

Summary Report from Interagency Bison Management Plan Meeting May 1-2, 2012



Presented 24 May 2012 by meeting facilitator Scott Bischke

The following summary report reflects activities at the 1-2 May 2012 meeting of the Interagency Bison Management Plan (IBMP) Partners, held at the C'mon Inn in Bozeman MT. This report comes from the notes and flip chart records of facilitator Scott Bischke¹. The report will be marked "Facilitator's Draft" until formal Partner agreement at the start of their next meeting. The nine Partner attendees were Don Herriott (APHIS), Ron Trahan (CSKT), Earvin Carlson (ITBC), Christian Mackay (MBOL), Marty Zaluski (MDOL), Pat Flowers (MFWP), Larry Greene (NP), Dave Hallac (NPS-YNP), and Mary Erickson (USFS-GNF). In addition to those at the deliberative table, ~20 staff members from across IBMP organizations and ~30 members of the public were present. Scanned attendance sheets are available from the facilitator.

Action Items Identified	2
Status of Letter to Congressional Delegation	3
Status of Potential EA for Additional Bison Habitat in Hebgen Basin	3
Discussion of Risk Reduction and Importance of Seroprevalence	3
Developing an Education Program	4
CWG Recommendations	5
Clarifications of/appeals to Partner decisions of Feb 24	5
Matrix for CWG recommendations	11
Status of Winter Operations	13
Status of Statewide Bison Management Plan.....	13
Development of Partner Operating Procedures (renamed "Partner Protocols")	14
Status for signing of 2011 Adaptive Management Plan	14
Partner Briefings and Updates	14
Future Meeting Planning	15
Schedule	15
Parked item list.....	15
Public Comment	16
Abbreviations	18

¹ MountainWorks Inc.; scott@eMountainWorks.com

Action Items Identified

Table 1.—Action items identified during this meeting

#	Who	What	By when
1	PF, AJ	MFWP to redraft the letter to the Congressional delegations, per the discussion captured in the body of this report (several changes requested), and circulate to Partners for their signatures. Partners agree to sign and send on within one day of receipt.	May 15 to begin draft send around
2	RC	RC agreed to invite Steve Olsen to provide a presentation at the August 2012 IBMP meeting that will provide information on seroprevalence, shedding, elk and brucellosis, and research dollars needed for and utility of creating a new vaccine.	For next IBMP meeting (Aug)
3	AJ, Whitney Leonard	Partners stated continued support for the concept of an education program, but also expressed concern about capacity. They directed their public information officers (PIOs) to meet with the CWG and prioritize a brucellosis education messaging strategy (to be led by Andrea Jones, **Action item 3).	Report at next IBMP meeting (Aug)
4	PF	Not sure about the likely success of dogs (or something else?) working with bison.... PF noted that the Wildlife Conservation Society has done some work with dogs and that he would contact Keith Aune to ask him about it.	Report at next IBMP meeting (Aug)
5	SB, PF	This matrix can be found on the IBMP website (see http://ibmp.info/Library/20120501/20120501.php) and will not be repeated here. Note that no actions are shown for the items debated under the section of this report titled “CWG Recommendations, subsection Clarifications of/appeals to Partner decisions of Feb 24”, as they were only just completed directly before this matrix discussion. These items will be filled out by the lead partner and the facilitator before the next meeting.	Before next IBMP meeting (Aug)
6	SB (with input and/or review from Pat F, Mike L)	** Action items 6-8. —Partners assigned SB to create ver2 of the Partner Protocols and send email ver2 to the Partners within 1 month. Partners then have 1 month to review and edit the document and return to SB. SB will update the document per the edits, and present at the August meeting.	Before June 3
7	Partners		Before Jul 3
8	SB		At Aug IBMP meeting
9	EC, LG, RT	EC, LG, and RT to meet with their counterparts in ITBC, NP, CSKT to discuss funding, including the potential that the three groups could act as a combined single funding body (**action item 9).	Send response to lead Partner w/in 1month
10	* PF to send out * all Partners to sign *SB for website posting	Printout of the (new) 2011 Adaptive Management Plan, including request of State Veterinarian for slight modification. MFWP will circulate the document for signatures (** action item 10). Once the document is signed, it will be (a) considered in effect, and (b) posted to ibmp.info.	On or before Aug IBMP meeting

Status of Letter to Congressional Delegation

In response to one of the CWG recommendations (Population Management 14), the Partners agreed to write a letter to the Montana Congressional delegation regarding a request to remove *Brucella abortus* from the select agent list. That list hinders research toward a vaccination for brucellosis.

Lead Partner MFWP presented a strawman letter for the Congressional delegation to the Partners. Several requests for revisions were made:

- Second paragraph describe vaccine for cattle or bison
- Letter should be addressed to the ID delegation, as well
- Letter should note that the risk assessments for placing brucella on the select agent list were for *Brucella melitensis*, not *B. abortus*
- Letter should note that *B. abortus* can come from the environment; current rules hamper research on but not acquisition of *B. abortus*

TM noted that letters to Congressional delegation require Tribal Council signatures and thus the need for the letter to be circulated to Tribal Council after the IBMP meeting. He said that Tribal Council for the CSKT meets Tuesdays and Thursdays.

**** Action item 1**—MFWP to redraft the letter to the Congressional delegations, per the discussion captured above, and circulate to Partners for their signatures. Partners agree to sign and send on within one day of receipt.

Status of Potential EA for Additional Bison Habitat in Hebgen Basin

MFWP provided an update on CWG recommendation Habitat 3ai to establish increased tolerance for bison on Horse Butte and the upper Gallatin area (this recommendation was accepted by the Partners at the Feb 24 meeting, though the portion of the recommendation dealing with the Flats was not). MFWP will begin scoping for an environmental assessment (EA) on this possibility in May 2012 under the Montana Environmental Policy Act (MEPA). MFWP expects to complete the EA by approximately the end of October 2012.

Partners asked two questions surrounding the process of the EA, and discussed those questions to come up with this understanding:

- Would MDOL need to co-sign the EA? Response = yes.
- If the EA is accepted by the State, can the Partners then make the increased tolerance change via their adaptive management plan?
 - USFS response—no need for us to do federal NEPA to implement this decision under AM
 - NPS response—our expectation is the same as USFS though we would (a) like to review before saying definitively, and (b) regardless of review still would likely prepare an eco-sufficiency document

Partners further discussed both the timing and the geography of the potential increased tolerance, though this discussion bridged into a CWG recommendation that was to be discussed later. Thus, location and timing of the EA can be found under the section of this report titled “CWG Clarifications of/appeals to Partner Decisions of Feb 24 / subsection 3. Clarify what is meant by Population Recommendation 11”.

