

ZONE 7 WATER AGENCY TOXIC SITES SURVEILLANCE ANNUAL REPORT 2012

INTRODUCTION

Zone 7 documents and tracks polluted sites across the groundwater basin that pose a potential threat to drinking water and interfaces with lead agencies to assure the Main Basin is protected. Information is gathered from state, county, and local agencies, as well as from Zone 7's well permitting program and the State Water Resources Control Board's (SWRCB) GeoTracker website. This tracking program is designated the "Toxic Sites Surveillance (TSS) Program" and a report is generated annually to update the progress of investigations and clean-ups. Each site has been given a Zone 7 number, which corresponds to the file number containing reports or other information about the site. In addition, all sites are reviewed and given a ranking based on criteria used by the Regional Water Quality Control Board (RWQCB) and Alameda County Environmental Health (ACEH) that have been modified to meet Zone 7 standards. Attachment A shows the priority ranking scheme. A site is designated as a high priority case if the following conditions occur:

Contamination at the site is in groundwater at concentrations greater than the drinking water maximum contaminant level (MCL); AND

- a) A water supply well is within 2,000 feet (ft) downgradient of the site; OR
- b) A currently used municipal or domestic aquifer is impacted or threatened by future contamination migration.

A secondary ranking is used to represent the remedial status of the site. Attachment B shows the status codes used in Zone 7's database. These codes differ slightly from those used by ACEH and RWQCB to better meet the needs of Zone 7. For example, a closed case is listed as a Status "CL" in the TSS program database, instead of the RWQCB's code of "9."

Zone 7's GIS database and map system allows for basic information on each site to be stored and displayed geographically. This database is maintained by Zone 7 staff to help assess the potential threat to our drinking water posed by a given site. Zone 7 staff may access the database at **\\zone7-file\mapinfo\Toxic\Toxsit.mdb**, using MS Access database software. The public may contact Colleen Winey at (925) 454-5064 for information regarding particular sites or to view Zone 7's Toxic Site files.

PRIMARY CONTAMINANTS

In general, the TSS program tracks two types of contamination threatening groundwater in the Livermore-Amador Groundwater Basin: fuels and industrial chemicals. The fuels are petroleum-based products that include total petroleum hydrocarbons as gasoline (TPHg), TPH as diesel (TPHd), benzene, toluene, ethylbenzene, xylenes (collectively known as BTEX), and oxygenates including methyl tertiary-butyl ether (MTBE) and tertiary-butyl alcohol (TBA).

A cleanup standard for total petroleum hydrocarbons as gasoline (TPHg) or as diesel (TPHd) has not officially been established. Cleanup standards for TPHg and TPHd vary among the different county and local regulatory agencies, and are generally driven by the cleanup standard for BTEX and MTBE. Environmental Screening Levels (ESLs) may also be used as the cleanup goal on a site-specific basis. Of the BTEX constituents, benzene is considered to be the most harmful to human health and therefore has the lowest corrective action threshold; 1 µg/L (ppb), which is the MCL.

MTBE was used as a fuel additive in gasoline between approximately 1979 and 2004; the state of California banned the use of MTBE in gasoline on January 1, 2004. MTBE is a particularly troublesome compound because it readily dissolves in groundwater creating contamination that tends to migrate faster and farther than the other fuel components. California has established a primary Maximum Contaminant Level (MCL) for MTBE in drinking water of 13 micrograms per liter (µg/L) or parts per billion (ppb) and a cleanup goal of 5 µg/L (ppb) which represents the threshold for taste and odor detection.

TBA is another oxygenate that has been detected in our groundwater basin. TBA can be manufactured and added to gasoline as an oxygenate or it can occur as a degradation product of existing MTBE contamination. California has established a Provisional Action Goal (PAG) of 12 µg/L (ppb) for TBA.

The primary industrial chemical contaminants of concern in the Tri-Valley are tetrachloroethene (PCE), trichloroethene (TCE), and their degradation products. Both chemicals are chlorinated solvents. PCE is a common chemical used in the dry cleaning of garments. TCE is a common degreaser used in the electronics, automotive and metal plating industries. The MCL for both PCE and TCE is 5 µg/L (ppb).

UNDERGROUND STORAGE TANK CLEANUP PROGRAM

The State Water Resources Control Board (SWRCB) has been continuing to take steps to streamline the process for site closure in the interest of conserving the Underground Storage Tank (UST) Fund, without compromising water quality objectives and human health and safety.

On May 1, 2012, the State Water Board adopted a Low-Threat Underground Storage Tank Case Closure Policy intended to be used to allow closure of some of the low-threat cases in order to concentrate limited program funds on cases that are higher priority. The Policy includes criteria that, if met, would allow higher residual petroleum contamination to remain in soil and groundwater at certain UST or former UST sites than previously allowed while closing their cases. The criteria take into account existing supply wells and surface water bodies, but in Zone 7's opinion are not protective enough of future water beneficial uses. During the draft and hearing phases of the policy development, Zone 7 and others submitted written comments and oral testimony voicing concerns with the policy. However, in August 2012, the Notice of Decision was filed with the California Secretary for Natural Resources, and the Policy became effective without incorporating any of the suggested changes.

In November 2012, the State Water Board approved the Plan for Implementation of Low-Threat Underground Storage Tank Case Closure Policy and Additional Program Improvements. As part

of this Plan, the SWRCB has been reviewing all UST cases for possible closure. None of the Zone 7 designated high priority sites have been closed under this review process. One of the Zone 7 designated high priority sites was recommended for closure based on a SWRCB review in 2010; however, ACEH and Zone 7 did not concur with the State's approach. As a result the case is still open. Most petroleum cases have now been reduced to a semi-annual monitoring basis.

CASE INFORMATION

Zone 7 Water Agency is currently tracking the progress of 65 active sites where contamination has been detected in groundwater or is threatening groundwater. There are 16 active sites where the contaminant plume is within 2,000 feet of a municipal water supply well or surface water body and are classified as "High Priority" cases due to their impact or threat of impact on potable groundwater supplies. Zone 7's database contains 245 other contamination cases that have been either "Closed" or deemed "No Action Required" because they have been cleaned up or they pose minimal threat to drinking water supplies. No new cases have been opened since the publication of the Toxic Site Surveillance (TSS) 2011 Annual Report in April 2012. During this same period, seven cases were closed, and eight more have requested closure and are being reviewed at the time of this report.

The locations of all the toxic sites are shown on the enclosed maps; Livermore-Figure 1, Pleasanton and Sunol-Figure 2, and Dublin-Figure 3. The maps also show each toxic site's proximity to the Valley's municipal water wells. Figure 4 shows the approximate locations of all the VOC plumes in Zone 7's groundwater basin. Table 1 contains an informational summary for each of the 65 active sites including the case status, its priority, and which agency is responsible for providing oversight on the case. It also shows the chemicals of concern for each case and provides brief notes regarding the case. Attachment A of this report describes the priority ranking scheme for sites, whereas, Attachment B contains the key for the Status Code designations.

New Sites:

No new Toxic Sites cases were opened in 2012.

Closed Sites:

The following Toxic Sites were granted "Case Closed" status since the last TSS Annual Report was issued. Generally, the contamination at these sites was characterized, remediated and monitored sufficiently to demonstrate that they no longer pose a risk to human health and the environment. Zone 7 Staff concurred with the lead agency's decision to close these cases.

- Site 44: North Hop Shell, 5251 Hopyard Road, Pleasanton. A case closure letter was issued on July 11, 2012. The case was closed with Site Management Requirements that limit the future land use to the current commercial land use only.

- Site 225: Springtown Gas/Arco, 909 Bluebell Drive, Livermore. A case closure letter was issued on July 18, 2012. The case was closed with Site Management Requirements that limit the future land use to the current commercial land use only.
- Site 227: Can Am Plumbing, 151 Wyoming Street, Pleasanton. A case closure letter was issued on July 27, 2012. The case was closed with Site Management Requirements that limit future land use to the current commercial land use only.
- Site 249: Sunol Pump Station/Maintenance Yard, 505 Paloma Way, Sunol. A case closure letter was issued on February 15, 2012. The case was closed with Site Management Requirements that limit future land use to the current municipal corporation yard and pump station land use only.
- Site 283: Former Quest Laboratory, 6511 Golden Gate Drive, Dublin. A case closure letter was issued on April 20, 2012. Case closure was granted for the current commercial land use only.
- Site 286: East Avenue Services (Rotten Robbie No. 64), 4186 East Avenue, Livermore. A case closure letter was issued on April 3, 2012. The case was closed with Site Management Requirements that limit future land use to the current commercial land use only.
- Site 314: Former Village Parkway Shopping Center Site, Dublin. A case closure letter was issued on September 10, 2012. The case was closed with no Site Management Requirements.

Sites Pending Closure Review:

“Case Closure” was requested by representatives for the following Toxic Sites. At the time of this report, the Lead Agencies have considered the requests, but have asked for additional information before making their decision.

- Site 54: Shell #13-5783, 1801 Santa Rita Road, Pleasanton. A case closure request was submitted to ACEH by the RP. ACEH is still reviewing this case. In the meantime, ACEH has agreed to suspend groundwater sampling while they review the case closure request. In the interim, Zone 7 staff will be sampling our nested sentinel monitoring wells located downgradient from the site to confirm that no contamination is migrating towards the municipal supply wells located further downgradient. This is a High Priority site due to the site being within 2,000 feet of two municipal supply wells. More detail on this site is provided in the High Priority Site section below.
- Site 93: Chevron #9-0917, 5280 Hopyard Road, Pleasanton. A case closure request was submitted to ACEH by the RP. ACEH is considering the case for closure and is requesting that a List of Landowners Form be submitted by 1/14/13. In addition, a Draft Notification of Potential Case Closure and List of Interested Parties to Receive Notification of Potential Case Closure is due by 1/21/13. This case was previously classified as Moderate Priority because it is outside the main groundwater basin.
- Site 116: Rich's Chevron Service, 7007 San Ramon Road, Dublin. ACEH is considering a request for case closure. ACEH agreed to suspend groundwater sampling, but requested that a soil vapor survey be conducted as a requirement for consideration for case closure.

The soil vapor survey report was submitted in April 2011. This site is outside of the main basin and is classified as Moderate Priority.

- Site 157: Arco #6041, 7249 Village Parkway, Dublin. A case closure request was submitted to ACEH by the RP. There are low levels of fuel constituents in the groundwater. This site is outside of the main basin and is classified as Low Priority. ACEH review is pending.
- Site 181: Unocal #6419, 6401 Dublin Boulevard, Dublin. A case closure request was submitted to ACEH by the RP on May 21, 2012. The closure request is based on the SWRCB Low-Threat Closure Policy. This site is outside the main basin and is classified as Moderate Priority. ACEH review is pending.
- Site 290: Kinder Morgan Pipeline Leak, Iron Horse Trail, Dublin. A case closure request was submitted to RWQCB by the RP. This site is outside of the main basin and is classified as Low Priority. RWQCB review is pending.
- Site 291: Perciva/Metro Valley Cleaners, 224 Rickenbacker Circle, Livermore. RP submitted a Closure Summary Report. ACEH review pending. PCE concentrations remaining at the site are below the MCL. This is a Low Priority site outside the main groundwater basin.
- Site 297: Pleasanton Fire Station #3, 3200 Santa Rita Road, Pleasanton. ACEH has agreed to case closure pending submittal of a Landowner Notification Form by January 25, 2013. This case was classified as Moderate Priority because it is inside the main basin but drinking water is not likely to be impacted by the residual TPHd (up to 170 ug/L) and TPHmo (up to 520 ug/L) remaining in groundwater beneath the site.

High Priority Sites:

The following are summaries of the “High Priority” Toxic Sites organized by the city in which they are located. The most recent activities are summarized in the “Current Action” sub-sections. The key for the priority numbering system can be found in Attachment A.

Livermore

SITE 62: B&C Mini Mart (Desert Petroleum)

Priority: 1A2

Background

This gas station, currently known as Valley Gas, is located at 2008 First Street in Livermore. Desert Petroleum owned and operated the site until 1994, when it filed for bankruptcy and sold the property to its current owner. The site is contaminated with TPHg, MTBE, and benzene. In total, there are 44 monitoring wells associated with this site.

Contamination was first detected at the site in 1988 in the backfill surrounding the underground storage tanks (USTs). Free product was detected in one monitoring well, MW-2. Product removal from this well began at that time and continued on a semi-monthly basis until early 1995. In March 1995, another release was reported from the site. Again free product was detected in MW-2 and product removal was performed. In 1996, all USTs were replaced with double-walled fiberglass tanks, fiberglass piping, and an automated leak detection system. Two

additional monitoring wells were installed offsite at this time to further delineate the extent of the plume. Free product was detected in these wells and remedial actions were taken to remove the product from these wells. In 1999, nine more monitoring wells were installed further downgradient to define the extent of the plume, including monitoring wells D-1 and D-2 which were completed in a lower aquifer to examine whether contamination had impacted the deeper semi-confined aquifer that California Water Services wells produce from.

ACEH requested additional site characterization in 2003, including the installation of multi-level wells with more discreet screened intervals to replace the current long-screen wells and to help define the northern edge of the plume, leading to a site conceptual model. Four multi-level wells were installed and sampled in August 2003. Three are located off-site at the northern edge of the plume and one is located on-site near the source. MTBE concentrations have fluctuated since then but MTBE was detected in the onsite well above the MCL of 13 µg/L (ppb) during the most current sampling event in 2012. The northern edge of the plume has moved beyond the three multi-level wells, but does not appear to be moving directly toward Cal Water Service's Well No. 8 (CWS-08).

