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Clayton
ENVIRONMENTAL
CONSULTANTS

Volume I of II
Additional Remedial Investigation and Third Quarter 1998 Monitoring Report
At
Coliseum Way Properties
750-50th Avenue and
5050, 5051 and 5200 Coliseum Way
Oakland, California

For
Millennium Holdings Inc.

Clayton Project No. 70-97203.00.201

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1. INTRODUCTION

Millennium Holdings Inc. retained Clayton Environmental Consultants, a division of Clayton Group Services, Inc. (Clayton) to conduct an additional remedial investigation at the Coliseum Way Properties, located at 750-50th Avenue, and 5050, 5051, and 5200 Coliseum Way, Oakland, California (Figure 1), the subject property. The remedial investigation was designed to assist the California Regional Water Quality Control Board with its investigation of the subject property (RWQCB File No: 2223.09). The RWQCB issued a request for technical reports in a letter to Millennium Holdings Inc. dated February 11, 1998. The letter specified that a workplan for the additional remedial investigation address investigation methodology, background total dissolved solid (TDS) concentrations and pollution characterization, groundwater flow at 5200 Coliseum Way, estimation of future pollutant migration which could affect surface waters, and a risk assessment of the site assuming industrial or commercial use. To assist the RWQCB with its investigation of the subject property, Clayton submitted a workplan to the RWQCB entitled: *Workplan to Perform Additional Remedial Investigation and Prepare a Risk Assessment for the Coliseum Way Properties, Oakland, California*, dated March 27, 1998.

The RWQCB approved the workplan subject to five conditions outlined in a letter to Millennium Holdings Inc., dated April 14, 1998.

Clayton's investigation consisted of:

- installing six new soil borings and seven new groundwater monitoring wells,
- collecting soil and groundwater samples for laboratory analyses,
- incorporating quarterly monitoring results of the existing wells to determine groundwater gradients across the subject property,
- sampling the new and existing wells to evaluate pollutant concentrations on the subject property,
- collecting and analyzing surface water samples from adjacent tidally influenced storm channels to determine potential surface water impacts, and
- preparing a risk assessment workplan.

This report presents a description of exploratory methods, a description of subsurface geology and hydrogeology, analytical results, and conclusions.

2. BACKGROUND

The 5050 and 5200 Coliseum Way properties encompass approximately 10 acres and the 5051 Coliseum property is approximately 4.4 acres of relatively flat ground approximately 8 to 15 feet above mean sea level (amsl). The subject property is located in an industrial area of Oakland. The sites are approximately one half-mile east of San Leandro Bay. Regionally, groundwater generally flows west towards San Leandro Bay.

The Coliseum Way properties (Figure 1) are bounded to the northwest, southwest, and southeast by stormwater drainage canals and culverts that flow to the San Leandro Bay. The canals drain a watershed area that encompasses a large industrial area in the City of Oakland. These canals are tidally influenced.

The subject property has a history of industrial usage. From the middle to late 1800s to about 1928, the 5050 Coliseum Way property was used for the retorting of pyrite ores for the production of sulfuric acid. The ore reduction process resulted in the deposition of approximately 15,000 cubic yards of pyrite slag and cinders onto the 5050 and 5200 Coliseum Way properties.

A lithopone (paint pigment) manufacturing facility occupied the properties at 750-50th Avenue and 5050 Coliseum Way from approximately 1926 to 1963. Lithopone consists of a chemically co-precipitated pigment of barium sulfate and zinc sulfide used in the production of paint pigment. Various metals were added to the lithopone to give it pigment. Processing residuals from lithopone production included various forms of insoluble sulfate residuals including barium sulfate and zinc sulfate. These residuals were deposited as both dry filter cake and slurry deposits on portions of the 5051 and 5200 Coliseum Way properties.

The presence of the sulfide rich slag and cinders has given rise to a localized condition of low pH shallow groundwater on the 5050 Coliseum Way property. The acidic groundwater has solublized a suite of acid soluble metals, primarily zinc, with associated metals of cadmium and barium. On the 5200 property, the primary metal constituents are arsenic and barium. The pH conditions of groundwater on this site are neutral to basic.

Millennium Holdings Inc. is the owner of 750-50th Avenue, and 5050 and 5051 Coliseum Way properties. Millennium Holdings Inc. has undertaken the responsibility for the investigation and remediation of these properties and the 5200 Coliseum Way property.

The 5050 Coliseum Way property, referred to as the Volvo-GM site, is an environmental site under the jurisdiction of the Alameda County Environmental Health Services (ACEHS). Buildings associated with a former Volvo-GM truck maintenance facility are located at 750 50th Avenue. A mini-storage facility currently occupies the 5200 Coliseum Way property. The data from various former site investigations has been incorporated into this remedial investigation.

The 5051 Coliseum Way site was also part of the former lithopone manufacturing operation. The site is currently divided into a north area and south area by a cyclone fence. The area north of the fence is unpaved and previously was used by PG&E for temporary storage of construction materials. Two electrical transmission towers are located on this north area. The area south of the fence is paved and used for weekend parking. PG&E Substation J is located across the drainage channel northwest from the 5051 Coliseum Way site. Southeast of the 5051 Coliseum Way site is a lot owned by the East Bay Municipal Utility District (EBMUD) and contains an EBMUD sewer pump station.

The tidally influenced stormwater drainage channels bordering the subject property (Figure 1) include an open and unlined channel that parallels the southeast property boundary of the 5051 and 5200 Coliseum Way sites. Two subsurface culverts, the Courtland Creek Culvert and the Second Line G Culvert, parallel the northwest property boundaries of the 5050 Coliseum Way property and the 750 50th Avenue property. The two culverts merge into an open concrete-lined channel south of the intersection of Coliseum Way and 50th Avenue. The drainage channel is open and concrete-lined along the northwestern perimeter of the 5051 Coliseum Way site, and is open and unlined along the southwestern perimeter of the property, prior to flowing under Interstate 880.

3. SCOPE OF WORK

The scope of work performed for this investigation included:

- Prefield Activities
- Soil Borings
- Monitoring Well Installations
- Soil and Groundwater Sampling
- Groundwater Flow Gradients
- Laboratory Analysis of Samples
- Analytical Results
- Report Preparation
- Draft Risk Assessment Workplan

Each of these activities is described in the following sections of this report.

3.1. PREFIELD ACTIVITIES

Millennium Holdings Inc. obtained title to the 5051 Coliseum Way property on April 21, 1998, and provided Clayton access to the property to conduct the investigation at that time. Clayton's workplan assumed that the proposed sample locations selected along 50th Avenue (proposed wells CW-11, CW-12, and CW-13 and soil borings CSB-2 and CSB-3) required drilling on public property. Therefore, Clayton initiated an encroachment permit application with the City of Oakland. On June 5, 1998, Clayton also contacted the Alameda County Public Works Agency (ACPWA) to obtain an encroachment permit to install four wells on ACPWA property adjacent to stormwater channels.

The ACPWA did not issue the encroachment permit until September 15, 1998 to install the four monitoring wells and one soil boring on two properties that belong to the ACPWA. The two ACPWA properties include the access road adjacent to and southeast of the 5200 Coliseum Way property that parallels the drainage ditch (ACPWA East property), and a narrow parcel adjacent to the open stormwater drainage channel and sediment basin just south of the intersection of Coliseum Way and 50th Avenue (ACPWA West property).

Prior to the start of field activities, Clayton provided Underground Service Alert (USA) with 48-hours notice to identify underground utilities in the proposed drilling areas, as

required by law. USA issued utility clearance ticket number 0249717 on September 16, 1998. In addition, Clayton retained the services of Norcal Underground Locating of San Jose, California, a utility locating service, to provide onsite utility clearance of proposed boring locations. No borings were located within three feet of a detectable underground utility, with the exception of the borings located near or adjacent to subsurface concrete box channels along 50th Avenue and the open channel concrete lined storm channel south of Coliseum Way and 50th Avenue.

Clayton met with PG&E field representatives on September 17 and 18, 1998 to clear drilling locations at the intersection of 50th Avenue and Coliseum Way. Due to the complexity of and concern for life and safety issues pertaining to the subsurface utilities in this area, Clayton abandoned the proposed locations for wells CW-11, CW-12, and CSB-3. Clayton repositioned the proposed drilling locations for CW-12 and CSB-2, and renumbered the soil borings along the northwest property boundary of 5050 Coliseum Way (CSB-3 through CSB-6; boring CSB-7 was eliminated). Refer to Figure 1 for the final sample locations.

A site-specific health and safety plan was prepared for the scope of work performed during this investigation, in accordance with the requirements of the State of California General Industry Safety Order (GISO) 5192 and Title 29 of the Code of Federal Regulations, Section 1910.120 (29 CFR 1910.120). A copy of the health and safety plan was kept onsite during field activities.

Clayton coordinated drilling subcontractors, a land surveyor, and the laboratory services to complete the investigation. Prior to the installation of groundwater monitoring wells at the site, Clayton obtained well construction permits from the Alameda County Public Works Agency (ACPWA). The well construction permits and encroachment permit are included as Appendix A.

3.2. INVESTIGATION METHODOLOGIES

The field investigation was performed in three phases. The initial phase of the investigation involved the installation of eight soil borings (CSB-1 through CSB-6, CSB-8 and CSB-9) and seven additional groundwater monitoring wells (CW-6 through CW-10, CW-12 and CW-13) to collect soil and groundwater samples around the perimeter of the subject property. Two soil borings (CSB-8 and CSB-9) were advanced using CPT equipment to advance deep borings, to a total maximum depth of 60 feet below the ground surface (bgs). The sampling activities were conducted according to Clayton's Drilling, Well Construction, and Sampling Protocols for Borehole/Monitoring Well Installations presented in Appendix B.

The second phase of the RI included incorporating the new groundwater monitoring well data with the historic groundwater monitoring data as part of the quarterly monitoring program. This data is presented as the third quarter 1998 monitoring report for the subject property.

The third phase of the RI included the collection of surface water samples during two low tide events from various locations in the stormwater drainage channels that surround a major portion of the subject property to evaluate the potential for migration of pollutants offsite. One mid-flood tide water sample was collected in the stormwater channel just west of 5051 Coliseum Way. Six groundwater monitoring wells (CW-6, CW -7, CW -10, CW -12, CW -13, and LF-12) immediately adjacent to the stormwater channels were monitored throughout one maximum tidal sequence and sampled at low and high tide to evaluate the effect that tidal fluctuations have on the migration of pollutants offsite.

Following is the rationale for placement of the soil borings and monitoring wells for this RI:

ACPWA East Property

- Monitoring wells CW-6 and CW-7 were installed on the ACPWA East property adjacent to the unlined stormwater drainage ditch to evaluate the groundwater flow gradient and groundwater quality on the southeast side of the 5200 Coliseum Way property.

EBMUD Property

- Monitoring wells CW-8 and CW-9 were installed adjacent to the drainage ditch that parallels the EBMUD property to evaluate the groundwater gradient and groundwater quality in this area of the subject property.

5051 Coliseum Way

- Two soil borings were installed on this property. Boring CSB-2 was drilled adjacent to the edge of the concrete lined open stormwater drainage channel. The boring was slant drilled in an attempt to penetrate the backfill material adjacent to the concrete channel wall to evaluate groundwater quality behind the wall. Due to placement of large rocks and concrete debris as landfill material or riprap material along the former channel bank, despite multiple attempts, the boring could not penetrate the backfill materials and no groundwater sample was collected.

  Boring CSB-9 was advanced using CPT equipment to a total depth of 60.5 feet bgs in a location slightly west of a former waste disposal area. The CPT equipment was used to test potentially high-pore pressure lithologic zones to aid in collecting discrete groundwater samples at depth. The groundwater samples were to evaluate groundwater quality below the impacted areas of the subject property. Soil samples were also collected at 5-foot intervals from this boring to the total depth of 60.5 feet bgs.

ACPWA West Property

- Monitoring wells CW-10 and CW-12 were placed adjacent to the stormwater concrete channel walls to evaluate the groundwater quality in the backfill material. CW-10 was placed adjacent to the mouth of the Second Line G culvert and CW-12

was placed adjacent to the mouth of the Courtland Creek culvert mouth. Soil and groundwater were analyzed to determine if pollutants from the subject property were potentially migrating behind the concrete culvert walls and eventually entering the surface water downgradient of the subject property. Soil boring CSB-1 was advanced in this same general area for the same purpose.

5050 Coliseum Way

- Well CW-13 was placed between the Second Line G and the Courtland Creek culverts in backfill material along the west property boundary of the 5051 Coliseum Way property to evaluate groundwater quality in backfill materials along the subsurface culverts.

  Soil borings CSB-3 through CSB-6 were drilled along the south edge of the Second Line G culvert where it nearly parallels the northwest boundary of the 5050 Coliseum Way property. Soil and groundwater samples were collected along the culvert to evaluate the soil and groundwater quality in the backfill materials used along the subsurface culvert.

  Boring CSB-8 was advanced using CPT equipment to a total depth of 60.5 feet deep in an area believed to be slightly removed from the former acid manufacturing area and slag disposal area which are located near the center of this property. Groundwater concentrations of cadmium and zinc have typically been highest between wells LF-11 and LF-12. The groundwater pH at wells LF-11 and LF-12 has historically ranged between 3.3 and 4.9 standard units (SU), whereas, groundwater in well LF-5, adjacent to the CSB-8 boring location, typically has a pH greater than 6 and metals in groundwater are less concentrated. Discrete groundwater samples were collected in boring CSB-8 to evaluate groundwater quality below the known polluted areas of the subject property in the same manner as CSB-9. Soil samples were also collected at 5-foot intervals from this boring area to the total depth of 60.5 feet bgs.

3.2.1. Soil Borings

3.2.1.1. CPT

Due to the variety of sampling objectives, access limitations and the time it took to obtain encroachment permits, Clayton advanced the soil borings during multiple mobilizations. Clayton retained and supervised Gregg Drilling and Testing, Inc., of Martinez, California, to advance CPT borings at locations CSB-8 and CSB-9 on July 14, 1998. Mr. Mark Mullaney, Project Geologist, and Mr. Donald Ashton, Senior Geologist of Clayton's San Francisco regional office, supervised the boring activities, logged soil borings, collected groundwater samples, and recorded field observations onto sample log sheets.

The CPT equipment hydraulically pushed an approximately 2-inch diameter stainless steel rod into the ground. The initial probe was used to profile the soils as the probe was advanced to the desired depth of 60 feet bgs. The probe contains a pressure transducer at the cone tip to measure direct resistance and in the sidewall to measure friction. Soils are

profiled by the ratio of cone resistance and friction. A computer program analyzes the soil pressure characteristics as the probe is advanced downward and logs the soils into 12 soil behavior types. A soil log was produced for each boring and they are presented in Appendix C. At intervals where suspect permeable soils were encountered, the probe was stopped, and a soil-pore pressure dissipation test was run to evaluate the saturation potential at that depth. Soil-pore pressure dissipation records were also run in CSB-8 at 43.96 feet bgs, and in CSB-9 at 36.25 feet and 47.57 feet bgs (see Appendix C). The records indicated a significant pore pressure of between 12 and 17 pounds per square inch in each test, suggesting recoverable groundwater. These lithologic zones were selected for subsequent discrete groundwater sampling. The probe was again advanced to the desired depth after each dissipation record was completed.

The probe was extracted from the boring and the boring was sealed with a five- percent bentonite and cement grout. A new boring location was selected within a few feet of the first boring and a Hydropunch attachment was advanced to the desired lithologic depth. The Hydropunch probe was retracted at the desired depth exposing a slotted plastic screen that allowed groundwater to flow into the hollow probe. The groundwater sample was retrieved using a 5/8-inch diameter stainless steel bailer. Groundwater samples were decanted into laboratory prepared sample containers, sealed, labeled, and placed into chilled coolers containing ice. A chain-of-custody document was completed and accompanied the samples to the laboratory.

On July 29, 1998, Gregg Drilling re-mobilized to the subject property to collect soil samples in boring locations CSB-8 and CSB-9 at 5-foot intervals down to the desired 60 feet bgs. The soil samples were collected with a Gouda type soil sampler attached to the end of the CPT probe. The sampler is a hollow sampler containing a thin metal liner (1-1/8 inch in diameter) that has an inner cone tip. The sampler was advanced to the desired depth, the cone tip was retracted, and the sampler was advanced one foot to collect the soil sample. The probe was retracted and the discrete sample and liner were removed from the sampler. The relatively undisturbed sample was then sealed with Teflon tape, plastic end caps, labeled, and placed into a chilled cooler containing ice. The sample was logged on a chain-of-custody document, as were all samples submitted to the laboratory.

All downhole sampling equipment was either steam cleaned or washed in a solution of Alconox detergent and double rinsed with tap water after each use to prevent possible cross contamination.

3.2.1.2. Hollow-Stem Auger Drilling

Clayton retained and supervised Exploration Geoservices, Inc., of San Jose, California, to install three monitoring wells (CW-8, CW-9, and CW-13) and one soil boring (CSB-3) on July 23, 1998. Mr. Mark Mullaney, Project Geologist for Clayton's San Francisco regional office, supervised drilling and soil sampling activities, logged soil borings, provided well construction details, and recorded field observations onto exploratory borings log sheets. Boring logs are included in Appendix C.

A truck-mounted drill rig equipped with 8-inch diameter hollow stem augers was used to drill boreholes for the monitoring well installations and the one soil boring. Borings CW-8 and CW-9 were drilled to a total depth of 20 feet bgs, CW-13 was drilled to 12 feet bgs, and CSB-3 was drilled to 10 feet bgs. A California modified split spoon sampler lined with three 2-inch diameter, 6-inch long brass sleeves was used to collect soil samples from boreholes.

On September 21, 1998, Clayton retained and supervised Gregg Drilling and Testing, Inc., of Martinez, California, to install four monitoring wells (CW-6, CW-7, CW-10, and CW-12) and one soil boring (CSB-1) after obtaining the encroachment permit to drill on the ACPWA properties. Mr. Donald Ashton, Senior Geologist for Clayton's San Francisco regional office, supervised drilling and soil sampling activities, logged soil borings, provided well construction details, and recorded field observations onto exploratory borings log sheets.

A track-mounted drill rig equipped with 8-inch diameter hollow stem augers was used to drill boreholes for the monitoring well installations and the one soil boring. Borings CSB-1, CW-6, CW-10, and CW-12 were drilled to a total depth of 15 feet bgs, and CW-7 was drilled to 18 feet bgs. Soil samples were collected and field methods were conducted in the same manner as before.

Soil cores were logged for lithological content by the Unified Soil Classification System (USCS), color using a Munsell color chart, relative moisture content, competency, blow counts, and other observable distinguishing characteristics (for example, rootlets or odor). Field observations were entered onto exploratory boring log sheets.

All hollow stem auger drill stems and downhole sampling equipment were either steam cleaned or washed in a solution of Alconox detergent and double rinsed with tap water after each use. The soil cuttings and decontamination water was containerized in separate USDOT approved 55-gallon drums. The drums were sealed, labeled with content information and generation date, and stored onsite pending future disposal.

3.2.1.3. Geoprobe

Clayton retained and supervised Environmental Control Associates, Inc. of Aptos, California, to advance Geoprobe soil borings and construct temporary well points. Mr. Mark Mullaney, Staff Geologist of Clayton's San Francisco regional office supervised drilling activities, logged soil borings, collected samples, and recorded field observations onto exploratory boring log sheets. Geoprobe field activities were performed on July 24, 1998.

The Geoprobe was used to advance four soil borings, CSB-2 and CSB-4 through CSB-6. The probe was advanced adjacent to the Second Line G culvert (borings CSB –4 through CSB-6 to a maximum depth of 10 feet bgs. Soil samples were collected by hydraulically pushing a 4-foot long, 2-inch diameter Macrocore sampler containing an acetate liner into the ground. Upon retrieving the sampler, an approximate 6-inch section was cut from the 4-foot acetate liner and retained as a soil sample. The retained sample liner section was

cut at a position corresponding to the desired sample depth interval. The sample liner was sealed with Teflon tape and plastic end caps, labeled with identifying information, and stored in a chilled ice-chest for transportation to the laboratory.

Soil boring CSB-2 was drilled adjacent to the open stormwater drainage channel in an attempt to sample groundwater in the backfill material behind the wall. Due to concrete and rock debris in the subsurface, after numerous attempts to probe into the backfill, the boring was abandoned.

Soil cores were logged for lithology by the Unified Soil Classification System (USCS), color referencing a Munsell color chart, moisture content, competency, and other observable distinguishing characteristics (for example: debris, rootlets, or odor). Field observations were entered onto soil boring log sheets (Appendix B).

The temporary well points were constructed in each borehole with a 5-foot length of one-inch outer diameter (o.d.) 0.010-inch slotted PVC screen and an appropriate length of one-inch o.d. blank PVC casing. The bottom of the screen section was capped with a disposable well cap, and the temporary well point was inserted into the borehole.

After allowing the groundwater to equalize for several minutes, the depth to groundwater was measured. The temporary well point was then sampled using a new disposable PVC bailer to retrieve a grab groundwater sample. The groundwater samples were collected in appropriate laboratory supplied containers, sealed, labeled with identifying information, and stored in a chilled ice chest for transportation to the laboratory. The grab-groundwater samples were not filtered for solids in the field, nor were the temporary well points purged of water prior to sample collection.

All soil and grab groundwater samples were recorded onto a chain-of-custody document, and delivered to Clayton Laboratories in Pleasanton, California. Upon completion of sampling activities all boreholes were backfilled with a neat cement grout containing 5-percent bentonite. A tremmie pipe was used to ensure backfill was complete throughout each borehole.

All Geoprobe push rods and downhole sampling equipment were steam cleaned or cleaned in a solution of non-phosphate detergent and double rinsed with tap water after each use. The soil cuttings were containerized in United States Department of Transport (USDOT) approved drums. The drums were sealed, labeled with content information and generation date, and stored onsite pending future disposal.

3.2.2. Monitoring Well Installations

Groundwater monitoring wells CW-6 through CW-10, CW-12, and CW-13 were constructed within eight-inch diameter boreholes. The well screen, constructed with two-inch diameter schedule 40 PVC casing perforated with 0.010-inch slots and fitted with a PVC end cap, was placed at the bottom of each borehole. Monitoring wells CW-6, CW-10, and CW-12 were screened between 5.5 to 14.5 feet bgs; CW-8 and CW-9 were screened between 10.5 and 19.5 feet bgs; and CW-7 was screened between 8.5 and 17.5

feet bgs. The well screens were flush threaded with two-inch diameter schedule 40 PVC blank pipe to complete the well casing to surface.

The well screen filter pack was constructed by pouring Lonestar number 2/16 graded sand into the annular space filling the space from the bottom of the borehole to one to two feet above the top of the well screen casing. A one- to two-foot interval of 3/8-inch bentonite pellets was placed in the annular space above the top of the sand filter pack. The bentonite was hydrated and allowed to swell. The remaining annular space to approximately one-foot below ground surface was filled with a neat cement grout containing approximately five- percent bentonite powder. A traffic rated well box was placed around the top of each well casing and secured in place with concrete. A lockable expanding well cap was used to provide a water tight seal on each well head. Geological logs and well construction details for monitoring wells are provided in Appendix C.

3.2.2.1. Monitoring Well Development and Surveying

The newly installed monitoring wells were allowed to set for at least three days prior to well development to let the annular space grout seals cure. Mr. Donald Ashton, Senior Geologist of Clayton's San Francisco regional office performed well development activities on September 11 and 25, 1998. Well development was performed to remove sediment that had accumulated in the well casing and filter pack sand during well construction, and also to help stabilize the filter pack sand and aquifer material surrounding the well screen intake area.

The depths to groundwater and total length of the monitoring well casing were measured to determine the quantity of water within each well casing. A two-inch surge block was used to agitate water and well construction materials prior to and during well purging. Groundwater was purged using a new disposal PVC bailer until water quality parameters (pH, temperature, electrical conductivity, and turbidity) had stabilized. Between 5.9 and 20.4 well casing volumes of water were purged from monitoring wells during development and stored onsite in sealed, labeled, USDOT approved 55-gallon drums pending future disposal. Groundwater parameters were recorded onto well development data sheets that are presented in Appendix D.

Robert Bien and William Frost Associates, of Walnut Creek, California surveyed the location and elevation of the newly installed monitoring wells on October 12, 1998. The top of well casing elevation for each monitoring well is presented in Table 1 (Groundwater Elevation Data). The well elevation survey report is presented as Appendix E.

3.2.3. Quarterly Monitoring and Sampling of Wells

Clayton conducted the third quarter 1998 monitoring and sampling event of the subject property wells as part of the ongoing monitoring program for the subject property. Clayton conducted monitoring of 40 wells on September 30, 1998. The 40 monitoring wells sampled included CW-1 through CW-10, CW-12 and CW-13; LF-1 through LF-8, LF-10 through LF-17, LFMW-1 through LFMW-4, MWA-1, MWA-2, MWA-3, and

MW-4 through MW-8. Groundwater sampling of the previously existing wells was conducted on September 9, 10, and 11, 1998. The newly installed wells, CSB 6, CSB-7, CSB-10, and CSB-12 were sampled on September 29, 1998. Monitoring well sampling was conducted according to Clayton's sampling procedures presented in Appendix B. The quarterly analytical program is presented in Table 2 and the Monitoring Well Development Logs and Monitoring Well Data Sheets are presented in Appendix D.

Clayton measured the depth to water in each monitoring well, purged monitoring wells, and collected groundwater samples. Approximately four well casing volumes of water were purged from each monitoring well prior to sampling. A new disposable PVC bailer was used to purge ground water from each monitoring well. Water quality parameters (pH, electrical conductivity, temperature and visual turbidity) were recorded onto field data sheets prior to purging and after purging each well casing volume of water. Upon purging sufficient water from the monitoring wells, groundwater was pumped into laboratory supplied sample containers. Sample containers were sealed, labeled with identifying information, logged onto the chain-of custody, and temporarily stored in a chilled ice-chest awaiting transportation to the laboratory for analysis. Groundwater purged from monitoring wells during development and sampling was stored onsite in sealed, labeled; USDOT approved 55-gallon drums pending future disposal.

Monitoring well sampling was conducted according to Clayton's protocol and recorded on groundwater sampling data sheets as presented in Appendix F. Clayton's quarterly analytical program is presented I Table 2. Groundwater monitoring measurements were conducted on September 30, 1998 and recorded onto monitoring well data sheets that are presented in Appendix G.

3.2.4. Tidal Influence on Monitoring of Wells

After reviewing the third quarter monitoring results, Clayton conducted additional monitoring and sampling of six monitoring wells during one near maximum diurnal tidal flow sequence on October 8, 1998. Predicted tides during the monitoring period ranged from a high flow of 6.4 feet (mean lower low water [mllw]) to a low flow of –0.5 feet mllw. The time of high and low tide appeared to lag from one to one and one-half hours later than the predicted tidal flow at the Golden Gate Bridge. The six wells monitored (CW -6, CW -7, CW -10, CW -12, CW-13, and LF-12) are located immediately adjacent to stormwater drainage channels. Wells CW-10, CW-12, and CW-13 are within two feet or less of the concrete channel walls and the backfill material encountered during the installation of these wells appeared to be very permeable. Clayton sampled these wells to evaluate whether or not the groundwater in these wells is hydraulically connected to the tidally influenced surface water channels. The tide varied by 5.6 feet during the monitoring period resulting in surface water levels of approximately 3.1 feet higher than the groundwater in well CW-10 during high tide and approximately 2.5 feet below the groundwater in CW-10 during low tide. Groundwater levels in wells CW-10, CW-12, CW-13, and LF-12 were observed to vary between 0.06 and 0.24 feet between high and low tides. No measurable groundwater variation was detected in wells CW-6 or CW-7 during this monitoring event. This minimal variation suggests very minor tidal influence in these wells and indicates that tidal "flushing" is not occurring in the channel backfill.

The six groundwater well samples from low and high tide and the low tide surface water samples were analyzed for total metals (arsenic, barium, cadmium, and zinc), chlorides, TDS and pH by Clayton's Pleasanton laboratory. Field monitoring of the groundwater quality in the sampled wells included pH, temperature, and conductivity prior to sample collection. Monitoring Well Data Sheets are presented in Appendix G. The analytical results are presented in Figure 12 and in Table 3.

3.2.5. Surface Water Sampling

On October 8, 1998, Mr. David Watts and Joe Rajan of Clayton collected surface water samples from four locations (1W-L through 4W-L) at low tide in the stormwater drainage channels. The samples were collected to determine if the metals (primarily cadmium and zinc) found in groundwater in wells LF-12 and CW-13 were flowing offsite and significantly impacting the surface waters. Sample locations are shown on Figure 12. The surface water samples were collected when the channels were not tidally influenced and the water flow was minimal, considered basal flow. The source of the basal flow in the Second Line G culvert contains any upgradient industrial flow and any subject property groundwater flowing offsite along the northwest boundary of the 5050 Coliseum Way property. The Second Line G culvert drains a large industrial area of Oakland. Since the culvert is covered, flow from upgradient sources could not be observed.

Clayton again sampled surface waters in the stormwater drainage channels in eight different locations on October 13, 1998. The sample locations (1SW through 8SW) were collected to evaluate basal flow metal concentrations at low tide (a flow of 2.7 feet msl) from the Peralta Creek culvert (Sample 1SW), Courtland Creek culvert (Sample 2SW), Second Line G culvert (Sample 3SW), and two locations in the open concrete channel and in the unlined channel areas (Sample 4SW through 7SW). Samples 1SW and 2SW were basal flow conditions. The water observed to flow from these culverts was estimated at about 0.06 feet deep by 3 feet wide moving at about 3 feet per minute. Samples 3SW through 7SW were collected in water that was tidally influenced. Water depths in the channels where the samples (3SW through 7SW) were collected was about one foot deep or greater; however, water flow at the time of sampling did not indicate any significant flooding of the channels. Sample 8SW was collected about three hours after low tide, in an area where incoming bay water was entering the channel area next to the subject property. The incoming tide had raised the surface water level approximately 2 feet at the time the sample was collected and bay water was distinctively flooding the channels.

4. SITE CHARACTERIZATION

The site investigation involved logging soil types, measuring the depth of groundwater beneath the site, and collecting soil and groundwater samples for chemical analysis to evaluate the degree of environmental impacts at the property. The following discussion summarizes the site geology, hydrogeology, and analytical results.

4.1. GEOLOGY

The subject property is located in the East Bay Plain Physiographic Region of the San Francisco Bay Region. The general area is characterized by the asymmetrical San Francisco Bay depression within the California Coast Ranges geomorphic province. The northwest trending basin was formed from an eastward tilted fault block. Northwest trending faulting and compressional folding generally parallels this fault block. The Hayward Fault, about 2 miles to the northeast of the subject property, formed a steep westward-facing scarp along the western slopes of the Oakland Hills, part of the Diablo Ranges east of the 580 freeway.

Culverted, concrete lined, and open-unlined drainage canals drain the subject property and Oakland Uplands area to the northeast of the subject property. The canals have been realigned, but generally follow remnant channels of former creeks that once flowed near and through the subject property. Fill materials have been identified from 11 to 14 feet thick during soil boring investigations (see Figure 3 and CW-7 boring log). The canal flows to the San Leandro Bay about 1,000 feet to the southwest.

Elevations at and around the subject property range from about 8 to 15 feet above mean sea level (amsl) based on surveyed well elevations and the Oakland East Quadrangle map (USGS, 1959 photorevised 1980). There is a gentle regional slope to the southwest at about 0.003 feet per foot.

The main soil types at the subject property have been mapped as Quaternary Bay muds and interfluvial basin deposits. The Bay muds consist of unconsolidated dark plastic clay and silty clay rich in organic material. These sands are believed to be remnant stream channel deposits in the marshland environment. Interfluvial deposits are generally less than 10 feet thick and consist of unconsolidated silts and clays. Thin beds of sands and gravels (1 to 4 feet thick) have been found interbedded in the bay muds at the subject property (see boring logs CSB-8 and CSB-9). These sandy deposits yielded small quantities of groundwater, but were readily depleted when purged. The regional groundwater gradient is mapped to the southwest, approximately paralleling the topographic gradient. (Source: Geohydrology and Groundwater Quality Overview, East Bay Plain Area, Alameda County, California, 205(J) Report, Alameda County flood Control and Waster Conservation District, June 1988).

Building foundations, asphalt, and a silty gravel base rock (imported cap material) cover the surface of the subject property. Soils have been sampled in detail to depths of about 60 feet bgs and geologic cross sections have been prepared by other consultants and modified by Clayton (Figures 3 and 4). The upper 3 to 7 feet bgs is predominantly a clayey to silty sand with gravel fill material that was placed to cap the remaining waste materials that exist on the subject property. Below the cap fill material is a layer of slag waste material the covers much of the central part of the 5050 Coliseum Way property, much of the 5200 Coliseum Way property, and most of the northern part of the 5051 Coliseum Way property. Sediments below the waste slag materials are "Bay Mud" deposits that consist of silty clay, clayey sand, silt, and thin bedded sands from about 5 to 10 feet bgs to the total depth of 60.5 feet bgs, the total depth investigated. CPT records

from borings CSB-8 and CSB-9 indicated sandy beds at four depth ranges. Sandy zones identified in CSB-8 were between 11 and 20 feet bgs, the second was at about 25 feet bgs, the third was about 44 to 46 feet bgs, and the fourth was at about 52 feet bgs. Sandy zones in CSB-9 were between the surface and about 11 feet bgs (probable fill material), 24 to 26 feet bgs, 35 to 39 feet bgs, and 46 to 48 feet bgs (see boring logs CSB-8 and CSB-9, Appendix B). Based on the soil-pore pressure dissipation test records, Clayton collected five discrete groundwater samples from the two CPT borings.

During the drilling of borings CW-10 and CSB-1, Clayton noted creosote odors and wood fragments between 8 and 12.5 feet bgs that were apparently from a former stormwater drainage channel bulkhead. Drill cuttings from boring CW-7 also contained wood fragments, but no creosote. Black silty sand drill cuttings that came to the surface from between about 6 and 14 feet bgs were assumed to be the waste slag material from the former lithopone operation. Clayton was unable to collect any soil samples through this zone because the consistency of the material was a wet loose slurry.

4.2. HYDROGEOLOGY

Regional groundwater in southern Oakland is derived from the San Leandro alluvial cone and possibly the Oakland Upland and Alluvial Plain. The upper 400 feet of the San Leandro alluvial cone consists of discontinuous beds of sand and gravels which extend westward under San Francisco Bay and are capped by confining clay layers. Groundwater in this area has been reported to be suitable in quality for most uses but consumption has been primarily used for industrial purposes. Shallow aquifers of limited extent located throughout the East Bay Plain are often perched, discontinuous, and unconfined. The subject property currently contains 40 groundwater-monitoring wells. Groundwater flow is regionally to the northwest, but varies locally (see Figure 5).