Discussion of Risk Reduction and Importance of Seroprevalence

As a follow up to the CWG Risk Reduction recommendations from the Feb 24th meeting, the Partners set aside time to revisit this topic area in open discussion with the CWG. The discussion was in part prompted by input from CWG member Becky Weed, who developed a set of questions surrounding the importance of seroprevalence in reducing the risk of transmission from bison to cattle. That letter is available for review at <http://ibmp.info/Library/20120501/20120501.php> and will not be repeated in this meeting report.

A goal of the discussion was to collect points of agreement and conflict regarding the importance of seroprevalence as IBMP driver, as shown in Table 2.

Table 2.—Points of agreement and disagreement regarding the importance of seroprevalence for risk reduction for the transmission of brucellosis from bison to cattle

Points of Agreement	Points of Disagreement
Positive seroprevalence <i>does</i> mean exposure of the animal to brucellosis but <i>does not</i> necessarily mean that animal will shed the bacteria.	Partners must agree on the steps (the “how”, e.g., costs and step-by-step process) before committing to the goal (the “what”) of decreasing seroprevalence.
We don’t want cattle to get <i>brucella abortus</i> .	<ul style="list-style-type: none"> • Reducing seroprevalence is a positive outcome (some believe seroprevalence is needed for herd immunity) • Some sero-positive animals develop immunity from brucellosis

Other thoughts and questions brought out in the CWG/Partner discussion included:

- While seroprevalence is not a perfect predictor of disease, it is the only tool we currently have.
- Is reduction of seroprevalence a more important management goal, or reduction of transmission? Can these two goals be considered separately from each other?
- Do we know the “end game” for where we want to be or can accept with respect to seroprevalence? Similarly, what risk are we willing to accept to achieve increased tolerance of bison outside YNP?

The CWG and Partners discussed the potential of naming a CWG/Partner Technical Team. The group’s purpose would be to develop potential consensus around seroprevalence concepts that might lead to new adaptive management efforts, plus help educate the CWG on a difficult to understand area. This idea had much pushback from some Partners and staff, who questioned if there would be value in such an engagement, or whether it would be an exercise in futility. Upon much discussion, a Partner and CWG consensus developed that getting more education through the venue of the IBMP meeting would be a good first step. RC agreed (** **action item 2**) to invite Steve Olsen to provide a presentation at the August 2012 IBMP meeting that will provide information on seroprevalence, shedding, elk and brucellosis, and research dollars needed for and utility of creating a new vaccine. Partners agreed that following that presentation they would again open discussion to the potential of forming a CWG/Partner Technical Team to discuss seroprevalence as a driving factor in IBMP decisions.

Separately, a discussion was held about the role of hunting in association with seroprevalence, specifically surrounding CWG recommendation Habitat 3b:

Outside the Park, the main means for controlling bison abundance and distribution should be state-administered and tribal hunting. Montana Fish Wildlife and Parks should test new methods for dispersing hunting in time and space.

KL requested that the caveat associated with this CWG recommendation be struck from the document giving Partner direction. That note says “Accepted” and then “However, caveat that current ROD and court settlement established seroprevalence reduction as an IBMP priority, and hunting alone will not accomplish this goal, hence lethal removal of infectious animals remains an IBMP tool.” KL’s reasoning was that it is currently uncertain whether hunting can play a role in modifying seroprevalence (perhaps not directly, for example, but indirectly via changing bison distribution). Partners agreed to strike the note from this recommendation. As of the publication of this report, the facilitator has done so and reposted the document to ibmp.info.

Developing an Education Program

Members of the CWG restated their desire to develop and participate in an education program for the general public regarding getting out factual information about bison and associated concerns. The CWG and Partners brainstormed thoughts about the education program, including that it could be patterned after,

or take best practices from, the MFWP hunter education program, the MFWP Bear Aware program (see <http://fwp.mt.gov/fishAndWildlife/livingWithWildlife/beBearAware/>), Zoo Montana programs, and/or tribal college bison programs. Programmatic ideas mentioned included:

- interviews of current landowners regarding how to live with bison
- best fencing practices for bison
- safety on the road with bison
- hunting opportunities and challenges with bison
- field trips (members of the Buffalo Field Campaign volunteered to lead)

TM of the CSKT noted that the tribe is a strong education advocate and could potentially provide input and expert assistance. Development of the education program in conjunction with scoping of the Montana Statewide Bison Management Plan was mentioned. CWG members referenced the education matrix filled with ideas that they developed and is included with their recommendations to the Partners (the matrix can be found in the summary report for the 30 Nov 2011 IBMP meeting; see <http://ibmp.info/Library/20111130/20111130.php>).

Partners stated continued support for the concept of an education program, but also expressed concern about capacity. They directed their public information officers (PIOs) to meet with the CWG and prioritize a brucellosis education messaging strategy to be led by Andrea Jones and Whitney Leonard, (**action item 3). Partners and CWG recognize that the strategy should include, among other items, answers to questions surrounding the implementation of CWG recommendations. Methods of education dissemination included but were not limited to websites, handouts, FAQs, video, and more.²

Partners asked that the outcomes of the PIO and CWG discussion be a strategy that defines: (1) what can we build on already in progress; (2) goals of the program; (3) components/methods; (4) responsibilities; and (5) timeframe for implementation.

Along with “the general public”, four target audiences for the education program were explicitly mentioned: the agriculture community, the state legislature, school kids (by working with teachers), and landowners who will first (and possibly most) be directly impacted by expanded bison tolerance.

CWG Recommendations

CLARIFICATIONS OF/APPEALS TO PARTNER DECISIONS OF FEB 24

At the February 24th meeting between the Partners and the CWG, the Partners responded to CWG recommendations by accepting, rejecting, or moving to rework each CWG recommendation. During the meeting the Partners asked some clarifying questions. They provided the CWG with an opportunity at this meeting to do three things:

- provide responses to Partner questions posed on Feb 24th, generally associated with CWG recommendations that had been labeled “move to rework”;
- clarify and request decision(s) on those recommendations that were labeled as “move to rework” during that same meeting; and
- appeal decision(s) of CWG recommendation(s) that were rejected by the Partners

From this discussion, then the Partners committed to providing a final set of decisions on the CWG recommendations first presented at the 30 Nov 2011 meeting.

To accomplish the three items just noted, the CWG met April 16th. They provided the following report to the Partners as part of a presentation and open discussion. **CWG responses or explanations are shown in red.** Notes on the CWG/Partner discussion **from this meeting** that extend or clarify the CWG’s report to the Partners are shown in bold as << notes, notes >>. Several references are made to the CWG recommendations made to the Partners—those recommendations can be found at <http://ibmp.info/Library/20111130/20111130.php> and will not be repeated in this report.

