

Environmental & Energy Insights

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Water Blogged - US EPA Charts a Slow and Deliberate Path to Perchlorate Regulation

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In a step that may significantly impact the costs that consumers will have to pay to obtain safe drinking water, the Environmental Protection Agency (EPA) commenced a process last year to regulate perchlorate under the Safe Drinking Water Act. Once federal regulation is finalized, states must incorporate the federal requirements into the state's own regulations. States may be more stringent, but not less stringent, than the federal rules.

Perchlorate is a chemical used in solid rocket fuel, fireworks, and fertilizer, which taints the water supplies of millions of Americans across the country. In California, Senators Feinstein and Boxer have forced the U.S. Department of Defense ("DOD") to identify the scope of perchlorate contamination and to deal with it. They said that "our citizens should not be afraid to drink our water or eat American grown produce," and that the DOD must "take responsibility for its legacy of perchlorate contamination of our drinking and irrigation waters and endangering tens of millions of people."

For many years there has been a difference of opinion as to the health risks associated with perchlorate in drinking water, which at certain levels may alter the production of thyroid hormones (which could have a particularly harmful impact on pregnant women and their fetuses). In a 2002 draft risk assessment, the Environmental Protection Agency (EPA) suggested that levels higher than 1 part per billion (ppb) pose a health risk. On the other side of the spectrum, the DOD at one time contended that perchlorate at 200 ppb has no lasting effect on humans.

Despite the potential health risks, only two states, California and Massachusetts, have set a legally binding maximum contaminant level (MCL) on the allowable amount of perchlorate in drinking water (6 ppb and 2 ppb respectively). The federal government has decided that more sweeping regulation is appropriate, reversing a stance taken by the prior administration that perchlorate did not occur with a frequency and at levels of public health concern that justified federal regulation. Accordingly, EPA has determined that perchlorate should be regulated under the Safe Drinking Water Act. This will create new and enforceable obligations for water suppliers in the remaining 48 states, and could lead to new state regulation to grapple with the federal requirements.

By taking this step, EPA has not immediately imposed any new requirements on public water systems. For the time being, where state regulations establish applicable or relevant requirements (ARARs) for perchlorate, those standards will remain applicable as the cleanup level at Superfund sites unless waived by the state. Instead, EPA's decision started a lengthy process to evaluate the feasibility and affordability of treatment technologies, and to establish a national primary drinking water regulation (NPDWR). The NPDWR must be proposed within 24 months of the initial decision. A final NPDWR would then have to be issued within 18 months of that proposal. Accordingly, federal regulation is unlikely to be finalized until the fall of 2014. During that time period, will some states fill the void with their own regulation? Will California and Massachusetts revise their current MCLs? If the federal government establishes a national regulation which permits perchlorate to be found in drinking water at levels which are much higher than the California and Massachusetts MCLs, could that create cost disparities among the several states, depending upon the extent to which some but not all states set stricter requirements? Will those potential cost disparities impact the type and extent of perchlorate treatment that will be approved in the various states? The answers to these questions could have a significant impact on the costs associated with producing safe drinking water in this country.