A site investigation performed in March 2006 revealed a source zone area estimated to be approximately 250 feet long, extending to the northwest from the tank pit, and approximately 80 to 120 feet wide. The zone of LNAPL (Light Non-Aqueous Phase Liquids or free product) is generally confined to the lower coarse grained unit with the majority of the impacted sediment from 36 to 48 feet bgs. In August 2007, an ozone sparge/soil vapor extraction (OS/SVE) pilot test was conducted. The ozone sparge system was put into operation soon after. A rise in groundwater elevations made the SVE less effective so the system was idled. ACEH approved an amended Corrective Action Plan (CAP) proposing target cleanup levels and an expanded soil vapor extraction pilot test in September 2011 with the additional requirement of monitoring potential vapor migration. The ozone sparge system operated sporadically during 2011/12 with multiple shutdowns for maintenance and repairs.

Special Notes

Former California Water Service (CWS) supply well CWS-03, the closest water supply well to the site, has been properly destroyed. However, the contamination has historically been detected within 800 feet of the next closest CWS municipal supply well, CWS-08, but not in samples collected from CWS-08.

Current Action

ACEH approved a workplan proposing the addition of SVE to the existing ozone sparge remediation. A report on the well installation and destructions is due January 30, 2013. Groundwater monitoring is continuing on a semi-annual basis.

SITE 84: Arrow Rentals

Priority: 1A2

Background

A service station operated at the site between 1951 and 1968. In 1972, three 1,500-gallon USTs were removed from the site after they failed integrity tests. In 1985, one 1,000-gallon gasoline

UST was installed in the southeastern portion of the site. Later that year, approximately 600 gallons of gasoline were accidentally dispensed into an adjacent vapor monitoring well.

Several soil and groundwater investigations were conducted between 1988 and the present, including soil and groundwater investigations, a dual-phase extraction pilot test, and regular groundwater monitoring from several onsite and offsite monitoring wells.

Investigation reports suggest that the extent of soil and groundwater impacts were limited to within 60 feet below ground surface (bgs) and up to 100 feet offsite. Concentrations in groundwater up to 65,000 ug/L of TPHg, 18,000 ug/L TPHd, and 14,000 ug/L benzene have been detected beneath the site.

Groundwater monitoring reports indicate that free-phase hydrocarbons have not been observed in any monitoring well since November 2001 when 0.14 feet of hydrocarbons were measured in a well located approximately 40 feet downgradient of the impacted vapor well.

ACEH denied a request for case closure in 2005 due to their belief that the contamination had not been fully characterized. As a result, an additional soil gas investigation was conducted.

In 2006, a Dual Phase Extraction (DPE) pilot test was conducted at the site. Based on the pilot test results a Corrective Action Plan (CAP) was developed with DPE selected as the recommended remedial alternative. The CAP was approved by ACEH in August 2007, however, installation of the DPE system was delayed until Fall 2011 in spite of several enforcement letters written to the RP by ACEH.

A 5-year review of the case was conducted by SWRCB in November 2011. In their Summary Report, the SWRCB agreed with ACEH's order for a DPE system to be installed and operated at the site. Consequently, a DPE System was installed and operated for 1,148 hours between Nov 15, 2011 and Feb 1, 2012. The RP shut down the system in February 2012 claiming lack of funding.

Special Notes

This site is within 2,000 feet of Cal Water municipal supply well CWS-08.

Current Action

The DPE and air sparging systems were restarted on March 21, 2012 and continue to operate. As of the most recent Semi-Annual Monitoring Report dated July 30, 2012, 5,426 pounds (lbs) of TPHg has been removed through soil vapor extraction and 14.8 lbs of TPHg have been removed by groundwater extraction.

SITE 111: Arco #00771

Priority: 1A2

Background

In February 1990, a limited subsurface environmental assessment conducted in the area adjacent to four gasoline USTs indicated the presence of petroleum hydrocarbon impacted soil and free product beneath the site.

In December 1990, a supplemental subsurface investigation was conducted to evaluate the lateral and vertical extent of petroleum hydrocarbons in soil and ground water at the site. This investigation included the installation and sampling of monitoring wells. A sheen of free-phase product was observed in well MW-1 and 0.16 feet of product was measured in MW-2 during the first sampling event.

In 1991, an additional subsurface investigation was conducted to further evaluate the extent of impacted soil and ground water, and to install four additional monitoring wells. Groundwater analytical results showed impacted groundwater at all the monitor well locations. Later in 1991, a vapor extraction test demonstrated that vapor extraction was an effective method to remediate subsurface soils at the site.

In April 1992 and January 1993, additional soil sampling and monitoring well installations were conducted. No hydrocarbons were detected in any of the soil and groundwater samples collected offsite.

In March 1993, a Soil Vapor Extraction (SVE) system was installed. The system operated sporadically due to rising groundwater conditions. The system was shut down permanently in October 1995. During its operation, the SVE system recovered a total of 56.9 lbs of hydrocarbons.

In 2006, an Air Diffusion (AD) treatment system was installed for remediation of dissolved phase hydrocarbons. This system was operated until March 2010.

A Case Closure Request was submitted by the RP to ACEH in January 2012. The RP felt the case qualified for low-risk closure because the source has been removed, concentrations are below the draft low-risk criteria guidelines, the plume appears to be stable, and they believed there were no receptors nearby. Zone 7 notified ACEH that we disagree with the claim that there are no nearby receptors because Cal Water operates an active municipal supply well approximately 800 feet from the site. Accordingly, ACEH denied the request for closure.

Special Notes

This site is located within 800 feet of Cal Water municipal supply well, CWS-10.

Current Action

After meeting with the ACEH, the RP retracted the request for case closure. Semi-annual groundwater monitoring is continuing. In the most recent Quarterly Monitoring Report, the RP's consultant recommends installing an absorbent sock in a well MW-7 if it continues to have detectable LNAPL.

SITE 115: Livermore Arcade/Miller's Outpost Shopping Centers (LASC/MOSC) **Priority: 1A2**

Background

The LASC/MOSC site formerly housed two dry cleaners that had various leaks/releases through time that caused groundwater contamination from PCE, a common dry-cleaning solvent. In 1990, soil and groundwater investigations determined the presence of PCE and petroleum hydrocarbons in groundwater. Remedial extraction wells were installed at the site later that year.

In 1992, it was determined that the contamination at the LASC had co-mingled with contamination from the dry cleaner at MOSC. Soil-vapor extraction and air sparging began in 1993 as a joint remediation effort, and continued until late 1995, when monitoring determined that the amount of PCE being extracted was no longer significant. The pump and treat extraction wells continued operations until February 1996. In 1996, a non-attainment area (NAA), with an associated risk management plan was established around the LASC/MOSC, and approved by RWQCB Order (No. 96-052). Following the establishment of the NAA, PCE contamination was detected at levels exceeding the MCL or action levels outside of the NAA, and also in minor amounts at two downgradient water supply wells operated by CWS. In March 2000, the RWQCB revised the sampling requirements for the site and requested that a workplan be drafted to reinstate groundwater remediation at the site. Then in July 2003, the Water Board issued a Notice of Violation for failure to resume active remediation and submit an adequate 5-Year Status Report.

In 2004, the remedial strategy of in-situ chemical oxidation was pilot-tested using injected chemical oxidizers. Results of the pilot test showed the injection of permanganate reduced concentrations of PCE to below detection limits; however, no plans for a full-scale in-situ remediation project have been received by the RWQCB or Zone 7.

In 2007, a 5-Year Status Report was submitted that reported trigger level exceedences for MW-33 and CWS-14. In January 2008, Zone 7 requested that the Water Board issue a Cease and Desist Order for Violation of Order No. 96-052 and adopt a new clean up order with a more aggressive requirement for characterization and remediation. In a March 21, 2008 letter, the RWQCB approved a Contingency Plan which recalculated trigger levels of eight monitoring wells within the non-attainment area using the same method established in the original Board order, but calculated using data from 1992 to 2007.

In 2008, the multiple RPs collectively formed a Trust, the LASC/MOSC 2008 Trust 1 (2008 Trust) to manage and coordinate the ongoing investigation and future remedial plans. In a Groundwater Investigation Report submitted in 2009, the consultant delineated the PCE plume in the shallow and deep aquifers and assessed its impact to Cal Water supply wells CWS-08, CWS-14 and CWS-31. A concept level evaluation of remedial activities was also presented in the report.

Discrete sampling near the source area to determine the vertical and lateral extent of elevated PCE concentrations (ie: greater than 50 ug/L), was performed in November 2010. Preliminary data showed that the vertical extent of the elevated concentrations was about 70 feet bgs around the source areas, though low concentrations near or below the MCL were widely scattered to about 90 ft bgs. PCE concentrations above the MCLs have migrated down gradient of the source area and are entering the top of CWS-14's screened interval. The RWQCB required a remedial strategy to address the elevated concentrations in the source area, the above-MCL concentrations at the distal end of the plume and measures to protect CWS-14 be developed by March 2011.

In July 2011, the RP requested that they be allowed six to ten months to complete their financial arrangements among the various RPs and to select a contractor before constructing the planned remediation system(s). RWQCB is considering their options for a new or revised Order.

Special Notes

This site is a major concern because PCE continues to impact or threaten California Water Service (CWS) wells CWS-08, CWS-14 and CWS-31. CWS currently operates a granulated activated carbon (GAC) system to remove PCE from the water produced by CWS-14 which otherwise has PCE concentrations above the MCL.

Current Action

The RP selected a new consultant who submitted a new Remedial Action Plan (RAP) for the site. The RWQCB caseworker had concerns about the RAP (as did Zone 7 and CWS) most notably: the cleanup goals for the Shallow Zone groundwater should be based on drinking water standards, not vapor intrusion, and a pilot test is recommended to evaluate the effectiveness of the proposed remedial approach prior to a full-scale implementation. The RWQCB plans to issue a new Site Cleanup Requirements Order. Groundwater sampling was conducted in the second quarter of 2012 and groundwater sampling is scheduled to be conducted semi-annually.

SITE 128: Laidlaw Transport

Priority: 1A2

Background

The site is located at 2900 Ladd Avenue in Livermore and is currently occupied by Laidlaw Transit Maintenance Yard (a.k.a. the LVJUSD Bus Barn). Three former USTs were removed from the site in 1992. A fourth UST located on an adjacent LVJUSD property was also removed in 1992.

Following tank removal, numerous soil and groundwater investigations were conducted at the site to delineate the extent of impact. Groundwater monitoring and sampling continued at the site until 2003. It is unclear why the groundwater-monitoring effort was discontinued in 2003.

On November 18, 2010 ACEH issued a Notice of Violation (NOV) to LVJUSD. In the NOV, ACEH requested a work plan be prepared for an additional investigation to: 1) evaluate whether the existing monitoring wells act as conduits for vertical contamination migration; 2) characterize the magnitude of concentrations in the shallow and deeper groundwater zones through detailed lithologic assessment; 3) identify all water supply wells within 2000 feet of the site; and 4) comply with GeoTracker reporting requirements.

The RP submitted a Soil and Groundwater Characterization/Request for Low Risk Closure Report to ACEH in January 2012. According to the RP's report only residual hydrocarbons and BETX remain, the plume is stable or decreasing, and the residual hydrocarbons do not threaten the public's drinking water supply. However, the report only identified one of the nearby Cal Water municipal supply wells. Zone 7 opposed closure of this case because there is a supply well, previously unidentified by the RP, within 500 feet of the site. ACEH indicated they would deny the RP's request based on this new information.

Special Notes

There are two municipal supply wells within 2,000 feet of this site. Cal Water Well CWS-17 is approximately 500 feet south of the site and CWS-12 is approximately 1,200 feet from the site.

Current Action

ACEH denied the RP's request for low-risk closure due to the potential future pumping of a nearby CWS well. ACEH also requested that the RP conduct a dual-phase extraction (DPE) pilot test and submit a report by December 21, 2012.

SITE 191: Former Beacon, #3604

Priority: 1A2

Background

The site is currently an active service station and is located southwest from the Livermore Arcade Miller's Outpost (LASC/MOSC) site. In November 1992, three USTs were removed and replaced with new double-walled USTs. The fuel tank excavation was over-excavated removing approximately 1,200 cy of contaminate soil. A confirmation soil sample contained 490,000 µg/L TPHg, 1400 µg/L benzene and 13,000 µg/L naphthalene. Hydropunch borings were advanced to further delineate the down gradient extent of the contaminant plume. In 1995, 27 dual-completion wells (capable of soil vapor and groundwater extraction) were installed. A remediation system began operating in June 1996 and ceased in January 1997. Benzene levels had decreased from 21,000 µg/L in March 1994 to 3,900 µg/L in June 1997.

Not much progress was made between 1997 and 2003 during which time the property changed ownership twice. In September 2003, three groundwater monitoring wells were installed to determine the lateral extent of petroleum hydrocarbons. Elevated levels of TPHg were detected in 2004 and again in January 2006 which prompted ACEH to require remedial action. In September 2008, ACEH approved an Interim Remedial Action Plan to install deep monitoring wells, an oxygen injection system and a soil vapor extraction (SVE) system. Baseline sampling of injection wells revealed the highest concentrations of TPHg and benzene at 120,000 µg/L and 7,800 µg/L, respectively, adjacent to the existing USTs. Construction of the oxygen injection system and soil vapor extraction system was completed in June 2010 and the SVE system operated using four wells.

In October 2010, one foot of free product was detected in injection well IP-8, which is adjacent to the existing USTs. After removal by bailing, the thickness was measured at no more than 0.02 foot. A Work Plan to perform an investigation to determine the extent of free product near the USTs was approved by ACEH.

An investigation using Membrane Interface Probe (MIP) technology was conducted in January 2011. Based on the investigation results, an offsite deep monitoring well was installed just down gradient of the USTs in April 2011. Elevated levels of TPHg (72,000 ug/L) and benzene (5,200 ug/L) were detected in the new deep zone monitoring well.

Special Notes

CWS supply well CWS-08, is located approximately 1,600 ft down gradient from this site.

Current Actions

An In-Situ Chemical Oxidation (ISCO) pilot test was performed as described in the March 2012 report. The Third Quarter 2012 Status Report reports that quarterly monitoring has shown decreases in contaminant concentrations and the RP recommends continued monitoring of the

groundwater and evaluation of future ISCO events in additional wells. The RP is continuing the operation of the SVE and oxygen injection remediation systems.