² From the Feb 24th meeting an offer was made by Paul Cross of USGS help to the IBMP Partners and/or CWG. Paul noted that they might provide education services, noting that USGS has funds to work with the MSU Film School.

Report from April 16, 2012 Yellowstone Bison Citizens Working Group meeting in Bozeman

Meeting accomplishments

1. Define “acceptable alternatives” under Habitat 3bii
2. Provide specific habitat improvements that would help move bison to places they are not
3. Clarify what is meant by Population Recommendation 11
4. Appeal partners’ “rejections” of our recommendations
5. Provide clarity on those recommendations marked “rework” by the partners
6. Other Discussions re: future of CWG/IBMP interactions, continued efforts for public interaction with IBMP, education efforts

-
1. Define “acceptable alternatives” under Habitat 3bii
Recommendation 3bi-3biii.—*Develop and implement strategies that manage bison as wildlife on those lands, specifically:*
 - b. Gardiner Basin
 - ii. *By the end of 2013, implement adequate fencing or acceptable alternatives.*

Explanation of “acceptable alternatives:” Experiment with creative solutions such as employing a special “herder” (as is done for elk), repellants, gravel buffers, behavior modification training efforts, or possibly dogs, etc. that mitigate landowner concerns and allow bison access to more habitat in the Gardiner Basin.

<< none >>

2. Provide specific habitat improvements that would help move bison to places they are welcome.

Explanation: *Experiment with improvements such as controlled burns, fertilizers, re-vegetation of previously farmed lands to attractive, productive species and native cover, consideration of water availability, etc.*

<< Partners stated agreement/understanding to the explanation. >>

3. Clarify what is meant by Population Recommendation 11
Recommendation 11.—*Hazing of bulls should be minimized, unless there are issues with property damage or safety, because they are not a factor in the issue of brucellosis transmission. Hazing of newborn calves should be minimized for humane reasons.*

Partner decision.—Accept. (Partner clarification: accepting this recommendation is not equivalent to saying bull bison are allowed anywhere at any time.)

Discussion.—Partners asked for clarification from the CWG on this question: Did they mean within current tolerance areas or did they mean regardless of current zone system? Response = 1) If we are within the current tolerance zones bison are already allowed; the recommendation meant anywhere in space and time regardless of zone with recognition that safety and other qualifies still exist. Partners—not sure we can do that (tolerance outside allowed Zones) without MEPA process. **action item 3: Partners request greater clarification from CWG on what is meant by recommendation 11.

Explanation: *See Population Management Recommendation 1, that partners take another look at Zone designations, and refer back to Habitat Effectiveness Recommendations 1-3 to explore new areas for bison to inhabit. With those recommendations in mind, we feel that bulls should have year round tolerance in the northern and western boundary areas (ie. Hebgen and Gardiner basins), irrespective of current zone designations. The same should apply to the Upper Gallatin, Taylor Fork, Cabin Creek, Porcupine, Buffalo Horn, etc. and the land between those areas and the western boundary area.*

<<

- **Partners asked if the CWG was requesting that bison be tolerated outside of currently allowed zones.**
- **CWG: Noted that they had provided related recommendations under Population #1 and Habitat #1,2,3. Population #11 does not mean anywhere but instead means bulls should be able to move wherever, whenever they want in the Hebgen and Gardner basins given the caveats of public safety and similar, regardless of current zone designations.**

- **Partners:** This might be logistically difficult since bison often move in mixed groups so it would be difficult to separate the bulls out for increased tolerance. A concern was expressed that bachelor bison are exploratory and can lead females to wander more widely.
- **CWG:** We see lone bulls mostly keeping to themselves and not exploring new habitat. Instead, females lead in habitat recruitment.
- **Partners:** Some concern about this proposed increase in tolerance when the details of prevalence reduction are not yet set forth.
- **Partners/CWG:** Some discussion around the difficulty in understanding what each person/group means by “Hebgen Basin” and “Gardner Basin” (actual watersheds or something else?). The terms “northern” and “western management areas”, as used in the Adaptive Management Plan, seemed more appropriate to most. A shared Partner/CWG mapping exercise was considered, but then set aside in realization that such an exercise would be required in the MEPA/NEPA process shortly upcoming.
- **Partners:** Yes we agree to minimum hazing of bull bison but again, we want to clarify if you explicitly mean that bulls should be free to wander wherever, whenever they want.
- **CWG:** Yes, we meant in space and time.
- **Partners:** The EA on expanded tolerance will address the Hebgen Basin and Upper Gallatin but not beyond. (see section in this report titled “Status of Potential EA for Additional Bison Habitat”).
- **Partner-to-Partner questions:**
 - **What is the relation of this EA to the state-wide bison plan?** Response: the EA does nothing to preclude the statewide effort.
 - **Does this proposed action include the full Hebgen Basin?** Response: We don’t know.
 - **Should we expand the EA to include mixed groups in the broader area (full basin)?** Response: We don’t know.
 - **Then what is the area that will be included in the EA?** We don’t know. This will be determined by MDOL and MFWP in the days ahead.
- **CWG:** A reminder that one of the CWG sideboards was that they not be allowed where they could impact cattle.

>>

Appeals to “Rejections”

While we continue to stand behind our consensus recommendations, and want to continue our discussions about some of those, we would appeal these two specific decisions:

***Population Recommendation 13.**—Develop and work with the livestock industry to implement an effective cattle vaccine and protocol to reduce the risk of transmission and make bison presence/translocation more acceptable. Support/secure funding for ongoing vaccine research.*

Partner decision.—Accept improvement of current protocol. Reject support for vaccine research.

Discussion.—Partners: 1) work with livestock industry is a yes and in progress; 2) reality is that brucellosis impacts one discrete part of country and thus there will not be funds available for vaccine research nor will it be a primary goal for IBMP Partners (suggestion of \$5M for finding agreeable deployment method, \$15M finding a new vaccine); 3) CWG overestimating power of Partners in thinking they can override funding and/or Homeland Security challenge to getting new vaccine research undertaken. CWG: 1) Why is research always on sero+ animals not on sero- animals to understand why they are sero-? 2) But vaccine important not just for livestock protection against sero+ bison, but also sero+ elk, which is the real issue; how can we let elk run loose unencumbered and state no tolerance for bison?—it is thus illogical to say both no to vaccine and no to change in bison tolerance; 3) key focus of CWG is to focus on protection of cattle not management/vaccination of bison. **action item 4—RC suggests Partners have Steve Olsen to give pre-meeting seminar on issues of elk and brucellosis.

