



On September 14 2014 the governor of California signed into law the Sustainable Groundwater Management Act showing how important our ground water resource is. This is an important piece of legislation because it allows for local and state governments to best monitor their ground water. The Act says,

“The California Constitution requires the reasonable and beneficial use of water. Existing law establishes various state water policies, including the policy that the people of the state have a paramount interest in the use of all the water of the state and that the state is required to determine what water of the state, surface and underground, can be converted to public use or be controlled for public protection.” (California water Resource Board)

Proper regulation falls under this general statement of the Sustainable Groundwater Management Act and is one of the reasons why I support the “proposed revision to the sources of drinking water policy to establish a site-specific exception for groundwater at the Royal Mountain king Mine site, Calaveras county” (California State Water Resources Control Board) because of the impacts it will have in the health and prosperity of the surrounding community.

De designation of the ground water at the Royal Mountain king Mine site should be done because of resolution No. 88-63, Sources of Safe Drinking Water where it says that if,

“The total dissolved solids (TDS) exceed 3,000 mg/L (5,000 uS/cm, electrical conductivity) and it is not reasonably expected by Regional Boards to supply a public water system, or There is contamination, either by natural processes or by human activity (unrelated to the specific pollution incident), that cannot reasonably be treated for domestic use using either Best Management Practices or best economically achievable treatment practices, or The water source does not provide sufficient water to supply a single well capable of producing an average, sustained yield of 200 gallons per day.”

The drought has made water a scares resource and we need to manage that resource in a meaningful, cost effective and sustainable way by de designating areas at the Royal King Mountain Site that only need to be de designated for health and safety reasons while still being able to access clean water at the site.

MUN de designation and AGR de designation in limited areas is the best option for several reasons. First it would be the most cost effective, preventing overregulation of sites that could be otherwise used for MUN use. Limited regulation would allow for the possibility of shifting contamination and account for unexplored parts of the site. This would cut exploration costs while maintaining a safe

boundary around contaminated sites this will account for fluctuating contamination through seepage and sedimentation shifting over time. Using a cost benefit analysis this option makes the most since as all parties will get the maximum benefit with the least cost to each person involved. The best action for agro de designation would simply be to overlay it with the areas being de designated for MUN use. This would allow for a single set of monitoring stations to be put in and thus be the most cost effective for the state. There would be less confusion and conflict as people use the water for agriculture uses because contaminated groundwater with a TDS concentration range between 3,000 mg/L and 5,000 mg/L can only be utilized for stock watering. Over laying the agro de designation with the MUN de designation would avoid potential lawsuits form crop failure or livestock death.

No Action would be in violation of the Antidegradation Policy and Sources of Safe Drinking Water because certain areas of the RMKM exceed 3,000 mg/L total dissolved solids. Not regulating at all would lead to loss in money and safety for the people who use the water at the site. Lawsuits could arise if citizens become sick or their livelihood is threatened, such was the case in JAVIER R. GUZMAN v. COUNTY OF MONTEREY "The water users purchased a mobile home park and subsequently discovered that the water contained unsafe levels of fluoride. Their complaint alleged that the county had failed to review water monitoring reports submitted by the previous owner and that the county had a mandatory duty, within the meaning of Gov. Code, § 815.6, to review and respond to water quality monitoring reports submitted by water systems for which the county was responsible." (JAVIER R. GUZMAN v. COUNTY OF MONTEREY ) Without action this would lead users of the site to exposure to tainted water which has various dissolves solids in is such as, "Iron arsenic, nickel, nitrate, selenium and zinc." And according to the Draft Environmental Document about the proposed amendments to the Royal Mountain King Mine site, the total dissolved solids and arsenic are at the highest concentrations relative to specific water quality standards. Not doing anything could lead to worse conditions down the road and thus more money to fix it. Environmental justice issues could arise if the agency chooses not to do anything. People have the right to safe drinking water and if the agency knowingly allows seepage of contaminates from the site in to local streams and drinking water, citizens of the surrounding site can file lawsuits against the agency for noncompliance to Sources of Safe Drinking Water act.

Regulating the entire site would not be in the best practices because the upper end of the northwestern and eastern parts of the site contains good water and would no longer be able to be used as MUN, costing the state and the people who could use that water for economic gain. Also the outside border would have to be regulated for protection of good ground water even if the water inside the site border is good. Over regulation is a problem in its self as it cost huge amounts of money to enforcers and compliers. In CITY OF BURBANK v. STATE WATER RESOURCES CONTROL BOARD, "Plaintiff cities sought review of a judgment of the Court of Appeal of California, holding that Cal. Water Code §§ 13241 and 13263 required a regional water control quality board to take into account economic considerations when it adopted water quality standards in a basin plan but not when the board set specific pollutant restrictions in wastewater discharge permits intended to satisfy those standards." (CITY OF BURBANK v. STATE WATER RESOURCES CONTROL BOARD) This case looked at the issue of economic by taking into account economic concerns like the costs to the permit holder why complying with the numeric

pollutant restrictions set out in the permits. This would be the most costly of all the actions as money would be going towards monitoring areas that don't need monitoring wasting time and money.

Regulating areas in the site that only fall above or at 3,000 mg/L of total dissolved solids (TDS) would also prove to be costly. It is unknown where exactly in the site these locations exist and there is a possibility for these sites to shift location making the monitoring process difficult while regulating having a general containment zone in around high levels of TDS will allow for fluctuating contamination through seepage and sedimentation shifting over time. The Royal King Mountain Mine lies in a fault zone. The rock beneath the ground is riddled with faults. The faults are active and will move with the passage of time creating rifts in which water can escape and enter the water supply. Drawing a line around the exact area that the water has 3,000 mg/L of TDS would be problematic as just a small change in the fault zone will allow the area to change. A constant resurveying would be required to evaluate these changes.

I believe that establishing a variance for IND and PRO Uses would be the best solution. This will allow for use while maintaining a safe environment for people using the water. As stated in the Royal Mountain King Mine site, "This approach recognizes that the groundwater in areas where MUN and AGR uses are proposed for de-designation cannot be utilized for a full range of IND and PRO uses due to the presence of elevated levels of TDS, arsenic, and several other constituents" and "the Board will only protect those IND and PRO beneficial uses of groundwater that do not require any specific water quality with respect to this suite of constituents." This promotes sustainability, cost effectiveness and health in an economically viable way.