SITE 226: Livermore Gas & Mini Mart

Priority: 1A2

Background

This gas station is located at 160 Holmes Street in Livermore. In April 1999, three gasoline USTs and one diesel UST were removed. In July 2000, three groundwater monitoring wells were installed at the site and TPHg, TPHd, benzene, and MTBE were detected in groundwater samples. At that time, the benzene and MTBE concentrations were 6,400 µg/L and 320,000 µg/L, respectively.

Three additional offsite monitoring wells and an onsite extraction well were installed at the site in 2001; however, the extraction well did not produce significant amounts of water so a groundwater extraction system was not installed. During an additional investigation in November 2005, elevated levels of TPHg, TPHd, and MTBE were detected in groundwater samples collected adjacent to the former UST pit and directly downgradient of the site in all three water bearing zones tested (28, 50 and 70 feet bgs).

Based on the data collected during the 2005 investigation, seven new discrete depth monitoring wells and two new extraction wells were installed in the first quarter of 2006. Additional grab groundwater samples were collected in early 2007 to help define the source area and delineate the extent of contamination. Very high MTBE and TPHg concentrations (1,500,000 µg/L and 210,000 µg/L, respectively) were detected in CP-14, located near the source area.

A Dual Phase Extraction (DPE) pilot test was conducted in the two new extraction wells, but there was no vapor recovery during the test so it didn't appear that SVE would be an effective remediation alternative for this site. Consequently, batch groundwater extractions began on September 6, 2006 with ACEH approval. By the end of the first quarter of 2007, 16,652 gallons of groundwater were extracted and an estimated 0.49 lbs of TPHg, 0.033 lbs of benzene, and 2.21 lbs of MTBE were removed. An additional extraction well was installed adjacent to the location of CP-14, however a proposed GWE-only system was not approved by ACEH. As a consequence, a Soil Vapor Extraction (SVE) system was approved and added in the fourth quarter of 2009. A pilot scale operation was conducted April-July 2010 resulting in a cumulative mass removal of approximately 12.95 lbs of TPHg, 0.088 lbs benzene and 44.77 lbs MTBE combined.

A Remedial Implementation, consisting of three separate chemical oxidant injection events between April 11 and May 23, 2011 was conducted at approximately 32 locations in the area of concern. ACEH requested that quarterly groundwater monitoring be continued at least through the first quarter of 2012 to better evaluate the effectiveness of the chemical oxidant injections. In spite of the continued monitoring request, the RP submitted a request for Low-Threat Case Closure in December 2011. Zone 7 notified ACEH that it is opposed to case closure at this time due to the lack of post-remediation monitoring data.

Special Notes

Former CWS supply well CWS-03, which was approximately 1,000 ft downgradient from this site, has been taken out of service and destroyed. However, the contamination plume is within 1,500 feet of CWS supply well CWS-08.

Current Action

The RP's request for Low-Threat Case Closure was denied based on lack of plume stability and the presence of TBA beneath and downgradient of the site. Quarterly sampling has continued at the site and the RP is developing a work plan addendum pursuant to technical comments in ACEH's directive letter dated August 22, 2012 to further address residual concentrations of petroleum constituents in soil and groundwater in the vicinity of well EW-3.

SITE 231: Unocal Station #4186

Priority: 1A2

Background

This gas station is located at 1771 First Street in Livermore and is owned by Tosco Marketing Co. Contamination includes TPH, benzene, and MTBE. MTBE has been detected in both onsite and offsite wells. In December 2001, an Ozone Microsparge system was put into operation. Concentrations in the on-site wells have decreased since the Ozone Microsparge system began operating, but the concentrations remained above the MCLs in both on- and off-site wells. In April 2006, additional borings were advanced to a depth of 60 feet bgs to delineate the vertical and lateral extent of contamination, and to more clearly define the subsurface lithology. Three coarse-grained water-bearing units were identified, suggesting a possible pathway for downgradient hydrocarbon migration. Dissolved phase hydrocarbons were detected in all three units. The Ozone Microsparge system was shut down in October 2006 to assess whether dissolved gasoline concentrations would rebound or remain stable in the absence of ozone injection with the current well configuration. The RP's consultant claimed that existing data showed ozone injection is effective in reducing petroleum hydrocarbon impact to the groundwater; however, ACEH points out that tertiary-butyl alcohol (TBA), a fuel oxygenate, concentrations remain elevated.

A magnesium sulfate pilot test was conducted from May 2010 to July 2010. Magnesium sulfate was applied to the "middle zone" (45'-50' bgs) via monitoring well U-11, because it was the most impacted zone of the three zones. The Pilot Test Report reported increased concentrations of TPHg and MTBE following application. The consultant claimed it is not an uncommon short term reaction, and recommended continued monitoring on a semi-annual basis. ACEH approved of their approach, but requested that they add monitoring for TBA.

The First Semi-Annual Report of 2011 showed some decrease in concentrations of TPHg, MTBE, and BTEX. TBA was detected in onsite well U-11 at 11,000 ug/L.

Special Notes

ACEH re-prioritized this site to 1A2 (High Priority with threat to drinking water source) based on Zone 7's recommendation due to the proximity to CWS-08, and the presence of MTBE and benzene in concentrations exceeding their MCLs.

Current Action

A Compound Specific Isotope Analysis was performed on samples collected during the first semi-annual monitoring event of 2011 to help determine the biodegradability of TBA and MTBE at the site. The results were presented in a report submitted in December 2012. The report concludes that MTBE is degrading in the groundwater at the site based on the stable to decreasing MTBE concentrations, the relatively high TBA/MTBE ratios, and the stable carbon and hydrogen isotopes. Semi-annual groundwater monitoring continues.

SITE 238: All Rents

Priority: 1A2

Background

This site at 2247 Second Street in Livermore once housed a dry cleaner. The soil and groundwater at this site are contaminated with PCE. The RWQCB has yet to recognize this site as an official case. Contamination was detected during a Phase I/limited Phase II site assessment when the property was being sold to the present owner in 1999. PCE was detected up to 5,280 micrograms per kilogram ($\mu\text{g/kg}$) in one of the four-foot depth borings. An additional site assessment was performed in May 2000 and confirmed that the contamination had spread to groundwater. One groundwater sample at a depth of 27 ft showed a PCE concentration of 430 $\mu\text{g/L}$ and a TCE concentration of 250 $\mu\text{g/L}$. No permanent monitoring wells have been installed on the site; however, Zone 7 requested at least one downgradient well be installed subsequent to the removal of contaminated soil. The current property owner has no plans to fund clean up or investigation activities, and is researching the option of selling the property "as is". No action has been formally requested by the RWQCB because they have not opened an official case for the site. In June 2009, Zone 7 Staff forwarded a letter from the property owner indicating that prior groundwater sampling took place at the site. Information on previous dry cleaners in the vicinity from a dry cleaner survey acquired by ACEH was also provided to the RWQCB.

Special Notes

Source removal at this site could theoretically downgrade its ranking to moderate or low priority, assuming the contamination is not widespread. The property is currently occupied by "It's All About Dancing," a dance studio.

Current Action

Now that Potential Responsible Parties (PRP) have been identified, Zone 7 staff is urging the RWQCB to open this site as a formal case and direct corrective action. The RWQCB attributes its inactivity on this case to resource constraints. Zone 7 may share the burden of locating the potential PRP(s) for this site to expedite the process of opening this case.

SITE 259: Mills Square Park

Priority: 1A2

Background

This former service station site is the current location of the City of Livermore's Mill Square Park. Aerial photos indicate that the site was a retail service station from 1959 to 1973.

In 2003, a Phase I investigation and a subsurface soil and groundwater investigation were performed at the site as part of the City of Livermore's "due diligence" assessment of the property prior to their purchase. The latter investigation detected TPHd up to 42,000 ug/L, TPHg up to 18,000 ug/L, and benzene up to 140 ug/L in groundwater beneath the site.

In 2006, an additional soil investigation confirmed that TPHd and TPHg existed in soil above their respective ESLs. A geophysical survey revealed that two USTs remained at the site. These two tanks and their associated piping were removed in 2007, however, the soil samples collected during the tank removals indicated that TPHd and TPHg remained onsite above their ESLs. Groundwater samples were not collected in either of these investigations.

In 2008, another investigation was performed including, soil, soil vapor and grab groundwater sampling, and the installation of three groundwater monitoring wells. TPHd up to 52,000 ug/L, TPHg up to 18,000 ug/L, and benzene up to 14 ug/L were detected in groundwater beneath the site. No fuel oxygenates, including MTBE, were detected in any of the groundwater samples collected.

In 2010, three perched zone and six deeper zone (approximately 54 to 59 feet bgs) monitoring wells were installed to further define the extent of contamination at the site. ACEH requested that a Pilot Test Work Plan or Corrective Action Plan (CAP) be submitted by the RP to start remediation activities at the site. In October 2011, ACEH conditionally approved a "Work Plan for Feasibility Testing and Additional Assessment". This workplan included enhancing bioremediation by inserting a sulfate canister in an existing monitoring well and applying calcium sulfate dihydrate (agricultural gypsum) over the landscaped area of the park to increase the amount of sulfate in the shallow water-bearing zone. It also included the installation of a monitoring well, to be used to monitor the effectiveness of the proposed sulfate applications. ACEH conditioned its approval on including a larger area of gypsum application, installing additional monitoring wells, and conducting risk assessments for the gypsum application and the lead concentrations in soil.

Special Notes

This site is approximately 1,500 feet from a municipal supply well operated by Cal Water, CWS-12.

Current Action

Three additional monitoring wells were installed to monitor the effectiveness of the sulfate applications conducted in 2012. A Human Health Risk Assessment (HHRA) prepared by the RP concluded that the levels of lead present in shallow soils would be acceptable for a child visiting the site as well as for an adult worker at the site. ACEH did not agree and feels that the shallow soil should be removed. A work plan for soil removal is due February 1, 2013. Quarterly groundwater monitoring is continuing at the site.

SITE 23: South Hop Shell

Priority: 1A2

Background

This Shell gas station is located at 3790 Hopyard Road, on the corner of Hopyard Rd. and W. Las Positas Blvd; approximately 1,500 feet northwest of Zone 7's supply well Hopyard No. 6. In 1987, the first two of many monitoring wells were installed. Detections of TPH-g and BTEX constituents caused Zone 7 to request additional monitoring wells. Three monitoring wells were installed in early 1988, and groundwater remediation began in 1989. In May 2001, groundwater extraction was resumed in three monitoring wells.

Between 2002 and 2005, site investigation work was conducted, including the installation of additional soil borings and monitoring wells including two down gradient wells along the Arroyo Mocho to help define the extent of contamination off-site. Groundwater samples were collected from three separate water-bearing zones in the nine soil borings. Most of the detections of MTBE and TBA were in the first water bearing zone, approximately 15 to 20 feet bgs. However, these contaminants were also detected in three of 16 samples collected below the clay aquitard identified at around 50 feet bgs.

MTBE was not detected in the wells installed along the Arroyo Mocho; however, based on the MTBE concentration maps, it was thought that the southern edge of the MTBE plume may be discharging to the Arroyo Mocho. Samples collected to date from the Arroyo indicate that surface water quality does not appear to be impacted by the release.

In all, the groundwater extraction and remediation system removed 7.96 lbs of hydrocarbons and 15.6 lbs of MTBE since re-activation on July 1, 2003, while influent concentrations decreased, from 3,400 ppb of MTBE in July 2003 to 2.9 ppb in March 2006. After approval from ACEH, the groundwater extraction system was shut down in May 2006 to monitor groundwater quality under non-pumping (equilibrium) conditions. Since May 2006, the concentration of TBA in downgradient, off-site well MW-6 increased from 212 ppb in April 2006 to 7,100 ppb in November 2009. While the GWES may have been controlling plume migration, it was not achieving much mass removal.

In 2010, the State's UST Cleanup Fund performed a case review of all sites in their program and this site was considered for case closure. ACEH and Zone 7 did not agree with the State's closure proposal. Subsequently, a Work Plan for a Feasibility Pilot Study of magnesium sulfate injection was submitted to ACEH in May 2010. Following approval, magnesium sulfate was applied to two onsite wells in the vicinity of the existing USTs. Although preliminary results indicated limited success in contaminant reduction, the specific results suggested that magnesium sulfate injection is a viable remedial method, but that volume and frequency of application needs to be fine-tuned.

In April 2011, the RP submitted a Corrective Action Plan (CAP) that recommended monitored natural attenuation (MNA) as the preferred remedial alternative. ACEH disagreed with the proposed alternative because of the increasing trend of TBA in downgradient well S-6. ACEH did accept, however, the RP's proposal to continue the semi-annual monitoring at this time to assess whether the plume is stable.

Special Notes

The contamination appears to be approximately 1,100 ft from Zone 7's municipal supply well Hopyard Well No. 6. Very low levels of MTBE detected in Hopyard Well No. 6 during Zone 7's aquifer storage recovery (ASR) project conducted in 2001 are attributed to low levels of MTBE present in the surface water injected into the well and not from this site.

Current Action

ACEH agreed to reduce groundwater monitoring requirements from semi-annual to annual for all monitoring wells except for S-6, which will be sampled quarterly. S-6 has shown an increasing trend of TBA. Quarterly sampling will help establish the trend. The annual sampling will be conducted in the first quarter of each year and all sample results will be presented in the annual First Quarter Groundwater Monitoring Report.

SITE 54: Shell #13-5783

Priority: 1A2

Background

The site is an active service station located on Santa Rita Road at Valley Avenue. There are three fuel USTs present at the site.

In 2002, a soil and groundwater investigation was conducted. At that time, four monitoring wells were installed. Some BTEX compounds and TPHd were detected. Water levels rose substantially between 2002 and 2006. In response, four additional monitoring wells were installed. Contaminants have been detected in groundwater beneath the sites at concentrations up to 25,900 ug/L of TPHg, 1,200 ug/L TPHd, 3,720 ug/L benzene, 250 ug/L MTBE, and 1,300 ug/L TBA.