Groundwater elevation data was determined from the measurement of the depth to water in each monitoring well from the surveyed top of casing elevations. Clayton and other consultants have compiled groundwater data for the subject property since 1991 (see Table 1)

4.3. ANALYTICAL RESULTS

Soil, grab groundwater, groundwater and surface water samples were submitted for one or more of the following United States Environmental Protection Agency (USEPA) – approved analytical methods as follows:

- USEPA Method 8015M for Total Petroleum Hydrocarbons as Diesel and Oil (TPH-D and TPH-O)
- USEPA Method 8015M for Total Petroleum Hydrocarbons as Gasoline (TPH-G)
- USEPA Method 8020 for Aromatic Hydrocarbons (Benzene, Toluene, Ethylbenzene, and total Xylenes [BTEX]).
- USEPA Methods 6010A and 7471A for California Assessment Manual for Metals (CAM17)

- USEPA Method 160.1 for Total Dissolved Solids (TDS)
- USEPA Method 300.0 for Chloride
- USEPA Method 150.1 for pH

Samples were analyzed by Clayton Laboratories in Pleasanton, California. Duplicate samples from two groundwater samples (CW-7W and CW-10W) were also submitted to ChromaLab, Inc. of Pleasanton, California as a quality control check. Copies of the certified laboratory data sheets for all analyses are presented in Appendix H.

4.3.1. Soil

Soil samples were selected for metals and pH analysis at 5-foot intervals down to 60 feet bgs; the total depth drilled in the CPT borings, CSB-8 and CSB-9. The data (see Table 3) indicates that the metals concentrations in soil are at background concentrations. Clayton's soil analytical results with depth for boring CSB-8 are presented on Figure 4, as part of Cross-Section B-B'. Arsenic ranged from less than 1 to 10 mg/kg, with one exception. Sample CSB-8 at 5 feet bgs contained arsenic at 53 mg/kg, a concentration below the state total threshold limit concentration (TTLC) but potentially above the soluble threshold limit concentration (STLC) for the designation of hazardous waste [CCR Title 22, Section 66261.24(a)(2)]. Chromium concentrations ranged from 22 to 100 mg/kg. Seven of 26 samples exceeded 50 mg/kg, ten times the chromium STLC concentration. However, four of the seven samples were collected at or below 25 feet bgs, indicating that these concentrations are background chromium concentrations. Cadmium ranged from less than 0.4 to 3.3 mg/kg, except for sample CSB-8 at 10 feet bgs that contained 100 mg/kg (equal to the TTLC for cadmium). Zinc ranged from 29 to 1,100 mg/kg with one sample containing 3,200 mg/kg of zinc (CSB-9 at 15 feet bgs). These metal concentrations indicate that the soluble metals found in the shallow groundwater samples are not migrating downward into the soil.

One to two soil samples were submitted for metals testing from each of the shallow soil borings drilled around the perimeter of the subject property. Sample CSB-1 at 6 feet bgs, contained elevated concentrations of various metals (arsenic, barium, copper, lead, and zinc). However, a second sample collected at a depth of 8 feet bgs contained no elevated metal concentrations above background concentrations.

Soil samples collected at a depth of 6 feet bgs in boring CW-6 and CW-7 contained elevated metal concentrations of arsenic, barium, cadmium, copper, lead, and zinc. However, a sample collected from 16 feet bgs in CW-7 contained no elevated metals. Soil pH ranged between 9.5 and 10 SU in these borings. The soil sample collected in boring CW-8 at 5 feet bgs contained elevated barium (1,400 mg/kg) and lead (120 mg/kg) concentrations. These samples were collected from areas where slurried wastes were deposited onsite in the past.

One soil sample from select borings (CSB-3 through CSB-6 and CW-8, CW-9 and CW-13) were submitted for TPH-G/D/O and BTEX analyses (see Table 3). Soil sample results for TPH-G ranged from less than 0.3 mg/kg to 0.6 mg/kg, TPH-D was less than

the detection limit, and TPH-O ranged from 12 to 490 mg/kg. These TPH concentrations do not indicate the presence of any significant releases in the areas sampled. These findings are consistent with prior data. The soil data are presented in Table 3 and in Appendix H.

4.3.2. Grab Groundwater

Grab groundwater samples were collected from each soil boring that was not developed into a monitoring well and sampled as part of the quarterly monitoring program. Deep discrete groundwater samples were collected using CPT sampling equipment. Two groundwater samples were collected from CSB-8, one at 25 feet bgs and one at 45 feet bgs. The data is presented in Figure 4, Table 5, and in Appendix H. The data indicates that the groundwater at depth is saline (TDS concentrations ranged from 25,000 to 15,000 mg/kg, and chloride range from 24,000 to 7400 mg/kg, at 25 feet bgs and 45 feet bgs, respectively). TDS and chlorides in CSB-9 had less of a range, but a similar trend. No significant metal concentrations were noted in the groundwater samples collected from either CSB-8 or CSB-9, which appear to be background metal concentrations for the saturated Bay Muds. The detected metals in groundwater (antimony, arsenic, barium, cadmium, chromium, cobalt, molybdenum, nickel, and zinc), and the high TDS and chloride concentrations (believed to be connate water trapped at the time of deposition) result in poor groundwater quality in the deeper aquifers, as indicated by groundwater sample results from CSB-8 and CSB-9.

4.3.3. Groundwater

The groundwater analytical results presented in this report are for the 1998 third quarter monitoring event. A summary of analytical results for petroleum hydrocarbons detected in groundwater is presented in Table 5.

TPH-G results ranged from below the laboratory detection limit of 0.05 milligrams per liter (mg/L) to a maximum concentration of 13.0 mg/L. The most significant concentrations were 7.8 mg/L in well CW-4 and 13.0 mg/L in well CW-5. TPH-G concentrations and isoconcentration contours are presented in Figure 6. Associated BTEX products follow a similar distribution, with benzene results ranging from below the detection limit of 0.0004 mg/L to a maximum of 0.15 mg/L. The most significant benzene concentrations were 0.11 mg/L in well CW-4 and 0.15 mg/L in well CW-5. Benzene concentrations in groundwater are presented in Figure 7.

TPH-D was only detected in well LF-13 at a concentration of 0.20 mg/L. TPH-O was detected in wells LF-11, LF-12, and LF-13 at concentrations of 0.8 mg/L, 0.2 mg/L and 0.3 mg/L, respectively.

A summary of metals, total dissolved solids (TDS), and pH results is included in Table 3. Field measurements of groundwater samples resulted in pH levels ranging from 3.3 to 10.10 SU. Maximum metal concentrations that were detected from all samples include:

METAL	CONCENTRATION	WELL	STLC mg/L
Arsenic	to 24 mg/L	(CW-3)	5
Barium	to 470 mg/L	(CW-6)	100
Beryllium	to 0.04 mg/L	(LF-11)	0.75
Cadmium	to 43 mg/L	(LF-11)	1.0
Chromium	to 0.02 mg/L	(MW-4)	5
Cobalt	to 11 mg/L	(LF-15)	80
Copper	to 13 mg/L	(LF-16)	25
Lead	to 0.84 mg/L	(MWA-1)	5
Nickel	to 31 mg/L	(LF-15)	20
Thallium	to 0.77 mg/L	(LF-15)	7
Vanadium	to 0.04 mg/L	(LF-16/MWA-2)	24
Zinc	to 17,000 mg/L	(LF-11)	250

Isoconcentration contours of arsenic, barium, cadmium, and zinc in groundwater are presented in Figures 8, 9, 10, and 11, respectively.

4.3.4. Groundwater Flow Gradients

After all monitoring wells were installed; the depth to groundwater was monitored in all wells (except LF-F1 and LF-9) as one event on September 30, 1998. Due to the potential for tidal influence on the groundwater elevation, depth to groundwater was measured in perimeter wells first and interior wells second. All wells were opened and allowed to equalize for one-half hour or more prior to measuring the depth to groundwater. Well number, time opened, time measured and water depth were recorded on a monitoring well data sheet (Appendix G). The depth of groundwater was subtracted from the surveyed top of casing elevation to determine the groundwater elevation in each well (Table 1). Groundwater elevations are shown on the Potentiometric Surface Map (Figure 5). Groundwater elevations ranged from –1.73 feet below mean sea level in well MW-4 to 6.47 feet above msl in well CW-5. The depth to groundwater in well MW-7 (-8.98 feet msl) was not used in contouring because the groundwater depth in this well has historically been much lower than the anticipated groundwater elevation trends across the subject property. (Please note that MW-7 is located adjacent to the EBMUD sewer interceptor pipeline that crosses the southern portion of the 5051 Coliseum Way property. It is possible that the sewer pipeline is influencing the groundwater gradient at this location.)

Potentiometric contours indicate that the predominant groundwater flow for these properties is toward the west and northwest. The predominant flow appears to be northwesterly at a gradient of 0.015 feet per foot as measured between wells LF-1 and

LF-5. The gradient appears to flow to the north at the north end of the 5050 Coliseum Way property. A groundwater mound appears to be located at the 5200 Coliseum Way property centered in the vicinity of well CW-5. Groundwater appears to flow radially from this mound which imparts a slight easterly and southeasterly gradient near the northeast and southeast boundaries of the 5200 Coliseum Way property.

The depth of groundwater in the vicinity of wells MWA-1 and MW-4 on the 5051 Coliseum Way property appear to be a low point on the subject property. The wells were measured approximately at the time of low tide and the depth to groundwater corresponds closely with the depth of the drainage channel when it is nearly dry. This area is adjacent to the concrete lined open stormwater drainage channel. Weep holes have been observed at the base of the concrete channel wall which may indicate that the groundwater is hydraulic connected with the tidally influenced surface water in this area.

4.3.5. Surface Water Sampling

Surface water samples were collected from the stormwater drainage channel and the perimeter drainage ditch in an attempt to identify and characterize gross impacts to surface water quality which could be directly related to surface or subsurface contaminant migration from the property. The majority of the samples, but not all, were collected during low tide conditions in order to capture the maximum impact of groundwater recharge and to minimize the dilution effects of tidal flooding by bay water. The samples were analyzed for indicator metals, which included arsenic, barium, cadmium and zinc. In an attempt to evaluate the relative metal loading of the stormwater culverts which empty into the stormwater drainage channel, additional samples were collected directly from the outlets of all three stormwater culverts located near the intersection of 50th Avenue and Coliseum Way. The results of this sampling effort are presented in Table 7.

An analysis of the surface water results shows that surface water quality in the open stormwater drainage channel and perimeter drainage ditches does contain trace concentrations of heavy metals. Metal concentrations in the open stormwater drainage channel are at or near the Basin Plan objectives and observed basal flow rates appeared to be minimal. Zinc concentrations ranged from a low of 0.03 mg/L to a high of 0.12 mg/L. Arsenic concentrations ranged from below detection limits (0.05 mg/L) to a high of 0.07 mg/L.

The samples collected from the stormwater culvert outlets showed a range of concentrations with zinc concentrations ranging from 0.03 mg/L in the Second Line G culvert to a high of 0.55 mg/L in the Courtland Creek culvert. Arsenic concentrations were at or slightly above the detection limit of 0.05 mg/L for all samples. It should be noted that the actual volume of water which was flowing from each of these culverts was very minimal during these sampling events, with actual flow volumes described as a "trickle" to a few gallons per minute from each of the three outlets.

It should also be noted that each of these storm water sewers drain a large area of industrial property in the City of Oakland. Peralta Creek culvert does not pass by the subject property, therefore, contaminants identified in this culvert originated from sources

other than the subject property. Therefore, it cannot be concluded that metals concentrations detected in these samples are related to contaminant migration from the subject property. A definitive analysis of storm sewer water quality would require multiple background samples, tide sequence samples, and access to numerous offsite sewer-sampling locations which were well beyond the scope of this investigation. This data does however suggest that the metal contribution from these storm water sewers discharging to the bay is very low in that the majority of surface water samples collected in the open drainage area of the channel are at or below the Basin Plan Objective for zinc which is set at 0.058 mg/L.

5. CONCLUSIONS

In response to the RWQCB's request, Clayton has completed a further investigation of the nature and extent of contamination associated with waste materials that exist on this property. Based on our analysis of this data, and the data that was generated during previous investigations, we have drawn the following conclusions:

- The TDS level for the shallow groundwater has been evaluated in monitoring wells across the site. Based on the data from this study, and previous studies, the TDS levels range from a low of 620 ppm to a high of 170,000 ppm. It is apparent based on TDS levels, and constituent analysis, that on site contaminants have impacted the shallow groundwater on portions of the site. Sulfate is the predominant salt found in the impacted shallow groundwater. The lowest TDS levels are found in monitoring wells in the eastern portion of the 750-50th Avenue parcel. The chloride and TDS analysis of the monitoring wells located near the tidally influenced stormwater channel are indicative of naturally occurring salt water influences.

- Deeper groundwater samples collected from depths of 25 to 47 feet confirm that the deeper groundwater is saline in nature, with TDS levels ranging from 15,000 to 35,000 ppm. Based on these concentrations, the deeper groundwater is not a beneficial drinking water source since it exceeds the 3,000 ppm standard. The chloride concentrations and chloride/TDS ratios of these samples suggest that the TDS levels are related to trapped connate water and not to migration of surficial contaminants. No deep migration of contaminants is indicated.

- The shallow groundwater gradient has remained consistent with the findings of previous quarterly monitoring events. The shallow groundwater appears to migrate on a westward gradient toward San Francisco Bay.

- Analysis of the heavy metals in monitoring wells and surface water samples does not suggest that there is significant migration of heavy metals from subject property groundwater sources to surface water receptors; therefore, the impact to the bay appears to be minimal. Surface water metal concentrations in the open stormwater drainage channel are at or below the Basin Plan Objectives for zinc and arsenic.

- The groundwater gradient in the vicinity of MW-4 on the 5051 Coliseum Way property appears to be anomalous and may be related to the presence of permeable

materials such as concrete debris and rubble which was noted in this area on historical aerial photographs. Groundwater in this area may potentially leak into the weep holes along the base of the concrete channel wall. Previous investigations have shown that this well has the greatest degree of tidal influence of all monitoring wells tested with a tide cycle fluctuation of approximately 1.0 foot (Weiss & Associates).

- Soil samples collected from deep borings CSB-8 and CSB-9 indicate that there has been no deep accumulations or deposits of metal bearing wastes. Soil samples from these borings indicate that naturally occurring concentrations are encountered in fill materials below a depth of approximately 20 feet.

- Analysis of groundwater collected from wells which have been placed within the engineered backfill of the storm water channels indicate that impacted groundwater is present beneath and along some portions of the stormwater channel along 50th Avenue (Second Line G Culvert). However, groundwater samples from wells placed in the engineered backfill at the downgradient end of the culvert suggest that contaminated groundwater is not readily migrating "down stream" in the backfill of this structure. This conclusion is further supported by the high and low tide cycle measurements of pH, TDS, and water levels in these wells.

- During low tide sampling events, it was observed that all three of the stormwater culvert outlets at 50th and Coliseum Way were virtually dry, (e.g. flow volume was estimated at 4 gallons per minute (gpm) or less in the Line G culvert at low tide) indicating that there is very little, if any, groundwater flow into these structures.

- Stormwater samples collected from the three stormwater culvert outlets at the confluence of the channels at 50th Avenue and Coliseum Way are consistent with previously collected samples which showed that the low tide concentrations of water from the "Second Line G Culvert" is near basin plan objectives for zinc. The Second Line G culvert drains a large industrial area of Oakland. An analysis of the contribution of other upgradient stormwater sources was beyond the scope of this investigation.

6. RISK ASSESSMENT WORKPLAN

The RWQCB has requested the preparation of a risk assessment for these properties that evaluates exposures associated with industrial or commercial uses of subject property. Clayton and its subcontractor, Ratech Resources, have prepared a preliminary risk assessment that evaluates a suite of industrial worker exposure scenarios. The site data has been compiled and statistically evaluated, constituents of concern have been identified, and a preliminary assessment has been completed. However, before finalizing this assessment we are requesting the opportunity to meet and confer with Mr. Ravi Arulanantham, toxicologist of the RWQCB to confirm that the exposure assumptions and protocols used are in accordance with Board policies. The risk assessment can be completed and submitted promptly following this consultation.

7. LIMITATIONS

The information and opinions rendered in this report are exclusively for use by Millennium Holdings Inc, it affiliates, and agents. Clayton Environmental Consultants, Inc. will not distribute or publish this report without the consent of Millennium Holdings Inc, except as required by law or court order. The information and opinions included in this report were given in response to a specific scope of work and should be considered and implemented only in light of that particular scope of work. The services provided by Clayton in completing this project have been provided in a manner consistent with the normal standards of the profession. No other warranty, expressed or implied, is made.

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November 5, 1998

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)	Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5050	LF-1	07-Nov-91	7.56	6.79	0.77	
		26-Oct-92		4.69	2.87	2.10
		04-Mar-92		3.94	3.62	0.75
		14-Apr-93		3.41	4.15	0.53
		24-May-93		3.07	4.49	0.34
		14-Jun-93		3.41	4.15	-0.34
		30-Jul-93		3.46	4.10	-0.05
		31-Aug-93		3.67	3.89	-0.21
		27-Sep-93		3.76	3.80	-0.09
		25-Oct-93		3.74	3.82	0.02
		02-Nov-93		4.26	3.30	-0.52
		08-Dec-93		4.42	3.14	-0.16
		28-Jan-94		4.06	3.50	0.36
		15-Feb-94		3.94	3.62	0.12
		24-May-94		3.81	3.75	0.13
		21-Sep-94		3.75	3.81	0.06
		19-Dec-94		3.51	4.05	0.24
		13-Mar-95		2.33	5.23	1.18
		07-Jun-95		2.49	5.07	-0.16
		05-Sep-95		2.78	4.78	-0.29
		18-Dec-95		3.21	4.35	-0.43
		19-Aug-97		4.10	3.46	-0.89
		10-Dec-97		2.90	4.66	1.20
		23-Mar-98		0.78	6.78	2.12
		17-Jun-98		1.77	5.79	-0.99
		30-Sep-98		2.49	5.07	-0.72

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)	Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5050	LF-2	07-Nov-91	9.84	7.26	2.58	
		26-Oct-92		6.28	3.56	0.98
		04-Mar-92		5.14	4.70	1.14
		14-Apr-93		4.95	4.89	0.19
		24-May-93		5.09	4.75	-0.14
		14-Jun-93		5.21	4.63	-0.12
		30-Jul-93		5.38	4.46	-0.17
		31-Aug-93		5.57	4.27	-0.19
		27-Sep-93		5.70	4.14	-0.13
		25-Oct-93		5.80	4.04	-0.10
		02-Nov-93		5.86	3.98	-0.06
		08-Dec-93		6.21	3.63	-0.35
		28-Jan-94		6.12	3.72	0.09
		15-Feb-94		6.07	3.77	0.05
		24-May-94		5.65	4.19	0.42
		21-Sep-94		6.00	3.84	-0.35
		19-Dec-94		5.91	3.93	0.09
		13-Mar-95		4.30	5.54	1.61
		07-Jun-95		4.36	5.48	-0.06
		05-Sep-95		5.12	4.72	-0.76
		18-Dec-95		5.56	4.28	-0.44
		19-Aug-97		5.28	4.56	0.28
		10-Dec-97		5.35	4.49	-0.07
		23-Mar-98		3.98	5.86	1.37
		17-Jun-98		4.13	5.71	-0.15
		30-Sep-98		5.00	4.84	-0.87

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)	Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5050	LF-3	07-Nov-91	10.98	7.55	3.43	
		26-Oct-92		7.05	3.93	0.50
		04-Mar-92		5.83	5.15	1.22
		14-Apr-93		5.48	5.50	0.35
		24-May-93		5.61	5.37	-0.13
		14-Jun-93		5.75	5.23	-0.14
		30-Jul-93		5.96	5.02	-0.21
		31-Aug-93		6.18	4.80	-0.22
		27-Sep-93		6.33	4.65	-0.15
		25-Oct-93		6.46	4.52	-0.13
		02-Nov-93		6.62	4.36	-0.16
		08-Dec-93		6.71	4.27	-0.09
		28-Jan-94		6.72	4.26	-0.01
		15-Feb-94		6.50	4.48	0.22
		24-May-94		6.15	4.83	0.35
		21-Sep-94		6.56	4.42	-0.41
		19-Dec-94		6.06	4.92	0.50
		13-Mar-95		4.85	6.13	1.21
		07-Jun-95		4.58	6.40	0.27
		05-Sep-95		5.38	5.60	-0.80
		18-Dec-95		5.75	5.23	-0.37
		19-Aug-97		5.60	5.38	0.15
		10-Dec-97		5.54	5.44	0.06
		23-Mar-98		3.68	7.30	1.86
		17-Jun-98		4.33	6.65	-0.65
		30-Sep-98		5.40	5.58	-1.07
		30-Sep-98		5.25	5.73	0.15

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)	Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5050	LF-4	07-Nov-91	10.36	11.63	-1.27	
		26-Oct-92		7.31	3.05	4.32
		04-Mar-92		5.58	4.78	1.73
		14-Apr-93		5.21	5.15	0.37
		24-May-93		5.48	4.88	-0.27
		14-Jun-93		5.63	4.73	-0.15
		30-Jul-93		5.92	4.44	-0.29
		31-Aug-93		6.16	4.20	-0.24
		27-Sep-93		6.36	4.00	-0.20
		25-Oct-93		6.54	3.82	-0.18
		02-Nov-93		7.00	3.36	-0.46
		08-Dec-93		6.96	3.40	0.04
		28-Jan-94		7.04	3.32	-0.08
		15-Feb-94		6.84	3.52	0.20
		24-May-94		5.99	4.37	0.85
		21-Sep-94		6.62	3.74	-0.63
		19-Dec-94		6.75	3.61	-0.13
		13-Mar-95		5.67	4.69	1.08
		07-Jun-95		4.48	5.88	1.19
		05-Sep-95		5.38	4.98	-0.90
		18-Dec-95		5.96	4.40	-0.58
		23-Mar-98		3.95	6.41	2.01
		17-Jun-98		4.17	6.19	-0.22
		30-Sep-98		5.40	4.96	-1.23

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)		Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5050	LF-5	07-Nov-91	8.03	7.34		0.69	
		26-Oct-92		7.05		0.98	0.29
		04-Mar-92		6.05		1.98	1.00
		14-Apr-93		6.25		1.78	-0.20
		24-May-93		6.61		1.42	-0.36
		14-Jun-93		6.97		1.06	-0.36
		30-Jul-93		6.72		1.31	0.25
		31-Aug-93		6.84		1.19	-0.12
		27-Sep-93		7.10		0.93	-0.26
		25-Oct-93		7.11		0.92	-0.01
		02-Nov-93		7.04		0.99	0.07
		08-Dec-93		7.27		0.76	-0.23
		28-Jan-94		6.82		1.21	0.45
		15-Feb-94		6.85		1.18	-0.03
		24-May-94		6.76		1.27	0.09
		21-Sep-94		7.05		0.98	-0.29
		19-Dec-94		6.48		1.55	0.57
		13-Mar-95		5.25		2.78	1.23
		07-Jun-95		5.98		2.05	-0.73
		05-Sep-95		6.42		1.61	-0.44
		18-Dec-95		5.87		2.16	0.55
		19-Aug-97		5.95		2.08	-0.08
		10-Dec-97		5.20		2.83	0.75
		23-Mar-98		4.72		3.31	0.48
		17-Jun-98		5.29		2.74	-0.57
		30-Sep-98	8.03	6.10	B	1.93	-0.81

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)	Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5050	LF-6	07-Nov-91	11.59	8.59	3.00	
		26-Oct-92		8.82	2.77	-0.23
		04-Mar-92		5.79	5.80	3.03
		14-Apr-93		5.41	6.18	0.38
		24-May-93		6.05	5.54	-0.64
		14-Jun-93		6.29	5.30	-0.24
		30-Jul-93		6.83	4.76	-0.54
		31-Aug-93		7.27	4.32	-0.44
		27-Sep-93		7.61	3.98	-0.34
		25-Oct-93		7.79	3.80	-0.18
		02-Nov-93		8.07	3.52	-0.28
		08-Dec-93		7.34	4.25	0.73
		28-Jan-94		6.37	5.22	0.97
		15-Feb-94		5.98	5.61	0.39
		24-May-94		6.14	5.45	-0.16
		21-Sep-94		7.39	4.20	-1.25
		19-Dec-94		6.12	5.47	1.27
		13-Mar-95		4.98	6.61	1.14
		07-Jun-95		5.03	6.56	-0.05
		05-Sep-95		6.23	5.36	-1.20
		18-Dec-95		5.71	5.88	0.52
		23-Mar-98		4.10	7.49	1.61
		17-Jun-98		4.82	6.77	-0.72
		30-Sep-98		6.04	5.55	-1.22

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)		Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5050	LF-7	07-Nov-91	10.65	8.54		2.00	
		26-Oct-92		7.98		2.56	0.56
		04-Mar-92		4.92		5.62	3.06
		14-Apr-93		4.80		5.74	0.12
		24-May-93		5.03		5.51	-0.23
		14-Jun-93		5.18		5.36	-0.15
		30-Jul-93		5.51		5.03	-0.33
		31-Aug-93		5.82		4.72	-0.31
		27-Sep-93		6.14		4.40	-0.32
		25-Oct-93		6.39		4.15	-0.25
		02-Nov-93		6.60		3.94	-0.21
		08-Dec-93		6.74		3.80	-0.14
		28-Jan-94		6.03		4.51	0.71
		15-Feb-94		5.59		4.95	0.44
		24-May-94		5.46		5.08	0.13
		21-Sep-94		6.40		4.14	-0.94
		19-Dec-94		5.59		4.95	0.81
		13-Mar-95		4.16		6.38	1.43
		07-Jun-95		4.07		6.47	0.09
		05-Sep-95		4.81		5.73	-0.74
		18-Dec-95		4.99		5.55	-0.18
		23-Mar-98		3.08		7.46	1.91
		17-Jun-98		3.64		6.90	-0.56
		30-Sep-98		4.69		5.85	-1.05
5050	LF-8	02-Nov-93	10.91	6.18		4.73	
		08-Dec-93		6.29		4.62	-0.11
		28-Jan-94		6.38		4.53	-0.09
		15-Feb-94		6.37		4.54	0.01
		24-May-94		6.15		4.76	0.22
		21-Sep-94		6.33		4.58	-0.18
		19-Dec-94		6.31		4.60	0.02
		13-Mar-95		4.48		6.43	1.83
		07-Jun-95		4.46		6.45	0.02
		05-Sep-95		5.08		5.83	-0.62
		18-Dec-95		5.63		5.28	-0.55
		19-Aug-97		5.39		5.52	0.24
		10-Dec-97		5.52	2	5.39	-0.13
		23-Mar-98		3.41		7.50	2.11
		17-Jun-98		4.05		6.86	-0.64
		30-Sep-98		5.02		5.89	-0.97

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)		Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5050	**LF-9**	02-Nov-93	11.70	6.76		4.94	
		08-Dec-93		6.91		4.79	-0.15
		28-Jan-94		6.88		4.82	0.03
		15-Feb-94		6.80		4.90	0.08
		24-May-94		6.80		4.90	0.00
		21-Sep-94		6.98		4.72	-0.18
		19-Dec-94		6.34		5.36	0.64
		13-Mar-95		5.12		6.58	1.22
		07-Jun-95		5.31		6.39	-0.19
		05-Sep-95		5.90		5.80	-0.59
		18-Dec-95		6.80		4.90	-0.90
		23-Mar-98		Well Not Located			
		17-Jun-98		Well Not Located			
5050	**LF-10**	02-Nov-93	9.43	8.14		1.29	
		08-Dec-93		7.82		1.61	0.32
		28-Jan-94		--		--	--
		15-Feb-94		7.47		1.96	
		24-May-94		7.11		2.32	0.36
		21-Sep-94		7.90		1.53	-0.79
		19-Dec-94		7.21		2.22	0.69
		13-Mar-95		5.68		3.75	1.53
		07-Jun-95		5.92		3.51	-0.24
		05-Sep-95		6.61		2.82	-0.69
		18-Dec-95		6.92		2.51	-0.31
		23-Mar-98		4.93	xx	4.50	1.99
		17-Jun-98		5.56		3.87	-0.63
		30-Sep-98	9.45	6.52	A	2.93	-0.94
5050	**LF-11**	02-Nov-93	9.07	11.68		-2.61	
		08-Dec-93		5.35		3.72	6.33
		28-Jan-94		5.27		3.80	0.08
		15-Feb-94		5.04		4.03	0.23
		24-May-94		4.20		4.87	0.84
		21-Sep-94		4.70		4.37	-0.50
		19-Dec-94		4.72		4.35	-0.02
		13-Mar-95		3.27		5.80	1.45
		07-Jun-95		3.75		5.32	-0.48
		05-Sep-95		3.70		5.37	0.05
		18-Dec-95		4.20		4.87	-0.50
		19-Aug-97		3.60		5.47	0.60
		10-Dec-97		3.10	1	5.97	0.50
		23-Mar-98		0.00	xx	9.07	3.10
		17-Jun-98		1.60		7.47	-1.60
		30-Sep-98	8.96	3.16	A	5.80	-1.67

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)		Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5050	LF-12	02-Nov-93	8.70	7.87		0.83	
		08-Dec-93		7.90		0.80	-0.03
		28-Jan-94		7.46		1.24	0.44
		15-Feb-94		7.66		1.04	-0.20
		24-May-94		--		--	--
		21-Sep-94		7.80		0.90	
		19-Dec-94		7.32		1.38	0.48
		13-Mar-95		6.00		2.70	1.32
		07-Jun-95		7.40		1.30	-1.40
		05-Sep-95		7.45		1.25	-0.05
		18-Dec-95		6.71		1.99	0.74
		19-Aug-97		6.89		1.81	-0.18
		10-Dec-97		5.97		2.73	0.92
		23-Mar-98		5.15		3.55	0.82
		17-Jun-98		6.64		2.06	-1.49
		30-Sep-98		7.18		1.52	-0.54
5050	LF-13	08-Dec-93	9.75	5.94		3.81	
		28-Jan-94		4.94		4.81	1.00
		15-Feb-94		4.84		4.91	0.10
		24-May-94		4.81		4.94	0.03
		21-Sep-94		6.32		3.43	-1.51
		19-Dec-94		4.67		5.08	1.65
		13-Mar-95		3.22		6.53	1.45
		07-Jun-95		3.32		6.43	-0.10
		05-Sep-95		3.90		5.85	-0.58
		18-Dec-95		4.13		5.62	-0.23
		20-Aug-97		4.00	**	5.75	0.13
		10-Dec-97		3.67	1	6.08	0.33
		23-Mar-98		2.21		7.54	1.46
		17-Jun-98		2.52		7.23	-0.31
		30-Sep-98		3.75		6.00	-1.23

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)	Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5050	LF-14	08-Dec-93	11.72	7.96	3.76	
		28-Jan-94		8.02	3.70	-0.06
		15-Feb-94		7.85	3.87	0.17
		24-May-94		7.68	4.04	0.17
		21-Sep-94		7.69	4.03	-0.01
		19-Dec-94		7.71	4.01	-0.02
		13-Mar-95		6.68	5.04	1.03
		07-Jun-95		6.03	5.69	0.65
		05-Sep-95		6.51	5.21	-0.48
		18-Dec-95		7.39	4.33	-0.88
		19-Aug-97		6.98	4.74	0.41
		10-Dec-97		7.04	4.68	-0.06
		23-Mar-98		5.10	6.62	1.94
		17-Jun-98		5.62	6.10	-0.52
		30-Sep-98		6.50	5.22	-0.88
5050	LF-15	08-Dec-93	11.62	7.91	3.71	
		28-Jan-94		7.74	3.88	0.17
		15-Feb-94		7.58	4.04	0.16
		24-May-94		8.07	3.55	-0.49
		21-Sep-94		8.58	3.04	-0.51
		19-Dec-94		--	--	--
		13-Mar-95		6.32	5.30	
		07-Jun-95		6.44	5.18	-0.12
		05-Sep-95		6.08	5.54	0.36
		18-Dec-95		11.01	0.61	-4.93
		23-Mar-98		4.48	7.14	6.53
		17-Jun-98		5.11	6.51	-0.63
		30-Sep-98		5.99	5.63	-0.88

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)	Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5050	LF-16	08-Dec-93	11.56	8.35	3.21	
		28-Jan-94		8.40	3.16	-0.05
		15-Feb-94		8.21	3.35	0.19
		24-May-94		8.01	3.55	0.20
		21-Sep-94		7.64	3.92	0.37
		19-Dec-94		8.60	2.96	-0.96
		13-Mar-95		6.22	5.34	2.38
		07-Jun-95		6.88	4.68	-0.66
		05-Sep-95		7.37	4.19	-0.49
		18-Dec-95		9.21	2.35	-1.84
		19-Aug-97		8.60	2.96	0.61
		10-Dec-97		8.20	3.36	0.40
		23-Mar-98		5.68	5.88	2.52
		17-Jun-98		5.87	5.69	-0.19
		30-Sep-98		6.52	5.04	-0.65
5050	LF-17	08-Dec-93	9.71	6.72	2.99	
		28-Jan-94		5.86	3.85	0.86
		15-Feb-94		5.87	3.84	-0.01
		24-May-94		6.00	3.71	-0.13
		21-Sep-94		6.88	2.83	-0.88
		19-Dec-94		5.45	4.26	1.43
		13-Mar-95		4.68	5.03	0.77
		07-Jun-95		6.52	3.19	-1.84
		05-Sep-95		7.02	2.69	-0.50
		18-Dec-95		5.11	4.60	1.91
		23-Mar-98		5.00	4.71	0.11
		17-Jun-98		5.36	4.35	-0.36

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)	Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
		30-Sep-98		6.00	3.71	-0.64
5050	LF-F1	08-Dec-93	8.82	4.08	4.74	
		28-Jan-94		4.03	4.79	0.05
		15-Feb-94		3.90	4.92	0.13
		24-May-94		3.60	5.22	0.30
		21-Sep-94		4.05	4.77	-0.45
		19-Dec-94		3.45	5.37	0.60
		13-Mar-95		2.22	6.60	1.23
		07-Jun-95		2.28	6.54	-0.06
		05-Sep-95		2.92	5.90	-0.64
		18-Dec-95		3.18	5.64	-0.26
		23-Mar-98		1.26	7.56	1.92
		17-Jun-98		1.94	6.88	-0.68
		30-Sep-98		2.83	5.99	-0.89
5050	LFMW-1	07-Nov-91	10.21	6.29	3.92	
		26-Oct-92		6.38	3.83	-0.09
		04-Mar-92		3.57	6.64	2.81
		14-Apr-93		3.57	6.64	0.00
		24-May-93		4.59	5.62	-1.02
		14-Jun-93		4.86	5.35	-0.27
		30-Jul-93		5.72	4.49	-0.86
		31-Aug-93		6.38	3.83	-0.66
		27-Sep-93		6.85	3.36	-0.47
		25-Oct-93		7.03	3.18	-0.18
		02-Nov-93		7.30	2.91	-0.27
		08-Dec-93		6.51	3.70	0.79
		28-Jan-94		5.00	5.21	1.51
		15-Feb-94		4.46	5.75	0.54
		24-May-94		4.65	5.56	-0.19
		21-Sep-94		6.35	3.86	-1.70
		19-Dec-94		3.70	6.51	2.65
		13-Mar-95		2.71	7.50	0.99
		07-Jun-95		4.02	6.19	-1.31
		05-Sep-95		5.67	4.54	-1.65
		18-Dec-95		4.47	5.74	1.20
		23-Mar-98		2.73	7.48	1.74
		17-Jun-98		3.49	6.72	-0.76

