

# CAL/EPA UNIFIED PROGRAM POLICY MEMORANDUM

NUMBER: UP-11-05
DATE ISSUED: 09/19/2011
EXPIRES: UNTIL RESCINDED
CATEGORY: ADMINISTRATIVE

SUBJECT:  
UNIFIED HAZARDOUS MATERIALS PROGRAM GUIDANCE REGARDING THE REVIEW OF UNDERGROUND STORAGE TANK CONSTRUCTION FOR ETHANOL FUELING SYSTEMS CONSTRUCTED BY PROPEL

REFERENCES:  
California Public Resources Code Section 71000 et seq.;  
California Code of Regulations, Title 27, Sections 10200 et seq.;  
California Health & Safety Code, Section 25404 et seq.;  
California Health & Safety Code, Section 44270 et seq.;  
Cal/EPA Fuels Guidance Document

## STATEMENT OF PURPOSE

To meet the intent of state law to provide an efficient permitting process which will assist a business and public agencies in complying with environmental quality laws in an expedited fashion, without reducing protection of public health, safety, and the environment.

Propel (a business) has made a request of the Cal/EPA Office of the Secretary, pursuant to the California Public Resources Code Section 71000 et seq., for assistance in obtaining consistent statewide review of its plans for compliance with state requirements for the installation of underground storage tanks (USTs) and underground piping systems.

## BACKGROUND

The existing fuel infrastructure in California is constructed to be compatible with gasoline, a volatile mixture of hydrocarbons containing up to 10% ethanol. This infrastructure is designed to store and dispense this chemical to prevent releases from entering the environment and creating a health and safety hazard. The design, construction methods, and materials used for gasoline have been tested and improved by governmental agencies over time and these fuel systems now operate safely protecting both public health and the environment. New fuels, such as ethanol, are chemically different than gasoline and it is not known if the current infrastructure for gasoline is compatible with these new fuels. Newly introduced fuels must only be used in UST systems that have been tested and approved for use with the new fuel. This testing and approval process must be completed pursuant to state and federal law and a state or local agency may not approve a UST system for use with a new fuel until this approval process has been completed.

It is part of California state law to expand the use of new low carbon fuel vehicles thus creating a demand for low carbon fuels in California. In 2007 Assembly Bill 118 became law starting the process to increase low carbon fuel vehicles in the state. This bill created a new area of law and directs the California Energy Commission along with California Air Resources Board to develop and implement the "Alternative and Renewable Fuel Vehicle Technology Program".

This new program will expand the use of low carbon fuel vehicles in California, which will require the expansion of low carbon fueling stations. These new fuels are chemically different from gasoline, and, as previously stated, it is not known if the existing infrastructure for managing gasoline is compatible with these new fuels.

In California, permitting and permit review for a new fueling system is completed primarily by local government agencies following state approved guidelines which are consistent with federal and state law. For a company to obtain permits to construct and to operate numerous fueling stations with a new fuel throughout the state, the company must go through a permitting and plan review within each jurisdiction it wishes to operate. This series of plan reviews requires that each jurisdiction review the components to be used in the construction of the fueling station and that the company demonstrates to each jurisdiction's satisfaction the plans and components for the fueling system meet the requirements of federal and state law.

This system of obtaining permits from each local permitting agency provides numerous regulatory advantages; however, when a new fueling system design is introduced and permitted in the state, this system of local government independent review and approval creates the potential for inconsistent application of statewide requirements, for companies which operate in multiple jurisdictions. Additionally the process of having each jurisdiction complete its own independent review of the equipment and components for compatibility with federal and state law is time consuming and leads to delays in the approval of the project. Delays in review and approval occur as each jurisdiction must become familiar with the new technology and review the project for compliance with statewide requirements.

## **PROPEL**

Propel is a business, which builds, owns and operates a network of low carbon fueling points. Propel currently operates 22 fueling systems in California, and they are in the process of expanding to 75 fueling systems. They have received grants from the California Energy Commission and the U.S. Department of Energy to help them complete the expansion to 75 fueling systems in California. The construction of 75 fueling systems is intended to help keep up with the increasing demand for low carbon fuels created by Assembly Bill 118 of 2007, also known as the 'Alternative Fuels and Vehicle Technologies Funding Program'. Propel intends to store and dispense fuel with 85 % ethanol commonly referred to as E-85.

