

July 20, 2012

**Points Supporting the Exclusion of Irrigated Pasture from Program Scope**

- 1 “The present water quality within the Region generally meets or exceeds the water quality objectives set fourth in [the Basin Plan]” (Page 1-11.00 of Water Quality Control Plan for the North Coast Region). Accordingly, a comprehensive Ag Lands Plan that covers every agricultural operator in the Region is **not** necessary to address water quality issues in this Region.
1. Because of limited resources, it is the desire of the Regional Board to focus on the most serious environmental threats first, rather than wasting resources on operations that pose little or no risk to water quality. (Statements of Ms. Kuhlman - Dec. 14, 2011). In Region 1, irrigated pasture represents less than 1 percent of all land use. It defies logic that this 1 percent of low-impact agriculture poses a significant risk to water quality in the Region.
- 1 Irrigated pasture provides environmental benefits:
  - a. Nonirrigated land in the mountain areas of Region 1 do not receive enough annual rainfall to support substantial vegetative cover. The Basin Plan notes that Region 1 “mountain soils are shallow and often unstable” (Page 1-6.00).
  - b. The extensive root system of permanent pasture plants stabilize the soil, even on steep gradients. This soil stabilization prevents sheet erosion and wind erosion, which is common in non irrigated lands and in tilled lands. It is a well established fact that the dust bowl of the 1930’s was the consequence of tilling ground that was previously permanent prairie sod.
  - c. The vegetative cover of permanent pasture also acts as a water filter catching and preventing silt and nutrients from being transported to receiving streams. NRCS still maintains programs for grassed waterways as a way to mitigate erosion and avoid the sorts of soil losses experienced during the dust bowl.
  - d. Irrigation of permanent pastures along streams acts to raise the water table and promotes a wider and more diverse riparian buffer than would exist under natural conditions. This effect can be clearly seen by touring both irrigated and “natural” dry stretches of the same creek or river.
  - e. The benefits provided by irrigated pasture is supported by an on-the-ground independent survey of Bogus Creek conducted by the California Department of Fish and Game and assisted by two Regional Board staff members (Bogus Creek Coho Restoration Project Summer Reconnaissance Survey, 2009 -- a copy previously supplied to staff). The irrigated land in the Bogus Creek Watershed is comprised entirely of irrigated pasture. This survey concluded that the irrigated pasture had no detectable harmful impact on Coho spawning or rearing and resulted in an extremely healthy riparian habitat.

- f. Given the demonstrable benefits of irrigated pasture over more intensive forms of agriculture, which involve ground disturbance and intensive use of pesticides and fertilizer, the conversion of cropland into permanent pasture would provide a net improvement to water quality in the area. By excluding permanent pasture from the program scope, an incentive will be provided for operators to convert intensively farmed land into permanent pasture.
4. Irrigated pasture has little potential to negatively affect adjacent receiving water courses:
    - a. Pesticides, including herbicides and insecticides, are rarely applied to irrigated pasture. Insect pests are rare and through proper grazing management weeds are generally not a problem. In those very rare cases where weeds are a problem, spot treatment is generally sufficient. Many grazed pastures are not even fertilized and those that are fertilized, are usually fertilized below UC recommendations. (Statements of Steve Orloff, UC Cooperative Extension, at May 9, 2012 regional meeting)
    - b. Permanent pasture is rarely if ever tilled. As a result, pasture soil is not subject to wind or water erosion.
  5. To the extent irrigated pasture poses any water quality risk, these risks are limited to specific watersheds and are being adequately addressed outside of an Ag Lands Program through other regulations and the cooperative actions of landowners and resource agencies. For example:
    - a. The Scott and Shasta watersheds are currently under a TMDL conditional waiver, which is working well to address the heated tailwater irrigation returns. (Statement of David Leland on phone call of June 22, 2012)
    - b. Under the FSA CCRP program 16,000 acres of riparian buffers have been established along 350 miles of Siskiyou County watercourses.
    - c. Other riparian buffers have been established with the assistance of California Fish and Game, U.S. Fish and Wildlife, the Regional Board and local RCD's. As a result, protected riparian buffers exist along virtually all of the irrigated portions of the Scott and Shasta Rivers.
    - d. Over the past decade, over \$25 million has been expended on conservation projects in the Scott and Shasta valleys through landowner cost sharing and grants from NRCS, the Regional Board, US Fish and Wildlife Service, California Fish and Game, The Nature Conservancy, Rural Advisory Committee, Pacific Corp. and other resource agencies and entities. A new regulatory permitting program will not accelerate the pace of conservation projects and will cost landowners potential cost sharing dollars.
    - e. The exclusion of permanent irrigated pastures from the program scope does not prevent the Regional Board from addressing water quality concerns on specific

irrigated pastures under the TMDL waivers or through its general powers granted by the Water Code.

6. Accusations have been made that the irrigation of permanent pastures results in elevated temperature tailwater which unreasonably impacts the other beneficial uses of receiving waters. To make a determination whether the tailwater from a particular field has a unreasonable impact on one or more competing beneficial uses would involve an extremely complicated analysis that assess a myriad of factors, including but not limited to the following: (a) the temperature of the receiving water at various times of day and night; (b) the temperature of tailwater at various times of day and night; (c) the volume of tail water relative to the volume of the receiving stream; (d) identification of competing beneficial uses; (e) identification of temperature requirements of competing beneficial uses; (f) a reconciliation of possible conflicts between the temperature requirements of beneficial uses (warm water species vs. cold water species); (g) affect of riparian shading; and (h) understanding of seasonal stream flows. The numerous variables and their interactions would make it an administrative impossibility to effectively and fairly regulate elevated temperature tail water discharges.

