



## Department of Toxic Substances Control

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February 8, 2013

The Honorable Fran Pavley  
California State Senate  
State Capitol, Room 4035  
Sacramento, California 95814-4900

The Honorable Michael Rubio  
California State Senate  
State Capitol, Room 5061  
Sacramento, California 95814-4900

Dear Senator Pavley and Senator Rubio:

This letter contains the responses to your questions in preparation for your February 12, 2013 hearing on hydraulic fracturing. In order to better answer each question, I think it is important to first provide some history on the Department of Toxic Substances Control's (DTSC) experience with oil and gas production in California.

In the early 1980's, state regulators began looking more closely at oil and gas production in the state. In 1982, the Division of Oil, Gas, and Geothermal Resources (DOGGR) applied for and obtained "primacy" from the United States Environmental Protection Agency (U.S. EPA), under the federal Safe Drinking Water Act, to administer the Underground Injection Control (UIC) Program for Class II Injection wells in California. This "primacy" means that the U.S. EPA considers DOGGR to be the primary state agency to implement the UIC Program and to regulate Class II Injection wells. Class II injection wells are used to dispose of oil field-related wastes.

In 1985, the state Toxic Injection Well Control Act provided DTSC with authority to regulate *hazardous waste* injection wells (Class I wells). This Act specifically exempted Class II injection wells regulated by DOGGR from DTSC regulation. Although DTSC was granted authority to regulate Class I wells, there have been no Class I wells permitted in the state under this authority.

In the early 2000's, DTSC wanted to learn more about any possible hazardous wastes associated with oil and gas production in the state. While Resource Conservation and Recovery Act (RCRA) specifically exempts wastes associated with oil and gas

exploration, development and production from federal hazardous waste laws, DTSC wanted determine whether these wastes could be hazardous under California criteria. Using a grant from the U.S. EPA, DTSC conducted a field research project that examined certain oil exploration and production wastes, and published its findings in a report, titled "Oil Exploration and Production Wastes Initiative May 2002". As part of our research, DTSC collected and analyzed samples taken of produced waters, drilling waste, oily sludge, and foam treatment waste for several oil field production sites. Overall, these waste streams did not exhibit characteristics of hazardous waste. In a limited number of instances, some samples of oily sludge did exceed threshold levels, which indicates that oily sludge may be a non-RCRA hazardous waste; that is, they would be considered hazardous waste under California's hazardous waste law, but not under federal hazardous waste law, the RCRA. While there may be certain instances when specific samples meet the definition of non-RCRA hazardous waste, statistical analysis of the waste stream led to the determination that these wastes are non-hazardous. It is also important to note that RCRA specifically exempts wastes associated with oil and gas exploration, development and production from federal hazardous waste laws.

While DOGGR has primary responsibility for the Class II wells, and the materials in them, any hazardous wastes generated by oil field exploration and production activities may be subject to DTSC's jurisdiction under the Hazardous Waste Control Law, provided that the wastes are determined to be hazardous and are managed outside of the Class II well system. Any hazardous wastes from oil field operations that are being accumulated, stored, treated onsite, or sent offsite for disposal through some other means are subject to regulation as hazardous wastes.

It is also important to note that in 2005 Congress amended the Safe Drinking Water Act to exclude "the underground injection of fluids or propping agents (other than diesel fuels) pursuant to hydraulic fracturing operations related to oil, gas, or geothermal production activities" (i.e., "fracking") from the UIC program. This change was intended to make it clear that the fracking process was not viewed as waste disposal subject to (or authorized by) the UIC Program, but should be viewed and regulated as appropriate as part of oil and gas production processes.

**1. What has been DTSC's participation in the development of DOGGR's discussion draft of proposed hydraulic fracturing regulations?**

Prior to its release in December, DTSC did not participate in the development of DOGGR's discussion draft of proposed hydraulic fracturing regulations. Since its release, DTSC and DOGGR have initiated discussions about fracking and DOGGR's proposed regulations.

**2. What is DTSC's statutory and regulatory authority to regulate toxic substances used for, or generated as waste by, oil and gas production?**

As described above, DTSC regulates the generation, accumulation, transportation and management of hazardous waste, as specified in the Health and Safety Code, Division 20, Chapter 6.5. To implement this authority DTSC has adopted regulations that detail its requirements. Under these regulations, all waste generators are required to determine whether their wastes are hazardous wastes. In addition, generators are required to store and handle hazardous waste in prescribed ways, to treat or dispose hazardous wastes only at authorized facilities, and to use hazardous waste manifests to track their shipments of hazardous wastes.

An oil and gas production operator is subject to all of the requirements of a hazardous waste generator: (1) if the wastes generated are non-RCRA hazardous wastes, and (2) when those wastes are managed separately from a Class II injection well system.

