Proposed Statewide Grazing Regulatory Action Project (GRAP)
Stakeholder Focused Listening Session (FLS)
November 3, 2014

Environmental Justice and Environmental Stakeholders (EJ/ENV)

Stakeholders invited to participate in this session included representatives from: California Rangeland Conservation Coalition; Central Sierra Environmental Resource Center; Klamath Forest Alliance; Center for Biological Diversity; The Nature Conservancy; Sierra Club; California Rangeland Trust; Sonoma County Land Trust; Sierra Nevada Alliance; Eastern Sierra Land Trust; California Trout, Inc.; California Sportfishing Alliance; Environmental Justice Coalition for Water; Community Water Center; Clean Water Action; Carbon Cycle Institute.

Note: The following bullet points summarize the range of opinions and concerns expressed by the invited stakeholders, and are not intended to reflect the position of the Water Boards or staff on any issue. Because they summarize all responses, any individual bullet point is not intended to reflect the opinions of any one stakeholder(s). The bullet points are not presented in any particular order.

How should we define grazing for the purposes of GRAP?

- Identify the activities that are causing water quality problems.
- Because California habitat is extremely diverse, grazing impacts on aquatic resources and water quality can be more or less significant depending in part upon the sensitivity of the habitat affected by livestock. (Example: Desert springs or streams may be far more vulnerable to livestock effects than springs or streams in the Central Valley or coastal areas). Improvements to be made depend on the habitat – so define grazing in terms of habitats.
- Consider different metrics for different areas as it is difficult to make recommendations for the whole state when regional differences exist.
- Grazing is a subset of activities a rancher conducts, so definition should be part of all activities.
- Definition should consider only areas where impacts occur, not where they could occur.
- Issue is not the herd size within the allotment but where the cows are located.
- Herd size is more relevant on private lands.
- Definition should consider that streams and meadows are “magnets” to livestock.
- Grazing duration and intensity (number of animals) often determines the degree of impact to water resources..
- Recreation occurs in these same grazing areas; Due to public health concerns, more bacteria sampling on streams is needed.
- As management style is key factor, definition should focus on the management style of lands. Grazing by livestock is not the sole impact on water quality or watershed health, but it is one of numerous cumulative effects (including recreation and land management actions).

- Monitoring of grazing for purposes of assessing water quality impacts needs to be part of a regulatory program with a priority focus on smaller streams.
- Metrics that guide management of meadow systems need to be defined.
- The definition needs to be broader in context to include ecosystem services for both private and public lands.
- Grazing should be defined as the presence of livestock on public and/or private lands within the state that results in potential effects to water quality, watershed function, stream banks, and the health of aquatic species. Livestock presence (grazing) can affect water resources through the consumption of vegetation, physical impacts to stream banks, riparian areas, and upland watershed areas, and the potential contamination of water from animal waste.
- CAFOs (Confined Animal Feeding Operations) of any size should not be considered "grazing".
- Grazing should be defined as operations where animals are able to derive a significant amount of their nutritional needs from plants growing on site at all times of the year. Due to the long time line for developing grazing regulatory programs, the Water Board should decide the scope (i.e. how grazing is defined) early on. Depending on the scope and definition, existing regulations such as for CAFOs, could be immediately be used.

What would a successful regulatory program look like to you? In your experience, what types of management practices have been effective in protecting or improving water quality? How can we incentivize use of effective management practices?

- The program should emphasize management practices with monitoring. The regulatory program should emphasize water quality monitoring at key representative sites to assess effectiveness or need for change.
- On federal lands, long overdue NEPA analysis for many grazing allotments is still not yet completed after two decades of delays. The completion of planning and approvals of Allotment Management Plans (AMPs) is needed for a large percentage of USFS allotments. If long overdue AMPs are not completed in a timely manner, the State should require reduced levels of livestock numbers to ensure water resource protection until mandated environmental analysis can be completed.
- As AMPs currently only consider forage conditions, water quality parameter assessments need to be added.
- AMP permit holders with monitoring that shows minimal impacts should have longer terms of use.
- If water quality violations are shown, then terms of use should be limited in the AMPs.
- GRAP should develop a process that is capable of showing a measureable improvement (or lack of improvement) in water quality, fits available resources, and considers regional variables.