ACEH agreed to switch the groundwater sampling from quarterly to semi-annually starting in 2012. Concentrations appear to be relatively stable and the groundwater contamination appears to be contained onsite. In the 3rd quarter of 2011, MTBE was detected in two of the seven monitoring wells; both detections (63 and 27 ug/L) were above the MCL of 13 ug/L. However, there was insufficient water in these shallow wells during the 4th quarter 2011 sampling event to obtain a representative sample for comparison.

Special Notes

This site is located approximately 1,680 feet from the City of Pleasanton municipal supply well P-6 and approximately 1,970 from P-5.

Current Action

The RP submitted an Updated Site Conceptual Model and Closure Request in April 2012. ACEH review is still pending. ACEH has agreed to suspend groundwater sampling while they review the case closure request. In the interim, Zone 7 staff will be sampling our nested sentinel monitoring wells located downgradient from the site to confirm that no contamination is migrating towards the municipal supply wells located further downgradient.

SITE 60: Former Steve's Exxon, #7-3399

Priority: 1A2

Background

This former Exxon gas station is located at 2991 Hopyard Road on the corner of Hopyard Rd. and Valley Ave. Pleasanton Well No. 7 is 250 ft from the site but has not operated since 1993. Zone 7's Hopyard Well No. 9 is 950 ft from the site. Contaminants at this site include TPHg, MTBE, and benzene. Quarterly groundwater sampling was initiated after free product was detected in an onsite well in 1988. Groundwater extraction and vapor recovery began shortly after and continued until June 1990 when it was terminated due to dropping groundwater levels. Vapor extraction methods were used intermittently to remove hydrocarbons from the subsurface until March 1993. In general, the majority of contamination was found in a perched aquifer that is encountered at a depth of approximately 10 ft. Some elevated levels of MTBE are documented in the 'Zone 1' aquifer at a depth of approximately 55 ft. In August 2000, three additional monitoring wells, two deep (up to 135 ft below grade) and one intermediate (70 ft below grade), were installed offsite to determine the extent of contamination and to serve as sentinel wells for municipal supply wells Pleasanton Well No. 7 and Hopyard Well No. 9.

Active groundwater remediation was restarted in March 2001. The groundwater extraction system targeted the perched (10 ft) and "Zone 1" (55 ft) aquifers. In March 2004, ExxonMobil requested authorization to shut down their groundwater extraction system citing low flow rates, low influent concentrations and low mass removal rates. The groundwater extraction system was shut down in October 2004 to monitor the groundwater under non-pumping conditions after having removed a total of 0.0078 lbs of benzene and 0.782 lbs of MTBE. The groundwater extraction system was restarted in February 2007 due to trigger levels being exceeded for three consecutive quarters. As of September 2012, almost twelve million gallons of groundwater have been extracted and treated resulting in the removal of 12 lbs of TPHg, 0.24 lbs of benzene, and 13 lbs of MTBE.

An Additional Soil and Groundwater Investigation was conducted in February 2011 to further characterize the vertical extent of MTBE in the source zone especially between the perched zone and "Zone 1." MTBE was detected in all nine soil borings and groundwater samples.

Special Notes

MTBE has never been detected in Hopyard Well No. 9. Hydraulic communication between Zone 7's Hopyard 9 and the sentinel wells was confirmed in 2002. Some minor detections of MTBE had been reported in the sentinel wells in the past but they are thought to be from cross contamination during sampling and no contamination has been detected in these wells recently.

Current Action

The RP has recommended continuing the pump and treat system and evaluating if additional extraction wells should be added to the system. Over the summer the groundwater elevations in the zone being extracted for treatment lowered to the point where extraction wasn't possible. Temporary SVE was being considered while the soil is unsaturated.

SITE 242: Alameda County Fairgrounds

Priority: 1A1

Background

The Alameda County Fairgrounds is located within the Bernal Subbasin and is considered to be a small public supplier of drinking water. In December 2000, PCE was detected in the main fairgrounds well 3S/1E 20B 2 (20B2) at 5 ppb, which is the MCL established by the State. In early 2001, the well was resampled and the PCE level had risen to 16 ppb. This 500-foot deep well is within 7,000 feet of the Hopyard Well Field and within 4,000 feet of the San Francisco Water District's (SFWD) well field, and is screened from 218 to 500 feet below ground surface. This interval overlaps the screened intervals of the municipal water supply wells in the vicinity; however, PCE contamination has not been detected in the municipal supply wells.

Zone 7 staff requested that the RWQCB open this site as an official SLIC case; however, they have been reluctant to do so without the source of contamination being identified. There are several active dry cleaners in the area; however, the source of the PCE contamination has not been determined. PCE is continuing to be detected in the Fairgrounds Well, and there is some concern these concentrations could be trending upward. In 2001, Zone 7 staff sampled and analyzed a few monitoring wells existing in the area for general VOCs in an attempt to identify the source/direction of the PCE plume. The groundwater samples were analyzed in August 2001, but PCE was not detected in any of the samples collected.

Special Notes

Under the direction of the Department of Public Health (DPH), the Fairgrounds installed a wellhead treatment system (i.e., granular activated carbon (GAC) filtration system) in June 2001. The well and treatment system are still in operation.

Current Action

Zone 7 is continuing its effort convincing the RWQCB that this site should be opened as an official SLIC case. Towards this outcome, Staff has applied for a Department of Water Resources' (DWR) Local Groundwater Assistance (LGA) grant to identify potential sources of the PCE contamination detected in the Fairgrounds supply well. If funded, the project will include researching locations of former dry cleaners and other potential PCE users, conducting a soil gas survey, and collecting groundwater samples to explore the extent of contamination. DWR is scheduled to notify Zone 7 of its grant intentions by February 2013.

SITE 245: Hopyard Cleaners
Priority 1A2

Background

The Hopyard Cleaners is located at 2771 Hopyard Road in Pleasanton, just southeast of Site 60, Former Steve's Exxon. Phase II investigations of soil and groundwater were conducted at this site in April 2002. VOCs were detected in two soil samples and one groundwater sample collected from beneath the concrete floor. During a follow-up investigation in April 2003, four groundwater samples were collected from beneath the dry cleaners. PCE and its daughter product, TCE, were detected in all four groundwater samples collected. Investigations conducted between September 2003 and May 2004, detected PCE and TCE up to 3,300 µg/L and 440 µg/L, respectively in groundwater samples collected near the dry cleaners. The MCLs for PCE and TCE are both 5 ppb.

Further investigations in January 2006, found dense non-aqueous phase liquid (DNAPL) is present at the site within the silt/clay confining zones beneath the water bearing zones. In September 2006, the RWQCB adopted a tentative order requiring the RP to finalize the site investigation, implement interim remedial actions, and propose final remedial actions.

Between 2007 and 2008 additional monitoring wells were installed and sampled both on and off-site. PCE was detected above the MCL in two zones between 20 and 60 feet bgs both on- and off-site, but not in samples collected from the residential area beyond Hopyard Road.

As a consequence, RWQCB issued Board Order R2-2008-0032 which set final site cleanup standards and required additional site investigation, implementation of a cleanup plan, and long term groundwater monitoring. RWQCB also approved a Work Plan for a Soil Vapor Extraction and Treatment (SVET) System using 5 SVE wells. Installation and startup of the SVET System was initiated in August 2008. With elevated levels of PCE in shallow groundwater, the RWQCB issued a deed restriction, which prevents use of shallow groundwater beneath the site, and prohibits sensitive uses of the site such as day care or residential use during the remediation. Since the start of its operation in 2008, the SVET system has removed approximately 22.24 lbs of VOCs, and the groundwater-VOC plume appears to be stable.

A pilot study conducted in May 2010, to evaluate enhanced in-situ bioremediation (EISB) as a method to treat the groundwater zones. Third quarter 2010 performance monitoring results indicated decreasing concentrations of TCE and PCE, while concentrations of degradation products (cis 1,2-DCE and vinyl chloride) increased.

A workplan for full-scale enhanced in-situ bioremediation (EISB) implementation was submitted to and approved by the RWQCB in January 2012.

Special Notes

At this time, no outside funding source is available to assist with the investigation and clean up of "dry cleaner" cases.

Current Actions

A full-scale enhanced in-situ bioremediation (EISB) implementation was conducted July 2012. The follow up report was due in September 2012, following the first carbon substrate injection; however, it has not yet been uploaded to GeoTracker. Groundwater monitoring continues on a semi-annual basis at this site.

Sunol

SITE 250: Sunol Tree Gas Station

Priority 1A1

Background

Five 15,000-gallon gasoline USTs were removed from the site in April of 2002. During the tank removal approximately 4,000 cubic yards of contaminated soil were over excavated from the pit and approximately 160,000 gallons of water impacted by hydrocarbons were removed. The onsite supply well was tested and no fuel contaminants were detected. However, elevated MTBE and TPHg concentrations were detected in soil samples collected from borings drilled near the former UST and four shallow groundwater samples collected from beneath the site.

In February 2003, MTBE was detected in a domestic supply well located on the property adjacent to the Sunol Tree Station at 130 µg/L. A temporary water treatment system was installed on the neighbors impacted well, in late 2003, but the gas station owner did not comply with ACEH's further site characterization directives, so the contamination investigation was taken over by ACEH as an Emergency, Abandoned, Recalcitrant (EAR) UST Account.

In July 2004, ACEH installed three nested piezometers on the impacted property to help characterize the extent of contamination, and in December 2004, a new domestic supply well was installed on the neighboring property to provide a clean drinking water source for its residents. Also conducted in December 2004 was the installation of multi-level piezometers that transect the plume. Samples collected from these piezometers detected MTBE at levels up to 320 µg/L.

The original domestic supply well on the adjacent property continued to pump and treat the groundwater, using granulated active carbon filters, as a remedial action. However, in July 2010, ACEH issued a Notice to Comply to the new property owner and stated that the current pump and treat system was not an acceptable remedial strategy for the site. A Draft Corrective Action Plan screening viable remedial options was submitted to ACEH in December 2010.

In November 2011, ACEH approved the RP's Interim Remedial Action Plan (IRAP) addendum with one addition; if toxic daughter products are detected above ESLs, ACEH must be notified immediately, and contingency actions must be taken as outlined in the plan.

Special Notes

Although this site is outside of the Main Groundwater Basin, it is within Zone 7's service area. It is classified as a high priority site because it has impacted a domestic water supply well. MTBE was not detected in any of the other water supply wells on the surrounding properties.

Current Actions

ACEH transferred the case to the RWQCB on May 31, 2012. The RP is continuing to submit quarterly reports. Results of ongoing ozone sparging pilot test are scheduled to be presented in the next Quarterly Report due in January 2013.

Dublin

Although several sites in Dublin have elevated levels of MTBE (i.e., >10,000 ppb) and one has elevated levels of TCE, none are classified as High Priority because they are not near drinking water wells.

Other Special Sites:

The following sites are not listed as high priority sites for the endangerment of the Livermore-Amador Valley Municipal Supply; however, these sites have a high profile due to media attention, recent activities, and/or local involvement. They are not considered to be high risk to drinking water because they either are in non-municipal supply areas of the groundwater basin and/or have undergone extensive remediation.

SITE 1: Lawrence Livermore National Laboratory (LLNL) Priority 3A1

LLNL is a multipurpose research facility owned by the U.S. Department of Energy (DOE) and run by a management team which includes Bechtel National, University of California, Babcock and Wilcox, Washington Division of URS Corporation, and Battelle. Prior to its current use, the site was a Naval Air Station where aircraft maintenance was performed. The site was added to the National Priorities List (NPL) in 1984 and Superfund activities began at this time to address westward migrating Volatile Organic Compounds (VOCs) present in the groundwater. An annual environmental report is produced by LLNL to update monitoring and remedial activities that are continuing at the site. Copies of this report and other environmental publications can be accessed via the Web at www-envirinfo.llnl.gov.

Since remediation began in 1989, through 2011, approximately 2,970 kg of VOCs have been removed from soil vapor and groundwater. The LLNL 2011 Annual Report states that groundwater concentration and hydraulic data indicate subtle but consistent declines in the VOC concentrations and areal extent of the contaminant plumes in 2011. Although the large budget shortfall in 2008 resulted in the non-operation of many LLNL groundwater remediation facilities, there was little to no evidence of measureable contaminant plume migration while these facilities were not operating. Hydraulic containment along most portions of the western and southern boundaries of the site was maintained. Remedial treatment facilities operations were restored in 2010, and progress was made toward interior plume and source area cleanup. The latest results will be published in LLNL 2012 Annual Report due in Spring 2013.

Site 300, LLNL's Experimental Test Site, is located 12 miles east of the Livermore site in the Altamont Hills of the Diablo Range in San Joaquin and Alameda Counties. The major

contaminants of concern at Site 300 are VOCs (primarily TCE), nitrate, perchlorate, tritium, depleted uranium, and metals. Site 300 is located outside of our main groundwater basin. The contamination plumes at Site 300 have been clearly defined and are part of an ongoing monitoring and remediation program. Annual Reports are forwarded to Zone 7 on a regular basis.

SITE 5: Sandia National Laboratory (SNL)

Priority 3A3

SNL consists of two sites of concern that are monitored on a quarterly basis: Navy Landfill and Fuel Oil Spill Site. Both sites are outside of our main groundwater basin. The Navy Landfill was operated from 1942 to approximately 1960, and received construction debris and soil.

Carbon tetrachloride was detected in one monitoring well at the Navy Landfill (NLF-6) in 1998. The RWQCB approved closure of the case in 1998 with conditions, including the monitoring of well NLF-6.

A diesel fuel spill occurred in 1975 at the Fuel Oil Spill Site (FOS). SNL began monitoring this site in 1985 and detected low levels of contamination. A cleanup system was installed and in 1995, bioremediation was begun. In 1999, the RWQCB allowed remediation to cease and monitoring to continue at a reduced scale.