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)	Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
		30-Sep-98		5.45	4.76	-1.96
5050	LFMW-2	07-Nov-91	8.86	5.93	2.93	
		26-Oct-92		5.41	3.45	0.52
		04-Mar-92		4.26	4.60	1.15
		14-Apr-93		3.83	5.03	0.43
		24-May-93		3.78	5.08	0.05
		14-Jun-93		3.89	4.97	-0.11
		30-Jul-93		4.10	4.76	-0.21
		31-Aug-93		4.37	4.49	-0.27
		27-Sep-93		4.72	4.14	-0.35
		25-Oct-93		4.81	4.05	-0.09
		02-Nov-93		4.96	3.90	-0.15
		08-Dec-93		5.13	3.73	-0.17
		28-Jan-94		5.18	3.68	-0.05
		15-Feb-94		5.02	3.84	0.16
		24-May-94		4.43	4.43	0.59
		21-Sep-94		5.82	3.04	-1.39
		19-Dec-94		4.75	4.11	1.07
		13-Mar-95		3.28	5.58	1.47
		07-Jun-95		3.12	5.74	0.16
		05-Sep-95		3.90	4.96	-0.78
		18-Dec-95		4.55	4.31	-0.65
		23-Mar-98		2.06	6.80	2.49
		17-Jun-98		2.72	6.14	-0.66
		30-Sep-98		3.45	5.41	-0.73

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)	Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5050	LFMW-3	07-Nov-91	9.01	6.94	2.07	
		26-Oct-92		7.29	1.72	-0.35
		04-Mar-92		5.07	3.94	2.22
		14-Apr-93		5.21	3.80	-0.14
		24-May-93		5.95	3.06	-0.74
		14-Jun-93		6.23	2.78	-0.28
		27-Sep-93		6.46	2.55	-0.23
		25-Oct-93		6.47	2.54	-0.01
		02-Nov-93		6.62	2.39	-0.15
		08-Dec-93		6.23	2.78	0.39
		28-Jan-94		5.58	3.43	0.65
		15-Feb-94		5.70	3.31	-0.12
		24-May-94		5.59	3.42	0.11
		21-Sep-94		6.46	2.55	-0.87
		19-Dec-94		5.46	3.55	1.00
		13-Mar-95		4.37	4.64	1.09
		07-Jun-95		5.61	3.40	-1.24
		05-Sep-95		6.38	2.63	-0.77
		18-Dec-95		4.91	4.10	1.47
		20-Aug-97		6.06	2.95	-1.15
		10-Dec-97		5.03	3.98	1.03
		23-Mar-98		4.39	4.62	0.64
		17-Jun-98		4.81	4.20	-0.42
		30-Sep-98		5.40	3.61	-0.59

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)	Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5050	LFMW-4	07-Nov-91	10.75	10.26	0.49	
		26-Oct-92		9.04	1.71	1.22
		04-Mar-92		5.77	4.98	3.27
		14-Apr-93		4.71	6.04	1.06
		24-May-93		5.60	5.15	-0.89
		14-Jun-93		5.94	4.81	-0.34
		30-Jul-93		6.72	4.03	-0.78
		31-Aug-93		7.25	3.50	-0.53
		27-Sep-93		7.66	3.09	-0.41
		25-Oct-93		7.79	2.96	-0.13
		02-Nov-93		7.97	2.78	-0.18
		08-Dec-93		7.18	3.57	0.79
		28-Jan-94		5.50	5.25	1.68
		15-Feb-94		5.17	5.58	0.33
		24-May-94		5.46	5.29	-0.29
		21-Sep-94		7.52	3.23	-2.06
		19-Dec-94		4.42	6.33	3.10
		13-Mar-95		3.48	7.27	0.94
		07-Jun-95		4.93	5.82	-1.45
		05-Sep-95		6.34	4.41	-1.41
		18-Dec-95		4.61	6.14	1.73
		23-Mar-98		3.59	7.16	1.02
		17-Jun-98		4.22	6.53	-0.63
		30-Sep-98		6.10	4.65	-1.88
5051	MWA-1	19-Dec-95[1]	9.27	9.70	-0.43	
		19-Dec-95[2]		9.64	-0.37	
		10-Dec-96[1]		9.27	0.00	
		10-Dec-96[2]		9.64	-0.37	
		13-Dec-96		9.25	0.02	0.39
		23-Mar-98		7.10	2.17	2.15
		17-Jun-98		8.64	0.63	-1.54
		30-Sep-98		10.09	-0.82	-1.45
5051	MWA-2	19-Dec-95[1]	7.79	3.95	3.84	
		19-Dec-95[2]		3.95	3.84	
		10-Dec-96[1]		3.27	4.52	
		10-Dec-96[2]		6.20	1.59	
		13-Dec-96		6.00	1.79	0.20
		23-Mar-98		3.24	4.55	2.76
		17-Jun-98		4.22	3.57	-0.98
		30-Sep-98		6.78	1.01	-2.56

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)	Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5051	MWA-3	19-Dec-95[1]	10.50	8.23	2.27	
		19-Dec-95[2]		8.22	2.28	
		10-Dec-96[1]		7.67	2.83	
		10-Dec-96[2]		8.19	2.31	
		13-Dec-96		7.94	2.56	0.25
		23-Mar-98		6.36	4.14	1.58
		17-Jun-98		7.56	2.94	-1.20
		30-Sep-98		8.93	1.57	-1.37
5051	MW-4	19-Dec-95[1]	10.27	9.95	0.32	
		19-Dec-95[2]		11.45	-1.18	
		10-Dec-96[1]		9.22	1.05	
		10-Dec-96[2]		10.68	-0.41	
		13-Dec-96		10.00	0.27	0.68
		23-Mar-98		9.89	0.38	0.11
		17-Jun-98		10.62	-0.35	-0.73
		30-Sep-98		12.00	-1.73	-1.38
5051	MW-5	19-Dec-95[1]	9.45	8.51	0.94	
		19-Dec-95[2]		8.49	0.96	
		10-Dec-96[1]		8.16	1.29	
		10-Dec-96[2]		8.62	0.83	
		13-Dec-96		8.50	0.95	0.12
		23-Mar-98		7.91	1.54	0.59
		17-Jun-98		8.28	1.17	-0.37
		30-Sep-98		8.70	0.75	-0.42
5051	MW-6	19-Dec-95[1]	7.14	5.98	1.16	
		19-Dec-95[2]		5.76	1.38	
		10-Dec-96[1]		6.76	0.38	
		10-Dec-96[2]		8.94	-1.80	
		13-Dec-96		8.85	-1.71	0.09
		23-Mar-98		4.60	2.54	4.25
		17-Jun-98		5.27	1.87	-0.67
		30-Sep-98		6.19	0.95	-0.92
5051	MW-7	19-Dec-95[1]	8.78	17.96	-9.18	
		19-Dec-95[2]		17.91	-9.13	
		10-Dec-96[1]		17.10	-8.32	
		10-Dec-96[2]		17.85	-9.07	
		13-Dec-96		17.97	-9.19	-0.12
		23-Mar-98		17.55	-8.77	0.42
		17-Jun-98		17.49	-8.71	0.06
		30-Sep-98		17.76	-8.98	-0.27

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)		Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5051	MW-8	19-Dec-95[1]	6.69	6.09		0.60	
		19-Dec-95[2]		6.09		0.60	
		10-Dec-96[1]		5.61		1.08	
		10-Dec-96[2]		7.05		-0.36	
		13-Dec-96		6.44		0.25	0.61
		23-Mar-98		6.51		0.18	-0.07
		17-Jun-98		6.90		-0.21	-0.39
		30-Sep-98		7.55		-0.86	-0.65
5200	CW-1	30-Sep-96	14.11	9.22		4.89	
		19-Aug-97		9.39		4.72	-0.17
		10-Dec-97		8.66	3	5.45	0.73
		23-Mar-98		7.55		6.56	1.11
		17-Jun-98		8.15		5.96	-0.60
		30-Sep-98		9.01		5.10	-0.86
5200	CW-2	30-Sep-96	14.88	9.50		5.38	
		19-Aug-97		9.65		5.23	-0.15
		10-Dec-97		9.30		5.58	0.35
		23-Mar-98		7.79		7.09	1.51
		17-Jun-98		8.43		6.45	-0.64
		30-Sep-98		9.24		5.64	-0.81
5200	CW-3	30-Sep-96	14.07	8.78		5.29	
		19-Aug-97		8.94	3	5.13	-0.16
		10-Dec-97		9.10	*a*	4.97	-0.32
		23-Mar-98		6.94		7.13	2.00
		17-Jun-98		7.63		6.44	1.47
		30-Sep-98		8.57		5.50	-1.63
5200	CW-4	30-Sep-96	14.76	8.08		6.68	
		19-Aug-97		8.92	2	5.84	-0.84
		10-Dec-97		8.06	4	6.70	0.86
		23-Mar-98		6.08		8.68	1.98
		17-Jun-98		6.98		7.78	-0.90
		30-Sep-98		7.90		6.86	-0.92

TABLE 1
Groundwater Elevation Data
5050, 5051 & 5200 Coliseum Way

Site	Monitoring Well	Measurement Date	Top of Casing Elevation (ft, msl)	Depth to Groundwater (ft)		Groundwater Elevation (ft, msl)	Change from Previous Measurement (ft)
5200	**CW-5**	30-Sep-96	14.36	8.17		6.19	
		19-Aug-97		8.27	2	6.09	-0.10
		10-Dec-97		8.39	2,*a*	5.97	-0.12
		23-Mar-98		6.25		8.11	2.14
		17-Jun-98		6.97		7.39	-0.72
		30-Sep-98		7.89		6.47	-0.92
5200	**CW-6**	30-Sep-98	13.20	8.97	B	4.23	
5200	**CW-7**	30-Sep-98	11.86	7.61	B	4.25	
5200	**CW-8**	30-Sep-98	9.24	5.41	B	3.83	
5200	**CW-9**	30-Sep-98	10.35	11.42	B	-1.07	
5200	**CW-10**	30-Sep-98	8.33	7.18	B	1.15	
5200	**CW-12**	30-Sep-98	7.84	6.79	B	1.05	
5200	**CW-13**	30-Sep-98	7.47	6.27	B	1.20	

Notes: All measurements are with reference to top of PVC casing of each well.
-- = Not Measured
** approximately 0.10 feet of free product encountered in well casing.
1 = Sheen
2 = Sheen and Petroleum Odor
3 = Sulfur Odor
4 = Sheen and Sulfur Odor
a = Field error in numbering wells, CW-3 and CW-5 reversed
(1) = High Tide Measurement
(2) = Low Tide Measurement

Table 2
Quarterly Analytical Program
Coliseum Way Properties
Clayton Project No. 70-97203.00.300

SITE	WELL	TPHG/BTEX	TPHD/O	CAM-17	TDS
5050	LF-1	1	1	1	1
	LF-2	1	1	1	1
	LF-3	1	1	1	1
	LF-4	1	1	1	1
	LF-5		1	1	1
	LF-6			1	1
	LF-7		1	1	1
	LF-8	1	1	1	1
	LF-9	WELL NOT FOUND			
	LF-10	1	1	1	1
	LF-11		1	1	1
	LF-12			1	1
	LF-13	1	1	1	1
	LF-14	1	1	1	1
	LF-15		1	1	1
	LF-16	1	1	1	1
	LF-17			1	1
	LF-F1	WELL NOT USED			
	CW-13	1	1	1	1
750 50TH	LFMW-1			1	1
	LFMW-2			1	1
	LFMW-3		1	1	1
	LFMW-4			1	1
5051	MWA-1	1	1	1	1
	MWA-2	1	1	1	1
	MWA-3			1	1
	MW-4			1	1
	MW-5			1	1
	MW-6	1	1	1	1
	MW-7			1	1
	MW-8			1	1
EBMUD	CW-8	1	1	1	1
	CW-9			1	1
ACPWA-W	CW-10			2	2
	CW-12			1	1
5200	CW-1	1	1	1	1
	CW-2	1	1	1	1
	CW-3	1	1	1	1
	CW-4	1	1	1	1
	CW-5	1	1	1	1
ACPWA-E	CW-6	1	1	1	1
	CW-7	2	2	2	2
TOTALS	35	22	27	42	42

NOTE: Field monitoring of pH is important, calibrate and log meter daily before and after the sampling event and take the time to get accurate readings

NOTE: TPH-D/O - request silica gel cleanup for extraction on COC.

NOTE: CAM-17 samples will be collected WITHOUT preservative, have laboratory filter samples - submit daily

Table 3
Soil Analtyical Results
Coliseum Way Properties
Oakland, California
All data is reported in milligrams per kilogram (mg/kg)

SAMPLE	CSB-1	CSB-1	CSB-3	CSB-4	CSB-5	CSB-6	CSB-8	CSB-8	CSB-8	CSB-8	CSB-8	CSB-8	CSB-8	CSB-8	CSB-8	CSB-8	CSB-8	CSB-8	CSB-8
Depth (feet, bgs)	6-6.5'	8-8.5'	5'	4'	4'	4'	5'-5.5'	10'-10.5'	15'-15.5'	19.5'-20'	20'-20.5'	25'-25.5'	30-30.5	35'-35.5'	40'-40.5'	45'-45.5'	50'-50.5'	55'-55.5'	60'-60.5'
TPH (8015 Modified)																			
Diesel	-	-	< 4	<5	< 3	<2	-	-	-	-	-	-	-	-	-	-	-	-	-
Oil	-	-	18	46	36	12	-	-	-	-	-	-	-	-	-	-	-	-	-
Gasoline	-	-	<0.3	0.4	<0.3	<0.3	-	-	-	-	-	-	-	-	-	-	-	-	-
AROMATIC HCs (8020)																			
Benzene	-	-	< 0.005	< 0.005	< 0.005	< 0.005	-	-	-	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	-	-	< 0.005	< 0.005	< 0.005	< 0.005	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	< 0.005	< 0.005	< 0.005	< 0.005	-	-	-	-	-	-	-	-	-	-	-	-	-
Xylenes	-	-	< 0.005	0.007	< 0.005	< 0.005	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Metals																			
Antimony (Sb)	21	<1	< 1	3	3	2	< 1	2	3	2	1	1	2	2	2	3	22	2	2
Arsenic (As)	590	8	3	8	8	5	53	1.6	8.1	2	4	3	2	1	3	5	3	2	1
Barium (Ba)	2600	91	9	86	420	91	48	160	67	27	73	39	360	69	230	200	85	130	96
Beryllium (Be)	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.01	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1
Cadmium (Cd)	3.7	<0.4	< 0.4	< 0.4	< 0.4	< 0.4	3.3	100	< 0.4	< 0.4	< 0.4	0.4	0.9	< 0.4	< 0.4	< 0.4	< 0.4	< 0.4	< 0.4
Chromium (Cr)	33	33	19	52	78	19	17	15	100	45	54	50	55	44	33	48	38	22	35
Cobalt (Co)	15	3	5	11	16	7	7.3	35	15	12	18	12	23	12	19	13	10	8	8
Copper (Cu)	310	76	5	55	60	7	11	< 1	35	16	18	14	28	23	16	21	17	14	17
Lead (Pb)	1700	9	3	27	37	9	1	< 0.1	< 1	< 1	< 1	2	< 1	< 1	< 1	< 1	< 1	< 1	< 1
Mercury (Hg)	0.5	<0.1	< 0.1	0.2	0.2	0.2	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	0.2	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1
Molybdenum (Mo)	< 1	< 1	< 1	< 1	< 1	< 1	< 1	< 1	< 1	< 1	< 1	< 1	< 1	< 1	< 1	< 1	< 1	< 1	< 1
Nickel (Ni)	35	20	20	89	140	10	27	68	170	72	77	46	99	140	50	84	36	40	47
Selenium (Se)	2	<1	< 1	< 1	< 1	< 1	< 1	1	< 1	1	2	< 1	< 1	< 1	< 1	< 1	< 1	< 1	1
Silver (Ag)	1.5	<0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5
Thallium (Tl)	5	<1	< 1	3	4	2	3	6	10	2	6	4	8	6	6	9	5	5	6
Vanadium (V)	34	23	14	40	44	32	19	24	87	25	31	37	47	27	28	37	34	26	25
Zinc (Zn)	2700	60	18	120	180	65	1100	29	48	40	46	31	52	36	34	48	30	30	39
pH	6.6	5.1	-	-	-	-	8.0	8.2	8.8	8.5	8.4	8.0	7.2	7.5	7.4	7.2	7.3	7.4	7.5

Table 3
Soil Analtyical Results
Coliseum Way Properties
Oakland, California
All data is reported in milligrams per kilogram (mg/kg)

SAMPLE	CSB-9	CSB-9	CSB-9	CSB-9	CSB-9	CSB-9	CSB-9	CSB-9	CSB-9	CSB-9	CSB-9	CSB-9
Depth (feet, bgs)	5'-5.5'	10'-10.5'	15'-15.5'	20'-20.5'	25'-25.5'	30'-30.5'	35'-35.5'	40'-40.5'	45'-45.5'	50'-50.5'	55'-55.5'	60'-60.5'
TPH (8015 Modified)												
Diesel	-	-	-	-	-	-	-	-	-	-	-	-
Oil	-	-	-	-	-	-	-	-	-	-	-	-
Gasoline	-	-	-	-	-	-	-	-	-	-	-	-
AROMATIC HCs (8020)												
Benzene	-	-	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	-	-
Xylenes	-	-	-	-	-	-	-	-	-	-	-	-
Total Metals												
Antimony (Sb)	2	4	< 1	< 1	1	2	2	2	2	2	2	2
Arsenic (As)	3	10	6	2	< 1	<1	4	< 1	3	3	4	3
Barium (Ba)	160	22	63	110	17	76	310	86	170	110	120	38
Beryllium (Be)	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1
Cadmium (Cd)	< 0.4	< 0.4	3	< 0.4	< 0.4	< 0.4	< 0.4	< 0.4	< 0.4	< 0.4	< 0.4	< 0.4
Chromium (Cr)	42	44	32	52	39	48	93	40	42	43	58	36
Cobalt (Co)	11	10	14	8	9	9	21	12	13	10	13	6
Copper (Cu)	16	23	15	12	16	19	22	23	21	22	23	17
Lead (Pb)	14	31	30	< 1	< 1	< 1	< 1	< 1	< 1	< 1	3	< 1
Mercury (Hg)	< 0.1	< 0.1	<0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1	< 0.1
Molybdenum (Mo)	< 1	< 1	3	< 1	< 1	< 1	< 1	< 1	< 1	< 1	< 1	< 1
Nickel (Ni)	42	45	64	56	70	52	97	69	48	85	89	27
Selenium (Se)	< 1	< 1	<1	< 1	< 1	1	< 1	< 1	2	< 1	<1	< 1
Silver (Ag)	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5	< 0.5
Thallium (Tl)	7	8	5	5	4	6	7	6	6	6	6	4
Vanadium (V)	36	29	32	25	24	38	45	31	40	29	37	33
Zinc (Zn)	47	74	3200	140	30	40	40	33	45	34	73	36
pH	8.1	10.6	6.7	8.3	6.8	8.3	8.5	8.3	7.7	8.0	8.0	7.3

Table 3
Soil Analtyical Results
Coliseum Way Properties
Oakland, California
All data is reported in milligrams per kilogram (mg/kg)

SAMPLE	CW-6	CW-7	CW-7	CW-8	CW-9	CW-10	CW-12	CW-13	CA. HAZ. WASTE		EPA - PRGs	
Depth (feet, bgs)	6-6.5'	6-6.5'	16-16.5'	5'	5'	11-11.5	11-11.5	5'	10xSTLC (mg/L)	TTLC (mg/kg)	Residential (mg/kg)	Industrial (mg/kg)
TPH (8015 Modified)												
Diesel	-	-	-	< 30	< 30	-	-	<5	NE	NE	NE	NE
Oil	-	-	-	270	490	-	-	64	NE	NE	NE	NE
Gasoline	-	-	-	<0.3	0.6	-	-	<0.3	NE	NE	NE	NE
AROMATIC HCs (8020)												
Benzene	-	-	-	< 0.005	< 0.005	-	-	<0.0005	NE	NE	0.62	1.4
Ethylbenzene	-	-	-	< 0.005	< 0.005	-	-	<0.0005	NE	NE	230	230
Toluene	-	-	-	< 0.005	< 0.005	-	-	<0.0005	NE	NE	520	520
Xylenes	-	-	-	< 0.005	< 0.005	-	-	<0.0005	NE	NE	210*	210*
Total Metals												
Antimony (Sb)	<1	<1	1	3	2	1	1	2	150	500	30	750
Arsenic (As)	570	140	5	4	3	11	5	6.9	50	500	0.38*	3
Barium (Ba)	3900	53,000	160	1400	130	410	120	126	1000	10000	5,200	100,000
Beryllium (Be)	<0.1	<0.1	<0.1	<0.1	< 0.1	< 0.1	< 0.1	< 0.1	7.5	75	150	3,400
Cadmium (Cd)	120	59	<0.4	0.7	< 0.4	0.8	< 0.4	< 0.4	10	100	9*	930
Chromium (Cr)	30	12	51	41	42	100	58	41	50	2500	210*	450
Cobalt (Co)	17	38	8	9	12	23	9	11	800	8000	3,300	29,000
Copper (Cu)	1100	270	20	52	15	48	21	35	250	2500	2,800	70,000
Lead (Pb)	4,300	5,500	5	120	24	9	6	24	50	1000	130*	1,000
Mercury (Hg)	4.1	0.3	0.1	0.5	0.1	0.1	0.2	0.2	2	20	22	560
Molybdenum (Mo)	5	<1	<1	<1	< 1	< 1	< 1	< 1	3500	3500	370	9,400
Nickel (Ni)	57	110	100	45	50	120	90	117	200	2000	150*	37,000
Selenium (Se)	8	3	2	<1	< 1	2	2	< 1	10	100	370	9,400
Silver (Ag)	10	2.3	< 0.5	< 0.5	< 0.5	<0.5	< 0.5	< 0.5	50	500	370	9,400
Thallium (Tl)	6	<1	<1	1	2	3	2	2	70	700	NE	NE
Vanadium (V)	55	220	39	34	39	50	36	28	240	2400	520	13,000
Zinc (Zn)	21,000	84,000	37	220	62	56	56	103	2500	5000	22,000	100,000
pH	9.7	10	9.5	-	-	8.6	8.3	-				

Abbreviations and Modifiers:

10xSTLC = Soluble Threshould Limit Concentration, California Code of Regulations (CCR) Title 22, Section 66261.24(a)(2), concentration requiring waste extraction test

TTLC = Total Threshould Limit Concentration from California Code of Regulations (CCR) Title 22, Section 66261.24(a)(2)

PRG = Health Based Preliminary Remedial Goals established by USEPA Region IX - Industrial/Residential scenarios.

* = PRG limitations: xylenes as m-xylenes; arsenic as cancer endpoint; chromium ratio 1/6 Cr VI/Cr III; CAL-Modified residential PRG for Nickel

- = Not Analyzed

NE = Not Established

ND = Not Detected, Various Detection Levels for Analytes Tested

<0.03 = Analyte not detected at or above the laboratory reporting limit concentration listed

Table 4
Grab-Ground Water Analtyical Results
Coliseum Way Properties
Oakland, California
All data reported in milligrams per kilogram (mg/kg)

SAMPLE Discrete Depth (feet, bgs) Where Applicable	CSB-1W	CSB-3	CSB-4	CSB-5	CSB-6	CSB-8 25'	CSB-8 45'	CSB-9 25'	CSB-9 36'	CSB-9 47'	MCL	RWQCB - SF Bay Region Basin Plan 1	 Basin Plan 2
TPH (8015 Modified)													
Total Extractables	-	-	-	-	-	-	< 0.050	-	< 0.050	0.08	NE	NE	NE
Diesel	-	< 0.300	< 0.400	< 0.900	< 0.200	-	< 0.050	< 0.400	< 0.050	< 0.050	NE	NE	NE
Oil	-	-	0.700	4.100	0.600	-	-	-	-	-	NE	NE	NE
AROMATIC HCs (8015/8020)													
Benzene	-	< 0.0004	< 0.0004	< 0.0004	< 0.0004	< 0.0004	< 0.0004	< 0.0004	< 0.0003	< 0.0004	NE	NE	NE
Ethylbenzene	-	< 0.0003	< 0.0003	< 0.0003	< 0.0003	< 0.0003	< 0.0003	< 0.0003	0.0003	< 0.0003	NE	NE	NE
Toluene	-	<0.0005	0.0003	0.0003	0.0004	< 0.0003	< 0.0003	< 0.0003	0.0006	< 0.0003	NE	NE	NE
Xylenes	-	0.0008	< 0.0004	0.0007	0.0007	< 0.0004	< 0.0004	< 0.0004	0.0018	< 0.0004	NE	NE	NE
Gasoline	-	< 0.050	< 0.050	< 0.050	< 0.050	< 0.050	< 0.050	< 0.050	< 0.050	< 0.050	NE	NE	NE
Total Metals													
Antimony (Sb)	<0.03	< 0.03	< 0.03	< 0.03	< 0.03	< 0.03	0.03	< 0.03	< 0.03	< 0.03	0.006	NE	NE
Arsenic (As)	0.19	< 0.05	0.07	< 0.05	< 0.05	0.1	0.09	0.11	0.08	0.08	0.05	0.02	0.036*
Barium (Ba)	0.08	0.20	0.17	0.26	0.51	0.51	0.52	0.19	0.45	0.56	1	NE	NE
Beryllium (Be)	<0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	0.004	NE	NE
Cadmium (Cd)	0.005	< 0.005	0.99	< 0.005	< 0.005	0.013	0.008	0.009	0.013	0.01	0.005	0.01	0.0093*
Chromium (Cr)	<0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	0.05	0.011	0.05*
Cobalt (Co)	0.05	< 0.01	1.5	< 0.01	< 0.01	0.04	0.07	0.11	0.04	0.05	NE	NE	NE
Copper (Cu)	<0.01	< 0.01	0.07	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	1.3*	0.02	NE
Lead (Pb)	<0.05	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05	0.00025**	0.0056	0.0056*
Mercury (Hg)	<0.0005	< 0.0005	< 0.0005	< 0.0005	< 0.0005	< 0.0005	< 0.0005	< 0.0005	< 0.0005	< 0.0005	0.002	0.001	0.000025*
Molybdenum (Mo)	<0.01	< 0.01	< 0.01	< 0.01	< 0.01	0.01	< 0.01	0.01	< 0.01	< 0.01	NE	NE	NE
Nickel (Ni)	0.09	< 0.02	2	< 0.02	< 0.02	< 0.02	< 0.02	0.35	< 0.02	0.15	0.1**	0.0071	0.0071**
Selenium (Se)	<0.07	< 0.07	< 0.07	< 0.07	< 0.07	< 0.07	< 0.07	< 0.07	< 0.07	< 0.07	0.05	NE	NE
Silver (Ag)	<0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	0.1	0.0023	NE
Thallium (Tl)	<0.05	< 0.05	0.11	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05	< 0.05	0.002	NE	NE
Vanadium (V)	0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	< 0.01	NE	NE	NE
Zinc (Zn)	6.2	0.03	1300	0.30	0.45	0.11	0.04	0.05	0.14	0.15	5	0.058	0.058**
Total Dissolved Solids	2,300	9300	6300	720	1100	25000	15000	28000	35000	26000			
Chloride	-	4100	260	290	230	12000	7400	13000	19000	14000			
pH (Standard Units)	5.3	7.9	5.2	7.8	7.0	7.1	6.5	-	6.7	6.6			

Abbreviations and Modifiers:
MCL = Maximum Contaminant Levels for Drinking Water from California Code of Regulations (CCR) Title 22, Section 64431 through 64444
(* Copper = federal action level; ** Lead = Calif. Proposition 65 level; * Silver = Secondary MCL)
PRG = Health Based Preliminary Remedial Goals set by USEPA Region IX - Tap Water scenario.
Basin Plan # = San Francisco Bay Region Water Quality Control Plan issued by California Regional Water Quality Control Board
Basin Plan 1 - Effluent Limitations for Selected Toxic Pollutants Discharged to Surface Waters - Shallow Water Limits given
Basin Plan 2 - Water quality Objectives for Selected Toxic Pollutants for Surface Waters with Salinities Greater than 5 parts per thousand
(* 4-day average, ** 24-hour average)
- = Not Analysed
NE = Not Established
<0.03 = The analyte was not detected at or above the laboratory reporting limit concentration listed

TABLE 5
Petroleum Hydrocarbons Detected in Groundwater
5050, 5051 & 5200 Coliseum Way
(Concentrations Reported in Milligrams per Liter [mg/L])

Sample ID	Date Sampled	TEPH	TPH-D	TPH-O	TPH-G	Benzene	Ethyl-Benzene	Toluene	Total Xylenes
	MCL	--	--	--	--	0.001	0.7	1	10
LF-4	04-Nov-91	NA	NA	NA	0.59	< 0.005	< 0.005	< 0.005	< 0.01
LF-4	24-Mar-98	NA	<0.2	< 0.2	1.1	< 0.0004	< 0.0003	< 0.0003	0.005
LF-4	18-Jun-98	NA	<0.5	< 0.2	0.77	< 0.0004	< 0.0003	< 0.0003	0.0052
LF-4	10-Sep-98	0.470	< 0.06	< 0.2	0.840	< 0.0004	< 0.0003	< 0.0003	0.0042
LF-5	04-Nov-91	NA	NA	NA	NA	< 0.005	< 0.005	< 0.005	< 0.01
LF-5	20-Aug-97	0.65	0.3	0.6	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
LF-5	11-Dec-97	0.43	0.2	0.4	< 0.05	< 0.0004	< 0.0003	0.0003	< 0.0004
LF-5	25-Mar-98	NA	< 0.05	< 0.2	NA	NA	NA	NA	NA
LF-5	18-Jun-98	NA	< 0.05	< 0.2	NA	NA	NA	NA	NA
LF-5	09-Sep-98	< 0.05	< 0.05rl	< 0.2	NA	NA	NA	NA	NA
LF-6	04-Nov-91	NA	NA	NA	NA	< 0.005	< 0.005	< 0.005	< 0.01
LF-7	04-Nov-91	NA	NA	NA	NA	< 0.005	< 0.005	< 0.005	< 0.01
LF-7	24-Mar-98	NA	< 0.05	< 0.2	NA	NA	NA	NA	NA
LF-7	18-Jun-98	NA	< 0.05	< 0.2	NA	NA	NA	NA	NA
LF-7	10-Sep-98	< 0.05	< 0.05	< 0.2	NA	NA	NA	NA	NA
LF-8	28-Oct-93	NA	9.8	NA	1	NA	NA	NA	NA
LF-8	24-May-94	NA	4.5	0.6	0.7	NA	NA	NA	NA
LF-8	23-Sep-94	NA	6.7	<0.2	0.4	NA	NA	NA	NA
LF-8	20-Dec-94	NA	5.6	0.4	0.4	0.003	0.0065	0.0009	0.004
LF-8	15-Mar-95	NA	4.1	0.2	0.3	0.002	0.003	0.0006	0.003
LF-8	09-Jun-95	NA	3.8	<0.2	0.3	0.001	0.003	0.0006	0.003
LF-8	07-Sep-95	NA	4.7	0.3	0.4	0.001	0.003	0.0006	0.003
LF-8	18-Dec-95	NA	3.9	0.4	0.3	0.001	0.003	0.0006	0.003
LF-8	20-Aug-97	4.5	< 4.0	< 2.0	0.12	< 0.0004	0.0009	0.0004	0.0036
LF-8	19-Dec-97	4.6	< 4.0	< 3.0	0.22	0.0019	0.0022	0.0008	0.0033
LF-8	24-Mar-98	NA	< 0.7	< 0.2	0.20	0.0007	0.0019	0.0006	0.0018
LF-8	18-Jun-98	NA	< 2.0	<0.6	0.22	<0.0004	0.0024	0.0006	0.0021
LF-8	10-Sep-98	1.40	< 2.0	< 0.3	0.13	0.0004	0.0016	0.001	0.0013

TABLE 5
Petroleum Hydrocarbons Detected in Groundwater
5050, 5051 & 5200 Coliseum Way
(Concentrations Reported in Milligrams per Liter [mg/L])

Sample ID	Date Sampled	TEPH	TPH-D	TPH-O	TPH-G	Benzene	Ethyl-Benzene	Toluene	Total Xylenes
	MCL	--	--	--	--	0.001	0.7	1	10
LF-9	01-Nov-91	NA	0.2	NA	<0.1	NA	NA	NA	NA
LF-109 (dup)	01-Nov-91	NA	0.2	NA	<0.1	NA	NA	NA	NA
LF-9	23-Sep-94	NA	NA	NA	NA	< 0.005	< 0.005	< 0.005	< 0.01
LF-10	24-Mar-98	NA	<0.6	7.0	< 0.05	< 0.0004	< 0.0003	0.0005	< 0.0004
LF-10	18-Jun-98	NA	<0.2	0.8	< 0.05	< 0.0004	< 0.0003	<0.0003	< 0.0004
LF-10	09-Sep-98	0.09	< 0.06rl	< 0.2	< 0.05	< 0.0004	< 0.0003	<0.0003	< 0.0004
LF-11	28-Oct-93	NA	<0.05	NA	< 0.1	NA	NA	NA	NA
LF-11	19-Dec-97	9.5	<2.0	9.0	< 0.05	0.0004	< 0.0003	0.0004	< 0.0004
LF-11	25-Mar-98	NA	< 0.05	< 0.2	NA	NA	NA	NA	NA
LF-11	17-Jun-98	NA	<0.09	0.7	NA	NA	NA	NA	NA
LF-11	09-Sep-98	0.80	< 0.2rl	0.8	NA	NA	NA	NA	NA
LF-12	19-Dec-97	0.25	<0.1	0.2	<0.05	0.0005	<0.0003	0.0004	<0.0004
LF-13	06-Dec-93	NA	0.5	0.4	0.05	< 0.0005	< 0.0005	< 0.0005	< 0.002
LF-113 (dup)	06-Dec-93	NA	0.6	0.4	0.06	< 0.0005	< 0.0005	< 0.0005	< 0.002
LF-13	20-Aug-97	12.0	< 7.0	7.6	0.06	0.0011	0.0006	<0.0003	0.0005
LF-13	19-Dec-97	5.4	< 3.0	4.0	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
LF-13	24-Mar-98	NA	0.42	0.8	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
LF-13	18-Jun-98	NA	0.25	0.4	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
LF-13	10-Sep-98	0.530	0.200	0.3	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004

TABLE 5
Petroleum Hydrocarbons Detected in Groundwater
5050, 5051 & 5200 Coliseum Way
(Concentrations Reported in Milligrams per Liter [mg/L])

