

February 15, 2016

Jeanine Townsend, Clerk to the Board  
State Water Resources Control Board  
1001 I Street 24th Floor  
Sacramento, CA 95814



RE: General Order for Recycled Water Use

Dear State Water Board Members:

Please do not authorize this Order in its current form. In light of the major drought, the State Water Board's desire to recycle large amounts of wastewater to extend limited potable supplies is understandable, as is preparation of the State Water Board's General Order for Recycled Water Use to streamline the process for developing new projects. Yet I am concerned about possible unintended consequences of authorizing this without more study.

There are currently about 85,000 chemicals registered for use, and almost none are regulated. At least 1000 have endocrine disrupting characteristics whereby exposure to minute amounts, especially by children, have been demonstrated scientifically to cause a multitude of serious health problems. Furthermore, impacts on fish may be even more devastating, and when people eat the fish, they may have a dual exposure to a whole range of disease causing substances. Sometimes, two benign substances can react to become a toxic substance. Toxic substances have been found to remain in even the most highly treated wastewater.

As coastal residents we are greatly concerned about tertiary wastewater irrigation runoff ending up in our waterways, potentially putting recreating humans, residing fish, wildlife and aquatic life at serious risk. The Order claims that if wastewater meets "Title 22" standards and all other applicable laws intended to protect public health, then recycled water is safe for approved uses, including the irrigation of food crops, and spraying of children's parks and schools, etc. Yet none of these regulations address endocrine disruption, nor most toxins, nor the pesticides that runoff from the wastewater application. It is notable that even organic vegetables can be irrigated with wastewater.

Of additional concern are that these projects would be operated in the summer time, when flows may be extremely low because of drought and the water body may have no assimilative capacity of remnant nutrients or toxins in the wastewater. Summer is also the time when humans are most likely to have direct contact with the wastewater through recreational activities. While health departments are very concerned about pathogens, they almost totally ignore toxic exposures.

State Panel Scientists have not adequately addressed the 'low dose affect', which has been demonstrated in peer-reviewed studies to sometimes have highly toxic results. Instead, the State Panel has made a premature, and inadequately considered determination that it is safe to irrigate urban landscapes with tertiary wastewater without even monitoring the impacts of these toxins.

Merle & Darris Nelson

Finally, the state has not put into place common sense restrictions on water use. There needs to be a permanent ban on lawn installations and watering lawns. There also needs to be strict regulations in place of water for non-essential crops and a temporary ban on the installation of non-essential crops such as wine grapes that not only require water but strip topsoil that further increases runoff and they use pesticides.

Please do not authorize this Order that will compromise public health and safety. Please give serious consideration into adopting best practices for better water management as a first step in drought management.

Thank you for reading our concerns and considering our suggestions. We would greatly appreciate a written response.

Sincerely,

Darris B. Nelson

Merle Nelson

Post Office Box 609 ~ Bodega Bay CA 94923