Re: vaccine

If the IBMP partners won’t advocate for this, then who will? We recognize that the IBMP does not have the funding to lead research into a new livestock vaccine, but in light of changing conditions such as the expanding DSA, we believe that an improved vaccine will be a benefit. The IBMP partners can provide information to Congress that research into this issue is important and valuable.

U.S. is not the only area in the world dealing with *Brucella abortus*. Mexico, Europe, etc. have issues with brucellosis as well. If an effective vaccine were to be developed, it could be marketed across the world. It doesn't make any sense for the partners to reject support of finding a better cattle vaccine, while at the same time seriously considering a vaccination protocol for bison and the GonaCon immunocontraceptive program.

<<

- **CWG: If this group does not advocate for more vaccine research, who will?**
- **Partners: What can we realistically do?**
- **CWG: Example of RB51 being available to work on. Could APHIS help apply pressure or do vaccine research?**
- **Partners: We can support, yes, but as a Partner group we cannot do vaccine development. Also, individual federal Partners can't lobby Congress for funding.**
- **Partners: Decision = change our "reject" to "accept" of this recommendation but defer any action until Partners and CWG listen to the discussion from Steve Olsen (see action item 2).**

>>

Risk Recommendation 4.—(a) Strongly encourage continued funding and research to develop a practical test on live animals to distinguish between infected and resistant animals. (b) Given the epidemiological importance of building 'herd immunity,' it is important to develop the tools to allow us to stop managing animals as if seropositive is equivalent to 'infectious.'

**Note: labels (a), (b) added by Partners*

Partner decision.—(4a) Reject.

Discussion.—CWG: 1) some animals that are sero+ may be resistant to disease; 2) note some work being done at Texas A&M on this question. Partners: 1) we lack technology to differentiate (i) animals that are resistant versus susceptible to disease and (ii) seropositive animals from shedders; 2) indeed some animals get exposed but are not infected but we see that number to be very small; 3) we do not agree that some animals are resistant to brucellosis; 4) we see high seroprevalence means most infected—issue is that some will shed and some will not.

Partner decision.—(4b) Accept.

Discussion.—NA.

The CWG requests further discussion and information on this issue with the IBMP partners. Can there be a special presentation from a research scientist on this issue at an upcoming IBMP meeting?

<< **Partners: Yes, discussion from Steve Olsen planned (see action item 2).** >>

Recommendations to "Rework"

Habitat Recommendation 3ai-3aiii.—Develop and implement strategies that manage bison as wildlife on those lands, specifically:

a. Hebgen Basin

i. Designate Horse Butte Peninsula and the Flats as year-round bison habitat by May 2012 following an adequate public process for this management change.

Partner decision.—(3ai) Move to rework

Discussion.—The Partners affirmed that their intention is that bison be allowed to move year around tolerance on Horse Butte but will need to go through Public Process before implementing. Recommendation not accepted due to concerns about the Flats.

Clarification: When we use the Flats we are using the term as defined by the IBMP i.e., the area bounded by the South Fork of the Madison River in the western management area south of Hebgen Lake. We believe that concerns about the Flats can be addressed with management tools and the recommendation should be accepted as a goal. (As in the Partners' rewrite of our Recommendation 3aiii, which we support). The IBMP has addressed concerns about bison in the Flats in the winter and spring (2008-2009 Annual Report) so we are asking for consideration of access to this habitat in the Summer and Fall. (This dovetails with our recommendation to minimize hazing of calves.) We would request the opportunity to have CWG representatives meet face to face with members of the IBMP habitat subcommittee to further hash out this issue.

<<

- **CWG: We would like bison to be able to use the Flats for the entire year.**

- **Partners: We have not been successful managing bison movement on the Madison Arm. Bison do not stay east of the South Fork of the Madison; instead they go to the west side, at least for the last couple of years.**
- **Partners: We prefer step-wise effort, starting with showing success of year around tolerance on Horse Butte and then potentially moving forward from there. Decision = accept year round tolerance of mixed groups on Horse Butte. MDOL and MFWP will take lead on an environmental review and determine final scope of the decision.**

>>

Habitat Recommendation 3bi-3biii.—Develop and implement strategies that manage bison as wildlife on those lands, specifically:

b. Gardiner Basin

i. By the end of 2012, interview and map landowners to identify where bison are welcome, unwelcome, which landowners are on the fence and what their reservations are.

ii. By the end of 2013, implement adequate fencing or acceptable alternatives.

iii. Following the interview process and implementation of fencing/alternative strategies, consider designating the Gardiner Basin year-round habitat using an adequate public process.

Partner decision.—(3bi) Accept

Discussion.—Subcommittees state this work is already complete.

Partner decision.—(3bii) Accept

Discussion.—Subcommittee accepts for but considers of low priority. **action item 1—request to CWG to define “acceptable alternatives”.

Partner decision.—(3biii) Move to rework

Discussion.—Subcommittee statement that bison will not use the Gardiner Basin year-round. CWG counter that we haven’t let them try, so how do we know? Obstacles identified for making decision: results from (1) State of MT EA on and pending legal actions against Gardner Basin adaptive management changes. Partners note that this recommendation hits at the very issue of current lawsuits and thus they cannot recommend on it until the lawsuits are resolved.

Note: Understood, but our recommendation still stands.

<< Partners: Agreed, 3biii will be kept alive pending State of MT Hebgen Basin EA outcome. >>

Recommendation 5a-5f. (Reworded by partners) —Agree on and establish a target population range that is biologically and ecologically acceptable and accounts for a variety of public interests. As Interagency Bison Management Partners, agree on criteria for evaluating and determining a population range and appropriate management tools, such as:*

a. Winter range outside the Park (target population range could change to reflect changes in habitat availability),

b. Risk factors,

c. Individual agency management mandates, constraints and responsibilities (such as the National Park Service’s mandate to manage its resources unimpaired for future generation and its natural regulation policy),

d. Genetic diversity, population structure and demographics, reproduction, and distribution,

e. Realistic opportunity for addressing private land owners’ concerns, and

f. Hunting and wildlife viewing opportunities.

Partner decision.—(5-f) Accept as rewritten to say, “The Partners will use 5(a-f) in future population number determination using 3000 as a guideline, not a target.”

Discussion.—Partners—Population target of 3000 exists in the ROD and took into account factors listed. CWG feels that 1) no one knows what 3000 means and how to adaptively manage (i.e., change) that goal (thus, the request for a population range), 2) concern over 3000 is the genetic brink and thus a great danger for long-term bison viability, and 3) that much has changed since the completion of the ROD.