Sample ID	Date Sampled	TEPH	TPH-D	TPH-O	TPH-G	Benzene	Ethyl-Benzene	Toluene	Total Xylenes
	MCL	--	--	--	--	0.001	0.7	1	10
LF-14	21-Sep-94	NA	< 0.3	< 0.2	1.4	NA	NA	NA	NA
LF-14	19-Dec-94	NA	0.65	< 0.2	1	0.001	< 0.0005	0.002	0.012
LF-14	15-Mar-95	NA	0.3	< 0.2	1.2	0.001	< 0.0005	0.0006	0.015
LF-14	08-Sep-95	NA	< 0.05	< 0.2	1.4	0.0009	< 0.0005	0.0007	0.002
LF-14	20-Aug-97	1.2	< 1.0	0.4	1.6	0.0011	< 0.0003	0.0012	0.002
LF-14	19-Dec-97	1.3	< 0.9	0.8	1.2	0.001	< 0.0003	0.0003	< 0.0004
LF-14	25-Mar-98	NA	< 0.3	< 0.2	1.5	0.0011	< 0.0003	0.0009	0.0015
LF-14	17-Jun-98	NA	<0.5	< 0.2	1.4	0.001	< 0.0003	0.0007	0.0013
LF-14	10-Sep-98	0.310	< 0.3	< 0.2	1.70	0.0009	< 0.0003	0.0012	0.0015
LF-15	25-Mar-98	NA	< 0.05	< 0.2	NA	NA	NA	NA	NA
LF-15	17-Jun-98	NA	0.12	< 0.2	NA	NA	NA	NA	NA
LF-15	11-Sep-98	< 0.05	< 0.05rl	< 0.2	NA	NA	NA	NA	NA
LF-16	20-Aug-97	0.41	< 0.3	0.3	< 0.05	0.0006	< 0.0003	< 0.0003	< 0.0004
LF-16	19-Dec-97	0.41	< 0.2	0.3	< 0.05	0.0008	< 0.0003	0.0003	< 0.0004
LF-16	25-Mar-98	NA	< 0.07	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
LF-16	17-Jun-98	NA	<0.2	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
LF-16	10-Sep-98	< 0.05	< 0.05	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
LFMW-1	24-Mar-98	NA	< 0.05	< 0.2	NA	NA	NA	NA	NA
LFMW-1	17-Jun-98	NA	<0.05	<0.2	NA	NA	NA	NA	NA
LFMW-2	05-Nov-91	NA	< 0.05	NA	NA	< 0.0003	< 0.0003	< 0.0003	<0.01
LFMW-2	24-Mar-98	NA	< 0.05	< 0.2	NA	NA	NA	NA	NA
LFMW-2	18-Jun-98	NA	< 0.05	< 0.2	NA	NA	NA	NA	NA
LFMW-3	19-Dec-97	0.66	< 0.3	0.5	< 0.05	0.0009	< 0.0003	0.0008	0.0005
LFMW-3	24-Mar-98	NA	< 0.05	< 0.2	NA	NA	NA	NA	NA
LFMW-3	18-Jun-98	NA	< 0.05	< 0.2	NA	NA	NA	NA	NA
LFMW-3	09-Sep-98	0.08	< 0.05rl	< 0.2	NA	NA	NA	NA	NA

TABLE 5
Petroleum Hydrocarbons Detected in Groundwater
5050, 5051 & 5200 Coliseum Way
(Concentrations Reported in Milligrams per Liter [mg/L])

Sample ID	Date Sampled	TEPH	TPH-D	TPH-O	TPH-G	Benzene	Ethyl-Benzene	Toluene	Total Xylenes
	MCL	--	--	--	--	0.001	0.7	1	10
MWA-1	27-Apr-98	NA	< 0.08	< 0.2	0.14	0.0009	< 0.0003	0.0004	< 0.0004
MWA-1	19-Jun-98	NA	<0.2	< 0.2	0.13	0.0008	< 0.0003	0.0003	<0.0004
MWA-1	11-Sep-98	0.38	< 0.4rl	< 0.2	0.25	0.0011	< 0.0003	0.0010	<0.0004
MWA-2	27-Apr-98	NA	< 0.2	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
MWA-2	19-Jun-98	NA	<0.1	< 0.2	< 0.05	< 0.0004	0.0004	0.0004	0.0006
MWA-2	10-Sep-98	0.18	< 0.2rl	< 0.2	< 0.05	< 0.0004	0.0005	0.0008	0.0005
MW-6	27-Apr-98	NA	< 0.2	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
MW-6	19-Jun-98	NA	<0.05	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
MW-6	11-Sep-98	0.11	< 0.08rl	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
CW-1	19-Aug-97	0.45	< 0.3	0.3	< 0.05	0.0006	< 0.0003	< 0.0003	0.0024
CW-1	11-Dec-97	0.55	< 0.2	0.4	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
CW-1	25-Mar-98	NA	< 0.05	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
CW-1	19-Jun-98	NA	< 0.05	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
CW-1	10-Sep-98	0.13	< 0.09	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
CW-2	19-Aug-97	0.57	< 0.4	0.4	< 0.05	0.0008	< 0.0003	< 0.0003	0.0004
CW-2	11-Dec-97	1.1	< 0.3	0.8	< 0.05	0.0008	< 0.0003	< 0.0003	< 0.0004
CW-2	25-Mar-98	NA	< 0.3	< 0.2	< 0.05	0.0006	< 0.0003	< 0.0003	< 0.0004
CW-2	19-Jun-98	NA	<0.2	<0.2	<0.05	0.0005	< 0.0003	< 0.0003	< 0.0004
CW-2	10-Sep-98	0.12	< 0.08	<0.2	<0.05	0.0005	< 0.0003	< 0.0003	< 0.0004
CW-3	19-Aug-97	1.1	< 1.0	0.3	< 0.25	0.0044	< 0.0015	0.0021	0.0043
CW-3*	11-Dec-97	1.0	< 1.0	< 0.2	< 0.05	0.0049	< 0.0003	< 0.0003	< 0.0004
CW-3	25-Mar-98	NA	< 0.2	< 0.2	< 0.05	0.0039	0.0003	0.0008	0.0015
CW-3	19-Jun-98	NA	<0.05	< 0.2	< 0.05	0.0042	< 0.0003	< 0.0003	< 0.0004
CW-3	10-Sep-98	0.28	< 0.3	< 0.2	< 0.05	0.0051	< 0.0003	< 0.0003	< 0.0004

TABLE 5
Petroleum Hydrocarbons Detected in Groundwater
5050, 5051 & 5200 Coliseum Way
(Concentrations Reported in Milligrams per Liter [mg/L])

Sample ID	Date Sampled	TEPH	TPH-D	TPH-O	TPH-G	Benzene	Ethyl-Benzene	Toluene	Total Xylenes
	MCL	--	--	--	--	0.001	0.7	1	10
CW-4	19-Aug-97	71.0	< 70.0	< 20.0	10.00	0.140	0.210	0.092	0.510
CW-4	11-Dec-97	50.0	< 50.0	< 20.0	11.00	0.087	0.190	0.066	0.510
CW-4	25-Mar-98	NA	< 20	< 3.0	15.00	0.060	0.150	0.063	0.440
CW-4	19-Jun-98	NA	<20	<6.0	7.90	0.078	0.140	0.059	0.380
CW-4	10-Sep-98	9.10	< 9.0	< 2.0	7.60	0.110	0.190	0.066	0.480
CW-5	19-Aug-97	81.0	< 70.0	< 30.0	15.00	0.120	0.160	0.240	0.450
CW-5*	11-Dec-97	78.0	< 70.0	< 30.0	18.00	0.087	0.140	0.180	0.400
CW-5	25-Mar-98	NA	< 20	< 3.0	22.00	0.140	0.160	0.250	0.440
CW-5	19-Jun-98	NA	<2000	<500	9.80	0.130	0.140	0.210	0.400
CW-5	10-Sep-98	29.0	< 30.0	< 5.0	13.00	0.150	0.180	0.270	0.500
CW-7-D3	29-Sep-98		< 0.050	< 0.500					
CW-7-D4	29-Sep-98				< 0.05	< 0.00050	< 0.00050	< 0.00050	< 0.00050
CW-8	11-Sep-98	< 0.05	< 0.05rl	< 0.2	< 0.05	< 0.0004	0.0004	0.0007	0.0004
CW-13	11-Sep-98	< 0.05	< 0.05rl	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004

Notes:
TEPH = Total Extractable Petroleum Hydrocarbons
TPH-D = Total Petroleum Hydrocarbons as Diesel
TPH-O = Total Petroleum Hydrocarbons as Motor Oil
TPH-G = Total Petroleum Hydrocarbons as Gasoline
MCL = Maximum Contaminant Levels for Drinking Water (CCR Title 22, Sections 64431 and 64444)
-- = Not established
"<" analytes not detected at reporting limit
"NA" not analyzed
(dup) = Duplicate Sample Collected by LFR
* = Field error resulted in switched well numbers (CW-3 & CW-5)
rl = TPH-D laboratory surrogate recovery low

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Antimony (Sb)	Arsenic (As)	Barium (Ba)	Beryllium (Be)	Cadmium (Cd)	Chromium (Cr)	Cobalt (Co)	Copper (Cu)	Lead (Pb)	Mercury (Hg)
		MCL		0.006	0.05	1	0.004	0.005	0.05	--	1.3[+]	0.015[++]	0.002
5050	LF-1		4-Nov-91	< 0.2	0.004	0.046	0.11	130	< 0.01	5.7	1.9	0.5	< 0.0003
5050	LF-1		27-Oct-92	< 2	0.007	< 0.05	< 0.2	57	< 1	4.1	1	< 4	< 0.0003
5050	LF-1		5-Mar-93	< 2	0.22	< 0.05	< 0.2	43	< 1	3.6	0.47	< 4	< 0.0003
5050	LF-1	(Dup)	5-Mar-93	< 2	0.26	< 0.05	< 0.2	44	< 1	3.9	0.5	< 4	< 0.0003
5050	LF-1		25-May-93	< 2	0.12	< 0.05	< 0.2	40	< 1	4.7	1	< 0.4	< 0.0003
5050	LF-1	(Dup)	25-May-93	< 0.1	0.36	< 0.05	0.02	9.6	< 0.05	0.81	0.15	0.3	< 0.0003
5050	LF-1		31-Aug-93	< 2	0.072	< 0.05	< 0.2	32	< 1	2.3	< 1	< 4	< 0.0003
5050	LF-1	(Dup)	31-Aug-93	< 2	0.66	< 0.05	< 0.2	13	< 1	1	< 1	< 4	< 0.0003
5050	LF-1		26-Oct-93	< 0.2	0.4	< 0.5	0.02	15	0.6	1.3	0.9	0.4	< 0.0003
5050	LF-101	(Dup)	26-Oct-93	< 0.4	1.3	< 1.0	< 0.04	12	< 0.2	1	0.3	< 0.8	< 0.0003
5050	LF-1		18-Feb-94	< 0.2	0.57	< 0.5	< 0.02	2.6	< 0.1	0.33	< 0.1	0.8	< 0.0002
5050	LF-1		25-May-94	< 3	0.49	< 0.05	< 0.2	7.9	< 1	0.9	< 1	0.79	< 0.0002
5050	LF-1		22-Sep-94	< 0.2	0.77	< 0.05	< 0.02	6.1	< 0.1	0.67	< 0.1	0.91	< 0.0002
5050	LF-1		20-Dec-94	< 0.2	0.65	< 0.5	< 0.02	4.2	< 0.1	0.45	< 0.1	0.6	< 0.0002
5050	LF-1		15-Mar-95	< 0.2	0.39	< 0.1	< 0.02	8.5	< 0.1	0.81	< 0.1	0.41	< 0.0002
5050	LF-1		8-Jun-95	< 2	0.33	< 1	< 0.2	11	< 1	0.9	< 1	1.5	< 0.0002
5050	LF-101	(Dup)	8-Jun-95	< 2	0.41	< 1	< 0.2	23	< 1	1.8	< 1	0.76	< 0.0002
5050	LF-1		7-Sep-95	< 0.2	0.30	< 0.1	0.03	23	< 0.1	2.0	0.5	0.67	< 0.0002
5050	LF-1		19-Dec-95	< 2	0.34	< 1	< 0.3	12	< 1	1.1	< 1	0.26	< 0.0002
5050	LF-1		20-Aug-97	< 0.03	1.4	0.06	< 0.005	2.2	< 0.01	0.15	0.08	< 0.05	< 0.0005
5050	LF-1		11-Dec-97	< 0.03	1.1	0.32	0.005	4.9	< 0.01	0.59	0.06	0.41	< 0.0005
5050	LF-1		25-Mar-98	< 0.03	< 0.05	< 0.01	< 0.005	6.8	< 0.01	< 0.01	< 0.03	< 0.05	< 0.0005
5050	LF-1		17-Jun-98	< 0.03	0.50	0.14	< 0.005	8.9	< 0.01	0.92	0.06	0.84	< 0.0005
5050	LF-1		9-Sep-98	< 0.03	0.60	0.13	0.009	8	< 0.01	0.83	0.12	0.57	< 0.0005

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Molybdenum (Mo)	Nickel (Ni)	Selenium (Se)	Silver (Ag)	Thallium (Tl)	Vanadium (V)	Zinc (Zn)	TDS	pH (SU)	Chloride
		MCL		--	0.1	0.05	0.1[+]	0.002	--	5			
5050	LF-1		4-Nov-91	0.11	20	< 0.004	0.054	< 1	< 0.005	40000	33,000		
5050	LF-1		27-Oct-92	< 1	19	0.027	< 0.5	< 10	< 0.5	16,000			
5050	LF-1		5-Mar-93	< 1	11	< 0.01	< 0.5	< 10	< 0.5	14,000			
5050	LF-1	(Dup)	5-Mar-93	< 1	11	< 0.01	< 0.5	< 10	< 0.5	14,000			
5050	LF-1		25-May-93	< 1	16	< 0.004	< 0.5	< 10	< 0.5	19,000			
5050	LF-1	(Dup)	25-May-93	< 0.05	3.0	< 0.004	< 0.03	< 0.5	< 0.03	4,700			
5050	LF-1		31-Aug-93	< 1	9.0	< 0.004	< 0.5	< 10	< 0.5	13,000			
5050	LF-1	(Dup)	31-Aug-93	< 1	5	< 0.004	< 0.5	< 10	< 0.5	7,200			
5050	LF-1		26-Oct-93	< 0.1	4.9	< 0.04	< 0.5	< 1	< 0.05	7,100		3.94	
5050	LF-101	(Dup)	26-Oct-93	< 0.2	3.7	< 0.08	< 0.1	< 2	< 0.1	5,900		3.94	
5050	LF-1		18-Feb-94	< 0.1	1.4	< 0.004	< 0.05	< 1	< 0.05	2,600		4.25	
5050	LF-1		25-May-94	< 1	3	< 0.004	< 0.05	< 10	< 0.5	5,000			
5050	LF-1		22-Sep-94	< 0.1	2.5	< 0.02	< 0.05	< 1	< 0.05	4,100			
5050	LF-1		20-Dec-94	< 0.1	1.7	< 0.04	< 0.05	< 1	< 0.05	3,700			
5050	LF-1		15-Mar-95	< 0.1	3.4	< 0.004	< 0.05	< 0.5	< 0.05	4,700			
5050	LF-1		8-Jun-95	< 1	4	< 0.02	< 0.5	< 5	< 0.5	6,500			
5050	LF-101	(Dup)	8-Jun-95	< 1	7	< 0.02	< 0.5	< 5	< 0.5	10,000			
5050	LF-1		7-Sep-95	< 0.1	7.3	< 0.1	< 0.05	0.6	< 0.05	10,000			
5050	LF-1		19-Dec-95	< 1	4	0.036	< 0.5	< 5	< 0.5	6,200		3.96	
5050	LF-1		20-Aug-97	< 0.01	0.49	< 0.05	< 0.01	< 0.05	< 0.01	1,100		4.16	
5050	LF-1		11-Dec-97	< 0.01	1.6	< 0.05	< 0.01	< 0.05	0.04	3,700		4.23	
5050	LF-1		25-Mar-98	< 0.01	0.80	< 0.07	< 0.01	< 0.05	< 0.01	5,200	24,000	4.02	
5050	LF-1		17-Jun-98	< 0.01	3.00	< 0.07	< 0.01	0.15	0.05	6,100	26,000	4.66	
5050	LF-1		9-Sep-98	< 0.01	2.8	0.09	< 0.01	0.08	0.04	5,700	23,000	4.12	

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Antimony (Sb)	Arsenic (As)	Barium (Ba)	Beryllium (Be)	Cadmium (Cd)	Chromium (Cr)	Cobalt (Co)	Copper (Cu)	Lead (Pb)	Mercury (Hg)
		MCL		0.006	0.05	1	0.004	0.005	0.05	--	1.3^{+}	0.015^{++}	0.002
5050	LF-2		4-Nov-91	< 0.02	0.028	0.026	< 0.001	0.009	< 0.01	0.18	0.008	< 0.005	< 0.0003
5050	LF-2		27-Oct-92	< 0.02	0.007	< 0.05	< 0.002	0.006	< 0.01	0.12	0.02	< 0.04	< 0.0003
5050	LF-2		4-Mar-93	< 0.02	0.003	< 0.05	< 0.002	< 0.005	< 0.01	0.1	< 0.01	< 0.04	< 0.0003
5050	LF-2		24-May-93	< 0.02	0.005	< 0.05	< 0.002	< 0.005	< 0.01	0.061	< 0.01	< 0.04	< 0.0003
5050	LF-2		31-Aug-93	< 0.02	5	< 0.05	0.003	0.021	< 0.01	0.016	< 0.01	< 0.04	< 0.0003
5050	LF-2		25-Oct-93	< 0.02	0.004	< 0.05	< 0.002	0.009	< 0.01	0.055	0.02	< 0.04	< 0.0003
5050	LF-2		16-Feb-94	< 0.02	< 0.002	< 0.05	< 0.002	< 0.005	< 0.1	< 0.005	< 0.01	< 0.04	< 0.0002
5050	LF-2		24-May-94	< 0.005	< 0.002	0.02	< 0.0005	< 0.001	< 0.002	0.037	0.003	< 0.003	< 0.0002
5050	LF-2		22-Sep-94	0.007	< 0.002	0.02	< 0.0005	< 0.001	< 0.002	0.038	0.006	< 0.005	< 0.0002
5050	LF-2		20-Dec-94	< 0.005	< 0.002	0.02	< 0.0005	< 0.001	< 0.002	0.04	0.006	< 0.002	< 0.0002
5050	LF-2		15-Mar-95	< 0.004	< 0.002	0.017	< 0.0005	< 0.001	< 0.002	0.033	0.004	< 0.002	< 0.0002
5050	LF-102	(Dup)	16-Mar-95	< 0.004	< 0.002	0.017	< 0.0005	< 0.001	< 0.002	0.036	0.005	< 0.002	< 0.0002
5050	LF-2		7-Jun-95	< 0.004	< 0.002	0.017	< 0.0005	< 0.001	< 0.002	0.037	0.006	< 0.002	< 0.0002
5050	LF-2		7-Sep-95	< 0.004	< 0.002	0.019	< 0.0005	0.001	< 0.002	0.04	0.004	< 0.002	< 0.0002
5050	LF-122	(Dup)	7-Sep-95	< 0.004	< 0.002	0.020	< 0.0005	< 0.001	< 0.002	0.042	0.005	< 0.002	< 0.0002
5050	LF-2		19-Dec-95	< 0.004	< 0.002	0.020	< 0.0005	< 0.001	< 0.002	0.043	0.002	< 0.002	< 0.0002
5050	LF-2		20-Aug-97	< 0.03	< 0.05	0.03	< 0.005	0.007	< 0.01	0.04	0.02	< 0.05	< 0.0005
5050	LF-2		19-Dec-97	< 0.03	< 0.05	0.02	< 0.005	< 0.005	0.08	0.04	< 0.01	< 0.05	< 0.0005
5050	LF-2		24-Mar-98	< 0.03	< 0.05	0.02	< 0.005	< 0.005	<0.01	0.05	< 0.01	< 0.05	< 0.0005
5050	LF-2		18-Jun-98	< 0.03	< 0.05	0.11	< 0.005	< 0.005	<0.01	0.05	< 0.01	< 0.05	< 0.0005
5050	LF-2	tphdrl	10-Sep-98	< 0.03	< 0.05	0.07	< 0.005	< 0.005	<0.01	0.04	< 0.01	< 0.05	< 0.0005

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Molybdenum (Mo)	Nickel (Ni)	Selenium (Se)	Silver (Ag)	Thallium (Tl)	Vanadium (V)	Zinc (Zn)	TDS	pH (SU)	Chloride
		MCL		--	0.1	0.05	0.1[+]	0.002	--	5			
5050	LF-2		4-Nov-91	< 0.01	0.52	< 0.004	< 0.002	< 0.1	< 0.005	4.2	3,700		
5050	LF-2		27-Oct-92	< 0.01	0.22	0.005	0.006	< 0.1	< 0.005	3.3			
5050	LF-2		4-Mar-93	< 0.01	0.12	< 0.004	< 0.005	< 0.1	< 0.005	1.9			
5050	LF-2		24-May-93	< 0.01	0.08	< 0.004	< 0.005	< 0.1	< 0.005	1.4			
5050	LF-2		31-Aug-93	0.14	< 0.01	< 0.004	< 0.005	< 0.1	< 0.005	8.6			
5050	LF-2		25-Oct-93	< 0.01	0.11	< 0.004	< 0.005	< 0.1	< 0.005	1.9		6.21	
5050	LF-2		16-Feb-94	< 0.01	0.04	< 0.004	< 0.005	< 0.1	< 0.005	0.41		6.35	
5050	LF-2		24-May-94	< 0.002	0.024	< 0.004	< 0.001	< 0.02	< 0.001	0.3			
5050	LF-2		22-Sep-94	< 0.002	0.038	< 0.004	< 0.001	< 0.02	0.001	0.59			
5050	LF-2		20-Dec-94	< 0.002	0.03	< 0.004	0.001	< 0.02	< 0.001	0.39			
5050	LF-2		15-Mar-95	< 0.002	0.031	< 0.004	< 0.001	< 0.01	0.002	0.49			
5050	LF-102	(Dup)	16-Mar-95	< 0.002	0.024	< 0.004	< 0.001	< 0.01	0.001	0.37			
5050	LF-2		7-Jun-95	< 0.002	0.04	< 0.004	< 0.001	< 0.01	0.002	0.62			
5050	LF-2		7-Sep-95	< 0.002	0.032	< 0.004	< 0.001	< 0.01	< 0.001	0.50			
5050	LF-122	(Dup)	7-Sep-95	< 0.002	0.027	< 0.004	< 0.001	< 0.01	< 0.001	0.50			
5050	LF-2		19-Dec-95	< 0.002	0.045	< 0.004	< 0.001	< 0.01	0.001	0.74		6.21	
5050	LF-2		20-Aug-97	< 0.01	0.04	< 0.05	< 0.01	< 0.05	< 0.01	3.8		6.47	
5050	LF-2		19-Dec-97	< 0.01	0.05	< 0.05	< 0.01	< 0.05	< 0.01	0.43		6.10	
5050	LF-2		24-Mar-98	< 0.01	0.03	< 0.07	< 0.01	< 0.05	< 0.01	0.66	2,900	6.18	
5050	LF-2		18-Jun-98	< 0.01	0.04	< 0.07	< 0.01	< 0.05	< 0.01	0.64	2,800	6.35	
5050	LF-2	tphdrl	10-Sep-98	< 0.01	0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.62	2,900	6.30	

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Antimony (Sb)	Arsenic (As)	Barium (Ba)	Beryllium (Be)	Cadmium (Cd)	Chromium (Cr)	Cobalt (Co)	Copper (Cu)	Lead (Pb)	Mercury (Hg)
		MCL		0.006	0.05	1	0.004	0.005	0.05	--	1.3^{+}	0.015^{++}	0.002
5050	LF-3		4-Nov-91	< 0.02	3.1	0.077	0.001	< 0.005	< 0.01	0.016	< 0.004	< 0.005	< 0.0003
5050	LF-3		27-Oct-92	< 0.02	3.6	0.11	0.004	0.013	< 0.01	0.029	< 0.01	< 0.04	< 0.0003
5050	LF-3		4-Mar-93	< 0.02	4.9	0.07	0.003	0.012	< 0.01	0.023	< 0.01	< 0.04	< 0.0003
5050	LF-3		25-May-93	< 0.02	3.4	0.11	< 0.002	0.04	< 0.01	0.01	< 0.01	< 0.04	< 0.0003
5050	LF-3		31-Aug-93	< 0.02	4.9	< 0.05	0.003	0.023	< 0.01	0.019	< 0.01	< 0.04	< 0.0003
5050	LF-3		25-Oct-93	< 0.02	7.3	0.08	< 0.002	0.005	< 0.01	0.013	< 0.01	< 0.04	< 0.0003
5050	LF-3		16-Feb-94	< 0.02	3.4	0.1	< 0.002	< 0.005	< 0.01	0.012	< 0.01	< 0.04	< 0.0002
5050	LF-3		25-May-94	< 0.005	2.4	0.08	0.0009	< 0.001	0.002	0.009	< 0.002	< 0.003	< 0.0002
5050	LF-103	(Dup)	25-May-94	< 0.005	2.8	0.08	0.0013	< 0.001	< 0.002	0.011	< 0.002	< 0.003	< 0.0002
5050	LF-3		23-Sep-94	< 0.005	2.2	0.05	0.0014	< 0.001	0.002	0.011	< 0.002	< 0.005	< 0.0002
5050	LF-103	(Dup)	23-Sep-94	< 0.005	2.3	0.06	0.001	< 0.001	0.004	0.009	0.007	< 0.005	< 0.0002
5050	LF-3		20-Dec-94	< 0.005	3.6	0.09	0.0013	< 0.001	0.005	0.012	0.026	< 0.002	< 0.0002
5050	LF-103	(Dup)	20-Dec-94	< 0.005	4.5	0.04	0.0017	< 0.001	0.003	0.014	0.003	< 0.002	< 0.0002
5050	LF-3		15-Mar-95	< 0.004	2.8	0.15	0.001	< 0.001	0.004	0.008	0.003	< 0.002	< 0.0002
5050	LF-3		7-Jun-95	< 0.004	5.6	0.057	0.0018	< 0.001	0.003	0.014	0.003	< 0.002	< 0.0002
5050	LF-3		7-Sep-95	< 0.004	3.0	0.13	0.0017	< 0.001	0.004	0.011	< 0.002	< 0.002	< 0.0002
5050	LF-3		18-Dec-95	< 0.004	4.2	0.06	0.002	0.015	0.004	0.013	< 0.002	< 0.005	< 0.0002
5050	LF-103	(Dup)	18-Dec-95	< 0.004	4.2	0.12	0.001	0.011	0.005	0.009	< 0.002	< 0.005	< 0.0002
5050	LF-3		20-Aug-97	< 0.03	3.3	0.14	< 0.005	< 0.005	< 0.01	0.02	< 0.01	< 0.05	< 0.0005
5050	LF-3		19-Dec-97	< 0.03	3.2	0.06	< 0.005	< 0.005	0.10	0.02	< 0.01	< 0.05	< 0.0005
5050	LF-3		25-Mar-98	< 0.03	0.77	0.08	< 0.005	< 0.005	< 0.01	< 0.01	< 0.03	< 0.05	< 0.0005
5050	LF-3		18-Jun-98	< 0.03	0.18	0.07	< 0.005	< 0.005	< 0.01	0.02	< 0.01	< 0.05	< 0.0005
5050	LF-3	tphdrl	10-Sep-98	< 0.03	0.30	0.09	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-4		4-Nov-91	0.03	0.026	0.082	< 0.001	< 0.005	< 0.01	< 0.005	< 0.004	< 0.005	< 0.0003
5050	LF-4		27-Oct-92	< 0.02	0.034	< 0.05	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0003
5050	LF-4		4-Mar-93	0.02	0.017	0.11	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0003
5050	LF-4		24-May-93	< 0.02	0.013	0.22	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0003
5050	LF-4		31-Aug-93	< 0.02	0.052	0.08	< 0.002	< 0.005	< 0.01	0.006	< 0.01	< 0.04	< 0.0003
5050	LF-4		25-Oct-93	< 0.02	0.014	0.12	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0003
5050	LF-4		16-Feb-94	< 0.02	0.008	0.29	< 0.002	< 0.005	< 0.01	0.006	< 0.01	< 0.04	< 0.0002
5050	LF-4		22-Sep-94	0.007	0.005	0.19	< 0.0005	0.001	< 0.002	0.003	0.003	< 0.005	< 0.0002
5050	LF-4		15-Mar-95	< 0.004	0.008	0.34	< 0.0005	0.001	< 0.002	0.005	< 0.002	< 0.002	< 0.0002
5050	LF-4		7-Sep-95	< 0.004	0.012	0.15	< 0.0005	0.001	< 0.002	0.004	< 0.002	< 0.002	< 0.0002
5050	LF-4		24-Mar-98	< 0.03	< 0.05	0.45	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-4		18-Jun-98	< 0.03	< 0.05	0.47	< 0.005	< 0.005	< 0.01	< 0.01	0.02	< 0.05	< 0.0005
5050	LF-4	tphdrl	10-Sep-98	< 0.03	< 0.05	0.33	< 0.005	< 0.005	< 0.01	< 0.01	<0.01	< 0.05	< 0.0005

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Molybdenum (Mo)	Nickel (Ni)	Selenium (Se)	Silver (Ag)	Thallium (Tl)	Vanadium (V)	Zinc (Zn)	TDS	pH (SU)	Chloride
		MCL		--	0.1	0.05	0.1[+]	0.002	--	5			
5050	LF-3		4-Nov-91	0.16	0.012	< 0.004	< 0.002	< 0.1	0.006	3.1	3,100		
5050	LF-3		27-Oct-92	0.22	0.02	0.018	< 0.005	< 0.1	< 0.005	12			
5050	LF-3		4-Mar-93	0.18	0.04	< 0.02	< 0.005	< 0.1	< 0.005	15			
5050	LF-3		25-May-93	0.13	0.01	< 0.004	< 0.005	< 0.1	< 0.005	5.8			
5050	LF-3		31-Aug-93	0.15	0.01	< 0.004	< 0.005	< 0.1	< 0.005	8.6			
5050	LF-3		25-Oct-93	0.13	0.02	< 0.02	< 0.005	< 0.1	< 0.005	6.2		6.45	
5050	LF-3		16-Feb-94	0.11	0.01	< 0.01	< 0.005	< 0.1	< 0.005	5		6.58	
5050	LF-3		25-May-94	0.091	0.006	< 0.02	< 0.001	< 0.02	< 0.001	4.1			
5050	LF-103	(Dup)	25-May-94	0.11	0.008	< 0.02	0.001	< 0.02	< 0.001	5.2			
5050	LF-3		23-Sep-94	0.11	0.008	< 0.2	< 0.001	< 0.02	0.004	5.5			
5050	LF-103	(Dup)	23-Sep-94	0.095	0.007	< 0.2	< 0.001	< 0.02	0.003	4.1			
5050	LF-3		20-Dec-94	0.11	0.011	< 0.04	< 0.001	< 0.02	0.012	6.2			
5050	LF-103	(Dup)	20-Dec-94	0.13	0.011	< 0.04	< 0.001	0.02	0.01	8.5			
5050	LF-3		15-Mar-95	0.086	0.007	< 0.04	< 0.001	< 0.01	0.011	4.3			
5050	LF-3		7-Jun-95	0.13	0.012	< 0.04	< 0.001	< 0.01	0.013	9.9			
5050	LF-3		7-Sep-95	0.12	0.008	< 0.2	< 0.001	0.02	0.013	5.4			
5050	LF-3		18-Dec-95	0.13	0.012	0.019	< 0.001	< 0.01	0.01	8.4			
5050	LF-103	(Dup)	18-Dec-95	0.098	0.01	< 0.02	< 0.001	< 0.01	0.011	5.1		6.55	
5050	LF-3		20-Aug-97	0.11	< 0.02	< 0.05	< 0.01	< 0.05	< 0.01	6.1		6.43	
5050	LF-3		19-Dec-97	0.11	0.05	< 0.05	< 0.01	< 0.05	< 0.01	7.3		6.21	
5050	LF-3		25-Mar-98	0.06	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	6.6	2,800	6.51	
5050	LF-3		18-Jun-98	0.08	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	12	3,200	6.48	
5050	LF-3	tphdrl	10-Sep-98	0.08	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	3.7	2,800	6.43	
5050	LF-4		4-Nov-91	< 0.01	0.013	< 0.004	< 0.002	< 0.1	0.01	0.034	2,600		
5050	LF-4		27-Oct-92	< 0.01	0.03	< 0.004	< 0.005	< 0.1	< 0.005	0.012			
5050	LF-4		4-Mar-93	< 0.01	0.05	< 0.004	< 0.005	< 0.1	0.008	0.04			
5050	LF-4		24-May-93	< 0.01	0.03	< 0.004	< 0.005	< 0.1	< 0.005	0.035			
5050	LF-4		31-Aug-93	< 0.01	0.04	< 0.004	< 0.005	< 0.1	0.009	0.038			
5050	LF-4		25-Oct-93	< 0.01	0.04	< 0.004	< 0.005	< 0.1	0.015	0.068		6.79	
5050	LF-4		16-Feb-94	< 0.01	0.04	< 0.004	< 0.005	< 0.1	< 0.005	0.05		6.84	
5050	LF-4		22-Sep-94	< 0.002	0.037	< 0.004	< 0.001	< 0.02	0.007	0.067			
5050	LF-4		15-Mar-95	< 0.002	0.037	< 0.004	< 0.001	< 0.01	0.002	0.064			
5050	LF-4		7-Sep-95	< 0.002	0.048	< 0.004	< 0.001	< 0.01	0.002	0.24			
5050	LF-4		24-Mar-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.11	1,500	6.67	
5050	LF-4		18-Jun-98	< 0.01	0.05	< 0.07	< 0.01	< 0.05	< 0.01	0.34	1,800	6.79	
5050	LF-4	tphdrl	10-Sep-98	< 0.01	0.04	< 0.07	< 0.01	< 0.05	< 0.01	0.12	1,500	6.61	

