewhere around 50%, that is very close to NO treatment at all. Why does BLM, at GREAT expense, continue to gather and treat with a vaccine that apparently has close to zero efficacy? Where is the data?

How many mares were actually treated by BLM versus advocacy groups in the last five years, and with which version of PZP? You can't use PZP 22, Zonastat and SpayVac interchangeably. Where is that comparison data available and if not, why not?

Although I understand that each field office has its own physical and cultural environment, why is there not a NATIONAL directive, to reduce populations in each field district, using the tools available as they see fit, but that also demands accountability?

Most people and organizations fail for two reasons: lack of vision, and lack of follow through. There is a community of visionaries in this room, right now, who are successfully implementing fertility control. They are impassioned, committed, and view weather, inconvenience and bureaucratic stonewalling simply as hurdles to overcome, keeping their eye on the prize. Fertility control by BLM is possible. But it requires vision, accountability and follow through.

Thank you, Board Members.

The following was taken from a BLM EA, I believe for McCullough Peaks. WHERE IS THE DATA?

United States Department of the Interior
Bureau of Land Management
Environmental Assessment

DOI-BLM-MT-COIO-2009-35-EA

Appendix III

Standard Operating Procedures for Population-level Fertility Control Treatments utilizing the 22-month time-release pelleted vaccine

Monitoring and Tracking of Treatments:

1. At a minimum, estimation of population growth rates using helicopter or fixed wing surveys will be conducted before any subsequent gather. During these surveys it is not necessary to identify which foals were born to which mares; only an estimate of population growth is needed (i.e. # of foals to # of adults).
2. Population growth rates of herds selected for intensive monitoring will be estimated every year post-treatment using ground, helicopter or fixed-wing surveys. During these surveys it is not necessary to identify which foals were born to which mares, only an estimate of population growth is needed (i.e. # of foals to # of adults). If, during routine HMA field monitoring (on-the-ground), data describing mare to foal ratios can be collected, these data should also be shared with the NPO for possible analysis by the USGS.
3. A PZP Application Data sheet will be used by field applicators to record all pertinent data relating to identification of the mare (including photographs if mares are not freeze-marked) and date of treatment.

Each applicator will submit a PZP Application Report and accompanying narrative and data sheets will be forwarded to the NPO (Reno, Nevada). A copy of the form and data sheets and any photos taken will be maintained at the field office.

4. A tracking system will be maintained by NPO detailing the quantity of PZP issued, the quantity used, disposition of any unused PZP, the number of treated mares by HMA, field office, and State along with the freeze-mark(s) applied by HMA and date.

Callie Hendrickson

Ms. Hendrickson thanked the Board members and expressed her appreciation for being able to address the Board. If she only had 30 seconds to speak, she would thank the Board for their September 2016 recommendation to sell and euthanize excess animals, which is the humane option that hopefully will be available in the future.

Horses are going to die. Our decision is to either (1) help them die in a humane fashion or (2) left on the rangeland to starve to death or die of thirst. The Board make the tough decision and were, unfortunately, were criticized by some, and the past Administration did not heed your recommendation. Mr. Hendrickson encouraged the Board to re-iterate their recommendation during this meeting.

The National Wild Horse and Burro Rangeland Management Coalition, which has over 10 million members and represents over 6,000 local governments, supports the Board's September 2016 recommendation. Mr. Hendrickson told the Board that if she were talked to a stranger on an airplane and provided the full concept and picture of the situation without becoming emotionally attached to the issue, they would understand and support the Board's recommendation.

Locally, the Board saw one of the best examples of proper HMA management where animal numbers are at AML and PZP and volunteers are being used. Ms. Hendrickson challenged the Board to go the Piceance-East Douglas HMA 50 miles to the northwest of Grand Junction, where there are over 800 animals where there should be 250.

Kat Wilder

Ms. Wilder is a representative of the Spring Creek Basin mustangs. She has an invoice from the Science and Conservation Center to BLM for 60 PZP dose, adjuvant, shipping, and handling totaling \$1,657, which equals \$27 per dose. Training at the Science and Conservation Center in Billings, Montana costs \$200. Mares darter in the Spring Creek Basin HMA since 2011 has cost \$3,186 (118 animals' times \$27 per dose) plus \$200 for training totals close to \$3,500 spent on fertility control since 2011. If the 118 mares had foaled and those foals were held in BLM's holding facilities, a single darter would have saved the U. S. government \$5,900,000. Including the cost of the gather and animals processing, the cost would have been closer to \$6 million saved.

In the Sand Wash Basin, in 2017, 135 mares have been darted by four volunteers (three women and one man). If 50 percent of those 135 mares had foaled and gone to holding, it would have cost the government \$3,000,375. Instead, the government saved \$3,000,375. Combined with the Spring Creek Basin HMA, there would have been a \$6,000,375 saved by five volunteers working in partnership with BLM. Other savings would include trauma to animals and humans. Lives have been saved. The rangeland has been saved. You get all this for less than \$35 a mare.

Janet Smith

Ms. Smith is from King George, Virginia. Ms. Smith expressed her appreciation for being able to address the Board. One thing that everyone can agree is that this is a complex issue.

There are some many years of mistrust that must be overcome. In order to achieve that, we must come together and be open to discussions between all parties to accomplish any kind of productive solutions. Ms. Smith hoped that the Board and BLM management team will take their comments as real recommendations going forward.

If Tuesday's tour showed us anything, it showed us that it can be done. Ms. Smith understands that all HMAs are different and that this was a special circumstance, but it is not the only HMA that is being managed. Without question, there are HMAs that are in trouble, but we can't punish the areas that are being managed because others are not. There are some HMAs that are being managed that remain over AML, but they're over AML because of limited budget to manage them. Just because we go for years without gathering because there is no budget and nowhere to put them doesn't mean that we can just start throwing away all of that money that has been spent to manage the HMAs.

She recognizes that funding only goes so far and that priorities must be set, but that may mean we need to look at the program's funding. We need to stop using "giant paintbrushes" to categorize the wild horse areas as starving and that all rangelands have been degraded. She understands that the rangeland is in trouble and it is a very difficult situation for all sides, but there is opportunity to sit down and discuss real solutions together – volunteers, local communities, etc.

Nicki Creasey

Ms. Creasey read from a prepared statement that is provided below.

Good afternoon members of the board.

My name is Nicki Creasey and I'm the proud operator of a Mustang Heritage Storefront for BURROS here along the front range of Colorado.

I'd like to briefly cover two areas of this very complex issue:

Through my storefront, initiated by April Lee and her Burro Incentive Program and now through the MHF Trainer Incentive Program, 28 burros were placed into excellent long-term homes this last fiscal year. Had the TIP program not exhausted funding in 2017 many more burros would have found adopters this summer.

I look forward with passion to continuing this adoption trend throughout fiscal year 2018.

I am here to ask the advisory board to place a high priority on encouraging the BLM to support the Trainer Incentive Program and other adoption initiatives to their ABSOLUTE FULLEST POTENTIAL. The reason that these programs are working and why the MHF ran out of funds after 6 months is because the nationwide network of trainers gentling these animals do it because they CARE. They look into the eyes of the horses and burros and know that their lives are worth fighting for. I watched live coverage of a politician waving a dismissive hand and saying, "no one wants these animals". That's not true and I

personally have adopters ready to stand up and say so. It just takes hard work, dedication and financial backing as provided by the MHF and BLM Co-Operative.

As for the wild ones on the range?

I believe that once the American people realize that our legislators are looking to kill our wild horses and burros in mass they will NOT let it happen. I hope we're not too late.

Instead I believe that through legislation all field offices should be forced to perform **effective and consistent** fertility control regimes across ALL HMA's using all strategies including spay and all the most proven contraceptives available. This needs to be backed up by data to determine its effectiveness. Birth control HAS to be our answer, but it may take a forced hand to actually make it work.

Thank you for your attention.

Ann Evans

Ms. Evans represents The Cloud Foundation and its over 700,000 followers.

Ms. Evans requested that BLM stop referring to wild horses and burro as “feral” in their publications and program information. Ms. Evans stated that the *Wild Free-Roaming Horses and Burros Act of 1971* designated wild horses as a wildlife species. Wild horses are a returned native species in the fact that if they hadn't evolved here, there wouldn't be horses anywhere.

Mr. Evans believes the real and most important issue that we face is protection of our public lands. Without those protections, we would not have any wild horses or wildlife. Our public lands are under attack and we'll need to ensure that we can protect them.

Secondly, Ms. Evan suggested the BLM embrace the science outlined in the National Academy of Sciences report. On the rangeland management can and does work, which was witnessed on yesterday's tour and in other areas. On the rangeland management does require a change of mindset and how we think about roundups and removals. Roundups and removals have not worked and are not economically sustainable and cause compensatory reproduction.

Public/private partnerships are possible and do work. She realized that such partnerships cannot be done overnight, but a long-term view is required to be successful.

Ms. Evans encouraged BLM to spend more of its budget on PZP and volunteer programs that work in cooperation with BLM. Ms. Evans also asked BLM to consider repatriation of horses that are in short-term holding to the desert outlands that were their lands when the Act was passed, which will also reduce costs and allow horses to live their life in freedom.

Kevin Bunnell

Mr. Bunnell, representing the Utah Division of Wildlife Resources (UDWR), thanked the Board for their service. Dr. Hall's presentation will tell the Board everything that they should know as to why a State wildlife management agency would be concerned with this issue.

UDWR has big concerns of the impacts that wild horses are having on rangelands and, subsequently, on wildlife populations ranging from deer and elk populations down to endemic snail populations that occur only in some springs in the Great Basin.

Mr. Bunnell understands the Board has a tough job ahead of itself and doesn't know if there are any easy answers other than the horse population needs to be reduced, which brings up many different issues before decisions can be made. That is the reality of where we are. Wild horses are as polarizing an issue as wolves. He doesn't envy the Board for the decisions that it must make.

There are impacts not only on the wildlife life populations that exist today, but also having the ability to have wildlife populations on some of these rangelands in the future. Mr. Bunnell is hoping logical decisions can be made looking at the science and not based on antidotal observations.

Randy Parker

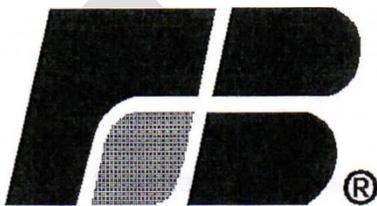
Mr. Parker, representing the Utah Farm Bureau Federation representing over 32,000-member families, thanked the Board for the opportunity to address them.

Livestock production is the backbone of Utah agriculture. Livestock grazing on public lands is critical to the economic well-being of rural communities. FLPMA requires consideration of the history, cultural, and economics of livestock grazing as decisions are made.

Utahan agricultural generates \$21 million in economic activity and over 80,000 jobs with Utah. Sheep and cattle ranching families with nearly 67 percent of the state owned and management by the federal government are compelled to combine private property, privately held water rights, and access to grazing on federal lands to establish economically viable and sustainable businesses. Since the 1950s, livestock animal unit months (AUM) in Utah have been cut from 5.5 million AUMs to 1.8 million AUMs, which is a 68 percent reduction. We need to stop redefining multiple-use by reducing and eliminating livestock grazing to accommodate excess wild horses and burros.

The reality that most of the wild horses and burro are feral makes a compelling argument that management should be returned to the states. At a time when the federal government is \$21 trillion in debt it doesn't make any sense to continue growing wild horse and burro numbers. This morning Mr. Bolstad noted that wild horses and burros used 800,000 AUMs, which means about 500,000 AUMs are being used by excess horses and burros. How is that affecting ranchers grazing rights? Voluntary and mandatory grazing cuts – we as an organization supports using all of the tools to get to AML, including euthanasia. Let's get to AML and then evaluate where we are at. Until we get to AML, we have no impact what the impact is and what we can do with livestock grazing.

The Utah Farm Bureau Federation also submitted the following letter.



UTAH FARM BUREAU FEDERATION 9865 SOUTH STATE STREET

SANDY, UTAH 84070

TELEPHONE: 801-233-3040

BUREAU OF LAND MANAGEMENT
"WILD HORSE & BURRO ADVISORY BOARD"

COMMENTS OF THE UTAH FARM BUREAU FEDERATION

October 5, 2017

The Utah Farm Bureau Federation is the largest farm and ranch organization in the state representing more than 32,000-member families from every county. We represent a significant number of livestock producers who use the federal lands for livestock grazing. During our November 2016 annual state convention, our delegates reaffirmed Farm Bureau's long-standing commitment to multiple-use management of the public lands including the Taylor Grazing Act's mandate that historic grazing rights be safeguarded. That includes the BLM managing the public domain for a "chiefly valuable for grazing" of livestock as provided by Congress.

THE ECONOMICS

Utah Agriculture & Livestock Sectors:

Utah agriculture is livestock based. Utah's 45 million acres of grazing rangelands are heavily dominated by government ownership with only 8 million privately held. For Utah's livestock industry to thrive and continue making major contributions to Utah's economy and especially rural communities, management of the "common lands" must focus greater attention on historic cattle and sheep production in this area. The Federal Lands Policy Management Act requires agencies to take into consideration the history, cultural and economic impacts of their decisions!

Livestock production is the backbone of Utah's agriculture industry, contributing more than 70 percent of our state's \$2.1 billion in farm gate sales. This contribution and its economic ripple effect are significant in rural Utah. Rural communities in Utah and across the public lands states of the American West continue to have economic struggles. Multiple-use of the public lands is critical to the economic well-being of rural Utah. A mix of private and public lands for generations has created new wealth through livestock harvesting annually renewable forage driving our rural economies. In addition, livestock grazing of the public lands provides meat protein that is a benefit to all Americans, not just those physically and financially able to visit the public lands states.

Utah Farm Bureau continues our long-standing policy supporting livestock grazing as an integral part of multiple-use and the management of the public domain. Legitimate, locally based ranching interests are critical to our western rural communities. From a macro economic standpoint, it is important to recognize agriculture and related industries are the catalyst for more than 80,000 Utah jobs. And according to Utah State University researchers, Utah's food and agriculture sectors generate more than \$21 billion in economic activity and are the catalyst for 15.1 percent of Utah's Gross State Product.

From a micro economic standpoint, it is important to recognize the impact of displacing even one single average sized cattle or sheep operation. Consider the following:

Utah is a cow-calf cattle production state with cattle and calves contributing more than 38 percent of the state's farm gate sales. An average cow-calf operation with 500 mother cows creates a direct impact on the local economy of \$400,000 based only on current beef prices and feeder calf sales. Using a conservative multiplier of just two, a single average sized cow-calf operation contributes over \$800,000 in economic activity while putting scores of Utahns to work.

An average sheep operation with 2,000 ewes would create a direct impact on our rural economies of nearly \$ 450,000 in farm gate sales. This figure is based on one hundred percent lamb crop, 135-pound market lambs and current lamb prices. Using the same multiplier, an average Utah sheep operation will contribute around \$900,000 to the local economy and generate scores of rural jobs.

Sheep and cattle ranching families, recognizing 67 percent of Utah is federally managed public lands, are compelled to combine private property, privately held water rights with access to grazing on federal lands to establish economically viable and sustainable businesses.

Overstocking of wild horses and burros impacts vegetation, soils and watersheds creates uncertainty for Utah ranching families that have been exercising their multiple use rights on the common lands since our pioneer settlement. Wild horses and burros are especially hard on forage resources, the rangelands, water sources — and in fact, the entire associated ecosystem. As federal land managers deal with deteriorating range conditions and limited measures to control burgeoning horse and burro numbers, western ranching families and their livestock grazing rights are in jeopardy and ultimately become the targets of the federal land managers trying to address and balance resource needs.

Western Heritage: The public domain of the American West has been used historically by ranchers, farmers, rural communities to meet basic needs like food, fiber and water. More recently, hunters, fisherman, campers and other recreation enthusiast interests have established a growing claim to the public domain. The historic balance between ranchers, sportsmen, recreationists and rural communities is being challenged by out-of-control horse and burro populations. The detrimental ecological impacts are being felt by historic ranching families, the rural communities they support as well as wildlife populations and outdoor recreation opportunities.

Western Reality: More than 90 percent of the public lands managed by federal land management agencies are located in the Western United States. Many communities, for generations, have relied on these lands for economic underpinning and as well as meeting their water needs. Ranchers, grazing livestock on the public domain, offers important economic stability to rural communities coupled with payment of grazing fees, providing targeted grazing to control invasive species, reducing fuel for wildfires, supporting healthy ecosystems with investment in rangeland improvements through programs like Utah's Grazing Improvement

Program (GIP) and water development across the landscape good for livestock and wildlife.

THE LEGAL OBLIGATION

Utah Farm Bureau commends the Bureau of Land Management and U.S. Forest Service for their historic recognition of the social and economic contributions livestock ranching makes in the public lands states of the American West. Through prudent application of multiple-use principles, including maintaining wild horse and burro populations within Resource Management Plan (RMP) guidelines, renewable and abundant resources can be wisely used while protecting the rangeland resource.

Taylor Grazing Act: The Taylor Grazing Act of 1934 (TGA) as passed by Congress, not only protects the stability of the ecosystems, it protects the historic rights of Utah ranchers. This fundamental principle of the TGA ultimately is the foundation for economic stability for many of Utah's rural communities.

Multiple Use Sustained Yield Act: The 1960 Multiple Use Sustained Yield Act (MUSY) mandates that federal lands be managed for a variety of purposes that benefit American citizens. Those includes livestock grazing, wildlife management, timber harvest, water and recreation. MUSY also requires management of wild horse and burro populations. When uses compete against each other on the western public lands, particularly during drought, the federal land management agencies must make difficult decisions based on best management practices in accordance with the law. When wild horses and burros compete with legally permitted livestock for limited forage, balancing the ecosystem cannot come singularly through continued reductions in livestock numbers and cuts in grazing Animal Unit Months (AUMs).

Wild Free-Roaming Horse & Burro Act: The Wild-Free Roaming Horse & Burro Act of 1971 was established to protect wild horses and burros on federal lands, placing their management with the BLM and Forest Service. The Act made it a crime to harass or kill the animals on federal land. It permitted land to be set aside for herd management areas. It requires that herd management plans "maintain a thriving

natural ecological balance among wild horses, burros, wildlife, livestock, and vegetation and to protect the range from deterioration associated with over population." The Act defined "excess animals" and determined that they should be removed to maintain ecosystem balance and recognize the multiple use obligation and provides the Secretary with mechanisms for their removal.

Many argue that if the Act was being enforced as Congress intended upon its passage, we would not be in the mess we are today!

After enactment of the Wild Free-Roaming Horses and Burros Act in 1971, agency managers found that wild horses and burros multiplied more rapidly than anticipated. The Public Rangeland Improvement Act (PRIA) in 1978 directed the Secretary of the Interior to manage wild horses and burros by determining Appropriate Management Levels (AML) for each herd area, and to manage rangelands and herd sizes to meet AML.

Looking back 57 years to passage of the Act, it is important to note that provisions related to management of the animals and protecting the ecosystem were even embraced by "Wild Horse Annie" and the other proponents.

First and foremost, the Act mandates the Secretaries of Interior and Agriculture to keep wild horse and burro populations at AML and immediately remove excess animals from the range. That Congressional mandate was designed to achieve and maintain a "thriving natural ecological balance" on the public domain. The Act requires the Secretaries to determine AML in each of the horse management areas (HMAs), inventory those horses and burros to determine where there are excess animals and ultimately adopt out, sell, destroy or manage populations by sterilization or other natural controls. The Act authorizes old, sick or lame animals to be "destroyed in the most humane manner possible." In addition, the Act calls for removal of excess animals to private maintenance facilities with an adoption provision. If animals are not adopted by qualified individuals, the Act then allows for them to be "destroyed in the most humane and cost-efficient manner possible."

Congressional intervention over the years into the well thought out provisions of the Act coupled with horse advocate lawsuits, manipulation of the legal system and activist judges have all contributed to today's expanding crisis. Appropriations riders prohibiting disposal and other important population control measures contained in the Act coupled with misuse of the National Environmental Protection Act (NEPA) creating roadblocks - including critical gathers - have led to horse numbers nearly three-times AML. This reality has caused conflicts with livestock grazing rights, healthy wildlife populations and degradation of the public domain that in some cases will take decades, if ever, to heal.

Farm Bureau is disappointed that the Forest Service and BLM have been less than effective in their population management obligations under both the Wild Horse and Burro Act and PRIA, as well meeting their own guidelines as established in the RMP processes. Science tells us the wild horse populations can double every 4-5 years requiring the federal agency to be diligent and aggressive in keeping horse and burro numbers at AML as prescribed by law.

During meetings with grazing permittees, cattle and sheep producers have expressed concerns that drought and growing wild horse numbers have ultimately led to ranching families being asked to "voluntarily" reduce AUMs or even compelled to make cuts. Federal agencies must recognize in their decisions and actions, there are adverse impacts on generations old ranching families, who have been the economic engines for many rural county economies for decades. The forage allocated to them in these established grazing districts has been deemed "chiefly valuable for [livestock] grazing" under the Taylor Grazing Act. The forage is being illegally taken by wild horses and burros that are beyond AML management levels. In addition, these horses are moving onto livestock grazing allotments where horses and burros are excluded in the Forest Service and BLM RMPs.