Sandia currently samples seven groundwater monitoring wells (two at the Fuel Oil spill site on a semi-annual basis, one at the Navy Landfill site and four along the Arroyo Seco to monitor the effect of site operations on groundwater on an annual basis). Water samples have not been collected at the Fuel Oil Site for 6 consecutive years due to dry well conditions. The two original wells were destroyed and new deeper wells were installed and sampled in 2011. The latest results of the annual sampling event at the Navy Landfill detected 1.8 ug/L of tetrachloride which is up slightly from 2010 (1.2 ug/L) and is above California's MCL of 0.5 ug/L but below the Federal MCL of 5 ug/L for tetrachloride. There was no TPH or metals above their respective MCL detected in any of the Arroyo Seco wells. An annual environmental report is produced by Sandia National Labs to provide a summary of environmental management performance and compliance efforts at its facilities. The 2012 report is due out in June 2013. This report can be accessed at www.sandia.gov/news/publications/environmental/index.html.

SITE 11: Intel Fabrication Plant 3

Priority 2A3

Intel owned and operated a semiconductor manufacturing plant at this location from 1972 to 1995. The VOC contamination is thought to have originated from a basement storage area. It is suspected that the VOCs leaked through a sump in the concrete floor. Groundwater monitoring began in 1982. In 1983, limited source removal was conducted of the subsurface soil. In 1986, a groundwater extraction and treatment system was installed and began operating onsite. In 2000, additional source area remediation of soil and groundwater was begun to further reduce the contamination at the site. Groundwater extraction was discontinued in May 2000 after the source area remedial action began, and monitoring and contingency plans were prepared for the site. In

2003, Intel implemented an Enhanced In-situ Bioremediation project in the A-zone area in the northwestern portion of the site. In December 2004, an Order to Amend Final Cleanup Requirements was adopted by the RWQCB. The amendment states that Intel is still responsible for site cleanup even though Mines Road, LLC has acquired the property. Following the Enhanced In-situ Bioremediation, the consultant reported a 99% reduction of VOCs in this area from 2003 to 2005. In 2005, Intel expanded these remediation measures into the B-zone area, also located in the northwest portion of the site. The extent of the plume has been defined and monitored natural attenuation continues as the final remedial alternative for cleanup at the site as specified in RWQCB Order No. R2-2002-0053. However, in September 2012 the RP voluntarily installed a Groundwater Extraction and Treatment System in one well at the site to help expedite the groundwater cleanup. Further evaluation of the system and the potential for groundwater extraction from additional wells will be presented in the upcoming 5-year Review due in February 2013.

SITE 137: Busick Gearing
Priority 3A3

This site at 6341 Scarlett Court in Dublin consists of three buildings located within a light industrial/commercial area. The site was originally occupied by a metal fabrication company and then by a company that manufactured printed circuit boards. Building 2, located in the southern part of the site, had a sump that was used to collect excess fluids from the various manufacturing processes. Various VOCs leaked from this sump into the underlying soil, and then migrated to the groundwater. The sump, and contaminated soil, was over-excavated in 1991 to a depth of 6 feet to achieve source removal; however, CPT/grab groundwater sample data collected in 2006 indicate that TCE exceeding 200 ppb extends across Interstate 580 to the south. An additional investigation to further delineate the extent of contamination, including collecting 14 grab groundwater samples, was conducted in 2008. The results of the investigation were submitted in a technical report in June 2008. However, the RWQCB stated that the investigation was inadequate because it did not address the full vertical extent of the plume.

The RP and their consultant have been meeting frequently with the RWQCB to determine an acceptable, but economical remedial strategy. They are currently leaning towards initially using in situ remediation methods to reduce contamination in the source area. RWQCB has maintained Zone 7's involvement in determining a reasonable timeframe for restoration of groundwater beneficial uses since if the TCE plume migrates further south, it will enter the main groundwater basin and could threaten future groundwater use.

A work plan for additional subsurface investigation was submitted to the RWQCB in July 2012. The proposed investigation includes collecting both soil and groundwater samples at both the source area and at the leading edge of the plume.

SITE 290: Kinder Morgan Pipeline Leak
Priority 3A3

On June 15, 2006 residents of Dublin in close proximity to the South San Ramon Creek complained about a gasoline odor. A subsequent investigation by crews from Dublin Public

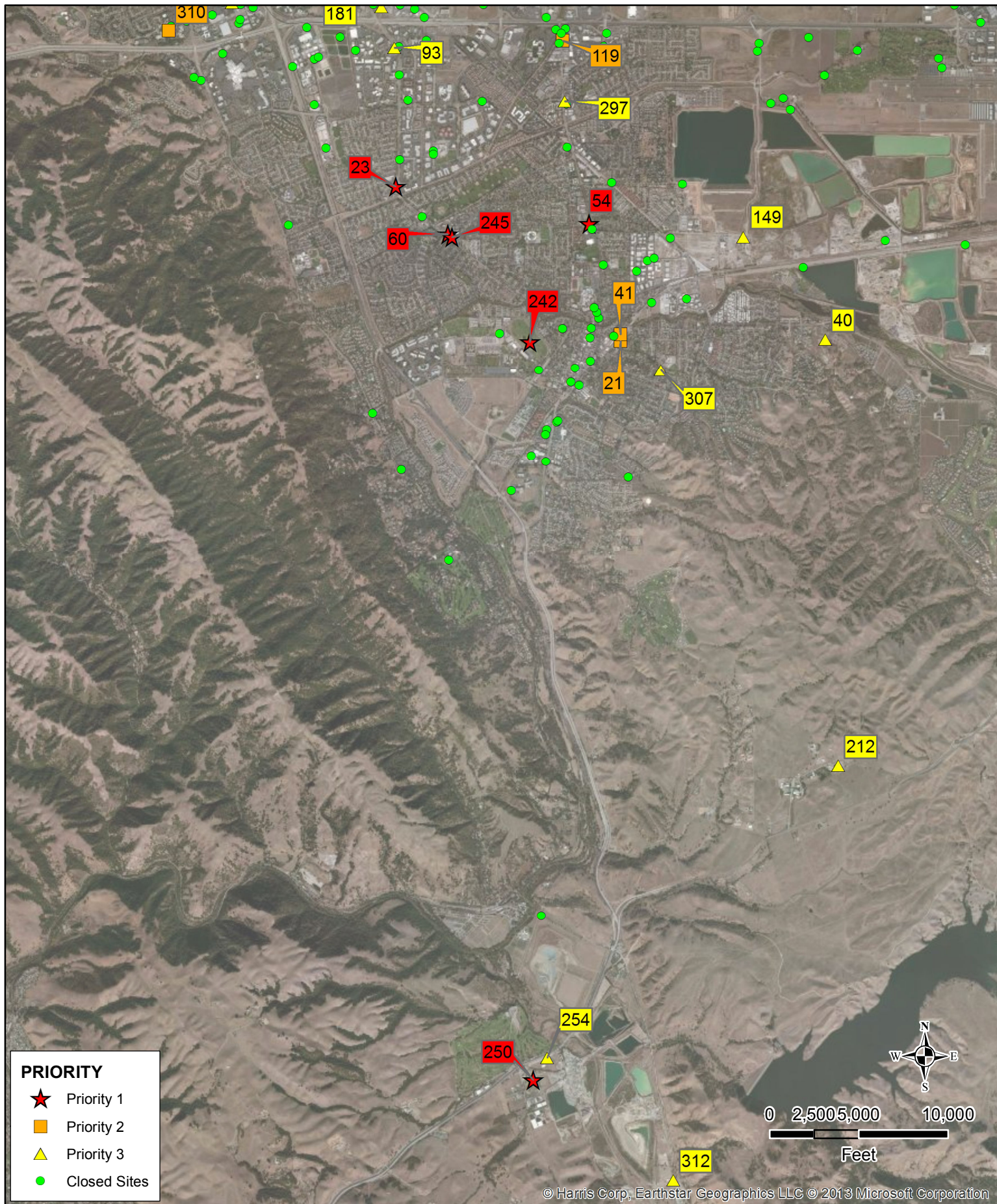
Works and Kinder Morgan revealed that a leak of approximately 200 gallons of refined petroleum had been released from a pipeline along the Iron Horse Trail midway between Alcosta and Amador Valley Blvd. The City of Dublin oversaw the emergency clean-up, and the RWQCB is the lead agency for the remaining investigation and cleanup. As part of this investigation and cleanup, 21 temporary wells were sampled during the fourth quarter of 2006. The concentrations of TPHg and BETX have remained steady or decreased in all but one well, Pit-1. On August 27, 2007, the consultant submitted a Comprehensive Site Status Report and Request for Closure letter report which was denied by the RWQCB. RWQCB then required that a workplan for additional investigation to determine the extent of contamination and establish quarterly monitoring of all existing monitoring wells at the site, commencing with the first quarter of 2009 be prepared. Discrete groundwater samples during the 1st quarter of 2009 revealed significant residual concentrations of total petroleum hydrocarbons and BTEX compounds in groundwater where three pits were excavated as part of the emergency cleanup action. Subsequently, the RWQCB issued a letter, requiring another Work Plan be prepared that addresses the data gaps in soil contamination assessment, and the vertical and lateral extent of groundwater contamination. Because the work and the resulting 2010 Technical Report did not address the RWQCB's requirements, the RWQCB issued a Notice of Violation. In October 2011, a Supplemental Site Assessment Report was submitted by Kinder Morgan's consultant. The report evaluated potential contamination pathways and recommends quarterly sampling in order to evaluate whether additional remediation is necessary.

In November 2012, the RP submitted another Closure Request Report. The closure request is based on the Low-Threat Case Closure criteria adopted by the SWRCB. The report claims that the plume is stable, the portion of the plume that exceeds the clean-up goals is less than 100 feet long, and there is no free product. The RWQCB is still reviewing the closure request.

LIST OF ACRONYMS

ACEH	Alameda County Environmental Health
BTEX	Benzene, toluene, ethylbenzene, and xylenes
CAP	Corrective Action Plan
CWS	California Water Service
EISB	Enhanced In-Situ Bioremediation
ESL	Environmental Screening Levels
GWE	Groundwater Extraction
IRAP	Interim Remedial Action Plan
lbs	Pounds
MCL	Maximum Contaminant Level
mg/L	Microgram per Liter
MNA	Monitored Natural Attenuation
MIP	Membrane Interface Probe
MTBE	Methyl Tertiary-Butyl Ether
PCE	Tetrachloroethene
ppb	Part per billion
RP	Responsible Party
RWQCB	Regional Water Quality Control Board
SVE	Soil Vapor Extraction
SWRCB	State Water Resources Control Board
TBA	Tertiary-Butyl Alcohol
TCE	Trichloroethene
TPHg	Total Petroleum Hydrocarbons from gasoline
TSS	Toxic Site Surveillance
UST	Underground Storage Tank
VOC	Volatile Organic Carbon

FIGURES AND TABLES



ZONE 7 WATER AGENCY
100 North Canyons Parkway,
Livermore, CA

DRAWN: CD/CW

REVIEWED: MK

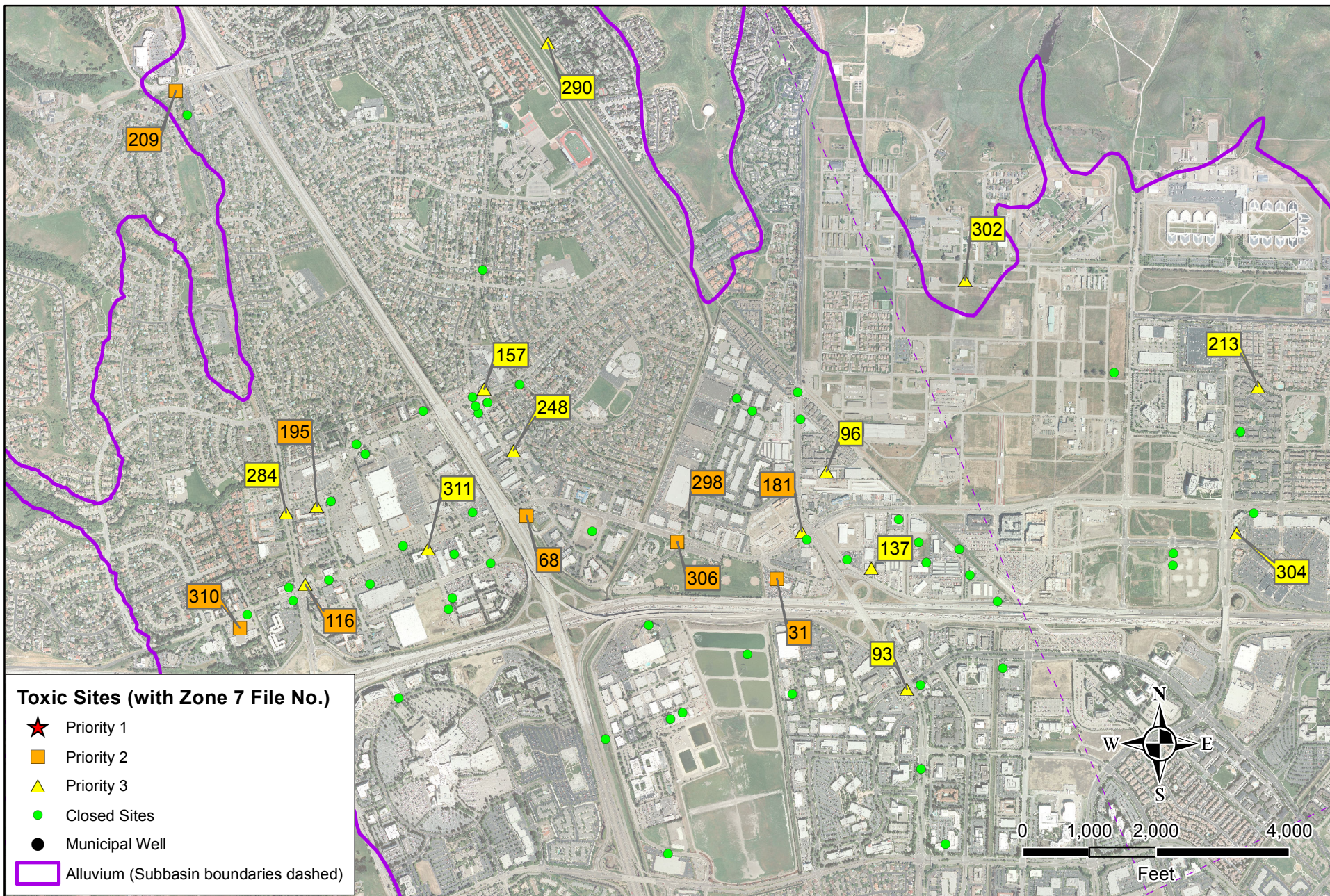
E:\Toxics\Toxics - Pleasanton-Sunol.mxd

**Toxic Site Surveillance
Pleasanton and Sunol
Area Sites
with Zone 7 Case ID**

Scale: 1" = 7,000'

Date: 2/14/2013

FIGURE 2



ZONE 7 WATER AGENCY
100 North Canyons Parkway,
Livermore, CA

DRAWN: CD/CW

REVIEWED: MK

File: E:\Toxics\Toxics - Dublin.mxd

**Toxic Site Surveillance
Dublin Area Sites
with Zone 7 Case ID
(North of Main Basin)**

Scale: 1" = 2,000'

Date: 1/24/2013

FIGURE 3

TABLE 1

The structure of the attached table is as follows:

Z7 ID - Zone 7 designation corresponds to file number in Toxic Sites Surveillance Files and the location on the site maps.

