

COMMENTS ON RAPID ASSESSMENT FORM

1) Bryce Maxell and Crew:

Wetland Type

- Some variability may be due to experience of the surveyor with the site on previous years during drier periods of the year.
- Temporary versus seasonal versus semi-permanent is very difficult to assess on a single visit.

Water Quality Condition Assessment

- Misunderstandings resulted from the turbidity question because many people read the question as having to do with toxic sediments instead of two separate issues (toxics versus sediments). This is the case with a few items on the form that effectively have two issues listed under the same question. Why not split all of these out so that it is unambiguous to the surveyor and so that the data is parsed out into smaller pieces for easy analysis.
- Cattle feces should be listed as one of the nutrient inputs.

Hydrogeomorphology Condition Assessment

- Seriousness of down cutting through old beaver dam sediments versus normal ground? Clearly old beaver dam sediments will be softer and more easily eroded.

Buffer Condition Assessment

- Everyone still wondered why grazing was not included in the buffer condition assessment since that is one of the, if not the, main impact on the buffer in many areas.

Vegetation Condition Assessment

- After the issue of not being able to identify species given the current photos and other ID materials, the biggest issue is what is to be considered? High water mark, low water mark, stark vegetation contrast between terrestrial and aquatic. If we consider stark contrast only, shouldn't we be assessing vegetation condition in the buffer because of its importance?
- We need to evaluate aquatic vegetation (exotics versus natives).
- Instructions say dead wood, but form says dead wood or unhealthy for shrub health. This resulted in confusion and differences in scoring (i.e. dead wood versus unhealthy). Maybe there could be separate subsections and scores for dead versus unhealthy.
- The term cover can be confusing because if a species is well distributed around the wetland, but there are only a few plants present, then someone might consider it to have a very high coverage. I assume you are after actual percentage of total area covered?
- Simpler photos for the guide would be better than the complex schematics present in the current version of the guide book for shrub architecture, browse utilization and shrub regeneration.

Restorability

1. If we don't know what the grazing regime (timing and intensity) is, then it seems hard to evaluate this in the field.
2. Differences between answers may be due to the fact that there are several statements in the category ranks and one person might be responding to one statement while another person might be respond to another statement.
3. Some people evaluated site 003 for restorability as if the dam is and was there and how do we restore veg around the margins of the lake. Others, like myself, said the dam totally drowned the entire historic wetland and was therefore scored much lower.

Miscellaneous

1. A little bit of general confusion throughout due to lack of experience with terminology and wetland evaluation. Overall this brings up the need for a lengthy training session with a number of sites followed by discussion and then run everyone through a standardization exercise like this before sending them out for the rest of the summer. Also, they should spend a couple of days surveying sites with an experienced surveyor. Most of the differences came from differences in interpretation that could easily be standardized by going through different wetlands together.
2. Shouldn't invasive species be in the list of overwhelming stressors. Natural disturbances may be occurring and having invasive species in the area would be the stressor in this case because, for example, if a natural fire moved through an area the invasive species would only become established if they were present in the area.
3. The overall form could be greatly reduced in length in order to save paper and bulk. For example, there are a number of blank areas on the pages and people felt like it was a waste of time to calculate the percentages in the field so they weren't really needed at all. Similarly anything else that can't be answered in the field, like 12 digit huc code, could be eliminated in order to reduce the lengths of the field forms.
4. Need something on angle of slopes surrounding wetland because wetlands with slopes around them will be much more impacted from a given level of ungulate grazing/trampling pressure than a wetland with flatter ground around it.
5. On question about the wetland having >20cm of organic material many people answered "No" on the beaver site (109) because even though it was holding more than 20cm of sediments it wasn't bouncy. Do we go off of >20cm or do we go off of bouncy?
6. On site 109 some people answered with a 1 on the headgate question because of the headgate on site 003 which is above the site. I think they did a great job on this, but I didn't consider it because it was so distant from the site. However, this brings up a good point because of the limitations of surveying 1 or only a few sites in a watershed instead of evaluating an entire watershed as a unit.
7. There seemed to be quite a bit of variability with answers on the "trending" questions. The crews all felt this was a hard thing to answer on a single visit. For example, if you went to a site in the spring before cattle were turned out you might say it was trending upward, but if it was surveyed a few weeks later after the cattle had been turned out you might say it was trending downward. Similarly, our documentation of what is causing the impact or trend might change – elk in the spring versus cattle in the summer at sites 002 and 003.