The reality is - horses and burros are not only moving illegally off from HMAs onto areas dedicated to sheep and cattle, but far more egregious, they are moving onto private lands. Out of control horse and burro populations are adversely impacting private property rights, stealing privately grown forage as well as privately held water rights. According to Wyoming attorney Karen Budd-Falen, a very troubling reality of excess wild horses and burros moving off HMAs and onto private lands - ranchers are in violation of federal law if they try to remove them.

Under Utah Water Law, livestock are defined as a beneficial user of the state's sovereign waters. Wild horses and burros, even on the federal lands, are not defined as beneficial users and are in violation of state water law.

OBSERVATION: If management of the wild horses and burros remains with federal government, Utah Farm Bureau believes that the BLM and Forest Service would be better served managing based on the original intent of the Wild Free-Roam Horse and Burro Act of 1971.

THE ANIMALS

Wild horses and burros are extremely overpopulated on our nation's western public rangelands. There currently are more than 73,000 horses and burros on rangelands where science and ecosystem evaluations has determined only 27,000 could be supported. The excess animals, approaching 50,000 on-range, are obviously competing with and adversely impacting grazing rights on public lands as well as private rangelands. The result of this overpopulation is that wild horse and burros are dying or at risk of dying painful deaths from starvation and dehydration. Hot, dry summers on the western public lands, like experienced this past summer, coupled with growing populations ramps up the competition for forage and limited water supplies. Increasing numbers of horses and burros have caused considerable environmental degradation, lower quality feed and damaged water infrastructure. This growing ecosystem reality underscores the agonizing death many of these animals are suffering from starvation and dehydration.

Rangeland Ecosystem: Overpopulated wild horse and burro numbers across the western landscape are, without debate, damaging the rangeland resources. In many cases it will take generations to come back. In some cases, they may be beyond repair. The horses and burros on the public domain currently exceeds ecosystem tolerance and resource balance. Without effective management based on sound, science-based recommendations of the Wild Horse and Burro Advisory Committee and on-the-ground action by the agencies, the burgeoning population will continue to grow out of control and cause growing rangeland degradation. The fact that nearly half of the HMAs have more than double their carrying capacity leads to overgrazing underscores management problems. Prolonged overgrazing adversely impacts vegetation, compacts soil structure, stomps out naturally occurring springs livestock and other wildlife rely on, and causes damage to riparian areas on western streams. The overgrazing and removal of native vegetation leaves a growing number of western rangelands vulnerable to invasive species like cheatgrass, knapweed and thistles.

The out of AML horse and burro populations adversely impacting native vegetation creates internal policy conflicts for both the Forest Service and BLM where HMAs overlap with Greater Sage Grouse or other identified species with designated habitat needs.

Federal land management agencies together manage livestock in an effort to provide positive ecosystem results including noxious weed control and reduced wildfire threat. The management of livestock recognizes the need to balance the ecosystem. Wild horses and burros occupy much the same space year around. Growing numbers of animals that remain in the same general area for prolonged periods leads to "trailing" or compaction, limited water filtration with increased runoff, lessened nutrient cycling, and increases the potential for desertification.

Native Wildlife: Besides adversely impacting the historic grazing rights of western ranchers, out of AML horse and burro populations are dominating an ecosystem shared with state managed wildlife species. Elk, deer, pronghorn, bighorn sheep, sage grouse, reptiles and other mammals all occupy and rely on western public rangelands to survive. Their wellbeing is threatened by excess horse and burro populations. Growing competition for scarce forage and water resources is creating conflict between federal management objectives and state wildlife management objectives.

Disease Vector: Concerns that over population of wild horses and burros on the public domain adversely impacting the ecosystem, wildlife and domestic livestock, potentially creating development of and a vector human transmission, needs immediate attention. Dr. J.J. Goicoechea, Nevada State Veterinarian, is involved with the "One Health Initiative" where multiple disciplines are working together for local, national and international optimal health for people, animals and the environment. As a veterinarian, he has expressed concerns that a healthy environment is critical to healthy interactions between animals and humans. He points out that disease is directly related to stress in animals and immune function. Healthy landscapes, healthy animals and healthy public are all interlinked. He stressed that 75% of emerging human pathogens have been zoonotic in origin. Linking domestic animals and wildlife to such human diseases as Avian Influenza, Swine Flu, West Nile Virus, Zika Virus, Hantavirus and Lime Disease should be a call to action on overpopulation of wild horses and burros and ecosystem stress. Unhealthy wildlife, horses and burros stressed by unhealthy ecosystems will over time provide a likely vector for development of new animal disease coupled with potential for human transmission.

OBSERVATION: Utah Farm Bureau policy recommends that the management of wild horses and burros should be transferred to the states. The states have the right and responsibility to manage wildlife, currently excluding horses and burros. That responsibility requires diligence in keeping numbers in balance with impacts to the ecosystem. Wild horses and burros have ongoing and often dramatic interactions with native wildlife. Often that interaction detrimental to the states managed native wildlife. Horses are dominate grazers impacting not only the rangelands, but the associated water supplies. As the dominate species, they will keep lesser species from drinking at water sources, including water developed for livestock. Research has shown this impact on wildlife even impacts local bird species as horses dominate water sources.

THE GROWING COSTS

Of course, the elephant in the room is the American taxpayer. It total costs to the taxpayer for rounding up and maintaining wild horses and burros has risen from \$38 million in 2007 to \$71.8 million in 2013. Obviously there are those who have no problem with committing the federal government and American taxpayer to an open-ended checkbook. With more than 47,000 horses currently in off-range holding facilities, including Delta, Utah, that number is escalating. Captive, off-range wild horses live an average of 20-25 years, requiring an ever increasing commitment from the American taxpayer, now estimated to be in excess of \$1 billion just for the animals today in holding facilities. Can anyone really argue in these difficult budget times with a \$20 trillion national debt and with growing social needs, this is the most valuable use of taxpayer dollars? These horses and burros obviously are not endangered species. The argument that protection of historic Spanish blood, made when the Act was passed, as a public priority seems less than compelling when one realizes the vast majority today of these animals are non-native, feral horses!

Adoption has been touted as a viable option. The BLM is doing all it can to move horses to adoption but ownership obligations and cost of feeding and caring for adopted animals has brought demand crashing down. Last year only about 3,500 horses were adopted which doesn't make much of a dent in off-range holding or anticipated on-range growth pegged at 14,000 to 15,000 annually. Is the prospect of wild horses, and/or burros, being held captive and living out their lives in barbed-wire pastures or piped holding corrals really the humane answer?

THE POLITICS

The disinformation of the wild horse and burro advocates does a disservice to the Americans who care about the animals and a healthy ecosystem. Protesters, with pictures of "beautiful, healthy, well-fed, majestic horses with manes flowing" continue to lie to the general public like they did at the recent National Wild Horse & Burro Summit in Salt Lake City, Utah calling it a "slaughter summit." A Salt Lake Tribune editorial claimed the Summit was about a "slaughter agenda" planning out the "extinction of wild horses to placate cattle and sheep ranchers." Priscella Feral, President of Friends of Animals, railed on anyone interested in "manipulating the western public lands, rounding up, drugging for fertility control or placing horses in holding facilities in the first place!" This divisive "story-telling", lacking in science, does a disservice to those genuinely interested in finding a solution. They offer nothing to a constructive dialog.

THE REALITY

The experience of Stacy Davies, owner of Beattie Butte Oregon Roaring Springs Ranch and BLM management of wild horses is instructive. The ranch has a long history of active ecosystem management and proactively addressing wildlife needs including the needs of the Greater Sage Grouse. Davies noted that more than 600,000 acres in three BLM HMAs is included in his livestock grazing allotments. There are more than 1,200 horses where AML is between 300 and 600. The effects of horses on the ecosystem required BLM to cut the Roaring Springs Ranch by more than 21,000 livestock grazing AUMs. That reduction in mother cows and calves has reduced ranch cattle sales by more than 1,500 feeders and lost revenue estimated to exceed \$1.5 million per year. Davies pointed out at least half of his cattle sales proceeds are invested back into the land — good for wildlife, sage grouse and fisheries.

This economically devastating scenario is repeated time and time again across the western public lands states.

THE RECOMMENDATIONS

STATE MANAGEMENT AND CONTROL: The reality that most, if not all, of the "wild free-roaming horses and burros are feral, makes a compelling argument that management should be returned to the states. The states have regulatory responsibility for wildlife species within their individual borders, unless a species is declared threatened or endangered. Obviously, both horses and burros on federal lands are not species of concern. In addition, the states are uniquely qualified to deal with horse and burro impacts on private property rights — land and water — the federal agencies tend to ignore.

If regulatory jurisdiction remains at the federal level with BLM and Forest Service:

REMOVE THE BARRIERS: Return to the original intent and provisions of the Wild Free-Roaming Horse and Burro Act.

FERAL HORSE AND BURROS: Eliminate feral horses and burros from HMAs to address healthy ecosystems and sustain healthy wild horse and burro populations as provided in the Wild Free-Roaming Horse and Burro Act.

POPULATION CONTROL: Adoption and birth control are socially acceptable, but lacking in overall success in controlling populations. Return a pool of population control measures, recognizing most of the animals are feral, that can make a difference in ecosystem health including: Euthanasia, slaughter for pet food and zoos, out-of-country sales recognizing horse meat protein is accepted in global markets,

castrating males and sterilizing females achieving long term birth control as with cats and dogs, as examples.

PRIORITIZE RANGELAND HEALTH: Healthy rangelands are necessary to allow compliance with the multiple use mandate of Congress. Healthy ecosystems are critical to continued livestock grazing and support of local rural economies, for native wildlife to survive, for sustained water supplies of quality water all important to enjoying the outdoors and western lifestyle.

AML AND POPULATIONS: Recognize that the wild horse and burro population is out of compliance with the AML across much of the West. Drought is making it critical and prudent that the agency take aggressive action to minimize detrimental impacts on the ecosystem and provide some certainty to family ranchers. More than 70 percent of livestock grazing AUMs (from 5.6 million AUMs in 1950 down to 2.0 million in 2012). In Utah, 3.5-plus AUMs have been cut or suspended since the 1950s creating considerable uncertainty. The accommodation of wild horses and burros in excess of AML and cuts in livestock grazing AUMs is dramatically redefining the multiple use mandate, ultimately hurting families and rural communities.

COMPLYING WITH UTAH STATE LAW: Utah law (State Land Use Management Plans - I-JCA 63-38d-401 Requires where AUMs are reduced by land management agencies due to rangeland health concerns, state managed wildlife populations are to be reduced, as well as wild horse and burro populations. Those livestock AUMs previously placed in suspended use by the Forest Service or BLM are first to be restored to livestock when grazing conditions improve by state law, and not converted to wildlife use — nor wild horses and burros.

Under the Utah Public Rangelands Improvement Act, Utah Statute 63-38d-401, it is the legal obligation of the Bureau of Land Management and Forest Service to immediately remove all horses that are in excess of the AML to minimize or eliminate adverse impacts to ranchers with historic livestock grazing rights and the state's sovereign waters.

CONCLUSION:

The Wild Horse and Burro Program is plagued by a growing feral horse problem, increasing costs and adverse ecological impacts. BLM, as well as the Forest Service, must address the core issue of over-population that is devastating broad ecosystems across the American West and encroaching on livestock grazing rights. These rights associated with these lands that are held in common as well as private property rights — both land and water— are being infringed on as horse and burro populations continue to violate federal and state laws. The reality is — this neglect by federal land managers is hurting generations old family ranching businesses and placing them at economic risk.

The big picture issues we are facing like adequate forage and competition for water resources, adverse environmental impacts, out of control horse and burro populations, burgeoning costs and failure of the adoption and birth control programs require immediate attention. The BLM, along with state and local interests, must work together and coordinate efforts and resources on the growing feral horse and burro problem. We need to make sure management tools like on-range gathers are effective. In addition, we must recognize it will take an entire toolbox of management options and a coordinated effort to address rangeland health, multiple uses mandates, wildlife, recreation and the adverse impacts of growing numbers of feral horses and burros on the Western landscape.

For questions or more information, contact:

Randy N. Parker, VP
National Government Affairs
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Kayah Swanson

Ms. Swanson, representing The Cloud Foundation's Director, thanked the Board for the opportunity to come before the Board. Having come from an urban background, Ms. Swanson approached her first herd of wild horses, which made her heart swell. She is glad to see that sprawling roadways and strip malls have not yet overtaken the natural environment and the beautiful family structure of these peaceful and untamed animals. Ms. Swanson drew two colorful conclusions from that experience. First, she was fortunate to have witnessed the partnership between BLM and the *Friends of the Mustangs* in action. What an overwhelming victory to see these two bodies working in harmony to benefit our wild horses and, on a larger scale, our public lands.

The second conclusion amounts to a word of warning – it is foolish to waste our tools to preserve this wild and beautiful way of life. While fertility control is touted as the best option for controlling the population, so little of the budget is allocated toward that effort that the line item on the pie chart displayed earlier in the day was zero percent.

This Board has an immediate opportunity at a time when the very concept of public lands is under attack. You hold the power to protect these lands and animals on them. Please invest in the contraception program and partnerships like the one observed during the Board's field tour yesterday. Please help prevent the needless killing of wild horses and burros in the name of opening these untamed lands to cattle, oil, and other exploitive interests. This land can offer more than just beef and petroleum.

The Cloud Foundation is opposed to any killing or so-called euthanasia in short-term or long-term holding or on the range. Furthermore, through prioritizing the fertility control programs with both funding and manpower, we can maintain the American west as wild and free and avoid roundups.

Peggy Coleman Taylor

Ms. Taylor indicated that she was happy to hear Christine to put a pause by your recommendation so that everyone could share what we have to say. With that being said, she read what she wrote.

The Wild Free-Roaming Horses and Burros Act of 1971 with the BLM and the stewards of the American people's western icons. Yet the mantra I hear today is that the special interest groups controlling the BLM and stealing propaganda to justify not only the removal of the wild horses off the public lands designated for them but to change policy to destroy them as well.

Apparent influence of the livestock and oil/mining industries seems to be excluded from all these discussions is their impact on the public lands and costs to the taxpayers. We know the truth – this dialogue has to change. First ranchers demand the killing of wolves, coyotes, and now the wild horses. The massive killings of bears and mountain lions now chose to being responsible for the decline of deer, elk, and sage-grouse even when the environmental assessments have proven road, oil, and gas development are responsible for the diminish of big game populations and wildlife.

This dialogue has to change. In conversations with the Western Watersheds Project, it was expressed their interest in reducing livestock grazing from public land and, as such, acknowledge the wild horses are unjustly being blamed for everything. Even blamed for a 50 percent decline in bird populations – so why not blame the horses for extinction of species of bees as well? Did you know that bees have the lowest protein? Whereas, oysters have 13 to 14 percent and beef is 3 to 4 percent, followed by fish, turkey, and chicken. So as far as utilizing our resources to provide food sources, beef is at the bottom of the list. This dialogue has to change.

There is similar dialogue in Africa in blaming elephants for the destruction of ranges. By the recommendation of a government official, 40,000 elephants were killed. The government official regrets this today because the elephants were proven that they've helped the range and ranges got worse.

Bonnie Brown

Ms. Brown is the Executive Director of the Colorado Wool Growers Association and also represents the American Sheep Industry Association. She indicated that BLM had received written statements and that she would like to follow-up with some additional comments.

Ms. Brown indicated that the associations are asking the Board to reaffirm their September 2016 recommendations to utilize unrestricted sales and euthanasia to get populations back to AML. *Friends of the Mustangs* have done an absolutely beautiful job on what they are doing in the Little Book Cliffs Horse Range and they absolutely deserve the recognition that they're receiving.

However, we cannot adopt fertility control where we have situation where, next year, we will have over 100,000 excess wild horses on the range. Partnerships and collaboration are fantastic, but today they have failed to effectively address the overall problem of excess wild horses. In many places, our rangelands cannot withstand another 15 to 20 years of overgrazing before we can see an impact from fertility control. The Board knows the numbers – we have too many horses in holding, too many on the range, and a program that costs too much.

As has already been pointed out, horses are going to die. That's unfortunate reality. They are going to die on the range, holding, and need options to die humanely because our rangeland cannot withstand additional degradation that we continue to observe.

In many areas, BLM has failed miserably in its spending to maintain a thriving ecological balance. Ms. Brown strongly urged the Board recommend the BLM use all humane means to get wild horse populations back to AML and save our western rangelands for future generations.

Steve Raftopoulos

Mr. Raftopoulos is one of the livestock permittees in the Sand Wash Basin HMA. Mr. Raftopoulos thanked the Board for the work that they do and would like to see the Board reaffirm the September 2016 recommendations made in Elko, Nevada, which he believes is the only way to get a start to be able to put the programs in place. It is important to start at the right number of horses to maintain the habitat. Today in Sand Wash, the horse population is two to three times above the AML. The Sand Wash Basin looks worse than he has seen in the last 10 to 20 years.

One thing that Mr. Raftopoulos would like to mention to Mr. Shoop is that he forgot to mention other partners in the whole scheme of things, which are the livestock permittees. The permittee needs to be brought in to focus and be part of the discussions. When the Sand Wash Basin allotment management plans were completed in 2000, the permittees allowed the use of water that is adjudicated to them in the Sand Wash Basin. The permittees build and maintain the water that all animals use. And, the permittees voluntarily took reductions in their AUMs and use in the Sand Wash Basin for the resource.

We can't forget that habitat is the most critical heart of the whole discussion. Without habitat, you can have 800 horses, but they will not survive. You need to get the habitat in place and then talk about management. That is very key. The four permittees in the Sand Wash Basin have taken voluntary nonuse and that less than 20 percent of the allocated livestock are used by the permittees because of the lack of forage.

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Lew Owen

Mr. Owen representing the Colorado Department of Agricultural reiterated some concern regarding the significant and long-term ecological impacts of horse population in excess of the carrying capacity of native rangelands.

There was discussion earlier concerning allotment-level impacts in the form of reduced AUMs available to livestock permitted to graze in the areas along with the wild horses. These impacts are significant. As an example, from the earlier mentioned Sand Wash Basin HMA, BLM data from the 2016 Environmental Assessment indicated actual use AUMs by livestock was 16,000 lower than authorized use in 2012 and 2013. These AUMs have significant value to ranchers and the rural communities. Applying an annual value of production estimate per unit of \$100 (five units are an animal unit equivalent at 12-month animal production cycle), an annual value of production per AUM is estimated at about \$80 per AUM. Applying this to the 16,000 AUMs comes to approximately \$1.2 million of annual value of production that is achievable given that amount of forage. Ranchers take voluntary nonuse to protect ecological condition, which comes at a large cost not only to the rancher but to the businesses that make up the economies of the surrounding rural communities.

Mr. Owen appreciates the recommendations that have been made by the Board and urged the Board to continue their efforts to ensure the federal agencies have all the tools authorized by the *Wild Free-Roaming Horses and Burros Act of 1971* to maintain healthy wild horse and burro populations in the context of other multiple uses on healthy native rangelands.

Maggie Cason

Ms. Cason indicated that she dearly loves the 14 mustangs that she has at home. Ms. Cason would like to see more requests for the volunteers who dart mares with PZP. She personally hasn't seen a request and would like to see everything flooded with requests.

In addition, Ms. Cason supports the Trainers Inceptive Program (TIP), of which she is a part. TIP has been very successful in placing mustangs.

Ms. Cason would also like to see more eco-sanctuaries; rather than making a blank statement of euthanizing the horses. Why not find a place for them to eat? Ms. Cason indicated that they volunteered their ranch as a place horses from the West Douglas roundup, but were told no. Ms. Cason went to the roundup and found the land the animals were gathered from looked exactly like the land on their ranch. The animals could have been placed in an area where they could have felt wild and free, but she was told no. They would have to wait until a request for solicitation issued.

She would like to see more positive ways of solving the problem other than the blank statement of euthanizing the horses.

Lon Ball

Mr. Ball indicated that he is an organic farmer, cattlemen, and ecologist from Trout Lake, Washington, where there are no HMAs. Mr. Ball indicated that he was the "young buck" from Rancho Kahasan (Russia) who irritated Mr. Bolstad and Ms. Kathrens last year with Rancho Kahasan's Horse Heaven option to adopt all captive horses.

His comments are confined to addressing confined horses, but the "elephant" or mustang in the room is the slaughter, glue-factory option. Rancho Kahasan offers an alternative option. Russia needs and wants BLM surplus horses. We appeal to BLM to give serious consideration to make a new theoretical HMA in the world's largest country. Ranch Kahasan also has the audacity to ask in violation of Section 1333 of the *Wild Free-Roaming Horses and Burros Act of 1971*, that BLM pay for the overseas delivery cost.

The playing field has changed since his first project proposal to BLM and the Advisory Board. With the new opportunities pointed out by Mr. Bolstad this morning, there are three-year

The two-minute warning was received, and Mr. Ball stopped his comment.