IN ANY CASE, the State Board has explicitly preempted the Regional Boards from treating irrigation return waters as elevated temperature waste. The State Board specifically addressed the thermal issues related to irrigation tailwater in the “Water Quality Control Plan for Control of Temperature in the Costal and Interstate Waters and Enclosed Bays and Estuaries of California” (the “Thermal Plan), which states **“Irrigation return water is not considered elevated temperature waste for purposes of [the Thermal Plan].”** (Page 1). The State Board goes on in the Thermal Plan to clarify that the prohibition against treating tailwater as elevated temperature waste is intended to be consistent across all State and Regional Board plans and policies that address interstate waters. Item 2 of the “Implementation” section of the Thermal Plan states that **“sections pertaining to temperature control in each of the policies and plans for the individual interstate and costal waters shall be void and superseded by the all applicable provisions of this [Thermal Plan].”** Because the proposed Ag Lands Discharge program contemplates addressing interstate waters, the Regional Board is prohibited from treating irrigation tailwater as a waste discharge.

7. Maintaining irrigated pasture within the program scope greatly increases the program complexity and potential unfairness:
  - a. A substantial amount of time during the regional and region-wide meetings has been spent discussing appropriate acreage thresholds. Since many of the small acreages discussed are devoted to irrigated pasture, the issue of minimum size will become much less important if irrigated pasture is excluded from the program
  - b. It is difficult to make a clear distinction between irrigated pasture and non-irrigated pasture. Some “irrigated” pastures may only receive one irrigation

a year or are only irrigated in good water years. Other operators may only irrigate in years with low rainfall. In addition, some “non-irrigated” pastures on the coast may receive more water through rainfall than is applied to “irrigated” pastures inland. By contrast, if all pasture is excluded from the program, there is a clear distinction that can be drawn between permanent pasture and commercial crops.

8. There is precedent for excluding irrigated permanent pasture from the scope of the program. Region 3, which has in excess of 50,000 acres of irrigated pasture according to the USDA 2007 Ag Census Data, excluded irrigated pasture from its program scope. It would seem odd that Region 1, which has significantly better water quality than Region 3 and less than one percent of its land dedicated to irrigated pasture, would have a more invasive regulatory regime than Region 3.
9. The Ag Lands Program has been designed to be an evolving regulatory structure. It must be revised every 5 years and can be revisited sooner if the Regional Board sees a need. If irrigated pasture is excluded from the initial program scope, the Regional Board could decide to expand the scope if necessary in 5 years. At which time, greater base-line data and a **revised state fee structure** might allow for a more effectively structured approach.
10. Irrigated pasture is the lowest value use of ag land and, accordingly, has very low profit margins. This type of land is owned almost exclusively by family farmers who cannot bear large variations in farming costs. As a matter of survival, these farmers will not lightly sign on to a permit with an open ended fee and cost structure. This is especially true when it is patently obvious that the water quality risk associated with irrigated pasture land pales in comparison with the risks associated with intensive high-value agriculture practiced throughout the state. At our December 14th meeting, Ms. Kuhlman noted that landowner “buy-in” and cooperation was essential for a successful Ag Lands Program. It is unlikely that such cooperation will exist if irrigated pasture is included in the program scope at this time.

### **Possible Alternative for Dealing with Irrigated Pasture**

We and our constituents hold strongly to the belief that irrigated permanent pasture should be excluded from specific regulatory plans and subjected solely to the provisions of the Water Code that deal with pollution and nuisance. If, however, staff feels compelled to include irrigated pasture in some form of program, it would be more logical and acceptable to include permanent irrigated pasture in an animal grazing program. Virtually all irrigated pasture is managed in connection with a livestock operation. All of the potential waste discharges within the Regional Board’s authority to control are related to animal grazing rather than the actual production of pasture grasses.

For example, some of the concerns stated in connection with irrigated pasture include nutrient loading from excess manure, sedimentation from excess hoof action, stream bank degradation, and reduction of riparian vegetation. These are concerns more appropriately related to livestock management than to the production of pasture grasses. This is the approach that has been taken in the dairy program and would allow all livestock operators to be treated uniformly regardless of the color of their cattle.

Our constituents (primarily cattle producers) are very reticent to enroll in an irrigated ag lands program that lumps them together with the high intensity ag operations in Regions 3 and 5. Because fees per acre are presently uniform throughout the state without regard to land value, land income, or environmental impacts, there is potential for great unfairness in the application of fees. Our landowners are not willing to bet their livelihoods on the promise that the State of California will make the necessary equitable changes to its fee structure. Compliance will be much higher if we could enroll in a separate grazing program that is in no way tied to the environmental problems of intensive irrigated ag lands.

Since the state is presently developing a grazing program, this could be used to address environmental problems (if any) created by irrigated pastures. A further benefit to both the effective administration of the programs and the ranchers is that their operations could be regulated under a single program rather than dealing with both irrigated ag lands program and a separate grazing program.