8. Put all number scores in separate boxes would reduce confusion resulting from having them included with the text.
9. Again, I would encourage use of a single datum (NAD27) because that is what is on the topographic maps and would also encourage the use of UTM coordinates because they are easy to interpret in the field and are on the topo maps.
10. Need to have an example datasheet filled out so that people can refer to it in order to see the types of comments you are after.
11. Many people felt like the final comments category was redundant because they had already listed their comments in all of the other sections.

2) Erin Fehringer and Erin Farris:

- Erin Farris suggested numbering the questions on the form to make it easier to follow
- “Recovery Trends” section in Hydrogeomorphology should probably be eliminated; it is very hard to assess, especially at beaver ponds and depressionals.
- Some difficulties with shrub questions – could see how these would be hard to grasp for inexperienced volunteers.
- Shrub Architecture question is confusing and ineffective. If there is any browsing at all, then all the shrubs will have retrogressed architecture, giving it the lowest score even if browsing is minimal. This question needs to be re-worded or eliminated.
- Need to add “Beaver Pond” to Wetland Type Picklist on front page, that is, if we decide to use beaver ponds in the future.
- Need to re-word the organic material question on first page. Could just ask if the wetland contains organic soil. Saying 20cm implies the need to measure soil depth, which we don’t want to do.
- For site map, should create a “legend” showing what symbol to draw for different types of vegetation. This would make site maps easier to compare.
- Should separate sediment and toxics questions.
- Don’t need as many Comments sections; could just put one at the beginning or end.
- “Rank top 3 stressors” questions in each section seem a bit repetitive. It’s not very often that they change. Maybe don’t need them.
- Need to clarify when to fill out Trees section. Maybe only fill out if a “community” of trees is present... define “community” as in more than 3 trees, or something like that.

Randy’s Notes from June 2004 field trip with Bryce and his Staff

Site Characteristics

- 1) Specify Datum UTM coordinate NAD27. NADCOM software can be used to convert UTM to lat/long. UTM’s are equivalent to meters.
- 2) Have a prompt to identify fish species when possible.
- 3) Softshell (APSP)
- 4) Send e-mail to Bryce to sort amphibians and reptiles by taxa group.
- 5) Beaver ponds should have own wetland type (subcategory)

- 6) For site characterization we should also consider recording the steepness of the slope to the wetland, and size (width x length).

Site Map

- 7) On the site map provide a prompt to indicate where each photo was taken.
- 8) Make it clear that the buffer area is 100 meters on the site map.
- 9) Record on site map the “percent” and “area” of emergent vegetation
- 10) We need guidelines on how to draw vegetation on the site map.
- 11) We should be using a compass for drawing the wetlands on the site maps so North is accurate.

Water Quality Condition Index

- 12) Include a statement that we should not lower the score if there are oils sheens from natural plant decomposition (judgment).
- 13) Formatting is confusing. Reformat the water quality index questions by making a separate column for the scores.
- 14) We need a separate question about sediment. Do not combine with toxics.
- 15) Scoring for the water quality condition index should probably be determined by the average of the two lowest scores.

Hydrogeomorphology Condition Index

- 16) Should include the assessment of both “percent” and “degree” of hummocking and then combine the results. (2 subquestions)
- 17) Add more choices for scoring the hydrogeomorphic recovery trend (on the high end).
- 18) And/or For “hydrogeomorphic recovery trends” replace no impacts to include minor impacts for a score of 10.
- 19) Hydrologic condition index score. Take sum of the lowest 5 scores. Not the average.
- 20) The question on bare ground should ask what percent of emergent vegetation is impacted by trampling or other human-caused disturbances. Don’t include open water or hummocking.

Buffer Condition Index

- 21) For buffer include “recreational activities” with row crops.
- 22) Lets include grazing and nonnative vegetation in the buffer. Grazing should be none, light, moderate and severe. Nonnative vegetation should be expressed as a percent (use similar list as for invasive species).
- 23) Directions should state that the assessment unit length is 100 meters (not 150 meters)
- 24) Add a score of 10 if the roads are >100 meters from the wetland. Staff were finding the current format confusing.

- 25) We should make sure the road is within the catchment for small wetlands as criteria for a lower score.

Vegetation Condition Index

- 26) We need vouchers for vegetation identification
- 27) Tall Shrubs. Have a prompt that states that we should skip this section if the site does not have the potential for shrubs.
- 28) Need a better vegetation photo guide with drawing and descriptions for identification.
- 29) Simplify the shrub architecture and browse guide. It has too much information.
- 30) For the Invasive species we should change the format to rank the vegetation instead of listing them. For Example ____Reed canarygrass; 2Smooth Brome; 1Quackgrass; etc.
- 31) We need more categories for percent vegetation cover. For example 1) none present; 2) <1%; 3) 1-5%; 4) 5-15%; 5) 15-30%; 6) 30-50%; 7) >50%
- 32) Invasive vegetation cover should be % of the plant community. We need to make it clear that we should not consider bare ground.
- 33) We need an aquatic plant key and we need to get a list of nuisance aquatic plants for depressional and lacustrine wetlands.
- 34) The first shrub browse question should be “what percent of the shrubs are not arrested or regressed” (opposite of what we have – easier to estimate).