Ms. Melinda Kersten

Ms. Kersten represents the Black Hills Wild Horse Sanctuary (Sanctuary) in South Dakota, which, in their 30th year, has almost 14,000 acres for 700 horses most of whom were on public lands at one time.

The Sanctuary is continuously aware of the land conditions and the health of the animals. As a non-profit, the Sanctuary rely sole on donations and tourism income to support the needs of the horses and, subsequently, all wildlife that call the Sanctuary home.

This is Ms. Kersten's fourth Board meeting and it is frustrating to realize that the same issues are on the table every time. Too many horses, degraded rangelands, physical turmoil, which is always blamed on the horses. When do we humans take responsibility for the mess we've created? When do we start asking what is best for the horses? Perhaps, instead of removing them from the land and asking for more funds to warehouse or destroy, we focus on PZP and ask for more land. Expand their HMAs, move them into areas where they were once found in 1971. The protection act has been amended before, amend it now to give them more space.

It's not the horses that are diminishing the quality of our public lands, it's us humans. We want it for our cattle, our land development, our energy needs. Yes, its public land and if you ask the public how they would like to see it, I pretty sure they would prefer horses and other wildlife given priority. At least that is what the 10,000 annual visitors to the Sanctuary say when they explain why their wild horses came off public lands to begin with.

In the words of Dayton Hyde, founder of the Sanctuary, "granted I would like to see a return to the conditions of my youth, a half-century ago, when wild horses were truly free, when nature selected what would survive and what would perish. When mares had a surplus of stallions from which to choose their mates. When predators kept the herds from destroying their range, and when wild horses were quality animals prized by ranchers and other horsemen concerned with their welfare."

Charlotte Roe

Ms. Roe, representing In Defense of Animals, indicated that she is privileged to be a guardian of wild horses and burros that she has adopted. If they were here, they would be very confused because burros are an endangered species worldwide and horses do not speak out of both sides of their mouth. We've heard that the *Wild Free-Roaming Horses and Burros Act of 1971*, which states that wild equids are an integral part of the national system and are an essential component of the thriving natural ecological balance, but the BLM's policies and words act as though they're something else – invasive (not integral), feral (like feral pigs), they harm the range, they starve and overpopulate – a biological impossibility. It's almost as though they don't know how to live on the land, but they do.

I've heard a lot about habitat here. In the beginning of the 1900s, there were millions of wild horses, the Great Plains were a "sea of grass", and we had all the wildlife. She does agree with those who have said that it's man's problem.

She noted that from an overpopulation standpoint, the BLM national target AML is close to the guesstimate made when the *Wild Free-Roaming Horses and Burros Act of 1971* was passed, which was considered so dangerously low that there was a national emergency. The Act was unanimously passed in time by Richard Nixon.

Ms. Roe and her wild horses and burros must ask, why are we trying to implement a failed policy and make it even worse. It is unsustainable and will launch the West into deeper conflict, litigation, and a cycle of roundups that only spike populations in what's call compensatory reproduction

The two-minute warning was received, and Ms. Roe stopped her comment.

Ms. Roe also provided written comments that are presented below:

Comments by Charlotte Roe to BLM Wild Horse & Burro Advisory Board

Grand Junction, Colorado October 18, 2017

A BLM T-shirt I wear commemorating my first mustang adoption calls wild horses "uniquely American." The label celebrates wild horses as a uniquely native, uniquely valuable species. But the Agency's actions and policies tell another story.

The BLM's website erroneously labels them non-native, when today the scientific consensus considers wild horses to be a returned native species. The Wild Free-Roaming Horse and Burros Act lauds wild equids as "an integral part of the natural system of the public lands" and essential to achieve a "thriving natural ecological balance," while federal land managers act as though their lives have little value. This is not OK. The living deserve our respect and understanding.

The BLM justifies spending lavish taxpayer monies to harass and remove wild horses and burros from their rightful lands by saying they overpopulate, starve and hurt the "thriving natural ecological balance" on the range. These are unsubstantiated and absurdly contradictory allegations. The Agency knows that culling herds by helicopter causes populations to increase, yet it relentlessly proceeds to imprison wild horses and burros. The Checkerboard roundup is ratcheting up captive numbers by not counting foals, even though the BLM's population "census" counts them. This is not OK.

Are wild horses and burros responsible for rangeland degradation? Let's be real. The BLM has never accounted for the impacts of livestock grazing, which by the early 1900s had depleted nearly 700 million acres west of the Mississippi and continues to destroy fragile habitat to this day. It scapegoats wild equines to cover up the continuing degradation and over-exploitation of public lands. Not once has the BLM acknowledged the beneficial contribution of wild horses and burros to the environment. They graze on fire-prone vegetation and underbrush that is inaccessible to cows and sheep. They break ice and dig water holes, increasing access to scarce resources for other wildlife species. They restore balance. Can they overgraze? Any species including elk and deer can over stress forage resources. But wild equines have a far lighter footprint than do ruminants; unlike cows and sheep, they roam, spread seeds and do not congregate around watersheds. And reducing wild horse numbers, as the BLM proposes to do on the Silver King herd in Nevada, to one horse per 10,000 acres tells us the real backstory is about managed extinction, not rangeland protection.

Do mustangs and burros overpopulate western rangelands? When the WFRHBA was passed in 1971, no one had a good count, but their estimated numbers were not far from the BLM's current target of 26,710 and were considered to be dangerously depleted. When the first rough census was taken years later, the wild equine population was around 70,000, close to what the BLM estimates today. The government has reduced herd areas from 339 to 177; the majority of remaining herds are seriously underpopulated, thanks to targets (appropriate management levels/AMLs) which the National Academy of Sciences termed arbitrary, unnecessarily rigid and unscientific.

Now, the Department of Interior proposes to carry out the same mass destruction of wild equines that the 1971 Act was enacted to prevent. It seeks to remove the Congressional ban on killing and unlimited sales of healthy horses and burros in captivity; and would authorize exterminating those deemed "excess" on the range. This plan would wipe out a monumental part of American history. It is totally unsustainable, as it would require a non-stop cycle of roundup and war on a protected species. How can Interior justify pouring taxpayer monies into this pernicious scheme?

Interior Secretary Ryan Zinke and his cohorts maintain that wild horses and burros are costing an arm and a leg and that the 'free lunch' has to end. Let's examine that concept. We know the federal grazing program runs at a huge loss, costing taxpayers more than 1.2 billion in the last decade by conservative estimates. Add

to that the cost of Interior's Wildlife Services program, for which taxpayers pay 125 million a year to eradicate predators at the bequest of the livestock industry. For starters, that free lunch dwarfs the BLM's Wild Horse & Burro budget.

Free lunch is the 22 million acres the Department of Interior removed since 2005 from the herd areas lawfully designated for wild horses and burros at the bequest of the livestock industry, well-heeled politicians and powerful lobbyists.

Free lunch is claiming 46,000 wild equines in holding, when the Agency cannot account for thousands of these captive animals or those that die in holding, as detailed in a recent independent investigation :<http://wildhorsefreedomfederation.org/white-paper/>

Free lunch is paying a few helicopter contractors millions annually to harass and endanger wild horses and burros based on AML's which are indefensible.

Keeping mustangs and burros free on the range costs taxpayers next to nothing. The BLM has many practical, cost-effective options for managing them, but has instead relied on those which cost taxpayers the most and that separate wild horses and burros from their lifelines of freedom and family for the benefit of private interests.

That failed model must change. Here's a strategy we'd like you to consider:

- Create a ten-year plan to reduce and stabilize wild horse populations where needed, using native PZP, PZP-22, and/or Gonacon. All of these methods work.
- Immediately reallocate BLM funds from the negative loop of roundup and removal to the administration of fertility control for mares beginning late winter-spring 2018. Make monies available to pay volunteer expenses in the field as well as darting certification class expenses.
- Return geldings and older mares to zeroed out HAS and HMAs. Let them live out their lives in the peace they deserve and cut the holding budget by over half.
- Permanently remove only adoption-age horses (1-5 years) equal to the number that are likely to be adopted yearly. Expand training programs for horses and burros removed to increase safe, long-lasting adoptions.
- Fund research to focus on a multi-year, remotely deliverable, safe and reversible birth control vaccine. Do NOT focus resources on permanent, inhumane and dangerous operations such as ovariectomies and gelding (which does nothing to reduce births).
- Fund research to study the ecological impacts of livestock grazing, oil and gas drilling and mining to develop meaningful context for the "thriving natural ecological balance" so often cited, but never examined, in environmental assessments; and to examine the secondary impacts that helicopter roundups have on other protected wildlife species.
- Begin the planning process to raise AMLs with initial focus on the herds that are not genetically viable. The vast majority of herds have AMLs under the 150 adults required to maintain variability and long-term health. In particular, the NAS warned in 2013 that the small, fragmented burro populations are already genetically threatened.
- Revise Resource Management Plans to ensure that wild horse and burro herds have at least 51% of forage allocated to them. Now, wild horses and burros live on only 11% of BLM lands and on average are allocated no more than 18% of the forage in relationship to livestock. The ranges are

historically designated as "principally but not exclusively" for wild horses and burros, yet the mustangs and burros are on a fraction of BLM lands, while cattle and sheep are on the vast majority.

- Set aside ranges that are livestock free (like the Pryor Mountain Wild Horse Range) for burros within the Black Mountain HMA in Arizona, and for wild horses within the Red Desert Complex in Wyoming. Disallow hunting of predators in these ranges so that a natural balance might be attained. Halt the killing of mountain lions in all HMAs. Taxpayer dollars should not be used to kill effective wild horse predators.
- Revise the BLM website and literature to remove denigrating, uninformed terms like "non-native," "feral" and "invasive." Words matter. The 1971 Act defines wild horses and burros as "free-roaming" wild animals that are essential to the rangeland ecology and to our cultural heritage. Respect these sentient beings. Focus on management tools that work. Listen to those on the ground. Many BLM specialists care for the horses and burros. I sincerely doubt they want the Agency converted into a slaughtergate industry. The majority of Americans want solutions, not slaughter; and coexistence: not mass destruction. Humans, not free-spirited wild horses and burros created the problems we're addressing. We humans can solve them with heart, common sense, sound science and dialogue.

Charlotte Roe
Director, Wild Horse and Burro Project
In Defense of Animals charlotte@idausa.org

Kimberly Airhart

Ms. Airhart indicated that she travelled from Pennsylvania to address the Board as an American citizen, taxpayer, an informed wild horse and burro advocate, and an advocated for the preservation of healthy rangelands – the public's land.

In 1969, the United States put a human being on the moon. This monumental achievement was accomplished through the combined efforts and cooperation of our government, scientists, and a diverse group of people known as Americans. Undaunted by past failures, they have proven the impossible to be possible. All the aforementioned are present here today although the discussion of acceptable, cost-effective, sustainable management of wild horses and rangeland, not space travel.

Every member of this Board has not only the responsibility but, more importantly, the opportunity to make fair, sound, and publicly acceptable recommendations. The answers to the existing problems within the BLM wild horse and burro program will not be found in failed, and still failing, past practices, or by continued proposals that enrage the majority of American people and waste taxpayer dollars.

The Colorado BLM District, the Billings District, and several others including Assateague Island horses are leading the way in providing what success can be achieved through their on-range management with PZP vaccines and true cooperation with the community, local advocacy groups, and volunteers.

The essential ingredients to this success are on-range PZP usage (and increasing that usage) and dedicated volunteers. These two methods have significantly reduced the need to remove horses from the rangeland, which, in turn, reduces costs associated with helicopter roundups and holding facilities. Cost to purchase and administer PZP are incurred only once per fiscal year. Whereas, horses in government holding incur costs daily.

After seeing what has been achieved here in Colorado, let us work together to see the same success in other states because it is possible.

Patti Williams

Ms. Williams, from Rangley, Colorado, indicated that it is time, the special interest groups look at the science concerning our wild horses.

BLM and other groups have claimed that horses are responsible for destroying critical habitat, compete for grazing lands, and overpopulate. The report by the General Accounting Office and the National Academy of Science is plain. BLM has never presented hard evidence that populations are what they claim. But, BLM and conservation groups in my area continue their horrendous assault on the beautiful icons of the west. Do advocates want to work with BLM in my area? Yes, they do. But, let me tell you about a recent meeting that I attended in Meeker (Colorado). I went into this meeting with hopes for a partnership. These hopes were dashed quickly when we realized that if we didn't agree with these goals, we were rudely told that we could not be on the committee. Goal 1 – wipe out (zero out) West Douglas horses. Goal 2 – zero out North Piceance Creek horses. Was there ever a collaborative effort on these goals? No. The West Douglas horses can be seen occasionally by the children on Highway 139. They get very excited and tell me in the classroom when they see the horses.

I spent most of my time in West Douglas this summer. She has an aerial count completed by BLM in 2016. The count is about 110 horses, but our local newspaper reports 275 horses, which doesn't match the map - not even by BLM's standards. These numbers are highly inflated to further agendas of special interest groups. Let me be clear, I have nothing against oil and gas and ranching. Oil and gas is my community's livelihood, but everything needs to be done responsibly.

In conclusion, don't kill our horses. With all the death and destruction in our county, we need positivity. Leave these horses alone and let them live in their family bands.

Ginger Fedak

Ms. Fedak read from a prepared statement that is provided below.

Comments Submitted to BLM Wild Horse & Burro Advisory Board Meeting October 18, 2017

There are two things that we all agree upon:

1. Our Government and its agencies are wasting our taxpayer dollars and going over budget on Wild Horse & Burro Issues and Management.
2. The current management protocol of our Wild Horses & Burros is unsustainable.

As a person with a degree in Range Animal Science (RAS) and Range Management, who has spent a large chunk of my professional career as a Scientist performing and documenting studies, I am expressly concerned with most of the presentations today. If you want a fair study, do a side-by-side of comparable rangeland and water: One side with an equal number of horses, the other side with an equal number of cattle (or sheep). It is well understood in the Range Management Academia that sheep and cattle do far more damage to the range than do horses. WHY, then, are you only documenting and targeting 70K Wild Horses, rather than the millions of cattle on our Public Lands?

There LS Science that can solve the current issues and problems of population control, and Dr. Kane's report was helpful. But, why did the BLM commission, at great expense, the study by The National Academy of Sciences, "Using Science to Improve the BLM Wild Horse and Burro Program :A Way Forward," only to totally disregard it? Yes, there have been a few minimal efforts to implement it in certain areas (with great success!). But, the general response by BLM seems to be: "It can't be done — there are too many horses and the areas are too remote and vast."

EXPAND the PZP Programs using the help of the many hundreds of Volunteers, who are ready, willing and able with boots on the ground, to document and implement these PZP fertility control protocols in every area and locale that know, IT CAN BE DONE!!! It has been proven in areas, remote and vast, where it has been allowed.

We the taxpayers can be saved many millions of dollars, now used for helicopter roundups and holding facilities, if the BLM will cooperate and work with volunteers, as they have in several HMA's, to institute these PZP fertility control options yearly.

In short, don't keep saying, "It can't be done." Let us help you! We Volunteers want to work cooperatively with local BLM personnel.

Respectfully submitted, Ginger Fedak

Berthoud, Colorado

Suzanne Roy

Ms. Roy, representing the American Wild Horse Campaign, on behalf her organization and The Cloud Foundation, she brought a petition signed by 300,000 American citizens in opposition to the Boards' recommendation to kill and slaughter 10,000s of wild horses and burros. Ms. Roy noted that there are six boxes of signatures, which were shoved under a table in the back. She encouraged the audience to look under the table to see what 300,000 signatures from American who are opposed to the direction the Board is taking looks like.

The Campaign represents the voices of these citizens who come from every state in the national and care deeply about the protection of the wild horses and our public lands. They are part of the 80 percent of Americans, including 86 percent of Trump voters and 77 percent of Clinton voters, who oppose killing and slaughtering our wild horses.

The American people deserve better than this biased-Board meeting. The American people deserve facts, facts like over 80 percent of BLM rangeland have no wild horses present on them. Wild horses are not starving – far from it. The Utah Wild Horse and Bureau from BLM could not identify any starving horses in his state this summer. There aren't too many wild horses on the land, that claim is based on BLM's unscientific population limit, which seeks to reduce the population to nearly extinction levels.

Finally, there is a better way to manage wild horses – the PZP birth control vaccine, which works if you use it. My organization has a program on 3,000 horses on 300,000 acres in Nevada that are under State jurisdiction, and, with a budget of less than \$50,000 and a team of five volunteers, more mares have been vaccinated with PZP in 2017 than the entire BLM in 2016.

The American people deserve better than the sham proceedings to enhance the fortunes of a tiny, tax-payer subsidized, powerful special interest group. The public deserves a fair and balanced Advisory Board

The two-minute warning was received, and Ms. Roy was asked to stop.

Ms. Roy also provided written comments that are presented below:

Letter to the BLM Wild Horse and Burro Advisory Board

On behalf of the American Wild Horse Campaign and The Cloud Foundation, we present these 300,000 signatures from American citizens in opposition to your recommendation to the BLM to "euthanize" or sell "without limitation" excess "unadoptable" wild horses and burros in the BLM's holding facilities. As you know, removal of the current prohibitions on destroying healthy wild horses and burros and selling these federally protected animals "without limitation" could result in the slaughter of as many as 92,000 in holding and on the range. Following your

recommendation, the BLM has now requested permission from Congress to implement this lethal plan.

Polls show that 80 percent of Americans — including 90 percent of women, 86 percent of Trump voters and 77 percent of Clinton voters — oppose killing and slaughtering America's iconic wild horses and burros. This inhumane "solution" is being presented as an "emergency" measure with wildly false claims of overpopulation and mass starvation of wild horses on the range.

The "emergency" the BLM claims to face is one the agency itself has created by failing to adequately reduce livestock grazing and refusing to implement the long-available and scientifically-proven PZP fertility control vaccine to humanely manage wild herds on the range. Instead, the BLM has stubbornly continued the unsustainable and unscientific cycle of mass roundups, removals and warehousing of horses and burros in holding facilities, even as the National Academy of Sciences recommended, and Congress directed the agency to reform.

Please represent the will of the American people by reversing your widely opposed recommendation to kill and slaughter America's mustangs. Please vote instead to recommend that the BLM:

1. Maintain prohibitions on destroying healthy wild horses and burros and selling these animals "without limitation" (i.e. for slaughter).
2. Increase the use of the proven PZP fertility control vaccine to humanely reduce wild horse population growth rates in order to decrease or eliminate removals, as recommended by the National Academy of Sciences.
3. Repatriate wild horses and burros in expensive short-term holding facilities to public lands where they can live out their lives without taxpayers paying to feed and care for them, while phasing out more cost-effective long-term holding facilities over time.
4. Explore opportunities to compensate livestock permittees for reduced grazing and range measures (such as provision of water) in Herd Management Areas while wild horse populations are stabilized through fertility control.
5. Prohibit the surgical sterilization of wild free-roaming horses on the range as a management tool, since such methods destroy the wild free-roaming behaviors that are protected under federal law.

Wild horses and burros are protected by an Act of Congress as "living symbols of the historic and pioneer spirit of the West." Americans want these legacy animals protected and roaming wild and free on our Western public lands. The mass killing, slaughter and destruction of our wild horses and burros is not an option. We ask that you take a stand with the majority of Americans who want our historic mustangs and burros protected on our public lands.

Sincerely,

American Wild Horse Campaign
PO Box 1733
Davis, CA 95618

Ken Brown

Mr. Brown read from a prepared statement that is provided below.



Western Counties Alliance

Written Comments for Wild Horse Burro Advisory Board Meeting held in Grand Junction, CO on October 18th and 19th, 2017

The Western County Alliance (WCA) is a non-profit organization established for the purpose of giving western counties greater influence on federal policies in support of well-managed, multiple uses of the public lands and natural resources. Additionally, Western Counties Alliance supports a strong economic development and reasonable, sensible environmental protection.

WCA continues to support a Wild Horse Burro program on public lands when proper management exists.

1. Wild Horse Burro populations need to be managed within established Appropriate Management Levels (AMLs), in order to avoid overgrazing.
2. Excess numbers continue to be a major problem in most areas where Wild Horse Burro animals now exist.
3. WCA does not support reducing livestock grazing AUM's to accommodate additional WHB roaming animals.
4. Coordination and communication should exist between state and federal agencies, county officials, and private stakeholders regarding population data and monitoring.
5. WCA continues to support an enhanced gathering process which assists in reducing numbers in overpopulated areas.
6. WCA continues to support the reintroduction of disposal facilities which are necessary to care for animals in need.
7. WCA continues to support the working group concept established by the board and staff.

8. WCA thanks the board and staff as you endeavor to improve the WHB program.

P.O. Box 21 Randolph, Utah 84064 Phone: 307-679-3658 Fax 435-793-5555
[krcbrownwca@allwest.net](mailto:krbrownwca@allwest.net)

Tracey Scott

Ms. Scott read from a prepared statement that is provided below.