- Any regulatory program should address livestock effects on stream banks, the degree of sedimentation from sloughing and chiseling, and the resulting widening that results in shallower streams with increased water temperatures.
- There currently is no incentive for better grazing management.
- Ranchlands with ephemeral streams that do not connect to larger waterbodies have no delivery mechanism to influence water quality impairment.
- Grazing requires monitoring to fine-tune and improve required management practices.
- Since herding diminishes impacts, it should be encouraged.
- Water sources off stream areas, such as troughs, should be encouraged.
- Fencing is problematic as it limits recreation access. Management practices such as fencing, exclosures, protections for wet areas, and herding as potential management tools should be encouraged. While fencing in specific areas can conflict with recreation access, in other areas fencing can be applied as a key tool to reduce the presence of livestock in vulnerable stream reaches.
- Flash grazing can help control invasive species.
- Incentives or rewards should be available to those that use good grazing management practices. Good grazing management should be rewarded through public recognition.
- GRAP should include some kind of tiered system with high-risk operations or high-risk public land sites being treated differently from low-risk operations or low-risk sites.
- Regulation that includes incentives must also include adequate resources to be able to reward or penalize operations.
- Regional Boards must be able to focus on grazing regulation over the long term for GRAP to be successful and need staff that is knowledgeable about ranching management practices.
- GRAP should focus on riparian area and upper watershed impacts, and means to prevent excessive livestock trailing.
- The Water Boards need to more closely coordinate with the U.S. Forest Service on grazing management issues.
- GRAP should include the ability to apply regulatory processes to ecological timescales.
- GRAP should encourage stability in its programs by including long term strategies.
- There must be adequate Water Board resources available for both short and long term administration of GRAP.
- Limited resources, especially tied to monitoring and assessing livestock and water quality effects on private lands, means that resources should focus on monitoring areas most likely to be contaminated and where monitoring can assess the efficacy of management practices aimed at improving water quality.
- The grazing regulatory program should utilize the best available scientific information on how to protect water quality while conducting grazing operations. BLM Technical Manual TR 1737-20 is one example of applied best science and should be used to shape BMPs for grazing anywhere in California.
- Actual and specific on-the-ground BMPs (as listed in the USFS Manual and in numerous other federal government publications) should be required.

- A key component of the regulatory program must be compliance monitoring conducted by Water Board staff on a random sample of grazing sites to determine if BMPs were properly utilized and the extent to which the BMPs employed were effective in protecting water quality.

In your experience, what types of monitoring have been effective in assessing water quality?

- Monitoring is needed to ensure water quality standards are being met.
- Inexpensive, cost-effective water monitoring needs to be the primary focus of a regulatory program although priority-focus analysis at a more detailed level may be appropriate to apply at hot spots of concern or high visibility locations.
- A minimum of five bacteria samples in a 30-day period is needed to accurately reflect the variations in fecal indicator bacteria presence in tested stream reaches.
- Resources available for monitoring are limited. Any monitoring needs to achieve the "greatest bang for the buck".
- Monitor where grazing-human contact exists and focus on greatest risk to public health.
- A statewide effort would make regional regulation less effective. Monitoring must consider regional inconsistencies. As different regions have reasonable variation, monitoring should be specific to locations.
- While regional variations certainly require careful consideration, the greater the consistency of a statewide monitoring strategy, the more that stakeholders will see the program as fair, transparent, and credible.
- A statewide approach may limit regional effectiveness.
- A regulatory program should more closely consider the use of fecal indicator bacteria.
- A minimum number of grab samples should be included as part of monitoring.
- As part of the regulatory monitoring program, ensure that monitoring includes sites with the highest potential for conflicts between water uses and water quality impacts that may be a result of livestock presence.
- Certain high-visitation national forest areas (such as the Stanislaus or Inyo National Forests) have overlapping areas of livestock use and significant levels of recreation visitation that makes those areas appropriate for prioritized monitoring.
- Effective monitoring needs to include more than bacteria assessment (e.g., needs to consider degree of livestock impacts on vegetation, stream bank stability, habitat function , and the overall health of the stream structure and riparian zone). It also should include temperature, sediment loading, and other key parameters. It should be protective of all beneficial uses. Monitoring of rangeland management that captures all uses should be considered.
- Multiple season of use impacts and structural health of stream reaches need to be monitored (these types of monitoring are complicated).
- Monitoring for ecological protection is complicated.