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Antimony (Sb)	Arsenic (As)	Barium (Ba)	Beryllium (Be)	Cadmium (Cd)	Chromium (Cr)	Cobalt (Co)	Copper (Cu)	Lead (Pb)	Mercury (Hg)
		MCL		0.006	0.05	1	0.004	0.005	0.05	--	1.3[+]	0.015[++]	0.002
5050	LF-5		4-Nov-91	< 0.02	< 0.002	0.018	< 0.001	0.049	< 0.01	0.03	< 0.005	< 0.005	0.0004
5050	LF-5		27-Oct-92	< 0.02	0.005	< 0.05	< 0.002	0.24	< 0.01	1.4	< 0.01	< 0.04	< 0.0003
5050	LF-5		4-Mar-93	< 0.02	< 0.005	< 0.05	< 0.002	0.21	< 0.01	1.1	< 0.01	< 0.04	< 0.0003
5050	LF-5		25-May-93	< 0.02	< 0.002	< 0.05	< 0.002	0.17	< 0.01	0.84	< 0.01	< 0.04	< 0.0003
5050	LF-5		31-Aug-93	< 0.02	0.02	< 0.05	< 0.002	0.25	< 0.01	1.3	< 0.01	< 0.04	< 0.0003
5050	LF-5		26-Oct-93	< 0.02	0.052	< 0.05	< 0.002	0.28	< 0.01	1.4	0.01	0.07	< 0.0003
5050	LF-5		16-Feb-94	< 0.02	< 0.02	< 0.05	< 0.002	0.16	< 0.01	0.95	< 0.01	< 0.04	< 0.0002
5050	LF-5		24-May-94	< 0.005	< 0.005	0.01	< 0.0005	0.14	< 0.002	0.71	< 0.002	< 0.01	< 0.0002
5050	LF-5		21-Sep-94	< 0.005	< 0.01	0.01	< 0.0005	0.17	0.003	0.81	0.003	< 0.01	< 0.0002
5050	LF-5		19-Dec-94	< 0.005	< 0.01	0.01	< 0.0005	0.25	0.003	1.2	0.004	< 0.008	< 0.0002
5050	LF-5		14-Mar-95	< 0.004	< 0.02	0.013	< 0.0005	0.11	0.004	0.61	0.003	< 0.01	< 0.0002
5050	LF-5		7-Jun-95	< 0.004	< 0.01	0.015	< 0.0005	0.31	0.006	1.5	0.005	< 0.02	< 0.0002
5050	LF-5		7-Sep-95	< 0.004	< 0.005	0.014	< 0.0005	0.31	0.006	1.5	0.005	< 0.01	< 0.0002
5050	LF-5		18-Dec-95	< 0.004	< 0.005	0.017	< 0.0005	0.2	0.004	0.99	0.002	< 0.005	< 0.0002
5050	LF-5		20-Aug-97	< 0.03	0.06	0.02	< 0.005	0.26	0.01	1.3	< 0.01	< 0.05	< 0.0005
5050	LF-5		11-Dec-97	< 0.03	0.06	0.21	< 0.005	0.24	< 0.01	1.1	< 0.01	< 0.05	< 0.0005
5050	LF-5		25-Mar-98	< 0.03	< 0.05	0.05	< 0.005	0.062	< 0.01	0.21	< 0.03	< 0.05	< 0.0005
5050	LF-5		18-Jun-98	< 0.03	0.12	0.26	<0.005	1.2	0.06	6.5	0.02	< 0.05	< 0.0005
5050	LF-5		9-Sep-98	< 0.03	< 0.05	0.08	<0.005	0.19	< 0.01	0.76	< 0.01	< 0.05	< 0.0005
5050	LF-6		5-Nov-91	< 0.02	0.008	0.019	< 0.001	0.079	< 0.01	0.58	< 0.005	0.009	0.0009
5050	LF-6		27-Oct-92	< 0.02	0.022	< 0.05	< 0.002	0.17	< 0.01	1.6	< 0.01	< 0.04	< 0.0003
5050	LF-6		4-Mar-93	< 0.02	0.007	< 0.05	0.003	0.13	< 0.01	1.2	< 0.01	< 0.04	< 0.0003
5050	LF-6		24-May-93	< 0.02	< 0.002	< 0.05	< 0.002	0.13	< 0.01	0.97	0.01	< 0.04	< 0.0003
5050	LF-6		31-Aug-93	< 0.02	0.014	< 0.05	0.003	0.13	< 0.01	1	0.01	< 0.04	< 0.0003
5050	LF-6		26-Oct-93	< 0.02	< 0.002	< 0.05	0.003	0.15	< 0.01	1	0.02	< 0.04	< 0.0003
5050	LF-6		16-Feb-94	< 0.02	0.016	< 0.05	0.003	0.11	< 0.01	0.97	< 0.01	< 0.04	< 0.0002
5050	LF-6		21-Set-94	< 0.005	< 0.002	0.01	0.0023	0.099	< 0.002	0.84	0.011	< 0.005	< 0.0002
5050	LF-6		16-Mar-95	< 0.004	< 0.002	0.01	0.0023	0.091	0.002	0.74	0.01	< 0.005	< 0.0002
5050	LF-6		6-Sep-95	< 0.004	< 0.002	0.011	0.0022	0.094	0.004	0.79	0.009	< 0.005	< 0.0002
5050	LF-6		24-Mar-98	< 0.03	< 0.05	0.03	< 0.005	0.11	<0.01	0.94	< 0.01	< 0.05	< 0.0005
5050	LF-6		18-Jun-98	< 0.03	0.07	0.17	<0.005	0.12	0.02	1.1	0.01	< 0.05	< 0.0005
5050	LF-6	tphddl	10-Sep-98	< 0.03	0.06	0.08	<0.005	0.16	<0.01	1.1	0.01	< 0.05	< 0.0005

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Molybdenum (Mo)	Nickel (Ni)	Selenium (Se)	Silver (Ag)	Thallium (Tl)	Vanadium (V)	Zinc (Zn)	TDS	pH (SU)	Chloride
		MCL		--	0.1	0.05	0.1[+]	0.002	--	5			
5050	LF-5		4-Nov-91	< 0.01	0.23	< 0.004	0.004	< 0.1	< 0.005	11	9,100		
5050	LF-5		27-Oct-92	< 0.01	5.4	0.017	0.022	< 0.1	< 0.005	35			
5050	LF-5		4-Mar-93	< 0.01	5	< 0.01	0.021	< 0.1	< 0.005	36			
5050	LF-5		25-May-93	< 0.01	3.2	< 0.004	0.01	0.2	< 0.005	23			
5050	LF-5		31-Aug-93	< 0.01	4.6	< 0.02	0.013	0.2	< 0.005	38			
5050	LF-5		26-Oct-93	< 0.01	5.3	< 0.04	0.011	0.3	0.01	51		6.07	
5050	LF-5		16-Feb-94	< 0.01	3.3	< 0.04	0.009	0.1	< 0.005	28		6.20	
5050	LF-5		24-May-94	< 0.002	2.4	< 0.01	0.008	0.09	0.002	23			
5050	LF-5		21-Sep-94	< 0.002	2.5	< 0.02	0.006	0.03	< 0.001	25			
5050	LF-5		19-Dec-94	< 0.002	3.8	0.02	0.007	0.08	< 0.001	58			
5050	LF-5		14-Mar-95	< 0.002	2.6	< 0.04	0.004	0.06	0.003	25			
5050	LF-5		7-Jun-95	< 0.002	5	< 0.02	0.006	0.05	0.001	76			
5050	LF-5		7-Sep-95	< 0.002	4.8	< 0.004	0.004	0.04	< 0.001	38			
5050	LF-5		18-Dec-95	< 0.002	3.1	< 0.01	0.003	0.12	0.003	47		6.35	
5050	LF-5		20-Aug-97	< 0.01	4.0	< 0.05	< 0.01	< 0.05	< 0.01	52.		5.79	
5050	LF-5		11-Dec-97	< 0.01	3.2	< 0.05	< 0.01	< 0.05	< 0.01	44.		6.23	
5050	LF-5		25-Mar-98	< 0.01	0.7	< 0.07	< 0.01	< 0.05	< 0.01	16	5,600	5.87	
5050	LF-5		18-Jun-98	< 0.01	18.0	< 0.07	0.03	0.43	< 0.01	300	21,000	6.19	
5050	LF-5		9-Sep-98	< 0.01	2.4	< 0.07	< 0.01	< 0.05	< 0.01	36	7,800	6.22	
5050	LF-6		5-Nov-91	< 0.01	2.1	< 0.004	0.011	< 0.1	< 0.005	8.1	6,900		
5050	LF-6		27-Oct-92	< 0.01	5.5	0.012	0.02	< 0.1	< 0.005	23			
5050	LF-6		4-Mar-93	< 0.01	4.2	< 0.004	0.013	< 0.1	< 0.005	17			
5050	LF-6		24-May-93	< 0.01	3.4	< 0.004	0.008	0.1	< 0.005	13			
5050	LF-6		31-Aug-93	< 0.01	3.7	< 0.004	0.009	0.1	< 0.005	14			
5050	LF-6		26-Oct-93	< 0.01	3.7	< 0.004	0.005	0.1	< 0.005	17		4.74	
5050	LF-6		16-Feb-94	< 0.01	3.4	< 0.004	0.007	0.1	< 0.005	13		4.54	
5050	LF-6		21-Set-94	< 0.002	2.8	< 0.004	0.004	0.02	< 0.001	11			
5050	LF-6		16-Mar-95	< 0.002	2.6	< 0.004	0.003	0.06	0.001	10			
5050	LF-6		6-Sep-95	< 0.002	2.8	< 0.004	0.002	0.07	< 0.001	10			
5050	LF-6		24-Mar-98	< 0.01	3.3	< 0.07	< 0.01	< 0.05	< 0.01	14	5,900	4.74	
5050	LF-6		18-Jun-98	< 0.01	3.8	< 0.07	< 0.01	0.06	< 0.01	16	6,100	5.31	
5050	LF-6	tphdrl	10-Sep-98	< 0.01	4.3	< 0.07	< 0.01	<0.05	< 0.01	18	6,600	5.13	

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Antimony (Sb)	Arsenic (As)	Barium (Ba)	Beryllium (Be)	Cadmium (Cd)	Chromium (Cr)	Cobalt (Co)	Copper (Cu)	Lead (Pb)	Mercury (Hg)
		MCL		0.006	0.05	1	0.004	0.005	0.05	--	1.3[+]	0.015[++]	0.002
5050	LF-7		5-Nov-91	< 0.02	0.004	0.13	< 0.001	< 0.005	< 0.01	< 0.005	0.006	< 0.005	0.0011
5050	LF-7		27-Oct-92	< 0.02	0.03	0.11	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0003
5050	LF-7		4-Mar-93	< 0.02	0.025	0.08	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0003
5050	LF-7		24-May-93	< 0.02	0.003	0.08	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0003
5050	LF-7		31-Aug-93	< 0.02	0.013	0.08	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0003
5050	LF-7		25-Oct-93	< 0.02	< 0.002	0.09	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0003
5050	LF-7		16-Feb-94	< 0.02	0.014	0.12	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0002
5050	LF-7		21-Sep-94	0.005	< 0.002	0.1	< 0.0005	< 0.001	< 0.002	< 0.001	< 0.002	< 0.005	< 0.0002
5050	LF-7		15-Mar-95	< 0.004	0.004	0.24	< 0.0005	< 0.001	< 0.002	< 0.001	< 0.002	< 0.005	< 0.0002
5050	LF-7		6-Sep-95	< 0.004	0.017	0.18	< 0.0005	< 0.001	< 0.002	< 0.001	< 0.002	< 0.005	< 0.0002
5050	LF-7		24-Mar-98	<0.03	0.07	0.43	<0.005	<0.005	0.05	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-7		18-Jun-98	<0.03	<0.05	0.24	<0.005	<0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-7	tphdrl	10-Sep-98	<0.03	0.07	0.24	<0.005	<0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-8		27-Oct-93	< 0.02	2.6	0.16	< 0.002	< 0.005	< 0.01	0.005	< 0.01	< 0.04	< 0.0003
5050	LF-8		16-Feb-94	< 0.02	2.3	0.33	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0002
5050	LF-8		24-May-94	< 0.005	2.5	0.2	< 0.0005	< 0.001	< 0.002	< 0.001	< 0.002	< 0.003	< 0.0002
5050	LF-8		23-Sep-94	0.005	3.4	0.32	< 0.0005	0.002	< 0.002	< 0.001	< 0.002	< 0.005	< 0.0002
5050	LF-8		20-Dec-94	< 0.005	2	0.39	< 0.0005	< 0.001	< 0.002	< 0.001	< 0.002	< 0.002	< 0.0002
5050	LF-8		15-Mar-95	< 0.004	2	0.072	< 0.0005	< 0.001	< 0.002	< 0.001	< 0.002	< 0.002	< 0.0002
5050	LF-8		9-Jun-95	< 0.004	3.2	0.093	< 0.0005	< 0.001	< 0.002	< 0.001	< 0.002	< 0.002	< 0.0002
5050	LF-8		7-Sep-95	< 0.004	2.4	0.092	< 0.0005	< 0.001	< 0.002	0.001	< 0.002	< 0.002	< 0.0002
5050	LF-8		18-Dec-95	< 0.004	3.4	0.17	< 0.0005	0.007	< 0.002	< 0.001	< 0.002	< 0.005	< 0.0002
5050	LF-8		20-Aug-97	< 0.03	2.1	0.05	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-8		19-Dec-97	< 0.03	1.5	0.06	< 0.005	< 0.005	0.04	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-8		24-Mar-98	< 0.03	0.89	0.16	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-8		18-Jun-98	< 0.03	1.4	0.18	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-8	tphdrl	10-Sep-98	< 0.03	2.0	0.08	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-9		1-Nov-93	< 0.02	0.009	< 0.05	< 0.002	0.041	< 0.01	0.56	0.02	< 0.04	< 0.0003
5050	LF-109	(Dup)	1-Nov-93	< 0.02	0.015	< 0.05	< 0.002	0.034	< 0.01	0.46	< 0.01	< 0.04	< 0.0003
5050	LF-9		17-Feb-94	< 0.02	0.064	< 0.05	< 0.002	0.12	< 0.01	0.016	< 0.01	< 0.04	< 0.0002
5050	LF-9		21-Sep-94	0.006	0.18	0.02	< 0.0005	0.008	< 0.002	0.023	< 0.002	< 0.005	< 0.0002
5050	LF-9		13-Mar-95	< 0.004	0.15	0.021	< 0.0005	0.01	< 0.002	0.028	0.004	< 0.005	< 0.0002
5050	LF-9		8-Sep-95	< 0.004	0.19	0.014	< 0.0005	0.020	< 0.002	0.026	< 0.002	< 0.005	< 0.0002
5050	LF-9		24-Mar-98	Well Not Found									

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Molybdenum (Mo)	Nickel (Ni)	Selenium (Se)	Silver (Ag)	Thallium (Tl)	Vanadium (V)	Zinc (Zn)	TDS	pH (SU)	Chloride
		MCL		--	0.1	0.05	0.1[+]	0.002	--	5			
5050	LF-7		5-Nov-91	< 0.01	0.01	< 0.004	< 0.002	< 0.1	0.006	< 0.005	1,200		
5050	LF-7		27-Oct-92	0.01	0.01	< 0.004	< 0.005	< 0.1	0.008	0.021			
5050	LF-7		4-Mar-93	0.01	0.01	< 0.01	< 0.005	< 0.1	0.009	0.01			
5050	LF-7		24-May-93	< 0.01	< 0.01	< 0.004	< 0.005	< 0.1	0.006	0.007			
5050	LF-7		31-Aug-93	< 0.01	< 0.01	< 0.004	< 0.005	< 0.1	0.006	0.021			
5050	LF-7		25-Oct-93	< 0.01	< 0.01	< 0.004	< 0.005	< 0.1	0.006	0.011		7.07	
5050	LF-7		16-Feb-94	< 0.01	0.02	< 0.004	< 0.005	< 0.1	0.005	0.01		7.12	
5050	LF-7		21-Sep-94	0.006	0.01	< 0.004	< 0.001	< 0.02	0.006	0.012			
5050	LF-7		15-Mar-95	0.005	0.011	< 0.004	< 0.001	< 0.01	0.006	0.053			
5050	LF-7		6-Sep-95	0.006	0.012	< 0.004	< 0.001	< 0.01	0.007	0.001			
5050	LF-7		24-Mar-98	< 0.01	0.14	< 0.07	0.01	< 0.05	< 0.01	0.05	970	7.12	
5050	LF-7		18-Jun-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.09	970	7.17	
5050	LF-7	tphdrl	10-Sep-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.01	950	7.37	
5050	LF-8		27-Oct-93	< 0.01	0.01	< 0.004	< 0.005	< 0.1	< 0.005	0.022	2,100	6.90	
5050	LF-8		16-Feb-94	< 0.01	< 0.01	< 0.004	< 0.005	< 0.1	< 0.005	< 0.01		7.43	
5050	LF-8		24-May-94	0.004	< 0.003	< 0.02	< 0.001	< 0.02	0.004	0.015			
5050	LF-8		23-Sep-94	< 0.002	0.003	< 0.004	< 0.001	< 0.02	0.005	0.024			
5050	LF-8		20-Dec-94	< 0.002	0.004	< 0.04	< 0.001	< 0.02	0.004	0.015			
5050	LF-8		15-Mar-95	0.002	0.003	< 0.04	< 0.001	< 0.01	0.002	0.017			
5050	LF-8		9-Jun-95	< 0.002	0.003	< 0.04	< 0.001	< 0.01	0.003	0.052			
5050	LF-8		7-Sep-95	< 0.002	< 0.002	< 0.2	< 0.001	< 0.01	0.003	0.02			
5050	LF-8		18-Dec-95	< 0.002	< 0.002	< 0.02	< 0.001	< 0.01	0.002	0.013		7.24	
5050	LF-8		20-Aug-97	< 0.01	< 0.02	< 0.05	< 0.01	< 0.05	< 0.01	0.24		6.96	
5050	LF-8		19-Dec-97	< 0.01	0.03	< 0.05	< 0.01	< 0.05	< 0.01	< 0.01		7.19	
5050	LF-8		24-Mar-98	0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.08	1,300	7.13	
5050	LF-8		18-Jun-98	<0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.05	1,400	7.03	
5050	LF-8	tphdrl	10-Sep-98	<0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.02	1,500	6.90	
5050	LF-9		1-Nov-93	< 0.01	0.86	< 0.02	< 0.005	< 0.1	< 0.005	14	5,500	6.03	
5050	LF-109	(Dup)	1-Nov-93	< 0.01	0.71	< 0.02	< 0.005	< 0.1	< 0.005	14		6.03	
5050	LF-9		17-Feb-94	< 0.01	0.1	< 0.004	< 0.005	< 0.1	< 0.005	31		6.33	
5050	LF-9		21-Sep-94	0.004	0.072	< 0.01	< 0.001	< 0.02	0.002	20			
5050	LF-9		13-Mar-95	0.003	0.085	< 0.004	< 0.001	< 0.01	0.003	26			
5050	LF-9		8-Sep-95	0.005	0.087	< 0.02	< 0.001	< 0.01	0.003	25			
5050	LF-9		24-Mar-98	Well Not Found									

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Antimony (Sb)	Arsenic (As)	Barium (Ba)	Beryllium (Be)	Cadmium (Cd)	Chromium (Cr)	Cobalt (Co)	Copper (Cu)	Lead (Pb)	Mercury (Hg)
		MCL		0.006	0.05	1	0.004	0.005	0.05	--	1.3[+]	0.015[++]	0.002
5050	LF-10		28-Oct-93	< 0.02	0.04	0.77	< 0.002	0.02	0.07	0.019	0.04	< 0.04	< 0.0003
5050	LF-10		16-Feb-94	< 0.02	< 0.005	< 0.05	< 0.002	0.005	< 0.01	0.018	< 0.01	< 0.04	< 0.0002
5050	LF-10		22-Sep-94	< 0.005	< 0.005	0.02	< 0.0005	0.002	< 0.002	0.008	0.005	< 0.01	< 0.0002
5050	LF-10		15-Mar-95	0.004	< 0.02	0.018	< 0.0005	0.001	< 0.002	0.018	0.006	< 0.01	< 0.0002
5050	LF-10		7-Sep-95	< 0.004	< 0.005	0.016	< 0.0005	0.002	< 0.002	0.007	0.007	< 0.01	< 0.0002
5050	LF-10		24-Mar-98	< 0.03	< 0.05	0.03	< 0.005	< 0.005	0.02	0.02	0.03	0.18	< 0.0005
5050	LF-10		18-Jun-98	< 0.03	< 0.05	0.08	< 0.005	< 0.005	0.01	0.01	<0.01	< 0.05	< 0.0005
5050	LF-10		9-Sep-98	< 0.03	< 0.05	0.06	< 0.005	0.28	< 0.01	0.03	0.01	< 0.05	< 0.0005
5050	LF-11		28-Oct-93	< 0.02	0.07	0.1	< 0.002	120	< 0.01	5.9	3	6	< 0.0003
5050	LF-11		18-Feb-94	< 2	< 0.02	< 5	< 0.2	140	< 1	8.4	4	< 4	< 0.0002
5050	LF-111	(Dup)	18-Feb-94	< 2	< 0.2	< 5	< 0.2	140	< 1	9.4	4	< 4	< 0.0002
5050	LF-11		23-Sep-94	< 2	< 0.2	< 0.01	0.2	130	< 1	7.1	5	0.41	< 0.0002
5050	LF-11		15-Mar-95	< 2	< 0.01	< 1	< 0.2	91	< 1	4.9	3	0.08	< 0.0002
5050	LF-11		8-Jun-95	< 20	< 0.02	< 1	< 3	99	< 10	< 5	< 10	0.09	< 0.0002
5050	LF-11		7-Sep-95	< 2	< 0.01	< 1	< 0.2	120	< 1	6.5	5	0.04	< 0.0002
5050	LF-11		18-Dec-95	< 20	0.31	< 1	< 3	110	< 10	6.0	< 10	0.021	< 0.0002
5050	LF-11		20-Aug-97	< 0.03	0.19	0.02	0.060	75.	0.04	3.9	3.3	< 0.05	< 0.0005
5050	LF-11		19-Dec-97	< 0.03	0.16	< 0.01	0.062	72.	< 0.01	3.6	3.2	< 0.05	< 0.0005
5050	LF-11		25-Mar-98	< 0.03	< 0.05	< 0.01	< 0.005	36	< 0.01	< 0.01	< 0.03	< 0.05	< 0.0005
5050	LF-11		17-Jun-98	< 0.03	0.11	0.14	0.034	46	0.03	2.5	1.9	< 0.05	< 0.0005
5050	LF-11		9-Sep-98	< 0.03	0.08	0.12	0.04	43	< 0.01	2.1	2.0	< 0.05	< 0.0005
5050	LF-12		1-Nov-93	< 0.2	0.022	< 0.5	< 0.02	3.7	< 0.1	2.7	0.9	< 0.4	< 0.0003
5050	LF-12		17-Feb-94	< 0.2	0.004	< 0.5	< 0.02	2.9	< 0.1	1.9	0.7	< 0.4	< 0.0002
5050	LF-12		24-May-94	< 0.3	0.008	< 0.05	< 0.02	3.6	< 0.1	2.4	1.0	0.049	< 0.0002
5050	LF-12		22-Sep-94	< 0.2	< 0.005	< 0.05	0.02	3.4	< 0.1	2.2	1.1	0.02	< 0.0002
5050	LF-12		19-Dec-94	< 0.2	< 0.005	< 0.5	0.02	3.5	< 0.1	2.3	1.1	0.01	< 0.0002
5050	LF-12		15-Mar-95	< 0.2	< 0.002	< 0.1	0.02	3	< 0.1	2	1	< 0.005	< 0.0002
5050	LF-12		7-Jun-95	< 0.2	< 0.005	< 0.1	0.03	3.3	< 0.1	2.1	1.2	< 0.005	< 0.0002
5050	LF-12		6-Sep-95	< 0.2	< 0.005	< 0.1	0.02	3.2	< 0.1	2.2	1.3	0.01	< 0.0002
5050	LF-12		18-Dec-95	< 0.2	< 0.002	< 0.1	< 0.03	3.8	< 0.1	2.1	1.1	< 0.005	< 0.0002
5050	LF-12		20-Aug-97	< 0.03	0.05	0.03	0.015	2.4	< 0.01	1.6	1.3	< 0.05	< 0.0005
5050	LF-12		19-Dec-97	< 0.03	< 0.05	< 0.01	0.014	2.4	< 0.01	1.6	1.5	< 0.05	< 0.0005
5050	LF-12		25-Mar-98	< 0.03	< 0.05	< 0.01	< 0.005	1.1	< 0.01	0.4	1.1	< 0.05	< 0.0005
5050	LF-12		18-Jun-98	< 0.03	< 0.05	0.24	0.01	2.3	< 0.01	1.6	0.98	< 0.05	< 0.0005
5050	LF-12		9-Sep-98	< 0.03	< 0.05	0.11	0.013	2.0	< 0.01	1.3	1.7	< 0.05	< 0.0005
5050	LF-12-H		8-Oct-98	-	0.06	-	-	2.2	-	-	-	-	-
5050	LF-12-L		8-Oct-98	-	0.06	-	-	2.0	-	-	-	-	-

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Molybdenum (Mo)	Nickel (Ni)	Selenium (Se)	Silver (Ag)	Thallium (Tl)	Vanadium (V)	Zinc (Zn)	TDS	pH (SU)	Chloride
		MCL		--	0.1	0.05	0.1[+]	0.002	--	5			
5050	LF-10		28-Oct-93	< 0.01	0.17	< 0.04	< 0.005	< 0.1	0.048	2	13,000	6.99	
5050	LF-10		16-Feb-94	< 0.01	0.12	< 0.01	< 0.005	< 0.1	0.008	0.21		6.73	
5050	LF-10		22-Sep-94	< 0.002	0.083	< 0.01	0.001	< 0.02	0.006	0.075			
5050	LF-10		15-Mar-95	< 0.002	0.13	< 0.04	< 0.001	0.02	0.004	0.13			
5050	LF-10		7-Sep-95	< 0.002	0.083	< 0.01	< 0.001	< 0.01	0.005	0.29			
5050	LF-10		24-Mar-98	< 0.01	0.03	0.18	< 0.01	0.06	< 0.01	0.14	4,100	6.51	
5050	LF-10		18-Jun-98	< 0.01	0.08	<0.07	< 0.01	<0.05	< 0.01	0.45	5,600	6.53	
5050	LF-10		9-Sep-98	< 0.01	0.12	< 0.07	< 0.01	<0.05	< 0.01	110	7,300	7.79	
5050	LF-11		28-Oct-93	< 0.01	28	< 0.04	< 0.005	< 0.1	2.0	47,000	170,000	4.72	
5050	LF-11		18-Feb-94	< 1	37	< 0.02	< 0.5	< 10	< 0.5	44,000		4.14	
5050	LF-111	(Dup)	18-Feb-94	< 1	40	< 0.02	< 0.5	< 10	< 0.5	46,000		4.14	
5050	LF-11		23-Sep-94	< 1	32	< 0.04	0.5	< 10	< 0.5	33,000			
5050	LF-11		15-Mar-95	< 1	22	< 0.02	< 0.5	< 5	< 0.5	37,000			
5050	LF-11		8-Jun-95	< 10	21	< 0.04	< 5	< 50	< 5	37,000			
5050	LF-11		7-Sep-95	< 1	26	< 0.02	< 0.5	< 5	< 0.5	37,000			
5050	LF-11		18-Dec-95	< 10	25	< 0.08	< 5	< 50	< 5	37,000		3.73	
5050	LF-11		20-Aug-97	< 0.01	16.	0.16	< 0.01	0.12	< 0.01	30,000		3.49	
5050	LF-11		19-Dec-97	< 0.01	13.	< 0.05	< 0.01	< 0.05	< 0.01	31,000		3.91	
5050	LF-11		25-Mar-98	< 0.01	5.1	< 0.07	< 0.01	< 0.05	< 0.01	13,000	54,000	3.83	
5050	LF-11		17-Jun-98	< 0.01	12	0.1	< 0.01	0.22	< 0.01	18,000	58,000	4.89	
5050	LF-11		9-Sep-98	< 0.01	9.8	0.13	< 0.01	< 0.05	< 0.01	17,000	51,000	5.34	
5050	LF-12		1-Nov-93	< 0.1	8.1	0.014	< 0.05	< 1	< 0.05	3,400	17,000	4.56	
5050	LF-12		17-Feb-94	< 0.1	5.9	0.014	< 0.05	< 1	< 0.05	2,700		4.68	
5050	LF-12		24-May-94	< 0.1	7.1	0.017	< 0.05	< 1	< 0.05	3,100			
5050	LF-12		22-Sep-94	< 0.1	6.7	0.02	< 0.05	< 1	< 0.05	3,100			
5050	LF-12		19-Dec-94	< 0.1	6.9	0.03	< 0.05	< 1	< 0.05	3,200			
5050	LF-12		15-Mar-95	< 0.1	6.7	0.019	< 0.05	< 0.5	< 0.05	2,600			
5050	LF-12		7-Jun-95	< 0.1	6.6	0.04	< 0.05	< 0.5	< 0.05	2,900		7.59	
5050	LF-12		6-Sep-95	< 0.1	6.4	< 0.01	< 0.05	< 0.5	< 0.05	2,900			
5050	LF-12		18-Dec-95	< 0.1	6.6	0.055	< 0.05	< 0.5	< 0.05	3,000		4.08	
5050	LF-12		20-Aug-97	< 0.01	4.7	0.12	< 0.01	0.05	0.03	2,200		3.58	
5050	LF-12		19-Dec-97	< 0.01	4.4	< 0.05	< 0.01	< 0.05	0.02	2,600		4.49	
5050	LF-12		25-Mar-98	< 0.01	1.9	< 0.07	< 0.01	< 0.05	< 0.01	1,200	7,100	4.00	
5050	LF-12		18-Jun-98	<0.01	4.6	0.11	<0.01	0.14	0.01	2,500	12,000	4.02	
5050	LF-12		9-Sep-98	<0.01	4.1	0.13	<0.01	< 0.05	< 0.01	2,100	12,000	4.85	
5050	LF-12-H		8-Oct-98	-	-	-	-	-	-	2,400	11,000	3.30	590
5050	LF-12-L		8-Oct-98	-	-	-	-	-	-	1,700	10,000	3.50	820

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well	Sample Date	Antimony (Sb)	Arsenic (As)	Barium (Ba)	Beryllium (Be)	Cadmium (Cd)	Chromium (Cr)	Cobalt (Co)	Copper (Cu)	Lead (Pb)	Mercury (Hg)
	MCL		0.006	0.05	1	0.004	0.005	0.05	--	1.3[+]	0.015[++]	0.002
5050	LF-13	6-Dec-93	< 0.02	3.3	0.24	< 0.002	< 0.005	< 0.01	0.007	< 0.01	< 0.04	< 0.0003
5050	LF-13	20-Aug-97	< 0.03	3.2	12.	< 0.005	< 0.005	< 0.01	0.01	< 0.01	< 0.05	< 0.0005
5050	LF-13	19-Dec-97	< 0.03	0.77	70.	< 0.005	< 0.005	0.03	0.06	< 0.01	< 0.05	< 0.0005
5050	LF-13	24-Mar-98	< 0.03	0.53	1.7	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-13	18-Jun-98	< 0.03	0.9	3.3	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-13	10-Sep-98	< 0.03	2.7	3.8	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-14	8-Dec-93	< 0.02	0.005	< 0.05	< 0.002	0.12	< 0.01	0.67	0.68	< 0.04	0.0016
5050	LF-14	17-Feb-94	< 0.02	< 0.002	< 0.05	0.002	0.16	< 0.01	0.96	2.1	< 0.04	< 0.0002
5050	LF-14	25-May-94	< 0.03	0.004	< 0.05	0.002	0.14	< 0.01	1	3.5	0.027	< 0.0002
5050	LF-14	21-Sep-94	< 0.02	< 0.002	< 0.05	< 0.002	0.065	< 0.01	0.59	1.1	0.022	< 0.0002
5050	LF-14	19-Dec-94	< 0.02	0.004	< 0.05	0.004	0.12	< 0.01	0.96	2.9	0.03	< 0.0002
5050	LF-14	15-Mar-95	< 0.02	< 0.002	0.01	0.004	0.12	< 0.01	0.86	3.4	0.017	< 0.0002
5050	LF-14	8-Jun-95	< 0.02	0.005	0.01	0.002	0.14	< 0.01	0.95	1.7	0.037	< 0.0002
5050	LF-14	8-Sep-95	< 0.02	< 0.002	0.01	0.002	0.086	< 0.01	0.78	2.8	0.017	< 0.0002
5050	LF-14	18-Dec-95	< 0.02	0.018	0.01	< 0.003	0.13	< 0.01	1.1	1.4	0.003	< 0.0002
5050	LF-14	20-Aug-97	< 0.03	< 0.05	0.01	< 0.005	0.19	< 0.01	0.60	1.3	< 0.05	< 0.0005
5050	LF-14	19-Dec-97	< 0.03	< 0.05	0.11	< 0.005	0.093	0.34	0.82	0.72	< 0.05	0.0006
5050	LF-14	25-Mar-98	< 0.03	< 0.05	< 0.01	< 0.005	0.017	< 0.01	0.54	1.4	< 0.05	< 0.0005
5050	LF-14	17-Jun-98	< 0.03	< 0.05	0.07	< 0.005	0.069	<0.01	0.59	1.3	< 0.05	<0.0005
5050	LF-14	10-Sep-98	< 0.03	< 0.05	0.04	< 0.005	0.07	<0.01	0.61	1.2	< 0.05	<0.0005
5050	LF-15	6-Dec-93	< 0.02	< 0.05	0.28	0.017	1.7	< 0.01	8.1	0.14	1.1	< 0.0003
5050	LF-15	18-Feb-94	< 0.2	0.006	< 0.5	< 0.02	1.7	< 0.1	7.4	< 0.1	0.6	< 0.0002
5050	LF-15	21-Sep-94	< 0.02	< 0.01	< 0.05	0.027	2.0	< 0.01	11	< 0.01	0.21	< 0.0002
5050	LF-15	13-Mar-95	< 0.02	< 0.002	0.01	0.019	1.5	< 0.01	8.8	< 0.01	0.33	< 0.0002
5050	LF-15	8-Sep-95	< 0.2	< 0.01	< 0.1	< 0.02	2.1	< 0.1	14	< 0.1	0.07	< 0.0002
5050	LF-15	25-Mar-98	< 0.03	0.63	0.08	0.016	1.8	0.18	8.8	0.17	1.0	< 0.0005
5050	LF-15	17-Jun-98	< 0.03	0.49	0.23	0.007	1.8	0.07	8.7	0.06	0.45	< 0.0005
5050	LF-15	11-Sep-98	< 0.03	0.17	0.08	0.02	2.5	< 0.01	11	0.03	0.14	< 0.0005