I'm Tracy Scott, an American citizen who is a part of the overwhelming majority of Americans who oppose killing our wild horses and burros or selling them to someone who will; and I support protecting them on our public lands.

According to The Wild Free-Roaming Horses and Burros Act of 1971, the horses are "living symbols of the historic and pioneer spirit of the West; That they contribute to the diversity of life forms within the nation and enrich the lives of the American people."

Any vote to slaughter or euthanize these horses is unconscionable, is against the 1971 Act, and is opposed to the will of the majority of American citizens. Slaughter or euthanasia is completely unjustified in light of the cost-effective, scientifically recommended PZP birth control vaccine, which can be used to humanely manage wild horse populations on the range.

These are healthy animals. Humane euthanasia of wild horses is not possible nor is it moral or acceptable. The process of humane euthanasia requires being able to handle the horse in ways that do not inflict trauma. This is impossible.

These horses are not ill, injured, or damaged as many rescued horses are. They are healthy sentient family-oriented beings that contribute to society.

As a Coloradoan and founder of a mustang horse sanctuary, wild horses are an integral part of this culture. When people enter Grand Junction, CO, from the airport and interstate, they are greeted by images of our iconic national treasure, the wild horse. The Little Book cliffs herd management area is just behind monumental Mt. Garfield. The wild horses of our area influence international tourism and the area's brand image.

Adopted wild horses are utilized in riding disciplines, border patrol, equine therapy and coaching programs to empower human individuals, employees, and families. The complex social structure of the family band is the basis of how we at Steadfast Steeds support families with aging loved ones and special needs.

Therefore, it is our duty as American citizens to continue discovering ways of partnering with the living wild horses to help society. And to utilize proven science to manage the horses in their

wild habitat. I do not want my tax dollars spent on killing God's innocent, healthy creatures to "make" budget.

Thank you for your time.

Blaine Scott

Rev. Scott read from a prepared statement that is provided below.

I'm Rev. Blaine Scott, as a 25-year ordained Christian clergyman and theologian who, according to the 2016 study by national Gallup Polls, is a part of the 71% of adult U.S. population identifying themselves as Christians

I'm a founding partner of Steadfast Steeds Mustang Sanctuary in Western Colorado. And I oppose slaughtering excess wild horses

The Act of 1971 (PUBLIC LAW 92-195), proclaims "Congress finds and declares that wild free-roaming horses and burros are living symbols of the historic and pioneer spirit of the West; that they contribute to the diversity of life forms within the Nation and enrich the lives of the American people; it is the policy of Congress that wild free-roaming horses and burros shall be protected from capture, branding, harassment, or death..."

Gathered wild horses are treated with vaccines and chemicals for parasite removal, therefore are unfit for human consumption. To sell them to other countries without disclosing this is unethical

In the Holy Bible, book of Leviticus chapter 11, the Lord our God states: "From among all the land animals, these are the creatures that you may eat. Any animal that has divided hooves and is cleft-footed and chews the cud, such may you eat." Horses, of course, are single-footed and single-stomached; not to be consumed by humans

Also, there is mounting doubt that the reprehensible act of killing horses will be any benefit economically due to complexities of how to implement it humanely and safely for horses and humans alike

As American citizens, you serve on this Board only a small portion of your daily life and lifestyle. However, like me and every American, you too must live with and are judged by each decision you make 24/7. Don't try to live with yourself having unjustly and inhumanely condemned 90,000 healthy souls of the historic American West to death. These deaths would only decrease a tiny portion of the national budget, while also cutting American jobs

You have the moral opportunity and obligation to advise BLM to maintain the longstanding prohibition on killing healthy wild horses and burros and oppose any effort that would open the door to slaughter or euthanasia

By doing so, one enjoys peace of mind and safety of your soul.

When John looks up to heaven, as recorded in the Bible, Revelation 19, he records this: "Then I saw heaven opened, and there was a white horse! Its rider is called Faithful and True, and in righteousness he judges..."

You see, even God partners with horses! And only God and you can judge whether your voice and choice will be faithful and true.

Dustin Huntington

Mr. Huntington read from a prepared statement that is provided below.

Wild Horse Advisory Board:

My name is Dustin Huntington from Southeastern Utah, and I am a cattle rancher. I appreciate the advisory board giving me a few minutes to comment on the wild horse issue because our operation has a long history with the wild horse problem. Over the past twenty years the wild horse herd in this area has grown exponentially, and the range has deteriorated to the point where they have eaten everything but the fence posts. Our outlook for current cattle usage is zero; however, I do not consider this problem a cattle vs horse issue. This is about saving the resource and the range from total destruction. I think we all know the current statistics on the wild horse herd and where it is headed. There will be at least 10,000 new foals on the ground this year, and the BLM's most optimistic estimates of horse adoptions is around 2500. These numbers just don't work and are not sustainable. The BLM micromanages every aspect of the federal lands under their control. Yet when it comes to wild horse HMA's, they are noticeably absent and ineffective. Until the BLM can stand up to the wild horse advocates and do their job the range will continue to decline.

And now to the advocates, I am begging you to visit any of the wild horse HMA's across the western states and look beyond the horses and see the devastation on the ground. In order to solve this problem, you have got to stop obstructing every reasonable solution put forward by knowledgeable well-meaning individuals. This is not about winning. There is a well-known adage that fits this situation: "You may win the battle but loose the war." Ultimately, everyone loses when the range and the resource is gone.

To the wild horse advisory board, I commend you. I thought the recommendations submitted last year were spot on, and I support them whole heartedly. The solutions are there. I am hopeful that those recommendations will be accepted and implemented quickly. If I can leave you with one thought it would be, "Listen to the Land."

Allyson Woods

Ms. Woods representing the Mustang Camp, a certified non-profit organization out of New Mexico, whose mission is to utilize a scientific approach to animal training to foster a healthy, functioning relationship between wild horses and humans. They train people to train mustangs so that more horses can be reached and find successful adoption.

However, there is an imposing obstacle regarding perceived value. If the value of something exceeds the cost, it will be purchased. In our situation, if the perceived value of an animal exceeds the cost of adoption, it will be adopted. So that means, the Mustang Camp must enhance the value of the animal in the eye of the adopter. Especially, regarding wild horses, the value can be created via the trust in humans. So, we need to apply training methods as well as husbandry techniques that will protect the inherent value of the mustang as well create value.

Mustang Camp has a proven viability in its methods through the training and adoption of close to 500 horses and burros since 2010. We would like to also note instrumental relationship with BLM's Oklahoma offices as well as with individuals in the Mustang Heritage Foundation.

Ms. Woods invited everyone to explore their website – www.mustangcamp.org – to further understand their goals and operation. Ms. Wood appreciated the time of the Board and hopes that we can work together to improve lives of the wild horses and burros of the west.

Toni Moore

The misconception promoting that there is an overpopulation of wild horses on our public land cannot be further from the truth due to the politics that directed policy at the passage of the *Wild Free-Roaming Horses and Burros Act of 1971*, herd use areas were decimated. They were cut up, split up, fenced off, and then sold. In most cases, the boundaries applying to the wild horse use area reflected livestock allotment boundaries. Wild horses were then systematically removed from their habitat first by zeroing out entire herd areas and then by reducing size of the herd areas to unreasonably small acreages.

Monitoring and inventory of all species is needed. It is a simple premise – who eats what, when, and where. Without that, you will not have balance without this knowledge, it cannot be reached. The land cannot accommodate all the users and the nature values of the land, such as wild horses and other wildlife, when overutilization by the livestock industry continues to significant impact public lands.

What we have is an overpopulation of politic power and their represented interests. The groups pushing the hardest to remove and reduce wild horses – the ones pointing their fingers to wild horse population - should check their own numbers.

Americans overwhelming face a financial and environmental burden of too many cows and sheep littering our public land. Subsidies for killing predators are astronomical and, really, who benefits? Grazing on our public lands for a cow and calf costs less than a 15-pound bag of premium cat food. Seriously, folks, who's the financial burden?

Return wild horse areas to their original habitat size, place wild horses languishing in holding facilities back into these areas to live out the rest of their lives.

Wild horses are to be managed in a genetically-viable, self-sustaining population. Will somebody please explain to me how to manage for that on a spot of land the size of a postage stamp?

Until BLM addresses the overpopulation of livestock on public lands and the political pressure that keeps them there, our public lands will continue to be in disarray. Balance will be out of the question. Wild horses will continue to be blamed for their own mismanagement. How will be blamed when all the wild horses are gone?

Monitor and inventory all species, take appropriate action. Let's take politics out of science, it's time to stop fake science.

Jon D. Hill

Mr. Hill thanked the Board for allowing him to make a comment today. Mr. Hill's family has been ranching in the Book Cliff Mountains since the 1870s. Mr. Hill has been a member of BLM's Northwest Resource Advisory Council and also a former County Commissioner.

This morning while driving to the meeting, Mr. Hill saw four young studs in trespass from the West Douglas herd area on his private land and noting that he had just brought his private mares down for the winter. Thankfully, there are two fences between his mares and the four studs, but that may not be enough because some of the horses from the West Douglas HMA have crossed his permit, which are outside the HMA, and are now inside the Grand Junction Field Office boundaries. They are expanding even though there supposed to be a zero AML on the West Douglas.

We need to have annual roundups with "no holds barred" culling the lame, sick, and old horses; adopt out most of this year's foal crop, and then use the sale without limitation and euthanasia provisions of the *Wild Free-Roaming Horses and Burros Act of 1971*, which is how any rancher would handle their own livestock.

There also needs to be people like Mr. Hill that ride their horse to chase the feral horses off their private lands and permits when they're in trespass from a horse area.

A year ago, Mr. Hill attended the Western Region of the National Association of Counties meeting in which then-Director Neil Kornze asked for County Commissioner help in dealing with horse problem.

The two-minute warning was received, and Mr. Bill stopped his comment.

Mr. Hill also provided written comments that are presented below:

Cripple Cowboy Cow Outfit, Inc.

P. O. Box 40

Rangely, CO 81648

Wild Horse Advisory Board

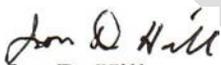
I submitted a statement to the Board at the beginning of the month, then this morning driving out to attend this meeting I saw 4 young studs in trespass from the West Douglas Herd Area on my private property and I had just Monday brought my mares down for winter, thankfully there are 2 fences between them. I was reminded that we have 75,000 horses on the BLM range, 45 maybe 50,000 in holding facilities. Plus, according to the High-Country News there are 40,000 feral horses on the Navajo reservation. Who knows how many uncounted turned out horses there are west wide.

One year ago, in May, I attended the Western Region of the National Association of Counties meeting, during which BLM Director Neil Kornze asked for county commissioner help in dealing with the Horse problem. Last September, this body gave him the tools to take care of the problem and he turned tail and ran. Of course, there are not enough members of Congress with the intestinal fortitude and political will to take the necessary steps that would take care of the problem. It is up to this body stand up and say enough is enough and work toward range and horse health.

We need to have annual roundups with no holds barred culling of old, sick, and lame horses. Adopt out most of the current years foal crop. Use the sale without limitation and euthanasia provisions of the Wild and Free Roaming Horse and Burro Act. If you rounded up every horse tomorrow, sold them down to AML and castrated every stud you would not have to have another gather for four years.

Finally, people like me need to be able to get on their horse and go out and chase the feral horses off of their private land and or permits without having their business taken away from them.

Thank you for your time and consideration.


Jon D. Hill

President, Cripple Cowboy Cow Outfit, Inc.

970-216-3509 cripple-cowboy@hotmail.com

Cripple Cowboy Cow Outfit, Inc.

Randi Blasienz

Ms. Blasienz is the Director of Operations for the Mustang Heritage Foundation (MHF) and is speaking on behalf of the MHF Board of Trustee President Paula Carr.

The MHF recognizes that it costs tax payers millions of dollars each year to house and feed excess animals removed from the range. MHF has programs currently in place to substantially reduce this problem by increasing the number of animal placement into private care. Our efforts; however, are severely restricted by available BLM funding.

The MHF in partnership with the BLM's wild horse and burro program has been actively placing BLM wild horses and burros into private care since September 2007 through a federal financial assistance agreement. We are reaching a total of 10,000 adoptions since they began. However, the replacement rate has grown exponentially in the past 18 months. In 2016, a record-breaking 1,226 animals through their training programs. In 2017, we projected to place 1,300 animals through the TIP program alone, which was met in March 2017. Additional TIP pickups had to be suspended, which halted the placement of additional animals for six months. By the rate of progress being shown by the TIP program, the MHF could have placed an additional 1,000 animals if the program had not been suspended – making their annual placement 2,886 animals versus the 1,886 animals that were placed in 2017.

We have the programs and momentum in place to move 3,000 to 4,000 animals from BLM off-range corrals and into private care over the next 12 months. Unfortunately, at this time, there is only funding provided through BLM to place 1,400 animals through the MHF partnership until September 2018.

We respectfully request the Department of the Interior and BLM leadership to evaluate its current budget in order to assist placement of additional animals.

Gary Moyer

Mr. Moyer expressed his appreciation for being able to address the Board and for holding the meeting in Grand Junction, Colorado. A request was made years ago to have a Board meeting in rural western Colorado, where there are HMAs nearby. Mr. Moyer also thanked the Board for their September 2016 recommendations regarding humane euthanasia and sterilization, which are supported by his organizations.

Mr. Moyer represents the White River Conservation District and the Colorado National Association of Conservation Districts, which has policy that supports the wise use of the natural resources – taking care of our rangelands.

Mr. Moyer reminded everyone that the *Wild Free-Roaming Horses and Burros Act of 1971*, requires BLM to manage for the multiple use of our resources; not single species management, which is something he hasn't heard today. We hear a lot of comments about single species management – how come horses can't be on more land? The Act was very specific about where horses could be managed and under what criteria. Mr. Moyer suggested the audience to remind BLM that they are required by law to follow the Act, which also specifically indicated anytime the numbers are above the AML, they are required, when an excess is determined, to remove those horses. BLM is currently out of compliance with the law. Mr. Moyer's organizations under the challenges regarding the Appropriations language, but suggested that the Advisory Board and BLM educated Congress as well as the public concerning the reality of what the situation is when it comes to the number of animals on the rangeland.

(The remainder of this page was left blank intentionally.)

Kali Sublett

Ms. Sublett is the Executive Director of the MHF. The MHF has been in partnership with BLM for 12 years. In 2017, MHF signed their third 5-year assistance agreement with BLM. MHF has placed approximately 10,000 animals over the past 11 years.

2017 was a record breaking year for MHF with 1,186 animal adoptions. Unfortunately, it was necessary to suspend one of their most successful place programs (TIP) six months into the fiscal year. MHF was fully funded by BLM and met their goal within six months. Unfortunately, there was not additional funding to support the continuation of training animals.

In 2017, MHF launched the educational project – *Virtual Reality Trailer* – that is very exciting opportunity where the public can experience wild horses on the range. It will be on the road throughout 2018.

Ms. Sublett provided the Board with impacts reports that provide details outlining the tremendous growth being experienced by MHF over the past three years.

The MHF through their network of trainers can place 3,000 to 4,000 animals into good homes through adoptions. Unfortunately, the BLM budget is not there to reach that level. MHF would ask that the Department of the Interior and BLM look at all adoption programs and fund those that are being most successful and cost effective.

Ann Elliott

Ms. Elliott read from a prepared statement that is provided below.

October 18, 2017

Good Afternoon,

I would like to take this moment to applaud and thank the National Wild Horse and Burro Advisory Board for making the decision to visit the Little Books Cliffs Herd Management Area in conjunction with their business meeting in Grand Junction, Colorado. I hope you learned more about the working partnership of the local BLM employees and volunteers of the non-profit organization, Friends of The Mustangs. It has been a win-win relationship for both, with the Little Book Cliffs' horses and their range the overall winners. This focused relationship needs to be encouraged and fostered with other HMA.

Now to my point, the public hears and reads news stories about roundups using helicopters, crowded holding facilities overflowing and now spoken suggestions of slaughter to address the cost and impact of the increasing number of horses and burros that overpopulate the ranges. Sadly, we hear the same old story time and time again and the tide never seems to turn.

Just as recently as this quote, dated October 3, 2017 from the Advisory Boards News Release for this meeting, it states *"The rapid growth rate and chronic overpopulation of the West's wild horses are already affecting the health of the animals and the resources on which they and many other species depend,"* said Acting BLM Director Michael Nedd. *"To be effective in solving this challenge, we must work together to explore a wide variety of solutions to an unsustainable situation."*

I would like to offer a suggestion "--to explore a wide variety of solutions.". In an article written by Dennis Webb in The Daily Sentinel dated Saturday, October 7, 2017, an above the fold headline read, *"State mum on removal of predators on Roan"*. It has come to light that Colorado Parks and Wildlife has ended its first year into a three-year study in the Piceance Basin with a second study of nine years to be done in the Upper Arkansas River Valley, at an estimated project cost of \$4.5 million. The CPW is concerned that deer numbers are below habitat capacity in the Piceance Basin. They want to see if removing 15 cougars and 25 bears a year for three years, each May and June, would have an impact on fawn survival rates.

The atrocity of this story is that CPW plans to use the federal Wildlife Services agency to trap the animals in a nonlethal manner, they would then be shot and killed, except in the case of families. I strongly urge the Board to reach out to the CPW and federal Wildlife Services to ask for these natural predators for relocation into Horse Management Areas as one means of controlling herd numbers. I would rather see relocation for the predators, with a chance for them to adapt to their new environment, then wastefully shot just to see if fawn numbers would Increase.

Respectfully,

Ana Elliott



Lia Biondo

Ms. Biondo is representing the National Horse and Burro Rangeland Coalition, which composes of 18 national coalitions representing sportsmen, sportswomen, livestock growers, State and local governments, resource management specialist, and others who are concerned with the managing of horses and burros in a common sense and ecologically sound way, including the Society for Range Management, a professional, scientific society of nearly 4,000 members in 48 countries for which Ms. Biondo serves that the D. C. coordinator.

On a personal note, Ms. Biondo essentially grew up on the back of a horse. Training and competing in many different disciplines of riding, developing an intimate understanding of horse biology and behavior, including many physical characteristics of horses that differentiate them from native rangeland species.

As a coalition, we prioritize the inherent health of public rangelands above all other considerations. Healthy rangelands are the basis which allow native wildlife to thrive, livestock to graze to support local communities, free-ranging wild horses and burro to live healthy lives, and water quality to be sustained.

We like to recognize the critical decision the Board made last year to recommend that the BLM should follow the stipulations of the Act by offering animals deemed unsuitable for sale without limitation or humane euthanasia. This is not an easy decision to make, but represents your careful review of the current crisis we are facing in many parts of the country.

We encourage the Board to continue making decisions that will move the needle toward viable solutions, promote the on- and off-range management of wild horses and burros.

To ensure healthy rangelands for future generations, the Board should encourage the BLM and FS to (1) increase the number of animals removed from the range in order to restore rangeland habitat and (2) re-emphasize the previous recommendations to both the Secretary of the Interior and Agriculture to implement the management tools needed to achieve ecologically sustainable wild horse and burro populations within a reasonable amount of time.

The National Horse and Burro Rangeland Coalition also submitted a written letter, which is provided below:

DATE: 18 October 2017

TO: National Wild Horse & Burro Advisory Board

FROM: National Horse & Burro Rangeland Management Coalition

RE: Testimony for October 2018 Advisory Board Meeting in Grand Junction, CO

Dear Members of the National Wild Horse & Burro Advisory Board:

The National Horse & Burro Rangeland Management Coalition appreciates the opportunity to provide testimony regarding the expanding overpopulation of wild horses and burros on lands managed by BLM and USFS and the resulting challenges this creates for rangelands, native wildlife, western heritage, taxpayer dollars, and wild horse and burro well-being.

Our Coalition is composed of more than 18 national organizations, encompassing a wide range of sportsmen, livestock grower, state and local government, wildlife and land conservation organizations, and professional societies. Collectively, we represent over 10 million Americans and 6,000 local governments, and focus on commonsense, ecologically-sound approaches to managing horses and burros to promote healthy wildlife and rangelands for future generations.

We prioritize the health of public rangelands above all other considerations. Healthy rangelands allow native wildlife to thrive, livestock to graze to support local communities, free-ranging horses and burros to live healthy lives, and water quality to be sustained. Healthy rangelands are essential to the Western way of life.

Last September the Wild Horse & Burro Advisory Board issued the following recommendation:

"BLM should follow stipulations of WHB Act by offering all suitable animals in long and short term holding deemed unadoptable for sale without limitation or humane euthanasia. Those animals deemed unsuitable for sale should then be destroyed in the most humane manner possible. "

We understand that the recommendation was not an easy one to make, but was critical and undertaken after a careful review of the dire situation facing the wild horse and burro herds, native wildlife, and our public rangelands. Because it reflects original Congressional intent and will help resolve the current wild horse and burro overpopulation crisis, our Coalition supports the Advisory Board's recommendation.