Note: Please explain how the current population guidelines (3,000 number) took these factors into account. When will there be a new analysis, using these criteria and with respect to the impact of the full set of our recommendations?

<< Partners: We have interest in this concept and support a peer reviewed study of literature of bison population and genetic viability. We would be interested in seeing the work completed by an unbiased

group made up of members of both conservation and livestock communities. **Decision: Yes, Partners will support this recommendation as they reworded it previously, but additionally support the idea of a literature review as noted. The Partners explicitly stated that they were supporting a literature review, not an “analysis” as described in the CWG note shown directly above. >>**

Population Recommendation 7.—Quarantine should be economically justified in comparison with other means of producing Brucella-free Yellowstone bison for conservation purposes.

Partner decision.—Move to Rework.

Discussion.—Obstacles identified: 1) not applicable with no operational quarantine at the time, 2) don’t know what “economically justified” means, 3) other alternatives for conservation that are more affordable. CWG states concern that quarantine is costly and diverts attention from the real concern.

Note: By “economically justified,” we mean that the benefits of operational quarantine exceed the costs in comparison to other alternatives to achieve this objective.

<<

- **Partners: The explanation presented does not help. 160 animals is in no way economically viable. How do you put a price on not sending bison to slaughter?**
- **CWG: We are not in full agreement on this recommendation.**
- **Partners: NPS recognizes limitation of quarantine but has been directed by the Secretary of the Interior to look at opportunities (“Call to Action”) to reestablish bison herds in the Western USA, outside of YNP.**
- **Partners: Decision = reject this recommendation as difficult to quantify and thus implement.**

>>

Risk Recommendation 6.—Reduce livestock/wildlife interactions at key seasons. This will include building upon and improving techniques already in use as well testing and application of other innovations (e.g. strategic hazing using low-stress animal handling methods; targeted fencing; guard dogs to keep wildlife off feedlines/haystacks/calving areas; trained dogs to locate fetal material to enable cleanup, and so forth).

Partner decision.—Move to rework.

Discussion.—Partners: decreasing interactions very important. However not realistic as this is not our job. Obstacles identified: 1) funding to support, 2) who handles, trains, etc dogs? 3) what would it look like (e.g., use APHIS guard dogs)? 4) more specificity asked from the CWG.

Note: One of the two goals of the IBMP is to reduce the risk of transmission of brucellosis from bison to cattle. The entire premise of this recommendation is based on that goal. We are simply asking the IBMP partners to be creative and think outside of the box when it comes to new solutions to reduce interactions between cattle and bison (and allow for more tolerance of wild bison on the landscape in the process). For example, dogs could be a low cost way to reduce bison/cattle interactions. We feel different opportunities should be explored and public/private projects to contract with relevant experts such as Working Dogs for Conservation or Carrie Hunt and the Wind River Karelian Bear Dogs or APHIS personnel who have been researching guard dogs in the Upper Midwest.

<< Partners: Not sure about the likely success of dogs (or something else?) working with bison. This would be a new area of study. To implement such ideas, we would need to find a willing landowner(s). PF noted that the Wildlife Conservation Society has done some work with dogs and that he would contact Keith Aune to ask him about it (action item 4). A note was made that in the Taylor Fork there are a number of horses so bison/horse interactions must also be considered. Decision: Partners accept this recommendation but state that they cannot be the lead for the work. >>**

Risk Recommendation 7.—Reduce artificial concentrations of animals (elk or bison) that may be exacerbating transmission. This principle applies to a variety of locations, and will require a variety of implementation strategies (e.g. at Stephens Creek where bison are intermittently confined; on private lands with restricted hunting where elk congregate; bison crowding in/near the Park; Wyoming feed grounds).

Partner decision.—Move to rework.

Discussion.—Obstacle identified: 1) elk, 2) role of Stephens Creek in managing bison. CWG: no consensus on capture facility.

Note: 1.) Although elk are not part of your mandate, in the current environment, the IBMP and its individual member-agencies simply can't willfully ignore the impact of elk on the IBMP's mandate and operational environment. We urge the partners to have a sincere discussion about integrating elk into the IBMP's considerations about bison. 2.) We feel that by accepting the CWG's recommendations (i.e. more habitat, more hunting), the role of the Stephens Creek capture facility can be minimized.

<< Partners: We would love to eliminate the Stephens Creek facility but there is not enough habitat in the Gardner Basin to handle the bison that come out of the Park. Decisions = 1) accept the idea of considering the reality of elk in making AM changes, but 2) reject the idea of decreasing the use of Stephens Creek. >>

Further Discussion Notes

The CWG requests that the IBMP partners set up an ongoing mechanism for technical/educational discussions to broaden the communications between the IBMP partners and the CWG. We would like to have representatives from CWG involved to help clarify CWG recommendations as the technical committees work to implement the recommendations (and relate the discussion back to the full CWG). We ask that the technical committees schedule time with the CWG for specific recommendations so we can send a few representatives to those meetings.

While the CWG has been a tremendous improvement in opportunity for public interaction with the IBMP partners, we feel efforts should be continued to develop further mechanisms for meaningful dialogue between public and IBMP partners – perhaps have a time for dialogue (not one-way public comments) after each discussion section, or have a 2-3 hour “roundtable” public meeting, hold meetings in tandem, etc.

The CWG also had a discussion about education and outreach efforts related to bison management.

MATRIX FOR CWG RECOMMENDATIONS

At the Feb 24th meeting between Partners and the CWG, the Partners committed to developing a matrix for those CWG recommendations that had been accepted. At this meeting they completed a first pass of this matrix showing the proposed agency lead, lead personnel, and expected timeline for the CWG recommendation. This matrix can be found on the IBMP website (see <http://ibmp.info/Library/20120501/20120501.php>) and will not be repeated here. Note that no entries are shown for the items debated and accepted under the section of this report titled “CWG Recommendations, subsection Clarifications of/appeals to Partner decisions of Feb 24”.

The responsibility matrix, a summary of which is shown in Table 4, shows the Partner decision as of this meeting, but not proposed lead and timelines as these items were only just decided directly before this matrix discussion. Entries for these new items will be filled out by the lead partner and the facilitator before the next meeting (** action item 5).

Table 4.—Summary of Partner decisions on CWG recommendations from 050112 IBMP meeting. Details for items that were discussed at this meeting can be found in section of this report titled “CWG Recommendations”.

