

LAW OFFICES OF

COOPER, WHITE & COOPER

A PARTNERSHIP INCLUDING  
PROFESSIONAL CORPORATIONS  
TELECOPIER (415) 256-9428  
TELEX 262877 SCOOP

1333 N CALIFORNIA BOULEVARD SUITE 450  
WALNUT CREEK CALIFORNIA 94596  
(415) 935-0700

201 CALIFORNIA STREET  
SEVENTEENTH FLOOR  
SAN FRANCISCO  
CALIFORNIA 94111  
(415) 433-1900

91 SEP 31 11:24

September 27, 1991

Ravi Arulanantham  
Alameda Co. Health Agency  
80 Swan Way, Room 200  
Oakland, CA 94621

Dear Ravi:

Pursuant to your request, enclosed please find the Health & Safety Plan prepared by our consultant, Kenneth R. Henneman, which you had requested.

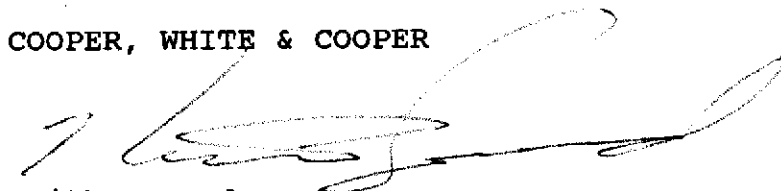
You had informed me that you would not "approve" the plan that has been submitted for the next phase of investigation at the site until my client paid in advance an oversight fee to the County of Alameda.

I would appreciate it if you would put the request for such payment in writing and include citations of whatever Alameda County Ordinances or other authority exists for an advance payment of the County's oversight fees.

My client remains prepared to go forward with the Work Plan that has been submitted as soon as it has been approved by the County.

Very truly yours,

COOPER, WHITE & COOPER



Keith Howard

KH/ms

Enclosure

cc: Michael P. Dolan  
Kenneth R. Henneman

Kenneth R. Henneman, Water Resources Consultant  
3142 Montpelier Court  
Pleasanton, CA 94588  
(510) 846-4450

September 12, 1991

Mr. Keith Howard  
Cooper, White & Cooper  
1333 No. California Blvd., Suite #450  
P. O. Box 5246  
Walnut Creek, CA 94596

Mr. Michael P. Dolan  
Dolan Lumber Company  
6365 Scarlett Court  
Dublin, CA 94568

Subject: Modification to 8/26/91 "Initial Plan for cleaning up  
groundwater pollution under the old gas tank site at  
6393 Scarlett Court"

Gentlemen:

County staff requested a Worker Health and Safety Plan be submitted as part of subject plan. Enclosed is the 9/12/91 "Health and Safety Plan for installation and sampling of soil borings at 6393 Scarlett Court, Dublin, CA". It was prepared by Clayton Environmental Consultants, who have prepared similar plans for similar work at other sites along Scarlett Court in Dublin.

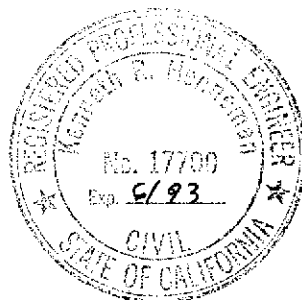
Also enclosed is a revision of the sample site location map from the 8/26/91 Plan. It shows: 1) the two water sample sites just west of the west fence (which were clean), and 2) the relocation of proposed borings S14, S15 and S16 from Scarlett Court roadway to inside the property line. This move will probably require at least one of the borings to be drilled by hand.

With these two items the County should be able to continue its review of the proposed Plan.