Overpopulation of horses and burros, continues to threaten the health of our rangelands and negatively impacts the multiple-use of these public lands. To ensure healthy rangelands for future generations, the National Wild Horse and Burro Advisory Board should

1. re-emphasize their previous recommendation which encourages the Secretaries of Interior and Agriculture to implement the management tools needed to achieve ecologically-sustainable wild horse and burro populations within a reasonable amount of time, and
2. encourage the BLM and USFS to increase in the number of animals removed from the range in order to restore and protect rangeland habitats, and 3) strategically apply sterilization and fertility control drugs on herds once populations are at management goals, where such methods are deemed effective and cost-efficient by scientific evaluation. Thank you for considering the input of our coalition.

Sincerely,



Keith Norris, Associate

Keith Norris, Associate Wildlife Biologist
Coalition Co-Chair, Dir. Wildlife Policy & Programs
The Wildlife Society
keith.norris@wildlife.org



Chris Heck
Chris Heck

Chris Heck
Coalition Co-Chair, Government Affairs Associate
National Assoc. of Conservation Districts
chris-heck@nacdn.org

J. Paul Brown

Mr. Brown indicated that he is a former Colorado State Representative, a rancher, member of the Colorado Wool Grower's and Cattlemen's Associations, Colorado Farm Bureau, and others.

Mr. Brown agreed with a statement made earlier that there is a "crisis on our hands". We're going to have an ecological disaster if something isn't done now. Like everyone in the room, Mr. Brown loves horses, but he wants them taken care of just as he takes care of his own horses and livestock. We must manage the resources, so they are sustainable by taking the excess horses off the range.

The Board's September 2016 recommendation was "spot on". Mr. Brown encouraged the Board to continue with their recommendations. We must do that to save the horses, to save the resources, and save our country.

Richard Connell

Mr. Connell is the Vice-President of the Colorado Farm Bureau. On behalf of their more than 25,000 members, Mr. Connell thanked the Board for their September 2106 recommendations concerning unrestricted sale and euthanasia. He also thanked the Board for their representing their interests and coming to Colorado to see a non-typical situation in the Little Book Cliffs Wild Horse Range.

Over the past 36 years, Mr. Connell has travelled into all of the Colorado HMAs and continues to do so. What the Board saw on their field tour was not typical for several reasons including the containment of animals, which is not typically in other HMAs. As mentioned by Mr. Jon Hill, Mr. Connell was in the West Salt allotment one month ago, which is part of the Grand Junction BLM Office (twenty-five miles northwest of Grand Junction) where he saw the horses coming into this area over the top from the Little Book Cliffs Mountains. If that is allowed to continue, this will not remain a contained area. He has been in those areas and has seen the degradation that the herd caused to forage in those areas.

Mark Wintch

Mr. Wintch was representing the Public Lands Council (PLC) with its membership of 22, 000 public lands ranchers in the greater West and the National Cattlemen's Beef Association (NCBA). These two organizations echo the comments made by the National Horse and Burro Rangeland Management Coalition and submitted to the Board urging reaffirmation of its stance that BLM and FS streamline practices and procedures that ethically and humanely reduce the number of wild horses and burros on federal lands to AML.

Wild horse and burro populations already exceed levels that western rangelands can sustainably accommodate. Their numbers continue to rise at alarming rates of 15 to 20 percent annually. Nearly 46,000 horses and burros currently occupy federal holding facilities bring them dangerously close to capacity. While PLC and NCBA recognize the public perception of the horse as an icon of the American west, we re-iterate that horses and burros are non-native species on the western landscape.

Per last September's recommendation, NCBA and PLC agree that BLM should follow stipulations of the *Wild Free-Roaming Horses and Burros Act of 1971*, by offering all suitable (unadoptable) animals in short- and long-term holding be offered for sale without limitation or humane euthanasia. Those animals unsuitable for sale should be destroyed in the most humane manner possible.

While unfortunate, the euthanasia of wild horses and burros deemed unsuitable for adoption or sale is no less ethical or humane as those of the same practices supported by the Humane Society of the United States and People for the Ethical Treatment of Animals on an estimated 1.5 million shelter pets each year. Should wild horse and burro population levels return to scientifically proven to be conducive to healthy animals and ecosystems ...

The two-minute warning was received, and Mr. Wintch stopped his comment.

The PLC and NCBA also provided a written statement, which is provided below.

STATEMENT ON WILD HORSES AND BURROS

The National Cattlemen's Beef Association (NCBA) and the Public Lands Council (PLC) echo the comments of the National Wild Horse and Burro Rangeland Management Coalition submitted to the National Wild Horse and Burro Advisory Board, urging reaffirmation of its stance that the Bureau of Land Management (BLM) and the U.S. Forest Service (USFS) streamline practices and procedures that ethically and humanely reduce the number of wild horses and burros on federal lands to appropriate management levels. Wild horse and burro populations already exceed levels which western rangelands can sustainably accommodate, and their numbers continue to rise at alarming annual rates of 15-20%. Nearly 46,000 horses and burros currently occupy federal holding facilities, bringing them dangerously close to capacity. While NCBA and PLC recognize public perception of the horse as an icon of the American West, we reiterate that horses and burros are non-native species on western landscapes. The Wild Free-Roaming Horses and Burros Act of 1971 charges the BLM and USFS with managing these animals on federal lands "in a manner that is designed to achieve and maintain a thriving natural ecological balance." However, additional laws and regulations eliminate critical options for adhering to this charge, including humane euthanasia. Using current resources at present funding levels, BLM and USFS are quickly becoming unable to hold wild horses and burros at short or long-term facilities.

Per last September's recommendation, NCBA and PLC agree that "BLM should follow stipulations of WHB Act by offering all suitable animals in long and short term holding deemed unadoptable for sale without limitation or humane euthanasia. Those animals deemed unsuitable for sale should then be destroyed in the most humane manner possible." While unfortunate, the euthanasia of wild horses and burros deemed unadoptable or unsuitable for sale is no less ethical or humane than use of the same practice — supported by both the Humane Society of the United States (HSUS) and People for the Ethical Treatment of Animals (PETA) — on an estimated 1.5 million shelter pets each year. Should wild horse and burro populations return to levels scientifically proven to be conducive to healthy animals and ecosystems, NCBA and PLC urge active sterilization and fertility control to maintain their population and eliminate the need for humane euthanasia as a long-term population control strategy.

SUPPORT DOCUMENTS AND LINKS

HSUS STATEMENT ON EUTHANASIA

When the decision is made that euthanasia is the only option, it is critical to ensure it is performed as humanely as possible. Direct injection of sodium pentobarbital (referred to as euthanasia by injection, or EBI) is the most humane method available because it causes rapid loss of consciousness and an immediate inability to feel pain. Other methods—such as carbon monoxide gas chambers—that cause distress, fear, or pain in the animal, are not acceptable. We all share the goal of ending euthanasia, and The HSUS works tirelessly to prevent pet homelessness, promote spay/neuter education, and encourage adoption from shelters and rescue groups. When the decision is made by a shelter to perform euthanasia, it must be performed with the same skill and compassion that we would expect to see if we brought our own suffering animal into that facility or to a veterinarian for a final act of mercy.

PETA STATEMENT ON EUTHANASIA

Approximately 6 to 8 million animals are handled by animal shelters in the U.S. each year. Even though some are reclaimed or adopted, nearly 4 million unwanted dogs and cats are left with nowhere to go. Animal shelters cannot humanely house and support all these animals until their natural deaths. They would be forced to live in cramped cages or kennels for years, lonely and stressed, and other animals would have to be turned away because there would be no room for them.

Trying to build enough animal shelters to keep up with the endless stream of homeless animals is like putting a bandage on a gunshot wound. Turning unwanted animals loose to roam the streets is not a humane option, either. If they don't starve, freeze, get hit by a car, or die of disease, they may be tormented and possibly killed by cruel juveniles or picked up by dealers who sell animals to laboratories.

Euthanasia literally means "good death," and true euthanasia delivered by an intravenous injection of sodium pentobarbital—is painless, quick, and dignified. Because of the high number of unwanted companion animals and the lack of good homes, sometimes the most humane thing that a shelter worker can do is give an animal a peaceful release from a world in which dogs and cats are often considered "surplus." The American Veterinary Medical Association and the Humane Society of the United States agree that an intravenous injection of sodium pentobarbital administered by a trained professional is the kindest, most compassionate method of euthanizing animals.

Unfortunately, some animals will be killed by municipal officials using unacceptable and cruel methods, such as gunshot. Bullets are often not placed precisely in the struggling animal's head or are deflected, and some animals survive the first shot only to be shot again and again. Many animal shelters still use outdated gas chambers to kill animals who aren't adopted or reclaimed. Even the "best" gas boxes can expose conscious animals to the horror of watching other animals in the box suffer from convulsions and muscular spasms as they slowly die. Old, young, and sick animals are particularly susceptible to gas-related trauma and will die slow and highly stressful deaths.

And as hard as it is to believe, there are still facilities in the U.S. that kill animals using painful electrocution or cruel decompression chambers, which make the gases in animals' sinuses, middle ears, and intestines expand quickly, causing considerable discomfort or severe pain. Some animals survive the first go-around in decompression chambers and are recompressed because of malfunctioning equipment or an operator's mistake or because they get trapped in air pockets. They are then put through the painful procedure all over again. For more information, [click here](#).

Until dog and cat overpopulation is brought under control through spaying and neutering, we must prevent the suffering of unwanted animals in the most responsible and humane way possible. Euthanasia, performed properly, is often the most compassionate option.

The only way to stop the suffering of the innocent victims of companion animal overpopulation is to prevent their births through sterilization efforts. Every last one of the millions of animal deaths at animal shelters and in the streets, alleyways, fields, basements, and back yards that occur every year could be prevented through spaying and neutering. You can help. It's as easy as ABC—animal birth control.

Please do not allow your companion animal to be needlessly euthanized during times of crises. Take the appropriate steps now to ensure that he or she is well taken care of even after your divorce or death.

[AMERICAN SOCIETY FOR THE PREVENTION OF CRUELTY TO ANIMALS STATISTICS](#)

Each year, approximately 1.5 million shelter animals are euthanized (670,000 dogs and 860,000 cats). The number of dogs and cats euthanized in U.S. shelters annually has declined from approximately 2.6 million in 2011. This decline can be partially explained by an increase in the percentage of animals adopted and an increase in the number of stray animals successfully returned to their owners.

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PERTINENT PLC POLICY

PLC-304 2016

WILD HORSES AND BURROS

WHEREAS, excessive numbers of feral horses and burros continue to cause increasing deterioration of range conditions in many areas of the West, and

WHEREAS, the Bureau of Land Management (BLM) has determined the Appropriate Management Level (AML) to be 27,000 horses, and

WHEREAS, PLC is concerned about adequate funding of the Wild Horse and Burro Program in order to maintain a thriving ecological balance as required by law,

THEREFORE BE IT RESOLVED, PLC supports legislation that would provide for additional tools and flexibility to aid in the removal of excess numbers when exceeding AML and when potential resource damage is imminent.

BE IT FURTHER RESOLVED, that appropriate managing agencies should reimburse livestock operators for damages to improvements caused by feral horses and burros.

PLC-305

2016

TRANSPLANTING OF WILDLIFE AND FERAL ANIMALS

WHEREAS, the transfer and transplant of all animals with no requirement for testing for contagious or communicable diseases presents a potential threat to the spread of disease to all other animals, domestic or wild,

THEREFORE BE IT RESOLVED, PLC recommends that all animals being transferred be required to meet the same criteria applied to the movement of domestic animals.

BE IT FURTHER RESOLVED, PLC opposes the introduction of Rocky Mountain or Desert Bighorn sheep into areas where domestic sheep and goat grazing occurs or vacant federal or state trust lands sheep allotments exist until scientific testing has proven beyond reasonable doubt that there is no disease transferred between the two species.

BE IT FURTHER RESOLVED, PLC opposes any such releases or agreement being made without the consensus of the affected private interests within the area of impact.

PLC-306

2014

PERMITTEE VOLUNTARY PURCHASE OF WILD HORSES

WHEREAS, there is a continuing need for the BLM to reach Appropriate Management Level (ANIL) for wild horse and burro populations on public lands, and

WHEREAS, the number of horses in long-term holding facilities is greater than the Federal government's financial capability to care for them,

THEREFORE BE IT RESOLVED, PLC will work to encourage the BLM to allow federal grazing permittees to purchase wild horses without title restrictions.

HORSE HARVESTING AND PROCESSING

WHEREAS, the method of euthanasia employed by processing facilities that harvest horses is a humane end of life, and

WHEREAS, there is a continued need for the humane harvest of horses to prevent the inhumane treatment of horses that would suffer from neglect and abandonment, and

WHEREAS, there exists an extremely insufficient infrastructure and no funding mechanism to support the humane existence of unwanted horses, and

WHEREAS, unwanted horses are processed into products that are consumed by humans in overseas markets, and

WHEREAS, the value of unwanted horses as a food animal dictates they not be abused, lest this value be diminished, and

WHEREAS, the cattle industry depends upon an economically healthy horse industry and systems to offer a humane end of life for unwanted horses

THEREFORE BE IT RESOLVED, PLC opposes any horse harvesting and/or processing prevention act and any such legislation that would prohibit the humane harvest of horses for any commercial purposes.

John Harris

Mr. Harris, a veterinarian in Grand Junction, has lived in this area for 51 years. Mr. Harris has been to the Little Book Cliffs Wild Horse Range and has seen the range as well as the horses, which are beautiful.

Mr. Harris read an article in a veterinarian publication several years ago entitled “Hungry Horses – Hunger People”. At that time, Mr. Harris was on a Board of Practitioners Director of the National Association of Equines (NAE) where practitioners and wild horses were also topics of discussion. Because of the tremendous expense of taking care of these horses, the NAE was not against humane euthanasia, at that time.

Shortly after, laws were passed by Congress requiring the humane transport and euthanasia of the horses, most of which were taken to Mexico to slaughterhouses that were inspected by veterinarians from the United States to make sure they were killed and handled in a humane manner. Other animals are part of the food chain and all animals deserve the same humane treatment.

Big changes have been made in the past several years. A professor and advocate at Colorado State University has simulated really big changes in handling of livestock. There has been a discussion within the NAE of calling horses livestock or companion animals, but it doesn't matter – all animals should be treated humanely.

(The remainder of this page was left blank intentionally.)

Lucy Powers

Ms. Powers indicated that she is so glad that she came to the meeting. She had written an e-mail letter, which should have been received by BLM.

Ms. Powers has been following wild horses and the Board since 2012. She has done research and been a professional journalist who has always wanted the facts to dig deeper, and there is a lot of deep stuff here.

Ms. Powers letter stated that sales should be used as a public business, stop and start over. Get a mission and do it right. What has been going on is not right.

It is a business, it can work, but, there are too many people pulling strings, which is not honest or transparent. She has had business and has been involved in government. If BLM were her business, she would stop everything and start over, regroup, and do it right.

Jim Hyrup

Mr. Hyrup indicated that he is not here to represent anyone else or an organization. These are his thoughts and his thoughts only.

Mr. Hyrup thanked the Board for its hard work and dedication. We need pursue solutions for successful gathers. Many view a successful gather as one that safely and as humanely as possible removes all targeted horses from a designated area. All adoptable horses should then be placed in a holding facility as close to the gather site as possible. We then must follow up with successful adoptions. More successful adoptions may occur by taking potential adopters prior to their adopting. Adopters and their new mustang should complete a training program together. We can make available follow-up training, counselling, and compliance checks.

Of equal importance, we all have to be realistic and accountable regarding unadoptable horses, which will require considerable compromise by all involved. Our society has taken horses from work animals to pets in the eyes of many Americans. Pets that are costing our country uncountable challenges, which are crippling many segments of government and society. Through due diligent work, compassion for horses, better understanding of the people on the other side of the fence, we must and will find a workable solution. All involved will have to compromise until it hurts. We must save our western American heritage – the mustang. Realistically, we cannot save or afford to save every mustang. Many range where they do not belong, many are where they belong but there is no space for more.

Chris Colflesh

Mr. Colflesh thanked the Board for the opportunity to provide his comments and is representing the White River and Douglas Creek Conservation Districts, which are located in the northwest corner of Colorado in Rio Blanco County. This area is home to the Piceance – East Douglas HMA, which has an AML of 135 to 235 animals. Current population estimates are over 800 animals in the County (within and outside of the HMA).

Unfortunately, if conditions continue as they are, given current production rates, we could see 1,600 horses by 2021. They realize the HMA is not “high on the totem pole” in terms of numbers, but they don’t want to get that way. Under its current management, the wild horse and burro program is not sustainable, unless all tools provided for through the Act are made available. The only solution large enough to address the situation is being able to use all the tools provided in the Act.

Some groups claim that fertility control and adoptions will solve the problem, but, the reality is an adoption rate of 3,000 to 3,500 animals with a recruitment rate of 12,000 to 14,000 foals. Mr. Colflesh went to school in Meeker and the math doesn’t add up for him. Fertility control is part of the solution, but only after AML is reached.

The Conservation Districts, respectively, requests the Board continue to support the hard decisions and large enough solutions that will truly address the situation we are in.

Patty Painter

Ms. Painter read from a prepared statement that is provided below.

Patty Painter

Oct. 17, 2017

BLM Advisory Board:

In the last weeks of WWII, General George Patton, Colonel Charles Reed, and many courageous soldiers of the 2nd Cavalry, U.S. Army risked their lives, reputations and standing in the military to save the Austrian Lipizzaner horse in Czechoslovakia from use, abuse and slaughter. The Lipizzaner is a symbol of Austrian identity; just as the American Wild Horse and Burro are symbols of the American West today.

There is a place in this world for living symbols. These are priceless animals; not in terms of bloodlines like the Lipizzaner, Arabian and Thoroughbred of the old world (though some would argue about the old Spanish blood); but in terms of the priceless principles of freedom, family bonds and the wild, untamed spirit they represent. Qualities this country was founded and grown upon. Now there are only small pockets of land where they remain and share with conflicting interests. These horses and burros are the only species, other than the eagle, that are protected by law. But their "protection" has come at a huge cost— round-ups or "gathers", holding facilities and now possibly slaughter. Today the wild horse and burro are at risk of becoming endangered species; possibly destined to be controlled/managed by more round-ups, transport, holding and slaughter.

Decades of misguided management by BLM bureaucrats and the pressures of the moneyed interests- energy and grazing- for the use of the land are behind the massive removals of the last few years. Last year, this Board, with the exception of one courageous member-the humane advocate- recommended slaughter as the solution to the problem of too many horses in holding and the resulting expense. It was unbelievable! Now we see it happening, just a Senate vote away.

You all must know that horses are not cattle! They are not dumbed down by breeding for meat production. Slaughter is a common way to get rid of problem, unwanted, sick or old horses but to take healthy wild horses and burros of all ages from a life of relative freedom, capture and ship them to slaughter-unconscionable!- that is what the 1971 Wild Horse and Burro Act intended to prevent!

It is not rocket-science to see where this agenda is headed. These animals, in the wild do not have any chemicals in their systems; there is a market in the world for untainted horse meat. IT appears that these horses and burros may be destined to become a commodity, once the problem of too many horses in holding is dealt the "quick-fix". The minimal use of PZP vaccine in the past and future and the round-up to slaughter trail seems to be the means the Dept. of Interior and BLM want to use to control the populations on the range.

What needs to happen now and should have happened before, is that both sides of this issue need to lay down their arms, stop pointing fingers and blame, get together talk and listen to each other and create new, humane solutions to these problems for the benefit of the living symbols that these horses and burros are.

symbols these horses and burros are. Let the example from recent history be our guide - the enemies the US, Germany, Austrian, Czech soldiers came together for the good of the Tip-izzano horses. Now as much as ever in our history, we need these living symbols to encourage and renew hope in the spirit of this country.

I sincerely hope that you all will find it in your hearts, to open your minds and work together with others of different points of view to create, discuss, decide and act upon other humane and respectful solutions, besides slaughter, to resolve these problems for our national, citizen-owned living symbols of the American West.

Respectfully submitted -

Patty P. Painter

P.O. Box 306

Ridgway, CO 81432

970-262-4188

P.S. I apologize for the last handwritten paragraph. I use a computer at the library and they closed before this was finished.

P.P.S. If the senate votes to change the sale restriction language to open the door for slaughtering these horses and burros, what will be done to honor the lives of these victims of American greed? Will you be there?

(The remainder of this page was left blank intentionally.)

Rea Rutledge

Ms. Rutledge read an excerpt from a book entitled *If There Were Courage: A Walk on the Good Red Road* by David Glenn, who was Ms. Rutledge's neighbor and died two years ago.

Why should one care? Why? What is it that can ignite the fire of compassion? Perhaps it is the memory of debts unpaid to these beautiful creatures. Or, perhaps it is simply the wild horse itself that offers the spark to the flame – the flame that should never be extinguished – a flame that burns from both ends. If you knew the equine only to meet in the middle, each burning more brightly together than each on its own.

To spend time with wild horses is to spend time in the presence of magnificence. As it is to turn back the clock, it is to see those who have offered us their backs in their natural state. It is to see them beyond our desires and needs is to see them before their offering, before their acceptance, before our forgetfulness, it is to see them for what they are.

