



REC'D. BY HOUSING AUTH.
CITY OF ALAMEDA

JUN 25 1990
AM 7 8 9 10 11 12 1 2 3 4 5 6 PM

June 22, 1990

Mr. Tom Matthews
Executive Director
Housing Authority of the City of Alameda
1916 Webster Street
Alameda, Calif. 94501

RE: Soil and groundwater contamination at 1916 Webster Street, Alameda.

Dear Mr. Matthews:

Recently, I was contacted by Mr. Bruce Knopf, Economic Development Manager for the City of Alameda. At his request, we discussed the current status of soil and groundwater contamination at 1916 Webster Street. You will recall that Aqua Science Engineers performed a tank removal, subsequent investigation and soil remediation at the site between July and October of 1986. I would like to summarize the points of our conversation that you may be adequately informed.

- 1) There was identified and probably still exists a contaminated groundwater condition at the site. No treatment of contaminated groundwater has been addressed to date.
- 2) A soil treatment program performed in 1986 addressed a significant amount of the soil contamination problem evident at the site at the time. Soil treatment operations were suspended before all contaminated soils were addressed.
- 3) The Regional Water Quality Control Board was sent a copy of all reports covering the investigation and remedial action performed at the site. Although no evaluation or recommendation for further work has yet been issued by the Board, it is reasonable to assume that a clean-up order will be issued at some future date.
- 4) Under most conditions, the current owner of a property is responsible for soil and groundwater contamination on that property (and adjacent property if adjacent properties are effected by migration) even if the initial release occurred prior to ownership.
- 5) Lending institutions are unlikely to readily provide financing for purchase of or construction on property where contamination of soil and groundwater may inhibit timely development or resale.
- 6) Aqua Science Engineers can provide for the City of Alameda a proposal to remediate soil and groundwater at the site.

My conversations with Bruce Knopf referenced various points and details found in the original project reports from 1986. I have provided here some of that information.

The subsurface investigation performed at the site identified a plume of gasoline contaminated groundwater emanating from the former location of the removed tank and projecting outward in a Northeasterly direction. The data was derived from six shallow soil borings and two groundwater monitoring wells.

For the purposes of discussing the site we assumed that the data obtained in 1986 is still accurate. However, it should be understood that further migration of the plume is likely to have occurred. Additional work would be necessary to confirm whether or not the results of the original investigation still reflect the status of the site today. The first step to be taken would likely be to sample groundwater in the existing monitoring wells, install a third monitoring well and determine the direction of groundwater flow.

The highest concentration of gasoline found in groundwater at the time of the investigation was 37 parts per million. For the purposes of comparison consider that the detection limit of the test used to identify gasoline in water is 0.05 parts per million. Similarly, a plan for treatment of groundwater would be aimed at reducing concentrations to less than 0.05 parts per million.

The concentration of hydrocarbons in soil at the edge of the area where excavation was halted in 1986 was determined to be 3700 parts per million. A plan for continued soil treatment would attempt to address all remaining soils with concentrations above 100 parts per million.

I have enclosed a copy of a distribution available from the Alameda County Department of Environmental Health. Beginning at the bottom of page 2 are a number of steps recommended by the County for addressing a confirmed fuel tank leak.

Aqua Science would be pleased to assist you with further site characterization and/or remediation services. Please feel free to contact me at 820-9391 if we can be of service in any way.

Respectfully,



David C. Prull
AQUA SCIENCE ENGINEERS, INC.

Attachments
cc. Bruce Knopf w/attachments

*Drill new
1 day*

*did boring
on belt line
property*

ALAMEDA COUNTY
HEALTH CARE SERVICES
DAVID J. KEARS, AGENCY
Agency Director



Department of Environmental Health
Hazardous Materials Division
80 Swan Way, Room 200
Oakland, CA 94621

~~476 27th Street, Third Floor
Oakland, California 94612~~

February 1989

(415) 271-4320

SUBJECT: UNDERGROUND STORAGE TANK REMOVAL PROCESS IN ALAMEDA COUNTY

The Alameda County Department of Environmental Health, Hazardous Materials Division, requires specific steps to be taken for the removal of underground storage tanks within its jurisdiction. The County's enforcement authority derives from Title 23 of the California Code of Regulations (CCR) and Chapter 6.7 of the Health and Safety Code, and applies to underground storage tank removals within all parts of the county except for the cities of Berkeley, San Leandro, Hayward, Newark, Union City, Fremont, and Pleasanton. These cities administer their own underground storage tank programs and have their own specific requirements.