Owner - The property owner or responsible party for the contamination investigation/cleanup.

Site Name - Indicates a site name if different from the Owner Name.

Site Address

City

Chemical - The chemical(s) of concern at the site.

BENZ – benzene

CCl₄ – carbon tetrachloride

Cr(VI) – hexavalent chromium

1,2-DCE – 1,2-dichloroethene

DRO – diesel range organics

GRO - gasoline range organics

MTBE – methyl tertiary-butyl ether

NO₃ – nitrate

PCE – tetrachloroethene

TBA - tertiary-butyl alcohol

TCE – trichloroethene

TOLU – toluene

TPHg – total petroleum hydrocarbons gasoline

TPHd – total petroleum hydrocarbons diesel

TPHmo – total petroleum hydrocarbons motor oil

VC – vinyl chloride

XYL – xylenes

Concentration ug/L - The most recent concentration in groundwater in micrograms per liter (parts per billion).

Priority - The first number of the priority code indicates the whether the case is closed (0), high priority (1), moderate priority (2), or low priority (3). See Attachment A for the full list of codes and descriptions

Status - The status code is based on the RWQCB ranking of the progress of a case; see Attachment B for the full list of codes and descriptions. Zone 7 uses these additional codes to represent status:

NR - further investigation not required

ReO - reopened

Notes - Highlights current activities or concerns at a site.

Table 1 - Active Sites Summary

Z7 ID	OWNER	SITE NAME	ADDRESS	CITY	PRIORITY	STATUS	LEAD AGENCY	NOTES
1	Lawrence Livermore National Laboratory	Lawrence Livermore Lab	7000 East Avenue	Livermore	3A3	7	ACEH	1/16/13 - Plumes remain under control after remediation system shutdown in 2008. Groundwater Extraction and SVE systems are operational again. In 2011, VOC concentrations declined or remained stable.
					<u>CHEMICAL</u>	<u>CONCENTRATION ug/L</u>		
					TCE	2,700		
5	Sandia National Laboratory	Sandia National Labs	7011 East Avenue	Livermore	3A3	8	RWQCB	1/16/13 - PCE = ND; Carbontetrachloride = 1.8 ppb and Trichlormethane = 0.71 ppb at Landfill Shallow wells at Fuel Site destroyed due to 7 consecutive years of insufficient water. Two deeper wells installed. TPHd detected in one well at 210 ppb Http://www.sandia.gov/news/publications/environmental/index.html
					<u>CHEMICAL</u>	<u>CONCENTRATION ug/L</u>		
					TPHd	210		
					NO3	NS		
					CCL4	1.8		
					CR(IV)	0.0085		
11	Intel	Intel Livermore Fabrication Plant 3	250 North Mines Road	Livermore	2A3	8	RWQCB	1/14/13-A Notice of Violation was issued by RWQCB in April 2012 because a deed covenant was not recorded for the property. A Vapor Intrusion Assessment Work Plan was submitted in September to assess the potential risk from vapor intrusion. The work plan is being reviewed by RWQCB. The RP has started a GW extraction and treatment system. They submitted a report to the RWQCB that states they feel the system is effective and will provide additional analysis in the upcoming 5-year Review due February 2013.
					<u>CHEMICAL</u>	<u>CONCENTRATION ug/L</u>		
					TCE	860		
					1,2-DCE	350		
					VC	82		
					PCE	13		

Z7 ID	OWNER	SITE NAME	ADDRESS	CITY	PRIORITY	STATUS	LEAD AGENCY	NOTES
21	Shell Oil	First Street Shell	4212 First Street	Pleasanton	2A3	5R	ACEH	1/15/13 - A soil vapor study report submitted on 10/3/12 concludes soil vapor is not a concern at this site. An Air Sparge/SVE and DPE pilot test was conducted. The report concluded that while there was limited success with the methods the limited recovery did not support the cost of full-scale remediation and that the case should qualify for low-threat closure. ACEH does not agree that the site qualifies for low-threat closure and is requesting a Corrective Action Plan be submitted by 3/7/13.
					CHEMICAL	CONCENTRATION ug/L		
					TPHg	4,500		
					MTBE	5,200		
					BENZ	28		
22	Chevron Environmental Management	Former Texaco/Chevron #21-1253	930 Springtown Boulevard	Livermore	3A1	5R	ACEH	1/15/13 - ACEH approved the revised FS/CAP which proposes monitoring of well MW-14 on a quarterly basis, conducting a soil vapor investigation, the use of surfactant-enhanced LNAPL recovery if NAPL returns to well MW-14, and air sparging/soil vapor extraction if a vapor intrusion risk is evident. A Work Plan to conduct the soil vapor investigation is included in the FS/CAP. The Soil Vapor Investigation Report is due 4/17/13.
					CHEMICAL	CONCENTRATION ug/L		
					TPHg	12,000		
					BENZ	1,200		
					MTBE	NA		
23	Shell Oil (Equilon)	South Hop Shell #13-5784	3790 Hopyard Road	Pleasanton	1A2	7	ACEH	1/16/13 - ACEH does not support selecting Monitored Natural Attenuation, as proposed in the CAP, as the final remedial alternative for the site at this time. However, ACEH does support continued groundwater sampling to establish if the plume is stable. The sampling has been reduced to annual sampling in all wells except S-6 which has elevated levels of TBA.
					CHEMICAL	CONCENTRATION ug/L		
					TPHg	690		
					MTBE	40		
					TBA	2,300		
BENZ	12							

Z7 ID	OWNER	SITE NAME	ADDRESS	CITY	PRIORITY	STATUS	LEAD AGENCY	NOTES
31	Ozzie Davis Pontiac Toyota	Dublin Toyota Pontiac	6450 Dublin Court	Dublin	2A4	5R	ACEH	1/16/13 - MTBE concentrations are the same or lower in 2nd Q 2012. May be a result of ozone injection. Semi-annual groundwater monitoring and ozone injection will continue.
					CHEMICAL	CONCENTRATION ug/L		
					TPHg	980		
					MTBE	1,100		
					BENZ	22		
					TBA	620		
33	Republic Services (Formerly Browning-Ferris Industries)	Vasco Road Landfill	4001 North Vasco Road	Livermore	3	5	RWQCB	1/16/13 - Monitoring wells that were damaged were scheduled to be replaced in Summer-Fall 2012. Winter-Spring (February) 2012 Semiannual Self Monitoring Report on file. This case is an ongoing self-monitoring operating landfill. There was a toxic case at the same address that was closed in 1997.
					CHEMICAL	CONCENTRATION ug/L		
					TDS	1,200		
					TPH	NA		
36	Richmond Lox/Salinas Reinforcement	Salinas Reinforcing Inc.	355 South Vasco Road	Livermore	3A3	8	RWQCB	12/26/12 - RWQCB has given conditional approval to an on-site soil gas and groundwater investigation. The goal of the investigation is to fully delineate the on-stie contamination. A separate investigation will be conducted at a later date to characterize the contamination that has migrated off-site. A report of the investigation findings is due by Jan. 30, 2013.
					CHEMICAL	CONCENTRATION ug/L		
					TCE	450		
					TPHg	61		
					BENZ	NA		
40	Pleasanton Garbage Service	Old Pleasanton Landfill	2512 Vineyard Avenue and Pietronave Lane	Pleasanton	3	ReO	RWQCB	1/16/13 - 2012 Semi-Annual Discharge Monitoring Report on file.

Z7 ID	OWNER	SITE NAME	ADDRESS	CITY	PRIORITY	STATUS	LEAD AGENCY	NOTES
41	Unocal (Tosco), #7376	First Pleas Unocal, #7376	4191 First Street	Pleasanton	2A3	5C	RWQCB	11/8/12-This case was transferred over to the RWQCB in May 2012. The RP's consultant has submitted a Soil Vapor Sampling Work Plan proposing 3 multi-level soil vapor probe locations with additional soil sampling and soil vapor sampling. RWQCB is still reviewing the Work Plan.
					CHEMICAL	CONCENTRATION ug/L		
					MTBE	3,100		
					BENZ	1,500		
					TPHg	10,000		
54	Shell Oil	Shell #13-5783	1801 Santa Rita Road	Pleasanton	3C	8	RWQCB	8/27/12 ACEH is in the process of a case closure review requested by the RP. ACEH has requested an updated Well Survey to ensure that all potential receptors are considered. The well survey report was submitted October 10, 2012. ACEH agreed that groundwater monitoring can be suspended during the case closure review. This case has been classified as a high priority site due to the proximity to Pleas 5 and Pleas 6 municipal supply wells.
					CHEMICAL	CONCENTRATION ug/L		
					BENZ	NS		
					TPHd	270		
					MTBE	insufficient water		
					TBA	Insufficient Water		
60	Exxon	former Steve's Exxon, #7-3399	2991 Hopyard Road	Pleasanton	1A2	5R	ACEH	10/19/12-The consultant had recommended continuing the pump and treat system and evaluating if additional wells should be pumped. Over the summer the groundwater elevations in the zone being extracted for treatment lowered so extraction wasn't possible. Temporary SVE was being considered while the soil is unsaturated. As of 9/17/12, 11,937,910 gallons of gw have been treated and 12 lbs TPHg, 0.24 lbs benzene, and 13 lbs MTBE have been removed.
					CHEMICAL	CONCENTRATION ug/L		
					MTBE	230		
					TPHg	210		
					BENZ	8.9		

<i>Z7 ID</i>	<i>OWNER</i>	<i>SITE NAME</i>	<i>ADDRESS</i>	<i>CITY</i>	<i>PRIORITY</i>	<i>STATUS</i>	<i>LEAD AGENCY</i>	<i>NOTES</i>
62	Balagi Angle	Desert Petroleum/B&C Mini Mart/ B&C Mini Mart	2008 First Street	Livermore	1A2	7	ACEH	1/15/13 - Ozone Injection Remediation continues along with semi-annual groundwater monitoring. ACEH approved a workplan for adding SVE remediation to complement the ozone injection. A well installation and destruction report is due 1/30/13.
					<i>CHEMICAL</i>	<i>CONCENTRATION ug/L</i>		
					MTBE	41		
					BENZ	28		
					TPHg	720		
68	Chevron	Chevron, #9-2582 (Dublin Auto Wash)	7240 Dublin Boulevard	Dublin	2B3	7	ACEH	1/16/13 - Groundwater Monitoring Report – First Half 2012 on file. Due to recent increases and persistence of hydrocarbon concentrations in select wells, the RP submitted a bioremediation workplan in the Groundwater Monitoring Report and Bioremediation Workplan dated July 19, 2011 to ACEH. The workplan proposed low-cost bioremediation involving biosparging using existing subsurface conduits and introduction of a bio-organic catalyst. ACEH approval is pending.
					<i>CHEMICAL</i>	<i>CONCENTRATION ug/L</i>		
					MTBE	870		
					BENZ	480		
					TPHg	13,000		
73	Waste Management - California Bay Area	Waste Management	6175 South Front Road	Livermore	3A3	3B	ACEH	1/8/13 - ACEH approved the revised "Work Plan for Additional Site Investigation at Former Waste Management of Alameda County, Inc. Property, 6175 Southfront Road, Livermore, California". A site investigation report is due 2/13/13.
					<i>CHEMICAL</i>	<i>CONCENTRATION ug/L</i>		
					MTBE	3		
					BENZ	6		

Z7 ID	OWNER	SITE NAME	ADDRESS	CITY	PRIORITY	STATUS	LEAD AGENCY	NOTES
84	Livermore Redevelopment Agency	Arrow Rentals	187 North L Street	Livermore	1A2	7	ACEH	1/11/13 - The Dual Phase Extraction System was started back up on March 21, 2012. In the Frist Semi-Annual 2012 Groundwater Monitoring Report, the recommendation is to continue the DPE and air sparging remediation due to it's effectiveness to date. So far: 5,426 pounds of TPHg has been removed through soil vapor extraction and 14.8 pounds of TPHg have been removed by groundwater extraction.
					<u>CHEMICAL</u>	<u>CONCENTRATION ug/L</u>		
					TPHg	40,000		
					TPHd	NA		
					MTBE	190		
					BENZ	15,000		
93	Chevron	Chevron, #9-0917	5280 Hopyard Road	Pleasanton	3C	8	ACEH	12/27/12 - ACEH is considering the case for closure. A List of Landowners Form is due by 1/14/13 and a Draft Notification of Potential Case Closure and List of Interested Parties to Receive Notification of Potential Case Closure is due by 1/21/13. This case was previously classified as Moderate Priority because it is outside the main groundwater basin.
					<u>CHEMICAL</u>	<u>CONCENTRATION ug/L</u>		
					TPHg	7,000		
					MTBE	3		
					BENZ	81		
96	G&G International Holding Co.	Bay Counties Petroleum	6310 Houston Place	Dublin	3	8	ACEH	1/16/13 - TPHd levels have come back down (<1,000 ppb) after high concentrations (up to 53,000 ppb) detected in May 2012 sampling.
					<u>CHEMICAL</u>	<u>CONCENTRATION ug/L</u>		
					MTBE	1.2		
					TPHd	470		
99	Arco	Arco, #6113	785 East Stanley Boulevard	Livermore	2B4	5R	ACEH	1/8/13 - ACEH approved the "Addendum Work Plan for Installation of Remedial Well, Collection of Geochemical Samples, and Completion of a Mobile Dual-Phase Extraction Event". The report is due 2/23/13. Semi-annual groundwater monitoring continues.
					<u>CHEMICAL</u>	<u>CONCENTRATION ug/L</u>		
					TPHg	13,000		
					MTBE	280		
					BENZ	3,100		