A more beautiful form in motion would be hard to imagine with long, unkept mane catching in the wind, wild eyes flashing and peering deeply into one's soul, unshod hooves pounding the earth in blurred, thunderous movement, every last ounce of their being expressing their reality. A reality filled with wild grace, power, and freedom. A reality that draws us inexplicably to them through our shared primal love and need for movement.

To experience the swift charge of a herd stallion as he bears down upon you with head tossing and nostrils flared to hopes that as he pulls up short, dirt exploding through the air and reigning down at your feet. To peer through the dust of the moment, your adrenaline surging only to see the intelligence and promise of kindness ...

Ms. Painter indicated that she was against slaughter. There is nothing humane about slaughter.

The two-minute warning was received, and Ms. Painter was asked to stop.

Mike Berry

Mr. Berry indicated that he has been in the range management business for the past 18 years and involved in agriculture his whole life. Mr. Berry has also had horses for his entire life. He likes them as much as anyone. No one wants to see all horses gone, but it is totally out of control.

Mr. Berry had done for work for BLM and the FS in places where there are horses and they can do a lot of damage. In fact, they do more damage than any other domestic animal.

Since the *Wild Free-Roaming Horses and Burros Act of 1971*, was signed, the BLM hasn't been able to take care of their obligations. Every time they try to do something, someone sues them and stops whatever they're trying to accomplish. These horses need to get gathered down to AML, but they can't do it because people who use emotion (not logic or science) to run their agendas.

Because BLM's hands are tied by these lawsuits, the Act has done more damage to the wild (feral) horses than if the Act had never been implemented. Now, it is against the law for ranchers to manage the herds the way they use to, and now we have a bunch of inbred problems.

(The remainder of this page was left blank intentionally.)

Mary Markey

Ms. Markey came from Cane Creek, Arizona, is a Vietnam veteran and a registered nurse for over 32 years. Her husband was a World War II veteran and lived near Lovelock, Nevada. He joined the Navy two weeks before he was supposed to graduate from high school. As she was growing up, he would tell her about the horses running on the range.

Horses are very adaptable and very intelligent. They are classified as farm animals but pigs, cattle, goats, and sheep. Anyone who knows the horse knows that the horse isn't anything like those animals. Actually, the horse was found to be more like the elephant. Both of those animals travel in family groups and have leaders. They also learn from memorization and once they learn something, they never forget. Unlike humans whose memory must be refreshed at times to remember.

Some scientists believe that intelligence is based on the map of the brain size. Horses brain size is one-one half to two pounds, which is the same size as a 12-year human brain. There have been studies that showed that horses can be taught to do math and to read. Horses brains; however, developed in a different direction from humans. That is not what they wish to do.

I work in the medical field. I see hearts being taken out of dead humans and put into other humans to extend their life. We talk on cell phones in almost every place in the world (except for two places where she drove through coming to Grand Junction). We have internet on our phones. We have our whole work calendar on our phones. We have cars that can drive themselves. I find it impossible to believe that when humans get together and put their predatory sides aside, that we cannot find a way to save these horses.

Acronyms

AML.....	Appropriate Management Level
AUM.....	Animal Unit Month
FLPMA.....	Federal Land Policy and Management Act
HMA.....	Herd Management Area
MHF.....	Mustang Heritage Foundation
NAE.....	National Association of Equines
NCBA.....	National Cattlemen's Beef Association
PLC.....	Public Lands Council
PZP.....	Porcine Zona Pellucida
RMEF.....	Rocky Mountain Elk Foundation
SWAT.....	Sand Wash Advocate Team
TIP.....	Trainer Incentive Program
UDWR.....	Utah Division of Wildlife Resources



U.S. Department of the Interior
Bureau of Land Management

NATIONAL WILD
HORSE & BURRO
ADVISORY BOARD

Grand Vista Hotel
2790 Crossroads Blvd.
Grand Junction, Colorado

October 18 – 19, 2017

Volume 4

Written Public Comments
Submitted to the Board

U. S. Department of the Interior
Bureau of Land Management

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A public comment period was conducted from 3 p.m. to 5 p.m. on Wednesday, October 18, 2017, allowing 51 speakers opportunity to address the Board. Each speaker was asked to limit their presentation to two minutes to ensure all speakers had opportunity within the timeframe identified for public comment. Speakers were encouraged to submit their comments in a written format.

A summary of the individual presentations given, and written comments¹ submitted at the meeting as well as public comments submitted to BLM through the Advisory Board's e-mail address at whbadvisoryboard@blm.gov are provided below, and in Volume 3.

Public Comments Presented or Provided at October 18 – 19, 2017 Meeting

Central Oregon Wild Horse Coalition

To: National Wild Horse and Burro Advisory Board
Public Comments

October 18, 2017

This Wild Horse and Burro Advisory Board meeting, October of 2017, should be a routine, uneventful, poorly-attended, perhaps even tedious, affirmation of 46 years of steady advancement in the progressive management of America's wild horses and burros:

Populations are stable; herds are healthy and robust.

Adoptions are equal to the number of horses and burros offered, and a waiting list anxiously attaches to any announcement of the rare occurrence of a small gather. The Mustang is prized as a working partner and celebrated for his exquisitely noble and intelligent nature.

Rangelands bloom with spectacular diversity and vigor; streams are cold and deep with native trout gliding casually from pool to pool; pollinators glean from the blush of bursting petal and stamen; pronghorn cover expansive valleys with the glint of evening sun resting on the mass of tawny backs like an endless halo.

Foals play.

No helicopters threaten. No horses thirst. No rifles recoil.

Instead of this scenario, we are gathered against our own government, under a cloud of unthinkable gloom. Managing agencies have effectively squandered the decades since the Wild Free-Roaming Horses and Burros Act in deference to the tired abuse of stockmen's associations, corporate gold diggers, and energy-pumping monsters. Adherence to the law and respect for the horses and burros degenerated to a pervasive indifference, then to abject disregard for the law and disdain for the horses and burros.

¹ Photos were removed from written comments to facilitate transmission of documents electronically. Original comments that include the photos are available from BLM, upon request.

The Act still stands; as one of the paramount examples of this nation's capacity to rise in compassion and resolve; in recognition of the value of heritage, the magnificence of Nature, and the sacredness of Life. And yet, the protections of the Act were systematically picked apart, misconstrued, ignored, defiled; almost immediately upon passage.

Some have asked if this was accomplished legislatively. In a technical sense, it may have been. But it was not done democratically, or scientifically, or ethically, or according to the will of the people.

However, if it was presumed that the proposed "final solution" had finally dropped into a fertile field of acceptance, due to these years of stealth fully-synthesized belief in the hopelessness of the wild horse and burro "problem" where genocide is the only remaining option, this was a gross miscalculation.

This broken America will not soon unite over a wall, a healthcare crisis, or guns. But we will come together rapidly and with singular purpose and with blind rage when our wild horses and burros are destroyed; needlessly, callously, and criminally. This response is germinating now in anticipation. And the ire will grow at a rate commensurate with the insane level of arrogance and stupidity being witnessed at the highest echelons of government to the lowest dank dwellings of internet trolls.

We will not tolerate this contemptible treatment of the citizens of this country, and we will not tolerate this contemptible treatment of the wild horses and burros of this country. This is our boiling point. These are our wild horses and burros. They do not belong to BLM, Protect the Harvest, the American Farm Bureau, Wildlife Society, Forrest Lucas, or to the National Wild Horse and Burro Advisory Board when the Board has ceased to be vigilant over the wild horses' and burros' welfare as required by law.

This is, in a very dismal sense, a meeting of critical importance, and a crossroads of great historical significance. History is unkind to nations which default to mindless and violent solutions.

Please listen to us.



GAYLE HUNT

Central Oregon Wild Horse Coalition
5326 SE Bridge ct.
Prineville OR 97754
541-447-8165

Debra Matthews

To BLM Advisory Board:

In place of doing gathers and long term holding for the wild horses, I recommend the use of fertility control, primarily PZP. Not only has this been proven to be effective in several wild horse management areas, Assateague, Pine Nut, Little Book Cliffs, it would also be a money saver in the long run in comparison to lifetime costs per horse in long term holding. This would also eliminate the need for large gathers on the range.

This year the U.S.F.S. Prineville, Oregon started application of PZP to the Big Summit Herd to help manage populations. The privately managed Silver Lake Herd located out of Castle Rock, WA. Also had volunteer members trained and will

start applying PZP within the next 3 months—the studies they have done have shown the areas that have used PZP for years have been able to control the population levels to 0% new growth in the herds.

When doing gathers there should be excess horses gathered and treated with PZP, then re-released.

The BLM needs to seriously find a solution for the future to prevent what is currently happening with the wild horses. There is a lot of bad PR right now surrounding BLM, the use of PZP and being able to keep wild horses on the range would help get the PR problem under control. Like the Little Book Cliffs—Friends of the Little Book Cliffs, Silver Lake Herd, Central Oregon Wild Horse Coalition, the Pine Nut herd, many volunteers put in hours to help the different entities in charge of the herds keep the environment impacts and health of these herds at the forefront. The Wild Horses/Mustangs are an American Heritage, part of the fabric of our country.

Adding a statement from Dawn Perrine from the Pine Nut Herd:

“ Application and training of PZP would be a perfect job for military personnel returning from war. BLM could pay, which would be much cheaper than roundups and long term holding.”

I have been involved with the Big Summit Herd out of Prineville, Oregon for many years now. We do a voluntary count of the herd each year and document impacts to the environment, whether human or animal caused. There are so many people involved voluntarily with this herd, volunteers should be promoted for usage in all HMA's. I have also seen many wild horses from Oregon, Idaho, Montana, and Wyoming, these horses looked to be in good health and the environments they were boasted other wild life. Thank you,

Debbra Matthews.

Linda McCros

Fwd: Wild Horses

1 message

Debra Matthews <jdsfarms100@gmail.com>
Matthews <jdsfarms100@gmail.com>

Tue, Oct 10, 2017 at 7:01 PM Debra

To: me <jeff9toes@gmail.com>

Can you print

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From: "Linda Mccrow" <ljmccrow54@gmail.com>

Date: Oct 7, 2017 2:30 PM

Subject: Wild Horses

To: <jdsfarms100@gmail.com>

cc:

To BLM Advisory Board:

In 1971 the United States government enacted the Wild Horse and Burro Act. You were given the job of protecting and preserving an icon of our American heritage, the wild mustang; and many American tax payers, feel that you are not doing these magnificent beings justice.

The numbers I will be using are approximate, due to differing studies, but are close enough to be fairly accurate.

As of 2015, there are approximately 45,000 wild horses in government holding facilities. These facilities often do not have adequate shelter. In the wild the horses are able to move to find what they need, not in the shelter.

The BLM spends 60% of its Wild Horse budget on keeping the horses in these facilities. You spend only 1% on herd size management (contraception). PZP has proven very effective, as shown in its use on the ponies on Assateague Island. Yet you resist its use elsewhere. Why? With the increasing numbers in holding pens, you are creating a crisis in numbers which you are wanting to solve by selling these horses and burros for slaughter. Please do not use the word euthanasia. That is done for a humane reason. Slaughter is done for monetary gain.

There are approximately 33,000 wild horses and burros on 25 Million acres of BLM managed lands. There are 2.1 Million cattle on these lands. This is Public land, not a BLM grazing area. As a taxpayer, I do not approve of this use of our land. At the current rate of \$1.69 per head that comes to about \$3.5 Million collected from ranchers for the use of Public land. The ecological effect of 33,000 wild horses and burros is much smaller than the effect of 2.1 million cattle. Just common sense.

The National Academy of Sciences published a 2-year study that showed that removing and warehousing the horses and burros is expensive and unproductive. They recommended widespread and consistent application of fertility control. The BLM has resisted this recommendation, sighting cost. It will cost much less than housing the animals and will be more effective on managing herd size.

As of now, there is a rising number of horses in holding facilities and a declining number of adoptions. Only an average of 2500 horses and burros are being adopted annually. At that rate it would take 18 years just to adopt out the current horses, not including the horses you gather in that time.

During the gathers, for lack of a better, more accurate word, the horses are terrified by a helicopter chasing them into the catch pens. Mercilessly pursuing them. Families are torn apart. Mares separated from their foals. Terrified foals not able to keep up with frantic mares. Stallions trying to keep their families together. Horses die from the pursuit. They die or are injured trying to escape the catch pen. They are killed by humans if not deemed perfect enough, even if they have survived years in the wild.

Due to not screening applicants on horse skills, some of them are adopted by people who love the romantic idea of owning a mustang, but are not equipped with the knowledge or skills to gentle and train these beautiful horses. So, they end up being sold to others. A few end up in appropriate homes, others to people who are harsh in their methods, and some go to slaughter. Which seems to me the total opposite of your duty to protect and preserve them.

Some are sold straight to slaughter. This is not supposed to happen to these icons of our country, but it is a harsh reality. Have any of your watched the horror these horses go through? These are magnificent beings reduced to terror at the hands of humans.

I implore you to please reconsider the way our wild mustangs and burros are being treated by humans. We are supposed to be compassionate, kind, merciful, and benevolent as human beings. We have been anything but that in our treatment of the wild horses and burros.

Respectively,

Linda McCros

Gail Garson-Korpa

M Gmail

Fwd: MHF » TIP & Prison Programs

1 message

Debbra Matthews <jdsfarms100@gmail.com>

To: me <jeff9toes@gmail.com>

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-----Forwarded message-----

From: "gail garson-korpa" <gagk9528@gmail.com>

Date: Oct 6, 2017 10:57 AM

Subject: Fwd: MHF » TIP & Prison Programs _To:

"Debbra Matthews" <jdsfarmsl00@gmail.com>

cc:

Here's tana's take - all yours. Did the shirt fit even partially.

-----Forwarded message-----

From: "Tana Hunziker" <hololo@sushipeople.net>

Date: Oct 6, 2017 10:14 AM

Subject: MHF » TIP & Prison Programs

To: "gail garson-korpa" <gagk9528@gmail.com>
cc:

Oh, silly me!! Sorry about that!

Both of these programs are exceptional!! Need to do more of these!

The prisons are working with those in Minimum Security and training the Mustangs and are able to sell "trained" Mustangs to people who otherwise wouldn't be able to train them and so don't adopt. I think some of the money is sent back to the BLM/Wild Horse Program. A big win/win!

We knew a trainer who did the TIP program and it is amazing! They also have a yearly or bi/yearly competition for these trainers to show off what the Mustangs can do and how smart they are. Went to one in Eugene and it was amazing.

I think all of the horses were bought. They also have teens work with the younger ones to gentle & halter train them.. some actually rode some of them.

Also, more advertising on TV regarding these programs so people know that they are available and worth adopting!

The Mustangs are soooooo amazing as we have found out. Used to have TW and loved them but our girls are so different in their thinking. They are great for dressage, barrel racing and cow ponies! Not much they can't do and people don't realize how great they are because they don't know how to train them...

Anyway, these programs and getting the message out about trained Mustangs is so important!!

> <http://mustangheritagefoundation.org/tip/> <<http://mustangheritagefoundation.org/tip/>>

Wild Horse Program — ACI - Arizona Correctional Industries

Kelly Bonnie Jackman

Fwd: Re: Wild horses

2 messages

Debra Matthews <jdsfarmsl00@gmail.

To: me <jeff9toes@gmail.com>

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-----Forwarded message-----

From: "KELLY BONNIE JACKMAN" <kelly_jackman@msn.com>

Date: Oct 9, 2017 9:31 PM

Subject: Re: Wild horses

To: "Debra Matthews" <jdsfarmsl00@gmail.

cc:

October 9, 2017

To The Wild Horse Advisory Board:

Managing wild horses and burros on the range in a humanely manner is extremely important for the American people. Using the fertility vaccine PZP for reproduction with a goal of attaining close to zero population growth for the longevity of the wild mustangs on the range. Protect predators in Herd Management Areas. Reduce livestock grazing on lands managed for wild horses. Restore lost wild horse rangeland. Enlist volunteers to monitor, document and help administer PZP vaccines to herds on the range. Provide adequate shelter for all horses in holding facilities. Return wild horses in BLM short term holding to repatriated herd management areas and herd areas. Stop helicopter round ups. Use bait trapping or darting for application of PZP. Wild free-roaming horses and burros are living symbols of the historic and pioneer spirit of the West. They contribute to the diversity of life forms within the Nation and enrich the lives of the American people.

Greatly Appreciated,

Bonnie Jackman
20815 NE 263rd Street
Battle Ground, WA 98604
(360) 687-1252
Sent from Outlook

Adrienne Ray

To Whom it May Concern,

I am in favor of any and all support to keep our wild horses and burros safe from harm while also finding and funding effective and humane methods for managing herds for sustainable numbers,

I am a huge supporter of the Teens and Oregon Mustangs program which has helped to place hundreds of wild mustangs into loving homes while also providing valuable skills to teens and adults alike. I have witnessed the growth of this program from its inception when it was just a tiny little venue to its most recent auction that was the highlight of the Albany, OR expo and drew huge crowds. Not only did I build their current website and thus know the program well, but I adopted two of the mustangs from last year's auction and am participating in gentling one for this year's auction. I feel programs like the Teens and Oregon Mustangs and other gentling programs do a great service in helping to manage herd numbers. These programs and other humane measures to keep populations in check get my full and continued support.

Sincerely,

Adrienne Ray

Owner: Equine Online Design

Fwd: Re: Silver Lake Herd

1 message

Debra Matthews <jdsfarms100@gmail.com>

Tue, Oct 10, 2017 at 7:01 PM

To: me <jeff9toes@gmail.com>

Can you print

----- Forwarded message -----

From: "samie22222" <samie22222@aol.com>

Date: Oct 3, 2017 6:46 PM

Subject: Re: Silver Lake Herd

To: "Debra Matthews" <jdsfarms100@gmail.com> cc:

Good evening,

Thank you for being interested in this herd. We do capture some to help with population control but the herds lately have been problem herds going on private lands and causing issues.

As for the population control we just finished up with a class for the pzp to allow us to start using it and hopefully be starting pzp in the next few months.

Hope this answers your questions
Samantha

Sent from my Verizon, Samsung Galaxy smartphone

-----Original message-----

From: Debra Matthews <jdsfarms100@gmail.com>

Date: 10/3/17 2:12 PM (GMT-08:00)

To: samie22222@aol.com
Subject: Silver Lake Herd

I am trying to gather info on methods of population control on Wild Horses. I know the Silver Lake Herd is privately managed. I will be attending the BLM Advisory Board meeting October 17, 18, and 19th in Grand Junction, Colorado. It looks like only gathers take place for this herd--is there any other types of population controls used? The report I am doing is focused on PZP fertility control. Trying to present cost effectiveness in comparison to gathers and holding pens.

Thanks,

Debra Matthews

360-687-3321

jdsfarms100@gmail.com

Horse Heaven (Rancho Khasan Proposal)

Horse Heaven

Rancho Khasan Proposal

For Adoption of all confined BLM mustangs

Save our national Mustangs from BLM Dog Food!

On the western Pacific Rim lies the Russian Far East extending from

Korea and Sea of Japan north to the Aleutian Islands and the Bering Strait of Alaska. Mustangs can easily adapt to this country with summer monsoons and plenty of dry grass through the winter.

Welcome to Horse Heaven, the elegant solution to the tempest about Mustangs in the American West.

This paper is primarily for the initiated, however, Congressmen and their tax paying constituents can read <http://www.nationalgeographic.com/adventure/features/environment/wild-horses-part-two/> and http://dailypitchfork.org/wpcontent/uploads/2015/11/BLM_USFS-grazing-analysis_2014_DailyPitchfork.pdf and <https://www.blm.gov/basic/programs-wild-horse-and-burro-news-fy18-budget-statement> for a general description of today's state of the wild horse 'problem'.

000 Rancho Khasan is a Russian-American company of international cowboys who have a solution to overpopulation of 45,000 captured and impounded mustangs kept at the expense of \$49 million to the annual Federal budget. In 2011: <https://www.blm.gov/live/pdf/budget-overview.pdf>.

Solution? BLM has the remaining budget to repatriate all 45,000 captive mustangs to Horse Heaven in stock bereft Russia that is eager to invite the horse "plague" where they are wanted and needed. Transcontinental adoption, with freight offset, meets Trump Administration goals to cut Wild Horse and Burro budget through removal of healthy young inventoried horses.

Do Alternatives to Slaughter Exist?

In spite of DOI, BLM, Ben Masters, Advisory Board and other's denial that simple, low or no cost alternatives to slaughter readily exist, Rancho Khasan provides witness that they have known about the Horse Heaven Solution before the Trump Budget cuts effecting 1971 mandated BLM responsibility.

Vickery Eckhoffs Pitchfork article suggests that the wild horse ecological problem is not one of overpopulation, but of overconcentration. The history of the wild horse in WA State is a case in point. However, legislation prohibits expanded and/or new HMA's.

<https://www.law.cornell.edu/uscode/text/16/1339> Rancho Khasan, however, offers unlimited habitat expansion to new 'HMA' by shipping across the Pacific, a repatriation to ancestral Asian habitat.