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well	Sample Date	Molybdenum (Mo)	Nickel (Ni)	Selenium (Se)	Silver (Ag)	Thallium (Tl)	Vanadium (V)	Zinc (Zn)	TDS	pH (SU)	Chloride
	MCL		--	0.1	0.05	0.1[+]	0.002	--	5			
5050	LF-13	6-Dec-93	0.04	0.03	< 0.2	< 0.005	< 0.1	0.061	0.03	2,600	7.07	
5050	LF-13	20-Aug-97	0.08	0.03	< 0.05	< 0.01	< 0.05	0.15	1.3		7.59	
5050	LF-13	19-Dec-97	< 0.01	< 0.02	< 0.05	< 0.01	< 0.05	0.05	0.10		7.58	
5050	LF-13	24-Mar-98	0.01	< 0.02	< 0.07	< 0.01	< 0.05	<0.01	0.03	640	7.55	
5050	LF-13	18-Jun-98	0.02	< 0.02	< 0.07	< 0.01	< 0.05	0.03	0.03	600	7.27	
5050	LF-13	10-Sep-98	0.03	< 0.02	< 0.07	< 0.01	< 0.05	0.02	0.03	910	7.34	
5050	LF-14	8-Dec-93	< 0.01	1.6	< 0.02	< 0.005	< 0.1	< 0.005	230	5,600	5.04	
5050	LF-14	17-Feb-94	< 0.01	2.4	< 0.004	< 0.005	< 0.1	< 0.005	300		5.03	
5050	LF-14	25-May-94	< 0.01	2.4	< 0.004	< 0.005	0.1	< 0.005	340			
5050	LF-14	21-Sep-94	< 0.01	1.4	< 0.004	< 0.005	< 0.1	< 0.005	240			
5050	LF-14	19-Dec-94	< 0.01	2.3	< 0.004	< 0.005	< 0.1	0.042	370			
5050	LF-14	15-Mar-95	< 0.01	2.3	< 0.004	< 0.005	< 0.05	< 0.005	340			
5050	LF-14	8-Jun-95	< 0.01	2.4	< 0.004	< 0.005	0.07	0.008	290			
5050	LF-14	8-Sep-95	< 0.01	1.9	< 0.004	< 0.005	0.1	0.015	310			
5050	LF-14	18-Dec-95	< 0.01	2.6	< 0.004	< 0.005	< 0.05	0.011	290		5.11	
5050	LF-14	20-Aug-97	< 0.01	1.5	< 0.05	< 0.01	< 0.05	0.03	280		4.77	
5050	LF-14	19-Dec-97	< 0.01	1.9	< 0.05	< 0.01	< 0.05	0.01	240		4.61	
5050	LF-14	25-Mar-98	< 0.01	1.4	< 0.07	< 0.01	< 0.05	< 0.01	260	4,300	4.85	
5050	LF-14	17-Jun-98	<0.01	1.4	<0.07	< 0.01	0.08	0.03	260	4,500	4.69	
5050	LF-14	10-Sep-98	<0.01	1.5	<0.07	< 0.01	0.09	0.03	260	4,200	5.00	
5050	LF-15	6-Dec-93	< 0.01	23	< 0.1	0.032	0.9	< 0.005	640	31,000	4.67	
5050	LF-15	18-Feb-94	< 0.1	20	< 0.04	< 0.05	< 1	< 0.05	660		4.72	
5050	LF-15	21-Sep-94	< 0.01	29	< 0.02	0.02	1.1	< 0.005	620			
5050	LF-15	13-Mar-95	< 0.01	24	< 0.02	< 0.005	0.66	< 0.005	550			
5050	LF-15	8-Sep-95	< 0.1	37	< 0.02	< 0.05	0.9	< 0.05	570			
5050	LF-15	25-Mar-98	0.01	23	< 0.07	0.20	0.38	0.26	460	25,000	4.64	
5050	LF-15	17-Jun-98	0.06	23	0.39	0.09	1.3	0.23	690	27,000	4.25	
5050	LF-15	11-Sep-98	< 0.01	31	0.24	0.04	0.77	0.010	1,900	30,000	5.57	

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well	Sample Date	Antimony (Sb)	Arsenic (As)	Barium (Ba)	Beryllium (Be)	Cadmium (Cd)	Chromium (Cr)	Cobalt (Co)	Copper (Cu)	Lead (Pb)	Mercury (Hg)
	MCL		0.006	0.05	1	0.004	0.005	0.05	--	1.3[+]	0.015[++]	0.002
5050	LF-16	7-Dec-93	< 0.2	< 0.05	< 0.5	< 0.02	10	< 0.1	5.9	0.4	< 0.4	< 0.003
5050	LF-16	17-Feb-94	< 0.2	< 0.002	< 0.5	0.04	15	< 0.1	8.3	21	< 0.4	< 0.0002
5050	LF-16	25-May-94	< 0.3	< 0.002	< 0.5	0.02	12	< 0.1	7.0	25	< 0.01	< 0.0002
5050	LF-16	21-Sep-94	< 0.2	< 0.005	< 0.05	0.03	11	< 0.1	6.2	22	< 0.05	< 0.0002
5050	LF-16	19-Dec-94	< 0.2	< 0.005	< 0.5	0.03	10	< 0.1	6	22	< 0.2	< 0.0002
5050	LF-16	15-Mar-95	< 0.2	< 0.02	< 0.1	0.03	8.2	< 0.1	4.9	21	< 0.05	< 0.0002
5050	LF-16	8-Jun-95	< 0.2	0.015	< 0.1	0.03	8.2	< 0.1	5.1	19	< 0.05	< 0.0002
5050	LF-16	8-Sep-95	< 0.2	0.006	0.3	0.02	8.4	< 0.1	5.6	18	< 0.02	< 0.0002
5050	LF-16	19-Dec-95	< 0.2	< 0.005	< 0.1	0.02	7.5	< 0.1	4.6	18	< 0.005	< 0.0002
5050	LF-16	20-Aug-97	< 0.03	< 0.05	0.02	0.017	5.6	< 0.01	3.4	15.	< 0.05	< 0.0005
5050	LF-16	19-Dec-97	< 0.03	< 0.05	< 0.01	0.019	5.6	< 0.01	3.4	15.	< 0.05	< 0.0005
5050	LF-16	25-Mar-98	< 0.03	< 0.05	< 0.01	< 0.005	4.6	< 0.01	2.5	14	< 0.05	< 0.0005
5050	LF-16	17-Jun-98	< 0.03	0.06	0.12	0.01	6.5	< 0.01	3.8	13	< 0.05	< 0.0005
5050	LF-16	10-Sep-98	< 0.03	0.06	0.06	0.014	5.8	< 0.01	3.2	13	< 0.05	< 0.0005
5050	LF-17	8-Dec-93	< 0.02	0.004	0.11	< 0.002	< 0.005	< 0.01	0.011	< 0.01	< 0.04	< 0.0003
5050	LF-17	15-Feb-94	< 0.02	< 0.002	0.05	< 0.002	< 0.005	< 0.01	0.009	< 0.01	< 0.04	< 0.0002
5050	LF-17	22-Sep-94	0.005	< 0.002	0.06	< 0.0005	< 0.001	< 0.002	0.005	< 0.002	< 0.005	< 0.0002
5050	LF-17	14-Mar-95	< 0.004	< 0.002	0.065	< 0.0005	< 0.001	< 0.002	0.006	< 0.002	< 0.002	< 0.002
5050	LF-17	6-Sep-95	< 0.004	< 0.002	0.057	< 0.0005	< 0.001	< 0.002	0.004	< 0.002	< 0.002	< 0.0002
5050	LF-17	24-Mar-98	< 0.03	<0.05	0.11	<0.005	0.006	0.06	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-17	18-Jun-98	< 0.03	<0.03	0.15	<0.005	0.007	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-17	9-Sep-98	< 0.03	< 0.05	0.10	<0.005	0.009	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LF-F1	8-Dec-93	< 0.02	0.012	0.07	< 0.002	0.049	< 0.01	0.055	< 0.01	< 0.04	< 0.0003
5050	LF-F1	18-Feb-94	< 0.02	0.004	< 0.05	< 0.002	0.065	< 0.01	0.062	< 0.01	< 0.04	< 0.0002
5050	LF-F1	23-Sep-94	< 0.02	0.21	0.02	< 0.0005	< 0.005	< 0.002	0.2	< 0.002	< 0.005	< 0.0002
5050	LF-F1	15-Mar-95	< 0.02	0.092	0.021	< 0.0005	0.02	< 0.002	0.1	< 0.002	< 0.002	< 0.0002
5050	LF-F1	7-Sep-95	< 0.004	0.09	0.020	< 0.0005	0.038	< 0.002	0.11	< 0.002	< 0.002	< 0.0002

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well	Sample Date	Molybdenum (Mo)	Nickel (Ni)	Selenium (Se)	Silver (Ag)	Thallium (Tl)	Vanadium (V)	Zinc (Zn)	TDS	pH (SU)	Chloride
		MCL	--	0.1	0.05	0.1[+]	0.002	--	5			
5050	LF-16	7-Dec-93	< 0.1	16	< 0.1	< 0.05	< 1	< 0.05	3,400	41,000	5.37	
5050	LF-16	17-Feb-94	< 0.1	24	< 0.04	< 0.05	< 1	< 0.05	5,200		4.17	
5050	LF-16	25-May-94	< 0.1	20	< 0.004	< 0.05	< 1	< 0.05	4,100			
5050	LF-16	21-Sep-94	< 0.1	17	< 0.01	< 0.05	< 1	< 0.05	3,700			
5050	LF-16	19-Dec-94	< 0.1	17	< 0.01	< 0.05	< 1	0.08	3,300			
5050	LF-16	15-Mar-95	< 0.1	16	< 0.04	< 0.05	< 0.5	< 0.05	3,300			
5050	LF-16	8-Jun-95	< 0.1	15	< 0.01	< 0.05	< 0.5	0.06	2,900			
5050	LF-16	8-Sep-95	< 0.1	15	< 0.01	< 0.05	0.7	< 0.05	2,800			
5050	LF-16	19-Dec-95	< 0.1	13	< 0.01	< 0.05	< 0.5	0.07	2,700		4.31	
5050	LF-16	20-Aug-97	< 0.01	9.6	< 0.05	< 0.01	0.12	0.07	2,000		4.02	
5050	LF-16	19-Dec-97	< 0.01	9.0	< 0.05	< 0.01	< 0.05	0.05	2,200		4.64	
5050	LF-16	25-Mar-98	< 0.01	7.6	< 0.07	< 0.01	< 0.05	< 0.01	1,700	16,000	4.52	
5050	LF-16	17-Jun-98	< 0.01	10.0	<0.07	< 0.01	0.34	0.06	560	18,000	4.41	
5050	LF-16	10-Sep-98	< 0.01	8.9	0.09	< 0.01	0.22	0.04	550	17,000	4.51	
5050	LF-17	8-Dec-93	< 0.01	0.04	< 0.004	< 0.005	< 0.1	0.008	0.1	2,300	7.11	
5050	LF-17	15-Feb-94	< 0.01	0.03	< 0.004	< 0.005	< 0.1	0.007	0.05		7.21	
5050	LF-17	22-Sep-94	0.003	0.015	< 0.004	< 0.001	< 0.02	0.006	0.035			
5050	LF-17	14-Mar-95	< 0.002	0.022	< 0.004	< 0.001	0.01	0.003	0.056			
5050	LF-17	6-Sep-95	0.002	0.017	< 0.004	< 0.001	0.01	0.004	< 0.01			
5050	LF-17	24-Mar-98	< 0.01	0.20	< 0.07	< 0.01	< 0.05	< 0.01	0.23	1,000	7.22	
5050	LF-17	18-Jun-98	< 0.01	<0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.13	1,200	7.02	
5050	LF-17	9-Sep-98	< 0.01	<0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.77	1,000	6.87	
5050	LF-F1	8-Dec-93	< 0.01	0.07	< 0.04	< 0.005	< 0.1	0.008	13	4,500	6.78	
5050	LF-F1	18-Feb-94	0.02	0.07	< 0.004	< 0.005	< 0.1	< 0.005	20		6.80	
5050	LF-F1	23-Sep-94	0.006	0.13	< 0.004	0.002	< 0.1	< 0.005	39			
5050	LF-F1	15-Mar-95	0.009	0.05	< 0.004	0.001	< 0.05	0.001	14			
5050	LF-F1	7-Sep-95	0.011	0.076	< 0.02	< 0.001	< 0.01	< 0.001	17			

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Antimony (Sb)	Arsenic (As)	Barium (Ba)	Beryllium (Be)	Cadmium (Cd)	Chromium (Cr)	Cobalt (Co)	Copper (Cu)	Lead (Pb)	Mercury (Hg)
	MCL			0.006	0.05	1	0.004	0.005	0.05	--	1.3[+]	0.015[++]	0.002
5050	LFMW-1		5-Nov-91	< 0.02	0.073	0.085	< 0.001	< 0.005	< 0.01	0.008	< 0.005	< 0.005	< 0.0003
5050	LFMW-1		27-Oct-92	< 0.02	0.084	0.09	< 0.002	0.031	< 0.01	0.052	< 0.01	< 0.04	< 0.0003
5050	LFMW-1		5-Mar-93	< 0.02	0.024	0.05	< 0.002	0.008	< 0.01	0.015	< 0.01	< 0.04	< 0.0003
5050	LFMW-1		25-May-93	0.03	0.064	0.06	< 0.002	< 0.005	< 0.01	0.008	< 0.01	< 0.04	< 0.0003
5050	LFMW-1		1-Sep-93	< 0.02	0.097	0.07	< 0.002	< 0.005	< 0.01	0.009	< 0.01	< 0.04	< 0.0003
5050	LFMW-1		26-Oct-93	< 0.02	0.03	0.08	< 0.002	0.009	< 0.01	0.012	< 0.01	< 0.04	< 0.0003
5050	LFMW-1		18-Feb-94	< 0.02	0.052	0.1	< 0.002	< 0.005	< 0.01	0.011	< 0.01	< 0.04	< 0.0002
5050	LFMW-1		22-Sep-94	0.017	0.029	0.08	< 0.0005	0.005	< 0.002	0.009	< 0.002	< 0.005	< 0.0002
5050	LFMW-1		14-Mar-95	0.079	0.033	0.092	< 0.0005	< 0.001	< 0.002	0.02	0.004	< 0.002	< 0.0002
5050	LFMW-1		5-Sep-95	0.029	0.12	0.12	< 0.0005	0.002	0.002	0.018	< 0.002	< 0.005	< 0.0002
5050	LFMW-1		24-Mar-98	0.06	< 0.05	0.07	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LFMW-1		17-Jun-98	<0.03	< 0.05	0.14	< 0.005	0.017	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LFMW-1		9-Sep-98	<0.03	0.10	0.12	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LFMW-2	*	5-Nov-91	< 0.2	2.1	0.013	0.002	7.0	< 0.01	0.42	0.093	< 0.2	0.0055
5050	LFMW-2		27-Oct-92	< 0.2	1.5	< 0.5	< 0.02	10	< 0.1	1.5	0.2	< 0.4	< 0.0003
5050	LFMW-2	(1)	5-Mar-93	< 0.02	0.011	< 0.05	< 0.002	0.28	< 0.01	0.24	0.14	< 0.04	< 0.0003
5050	LFMW-2		25-May-93	< 0.2	1.8	< 0.05	< 0.02	5.2	< 0.1	0.85	< 0.1	< 0.4	< 0.0003
5050	LFMW-2		1-Sep-93	< 0.2	2.1	< 0.05	< 0.02	5.2	< 0.1	0.77	< 0.1	< 0.4	< 0.0003
5050	LFMW-2		26-Oct-93	< 0.2	4	< 0.5	< 0.02	5.1	0.3	0.73	0.3	< 0.4	< 0.0003
5050	LFMW-2		18-Feb-94	< 0.2	1.5	< 0.5	< 0.02	4.6	< 0.1	0.62	< 0.1	< 0.4	< 0.0002
5050	LFMW-2		22-Sep-94	< 0.2	2.1	< 0.05	< 0.02	5	< 0.1	0.65	0.1	< 0.01	< 0.0002
5050	LFMW-2		14-Mar-95	< 0.2	1.4	< 0.1	< 0.02	4.1	< 0.1	0.52	< 0.1	< 0.02	< 0.0002
5050	LFMW-2		5-Sep-95	< 0.2	1.3	< 0.1	< 0.02	5.2	< 0.1	0.55	0.2	0.02	< 0.0002
5050	LFMW-2		24-Mar-98	< 0.03	0.70	< 0.01	< 0.005	1.5	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LFMW-2		18-Jun-98	< 0.03	0.43	0.15	< 0.005	2.4	< 0.01	0.16	0.1	< 0.05	< 0.0005
5050	LFMW-2		9-Sep-98	< 0.03	1.0	0.13	< 0.005	1.9	< 0.01	0.13	0.05	< 0.05	< 0.0005

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Molybdenum (Mo)	Nickel (Ni)	Selenium (Se)	Silver (Ag)	Thallium (Tl)	Vanadium (V)	Zinc (Zn)	TDS	pH (SU)	Chloride
		MCL		--	0.1	0.05	0.1[+]	0.002	--	5			
5050	LFMW-1		5-Nov-91	0.02	0.032	< 0.004	< 0.002	< 0.1	< 0.005	2.7	620		
5050	LFMW-1		27-Oct-92	< 0.01	0.3	< 0.004	< 0.005	< 0.1	0.007	42			
5050	LFMW-1		5-Mar-93	< 0.01	0.11	< 0.004	< 0.005	< 0.1	0.006	16			
5050	LFMW-1		25-May-93	0.02	0.02	< 0.004	< 0.005	< 0.1	0.007	1.6			
5050	LFMW-1		1-Sep-93	0.02	0.02	< 0.004	< 0.005	< 0.1	0.005	2.3			
5050	LFMW-1		26-Oct-93	< 0.01	0.1	< 0.004	< 0.005	< 0.1	< 0.005	13		6.23	
5050	LFMW-1		18-Feb-94	0.01	0.02	< 0.004	< 0.005	< 0.1	0.007	2.8		7.21	
5050	LFMW-1		22-Sep-94	0.007	0.051	< 0.01	< 0.001	< 0.02	0.01	5			
5050	LFMW-1		14-Mar-95	0.013	0.019	< 0.004	< 0.001	< 0.01	0.009	1.8			
5050	LFMW-1		5-Sep-95	0.018	0.014	< 0.01	< 0.001	< 0.01	0.019	1.4			
5050	LFMW-1		24-Mar-98	0.01	0.02	< 0.07	< 0.01	< 0.05	0.01	1.8	820	6.94	
5050	LFMW-1		17-Jun-98	<0.01	<0.02	< 0.07	< 0.01	< 0.05	<0.01	6.7	910	7.11	
5050	LFMW-1		9-Sep-98	0.01	<0.02	< 0.07	< 0.01	< 0.05	<0.01	1.1	900	6.95	
5050	LFMW-2	*	5-Nov-91	0.01	1.2	< 0.004	0.008	< 0.1	< 0.005	4,200	16,000		
5050	LFMW-2		27-Oct-92	< 0.1	4.9	0.014	< 0.05	< 1	< 0.05	6,000			
5050	LFMW-2	(1)	5-Mar-93	< 0.1	1	< 0.01	< 0.005	< 0.1	< 0.005	290			
5050	LFMW-2		25-May-93	< 0.1	2.4	< 0.004	< 0.05	< 1	< 0.05	3,000			
5050	LFMW-2		1-Sep-93	< 0.1	2.3	< 0.004	< 0.05	< 1	< 0.05	2,700			
5050	LFMW-2		26-Oct-93	< 0.1	2.2	< 0.04	< 0.05	< 1	< 0.05	2,600		4.31	
5050	LFMW-2		18-Feb-94	< 0.1	2	< 0.004	< 0.05	< 1	< 0.05	2,600		4.54	
5050	LFMW-2		22-Sep-94	< 0.1	2	< 0.2	< 0.05	< 1	< 0.05	2,300			
5050	LFMW-2		14-Mar-95	< 0.1	1.8	< 0.04	< 0.05	< 0.5	< 0.05	2,200			
5050	LFMW-2		5-Sep-95	< 0.1	1.9	< 0.2	< 0.05	< 0.5	< 0.05	2,300			
5050	LFMW-2		24-Mar-98	< 0.01	0.04	< 0.07	< 0.01	< 0.05	< 0.01	990	5,700	4.93	
5050	LFMW-2		18-Jun-98	< 0.01	0.58	< 0.07	< 0.01	< 0.05	< 0.01	1,300	6,300	4.94	
5050	LFMW-2		9-Sep-98	< 0.01	0.41	< 0.07	< 0.01	< 0.05	< 0.01	1,100	5,700	4.62	

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Antimony (Sb)	Arsenic (As)	Barium (Ba)	Beryllium (Be)	Cadmium (Cd)	Chromium (Cr)	Cobalt (Co)	Copper (Cu)	Lead (Pb)	Mercury (Hg)
		MCL		0.006	0.05	1	0.004	0.005	0.05	--	1.3[+]	0.015[++]	0.002
5050	LFMW-3	*	5-Nov-91	< 0.02	< 0.002	0.017	0.001	0.57	< 0.01	0.42	0.28	0.005	0.0028
5050	LFMW-3		27-Oct-92	< 0.02	0.004	< 0.05	0.003	0.73	< 0.01	0.74	0.3	< 0.04	< 0.0003
5050	LFMW-3	(1)	5-Mar-93	< 0.2	1.6	< 0.05	< 0.02	5.8	< 0.1	1	0.07	< 0.4	< 0.0003
5050	LFMW-3		25-May-93	< 0.02	< 0.002	< 0.05	< 0.002	0.28	< 0.01	0.24	0.07	< 0.04	< 0.0003
5050	LFMW-3		1-Sep-93	< 0.02	0.011	< 0.05	< 0.002	0.32	< 0.01	0.3	0.2	< 0.04	< 0.0003
5050	LFMW-3		26-Oct-93	< 0.02	< 0.002	< 0.05	0.002	0.44	< 0.01	0.49	0.32	< 0.04	< 0.0003
5050	LFMW-3		18-Feb-94	< 0.02	< 0.002	< 0.05	< 0.002	0.22	< 0.01	0.25	0.19	< 0.04	< 0.0002
5050	LFMW-3		24-May-94	< 0.03	< 0.002	< 0.05	< 0.002	0.1	< 0.01	0.14	0.12	< 0.003	< 0.0002
5050	LFMW-3		22-Sep-94	< 0.02	< 0.002	< 0.05	< 0.002	0.21	< 0.01	0.25	0.2	< 0.005	< 0.0002
5050	LFMW-3		19-Dec-94	< 0.02	< 0.002	< 0.05	< 0.002	0.094	< 0.01	0.089	0.06	< 0.002	< 0.0002
5050	LFMW-3		14-Mar-95	< 0.02	< 0.002	0.02	< 0.002	0.13	< 0.01	0.14	0.1	< 0.002	< 0.0002
5050	LFMW-3		7-Jun-95	< 0.02	< 0.002	0.02	0.002	0.33	< 0.01	0.47	0.32	< 0.005	< 0.0002
5050	LFMW-3		5-Sep-95	< 0.02	< 0.002	0.03	0.004	0.84	< 0.01	1.3	0.90	< 0.002	< 0.0002
5050	LFMW-3		18-Dec-95	< 0.2	< 0.002	0.01	< 0.03	1.7	< 0.1	1.2	0.70	< 0.002	< 0.0002
5050	LFMW-3		20-Aug-97	< 0.03	< 0.05	0.02	0.005	0.90	< 0.01	1.4	1.0	< 0.05	< 0.0005
5050	LFMW-3		19-Dec-97	< 0.03	< 0.05	< 0.01	< 0.005	0.77	< 0.01	1.0	0.68	< 0.05	< 0.0005
5050	LFMW-3		24-Mar-98	< 0.03	< 0.05	< 0.01	< 0.005	0.19	< 0.01	0.3	0.22	< 0.05	< 0.0005
5050	LFMW-3		18-Jun-98	< 0.03	< 0.05	0.14	< 0.005	0.62	0.01	0.91	0.60	< 0.05	< 0.0005
5050	LFMW-3		9-Sep-98	< 0.03	< 0.05	0.09	< 0.005	0.50	< 0.01	0.88	0.64	< 0.05	< 0.0005
5050	LFMW-4	*	5-Nov-91	< 0.02	0.007	0.017	< 0.001	< 0.005	< 0.01	< 0.005	< 0.005	< 0.005	0.0027
5050	LFMW-4		27-Oct-92	< 0.02	< 0.002	< 0.05	< 0.002	0.006	< 0.01	< 0.005	0.02	< 0.04	< 0.0003
5050	LFMW-4		4-Mar-93	< 0.02	< 0.002	< 0.05	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0003
5050	LFMW-4		25-May-93	< 0.02	< 0.002	< 0.05	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0003
5050	LFMW-4		1-Sep-93	< 0.02	0.009	< 0.05	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0003
5050	LFMW-4		26-Oct-93	< 0.02	0.003	< 0.05	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0003
5050	LFMW-4		18-Feb-94	< 0.02	< 0.002	< 0.05	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0002
5050	LFMW-4		22-Sep-94	< 0.005	< 0.002	0.02	< 0.0005	< 0.001	< 0.002	< 0.001	< 0.002	< 0.005	< 0.0002
5050	LFMW-4		14-Mar-95	< 0.004	< 0.002	0.02	< 0.0005	< 0.001	< 0.002	< 0.001	< 0.002	< 0.002	< 0.0002
5050	LFMW-4		6-Sep-95	< 0.004	< 0.002	0.019	< 0.0005	< 0.001	< 0.002	< 0.001	< 0.002	< 0.002	< 0.0002
5050	LFMW-4		24-Mar-98	< 0.03	< 0.05	0.03	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LFMW-4		17-Jun-98	< 0.03	< 0.05	0.09	< 0.005	0.062	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5050	LFMW-4		9-Sep-98	< 0.03	< 0.05	0.08	< 0.005	< 0.005	< 0.01	< 0.01	0.01	< 0.05	< 0.0005
5051	MWA-1		2-Jun-95	< 0.2	< 0.02	0.01	< 0.02	2.7	< 0.1	< 0.05	0.57	< 0.4	< 0.002
5051	MWA-1		12-Dec-95	< 0.2	0.011	< 0.1	< 0.02	2.8	< 0.1	0.11	1	0.6	0.0003
5051	MWA-1		13-Dec-96	< 0.02	0.010	0.01	< 0.002	3.1	< 0.01	0.14	1.4	1	< 0.0002
5051	MWA-1		13-Dec-96 (D)	< 0.02	0.011	0.02	< 0.002	3.1	< 0.01	0.17	1.5	1.1	< 0.0002
5051	MWA-1		27-Apr-98	< 0.03	< 0.05	0.20	< 0.005	4.2	0.01	0.01	1.1	1.3	< 0.0005
5051	MWA-1		19-Jun-98	< 0.03	<0.05	0.22	< 0.005	3.4	<0.01	0.02	0.88	0.81	< 0.0005
5051	MWA-1		11-Sep-98	< 0.03	<0.05	0.06	< 0.005	3.5	<0.01	0.03	1.3	0.84	< 0.0005

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Molybdenum (Mo)	Nickel (Ni)	Selenium (Se)	Silver (Ag)	Thallium (Tl)	Vanadium (V)	Zinc (Zn)	TDS	pH (SU)	Chloride
		MCL		--	0.1	0.05	0.1[+]	0.002	--	5			
5050	LFMW-3	*	5-Nov-91	< 0.01	1.2	< 0.004	0.005	< 0.1	< 0.005	600	5,900		
5050	LFMW-3		27-Oct-92	< 0.01	2.6	0.011	0.009	< 0.1	< 0.005	730			
5050	LFMW-3	(1)	5-Mar-93	< 0.1	3.1	< 0.02	< 0.05	< 1	< 0.05	3,000			
5050	LFMW-3		25-May-93	< 0.01	0.83	< 0.004	< 0.005	< 0.1	< 0.005	260			
5050	LFMW-3		1-Sep-93	< 0.01	1.1	< 0.004	< 0.005	< 0.1	< 0.005	360			
5050	LFMW-3		26-Oct-93	< 0.01	1.7	< 0.004	< 0.005	< 0.1	< 0.005	560		4.66	
5050	LFMW-3		18-Feb-94	< 0.01	0.77	< 0.004	< 0.005	< 0.1	< 0.005	230		5.17	
5050	LFMW-3		24-May-94	< 0.01	0.42	< 0.004	< 0.005	< 0.1	< 0.005	120			
5050	LFMW-3		22-Sep-94	< 0.01	0.75	< 0.004	< 0.005	< 0.1	< 0.005	230			
5050	LFMW-3		19-Dec-94	< 0.01	0.36	< 0.004	< 0.005	< 0.1	< 0.005	100			
5050	LFMW-3		14-Mar-95	< 0.01	0.59	< 0.004	< 0.005	< 0.05	< 0.005	220			
5050	LFMW-3		7-Jun-95	< 0.01	1.5	< 0.004	< 0.005	< 0.05	< 0.005	500			
5050	LFMW-3		5-Sep-95	0.01	3.8	0.004	< 0.005	< 0.05	< 0.005	1,100			
5050	LFMW-3		18-Dec-95	< 0.1	3.9	< 0.004	< 0.05	< 0.5	< 0.05	1,200		4.34	
5050	LFMW-3		20-Aug-97	< 0.01	4.0	< 0.05	< 0.01	< 0.05	< 0.01	1,300		4.02	
5050	LFMW-3		19-Dec-97	< 0.01	3.0	< 0.05	< 0.01	< 0.05	< 0.01	1,000		3.95	
5050	LFMW-3		24-Mar-98	< 0.01	1.1	< 0.07	< 0.01	< 0.05	< 0.01	440	3,400	4.57	
5050	LFMW-3		18-Jun-98	< 0.01	2.7	< 0.07	< 0.01	0.07	< 0.01	890	6,100	4.64	
5050	LFMW-3		9-Sep-98	< 0.01	2.5	< 0.07	< 0.01	< 0.05	< 0.01	920	6,300	5.24	
5050	LFMW-4	*	5-Nov-91	< 0.01	0.012	< 0.004	< 0.002	< 0.1	< 0.005	< 0.005	2,400		
5050	LFMW-4		27-Oct-92	< 0.01	0.02	0.004	< 0.005	< 0.1	0.011	0.047			
5050	LFMW-4		4-Mar-93	< 0.01	0.02	< 0.004	< 0.005	< 0.1	0.01	0.03			
5050	LFMW-4		25-May-93	< 0.01	< 0.01	< 0.004	< 0.005	< 0.1	0.006	0.008			
5050	LFMW-4		1-Sep-93	< 0.01	< 0.01	< 0.004	< 0.005	< 0.1	< 0.005	0.016			
5050	LFMW-4		26-Oct-93	< 0.01	< 0.01	< 0.004	< 0.005	< 0.1	< 0.005	0.15		6.47	
5050	LFMW-4		18-Feb-94	< 0.01	0.02	< 0.004	< 0.005	< 0.1	< 0.005	0.17		6.68	
5050	LFMW-4		22-Sep-94	< 0.002	0.025	< 0.004	< 0.001	< 0.02	0.004	0.039			
5050	LFMW-4		14-Mar-95	< 0.002	0.02	< 0.004	< 0.001	< 0.01	0.004	0.05			
5050	LFMW-4		6-Sep-95	< 0.002	0.016	< 0.004	< 0.001	0.01	0.004	0.02			
5050	LFMW-4		24-Mar-98	< 0.01	0.04	< 0.07	< 0.01	< 0.05	< 0.01	0.83	1,900	6.40	
5050	LFMW-4		17-Jun-98	< 0.01	0.06	< 0.07	< 0.01	< 0.05	< 0.01	16	1,700	6.77	
5050	LFMW-4		9-Sep-98	< 0.01	0.03	< 0.07	< 0.01	< 0.05	< 0.01	0.8	1,900	5.96	
5051	MWA-1		2-Jun-95	< 0.1	0.9	< 0.04	< 0.05	< 0.05	< 0.05	990	NA	NA	
5051	MWA-1		12-Dec-95	< 0.1	1.2	0.013	< 0.05	< 500	< 0.05	1,000	NA	NA	
5051	MWA-1		13-Dec-96	0.03	0.97	< 0.004	0.008	< 0.05	< 0.005	990	7,400	5.6	
5051	MWA-1		13-Dec-96 (D)	0.03	1.1	< 0.004	0.010	< 0.05	< 0.005	970	7,500	5.6	
5051	MWA-1		27-Apr-98	< 0.01	0.48	< 0.07	< 0.01	< 0.05	< 0.01	90	5,100	5.80	
5051	MWA-1		19-Jun-98	< 0.01	0.55	< 0.07	< 0.01	0.07	< 0.01	820	5,400	5.70	
5051	MWA-1		11-Sep-98	< 0.01	0.64	0.09	< 0.01	< 0.05	< 0.01	1,800	6,600	6.21	