Z7 ID	OWNER	SITE NAME	ADDRESS	CITY	PRIORITY	STATUS	LEAD AGENCY	NOTES
111	Arco	Arco, #00771	899 Rincon Avenue	Livermore	1A2	8	ACEH	1/8/13 - After meeting with ACEH on 8/29/12 the RP has retracted their request for case closure and will review the case. Groundwater monitoring is continuing on this site. RP is anticipating a directive letter from ACEH requesting additional investigation.
					<u>CHEMICAL</u>	<u>CONCENTRATION ug/L</u>		
					MTBE	120		
					BENZ	650		
					TPHg	15,000		
115	LASC/MOSC (Livermore Arcade)	Livermore Arcade (Miller's Outpost)	1410/1554 First Street	Livermore	1A2	5R	RWQCB	1/16/13 - The RP hired a new consultant. A RAP was submitted 8/31/12. The RWQCB does not feel the RAP is ready at this time and should be resubmitted when a new Site Cleanup Requirement Order is adopted. In addition, the shallow groundwater cleanup goals are not protective of drinking water and a pilot test is required prior to full-scale remediation.
					<u>CHEMICAL</u>	<u>CONCENTRATION ug/L</u>		
					PCE	240		
					TCE	0.9		
116	Chevron	Rich's Chevron Service	7007 San Ramon Road	Dublin	3C	8	ACEH	1/17/13 - ACEH agreed to suspend groundwater sampling and consider case closure.
					<u>CHEMICAL</u>	<u>CONCENTRATION ug/L</u>		
					MTBE	<10		
					BENZ	480		
					TPHg	21,000		
119	East Bay BMW	BMW	3830 Old Santa Rita Road	Pleasanton	2	3B	RWQCB	1/12/12 According to Geotracker, site is still open. GeoTracker indicates that a case review was conducted 1/12/12.
					<u>CHEMICAL</u>	<u>CONCENTRATION ug/L</u>		
					TPH			

<i>Z7 ID</i>	<i>OWNER</i>	<i>SITE NAME</i>	<i>ADDRESS</i>	<i>CITY</i>	<i>PRIORITY</i>	<i>STATUS</i>	<i>LEAD AGENCY</i>	<i>NOTES</i>
128	Livermore Valley Unified School District	Laidlaw Transport	2900 or 2908 Ladd Avenue	Livermore	1A2	5C	ACEH	8/20/12-ACEH denied the request for low-risk closure due to the potential future pumping of a nearby CWS well. ACEH requested that the RP continue with a dual-phase extraction (DPE) pilot test and submit a report by 12/21/12.
					<i>CHEMICAL</i>	<i>CONCENTRATION ug/L</i>		
					MTBE	20		
					BENZ	8,700		
					TPHg	65,000		
137	Busick Air Conditioning	Busick Gearing Properties	6341 Scarlett Court	Dublin	3A3	5C	RWQCB	1/15/13 - A work plan for additional subsurface investigation was submitted to the RWQCB in July 2012. The proposed investigation includes collecting both soil and groundwater samples at both the source area and at the leading edge of the plume.
					<i>CHEMICAL</i>	<i>CONCENTRATION ug/L</i>		
					TCE	5,200		
					PCE	120		
149	Kaiser Sand and Gravel	Hanson Aggregates	3000 Busch Road	Pleasanton	3A1	5R	ACEH	1/15/13 - ACEH agrees that the on-site stockpile soil is acceptable to be used as backfill material for the Busch Pit. ACEH feels that there are still items that are not addressed adequately in the Revised Closure Plan submitted 12/12/11. ACEH listed 18 specific comments that need to be addressed and another Revised Closure Plan submitted by 12/3/13. The case must also be brought into compliance with GeoTracker requirements by 11/16/12. A revised closure plan was submitted and ACEH review is pending.
					<i>CHEMICAL</i>	<i>CONCENTRATION ug/L</i>		
					BENZ	ND		
					TPHd	50		

<i>Z7 ID</i>	<i>OWNER</i>	<i>SITE NAME</i>	<i>ADDRESS</i>	<i>CITY</i>	<i>PRIORITY</i>	<i>STATUS</i>	<i>LEAD AGENCY</i>	<i>NOTES</i>
157	Arco	ARCO #6041	7249 Village Parkway	Dublin	3C	8	ACEH	1/8/13 - Case Closure Request was submitted by RP. ACEH met with RP on 9/28/12 review is still pending.
					<i>CHEMICAL</i>	<i>CONCENTRATION ug/L</i>		
					MTBE	5.3		
					BENZ	8.6		
					TPHg	73		
181	Unocal (Tosco) #6419	Unocal, #6419	6401 Dublin Boulevard	Dublin	3C	8	ACEH	1/16/13 - RP has requested closure. ACEH is preparing closure petition for the RWQCB.
					<i>CHEMICAL</i>	<i>CONCENTRATION ug/L</i>		
					MTBE	9.1		
					BENZ	ND		
					TPHg	ND		
191	Ultramar/Tesoro No. 67076	Former Beacon, #3604	1619 First Street	Livermore	1A2	7	ACEH	10/23/12 - Two downgradient monitoring wells installed. Groundwater monitoring continuing after ISCO pilot test. Groundwater concentrations generally appear to be decreasing. The newly installed downgradient monitoring wells have elevated levels of TPHg, benzene, and MTBE. The RP is recommending continued monitoring of the groundwater
					<i>CHEMICAL</i>	<i>CONCENTRATION ug/L</i>		
					TPHg	15,000		
					MTBE	170		
					BENZ	1,200		
					TBA	440		
195	Unocal (Tosco)	Unocal, #7176	7850 Amador Valley Boulevard	Dublin	3C	8	ACEH	1/16/13 - Closure request submitted on 11/19/12 based on the SWRCB Low-threat Closure Policy. ACEH review is pending.
					<i>CHEMICAL</i>	<i>CONCENTRATION ug/L</i>		
					TPHd	760		
					TPHg	2,400		
					MTBE	<5		
					BENZ	<0.50		

Z7 ID	OWNER	SITE NAME	ADDRESS	CITY	PRIORITY	STATUS	LEAD AGENCY	NOTES
209	Shell Oil	SHELL #13-5244	8999 San Ramon Rd.	Dublin	2A	5C	ACEH	1/14/13 - Sampling switched to semi-annual in the 3rd quarter of 2012. Groundwater sampling will be conducted in the first and third quarters. Plume appears relatively stable.
					CHEMICAL	CONCENTRATION ug/L		
					TPHd	1,200		
					TPHg	140		
					TBA	2,100		
MTBE	260							
212	GE Nuclear Energy	Vallecitos Nuclear Center	6705 Vallecitos Road	Sunol	3	ongoing	RWQCB	1/16/13 - This is an ongoing case for WDR permit monitoring Latest report on file in GeoTracker is 3rd Quarter 2012.
					CHEMICAL	CONCENTRATION ug/L		
					RAD			
					TDS	1,200		
213	Camp Parks	Parks Reserve Forces Training Area (PRFTA)	5th Street, multiple locations	Dublin	3C	5R	DTSC	1/16/13 - A Final Record of Decision was adopted June 2012. The remedial alternatives selected include: Excavation, Backfill, Disposal, and Short-Term Monitoring.
					CHEMICAL	CONCENTRATION ug/L		
					PCE	8.3		
					Metals	NA		
226	Manwel Shuwyahat	Livermore Gas and Minimart	160 Holmes Street	Livermore	1A2	7	ACEH	1/11/13 - The RP's request for Low-Threat Case Closure was denied based on lack of plume stability and the presence of TBA beneath and downgradient of the site. Quarterly sampling has continued at the site and the RP is working on a work plan addendum pursuant to technical comments in ACEH's directive letter dated August 22, 2012 to further address residual concentrations of petroleum constituents in soil and groundwater in the vicinity of well EW-3.
					CHEMICAL	CONCENTRATION ug/L		
					TPHd	580		
					BENZ	ND		
					MTBE	3,900		
TBA	82,000							
TPHg	430							

Z7 ID	OWNER	SITE NAME	ADDRESS	CITY	PRIORITY	STATUS	LEAD AGENCY	NOTES
231	Unocal #4186	Unocal #4186	1771 First Street	Livermore	1A2	7	ACEH	1/15/13 - The Compound Specific Isotope Analysis Report was submitted 12/1/12. The report concludes that degradation of MTBE is occurring at the site and will continue. Second Semi-Annual 2012 Groundwater Monitoring report is due by 2/15/13.
					CHEMICAL	CONCENTRATION ug/L		
					BENZ	420		
					MTBE	3,600		
					TPHg	7,500		
232	Bordoni Ranch LLC and Green Valley Corporation Tenancy in	Groth Brothers Chevrolet	59 South L Street	Livermore	3A1	8	RWQCB	2/18/11 - Risk Management Plan prepared to protect worker and public safety during site redevelopment. Several USTs obtained case closure. T0600101656 case is closed as of 11/5/2009 with oil and grease remaining in soil up to 1,100 ppm. Remaining environmental issues are being tracked as SL0600147081
					CHEMICAL	CONCENTRATION ug/L		
					BENZ	3,100		
					MTBE	1,200		
					TPHg	61,000		
					PCE	38		
238	All Rents	All Rents	2247 Second St	Livermore	1A2	5C	UNK	Former onsite dry cleaners identified, Permit # 20034, RWQCB informed of site
					CHEMICAL	CONCENTRATION ug/L		
					1,2-DCE	14		
					TCE	250		
					PCE	430		
242	Alameda County Fairgrounds	Fairground Main Well (3S/1E 20B 2)	4501 Pleasanton Avenue	Pleasanton	1A1	1		RWQCB informed of site. Not yet a formal case. LGA grant proposal submitted to DWR by Zone 7. If funded, the grant project would continue investigations into potential responsible parties, as well as, conduct soil gas surveys and collect groundwater samples to help delineate PCE contamination.
					CHEMICAL	CONCENTRATION ug/L		
					PCE	16		

Z7 ID	OWNER	SITE NAME	ADDRESS	CITY	PRIORITY	STATUS	LEAD AGENCY	NOTES
245	Ms. Clare Leung	Hopyard Cleaners	2771 Hopyard Road	Pleasanton	1A2	5R	RWQCB	1/14/13 - The RWQCB required a workplan for full-scale enhanced in-situ bioremediation (EISB) implementation. The workplan was submitted and approved. The work took place in July 2012 and a follow up report was to be submitted sixty days after completing the first carbon substrate injection. However, no report has been uploaded to GeoTracker yet.
					CHEMICAL	CONCENTRATION ug/L		
					1,2-DCE	690		
					TCE	761		
					PCE	3,250		
Vinyl Chloride	2,150							
248	Mr. Roger Woodward/Mr. Kewal Singh	Corwood Carwash	6973 Village Parkway	Dublin	3A2	8	ACEH	1/16/13 - Site is back in compliance with GeoTracker. A workplan for additional soil and groundwater investigation was submitted 2/8/12. The additional data to be collected is required for the case to be considered for closure.
					CHEMICAL	CONCENTRATION ug/L		
					BENZ	310		
MTBE	1800							
250	Murray Kelsoe	Sunol Tree Gas	3004 Andrade Road	Sunol	1A1	5R	ACEH	12/20/12 - ACEH transferred the case to the RWQCB on 5/31/12. GeoTracker shows the new caseworker as Marty Mosonge. The RP is continuing to submit quarterly reports. Results of ongoing ozone sparging pilot test will be presented in January 2013.
					CHEMICAL	CONCENTRATION ug/L		
					TPHd	ND		
					TPHg	ND		
MTBE	140							
254	Mission Valley Rock & Asphalt	Mission Valley Rock & Asphalt	7999 Athenour Way	Sunol	3C	8	ACEH	1/8/13 - Case had been slated for closure after public meetings were held and responses to the comments were presented. In one final round of water elevation monitoring to confirm groundwater model results, 0.61 feet of NAPL was detected in one well that had not had more than a sheen in previous rounds. A work plan was developed at the request of ACEH to investigate possilbe sources of the NAPL. The work plan is approved and the report is due 2/1/13.
					CHEMICAL	CONCENTRATION ug/L		
					TPHd	54,000		
					TPHg	6,800		
					BENZ	38		
MTBE	160							