- Monitoring needs to be specific for type of animal (e.g., cattle, goats, sheep, pigs, horses) as different animals need different management practices.
- In desert rangelands, wild burros cause impacts and should be monitored.
- It is not the type of animal but the duration of grazing that drives impacts.
- Impacts to riparian resources, primarily on lands managed by BLM , need to be monitored.
- Prior to monitoring, assess environmental conditions and develop management objectives, then monitor to ensure compliance with meeting objectives.
- Effective monitoring should at least periodically include interested stakeholders. For monitoring to be credible, those responsible for monitoring should be primarily neutral, independent, public agency monitors, or monitoring should include both industry-resource interests being present together**.**
- A priority for public land is to ensure that water quality sampling is actually done to ensure water quality standards are being met, rather than checking off on a checklist whether or not process-focused BMPs were or weren't implemented.
- The USFS should monitor for water quality on its grazing allotments especially where interaction with other uses is high.
- More coordinated monitoring in needed between all agencies and groups of individuals. An example where this is occurring is in American River watershed.
- Water quality monitoring is absolutely necessary to evaluate the effectiveness of management practices.
- A strong monitoring program is essential and should include possible computer modeling, as computer modeling might be more cost-effective.
- Any computer models should consider climate change.
- Monitoring needs to include pack animals in back country.
- Monitoring needs to emphasize areas of greatest value and sensitivity such as alpine wet meadows.
- Monitoring needs to be flexible as water quality problems are very localized and extreme.
- Adequate resources need to be requested by Water Boards in budget requests and agency interactions with decision-makers in order to assure that resources will be available to take samples, assess resource impacts of livestock, and evaluate changes or responses to actions taken on private range lands.
- Monitoring should address the concern that livestock can transmit diseases to wildlife.
- A successful monitoring program requires engagement with the entity that will have to conduct monitoring.
- Monitoring should evaluate impacts to vegetation in riparian areas.
- Water Board monitoring should be coordinated with the USFS's BMP monitoring checklist (the checklist currently has limited nexus to water quality objectives).
- With public land grazing, monitoring (including establishing sites for monitoring) must be done by the agency's water quality staff and verified by Water Board staff. It should not be done by the agency's grazing technicians.

- The most effective monitoring has been actual water quality testing but only when this testing is done independently and not by agencies whose primary mission is to serve agriculture.
- If any third parties are used by the Water Board to monitor grazing BMP application and effectiveness and/or grazing impacts, then the Water Board must establish a robust quality assurance program that it operates directly.

What are the unusual or extreme circumstances that GRAP should consider as part of its regulatory program (e.g. weather, market conditions, wildfire, livestock diseases)?

- Flexibility should be allowed to increase stocking rates provided water quality objectives are being met.
- Increased grazing in certain areas should be allowed where grazing areas are burned from forest fires and grazers are experiencing financial difficulties.
- USFS should not allow grazing in areas that would not meet ecological conditions regardless of impacts from fires. Despite potential increased vegetative growth following wildfire events on public grazed lands, the vulnerability of the burned watershed (bare soil) and degraded stream banks, as well as the sensitivity of re-sprouting riparian vegetation may combine to justify lower numbers of post-fire livestock within the burned landscape until adequate ecosystem recovery is verified.
- GRAP should include extreme circumstances.
- GRAP should consider the capacity for livestock to transmit disease to wildlife.
- The water quality impacts from pack animals should be considered.
- Livestock are vectors and can transmit disease to frogs and toads. Grazing impacts to threatened, endangered and listed species should be considered.
- Climate change needs to be considered.
- Where T & E or Special Status aquatic species are identified to be at high risk, water quality protective measures from grazing impacts need to be especially stringent and sufficient - in contrast to areas where high risk species are not likely to be affected by grazing effects.
- GRAP should be designed to protect water quality during storm events up to and including 25-year recurrence sized events. Storm events beyond 25-year recurrence events should be considered unusual circumstances. Alternately, storm events that inundate lands beyond the extent of the riparian zone can be considered "extreme circumstances".

How can we best collaborate with all stakeholders regarding grazing and water quality?

- Hold a lot of small sessions like these Focused Listening Sessions.

- Use the website to share the progress of GRAP and the types of input received from stakeholders in order to keep the process transparent.

General Comments and Questions

- The State's list of impaired waters only includes those creeks where monitoring has been conducted – additional impairment is likely in creeks where no monitoring has been done.
- A large number of watersheds managed by the USFS have not been monitored, so likely there are more impaired watersheds than currently listed by the State.
- Will individual grazing allotments be considered as a facility?
- Is there a limited time to submit information to the science portal?
- How did the Water Boards determine that there was a water quality problem from grazing?
- As there are big differences between public and private lands, they should be regulated differently.
- Private entities have been monitoring watersheds managed by the U.S. Forest Service for years and have not determined any improvements in water quality.
- Focus of the GRAP should be on key areas such as mountain meadows or popular recreation sites.
- Since the USFS Plan revision process is currently underway, how do the individual forests fit into the GRAP process? This is also an opportunity for collaboration.