**3. Hydraulic fracturing fluid waste may be generated by Class II wells and non-Class II oil and gas wells, both of which are under DOGGR's jurisdiction. The waste may be permanently disposed of in a Class II well, discharged to nearby surface water, or transported to wastewater treatment facilities.**

**How does DTSC's authority apply to hydraulic fracturing fluids and hydraulic fracturing waste? Does this authority change depending on the composition of the waste, the source of the waste, or the method of disposal?**

Generally speaking, DTSC does not regulate the use of materials in an industrial process, so the use of hydraulic fracturing fluids would not fall under DTSC's jurisdiction. DTSC would not have jurisdiction until the process generated a waste that exhibits a hazardous waste characteristic. As explained above, due to the federal primacy designation obtained by DOGGR and the statutory exclusion in the Toxic Injection Well Act, DTSC does not regulate any oil and gas operations as long as any wastes that are generated are contained and disposed of within the Class II well system.

When wastes from oil and gas production activities, including wastes with hydraulic fracturing fluid, are non-RCRA hazardous waste, and are treated and disposed of outside of the Class II injection well system, those wastes are subject to DTSC's statutory authority and must to be managed and disposed of in accordance with applicable hazardous waste requirements.

**4. Does DTSC routinely measure the radioactivity of oil and gas field waste?**

No, radiation monitoring is not part of DTSC's monitoring programs, or part of its statutory authority. The California Department of Public Health (DPH) has authority over radioactive materials.

**5. Does DTSC share regulatory authority and jurisdiction over hydraulic fracturing fluid or waste with another regulator? If so, could you specify the regulator and how that authority is shared (e.g. Memorandum of Understanding)?**

DTSC has authority and jurisdiction over any waste hydraulic fracturing fluid that is a non-RCRA hazardous waste and is treated and disposed of outside of the Class II injection well system. DTSC does share enforcement responsibility with local regulatory agencies, called Certified Unified Program Agencies (CUPAs), which are the "boots on the ground" with the responsibility for ensuring that the requirements for hazardous waste generators are met. DTSC retains jurisdiction and authority to enforce hazardous waste laws for any handler in the state.

**6. If DTSC has jurisdiction over hydraulic fracturing fluids, waste hydraulic fracturing fluids, and/or accidental spills of those fluids, what statutory and regulatory authority governs the disclosure of the chemical composition of the fluids? What is the time period for disclosure?**

When non-RCRA hazardous wastes are generated at an oil exploration and production location and are treated and disposed of outside of a Class II injection well system, specified hazardous waste generator reports are required under California Code of Regulations, Title 22, Section 66262.41. DTSC also has the authority to obtain certain information in conjunction with inspection of a site where hazardous wastes are being handled, under Health and Safety Code Sections 25185, 25185.5, 25185.6. While DTSC is able to ask for the basis of a generator's hazardous waste determination, and to collect and test samples of the waste to corroborate that information, DTSC does not have any authority to directly obtain information on the chemical additives to, or composition of, the hydraulic fracturing fluids.

In the event of a spill, if more than a specified amount of the hydraulic fracturing fluid is a hazardous substance, the spill must be reported to the California Emergency Management Agency and to the CUPA. The report is required to include information about the chemical that was spilled. There is no public reporting requirement.

**7. What implementation, inspection, auditing, and enforcement does DTSC currently perform where it has jurisdiction over hydraulic fracturing fluids and waste hydraulic fracturing fluids?**

As discussed earlier, DTSC does not perform any inspection, auditing or enforcement specific to the use of hydraulic fracturing fluids. If the hydraulic fracturing fluids were a non-RCRA hazardous waste, and were treated and disposed of outside of the Class II injection well system, then DTSC and the local CUPA would have authority to regulate the waste hydraulic fracturing fluids.

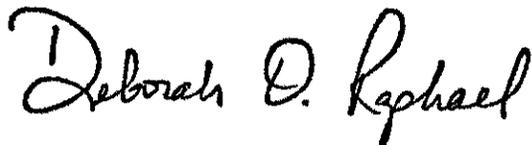
**8. In your opinion, are DTSC's existing statutory authority and regulations sufficient to mitigate risks from hazardous waste generated by hydraulic fracturing? If not, what changes do you recommend?**

DTSC believes that its existing statutory authority and regulations are sufficient to regulate and mitigate risks from hazardous waste generated by hydraulic fracturing and other oil and gas exploration and production activities.

When DTSC has looked into the possible generation of hazardous wastes during oil and gas exploration through its field sampling in 2002, DTSC found little evidence to suggest that these wastes are hazardous. Since that study, changes in technology and the possible expansion of the use of hydraulic fracturing in California present an opportunity to revisit the issue. We look forward to these continuing discussions and the best way to use the experience and knowledge housed at DTSC.

Thank you for inviting DTSC to your hearing on February 12, 2013. Deputy Director for Policy, Rick Brausch, will be there to testify on behalf of the Department. In the meantime, should you have any questions or need further assistance in this matter, please feel free to contact our Deputy Director for Legislation, Josh Tooker at 916-324-7663 or [Joshua.tooker@dtsc.ca.gov](mailto:Joshua.tooker@dtsc.ca.gov).

Sincerely,



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cc: See next page.

The Honorable Fran Pavley & The Honorable Michael Rubio  
February 8, 2013  
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