Z7 ID	OWNER	SITE NAME	ADDRESS	CITY	PRIORITY	STATUS	LEAD AGENCY	NOTES
259	City of Livermore	CHEVRON #30-7233 /Mills Square Park/Performing Arts Theater	2259 First Street	Livermore	1A2	5R	ACEH	1/15/13 - ACEH has reviewed the submitted Human Health Risk Evaluation for Lead (Pb) dated 6/21/12. The report states that the risk of the lead present is acceptable for a child visitor or an adult worker. ACEH does not agree and is requiring the shallow soil to be removed. A work plan for soil removal is due 2/1/13. Also quarterly groundwater monitoring is required to access the gypsum applications. 4th Quarter GMR is due 1/29/13.
					CHEMICAL	CONCENTRATION ug/L		
					TPHg	2,500		
					BENZ	30		
					TPHd	1,000		
260	Mike Madden	V&G Muffler	21 South Livermore Ave	Livermore	2A1	1		Received data report as part of drilling permit 6/27/03
					CHEMICAL	CONCENTRATION ug/L		
					XYL	3,630		
					TOLU	5,100		
					TPHd	67,000		
TPHg	22,000							
264	Livermore Redevelopment Agency/Signature Properties	Railroad Ave-Livermore Site	1934 - 1950 Railroad Avenue at North L Street	Livermore	2A4	1	ACEH	3/7/05 Letter from ACEH doesn't think enough investigation has been done to rule out the PCE coming from onsite source. More invest by 6/7/05. Site is adjacent to Arrow Rentals. MTBE under site may be from B&C Mini Mart. Spoke to DD at ACEH. She transferred case to Reg Board. Awaiting latest info from Reg Board
					CHEMICAL	CONCENTRATION ug/L		
					MTBE	280		
					BENZ	130		
					TPHg	1,200		
PCE	30							
284	Gabriel Chiu	Former Crow Canyon Dry Cleaner	7272 or 7242 San Ramon Road	Dublin	3A2	7	ACEH	1/16/13 - Final CAP was submitted June 2012. SVE was installed and started in July 2012. Significant PCE mass removal was obtained during the first couple months of operation. The system will operate for an additional 3-5 months. Then the site will be monitored quarterly for a year.
					CHEMICAL	CONCENTRATION ug/L		
					TCE	3		
					PCE	22		

Z7 ID	OWNER	SITE NAME	ADDRESS	CITY	PRIORITY	STATUS	LEAD AGENCY	NOTES
285	Chevron	Chevron Sunol Pipeline	2793 Calaveras Road	Sunol	3A3 <u>CHEMICAL</u>	5R <u>CONCENTRATION ug/L</u>	ACEH	11/13/12-ACEH approved the revised work plan for additional investigation to address data gaps. The site investigation report is due 1/14/13.
					TPHg	27,000		
290	Kinder-Morgan Energy Partners, L.P.	Dublin-Iron Horse Trail Release	Iron Horse Trail	Dublin	3C <u>CHEMICAL</u>	8 <u>CONCENTRATION ug/L</u>	RWQCB	1/11/13-RP has requested case closure based on the Low-Threat Case Closure criteria adopted by the SWRCB. RWQCB review is pending.
					TPHg	4,700		
					Benzene	350		
					MTBE	ND		
291	Country Club Cleaners	Perciva/Metro Valley Cleaners	224 Rickenbacker Circle	Livermore	3C <u>CHEMICAL</u>	8 <u>CONCENTRATION ug/L</u>	ACEH	1/16/13 - RP checked on the status of the case closure request submitted in 2010. ACEH stated that in order to review the case closure request the RP has to pay the outstanding balance on their SLIC oversight account and add to it for the additional review. ACEH had requested a check for \$6,000 in a letter dated 9/15/2011.
					PCE	4.9		
292	CW Roen	Former K&S Heavy Equipment	495 Greenville Rd.	Livermore	2A4 <u>CHEMICAL</u>	3A <u>CONCENTRATION ug/L</u>	ACEH	LPFD transferred to ACEH. Soil Contamination

Z7 ID	OWNER	SITE NAME	ADDRESS	CITY	PRIORITY	STATUS	LEAD AGENCY	NOTES
297	City of Pleasanton	Pleasanton Fire Station #3	3200 Santa Rita Road	Pleasanton	3C	8	ACEH	1/8/13 - GeoTracker has been brought up to date. ACEH is moving forward on case closure. The next step is the Landowner Notification. The completed forms are due to ACEH by 1/25/13. A Draft Notification of Case Closure has been prepared.
					CHEMICAL	CONCENTRATION ug/L		
					TPHd	780		
					TPHmo	990		
298	Chevron	Former Chevron Records Facility	6400 Sierra Ct	Dublin	1B4	5C	RWQCB	1/6/12 - Fact sheet was developed for the site. A Site Investigation Report that recommended interim SVE was approved by RWQCB. An additional technical report requested by the RWQCB showing how the Alamo Canal will be protected from potential contamination is due March 31,2012.
					CHEMICAL	CONCENTRATION ug/L		
					TCE	69		
299	TDW Construction	Nica Metals	101 Greenville Rd	Livermore	3A2	3A	ACEH	5/10/10 - Site is non-compliant. Soil removal and implementation of site assessment was due May 2010. ACEH evaluating options.
					CHEMICAL	CONCENTRATION ug/L		
					GRO	unknown		
300	Atlantic Richfield Company	ARCO #0498	286 South Livermore Ave	Livermore	2A4	5C	ACEH	1/15/13 - ACEH approved the revised Soil and Groundwater Investigation Work Plan. The RP has been unsuccessful in gaining access to the adjacent property so ACEH agreed to locate the soil borings on the northwestern property line. Eight soil CPT borings will be advanced to 60 feet bgs. Soil and groundwater samples will be collected. The report is due April 30, 2013.
					CHEMICAL	CONCENTRATION ug/L		
					TPHg	3,000		
					BENZ	440		
					MTBE	46		

Z7 ID	OWNER	SITE NAME	ADDRESS	CITY	PRIORITY	STATUS	LEAD AGENCY	NOTES
302	Federal Corrections Institution Dublin	FCI Dublin	5701 8th St	Dublin	<u>3A1</u> CHEMICAL	<u>3B</u> CONCENTRATION ug/L	ACEH	5/20/10 - ACEH responded to the Site Investigation Report. Further investigation is needed to determine groundwater gradient and extent of contamination. Quarterly monitoring is required. Soil and Water Investigation Work Plan due 7/19/10.
					TPHd	680,000		
304	Denis Brown	Shell #16-5112	4895 Hacienda Drive	Dublin	<u>3A3</u> CHEMICAL	<u>3B</u> CONCENTRATION ug/L	ACEH	6/20/11 - ACEH approved the work plan addendum. Site Investigation Report due December 19, 2011.
					TPHg	150		
					MTBE	210		
306	City of Dublin	City of Dublin Civic Center	100 Civic Plaza	Dublin	<u>2A4</u> CHEMICAL	<u>1</u> CONCENTRATION ug/L	ACEH	1/16/13 - ACEH sent letter on 7/27/09 stating the SWRCB is reducing quarterly monitoring to semi-annual. No evidence of any monitoring taking place at this time.
					TPHg	300		
307	City of Pleasanton Public Works	City of Pleasanton Theater Parking Lot	0 Kottinger Drive	Pleasanton	<u>3B1</u> CHEMICAL	<u>5C</u> CONCENTRATION ug/L	ACEH	1/16/13 - Soil only case. Supplementary investigation was conducted in 7/2009. Site was hydroseeded on 10/15/2010.
					TPHg			
					TPHmo			

ATTACHMENT A

ZONE 7's PRIORITY RANKING SYSTEM

Priority 1 — High Priority Sites

A. Current Drinking Water Source — Impacted or Likely Impacted Through Future Migration

1. Currently used municipal or domestic well impacted (i.e., drinking water wells where MCLs are exceeded)
2. Currently used municipal or domestic well threatened (e.g., release site within 2000 ft of currently used well and/or possible vertical conduit exists to deep zone if deep zone currently used as drinking water source for the threatened well.
3. Currently used identified regional “sole source aquifer” impacted (i.e., MCLs exceeded at any aquifer point)
4. Other currently used municipal or domestic aquifer impacted
5. Currently used aquifer threatened by future migration (i.e., lateral pollutant transport or vertical movement through conduit)

B. Known Health/Safety/Environmental Impacts Requiring Prompt Action

1. Vapors at explosive levels in confined space (i.e., sewers or basements)
2. Vapors detected above human health safe levels at/near human receptors
3. Free product in soil/groundwater
4. SW/Aquatic/Environment impacted (sheen or habitat covered)
5. Soil quality levels exceed human health safe levels and exposure likely given existing site conditions

C. Administrative or Enforcement Need Requires Prompt Action

1. 2004 Funding available through “letter of commitment”
2. Enforcement action follow-up is necessary
3. Closure request received from RP
4. Public/RP/Political concerns require expeditious efforts

Priority 2 — Moderate Priority Sites

A. Water Resource Other than Currently Used Drinking Water Is or May Be Impacted

1. Existing beneficial use (other than municipal or domestic drinking water) impacted (e.g., agriculture, cooling water)
2. Potential or Known source of drinking water (defined by SWRCB Policy 88-63) significantly impacted with high probability of future use determined

3. Existing beneficial use threatened (requires pollutant migration study and re-prioritize)
 4. Soil contamination currently exists (requires additional investigation of GW/SW and/or soil to review threat and re-prioritize)
- B. Other Health/Safety/Environmental Impacts Exists or Is Unknown (Requires Additional Investigation (GW/SW), and/or Health or Ecological Risk Assessment)
1. Potential vapors at explosive levels in confined space
 2. Potential vapors above human health safe levels with receptors
 3. Potential free product at site
 4. Potential for migration to aquatic habitats or surface water
 5. Potential human exposure to soil above safe level

Priority 3 — Low Priority Sites

- A. Minor or No Potential Water Resource Impact Exists
1. No designated beneficial uses of the water which is impacted
 2. Potential or Known source of drinking water (defined by SWRCB Policy 88-63) with limited or minor impacts
 3. Potential or Known source of drinking water (defined by SWRCB Policy 88-63) impacted where low probability of future use is determined
- B. Low Potential Health/Safety/Environmental Impact Exists After Investigation and, if necessary, a Health or Ecological Risk Assessment Completed and Accepted by Lead Agency
1. Soil only cases with residual contaminated soil left in place (with or without follow-up verification monitoring)
 2. Soil only cases where full cleanup to background levels is achieved
- C. Slated for Closure

Notes:

- a. A "0" is used to represent a closed site.
- b. Zone 7 ranks sites outside the main groundwater basin as Priority 2 or Priority 3 unless a water supply well is directly impacted.

ATTACHMENT B

STATUS CODES

- 1 Leak Confirmed: A lab report received confirming a leak/spill from a tank.
- 3A Preliminary Site Assessment Workplan Submitted: A workplan and implementation schedule has been submitted to determine if the groundwater has been or will be impacted. This plan includes the installation of monitoring wells.
- 3B Preliminary Site Assessment Underway: Implementation of workplan. This phase of work involves determining if groundwater has been impacted. Work performed during this phase includes the installation of up to three monitoring wells in order to determine the specific gradient. At least one well should be placed within 10' of the suspected point of discharge in a verified downgradient location. Other work performed during this phase may include soil borings, soil gas surveys, additional excavation and interim remediation measures. The case would move to status 5 when the work exceeds that which was required for gradient definition and initial groundwater verification (usually the installation of more than three wells).
- 5C Pollution Characterization Underway: this phase of work involves the definition of the boundaries of the contaminated plume. In order to be a 5C the responsible party must be taking steps to further define that lateral and vertical extent of contamination in the soil and groundwater. This phase is characterized by the installation of additional monitoring wells and/or borings, aquifer tests, soil gas surveys, continual groundwater gradient determination and monitoring, and an assessment of all impacts on surface and groundwater.
- 5R Remediation workplan (Corrective Action Plan) Submitted: a proposal and implementation schedule evaluation long term remediation options have been submitted. The proposal should include a feasibility study, i.e., a remediation plan based on the consideration of a few options.
- 7 Remediation Underway: Implementation of the corrective action plan, i.e., actual remediation begins. Usually requires regulatory agency approval.
- 8 Post Remediation Monitoring Begun: Periodic groundwater or other monitoring at the site as necessary in order to verify and/or evaluate the effectiveness of remedial activities.
- CL Case Closure

Z7 ID	OWNER	SITE NAME	ADDRESS	CITY	PRIORITY	STATUS	LEAD AGENCY	NOTES
309	7-Eleven Inc	7-Eleven #32266	1339 Vasco Road	Livermore	2A4	5C	ACEH	1/15/13 - A monitoring well was installed and MTBE was detected at 400 ug/L. RP has recommended quarterly sampling then installation of another monitoring well based on groundwater flow directions and concentrations. ACEH agrees. A well installation work plan is due 4/30/13.
					CHEMICAL	CONCENTRATION ug/L		
					TPHg	ND		
					BENZ	ND		
					TBA	85		
					MTBE	1,900		
310	City of Dublin	Associated Gasoline City of Dublin	11759 Dublin Blvd	Dublin	2A4	1	ACEH	1/16/13 - In correspondence dated 5/9/12, ACEH told the RP that additional soil and groundwater sampling will be needed in order to close the case. An official directive letter is still pending.
					CHEMICAL	CONCENTRATION ug/L		
					TPHg			
311	Crown Chevrolet	Crown Chevrolet Cadillac Isuzu	7544 Dublin Blvd	Dublin	3A1	5R	ACEH	1/16/13 - Additional site investigation conducted in 2012. Updates were made to the SCM. RP is working on an FS/CAP that will address all outstanding data gaps and propose remediation alternatives.
					CHEMICAL	CONCENTRATION ug/L		
					TPHg	4,900		
					TPHd	6,200		
					TPHmo	64		
					PCE	160		
					TCE	9.2		
312	Cemex	Cemex Sunol	6527 Calaveras Road	Sunol	3A1	1	ACEH	12/9/11 - Case Opened 12/27/11 ACEH requesting a check for \$6,000 be submitted to cover oversight costs for the fuel spill that occurred on 9/7/10.

<i>Z7 ID</i>	<i>OWNER</i>	<i>SITE NAME</i>	<i>ADDRESS</i>	<i>CITY</i>	<i>PRIORITY</i>	<i>STATUS</i>	<i>LEAD AGENCY</i>	<i>NOTES</i>
313	Good Year Tire and Rubber Company	Just Tires	1485 First Street	Livermore	2A4	1	ACEH	10/19/12 - ACEH conditionally approved a Groundwater Investigation Work Plan that includes three grab groundwater samples to assess whether groundwater has been impacted beneath the site. Also soil samples will be collected and analyzed for TPH and PCBs. The investigation report is due 1/14/13.