Read our original proposal and correspondence with BLM Chief Dean Bolstad and his staff, citizen's Horse Advisory Board including Ben Masters and mustang NGO's in attached Communications paper.

See our updated proposal; why Horse Heaven solution should be supported.

Avoided Cost Alternatives

There is still a window to save the horses from slaughter within the present budget and other resources. \$11 million is enough to pay transport for 20,000 mares; leaving a fraction of the estimated \$24 million 2017 balance to pay resettlement costs for keeping the 20-50,000 horses in lush pasture; forever. Financial analysis? Inventoried horses can cease to be a BLM liability, leaving zero future cost. Horse Heaven solution will avoid the inevitable litigation costs of slaughter campaign, staging auctions, artificial glut on the meat markets, consumer fraud with ersatz beef. All costs and public angst can be avoided by simple live export. After inland freight, vet checks, quarantine and paying for delivery, the BLM has zero ongoing cost. The horses cannot swim home, nor would they want to.

Patented land and forty nine year leases are assets of Rancho Khasan Horse Heaven project in Siberia and Far East of Russia; part of the original evolutionary habitat of horses. The grazing can be expanded at will with short notice from South tip of Khasan north to Yakutsk over some years natural dispersal. (See pg. 4 for more) The lush unused pastures and endangered predators beckon wildly. International understanding is a benefit. Carbon sequestration benefits.

Congressional bipartisan cooperation for an elegant solution to public controversy and anti-government sentiment is disarmingly logical. The mustangs and all parties are the winners.

Horse people, do not despair, Rancho Khasan will abide by 1971 Wild Horse and Burro rules of horse care and life preservation to high or higher degree than since 1971. see: Russia addendum

For more about the Mustang Heaven locations see: Russia addendum.

New Updated BLM PROPOSAL

BLM and USFS Contract Terms with 000 Rancho Khasan

Rancho Khasan is encouraged and willing to comply with all the present requirements of US Wild Horse and Burro Act of 1971 as put into practice by US BLM for contract pasture providers; specifically prohibition-of-slaughter provisions and humane care.

Specific elements:

1. BLM allows mass adoption and pays delivery but not transport cost of 20,000 fertile, all age, mares FOB, Port of Zerbino, CIF, Khansanskii Raion, RF by ship. Rancho Khasan shall keep project cost to a DOI Budget Impact of None by utilizing one year's avoided cost line item 2017 budget fraction estimated at \$11.2million sufficient for sea transport by ship and \$185/head first year Asian resettlement cost. See Financial Discussion below.
2. Rancho Khasan, as agency independent of DOI, shall be responsible for loading and transport of animals that are delivered FOB port of origin, Portland, OR, post quarantine, ready to load. Rancho incurs all costs ex West Pacific dock of receipt, including receiving, Russian Customs, inland transportation, quarantine, feed, long term supplemental care.
3. Branded sound healthy horses to be selected to minimum branded unsterilized mares 80% (first shipments) and with preliminary quarantine as normally required of both domestic adoptions and USDA export livestock with vet checks and records. We reserve the right to turn back (select out) up to 5% of individual horses at final loading point for health, conformation and genetics criteria.
4. Should BLM elect, Rancho Khasan agrees to accept and ship healthy, sound geldings on the same basic terms as mares, but with \$195 Asia initial settlement fees.
5. Rancho Khasan anticipates its ability to acquire land and facilities adequate for care of 45,000 horses within two years. BLM shall deliver the entire number on a schedule as determined by both parties.
6. 000 Rancho Khasan is uniquely qualified to deal with the multiple Russian Administrations and famous bureaucracy, permitting, land acquisition, and Asian management that is a possibility to include opposite border Heilongjiang and Jilin Provinces of China. We have trilingual diploma staff; English, Russian and Mandarin. We shall endeavor to open source negotiation and monitoring on cost shared basis with the multitude of wild horse and animal rights NGO's.
7. We avail ourselves to negotiate from neutral perspective, if not satisfaction to all interested public and private parties to mollify even the most Bundy extremes of both sides of the controversy.

Public relations is our express focus, in and out of contractual obligations. We are open and invite all interested people, including BLM inspectors, ecologists, cattlemen to our county horse range and future eco-tourist facility for future inspection of our operation and horses. Our first phase range and base just 1 1/2 hours from International Airport of Vladivostok.

8. Shipping: Australia and New Zealand enjoy big exports of livestock to MidEastern and North African countries who eat Halal live slaughtered & prepared meat (much like Kosher for Jewish.) Exporters use custom livestock transport ships capable of shipping as many as 22,000 cattle in one load. Small ships set up for humane livestock shipping are extremely difficult to find. Cost estimate is \$450/ horse with feed and care, port to port. <http://livestockshipping.com.au/shipping/>

Financial Discussion

Prior to the recent budget cuts a fraction of the one year \$49 million budget would have painlessly paid for the Horse Heaven project without continuing cost to US taxpayers.

So, how to proceed in this uncertain time? We suggest three sources of funding:

1. Residual budget BLM Wild Horse budget appropriations through October of 2018.

2. **Powers of Duty of Secretary, 1 US Code 1333 (e)(3)(B)**

“(3) DISPOSITION OF FUNDS GENERATED from the sale of excess animals under this subsection shall be—

- (A) Credited as an offspring collection to the Bureau of Land Management of Lands and Resources appropriation for the Bureau of Land Management, and
- (B) Used for the costs relating to the adoption of wild free-roaming horses and burros, including the costs of marketing such adoption.”

The Secretary shall direct money from sale of old culled horses to pay cost of keeping the younger than 10-year horses alive.

3. **New Congressional appropriations.**

The same Congressmen of both parties who overwhelmingly voted to expand the new record military budget can find it in their hearts to spare a pittance for our heritage mustangs and give them a new home.

What you can do?

Speak directly with your US Representative office for your District, engage their staff people; ask your Congressman to cosponsor the Congressional appropriation's Wild Horse amendment. The same Congressmen of both parties who voted to expand the record military budget can find it in their hearts to spare our heritage mustangs and give them a new home. Ask your Representative to co-sponsor our new Appropriations Bill.

Don't let the blood of 80,000 wild horses wash the streets of Washington. Horse Heaven is the alternative to polluting the Swamp!

N-4 Grazing Board

July 31, 2017

WILD HORSE & BURRO MANAGEMENT IN THE ELY BLM DISTRICT

A 2017 Assessment of Economic Effects Specific to Livestock Grazing

Prepared For:

N-4 State Grazing Board Connie Simkins, Secretary

P.O. Box 333

Panaca, Nevada 89042

WILD HORSE & BURRO MANAGEMENT IN THE ELY DISTRICT 2017 Assessment of Economic Effects Specific to Livestock Grazing²

Key Assessment Findings

- Representing a crucial business sector in rural eastern Nevada, public land grazing has substantially declined in the BLM Ely District (EDO) from a historic perspective. The downward trend in permitted livestock grazing continues today and results in a corresponding decline in economic activity in rural eastern Nevada communities.
- The original BLM livestock permit adjudication process did not include or consider other large ungulate animal numbers or substantial forage consumption as was introduced by the 1971 Wild and Free-Roaming Horse and Burro Act. As a result, existing and available forage resources in the BLM Ely District were fully allocated to permitted livestock grazing as is currently defined by active and suspended grazing preferences.
- Based on 2017 pre-foal season numbers, the BLM Ely District estimated current wild horse numbers at 9,382 horses. This current agency estimate exceeds the Appropriate Management Level (AML) established in the 2008 BLM Ely District Resource Management Plan (RMP) by 7,687 horses or 434 percent. The horse numbers exceeding AML result in an added grazing pressure of 119,917 animal unit months (AUMs) in the BLM Ely District.
- Based on documented recruitment rates, wild horse herd numbers double every four to six years (NAS 2013).
- If the current wild horse numbers above AML were deducted from the existing permitted livestock grazing on the EDO to address deteriorating resource conditions, a loss of \$15.2 million in permit value and \$10 million in annual production would be realized by the impacted ranchers. Reduced ranch income would result in a secondary loss of economic activity in the regional economy at an estimated level of \$3.5 million annually. Included in this projection would be the loss in annual labor earnings of \$766,269 and 71 jobs.

Introduction

The Ely District (EDO) contains all the federal lands administered by the Bureau of Land Management (BLM) in White Pine and Lincoln Counties as well as portions of Eureka and Nye Counties. The renewable forage resources located in the Ely District were fully allocated and have been for several decades. This region was settled under a setting of unregulated common public lands or open range prior to the existence of the U.S. Forest Service or BLM. During settlement, private land homesteads were established while private investments were made and vested property rights were secured on the adjoining public lands to support a growing range livestock industry. By the turn of the 20th century these unregulated public rangelands were recognized as being over-stocked and moving toward deteriorating conditions. To bring improved resource management and stability for livestock producers, Congress created the Forest Service in 1905 and the BLM in 1934 to administer the respective public land resources under a principle of sustained yield for multiple uses, including livestock grazing (Gates 1968).

With their formation, each respective federal agency initiated a program to regulate and control livestock grazing on the former open rangelands. While differing in their authorities and approach, common features found in both agency programs

² Some information used in this analysis may be dated. However, extreme care was taken to utilize the most current and scientifically-defensible information in this analysis. The source and date of the information used in this analysis is either footnoted or can be found in the Referenced Information section at the conclusion of this report.

included: 1) limiting unauthorized grazing use; 2) issuing grazing permits to qualified individuals in designated areas called allotments; and, 3) developing agency regulations to renew and adjust permitted livestock use to achieve sustainable forage use and improved resource conditions. Based on the agency methods and procedures employed during this grazing allocation process, a strong case can be made that the forage resources located in the BLM Ely District were fully allocated and obligated to permitted livestock grazing. The EDO was formally established on November 3, 1936 (BLM 2007).

There were approximately 720,000 animal unit months (AUMs) permitted to livestock grazing in the Ely District upon completion of the allotment adjudication process in the mid-1960s (RCI 1998 & 2001). The final environmental impact statement for the Ely District Resource Management Plan (RMP) disclosed there were 545,267 AUMs permitted on the District, presumably in 2006 (BLM 2007). This documented downward trend provides a direct measure of the effects that have resulted from past grazing permit reductions implemented in the EDO.

A component of permitted livestock grazing under the BLM program is actual use or licensed grazing use. The 2008 RMP disclosed that during the period of 1998 to 2006 there was an average 220,168 AUMs of licensed grazing use in the Ely District (BLM 2007).

Based on the regulatory requirement that the agency grazing permits would be renewed and reissued to the previous permittee who maintained their qualifications, the resulting federal grazing permits developed a monetary commercial value that are sold through a private exchange prior to a permit transfer. Based on recent BLM permit transactions, this market value is currently estimated to approach \$127 per AUM in the EDO ³.

Also based on the stability and certainty afforded by the federal livestock permitting programs, the range livestock industry continued to develop and flourish in the Ely District. The economic activity and contributions made by this industry continues to represent a crucial sector in the regional economy. From a total ranch production perspective, the most recent research completed by Dr. Thomas Harris at the UNR Center for Economic Development indicates that every AUM utilized under a BLM permit in the BLM Ely District equates to an annual production income of \$84 to the rancher². This rancher income in-turn circulates in the economy through business purchases and family expenditures resulting in secondary contributions to the regional economy in the amount of an additional \$29.32 per AUM. This regional economic activity further includes labor earnings of \$6.39 per AUM and one full-time job for every 1,695 AUMs permitted in the BLM Ely District (e.g., 0.00059 jobs per AUM).

When these values are applied to the average licensed grazing use documented in the 2008 RMP the estimated economic contributions associated with the range livestock business sector become evident as summarized in Table 1.

Table 1

Estimated Economic Contributions from Licensed Grazing Use in the BLM Ely District

Economic Variables	Unit Value	Units	Licensed Grazing Use (1998-2006 Average)	Estimated Value
Permit Value	\$127.00	AUMs	220, 168	\$27,961,336.00
Production Value	\$84.00	AUMs	220, 168	\$18,494,112.00
Regional Effects	\$29.32	AI-JMs	220, 168	\$6,455,325.76
Labor Earnings	\$6.39	AUMs	220, 168	\$1,406,873.52
Employment Jobs	0.00059	AUMs	220, 168	130

³ Thomas R. Harris, PhD. 2017. Personal communication. Professor, Center of Economic Development, Univ. of Nevada Reno. June 6, 2017.

BLM Wild Horse Management

Superimposed on the existing BLM livestock permitting program is the more recent introduction of other large grazing ungulates in the Ely BLM District, including wild horses through enactment of the 1971 Wild and Free-Roaming Horse and Burro Act (WHB Act) and Rocky Mountain elk under the management of the Nevada Department of Wildlife (NDOW). This point becomes particularly important when it is recognized the original livestock grazing adjudication process did not consider or include large numbers or substantial forage consumption by these ungulate species. Based on this limitation the only option to accommodate large populations of these new forage consumers is to reduce the forage capacity and vested rights built into the existing livestock grazing permits administered by the BLM. The proportional relationship between livestock grazing and increasing forage demands from other large ungulate species can be utilized to at least partially explain the previously described decline in permitted livestock grazing that has been observed on the BLM Ely District over the past several decades.

The magnitude of this grazing conversion can be realized by simply following the documented growth in wild horse numbers. Shortly following passage of the WHB Act a comprehensive inventory was conducted in the BLM Ely District. Through this field inventory, approximately 700 horses were located in 29 separate areas (BLM 2007). Previous to the recently completed RMP, the BLM Ely District managed 24 horse herd management areas (HMAs) that encompassed a combined area of 5.5 million acres or about 45 percent of the District (BLM 2007). Through past range studies and agency decisions, these horse HMAs were managed at an Appropriate Management Level (AML) ranging from 1,986 to 2,141 horses. While not tabulated here, the number of grazing allotments affected by these previous horse designations exceeded 100, as evidenced in the attached mapping (RCI 2013).

For the purpose of consolidating and providing more effective horse management, the record of decision for the Ely District RMP reduced the area and number of areas managed for horses to six HMA complexes comprising a total acreage of 3.7 million areas with an AML ranging from 810 to 1,695 horses (BLM 2008). In this agency decision, the historic horse use areas not included in the HMA designations, comprising nearly 1.8 million acres, were re-classified as herd areas (HAS) and the AML was reduced to zero horses.

The location and extent of these new HMA designations continues to affect 32 percent of public lands administered by the BLM Ely District. Recent HMA designations also include portions of 73 grazing allotments that were established and permitted in advance of the 1971 WHB Act. See the attached mapping.

Potential Economic Effects Resulting from Absence of Wild Horse Management

Based on pre-foaling horse census records, dated March 1, 2017, Table 2 shows that the BLM Ely District continues to fail to achieve horse AMLs adopted under the 2008 RMP (BLM 2007).

The cited Ely BLM District records were nearly identical to the current WHB numbers reported on the national website found at [BLM wild horse program data](#). Due to slight discrepancies between the two datasets, this report and analysis relied on the current WHB census records provided by the BLM Ely District (BLM 2017) since this information source was viewed as being closer to the ground and likely had a higher probability for accuracy.

This analysis shows that estimated horse numbers within the confines of the six HMAs exceeded the high AMLs established by the BLM Ely District by the amount of 5,455 horses. Further review of the agency census records indicated there were an additional 2,232 horses located in 13 HAS that were eliminated from horse use in the 2008 RMP. Combining these additional horses with the HMA exceedance of 5,455 horses, produces a combined total of 7,687 horses, as of March 1, 2017, that exceed the high AML designated in the BLM Ely District. These estimates indicated that the current estimated horse numbers, excluding the recruitment provided during the 2017 spring foaling period, exceeded the designated high AML number by a district-wide average of 454 percent.

The National Academy of Sciences (NAS) recently confirmed that most free-ranging horse populations grow at the rate of 15 to 20 percent per year (NAS 2013). This documented horse recruitment level indicates existing herd numbers can double every four to six years without management intervention. Since the horse estimated reported here represent pre-foal numbers, it is a given that the current horse population levels on the EDO exceed the horse numbers reported here by an added amount of 15 to 20 percent and these horse numbers will continue to grow at a compounded rate.

Table 2

Appropriate Management Level (AML) and FY 2017 BLM Estimate of Horse Numbers for Herd Areas/Herds Management Areas Located in the BLM Ely District⁴

Herd Code	Name	HMA/HA Status	Acres	Number of Horses				
				Appropriate Mgmt. Level		BLM Census Records ⁴	Difference from High AML	
				Low	High		Number	Percent
NV401	Antelope	HMA	331,000	150	324	1,033	709	219
NV412	Diamond Hills South	HMA	19,000	10	22	150	128	582
NV414	Eagle	I-IMA	670,000	100	210	1,549	1,339	638
NV415	Pancake	HMA	855,000	240	493	1,800	1,307	265
NV416	Silver King	HMA	606,000	60	128	916	788	616
NV417	Triple B	HMA	1,225,000	250	518	1,702	1,184	229
HMA Subtotals			3,706,000	810	1,695	7,150	5,455	322
NV406	Cherry Creek	HA	27,448			46	46	
NV408	Jakes Wash	HA	153,663			179	179	
NV409	White River	HA	116,060			269	269	
NV411	Seaman	HA	358,834			35	35	
NV413	Moriah	HA	53,312			250	250	
NV512	Mormon Mtns.	HA	175,423					
NV513	Meadow Valley Mtns.	HA	94,521			240	240	
NV514	Blue Nose Pk.		84,622			68	68	
NV515	Delamar Mtns.	HA	183,558			445	445	
NV516	Clover Mtns.	HA	167,998			373	373	
NV517	Clover Creek	HA	33,056			106	106	
NV518	Applewhite	HA	30,297				17	
NV519	Little Mountain	HA	53,035			26	26	
NV520	Miller Flat	HA	89,382			178	178	

⁴ Unless otherwise noted, all information included in this table was derived from BLM (2008).

⁴ Source is BLM (2017).

NV522	Highland Peak	HA	136,071					
NV523	Rattlesnake	HA	71,433					
HA Subtotals			1,828,713		o	2,232	2,232	
BLM Ely District Totals			5,534,713	810	1,695	9,382	7,687	454

For the purpose of directly comparing the identified current level of horse use in the EDO to permitted livestock grazing, the value of 7,687 horses can be converted to common denominator of AUMs by multiplying this number by an animal unit equivalency factor of 1.3 (Ensminger 1978) and then taking this sum and multiplying it by 12 months in a year to obtain a total of 119,917 AUMs. This converted number, 119,917 AUMs, represents the amount of animal use (or forage consumption) that can be directly attributed to grazing 7,687 free-roaming horses on a yearlong basis.

The application of the previously presented economic variables can be applied to this estimate to demonstrate the economic effects that would result if this excess horse use was subtracted from the existing BLM livestock grazing permitting program. The results from this analysis are shown in Table 3.

This analysis indicated that a reduction in licensed grazing use for livestock, in the amount of 119,917 AUMs, would produce a loss of \$15.2 million in permit value and \$10 million in annual production value for the impacted ranchers. Since the impacted ranchers would have less cattle and disposable income, there would be a tendency to spend less money in the local economy. This reduced ranch expenditure would result in a loss of activity in the regional economy that is estimated to approach an annual amount of \$3.5 million. Included in this projection would be a loss in annual labor earnings of \$766,269 and 71 jobs.

Table 3

Estimated Economic Effects from Reducing Licensed Grazing Use for Livestock in the BLM Ely District by 119,917 AUMs

Economic Variables	Unit Value	Units	Licensed Grazing Use for Livestock	Estimated Value
Permit Value	\$127.00	AUMs	-119,917	-\$15,229,459.00
Production Value	\$84.00	AUMs	-119,917	-\$10,073,028.00
Regional Effects	\$29.32	AUMs	-119,917	-\$3,515,966.44
Labor Earnings	\$6.39	AUMs	-119,917	-\$766,269.63
Employment Jobs	0.00059	AUMs	-119,917	-71 Jobs

Conclusions

Based on the past track record of 45 plus years of administrating the WHB Act, and the continued failure by the agency to effectively gather and dispose of excess animals, it remains highly improbable that the BLM will achieve and maintain horse numbers at established AMLs. Attainment and maintenance of horse levels at AML has yet to be achieved in this federal program, and based on the politics and funding issues that are at play, there is little reason to believe that this program status will change substantially anytime in the near future.

Lacking alternative options, and in consideration of the continued agency requirement to manage public lands for a thriving ecological balance, it also remains highly probable, if not a certainty, that the added forage consumption from excess wild horses will continue to increase and adversely affect livestock grazing levels currently permitted by the BLM Ely District.

This analysis shows that the agency action of converting existing permitted livestock grazing to wild horse use has a significant economic effect on the impacted ranchers and the residents and businesses located in the Ely District.

All indications are this same threat is occurring throughout Nevada and the West in areas inhabited by wild horses. The continued mismanagement of wild horse populations is detrimental to rangelands and stream zones, including wildlife populations, and can certainly be expected to lead to significant economic impacts to public land ranchers through pending administrative cuts in permitted public land grazing. These potential economic effects will further reach a point where it adversely affects the cultural heritage and the quality of life for area residents located in dependent rural western communities.