Sincerely yours,

*Kenneth R. Henneman*  
Kenneth R. Henneman

Enclosures



**Western Operations**

---

1252 Quarry Lane  
Pleasanton, CA 94566  
(415) 426-2600  
Fax (415) 426-0106

**Clayton**  
ENVIRONMENTAL  
CONSULTANTS

Health and Safety Plan  
for  
Installation and Sampling  
of  
Soil Borings at  
6393 Scarlett Court  
in  
Dublin, California  
Clayton Project No. 37284.00  
September 12, 1991

## CONTENTS

		<u>Page</u>
1.0	<u>INTRODUCTION</u> .....	1
2.0	<u>WORK ACTIVITIES</u> .....	1
2.1	INSTALLATION AND SAMPLING OF MONITORING WELLS AND SOIL BORINGS .....	1
3.0	<u>ONSITE ORGANIZATION</u> .....	1
3.1	PROJECT CONTACTS .....	2
3.2	HEALTH AND SAFETY HAZARDS .....	2
3.3	EXPOSURE PREVENTION AND SAFETY REQUIREMENTS .....	3
	3.3.1 <u>Petroleum Hazards</u>	
	3.3.2 <u>Traffic Hazards</u>	
	3.3.3 <u>Underground Utility Line Hazards</u>	
	3.3.4 <u>Personal Safety Equipment</u>	
	3.3.5 <u>General Safety Equipment</u>	
4.0	<u>TRAINING</u> .....	6
5.0	<u>PROJECT-SPECIFIC TRAINING</u> .....	6
6.0	<u>LEVELS OF PROTECTION FOR EACH WORK ZONE</u> .....	6
7.0	<u>WASTE HANDLING AND DISPOSAL</u> .....	6
8.0	<u>PERSONAL INJURY</u> .....	7
9.0	<u>EMERGENCY PHONE NUMBERS</u> .....	7

**Figure**

- 1 Emergency Services Route Map

## **1.0 INTRODUCTION**

This health and safety plan describes the procedures that will be implemented and followed by Water Resources Consultants (WRC) during installation of approximately 15 boreholes or hydropunches and the sampling of groundwater at 6393 Scarlett Court, Dublin, California.

This health and safety plan is based on the work plan activities and environmental investigations to be conducted at the site and the requirements of Title 29 of the Code of Federal Regulations, Section 1910.120 (29 CFR 1910.120).

## **2.0 WORK ACTIVITIES**

This site-specific work plan presents a description of the planned field activities at 6393 Scarlett Court in Dublin, California. The following subsections provide a description of the work to be performed at the site, as well as health and safety hazards associated with each task.

### **2.1 INSTALLATION AND SAMPLING OF MONITORING WELLS AND SOIL BORINGS**

WRC will install approximately 15 soil borings or hydropunches and collect and analyze soil and water samples for suspect contaminants.

## **3.0 ONSITE ORGANIZATION**

Each person shall be responsible for following the health and safety plan's guidelines at the site.

- Site Safety Officer shall be John Sarmiento, and his duties are to:
  - Ensure that the health and safety plan is implemented.
  - Ensure that all personnel have proper training and protective equipment.
  - Conduct "tailgate" meeting on the first day before field activities commence.
  - Stop work if the health and safety of workers is in question.
  - Observe workers for signs and symptoms of exposure to contaminants.
  - Evaluate the effectiveness of the personal protective equipment program on an ongoing basis and upgrade the program as needed.
  - Inform workers of any changes in the health and safety practices.
  - Perform daily reviews of the work practices and compliance with the health and safety plan.
  - Note any signs of exposure or stress and take proper action immediately.
  - Prevent unauthorized personnel or equipment from entering the exclusion zones.

All essential and nonessential personnel entering or exiting any of the exclusion zones must comply with health and safety practices and procedures described in the health and safety plan.