Habitat Expansion / Effectiveness		Population Management (PM)		Risk Reduction	
CWG rec# for this category	Partner Decision	CWG rec# for this category	Partner Decision	CWG rec# for this category	Partner Decision
1	Accept	1	Same as/see Habitat 3di	1	Same as/see PM 13
2	Accept	2	Same as/see Habitat 1, 3e	2	Reject
3ai	3ai) Accept Horse Butte 3ai) Reject Flats	3a	Accept	3	Same as/see PM 14
3aii	Reject	3b	Accept*	4	Accept (see PM 13)
3aiii	Accept as rewritten*	3c	Accept	5	Same as/see PM 15
3bi	Accept	3d	Accept*	6	Accept
3bii	Accept	3e	Accept	7	Reject Accept
3biii	No decision, but keep alive	3f	Accept	8	Cannot make decision
3ci	Reject	4	Accept	9	Same as/see PM15
3cii	Reject	5a-f	Accept (remove word “analysis” from CWG statement)	10	Same as/see PM 2; Habitat 1, 3e
3di	Accept	6a	Accept		
3dii	Accept	6b	Reject*		
3e	Same as/see Habitat 1	6c	Accept*		
		6d	Accept*		
		7	Reject		
		8	Accept*		
		9	Accept		
		10	Accept		
		11	Accept*; see notes from 050112 meeting		
		12	Accept		
		13	Accept, defer further effort until Steve Olsen talk		
		14	Accept*		
		15	Accept		
		16	Accept		

Status of Winter Operations

- 11 bison harvested by State of MT hunters
- 7 bison harvested by CSKT hunters
- 7 bison harvested by NP hunters
- MDOL—(1) Few problems seen on the north side. 15-20 bison were up on the RTR but moved themselves back. (2) As many as 500 bison out on the west side, mostly on Horse Butte. Over the last few weeks they have moved into Zone 3, including Red Canyon on the north side of Hebgen Lake. (3) No vaccination currently planned for west side. (4) Considering haze starting next Tuesday (5/8).
- NPS—(1) Annual spring move of bison back into the park is under discussion and decisions will be made with best available information. (2) No vaccination of animals to date at Stephens Creek. (3) Have seen bison move away from hunting zones/pressure.
- Concern from LG on hazing bison with young calves and the potential to trample them; also concern of running and harassing pregnant females. RW—ideal time to haze would be end of May or early June as most calves have been born by then. CM—for the past 4 years the Partners have tried to phase in the haze slowly and tried to lead the young back. MZ—(responding to a question) We do try to identify birthing areas, clean them up, and disinfect with Chlorox, especially if found near where cattle are

Status of Statewide Bison Management Plan

Arnie Dood of MFWP provided an update on the Montana Statewide Bison Management Plan (“Plan”). Arnie noted that the Plan is entering a public scoping process, with listening meetings scheduled across the state during the month of May. MFWP plans to develop a Draft EIS by next winter, then proceed with public hearings.

Arnie provided a handout detailing the scoping process, and went step-by-step through the information provided there. The handout can be found at <http://ibmp.info/Library/20120501/20120501.php> and will not be repeated here. However, we will highlight some key points that came out during Arnie’s presentation and Partner, staff, CWG, and citizen-at-large questioning (labeled “Q”):

- The long term goal of the Plan is to establish a hunting population(s) somewhere in MT, similar to elk and deer.
- Bison do respond to hunting pressure. We don’t know the behavior of bison that have been hunted.
- A key question to decide is: What do we mean by “wild”? Some people grapple with the concept of wild bison, for example, bison are (a) large (so are moose); (b) herding (so are elk); (c) potentially dangerous (so are grizzly bears).
- There are real issues in bringing bison into MT (e.g., fences, disease, legal status of bison, treaty rights, economics, safety). We know many but are looking to be comprehensive by asking people during the scoping process. Scoping also provides an opportunity for education on all sides of the issue.
- We need to set goals, but how will they be structured/stated? Around populations? Genetics? Something else?
- What will happen when wild bison and domestic bison co-mingle? Impact on genetics?
- Wild bison are in UT (Book Cliffs, Henry’s Mountains), AZ (Grand Canyon National Park), Canada (Prince Albert Park).
- Wildlife means we are working together because we need both public and private lands to have a successful wildlife program. Sadly, what gets played up is fear and confusion. We must approach this process honestly and openly.
- Q—Wolves are a big issue. Could bison fill the hunting void created by predation losses of deer and elk to wolves? Bison are more resistant to wolves = more hunting opportunities.
- Q—Can MT Legislature curtail this effort? Yes.

Development of Partner Operating Procedures (renamed “Partner Protocols”)

SB presented a strawman set of Partner Operating Procedures, to help codify how Partners interact. Given confusion with the Field Operating Procedures document, the Partners asked for this document to be renamed “Partner Protocols”.

The strawman was created from the facilitator’s knowledge of how the Partners interact and from past input/requests from Partners and staff about processes they’d like to see more formalized and thus more consistent. The strawman employed similar protocols from the Clearwater Basin Collaborative as a beginning template, after a suggestion from the NP (see www.clearwaterbasincollaborative.org/?page_id=156).

Partners stepped through the 6-page strawman and provided input/modification/editing on each of 13 major sections. Those suggestions were captured by the facilitator for creation of version 2 of the Partner Protocols. **** Action items 6-8.**—Partners assigned SB to create ver2 of the Partner Protocols and then email ver2 to the Partners within 1 month. Partners then have 1 month to review and edit the document and return to SB. SB will update the document per the edits, and present at the August meeting.

One section under discussion is titled “Financial Obligations of Partners”. Partners returned to a question from past meetings regarding tribal funding of facilitation, meeting place rental, and similar. EC, LG, and RT said that they would meet with their counterparts in ITBC, NP, CSKT to discuss funding, including the potential that the three groups could act as a combined single funding body (****action item 9**).

Status for signing of 2011 Adaptive Management Plan

The 2011 Adaptive Management Plan was discussed at the Aug2011 IBMP Partner meeting, then modified in the following months to address all Partner concerns with a goal of signing at the Nov2011 meeting. At the Nov2011 IBMP meeting, PF and CM noted that the State of MT was in the process of undertaking an environmental assessment (EA) of the Gardiner Basin adaptive management changes that the Partners agreed to in principle in the spring of 2011 (see IBMP meeting summary from May and August 2011). Until the EA was complete, neither MFWP nor MDOL was at liberty to sign the 2011 IBMP Adaptive Management Plan, which includes the new adaptive management changes.

A Joint Decision Notice in favor of the Gardner Basin changes was completed by MFWP and MDOL and posted in Feb2012. That notice can be found at <http://fwp.mt.gov/fwpDoc.html?id=54797> and will not be repeated here.