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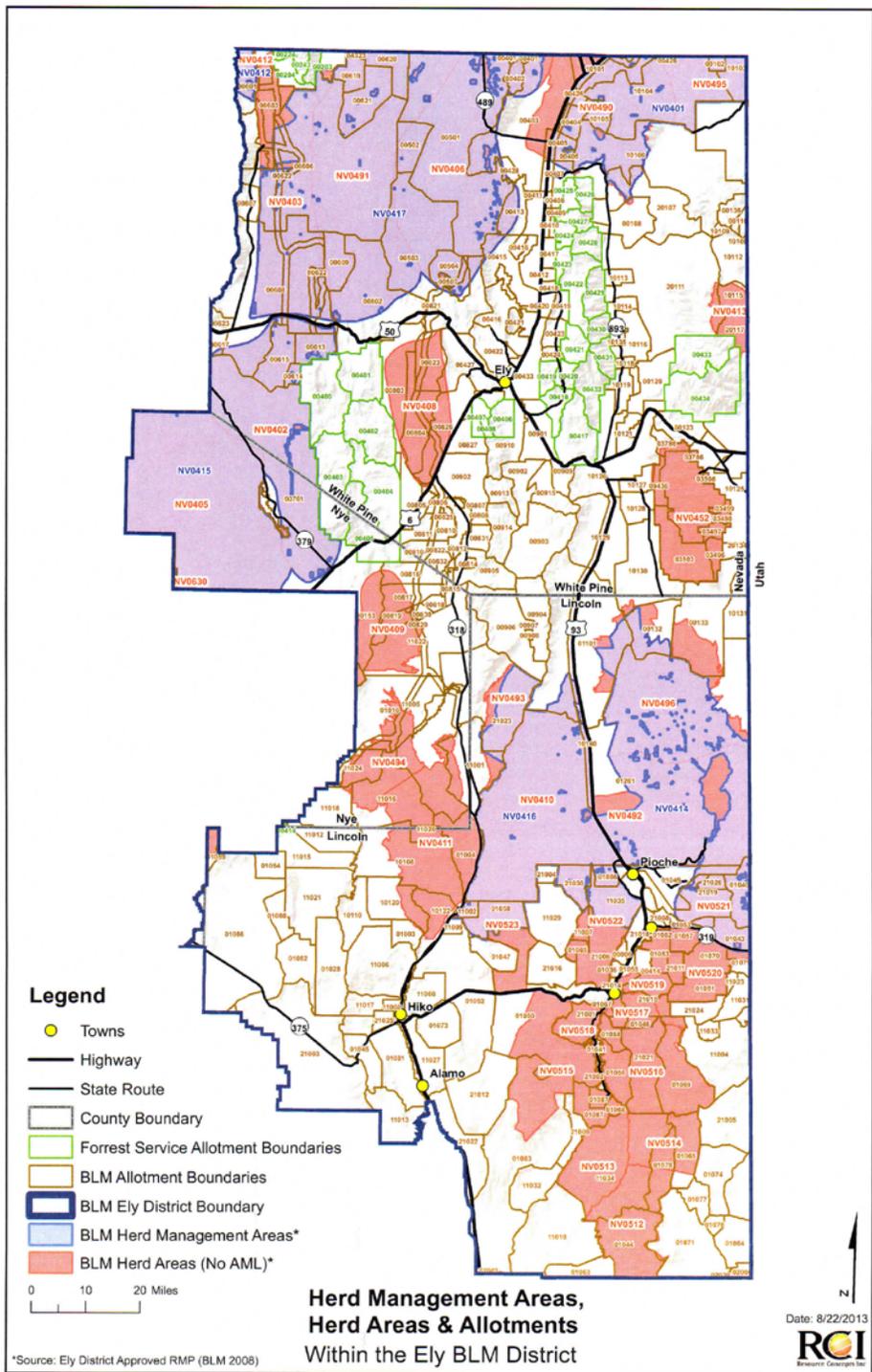
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Wild Horses and Burros Transition Paper

Issue

Wild horses and burro (WHBs) populations on public lands in the West are out of control. They are doubling in numbers every four to five years and are having serious impacts on the health of the land, wildlife, other land uses. Every year more and more horses are suffering death by starvation and dehydration. According to the Bureau of Land Management (BLM), excess horses gathered and placed in holding facilities have become a \$1 billion obligation for their lifetime care. Administration and Congressional limitations have favored "horse advocates" thereby creating an impossible management situation.

Facts

In 1971, Congress passed the Wild Free-Roaming Horses and Burros Act (WFRHBA), that declares "Wild free-roaming horses and burros [as] living symbols of the historic and pioneer spirit of the West;" to be managed as "components of the public lands;" in a "manner that is designed to achieve and maintain a thriving natural ecological balance."

Budget: FY 2015 \$77.2 million \$49.4 (66%) of the FY 2015 budget spent for off-range holding facilities

FY 2016 \$80.6 million

FY 2017 \$80.1 Requested

BLM estimates 67,027 wild horses and burros roam across 10 western states as of March 2016. This population estimate exceeds the ecologically based appropriate management level (AML) of 26,715 animals. More than 40,000 excess animals are currently on BLM rangelands (149% over capacity).

3,000 — 5,000 WHBs are removed from the range annually based upon available budget, holding facility space, and anticipated adoptions. There are nearly 48,000 WHBs in off-range pastures and corrals with a per animal life-time cost of nearly \$50,000. Most gather, and other management activities have been litigated by "horse advocates."

These management actions are not effective in reducing population growth. Population projections:

2020 = 112,000 animals on range

2024 = 198,000 animals on range

2028 = 366,000 animals on range

Summary of the Current BLM Management Model

1. Set on-range WHB appropriate management levels (AML) based on multiple use rangelands and ecological thresholds.
2. Identify Herd Management Areas (HMAs) that exceed population thresholds and where overuse and range deterioration is occurring.
3. Remove excess WHBs. Problem: there are more excess WHBs than BLM presently has budget capability to remove.
4. Adopt out WHBs that have been gathered. Problem: There is adoption demand for fewer than 3,500 WHBs per year; far less than population increases.

The model has been ineffective because over the years more WHBs have been gathered than could be adopted. The increasing excess of WHBs (48000) have been placed in holding facilities. The majority (66%) of the budget is dedicated to housing animals in holding facilities. With limited ability to gather WHBs or to expand holding facilities, the WHBs are allowed to increase numbers exponentially on the range.

Fertility control as a means of controlling populations presently involves the use of the drug PZP. Effective use requires administration of the drug, followed by a booster 30 - 60 days later, and followed by an annual dose to prevent a mare from foaling two years after the last dose. Gathering costs and logistics render PZP ineffective. Studies are underway to develop a long-term fertility control drug; however, none are expected to be available for at least five years.

The efficacy of different sterilization methods was to be studied by Oregon State University under a contract with BLM. That study was litigated in 2016 with BLM subsequently making a decision not to award just before the contract was to be initiated. Failure to award the contract has potentially removed one of the best means for future management of WHB populations.

Appropriation language effectively amends the original horse legislation by placing a prohibition on the euthanasia of healthy WHBs and the sale, without limitation, of WHBs.

Discussion

Health of the public's rangelands should be prioritized above all other considerations. Healthy rangelands are where native wildlife can thrive, livestock can graze to support local communities, free-ranging horses and burros can live healthy lives, and water quality can be sustained.

In six years, with the absence of a significant change in Administration and Congressional policy, WHB populations on the range will number nearly 165,000; more than six times appropriate management level. Increasingly large acreage of healthy rangelands will be destroyed beyond natural recovery with the resultant loss of most forms of wildlife, a prevalence of WHBs in inhumane condition, and loss of many family operated ranches. The negative impacts of unhealthy land reaches hunters, fishermen and others who enjoy the variety of recreational opportunities that properly managed lands provide.

Removal of livestock is not an answer to the WHB overpopulation problem. There are numerous areas where permitted livestock have not been turned out on federal ranges due to the lack of forage from excess horses. The numbers of excess horses continue to grow annually, and with this increase in excess horses the land continues to decline to an increasingly worse condition.

All forms of large animals are managed by harvesting as means of keeping their numbers in concert with available feed. This includes not only cattle and sheep raised for food, clothing and other uses, but also deer, elk, antelope, bison and many others.

In 1906, President Theodore Roosevelt designated the Grand Canyon National Game Preserve to "showcase" the Kaibab deer herd, considered the Nation's finest. In order to respond to popular sentiment and to increase deer numbers, hunting was eliminated and natural predators were nearly eliminated. The population exploded from an estimated 3,000 deer in 1906 to as many as 100,000 in 1923. The deer herd vastly exceeded the carrying capacity of the habitat. Measures to reduce the herd were too little, too late. Thousands of deer starved and froze to death winter after winter. The nation's "showcase" was left in shambles.

Reports on the case document that wildlife populations will continue to increase after causing habitat devastation before the populations will implode and starve. This classic case triggered the revision of big game management guidelines throughout the wildlife profession, and the lessons influence management today. The Bambi Syndrome played into the dynamics of the case and fueled the public overprotection sentiment. Today's WHB situation mirrors the Kaibab.

WHB numbers on the range need to be brought down to appropriate management levels (AML) where their numbers can be managed to prevent reproduction from exceeding adoption demand. By the time these levels are reached, fertility control options may be available. The need to gather and warehouse large numbers of WHBs in unnatural and expensive holding facilities could become a thing of the past.

The Administration and the Congress are faced with several options.

1. Status quo. That is, continue the current program allowing increasing numbers of WHBs on the range; the destruction of land and related economic impacts; and, spending in excess of \$50 million per year, for the

foreseeable future, warehousing animals pending an ecological collapse involving large numbers of WHB deaths by starvation and/or dehydration.

2. Stop the negative impact on the land by appropriating a significant increase in funds to remove WHBs to get to AML and to increase the number of contracts to warehouse the animals for the remainder of their natural life; a multi-billion-dollar commitment. It is noteworthy that, typically, horses live an additional ten years that are removed from public rangelands and placed on Midwestern pastures.
3. Direct the BLM to use the provisions of the WHB Act that provide management options designed to have numbers in concern with the provisions and requirements of the Act. The budget impact would be relatively small if there were provisions for receipts from the sale of excess unadoptable WHBs, and savings from reduced warehousing costs to be redirected to gathers designed to reach AML. This option would be consistent with the September, 2016, National Wild Horse and Burro Advisory Board recommendation that un-adopted WHBs be sold without limitation and those unsuited for sale be euthanized. When HMAs are reduced to AML, initiate management that will sustain the herds and prevent the population from exceeding AML again.

Recommendations

Population Control

1. Adopt the WHB Advisory Board's recommendation to sell un-adopted WHBs.
2. Seek Congressional authority to redirect receipts from the sale of WHBs and the savings from reduced levels of warehousing WHBs to gathers intended to bring animals to AML.
3. Support development and use of long-term fertility control drugs and pursue research directed at determining a humane and workable sterilization procedure for WHBs.
4. After herds are at AML, implement The Selective Removal Management Model to sustain the herds.
 - a) Leave base herds on the range to live out their lives.
 - b) Sustain herds by regularly removing excess reproduction from only young adoptable animals.
 - c) Assure that an adequate number of quality, young animals remain in the herd for herd viability and genetic diversity.
 - d) Use fertility control options as needed to prevent excess reproduction from exceeding adoption demand.

Removal of the excess animals and application of this model will give the agency a powerful Strategy to persuade the OMB and Congress that wild horse herds will never again increase above AML, Long-term holding will be eliminated because unadoptable animals will not be removed from the herds and warehoused. Short term holding will only be needed for pre-adoption purposes. When the model is finally implemented, the non-restricted sale authority will no longer be needed.

Reference Attachment A for background on the Selective Removal Management Model.

Reference Attachment B for Supplemental Actions that would likely appeal to the public, including other considerations.

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Attachment A

Background on the Selective Removal Management Model

The Selective Removal Management Model was designed, tested, and implemented in the old Susanville BLM District. The experimentation was authorized by BLM as a task of the Modoc Washoe Experimental Stewardship Program (MWESP) located in the Surprise Resource Area and headquartered in Cedarville, California. At the outset, the ESP Steering Committee established the objective to eliminate the necessity for warehousing animals. The warehousing was viewed as a pitfall that could ultimately get out of control. After design, testing, and refinement in the Resource Area, the model was implemented throughout the District. The experiment was conducted from the mid-1980s into the 1990s. It was a success and the District was no longer shipping animals to warehousing. Note that there is an absolute requirement for the herds to be reduced to AML before starting the Model. Failure to be down to AML before starting the model will insure model failure.

Today there is scarcely a trace of the ESP experiment because the Susanville District was struck by a Perfect Storm. The District was abolished by reorganization. About the same time, the key participants in the wild horse program all retired or transferred in a relatively short time. And, a court ordered moratorium concerning AML legitimacy stopped all BLM gathering for a few years. By the time gathering started again, the Susanville herds had grown beyond recognition and no one on staff knew how, or cared about starting the ESP Models over again. However, there are five retired key participants in the experimentation that still possess full knowledge of application of the Model. They are available for consultation. The contact for all of them is Lee Delaney, former Surprise Area Manager, and former Chief, National BLM Wild Horse and Burro Program. Lee Delaney resides in Redding, California, Ph- 530-241-8966.

The Susanville District had its own gathering crew and, in addition to gathering, the crew conducted mobile adoptions throughout California to find homes for the adoptable animals removed from the District herds. Fairgrounds in California were found to be excellent targets for conducting adoptions. Communities came to anticipating the annual events and received them with open arms. Mobile adoptions are recommended throughout the U.S. They tap a demand that emerges when the adoptions are close at hand. This demand has not been fully exploited by BLM.

ATTACHMENT B

Supplemental Actions That Would Appeal to The Public

Wild Horse and Burro National Sanctuaries

The American public are both interested and concerned that the wild horse and burro population are well managed and cared for on the public lands within designated herd management areas (HMA). However, access to the HMAs is very difficult or nearly impossible for the public to access, due to the remote and scattered nature of the HMAs across vast expanses of rangelands with unpaved and often unmarked unimproved roads. Therefore, the public is not able to view the wild horses and therefore depends on the BLM, horse advocate groups, and filmmakers to provide ongoing information and viewing media reporting on the wild horses in their native environment.

Recommendation:

The BLM should conduct a study of HMAs situated along Interstate 80 in Nevada to determine a suitable location to establish a National Wild Horse Sanctuary that would provide well identified off ramp access for the public to become educated on the wild horses, their range and management. The sanctuary would consist of the following:

- Visitor center with educational and interpretive information regarding the wild horses and their management (i.e. film of gathers, processing, adoptions, etc.).
- Improved road extending through the HMA and map handouts that assist the visitor locate viewing sites to observe and photograph the horses in their native environment.
- Bus tours could also be scheduled with BLM specialists to provide group orientation and education.
- Provide for public viewing of the processing area with corrals, chutes, feed storage, etc.
- Hand out comment cards and encourage the visitors to provide comments on the Sanctuary facility management of the wild horses, and suggestions for improved management going forward. This information can be gathered and utilized in defending existing management, and to improve future management of the wild horses over time.
- The State of Nevada could be encouraged to become a partner in the National Wild Horse Sanctuary to help promote state tourism.
- Adoptions could also occur periodically at the Sanctuary which would enhance exposure and publicity for the wild horses and the program.
- The Sanctuary would be an excellent area for ongoing research regarding rangeland management under year around wild horse use to achieve a "thriving natural ecological balance", carry out fertility control, and other.

If determined to be equally important, the opportunity also exists to establish a sanctuary for wild burros in several locations in the West.

National Wild Horse Public Relations Program

The BLM has carried out an inadequate public information/education program as it relates to wild horses, their management, and the all-important horse adoption program. This is not surprising given that federal agencies are not typically tasked with, nor equipped to conduct public education programs nationally, particularly for a program such as the WHBs program that experiences such interest, passion, emotion, and sensitivity from multiple groups nationally. This inability to develop and convey a strong wild horse educational program nationally has contributed to the dilemma the BLM now find themselves facing.

Recommendation:

- BLM conduct a search for a nationally recognized public relations firm with the ability to create effective wild horse information media presentations, and schedule for showings on educational television (i.e. PBS), in elementary schools and other.

- BLM should have a budget component that allocates adequate funding to contract for an ongoing wild horse information and education program nationally.
- The wild horse and burro adoption program should be the centerpiece of the national wild horse and burro information program to encourage adoptions and reduce cost of warehousing animals.

OTHER CONSIDERATIONS

Expanded Wild Horse Fertility Control Research

Contraception attempts have been a long term, costly, and mostly ineffective challenge for BLM, despite ongoing research by selected institutions. Approaches have included gathering mares and installing either boluses with a time release fertility control drug, or needle injections of the PZP drug either at time of gather, or by use of marksmen who stalk the mares and apply the drug by drug injection darts. Neither the drugs, nor the present application process, are working as effectively as desired, and public response to these approaches are often less than supportive. An expanded approach to fertility control is needed that either eliminates or reduces the need for gathers to apply selected fertility drugs.

Recommendation:

- Equine nutritionists at a western university, had in the recent past, indicated that a targeted fertility control mineral block could potentially be developed.
- If successful, the fertility control blocks could be carefully placed by the wild horse specialist and the herd allowed free choice access to this orally applied drug.
- BLM should explore this opportunity with institutions conducting equine research. If successful, this approach could revolutionize the wild horse population management opportunities throughout the HMAs while greatly reducing the need for frequent costly gathers.

Expanded Prison Inmate Wild Horse Gentling Program

The BLM has worked with selected state prisons that have the facilities to house and care for small numbers of selected young wild horses for selected inmates to gentle, saddle train, and advance the training to a stage where the colts can be shown at auction. The program has produced horses, when shown under saddle at auction, have brought significant sale prices. Many individuals are especially interested in acquiring wild horses that are already started to the point where they are gentle broke and can be rode.

Recommendation:

- BLM should explore opportunities with additional state prisons having the necessary facilities to ascertain interest in establishing similar programs to those already successfully underway.
- Costs associated with an expanded program would need to be carefully evaluated to assure that the benefits to the WHBs program, including public interest and support, are sufficient to continue or expand this program.

Doug Moore

From : "doug Taylor" <flynorth@att.net>
Date: Wednesday, October 18, 2017 6:59 AM
To: <frontdesk@grandvistahotel.com>
Subject: Fwd: WILD HORSE & BURRO ACT of 1971 TODAY BLM ?

Begin forwarded message:

From: doug Taylor <flynorth@att.net>
Subject: WILD HORSE & BURRO ACT of 1971 TODAY BLM ?
Date: October 17, 2017 at PM MDT
To: doug Taylor <flynorth@att.net>

The Wild Horse and Burro Act of 1971 put the BLM as the stewards of the American Peoples Western Icons. Yet the mantra I hear today is that of special interest groups controlling the BLM and spewing propaganda to justify not only the removal of wild horses off of the public lands designated for them, but to change policy to destroy them as well. Apparent influence of the livestock and oil and mining industry seems to be excluded from all discussions in their impact on our public lands and cost to the tax payers. We know the truth.

This dialogue has to change.

First ranchers demanded removal-killing of the wolves, then the coyotes, now the wild horses. Mass killing of bears and mountain lion now accused of being responsible for the decline in deer, elk and sage-grouse, even when an environmental assessment (EA) has proven road, oil and gas development are responsible for the diminish of big game populations and wildlife.

This dialogue has to change.

In conversations with Western Watersheds Projects, it was expressed their interest in reducing cattle grazing from public lands and as such acknowledged the wild horses are unjustly being blamed for everything. Even blamed for a 50% decline in the bird population, so why not blame the horses for the extinction of a species of bee as well... did you know beef has the lowest of protein at 3-4% whereas oysters are highest at 13-14%, followed by fish, turkey, chicken.

This dialogue has to change.

There was a similar dialogue in Africa in blaming the elephants for the destruction of the ranges. By the recommendation of a Government official, 40,000 elephants were killed. That Government official to this day regrets his recommendation because the range became worse and they had to really manage the area to mimic nature. This information can be found on Ted Talks. Let's understand the science and not make the same mistake.

If we keep doing the same thing, we get the same results, Why is 67% of the BLM budget for round ups? As the demands of our resources increase, it is time to change the dialogue and find a balance.

(NOTE: Mr. Moore's comment included a newspaper article that was too large to include in these minutes.)

Acronyms

AML.....	Appropriate Management Level
AUM.....	Animal Unit Month
FLPMA.....	Federal Land Policy and Management Act
HMA.....	Herd Management Area
MHF.....	Mustang Heritage Foundation
NAE.....	National Association of Equines
NCBA.....	National Cattlemen’s Beef Association
PLC.....	Public Lands Council
PZP.....	Porcine Zona Pellucida
RMEF.....	Rocky Mountain Elk Foundation
SWAT.....	Sand Wash Advocate Team
TIP.....	Trainer Incentive Program
UDWR.....	Utah Division of Wildlife Resources

DRAFT