**3.1 PROJECT CONTACTS**

Unanticipated incidents at the site must be reported to the following personnel as soon as possible:

- John Sarmiento  
 Geologist  
 Water Resources Consultants, Inc. (415) 854-2942
  
- Michael Dolan  
 Owner  
 Dolan Lumber Company (415) 829-0350

**3.2 HEALTH AND SAFETY HAZARDS**

**TABLE 1  
 HAZARD IDENTIFICATION AND PROCEDURES FOR HAZARD REDUCTION**

Potential Hazards	Procedures for Hazard Reduction
Volatilization of organic vapors during operation can pose a potential hazard via the inhalation of vapors	The ambient air within the work area and in all confined spaces must be monitored with an organic vapor meter (OVM) prior to entry. Workers should stand upwind of the source of contamination whenever possible.
Traffic	The area is an unused parking lot, if we encounter unexpected traffic, we will barricade our work area with traffic cones. If necessary, we can block the entrances.
Noise	Approved ear plugs/muffs shall be made available for noisy work operations
Contaminated surfaces  Skin and eye contact with petroleum contaminated groundwater and soil may occur during drilling, well development, or groundwater sampling	Contact with contaminated surfaces, or surfaces suspected to be contaminated should be avoided.  Use of approved gloves and goggles will be required when potential skin and eye contact with contaminated substances is apparent.

**TABLE 1  
HAZARD IDENTIFICATION AND PROCEDURES FOR HAZARD REDUCTION**

Potential Hazards	Procedures for Hazard Reduction
Physical hazards	Hard hats shall be worn at all times Safety glasses will be worn when necessary
Ingestion of petro-chemicals can occur by accidental swallowing of contaminated soils, liquids and/or transfer of contaminated particles onto ingestible substances	Eating, smoking, drinking and/or application of cosmetics is prohibited onsite. This minimizes the possibility of exposure to the petro-chemicals potentially encountered onsite via ingestion.

**TABLE 2  
POTENTIAL HAZARDOUS SUBSTANCES ONSITE**

The following substances are known or suspected to be onsite.  
The primary hazards of each are identified below.

Hazardous Substance	Expected Concentration	Health Effects
Benzene	1.3 ppm	Carcinogen, Abdominal pain, eye irritation, headache, nausea, respiratory irritation
Ethylbenzene	0.8 ppm	Coma, dermatitis, eye irritation, headache
Toluene	0.2 ppm	dermatitis, dilated pupils, headache
Xylene	1.0 ppm	abdominal pain, diarrhea, eye irritation, nausea, staggering gait, throat irritation
Gasoline	170 ppm	dizziness, eye irritation, headache nausea, dermatitis

ppm = parts per million

Expected concentrations based on previous investigations

### 3.3 EXPOSURE PREVENTION AND SAFETY REQUIREMENTS

This section describes the hazards and danger of exposure to either chemical or physical hazards present at the site. Possible contingency plans and safety requirements are also presented in this section.

### 3.3.1 Petroleum Hazards

During field operations the breathing zone will be monitored with an Organic Vapor Meter (OVM). If the OVM detects 50 ppm consistently (more than 2 minutes) in the breathing zone, levels of protection will be set up for each work zone. This is described in more detail in Section 6.0. An exclusion zone will be set up in the drilling and sampling area where respirators with organic vapors cartridges will be worn. Tyvek suits and rubber gloves will be worn if soils are suspect of any contamination. If drilled into free product, saranex coated tyvek suits will be worn.

#### A. Eye and skin exposure hazards: irritant

In case of exposure:

- Remove contaminated clothing and shoes.
- Flush affected areas with plenty of water.
- IF IN EYE, hold eyelids open and flush with plenty of water.
- If irritation or discomfort continues call for medical aid immediately.

#### B. Internal exposure hazards: harmful if swallowed

In case of exposure:

- Call for medical aid.
- If victim is CONSCIOUS have victim drink water or milk.
- DO NOT INDUCE VOMITING.

#### C. Inhalation exposure hazards: dizziness, headache, nausea

In case of exposure:

- Give victim fresh air
- If discomfort continues call for medical aid immediately

#### D. Fire hazards: combustible

In case of fire:

- Extinguish with dry chemical, foam, or carbon dioxide.
- If fire cannot be extinguished within 30 SECONDS, call fire department immediately.
- Water may be ineffective on fire.

### 3.3.2 Traffic Hazards

Stay at least 10 feet away from moving equipment. If closer than 10 feet:



- Keep equipment in sight at all times.
- Inform the operator of your location.