With the EA complete and affirming the adaptive management changes, then the actions agreed upon at the Aug2011 IBMP meeting can move forward:

- add the agreed upon adaptive management changes into the 2008 Adaptive Management Plan;
- that Plan will now be called the “2011 IBMP Adaptive Management Plan” will be signed off by all Partners;
- the document will be posted to ibmp.info.

In the interim since the Nov2011, the State Veterinarian asked for slight modifications (not related to the Gardner Basin EA) of the 2011 Adaptive Management Plan. This change will be made and then MFWP will circulate the document for signatures (**** action item 10**). Once the document is signed, it will be (a) considered in effect, and (b) posted to ibmp.info.

Partner Briefings and Updates

Mary—follow up with Park County Commissioner Malone regarding past Partner responses to his questions.

This item has lingered on the Partner update list as no one was able to find a copy of the letter to Commissioner Malone. Post-meeting, RW noted that the letters to the County Commissioners of Park, Madison, and Gallatin counties are posted on ibmp.info (see <http://ibmp.info/Library/20100811>).

Mary, PJ, Pat—status of pending lawsuits

Lawsuit from the Western Watersheds Project to end bison slaughter is now at the 9th Circuit Court. Lawsuit from the Alliance for Wild Rockies suit against hazing bison in active grizzly areas was filed May 11th.

Pat—status of current litigation (1) by Park County and Park County Stockgrowers on north side AM changes; (2) on transfer of quarantined bison to Turner Ranch

(1) This case will be heard in August, during the week previously scheduled for the next IBMP meeting. Thus the IBMP meeting will be rescheduled. (2) Some mediation has been done on the Turner lawsuit.

Pat—status of relocation of quarantined bison from YNP

Bison were moved to the Fort Peck Reservation. There is currently an injunction against further movement of bison, both from YNP out, and also from the Fort Peck Reservation to the Fort Belknap reservation.

Don—Bison Quarantine Feasibility Study, Interim Summary, April 2012

A new summary is available and has been posted to ibmp.info.

JS, PJ—Feedback from Partners on YNP/ITBC past plan laying out a possible method of transfer of bison to tribe, including issues of operations, funding, and social/political concerns.

PJ noted that they had received helpful comments from APHIS and that a May 11 meeting with ITBC was planned. DH noted that a letter from YNP will be going out to NP and CSKT about the transfer of bison. LG noted that (a) treaty rights come into play with any transfer of bison, (b) tribes are trying to get back what was taken many years ago, (c) while respecting everyone’s culture, tribes want to speak for an animal that can’t speak for itself; (d) tribes get no revenue from bison, only treaty rights .

PJ—Status of draft EIS for remote brucellosis vaccination of bison

PJ noted that the draft final EIS has been completed and forwarded to the Superintendent for his consideration. Once that review is complete, the Draft EIS will be moved up through the chain of DOI.

SB—update on IBMP.info

SB noted that the RSS feed ON IBMP.INFO is now engaged and working again.

Future Meeting Planning

SCHEDULE

The Partners rescheduled dates for the remaining two meetings in 2012, as shown in Table 5.

Table 5.—IBMP schedule for remainder of 2012

Date(s)	Time (expected)	Location	Host	Notes
Aug 29-30	8 AM – 5 PM each day	Holiday Inn; W Yellowstone MT	MFWP	29 th —all day field trip into the Hebgen Basin (details will be posted on ibmp.info) 30 th —normal IBMP meeting, 8 AM–5 PM
Nov 27-28	Noon to 5 PM; 8 AM to noon	C’mon Inn; Bozeman MT	APHIS	Meeting will be convened by the 2012/13 IBMP Partner lead as of 1 Nov 2013, APHIS.

PARKED ITEM LIST

The following parked items list is to be considered as a possible source of agenda topics for future meetings. The list is carried forward to, and updated after, each IBMP meeting.

- (1) MFWP to sit down with landowners and identify AM opportunities based on their constraints.

- (2) NPS to share experience in managing bison interactions with traffic along roadways. Partners to engage with Montana Department of Transportation to initiate a discussion regarding traffic safety in the bison conservation area. A request was also made to include the CWG and/or Buffalo Field Campaign in the presentation with a topic area of “living with bison”. Some discussion that this item should be led by MFWP.
- (3) A request was made by MFWP that the Partners begin talking about conservation easement funding. A statement was also made that the CWG could be helpful in this realm.
- (4) The Partners need a public relations campaign to explain the benefits of transferring bison away from YNP as an integral part of achieving the goals of the IBMP.
- (5) Consider having a meeting (field trip, open house) in the Gardner Basin due to large interest there, particularly after the adaptive management changes made in Mar/Apr 2011. Desired outcome of the field trip would include review of public infrastructure and boundary adaptive management changes; looking at future challenges; showing work done to prepare for new North perimeter; challenges and opportunities associated with Mar/Apr 2011 adaptive management changes.
- (6) Request to move to 1-day format to minimize travel for NP (others?) who drive to IBMP meetings.
- (7) CWG/Partners linkage via Tech Committee
- (8) Method of tracking Partner responses to CWG recommendations.

Public Comment

The following notes on public comment to the IBMP Partners are not intended to be complete, but rather reflect the facilitator’s best effort to capture key statements. The facilitator has especially attempted to capture those comments from the public that appeared to be solution oriented and have the potential for inclusion in AM planning and/or process improvement. These items, as well as other potentially actionable items, are called out with a “***” in the listings that follow.

Names associated with comments are available from the facilitator. They are not included here, however, in an effort to focus on the comment rather than the speaker. Line breaks in the bullets indicate a new speaker.

May 1st

- Statement of appreciate for the CWG and to the Partners for their positive response to the group.
- Recognition that the CWG had come to an impasse on some of the issues it was addressing.
- Statement that the CWG has largely accomplished what it set out to do.
- Statement that the CWG was not meant as a “life sentence” (laughter) and that it was time to step down.

- Statement that individual has been working on the brucellosis issue for 30 years, and been pushing MDOL on it ever since. Will continue the push from here forward, particularly given the issue of brucellosis and elk.
- Thanks to Partners for bringing the CWG together.
- Statement of belief that the CWG recommendations give bison more room to roam.
- Statement that the CWG doesn’t fully understand all the Partner issues and likewise the Partners need to realize they don’t fully understand the issues of all members of the CWG.
- Statement that seroprevalence is not negotiable.
- Statement of agreement with previous speaker that the CWG work is largely done except working for and with Partner staff subcommittees.
- Statement the speaker will be happy to help any group that requests.