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well	Sample Date	Antimony (Sb)	Arsenic (As)	Barium (Ba)	Beryllium (Be)	Cadmium (Cd)	Chromium (Cr)	Cobalt (Co)	Copper (Cu)	Lead (Pb)	Mercury (Hg)
	MCL		0.006	0.05	1	0.004	0.005	0.05	--	1.3[+]	0.015[++]	0.002
5051	MWA-2	2-Jun-95	0.04	1.1	0.19	< 0.002	0.012	< 0.01	0.012	< 0.01	< 0.04	< 0.0002
5051	MWA-2	12-Dec-95	0.06	1.2	0.56	< 0.002	< 0.005	< 0.01	0.009	< 0.01	< 0.04	< 0.0002
5051	MWA-2	13-Dec-96	0.04	1.1	1.6	< 0.002	0.040	< 0.01	0.006	< 0.01	< 0.04	< 0.0002
5051	MWA-2	27-Apr-98	< 0.03	1.3	2.1	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5051	MWA-2	19-Jun-98	< 0.03	0.6	0.83	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5051	MWA-2	11-Sep-98	< 0.03	0.24	1.9	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5051	MWA-3	2-Jun-95	< 0.02	0.012	0.05	< 0.002	0.01	< 0.01	0.006	< 0.01	< 0.04	< 0.0002
5051	MWA-3	12-Dec-95	< 0.02	0.018	0.12	< 0.002	0.07	< 0.01	0.04	< 0.01	< 0.04	< 0.0002
5051	MWA-3	13-Dec-96	< 0.02	0.030	0.12	< 0.002	0.016	< 0.01	0.009	< 0.01	< 0.04	< 0.0002
5051	MWA-3	27-Apr-98	< 0.03	< 0.05	0.15	< 0.005	0.025	< 0.01	0.02	< 0.01	< 0.05	< 0.0005
5051	MWA-3	19-Jun-98	< 0.03	< 0.05	0.24	< 0.005	0.18	< 0.01	0.02	< 0.01	< 0.05	< 0.0005
5051	MWA-3	11-Sep-98	< 0.03	< 0.05	0.15	< 0.005	0.03	< 0.01	< 0.01	0.01	< 0.05	< 0.0005
5051	MW-4	11-Dec-95	< 0.2	0.005	< 0.1	< 0.2	< 0.05	< 0.1	1.2	< 0.1	< 0.4	< 0.0002
5051	MW-4	13-Dec-96	< 0.2	0.013	0.10	< 0.02	0.38	< 0.01	< 0.05	< 0.01	< 0.4	< 0.0002
5051	MW-4	27-Apr-98	< 0.03	< 0.05	< 0.01	< 0.005	0.28	0.02	0.04	< 0.01	< 0.05	< 0.0005
5051	MW-4	19-Jun-98	< 0.03	< 0.05	0.14	< 0.005	0.28	0.02	0.04	< 0.01	< 0.05	< 0.0005
5051	MW-4	11-Sep-98	< 0.03	< 0.05	0.08	0.005	0.25	0.02	0.05	0.08	< 0.05	< 0.0005
5051	MW-5	11-Dec-95	< 0.02	0.009	0.21	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0002
5051	MW-5	13-Dec-96	< 0.02	0.005	0.73	< 0.02	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0002
5051	MW-5	27-Apr-98	< 0.03	< 0.05	< 0.01	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5051	MW-5	19-Jun-98	< 0.03	< 0.05	0.57	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5051	MW-5	11-Sep-98	< 0.03	< 0.05	0.47	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5051	MW-6	11-Dec-95	< 0.02	< 0.002	0.24	< 0.002	< 0.005	< 0.01	0.009	< 0.01	< 0.04	< 0.0002
5051	MW-6	13-Dec-96	< 0.02	0.008	0.35	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0002
5051	MW-6	27-Apr-98	< 0.03	< 0.05	1.1	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5051	MW-6	19-Jun-98	< 0.03	< 0.05	0.33	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5051	MW-6	11-Sep-98	< 0.03	< 0.05	0.18	< 0.005	0.008	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5051	MW-7	11-Dec-95	<0.02	< 0.002	0.1	< 0.002	< 0.005	< 0.01	0.014	0.02	< 0.04	< 0.0002
5051	MW-7	13-Dec-96	< 0.02	0.007	0.22	< 0.002	< 0.005	< 0.01	0.019	< 0.01	< 0.04	< 0.0002
5051	MW-7	27-Apr-98	< 0.03	0.06	0.77	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5051	MW-7	19-Jun-98	< 0.03	0.06	1.4	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5051	MW-7	11-Sep-98	< 0.03	< 0.05	1.2	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5051	MW-8	11-Dec-95	< 0.02	0.004	1.2	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0002
5051	MW-8	13-Dec-96	< 0.02	0.008	1.0	< 0.002	< 0.005	< 0.01	< 0.005	< 0.01	< 0.04	< 0.0002
5051	MW-8	27-Apr-98	< 0.03	0.06	0.71	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5051	MW-8	19-Jun-98	< 0.03	0.05	1	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5051	MW-8	11-Sep-98	< 0.03	< 0.05	0.09	< 0.005	0.010	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well	Sample Date	Molybdenum (Mo)	Nickel (Ni)	Selenium (Se)	Silver (Ag)	Thallium (Tl)	Vanadium (V)	Zinc (Zn)	TDS	pH (SU)	Chloride
		MCL	--	0.1	0.05	0.1[+]	0.002	--	5			
5051	MWA-2	2-Jun-95	0.07	0.21	< 4	< 0.005	< 0.05	0.012	5.5	NA	NA	
5051	MWA-2	12-Dec-95	0.06	0.19	< 4	< 0.005	< 0.05	0.032	4.6	NA	NA	
5051	MWA-2	13-Dec-96	0.040	0.11	< 0.004	0.006	< 0.05	0.005	4.1	1,600	7.0	
5051	MWA-2	27-Apr-98	0.04	0.11	< 0.07	< 0.01	< 0.05	0.02	3.2	1,300	7.04	
5051	MWA-2	19-Jun-98	0.03	0.09	< 0.07	< 0.01	< 0.05	< 0.01	2.2	1,500	6.76	
5051	MWA-2	11-Sep-98	0.01	0.05	< 0.07	< 0.01	< 0.05	0.04	1.1	1,500	6.73	
5051	MWA-3	2-Jun-95	< 0.01	< 0.01	< 4	< 0.005	< 0.05	< 0.005	2	NA	NA	
5051	MWA-3	12-Dec-95	< 0.01	0.04	< 4	< 0.005	0.05	0.007	26	NA	NA	
5051	MWA-3	13-Dec-96	< 0.01	0.01	< 0.004	< 0.005	< 0.05	< 0.005	1.5	2,400	7.0	
5051	MWA-3	27-Apr-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	13	2,200	7.11	
5051	MWA-3	19-Jun-98	< 0.01	0.03	< 0.07	< 0.01	< 0.05	0.02	14	2,300	6.20	
5051	MWA-3	11-Sep-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	4.2	1,800	6.98	
5051	MW-4	11-Dec-95	< 0.1	3.0	< 0.02	< 0.05	< 500	< 0.05	430	NA	NA	
5051	MW-4	13-Dec-96	< 0.01	1.0	< 0.004	< 0.05	< 0.5	< 0.05	660	7,100	5.5	
5051	MW-4	27-Apr-98	< 0.01	0.96	< 0.07	< 0.01	< 0.05	< 0.01	670	6,800	6.21	
5051	MW-4	19-Jun-98	< 0.01	1	< 0.07	< 0.01	< 0.05	< 0.01	1000	6,800	5.64	
5051	MW-4	11-Sep-98	< 0.01	0.89	< 0.07	< 0.01	< 0.05	< 0.01	1,400	7,800	5.98	
5051	MW-5	11-Dec-95	< 0.01	< 0.01	< 4	< 0.005	< 0.05	< 0.005	0.02	NA	NA	
5051	MW-5	13-Dec-96	< 0.01	< 0.01	< 0.004	< 0.005	< 0.05	< 0.005	0.17	3,600	7.2	
5051	MW-5	27-Apr-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	< 0.01	2,800	7.37	
5051	MW-5	19-Jun-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.92	2,800	6.89	
5051	MW-5	11-Sep-98	< 0.01	< 0.02	0.07	< 0.01	< 0.05	< 0.01	0.17	2,800	6.99	
5051	MW-6	11-Dec-95	0.03	0.03	< 4	< 0.005	< 0.05	0.022	0.02	NA	NA	
5051	MW-6	13-Dec-96	0.02	0.01	< 0.004	< 0.005	< 0.05	0.034	0.08	4,300	7.5	
5051	MW-6	27-Apr-98	0.02	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	< 0.01	3,700	7.37	
5051	MW-6	19-Jun-98	0.03	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.08	3,600	7.40	
5051	MW-6	11-Sep-98	0.04	< 0.02	0.12	< 0.01	< 0.05	< 0.01	0.11	3,400	7.18	
5051	MW-7	11-Dec-95	< 0.01	0.02	< 4	< 0.005	< 0.05	< 0.005	0.04	NA	NA	
5051	MW-7	13-Dec-96	< 0.01	0.02	< 0.004	0.006	< 0.05	< 0.005	0.02	18,100	6.8	
5051	MW-7	27-Apr-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.01	6,300	7.10	
5051	MW-7	19-Jun-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.24	5,700	7.29	
5051	MW-7	11-Sep-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.13	5,900	6.73	
5051	MW-8	11-Dec-95	< 0.01	< 0.01	< 4	< 0.005	0.05	0.011	0.01	NA	NA	
5051	MW-8	13-Dec-96	< 0.01	< 0.01	< 0.004	0.006	< 0.05	0.011	0.01	9,000	7.1	
5051	MW-8	27-Apr-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.04	8,400	7.10	
5051	MW-8	19-Jun-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.74	8,400	6.48	
5051	MW-8	11-Sep-98	0.03	< 0.02	< 0.07	< 0.01	< 0.05	0.02	0.07	1,800	6.67	

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Antimony (Sb)	Arsenic (As)	Barium (Ba)	Beryllium (Be)	Cadmium (Cd)	Chromium (Cr)	Cobalt (Co)	Copper (Cu)	Lead (Pb)	Mercury (Hg)
	MCL			0.006	0.05	1	0.004	0.005	0.05	--	1.3[+]	0.015[++]	0.002
5200	CW-1		1-Oct-96	< 0.03	0.52	2.5	< 0.005	< 0.005	< 0.01	<0.01	< 0.01	< 0.05	< 0.0005
5200	CW-1		19-Aug-97	< 0.03	0.56	90.	< 0.005	< 0.005	< 0.01	0.08	< 0.01	< 0.05	< 0.0005
5200	CW-1		11-Dec-97	< 0.03	0.56	70.	< 0.005	< 0.005	< 0.01	0.06	< 0.01	< 0.05	< 0.0005
5200	CW-1		25-Mar-98	< 0.03	0.43	80	< 0.005	< 0.005	0.13	0.07	< 0.01	< 0.05	< 0.0005
5200	CW-1		19-Jun-98	< 0.03	0.18	3.6	< 0.005	< 0.005	<0.01	<0.01	< 0.01	< 0.05	< 0.0005
5200	CW-1		10-Sep-98	< 0.03	0.19	0.79	<0.005	<0.005	0.03	0.01	<0.01	<0.05	<0.0005
5200	CW-2		1-Oct-96	< 0.03	3.5	220	< 0.005	< 0.005	< 0.01	0.2	< 0.01	< 0.05	< 0.0005
5200	CW-2		19-Aug-97	< 0.03	2.6	220	< 0.005	< 0.005	< 0.01	0.20	< 0.01	< 0.05	< 0.0005
5200	CW-2		11-Dec-97	< 0.03	3.6	150	< 0.005	< 0.005	< 0.01	0.14	< 0.01	< 0.05	< 0.0005
5200	CW-2		25-Mar-98	< 0.03	1.8	230	< 0.005	< 0.005	0.13	0.07	0.01	< 0.05	< 0.0005
5200	CW-2		19-Jun-98	< 0.03	2.1	170	< 0.005	< 0.005	<0.01	0.13	<0.01	< 0.05	< 0.0005
5200	CW-2		10-Sep-98	< 0.03	2.9	190	< 0.005	< 0.005	<0.01	0.12	<0.01	< 0.05	< 0.0005
5200	CW-3		1-Oct-96	< 0.03	3.3	1,000	< 0.005	< 0.005	< 0.01	0.9	< 0.01	< 0.05	< 0.0005
5200	CW-3		19-Aug-97	< 0.03	8.9	1,200	< 0.005	< 0.005	< 0.01	1.1	< 0.01	< 0.05	< 0.0005
5200	CW-3	(2)	11-Dec-97	< 0.03	10.	1,400	< 0.005	< 0.005	< 0.01	1.2	< 0.01	< 0.05	< 0.0005
5200	CW-3		25-Mar-98	< 0.03	9.8	380	< 0.005	< 0.005	0.10	0.27	< 0.01	< 0.05	< 0.0005
5200	CW-3		19-Jun-98	< 0.03	21	470	< 0.005	< 0.005	<0.01	0.35	< 0.01	< 0.05	< 0.0005
5200	CW-3		10-Sep-98	< 0.03	24	340	< 0.005	< 0.005	<0.01	0.22	< 0.01	< 0.05	< 0.0005
5200	CW-4		1-Oct-96	< 0.03	0.24	3.6	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5200	CW-4		19-Aug-97	< 0.03	0.18	2.5	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5200	CW-4		11-Dec-97	< 0.03	0.30	2.1	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5200	CW-4		25-Mar-98	< 0.03	0.15	2.1	< 0.005	< 0.005	0.92	0.04	0.04	< 0.05	< 0.0005
5200	CW-4		19-Jun-98	< 0.03	0.10	4.7	< 0.005	< 0.005	0.02	< 0.01	0.01	< 0.05	< 0.0005
5200	CW-4		10-Sep-98	< 0.03	0.24	1.3	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5200	CW-5		1-Oct-96	< 0.03	0.54	31	< 0.005	< 0.005	< 0.01	0.03	< 0.01	<0.01	< 0.0005
5200	CW-5		19-Aug-97	< 0.03	0.46	25.	< 0.005	< 0.005	< 0.01	0.02	< 0.01	< 0.05	< 0.0005
5200	CW-5	(2)	11-Dec-97	< 0.03	0.45	25.	< 0.005	< 0.005	< 0.01	0.02	< 0.01	< 0.05	< 0.0005
5200	CW-5		25-Mar-98	< 0.03	0.30	3	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5200	CW-5		19-Jun-98	< 0.03	0.18	3.4	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
5200	CW-5		10-Sep-98	< 0.03	0.33	19	< 0.005	< 0.005	< 0.01	0.01	< 0.01	< 0.05	< 0.0005
5200	CW-6		29-Sep-98	< 0.03	0.13	470	< 0.005	0.1	< 0.01	0.34	< 0.01	<0.05	< 0.0005
5200	CW-6-H		8-Oct-98	-	0.33	610	-	0.2	-	-	-	-	-
5200	CW-6-L		8-Oct-98	-	0.09	460	-	0.11	-	-	-	-	-

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well		Sample Date	Molybdenum (Mo)	Nickel (Ni)	Selenium (Se)	Silver (Ag)	Thallium (Tl)	Vanadium (V)	Zinc (Zn)	TDS	pH (SU)	Chloride
		MCL		--	0.1	0.05	0.1+	0.002	--	5			
5200	CW-1		1-Oct-96	0.02	< 0.02	< 0.05	< 0.01	< 0.05	0.08	0.01		8.4	
5200	CW-1		19-Aug-97	0.02	< 0.02	< 0.05	< 0.01	< 0.05	0.10	< 0.01		8.15	
5200	CW-1		11-Dec-97	0.01	< 0.02	< 0.05	< 0.01	< 0.05	0.04	1.3		7.67	
5200	CW-1		25-Mar-98	0.02	0.39	< 0.07	< 0.01	< 0.05	< 0.01	1.3	1,000	7.61	
5200	CW-1		19-Jun-98	0.03	0.03	< 0.07	< 0.01	< 0.05	< 0.01	7.9	1,700	6.95	
5200	CW-1		10-Sep-98	0.02	<0.02	<0.07	<0.01	<0.05	<0.01	15	1,500	6.70	
5200	CW-2		1-Oct-96	< 0.01	< 0.02	< 0.05	< 0.01	< 0.05	< 0.01	0.06		6.8	
5200	CW-2		19-Aug-97	< 0.01	< 0.02	< 0.05	< 0.01	< 0.05	< 0.01	< 0.01		7.60	
5200	CW-2		11-Dec-97	< 0.01	< 0.02	< 0.05	< 0.01	< 0.05	< 0.01	0.05		7.30	
5200	CW-2		25-Mar-98	< 0.01	1.4	< 0.07	< 0.01	< 0.05	0.02	0.07	900	8.61	
5200	CW-2		19-Jun-98	0.05	<0.02	< 0.07	< 0.01	< 0.05	<0.01	0.08	930	6.88	
5200	CW-2		10-Sep-98	<0.01	<0.02	< 0.07	< 0.01	< 0.05	<0.01	<0.01	1,200	6.81	
5200	CW-3		1-Oct-96	0.02	< 0.02	< 0.05	< 0.01	< 0.05	0.04	< 0.01		10.1	
5200	CW-3		19-Aug-97	0.02	< 0.02	< 0.05	< 0.01	< 0.05	0.03	< 0.01		10.65	
5200	CW-3	(2)	11-Dec-97	0.01	< 0.02	< 0.05	< 0.01	< 0.05	0.03	0.03		10.17	
5200	CW-3		25-Mar-98	0.02	0.29	< 0.07	< 0.01	< 0.05	< 0.01	0.03	2,200	10.75	
5200	CW-3		19-Jun-98	0.05	<0.02	< 0.07	< 0.01	< 0.05	0.02	<0.01	1,100	10.80	
5200	CW-3		10-Sep-98	0.04	<0.02	< 0.07	< 0.01	< 0.05	0.02	0.11	8,000	10.10	
5200	CW-4		1-Oct-96	0.13	< 0.02	< 0.05	< 0.01	< 0.05	0.04	0.02		9.8	
5200	CW-4		19-Aug-97	0.10	< 0.02	< 0.05	< 0.01	< 0.05	0.03	0.09		10.34	
5200	CW-4		11-Dec-97	0.07	< 0.02	< 0.05	< 0.01	< 0.05	0.03	0.03		9.64	
5200	CW-4		25-Mar-98	0.03	2.7	< 0.07	< 0.01	< 0.05	< 0.01	0.03	1,500	9.86	
5200	CW-4		19-Jun-98	0.06	< 0.02	< 0.07	< 0.01	< 0.05	0.08	0.34	1,400	9.83	
5200	CW-4		10-Sep-98	0.09	< 0.02	< 0.07	< 0.01	< 0.05	0.02	0.12	1,500	9.40	
5200	CW-5		1-Oct-96	0.01	< 0.02	< 0.05	< 0.01	< 0.05	0.01	0.01		7.1	
5200	CW-5		19-Aug-97	< 0.01	< 0.02	< 0.05	< 0.01	< 0.05	< 0.01	< 0.01		7.81	
5200	CW-5	(2)	11-Dec-97	< 0.01	< 0.02	< 0.05	< 0.01	< 0.05	< 0.01	0.01		7.69	
5200	CW-5		25-Mar-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.05	1,400	7.92	
5200	CW-5		19-Jun-98	0.08	< 0.02	< 0.07	< 0.01	< 0.05	0.02	0.1	1,400	7.60	
5200	CW-5		10-Sep-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.04	1,100	7.35	
5200	CW-6		29-Sep-98	< 0.01	0.26	< 0.07	< 0.01	< 0.05	0.02	15	3,900	6.71	
5200	CW-6-H		8-Oct-98	-	-	-	-	-	-	33	4,300	6.60	1,700
5200	CW-6-L		8-Oct-98	-	-	-	-	-	-	15	4,100	6.70	1,300

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well	Sample Date	Antimony (Sb)	Arsenic (As)	Barium (Ba)	Beryllium (Be)	Cadmium (Cd)	Chromium (Cr)	Cobalt (Co)	Copper (Cu)	Lead (Pb)	Mercury (Hg)
	MCL		0.006	0.05	1	0.004	0.005	0.05	--	1.3[+]	0.015[++]	0.002
ACPWA	CW-7	29-Sep-98	< 0.03	< 0.05	140	< 0.005	< 0.005	< 0.01	0.08	< 0.01	< 0.05	< 0.0005
ACPWA	CW-7-D1	29-Sep-98	< 0.0050	0.040	140	< 0.0050	0.0024	< 0.0050	0.0052	0.0091	0.015	< 0.00050
ACPWA	CW-7-D2	29-Sep-98	-	-	-	-	-	-	-	-	-	-
ACPWA	CW-7-H	8-Oct-98	-	0.070	167	-	<0.005	-	-	-	-	-
ACPWA	CW-7-L	8-Oct-98	-	<0.05	120	-	<0.005	-	-	-	-	-
ACPWA	CW-8	11-Sep-98	< 0.03	< 0.05	1.1	< 0.005	< 0.05	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
ACPWA	CW-9	11-Sep-98	< 0.03	0.05	0.53	< 0.005	< 0.005	<0.01	0.02	0.02	< 0.05	< 0.0005
ACPWA	CW-10	29-Sep-98	< 0.03	< 0.05	0.27	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
ACPWA	CW-10-D1	29-Sep-98	0.0057	< 0.0050	0.21	< 0.0050	< 0.0020	< 0.0050	0.010	0.032	< 0.0050	< 0.00050
ACPWA	CW-10-D2	29-Sep-98										
ACPWA	CW-10-H	8-Oct-98	-	0.06	-	-	< 0.005	-	-	-	-	-
ACPWA	CW-10-L	8-Oct-98	-	0.08	-	-	0.007	-	-	-	-	-
ACPWA	CW-12	29-Sep-98	< 0.03	< 0.05	0.2	< 0.005	< 0.005	< 0.01	< 0.01	< 0.01	< 0.05	< 0.0005
ACPWA	CW-12-H	8-Oct-98	-	<0.05	-	-	< 0.005	-	-	-	-	-
ACPWA	CW-12-L	8-Oct-98	-	<0.05	-	-	< 0.005	-	-	-	-	-
5200	CW-13	11-Sep-98	< 0.03	0.09	0.11	< 0.005	1.4	<0.01	1.4	< 0.01	< 0.05	< 0.0005
5200	CW-13-H	8-Oct-98	-	<0.05	-	-	1.2	-	-	-	-	-
5200	CW-13-L	8-Oct-98	-	<0.05	-	-	1.2	-	-	-	-	-

TABLE 6
Metals, Total Dissolved Solids, pH and Chloride Detected in Groundwater
5050, 5051 5200 Coliseum Way
Concentrations in Milligrams per Liter (mg/L)

Site	Monitoring Well	Sample Date	Molybdenum (Mo)	Nickel (Ni)	Selenium (Se)	Silver (Ag)	Thallium (Tl)	Vanadium (V)	Zinc (Zn)	TDS	pH (SU)	Chloride
	MCL		--	0.1	0.05	0.1[+]	0.002	--	5			
ACPWA	CW-7	29-Sep-98	0.02	< 0.02	< 0.07	< 0.01	< 0.05	0.02	0.02	820	9.79	
ACPWA	CW-7-D1	29-Sep-98	0.029	0.0089	< 0.0050	< 0.0050	< 0.0050	0.031	0.20			
ACPWA	CW-7-D2	29-Sep-98	-	-	-	-	-	-		770		
ACPWA	CW-7-H	8-Oct-98	-	-	-	-	-	-	0.08	860	10.70	860
ACPWA	CW-7-L	8-Oct-98	-	-	-	-	-	-	0.28	880	10.50	880
ACPWA	CW-8	11-Sep-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.08	8,700	7.54*	
ACPWA	CW-9	11-Sep-98	< 0.01	0.07	< 0.07	< 0.01	< 0.05	< 0.01	0.02	21,000	6.72*	
ACPWA	CW-10	29-Sep-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.04	17,000	7.25	
ACPWA	CW-10-D1	29-Sep-98	< 0.0050	0.026	0.025	< 0.0050	< 0.0050	< 0.0050	0.069			
ACPWA	CW-10-D2	29-Sep-98								17,000		
ACPWA	CW-10-H	8-Oct-98	-	-	-	-	-	-	0.78	21,000	7.20	9,800
ACPWA	CW-10-L	8-Oct-98	-	-	-	-	-	-	0.16	19,000	7.30	7,700
ACPWA	CW-12	29-Sep-98	< 0.01	< 0.02	< 0.07	< 0.01	< 0.05	< 0.01	0.03	12,000	7.95	
ACPWA	CW-12-H	8-Oct-98	-	-	-	-	-	-	2	13,000	7.80	5,900
ACPWA	CW-12-L	8-Oct-98	-	-	-	-	-	-	2	13,000	7.70	5,400
5200	CW-13	11-Sep-98	< 0.01	2.8	< 0.07	< 0.01	< 0.05	< 0.01	1,900	8,600	5.66*	
5200	CW-13-H	8-Oct-98	-	-	-	-	-	-	1,300	9,300	5.60	1,100
5200	CW-13-L	8-Oct-98	-	-	-	-	-	-	1,200	9,100	5.60	920

FOOTNOTES:
(Sb) = Chemical Symbol for Metal (eg. Antimony)
TDS = Total dissolved solids
MCL = Maximum Contaminant Levels for Drinking Water (CCR Title 22, Sections 64431 and 64444)
-- = Not established
[+] = Secondary Drinking Water Standard
[++] = Lead level established by the Federal Copper and Lead Rule for public drinking water suppliers
(SU) = Standard Units
* = Sample date reported as 1992 in tables by LFR (Date corrected to 1991 by Clayton)
(1) = Labeling error in the field or laboratory may account for anomalous data reported for wells MW-2 and MW-3 (LFR)
(2) = Labeling error in the field, well numbers reversed (CW-3 and CW-5)
- = Not analyzed

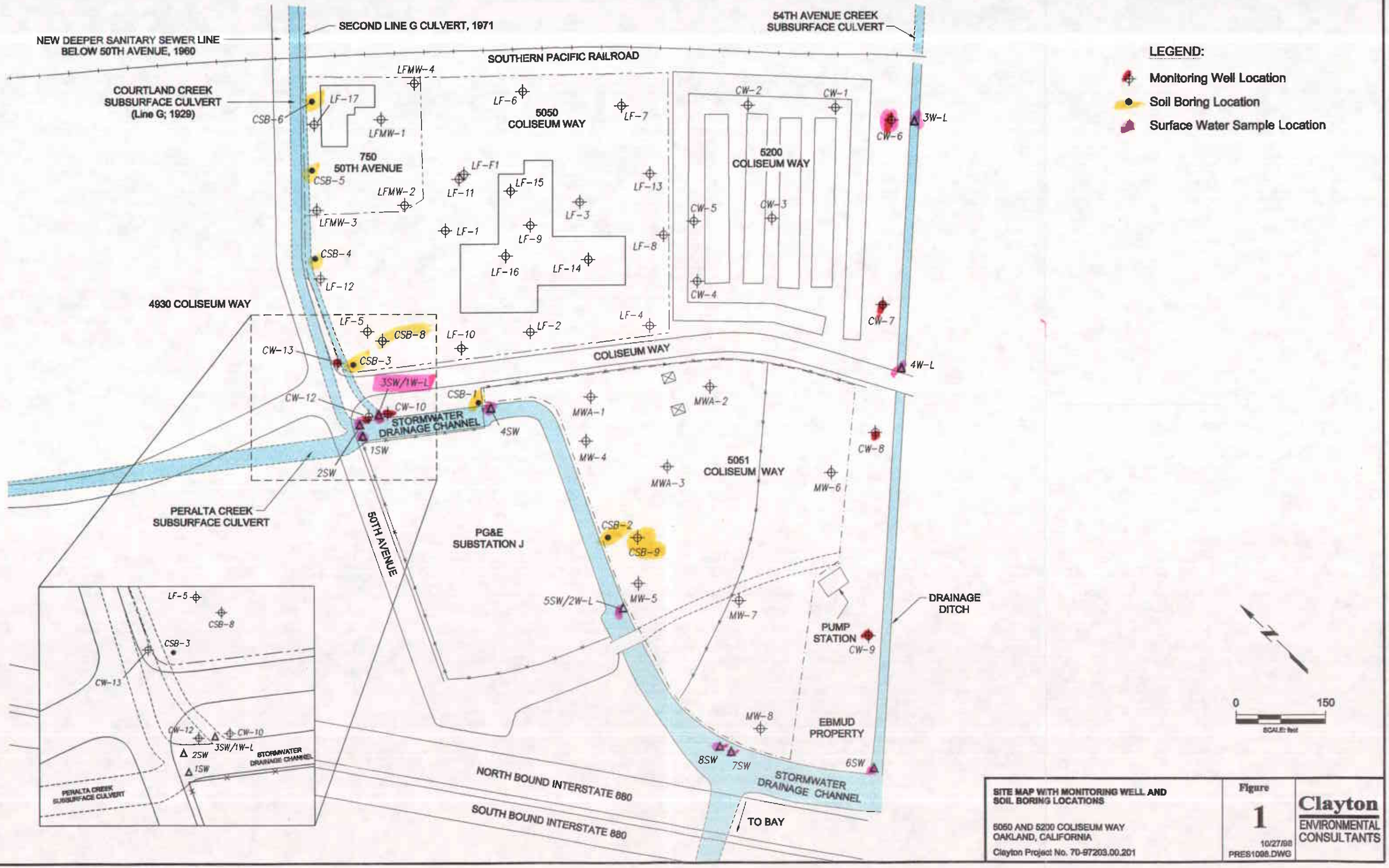
TABLE 5
Petroleum Hydrocarbons Detected in Groundwater
5050, 5051 & 5200 Coliseum Way
(Concentrations Reported in Milligrams per Liter [mg/L])

Sample ID	Date Sampled	TEPH	TPH-D	TPH-O	TPH-G	Benzene	Ethyl-Benzene	Toluene	Total Xylenes
	MCL	--	--	--	--	0.001	0.7	1	10
LF-1	04-Nov-91	NA	NA	NA	< 0.05	< 0.005	< 0.005	< 0.005	< 0.01
LF-1	20-Aug-97	0.44	< 0.2	0.4	< 0.05	< 0.0004	< 0.0003	0.0003	0.0005
LF-1	11-Dec-97	0.86	< 0. 6	0.5	< 0.05	0.0011	< 0.0003	0.0003	< 0.0004
LF-1	25-Mar-98	NA	< 0.06	< 0.2	0.30	0.0004	< 0.0003	< 0.0003	0.0005
LF-1	17-Jun-98	NA	<0.05	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
LF-1	09-Sep-98	0.21	< 0.07rl	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
LF-2	04-Nov-91	NA	0.3	NA	< 0.05	< 0.005	< 0.005	< 0.005	< 0.01
LF-2	20-Aug-97	NA	NA	NA	NA	NA	NA	NA	NA
LF-2	19-Dec-97	1.4	< 0.9	1.0	< 0.05	< 0.0004	< 0.0003	0.0005	0.0007
LF-2	24-Mar-98	NA	< 0.2	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
LF-2	18-Jun-98	NA	<0.05	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
LF-2	10-Sep-98	< 0.05	<0.05	< 0.2	< 0.05	< 0.0004	< 0.0003	0.0007	0.0006
LF-3	04-Nov-91	NA	0.2	NA	< 0.05	< 0.005	< 0.005	< 0.005	< 0.01
LF-3	25-May-94	NA	0.3	0.4	< 0.05	NA	NA	NA	NA
LF-103 (dup)	25-May-94	NA	0.3	0.4	< 0.05	NA	NA	NA	NA
LF-3	23-Sep-94	NA	1.2	<0.2	< 0.05	NA	NA	NA	NA
LF-103 (dup)	23-Sep-94	NA	1	<0.2	< 0.05	NA	NA	NA	NA
LF-3	20-Dec-94	NA	0.89	0.2	< 0.05	< 0.0005	< 0.0005	< 0.0005	< 0.002
LF-103 (dup)	20-Dec-94	NA	0.88	0.2	< 0.05	< 0.0005	< 0.0005	< 0.0005	< 0.002
LF-3	15-Mar-95	NA	0.8	<0.2	< 0.05	< 0.0005	< 0.0005	< 0.0005	< 0.002
LF-3	07-Sep-95	NA	0.62	0.4	< 0.05	< 0.0005	< 0.0005	< 0.0005	< 0.002
LF-3	20-Aug-97	1.0	< 0.5	0.8	< 0.05	< 0.0004	< 0.0003	< 0.0003	<0.0004
LF-3	19-Dec-97	1.4	< 0.5	1.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
LF-3	25-Mar-98	NA	< 0.8	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
LF-3	18-Jun-98	NA	<0.05	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004
LF-3	10-Sep-98	0.100	<0.05	< 0.2	< 0.05	< 0.0004	< 0.0003	< 0.0003	< 0.0004

Table 7
Surface Water Analytical Results
Coliseum Way Properties Oakland, California
All data is reported in milligrans per liter (mg/L)

SAMPLE	1W-L	2W-L	3W-L	4W-L	1SW	2SW	3SW	4SW	5SW	6SW	7SW	8SW	MCL	Basin Plan 1 Shallow Water limits	Basin Plan 2 Salinity >5 ppt
Sample Date	10/8/98	10/8/98	10/8/98	10/8/98	10/13/98	10/13/98	10/13/98	10/13/98	10/13/98	10/13/98	10/13/98	10/13/98			
Tide Stage	Low	Low	Low	Low	Low	Low	Low	Low	Low	Low	Low	Flood			
DISSOLVED METALS															
Arsenic	0.05	0.06	<0.05	0.06	<0.05	0.06	<0.05	<0.05	0.05	0.07	<0.05	0.07	0.05	0.02	0.036*
Barium	-	0.13	0.37	0.41	0.15	0.11	0.09	0.09	0.11	0.11	0.11	0.11	1	NE	NE
Cadmium	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	0.005	0.01	0.0093*
Zinc	0.09	0.12	0.10	0.08	0.29	0.55	0.03	0.03	0.07	0.06	0.06	0.05	5	0.058	0.058**
Water Quality															
Chloride	2,700	11,000	6,300	11,000	-	-	-	-	-	-	-	-			
Total Dissolved Solids	3,200	24,000	19,000	24,000	-	-	-	-	-	-	-	-			
pH	8.1	7.6	7.4	7.5	-	-	-	-	7.06 Field	-	-	-			

Abbreviations and Modifiers:
MCL = Maximum Contaminant Levels for Drinking Water from California Code of Regulations (CCR) Title 22, Section 64431 through 64444
PRG = Health Based Preliminary Remedial Goals set by USEPA Region IX - Tap Water scenario.
Basin Plan # = San Francisco Bay Region Water Quality Control Plan issued by California Regional Water Quality Control Board
Basin Plan 1 - Effluent Limitations for Selected Toxic Pollutants Discharged to Surface Waters - Shallow Water Limits given
Basin Plan 2 - Water quality Objectives for Selected Toxic Pollutants for Surface Waters with Salinities Greater than 5 parts per thousand
(* 4-day average, ** 24-hour average)
- = Not Analysed
NE = Not Established
<0.03 = The analyte was not detected at or above the laboratory reporting limit concentration listed



SITE MAP WITH MONITORING WELL AND SOIL BORING LOCATIONS

5050 AND 5200 COLISEUM WAY
OAKLAND, CALIFORNIA

Clayton Project No. 70-97203.00.201

Figure 1

10/27/98
PRES1098.DWG

Clayton ENVIRONMENTAL CONSULTANTS

NEW DEEPER SANITARY SEWER LINE BELOW 50TH AVENUE, 1960

SECOND LINE G CULVERT, 1971

54TH AVENUE CREEK SUBSURFACE CULVERT

SOUTHERN PACIFIC RAILROAD

COURTLAND CREEK SUBSURFACE CULVERT (Line G; 1929)

LFMW-4

B'

LF-17

CSB-6

LFMW-1

LF-6

5050 COLISEUM WAY

LF-7

CW-2

CW-1

3W-L

CW-6

750 50TH AVENUE

CSB-5

LF-F1

LF-15

LF-13

5200 COLISEUM WAY

LFMW-2

LF-11

SB-21

LF-3

CW-5

CW-3

LFMW-3

LF-1

SB-4

A'

LF-9

LF-8

CSB-4

SB-12

SS-11

LF-12A

LF-16

LF-14

LF-12

CW-4

CW-7

SS-13

4930 COLISEUM WAY

LF-5

LF-4

CSB-8

LF-10

LF-2

CW-13

SB-14

CSB-3

B

COLISEUM WAY

4W-L

3SW/1W-L

CSB-1

CW-12

CW-10

MWA-1

MWA-2

STORMWATER DRAINAGE CHANNEL

4SW

1SW

MW-4

CW-8

5051 COLISEUM WAY

MWA-3

MW-6

2SW

PERALTA CREEK SUBSURFACE CULVERT

50TH AVENUE

PG&E SUBSTATION J

CSB-2

CSB-9

5SW/2W-L

MW-5

MW-7

DRAINAGE DITCH

PUMP STATION

CW-9

MW-8

EBMUD PROPERTY

8SW

7SW

6SW

STORMWATER DRAINAGE CHANNEL

NORTH BOUND INTERSTATE 880

SOUTH BOUND INTERSTATE 880

TO BAY

LEGEND:

- Monitoring Well Location
- Soil Boring Location
- Surface Water Sample Location

0 150

SCALE: feet

CROSS-SECTION LOCATIONS

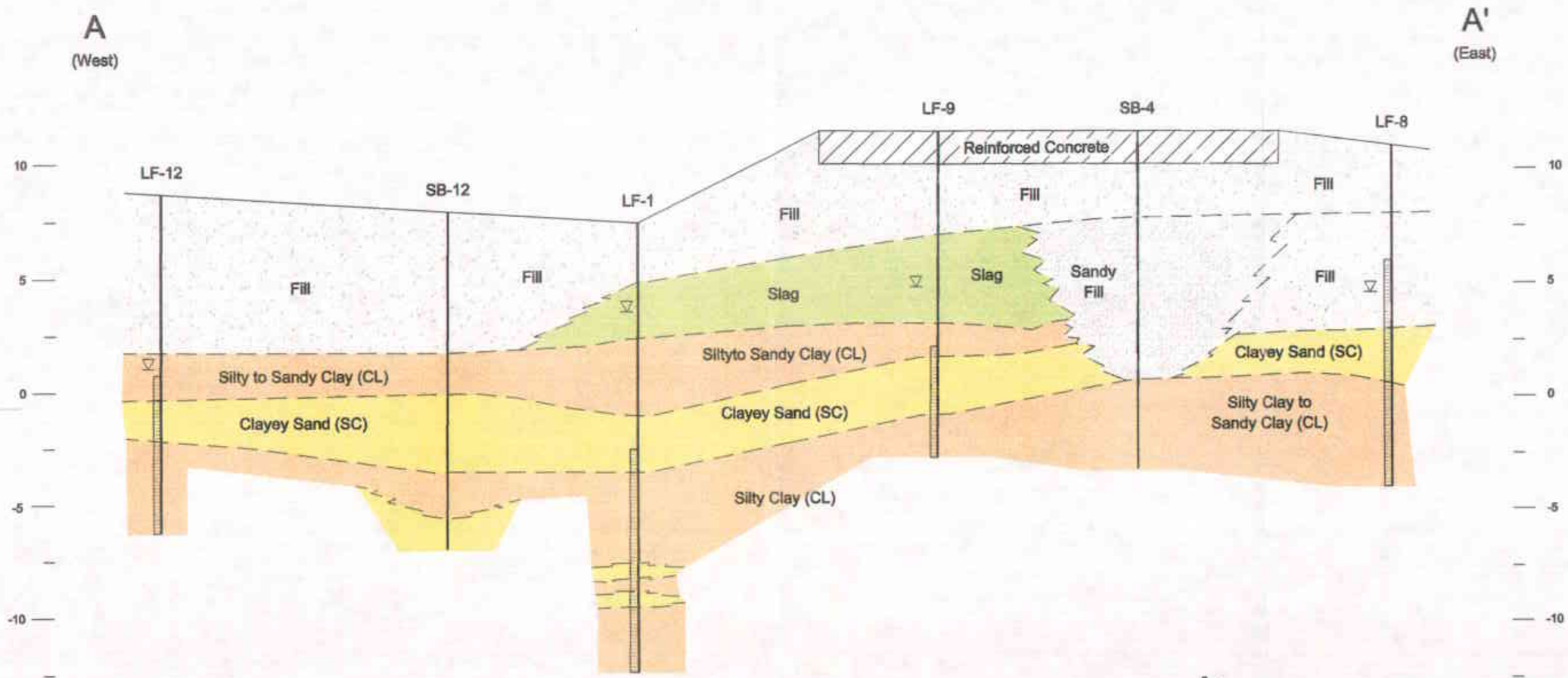
5050 AND 5200 COLISEUM WAY
OAKLAND, CALIFORNIA