Alameda County's tank closure process is described below, in a step-by-step manner. Each step must be completed, and in the order shown, to ensure efficient review of your closure plan. These steps are as follows:

1. Submit a deposit to this office; the amount depends on the number of tanks to be removed. Authorized by Section 3-141.6 of the Alameda County Ordinance Code, the deposit covers time spent by Hazardous Materials Specialists in the follow-up activities associated with the project. Upon project completion, any balance remaining will be refunded to you.
2. Fill out and submit in triplicate to this office a closure plan. Instructions for filling out the standard form are located at the back of the form. It is important to fill out all blanks on the closure plan, especially those pertaining to: EPA Identification numbers; historic contents of the tank(s) to be removed; sample analysis information; and identification of the registered hazardous waste hauler who will handle tank removal.
3. Submit with the closure plan three copies of each of the following: a) the contractor's workman's compensation insurance certificate with the site address typed on the form; b) your site safety plan; and c) a plot plan of the facility. The site safety plan should consist of standard safe operating procedures and contingency plans; it must

specify that an explosimeter will be on-site for checking the tank(s) before removal, that two fire extinguishers and Level C protective clothing will be available to workers on the job site, and which individual will take responsibility for site safety during tank removal. The site safety plan should also include all elements specified in 29 CFR 1910.120 (i)(2)(i), for worker protection in the event that significant contamination is found.

4. Pick up your two copies of the closure plan once this office has stamped "accepted" on all three copies. If you don't pick up your two copies within five days of this office's approval, we will mail them to you (one copy of this approved plan should be kept on-site during tank removal, and you should send the other copy to the property owner).
5. Present the approved closure plan to the local fire department, which will issue a permit authorizing tank removal.
6. Inform the Hazardous Materials Specialist assigned to the project of the date and time you have scheduled for tank removal. Give him/her at least 72 hours' advance notice.
7. Proceed with tank removal even if the Hazardous Materials Specialist does not show up. Inspectors will normally want to be on-site to examine the tanks and excavated soil and to oversee collection of samples; however, because of unforeseen schedule conflicts, the inspector may not be able to observe the tank removal.
8. Submit sample analysis data within 60 days of tank removal. Also send to this office copies of the chain-of-custody forms and manifests documenting disposal of the tanks and any contents.

If there has been no leak and no site remediation is required, the inspector will instruct our billing department to refund any balance to you.

If sample analytical data or other evidence indicates the likelihood of soil or groundwater contamination, you must file an underground tank leak report to this office within 5 days of tank removal. These report forms are available at the San Francisco Bay Regional Water Quality Control Board in Oakland: 415/464-1255. An additional deposit may be required at this point. Then, you must take the following steps:

1. Conduct a preliminary assessment to determine the extent and

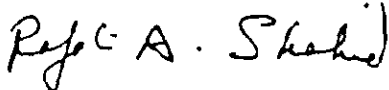
magnitude of soil and groundwater contamination.

2. Conduct a site investigation to define the horizontal and vertical extent of groundwater contamination, both on and off-site. This will consist of monitoring well construction and regular groundwater sampling.
3. Interpret hydrogeologic data, including characterization of the appropriate aquifer(s).
4. Determine the potential short- and long-term impacts of contaminated groundwater on the beneficial uses of groundwater and surface water.
5. Develop a site-specific remediation plan, which should include a time schedule for implementation and address such issues as: removal/treatment of contaminated soil, groundwater, and free product; evaluating mitigation alternatives; and verification sampling and monitoring to ensure the effectiveness of the remediation program.

After your submission of the final report, this office will review these items. If the report is approved, any remaining funds will be refunded to you. The San Francisco Bay Regional Water Quality Control Board retains the authority for final approval of a completed site mitigation program.

If you have any questions or require further clarification regarding the underground storage closure process within Alameda County, please contact this office at 415/271-4320.

Sincerely,



Rafat A. Shahid, Chief
Hazardous Materials Division

RAS:GW:mam