Additional Comments

- 35) Find a better photo for Racer. Bryce will eventually provide amphibian and reptile field guide.
- 36) Make it clear what the edge of the assessment area is. It was difficult to determine what the edge is for depressional wetlands. Photos would help.
- 37) We should consider recording all photos at one location within the worksheet.
- 38) Lets avoid referring to the pick list of stressors on page ten. The list should be on the same page as the questions. I am not sure if we need to list the stressors for every category. This information could also be included in the comments.
- 39) We need to have a question to discuss if the wetland was converted to another type. For example, a riverine wetland may have been converted to a lacustrine by flooding with a dam. We need to state what wetland type we are considering as reference or potential for the assessment (riverine or lacustrine?).
- 40) We need to find a way to encourage assessors to take the time to walk the entire assessment unit to assess water quality and hydrogeomorphology and then walk the entire assessment unit again to assess vegetation conditions. We should be walking the entire assessment unit at least 2 times to observe differing characteristics for less complex wetlands and 3 times for more complex wetlands (e.g., which include a shrub and/or tree component.)

- 41) The final score index does not need to be filled out in the field. We eventually want to use a PDA (Personal data assistant) to collect the data. It will likely improve QA/QC as it will have prompts for each questions and will make our calculations automatically.
- 42) We should put a hatch through any part of the form that we do not use so that we know that the questions or prompts for comments were not missed inadvertently.
- 43) Define "Lacustrine" as a water body where the dominant portion of the waterbody is >2 meters. The wetland that we assess is the lacustrine fringe.
- 44) We need to label/number the categories and questions on the form.
- 45) Reduce the size of the form. Comments can be smaller. Avoid calculations until the end of the form, which do not need to be done in the field.
- 46) We should get 2-way radios for communication and satellite phones for safety.
- 47) We should develop an example datasheet with comments and site photos for training.

Comments from Anna Noson

- I think probably most informative will be how well the rapid measures correlate with the quantitative measures by Marc Jones, something I know you already plan to do or have done.
- I agree with Randy that beaver ponds may not be an appropriate wetland type for rapid assessments. It seems to me that more important than an individual beaver pond's condition, is understanding beaver influence in a watershed (e.g. unique habitats and processes).
- From a bird habitat perspective, I would suggest expanding the area of the riparian zone that is considered in the assessment. For example, often cattle effects were most prominent not at the stream edge, but at the willow edge, and their effects could be spotty depending on shrub density and location of wet meadows.
- Also, I think it's important to consider what unit you are sampling with each assessment, and to what scale you wish to apply the assessment (e.g. are you assessing just that 100 m stretch of stream or the entire reach?). This has implications for understanding how to interpret the assessment, as well as how to scale up the assessments to overall conditions of a stream and watershed.

Comments from Sue Wall-MacLane, Herrera Environmental Consultants

- I looked over the draft rapid wetland assessment method, and reviewers comments. My comments are mainly to do with the vegetation section, since that's my specialty. I've been doing wetland delineations and functional assessments in Montana, Idaho and Washington for the past couple of years, and I attended the MDT wetland assessment training last fall. Based on those experiences I have a few more comments on the draft method:

Page 2: Site Map for Wetland Assessment Area - where you ask for a ranking of the types of emergent veg. present there's no category for forbs ie. geum, angelica, willow-herb. Those can be a fairly large part of the canopy cover in some emergent wetlands.

Page 5: Hydrogeomorphology Condition Assessment -

on the question about dams withing 1/4 mile upstream - do you want to distinguish between beaver dams and artificial dams?

the recovery trends section seems like it needs an experienced person to evaluate this, and one site visit could be very misleading. I wonder if this question should even be included.

Page 7: Vegetation Condition Assessment -

you could break up the invasive species section into two sections, one for state and county listed noxious weeds, and one for introduced aggressive or undesirable species. In that case you might want to get the current state and county lists before going out in the field.

in the Trees section you could define the age classes eg. seedling, sapling, pole, mature tree (with diameter ranges for each class). In the question % removal of tree layer, what time frame is that? Are you concerned with historic tree removal, or just recent?

Page 10: Stressors - I agree with the comment that noxious and undesirable plant species should be listed as a stressor.