- Statement that the nation is looking to Montana to solve the bison issue.

- Statement that Montana lost 50% of tourist visits in 1990 after the 1989 bison slaughter.

- Statement that the speakers' group has five objectives: (1) change management of bison fully to MFWP with MDOL no longer involved; (2) reintroduce genetically pure bison to reservations, public, and private lands; (3) make use of Cabin Creek wildlife migration corridor (Red Canyon to Cabin Creek to Taylor Fork) as there are no cattle in this area; (4) use hunting to balance buffalo with available forage; and (5) get rid of the Stephens Creek trap.
- Statement that 60 buffalo, including calves, were caught up in a traffic jam this past week. Bison are still suffering regardless of the congratulations the Partners may be receiving.
- Statement of concern that the Partners failed to discuss GonaCon immunocontraceptive—where is NEPA in this process?
- **Recommendation to invite Peter Gogen (sp?) to speak regarding a new paper describing two extinct subpopulations of YELL bison
- Statement of thanks to Larry Greene of the NP for speaking for the bison and request to the Partners that they never forget their obligations under treaties to Native Americans.
- Statement of thanks to the Partners for taking the CWG work seriously, including excitement to hear that an EA for increased West Side tolerance of bison now has timeline.
- Statement of thanks to the Partners for their logistical support of the CWG for meeting rooms, facilitation, and so on. And also thanks to Partner staff for helping the work of the CWG when requested.
- Statement of thanks to Partners for moving bison to the Fort Peck Reservoir. Recognition that 4 died in the transition.
- Request that Partners think from the perspective of the bison.
- Statement that this is a great start toward returning bison to the Great Plains.
- Statement of thanks to all in the room, CWG and Partners and staff, for great work associated with CWF effort.

May 2nd

- Statement of appreciation for CWG members and their efforts, and for chance to CWG to interact with the Partners, and also for Partners support of the CWG
- Statement that the work of the CWG is important, that the time is ripe, and that the Partners have as a mandate to increase tolerance for bison.
- **Statement that strong opposition to translocation of bison exists but with a livestock vaccine we could settle that issue and assure livestock industry can be viable.
- Statement that we can never forget that brucellosis came from bison.
- Statement that calving started extremely late this year and that there are still lots of pregnant females out there that should not be hazed period, nor should the hazing date be brought forward.
- Statement that Hebgen Basin is not a great place for a hobby rancher.
- Statement that the Partners are not meeting their stated goal of free-roaming bison.
- Statement that hazing is a violation of tribal treaty rights.
- **Statement that bison generally eat their afterbirth, leaving little possibility of brucellosis transmission to cattle.
- Statement that lots of folks only see bison behavior as a function of their reaction to hazing. This behavior is not natural or realistic and only reflects the bison's desire to escape.
- Statement that fence damage generally occurs when bison are being pushed; that they are dainty in actuality.
- ** Statement that people need to spend time with wild bison to (a) understand their behavior, and (b) because they have much to teach us.

- Statement that Partners should recognize the historical significance of what they are charged with, and with the legacy that we all have inherited—that being the near extinction of the bison and the native people it supported. Request that the Partners take this responsibility with the weight that it deserves.
- Statement that there has been deep racist concerns against bison in their treatment and confinement
- Statement that bison have been recovering for 100 years and that it is time to open to a greater scope of children, land, native people, to all of us. It is time to open our hearts and lead with our hearts.
- Statement that the Partners have the privilege to have the power of these decisions.
- Statement of being new to the IBMP meetings; a land owner lining in the Gardner Basin.
- Question about where the rights of different groups and rights of landowners meet?
- Statement that speaker sees bison as safety issue, and sees tree damage.
- Question regarding what right the landowner and their kids should have to move freely about their own property. Statement that being outside is critically important to kids.
- Statement that loss or impairment of even one life is too many.
- Statement that if we are not careful these animals will go extinct.
- Statement that this is a human encroachment problem, not a wildlife problem so let's be careful and do the right things.
- Statement that sometimes it is confusing about what falls under the purview of the IBMP. For example, why does vaccination get discussed by the Partners but not the GonaCon immunocontraceptive being put forth by APHIS?
- Statement of agreement with previous speaker.
- Question—why is GonaCon report posted on IBMP.info when Partners have not even discussed it.
- ** Request to have GonaCon vetted publically.

Abbreviations

- | | |
|--|---|
| • AJ—Andrea Jones | • LG—Larry Greene |
| • AM—Adaptive management | • MBOL—Montana Board of Livestock |
| • APHIS—Animal and Plant Health Inspection Service | • MD—Marna Daley |
| • BB—Brooklyn Baptiste | • MDOL—Montana Department of Livestock |
| • BFC—Buffalo Field Campaign | • ME—Mary Erickson |
| • CM—Christian Mackay | • MEPA—Montana Environmental Policy Act |
| • CSKT—Confederated Salish Kootenai Tribes | • MFWP—Montana Fish Wildlife and Parks |
| • CWG—Citizens' Working Group | • MK—Michael Keator |
| • DH—David Hallac | • ML—Mike Lopez |
| • DSA—Designated Surveillance Zone | • MO—McCoy Oatman |
| • DW—Dan Wenk | • MOU—Memorandum of Understanding |
| • EA—Environmental Assessment | • MSGA—Montana Stockgrowers Association |
| • EC—Earvin Carlson | • MSU—Montana State University |
| • GAO—Government Accountability Office | • MZ—Marty Zaluski |
| • GNF—Gallatin National Forest | • NEPA—National Environmental Policy Act |
| • GWA—Gallatin Wildlife Association | • NGO—Non-governmental organizations |
| • GYA—Greater Yellowstone Area | • NP—Nez Perce |
| • ITBC— Inter Tribal Buffalo Council | • NPS—National Park Service |
| • JS—Jim Stone | • NPCA—National Parks Conservation Alliance |
| • KL—Keith Lawrence | • NRDC—Natural Resources Defense Council |

- Park—Yellowstone National Park
- PF—Pat Flowers
- PIOs—Public Information Officers
- PJ—PJ White
- RC—Ryan Clarke
- ROD—Record of Decision
- RFP—Request for proposals
- RT—Rob Tierney
- RTR—Royal Teton Ranch
- RW—Rick Wallen
- SB—Scott Bischke
- SEIS—Supplemental EIS
- SK—Salish Kootenai
- SS— Sam Sheppard
- TM—Tom McDonald
- USFWS—US Fish and Wildlife Service
- USGS—US Geological Survey
- WMA—state of MT wildlife management areas
- YELL—Yellowstone National Park
- YNP—Yellowstone National Park