E-85 is a relatively new fuel formulation that has not been widely used in California. California's fuel infrastructure has not been widely tested for compatibility with E-85 and therefore fueling system components that are commonly used for gasoline may not be compatible and used for construction of E-85 systems.

Propel is required to design a fuel storage and dispensing system that is compatible with E-85. To do this, they have had to design a fueling system that uses components that have been tested and found to be compatible with E-85.

Propel has made a request of the Cal/EPA Office of the Secretary for assistance in obtaining consistent statewide review of its plans for compliance with state requirements for the installation of an underground storage tank and underground piping system.

## **ACTION**

In response to Propel's request for assistance in obtaining a statewide review of its plans a team was formed, consisting of representatives of the State Water Resources Control Board's (State Water Board) UST Program, and six local Unified Program Agency's (UPA). This team required that Propel submit all documentation necessary to complete a review of the Propel E-85 fueling system design, including equipment for the purpose of determining if this plan was in compliance with state law.

Upon completion of their review, the reviewing team made a determination that Propel's standard installation plans and all of the equipment and components were in compliance with state law and may be approved by a local UPA for installation.

The team approved plan has been posted on a secure Web page for review by UPAs and to confirm that the plans submitted to them by Propel for approval are the same as those approved by the Unified Program plan review team. Instructions on how to access this site will be provided by Propel at the time they submit their plans for review to the local UPA or may be obtained from the State Water Board Unified Program Team member.

UPAs are to refer to these reviewed and approved plans to determine if the plans submitted to them by Propel meets State requirements. If the plans submitted to a UPA are identical to the plans which have been reviewed and posted on the Cal/EPA Web page then the UPA should consider the plans to be in compliance with State law. Specifically the requirements found in California Health and Safety Code Division 20, Chapter 6.7.

If a UPA believes the previously reviewed and posted plans are not in compliance with State law they should contact Laura Fisher with the State Water Board.

## **CONDITIONS**

While the plans posted on the secured Web page have been reviewed and approved by the review team site, specific plans may still be required to be submitted to each UPA. The team review process does not supersede any local design provisions that may be required and does not relieve Propel of any local notification, permitting requirements or the responsibility to obtain an approval to construct from the UPA.

This review should not be interpreted as an endorsement of materials, components, testing methods and contractors.

Variations in the use of equipment approved in the plans posted on the secure site will require approval by the review team.

### **Members of the Review Team:**

Laura Fisher  
State Water Resources Control Board  
(916) 341-5870  
[lfisher@waterboards.ca.gov](mailto:lfisher@waterboards.ca.gov)

Angie Samayo  
San Bernardino County Fire Department  
Hazardous Materials Division  
(909) 386-8464  
[asamayoa@sbcfire.org](mailto:asamayoa@sbcfire.org)

Brenda Puepke  
Orange County Environmental Health  
(714) 433-6223  
[BPuepke@ochca.com](mailto:BPuepke@ochca.com)

Dirk Drossel  
Burbank Fire Department  
(818) 238- 3392  
[ddrossel@ci.burbank.ca.us](mailto:ddrossel@ci.burbank.ca.us)

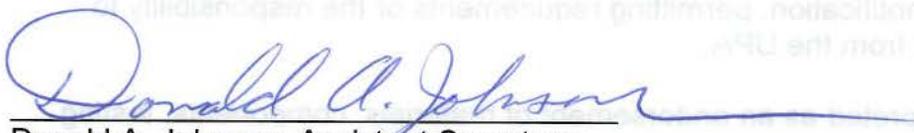
Robert Rapista  
San Diego County Department of Environmental Health  
Hazardous Materials Division  
(858)505-6818  
[Robert.Rapista@sdcounty.ca.gov](mailto:Robert.Rapista@sdcounty.ca.gov)

Alicia Morales  
Ventura County  
(805) 662-6553  
[Alicia.Morales@ventura.org](mailto:Alicia.Morales@ventura.org)

Manuel R. Regalado  
Los Angeles Department of County Public Works  
(626) 458-3510  
[MREGALADO@dpw.lacounty.gov](mailto:MREGALADO@dpw.lacounty.gov)

## QUESTIONS

Please direct all questions regarding this policy to Laura Fisher, Chief of the UST Leak Prevention Unit with the State Water Board, at (916) 341-5870.



Donald A. Johnson, Assistant Secretary  
California Environmental Protection Agency