The working area will be closed to traffic with traffic cones. If the area cannot be barricaded, a flagperson will be assigned to direct traffic.

No unauthorized or unessential vehicle will be allowed to enter the barricaded area.

### **3.3.3 Underground Utility Line Hazards**

Call US ALERT at least 3 days before commencing field work. Care will be taken in the installation of the boreholes to assure that no underground utility lines exist at that location. If an underground utility line is damaged during the work:

- Stop all activities.
- Stop all engines and mechanical and electrical equipment.
- Call US ALERT immediately.

### **3.3.4 Personal Safety Equipment**

The following personal protective equipment will be required at all times:

- Hard hat
- Steel toe shoes
- Nitrile gloves (required for personnel who will be coming in contact with soil or groundwater)

The following personal protective equipment will be optional or required as the need arises:

- Hearing protection equipment
- Gloves
- Respirators with organic vapor cartridges
- Safety glasses
- Tyvek® Coveralls

Additional protection requirements are described in Section 6.0.

### **3.3.5 General Safety Equipment**

Following equipment must be available and easily accessible for use:

- First aid kit
- Fire extinguishers (foam, dry chemical, or carbon dioxide)
- Health and safety plan

#### **4.0 TRAINING**

All personnel who may be exposed to onsite contaminants must provide documentation of the following:

- Current forty hours of (OSHA) classroom instruction/hands-on training, to include:
  - Three days of field experience under the supervision of an experienced supervisor
  - Eight hours of annual classroom refresher training, as appropriate
- Eight hours of supervisory training if a team member is a designated supervisor

#### **5.0 PROJECT-SPECIFIC TRAINING**

Project-specific training and information will be provided either before traveling to the site or at the site before entry into the exclusion zone. The information and training will be documented, and will include the following:

- The contents of the health and safety plan
- A discussion of the health and safety hazards, protective measures, and work practices for handling contaminated soil, water, or equipment

#### **6.0 LEVELS OF PROTECTION FOR EACH WORK ZONE**

Protective equipment has been selected for use in each zone, based on anticipated hazards. Specific protective equipment requirements are as follows:

- *Exclusion zone.* Level D protection, including a hard hat, Tyvek® coveralls, and steel-toed boots. Safety glasses, hearing protection, and Nitrile gloves will be worn as needed. Respirators with organic vapor cartridges will be worn if the OVM readings exceed 50 ppm in the breathing zone.
- *Contamination reduction zone.* Same as exclusion zone.
- *Support zone.* No specific requirements.

#### **7.0 WASTE HANDLING AND DISPOSAL**

The waste handling procedures discussed in the work plan will be followed. Waste generated by implementation of this health and safety program may include spent protective clothing, such as Tyvek® suits, gloves, and wash and rinse solutions.

Protective clothing will be collected in a lined container. Liquid wastes will be collected and pumped or poured into holding tanks with equipment decontamination rinsate.

### **8.0 PERSONAL INJURY**

In case of a minor personal injury, general first aid procedures will be applied. A first aid kit will be available at the site in a designated location. All injuries or accidents will be reported to the project supervisor immediately.

More serious injuries may require assistance from paramedics. The project manager, site safety officer, or another designated person will contact the appropriate emergency personnel by dialing 911.

### **9.0 EMERGENCY PHONE NUMBERS**

Emergency contacts will be made, as necessary, from the list in this section:

#### **Hospital**

Valley Memorial Hospital  
1111 E. Stanley Boulevard  
Livermore, California  
(415) 447-4000

#### **Ambulance**

Call 911

#### **Fire Department**

Call 911

#### **Police Department**

Call 911

**SEE ATTACHED MAP FOR LOCATIONS OF EMERGENCY FACILITIES**

#### **Other Telephone Numbers**

National Response Center  
(800) 424-8802

Sacramento Environmental Health Department  
(916) 386-6108

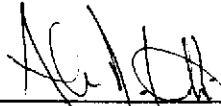
Chemtrec  
(800) 424-9300

This report prepared by:



Edward MacDaniel  
Geologist

This report reviewed by:



Alan D. Gibbs, R.G.  
Supervisor, Geology Group

Reviewed and accepted by:

Kenneth R. Henneman  
Consulting Engineer

\_\_\_\_\_  
Name

\_\_\_\_\_  
Name

September 12, 1991

**EMERGENCY INFORMATION**

**IN CASE OF AN EMERGENCY, USE THIS SHEET**

Emergency Phone No:

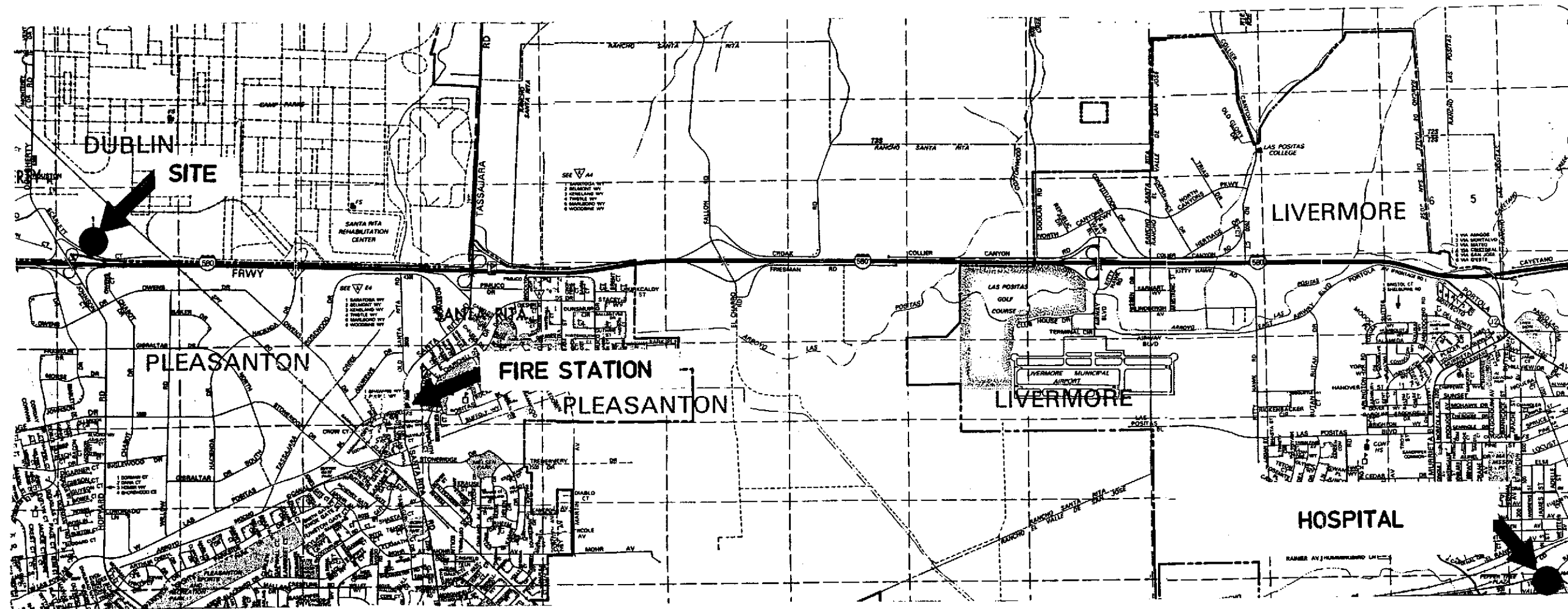
911

Site Address:

6393 Scarlett Court  
Dublin, California

Nearest Intersection:

Dougherty Road and Scarlett Court



SCALE



Emergency Services Route Map  
 Dublin Concrete and Materials  
 Clayton Project No. 37284.00

Figure  
 1

**Clayton**  
 ENVIRONMENTAL  
 CONSULTANTS

37284-00-16