Clayton Project No. 70-97203.00.201

Figure 2

10/27/98
PRES1098.DWG

Clayton ENVIRONMENTAL CONSULTANTS



CROSS-SECTION A-A' 5050 AND 5200 COLISEUM WAY OAKLAND, CALIFORNIA Clayton Project No. 70-97203.00.201	Figure 3 10/27/08 SECT-A.DWG	Clayton ENVIRONMENTAL CONSULTANTS

B (West)

B' (East)

Second Line G Culvert

CW-13 SB-14 LF-5 CSB-8 SB-13 LF-1 SB-21 LF-11 LF-F1 LF-6

10 5 0 -5 -10 -15 -20 -25 -30 -35 -40 -45

CW-13 (soil)

	As	Ba	Cd	Zn	
5'	0.9	126	<0.4	105	

CSB-8 (soil)

	As	Ba	Cd	Zn	pH
5'	53	48	3.3	1,100	8.0

CSB-8 (soil)

	As	Ba	Cd	Zn	pH
10'	1.6	160	100	29	8.2

CSB-8 (soil)

	As	Ba	Cd	Zn	pH
15'	9.1	67	<0.4	48	8.8

CSB-8 (soil)

	As	Ba	Cd	Zn	pH
20'	4	73	<0.4	46	8.4

CSB-8 (soil)

	As	Ba	Cd	Zn	pH
25'	3	39	0.4	31	8.0

CSB-8 (soil)

	As	Ba	Cd	Zn	pH
30'	2	360	0.9	52	7.2

CSB-8 (soil)

	As	Ba	Cd	Zn	pH
35'	1	69	<0.4	36	7.5

CSB-8 (soil)

	As	Ba	Cd	Zn	pH
40'	3	230	<0.4	34	7.4

CSB-8 (soil)

	As	Ba	Cd	Zn	pH
45'	5	200	<0.4	48	7.2

CSB-8 (soil)

	As	Ba	Cd	Zn	pH
50'	3	85	<0.4	30	7.3

CSB-8 (soil)

	As	Ba	Cd	Zn	pH
55'	2	130	<0.4	30	7.4

LF-5 (groundwater)

	As	Ba	Cd	Zn	pH	TDS
12-22'	<0.05	0.08	0.19	36	6.22	7,800

CSB-8 (groundwater)

	As	Ba	Cd	Zn	pH	TDS	CL
25'	0.1	0.51	0.013	0.11	7.1	25,000	12,000

CSB-8 (groundwater)

	As	Ba	Cd	Zn	pH	TDS	CL
45'	0.05	0.52	0.008	0.04	6.5	15,000	7,400

Fill
Silt to Sandy Silt
Fill
Clayey to Sandy Silt
Clayey Sandy Gravel
Silt to Sandy Silt
Sand
Silt
Sand
Silt to Sandy Silt
Clayey Silt
Silt to Sandy Silt
Clayey Silt
Silt
Clayey Silt
Sand to Silty Sand
Silt
Sandy Silt
Clayey Silt to Silty Clay
Fill
Fill
Slag
Silty to Sandy Clay (CL)
Clayey Sand (SC)
Silty to Sandy Clay (CL)
Fill
Slag
Slag
Silty Clay (CL)
Clayey Sand (SC)
Silty Clay (CL)

go not penetrate

LEGEND:

Soil Data

CSB-8 (soil)

	As	Ba	Cd	Zn	pH
5'	53	48	33	1,100	8.0

Metal and Concentration in Soil (mg/kg)

Sample Depth (feet); below ground surface

Groundwater Data

CSB-8 (groundwater)

	As	Ba	Cd	Zn	pH	TDS	CL
25'	0.1	0.51	0.013	0.11	7.1	25,000	12,000

Metal and Concentration in Groundwater (mg/L)

Sample Depth (feet); discrete is single number; range is screened interval at depth below ground surface

As - Arsenic
Ba - Barium
Ca - Cadmium
Zn - Zinc
pH - in Standard Units
TDS - Total Dissolved Solids
CL - Chlorides

5 0 0 50
SCALE: feet

CROSS-SECTION B-B'

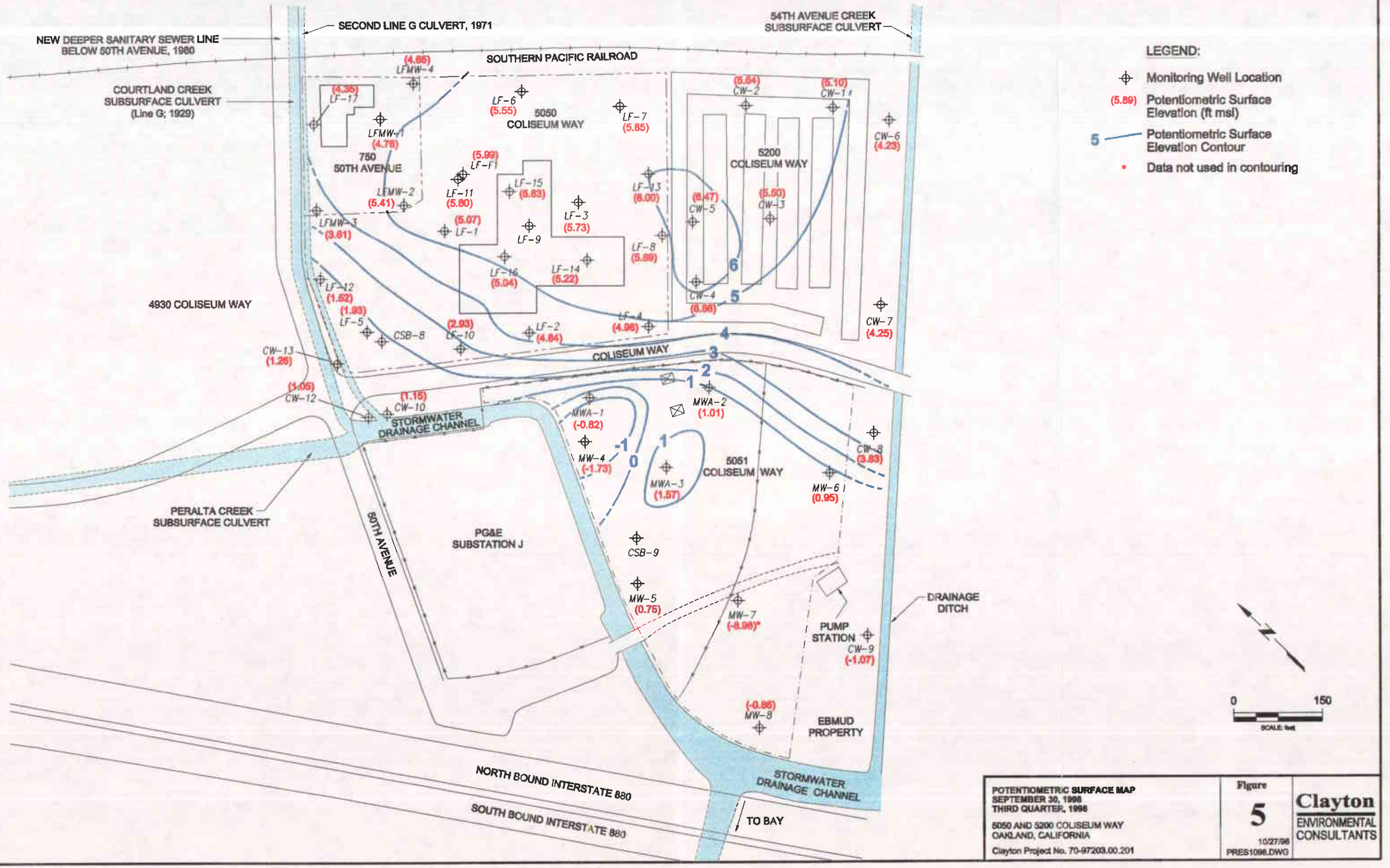
5050 AND 5200 COLISEUM WAY
OAKLAND, CALIFORNIA

Clayton Project No. 70-97203.00.201

Figure 4

10/27/98
SECT-A.DWG

Clayton ENVIRONMENTAL CONSULTANTS



POTENTIOMETRIC SURFACE MAP
SEPTEMBER 30, 1996
THIRD QUARTER, 1996

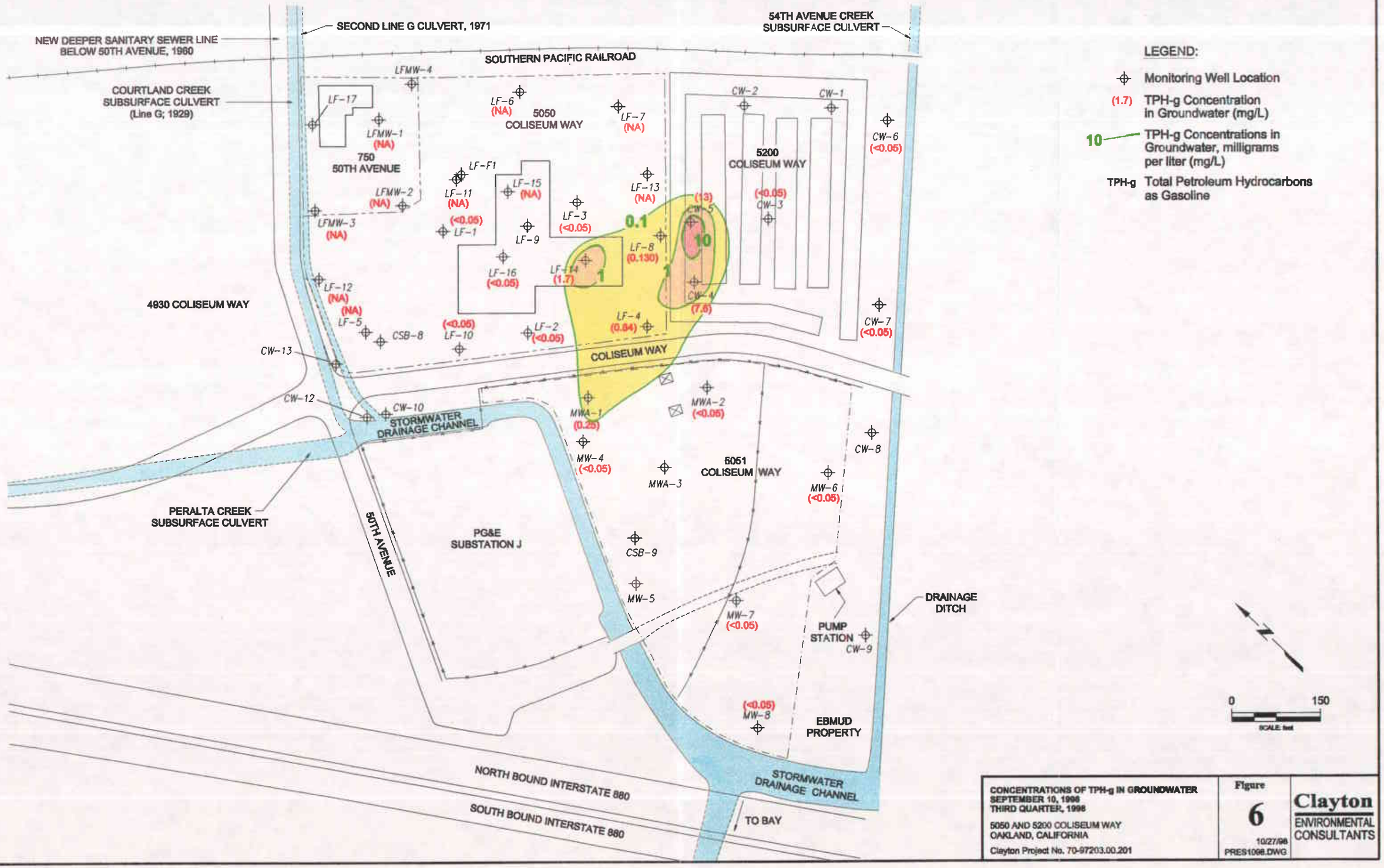
5050 AND 5200 COLISEUM WAY
OAKLAND, CALIFORNIA

Clayton Project No. 70-97203.00.201

Figure **5**

10/27/96
PRES1096.DWG

Clayton ENVIRONMENTAL CONSULTANTS



CONCENTRATIONS OF TPH-g IN GROUNDWATER
SEPTEMBER 10, 1998
THIRD QUARTER, 1998

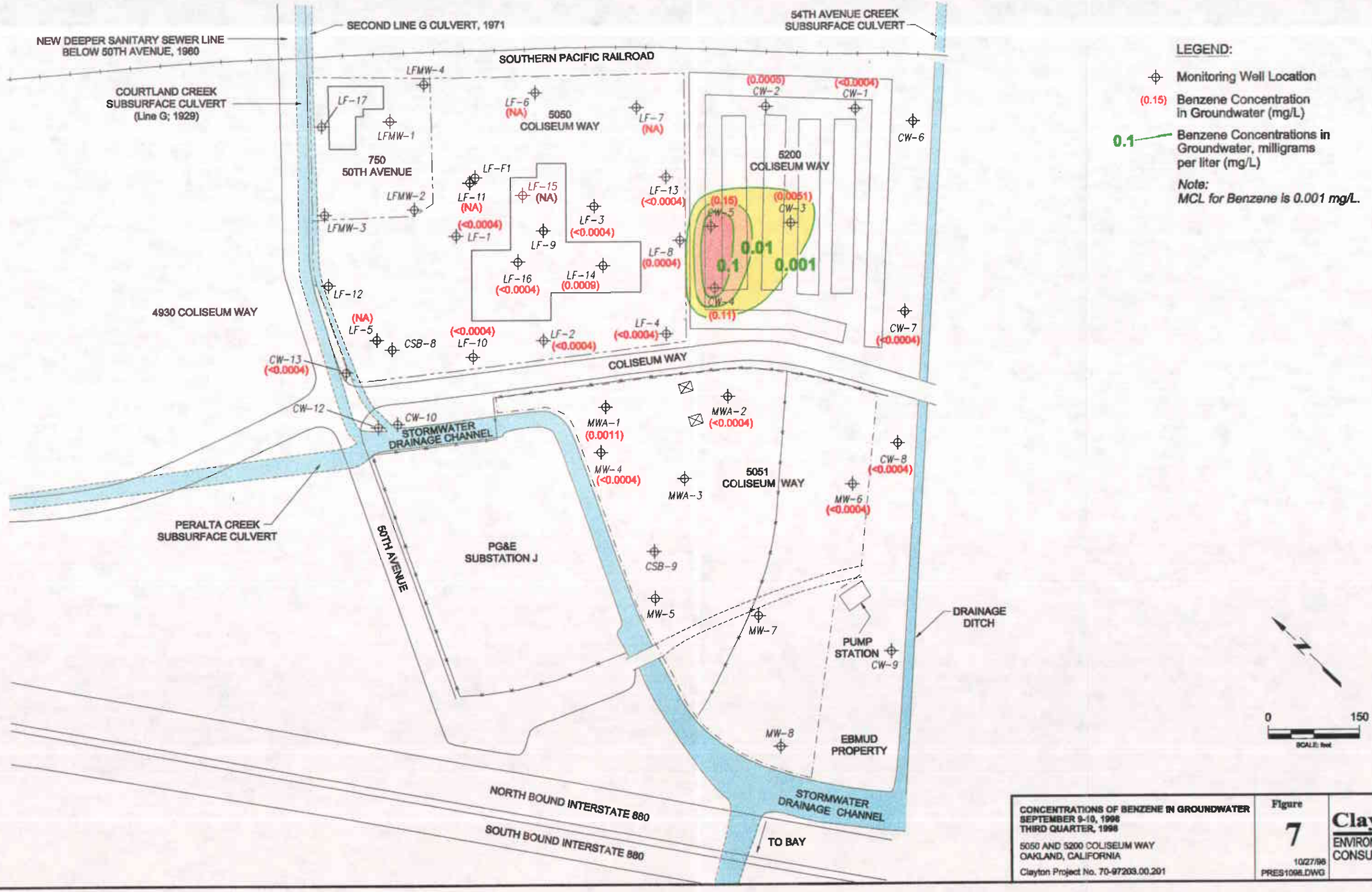
5050 AND 5200 COLISEUM WAY
OAKLAND, CALIFORNIA

Clayton Project No. 70-97203.00.201

Figure 6

10/27/98
PRES1098.DWG

Clayton ENVIRONMENTAL CONSULTANTS



CONCENTRATIONS OF BENZENE IN GROUNDWATER
SEPTEMBER 9-10, 1998
THIRD QUARTER, 1998

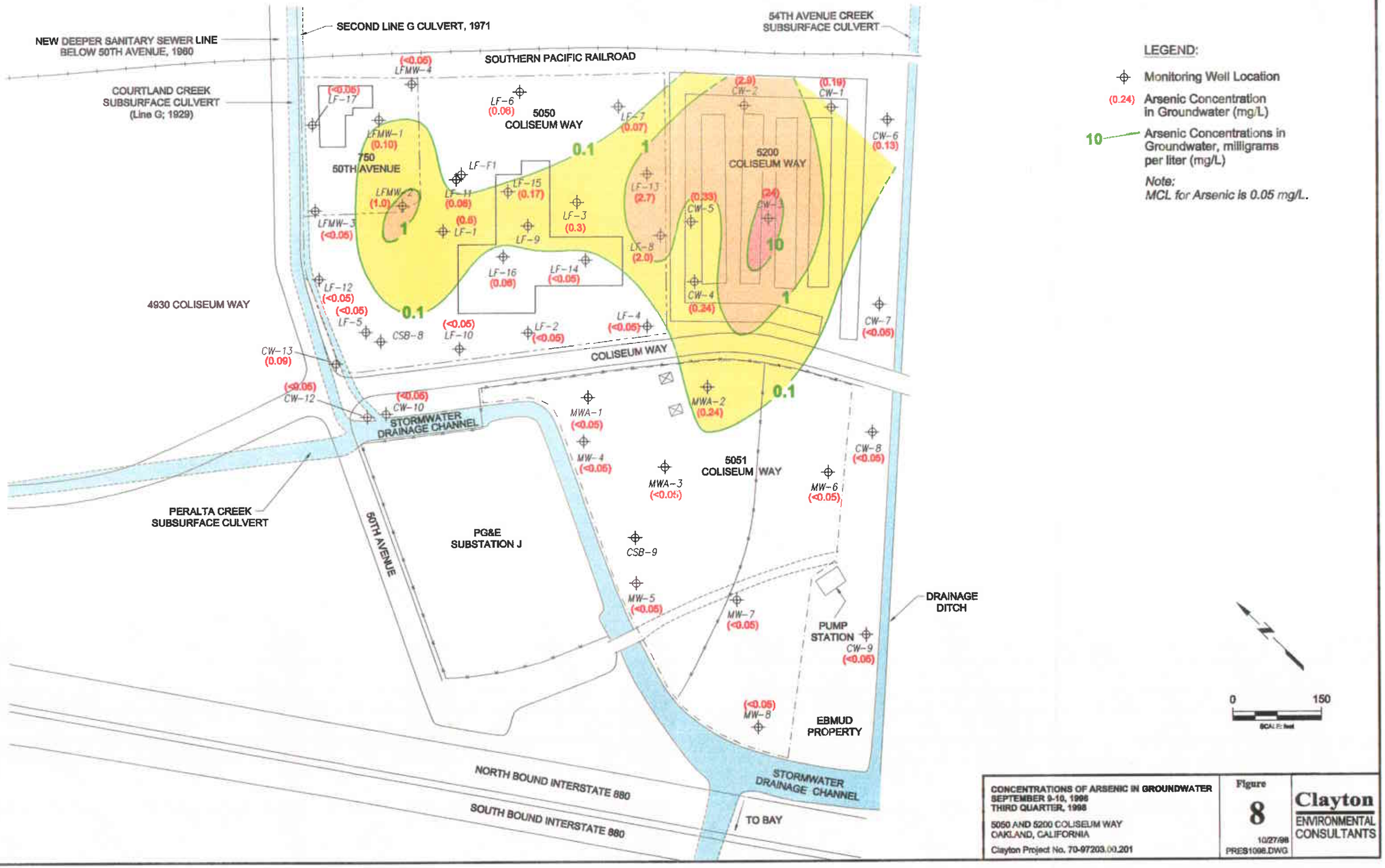
5050 AND 5200 COLISEUM WAY
OAKLAND, CALIFORNIA

Clayton Project No. 70-97203.00.201

Figure 7

10/27/98
PRES1098.DWG

Clayton ENVIRONMENTAL CONSULTANTS



CONCENTRATIONS OF ARSENIC IN GROUNDWATER
SEPTEMBER 9-10, 1998
THIRD QUARTER, 1998

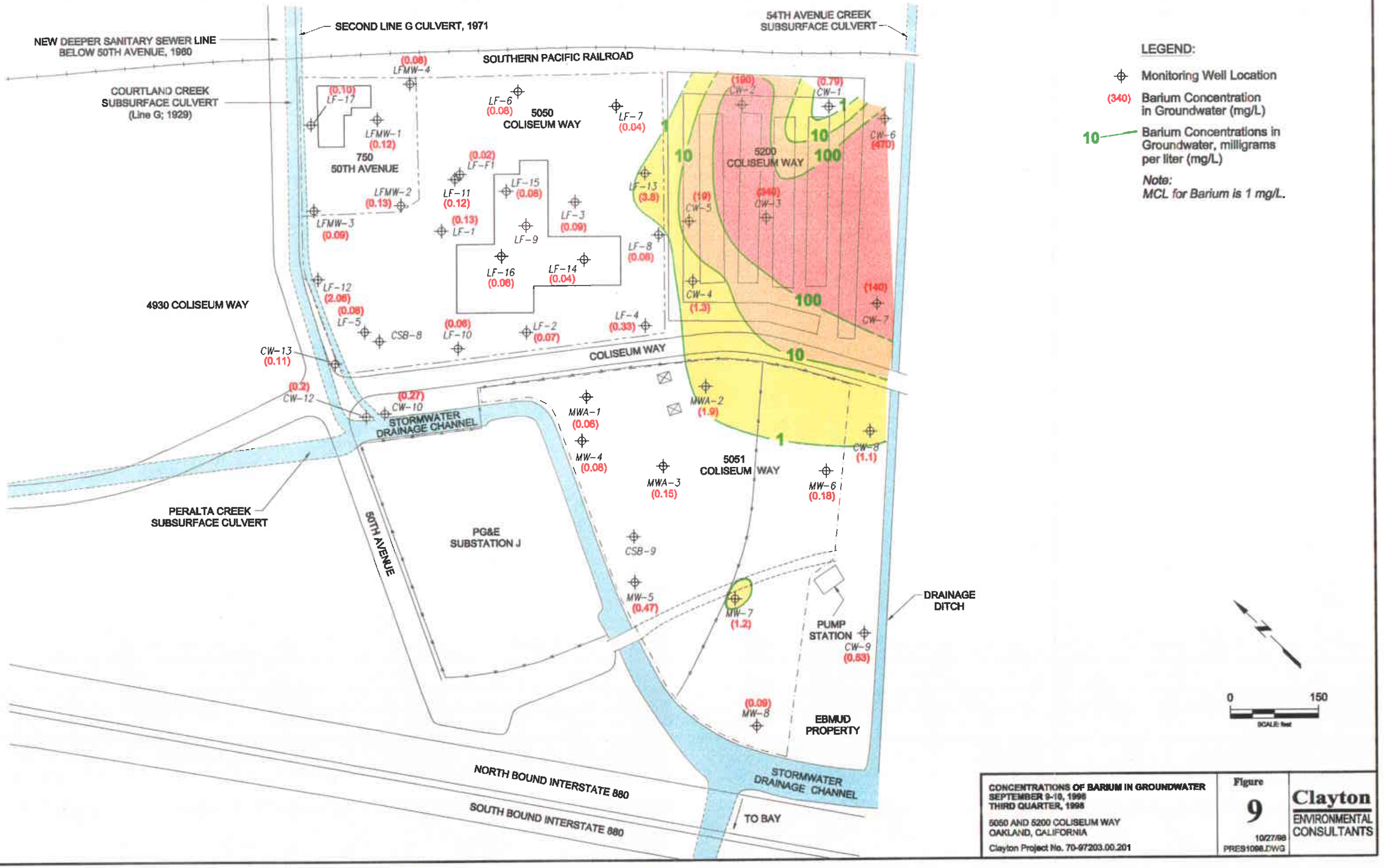
5050 AND 5200 COLISEUM WAY
OAKLAND, CALIFORNIA

Clayton Project No. 70-97203.00.201

Figure 8

10/27/98
PRES1098.DWG

Clayton ENVIRONMENTAL CONSULTANTS



LEGEND:

- Monitoring Well Location
- (340) Barium Concentration in Groundwater (mg/L)
- 10 — Barium Concentrations in Groundwater, milligrams per liter (mg/L)

Note:
MCL for Barium is 1 mg/L.

CONCENTRATIONS OF BARIUM IN GROUNDWATER
SEPTEMBER 9-10, 1998
THIRD QUARTER, 1998

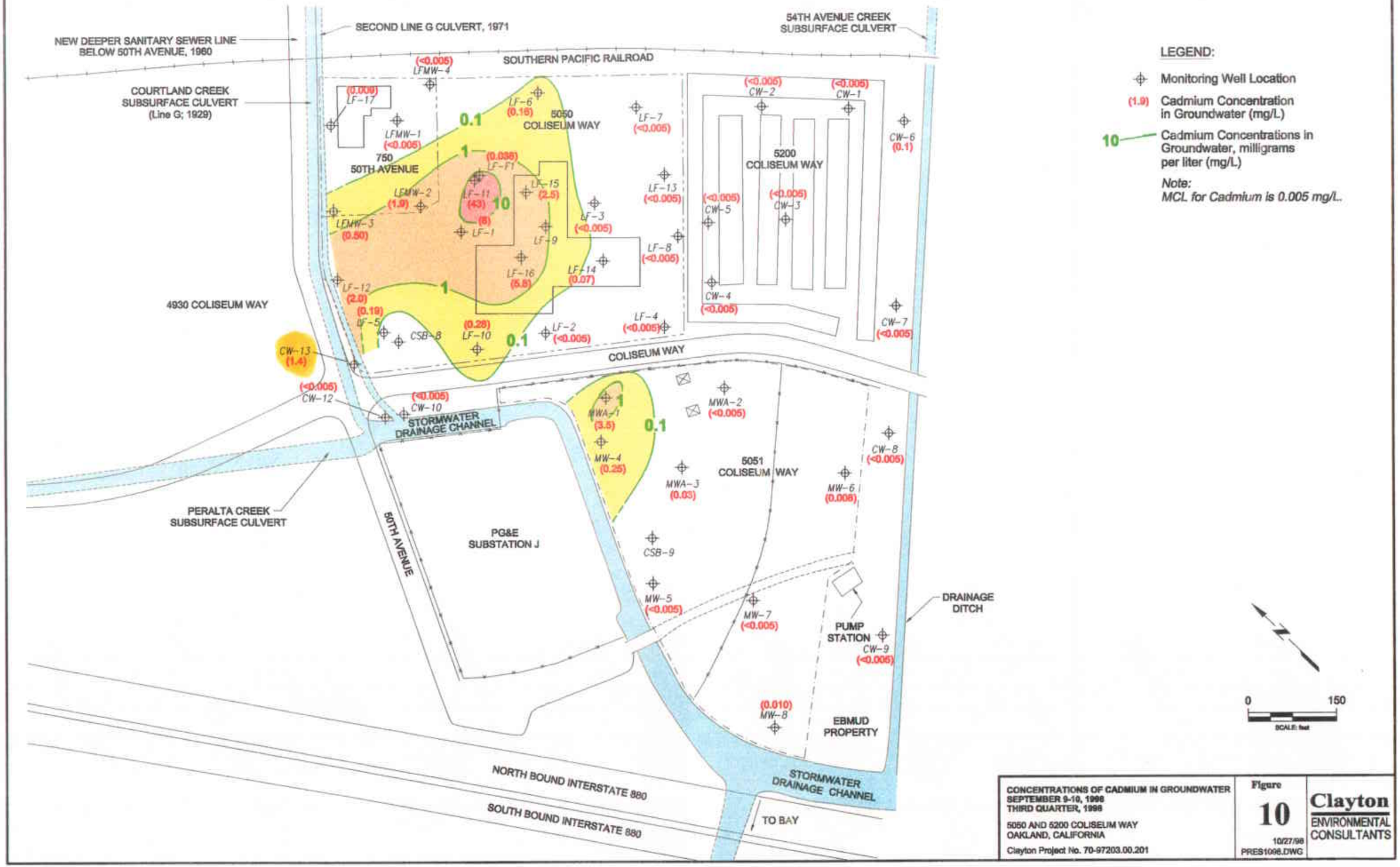
5050 AND 5200 COLISEUM WAY
OAKLAND, CALIFORNIA

Clayton Project No. 70-97203.00.201

Figure **9**

10/27/98
PRES1098.DWG

Clayton ENVIRONMENTAL CONSULTANTS



CONCENTRATIONS OF CADMIUM IN GROUNDWATER
SEPTEMBER 9-10, 1996
THIRD QUARTER, 1996

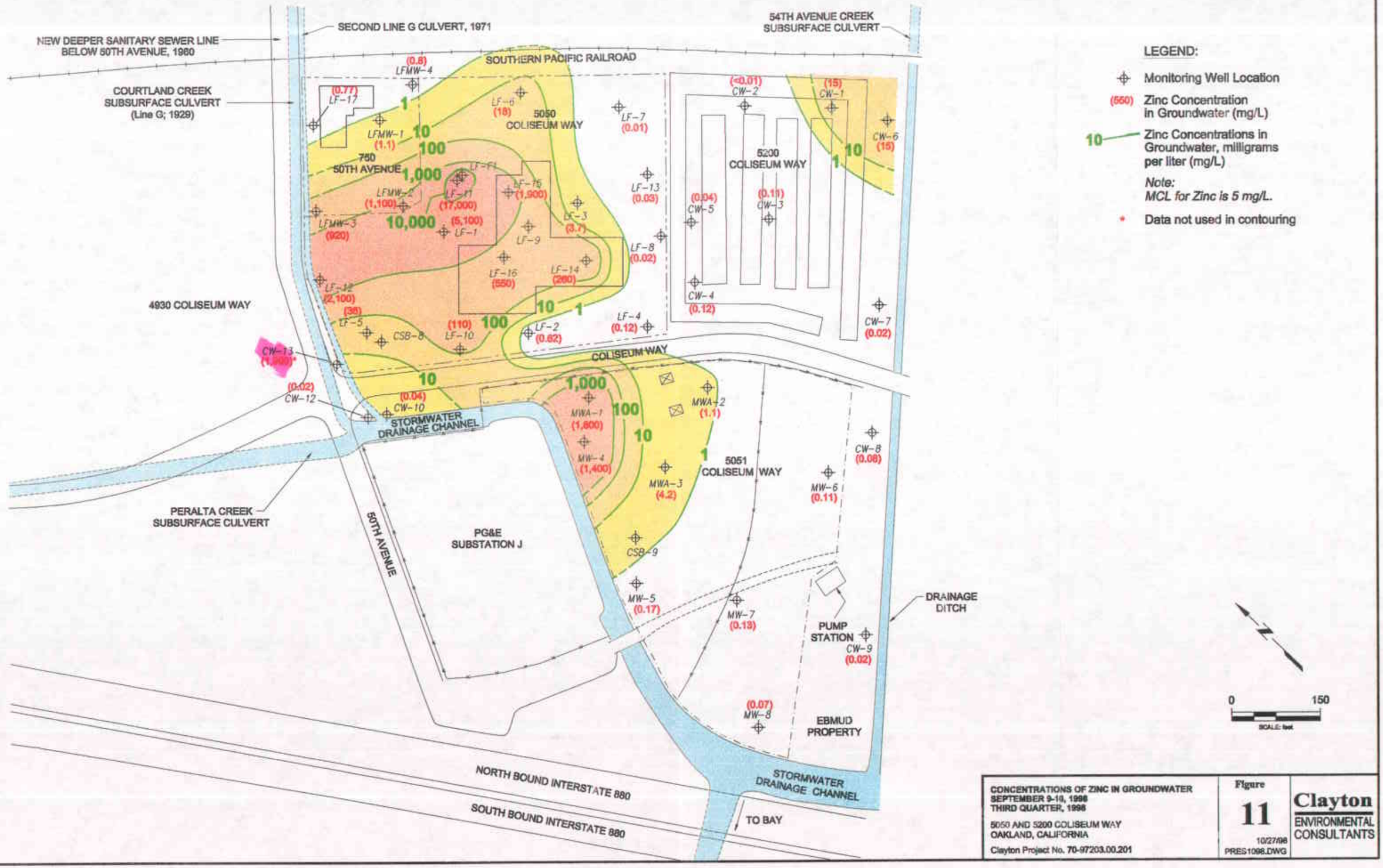
5050 AND 5200 COLISEUM WAY
OAKLAND, CALIFORNIA

Clayton Project No. 70-97203.00.201

Figure 10

10/27/96
PRES1096.DWG

Clayton ENVIRONMENTAL CONSULTANTS



LEGEND:

- Monitoring Well Location
- (550) Zinc Concentration in Groundwater (mg/L)
- 10 — Zinc Concentrations in Groundwater, milligrams per liter (mg/L)

Note:
MCL for Zinc is 5 mg/L.

* Data not used in contouring

CONCENTRATIONS OF ZINC IN GROUNDWATER
SEPTEMBER 9-10, 1998
THIRD QUARTER, 1998

5050 AND 5200 COLISEUM WAY
OAKLAND, CALIFORNIA

Clayton Project No. 70-97203.00.201

Figure 11

10/27/98
PRES1098.DWG

Clayton ENVIRONMENTAL CONSULTANTS

NEW DEEPER SANITARY SEWER LINE BELOW 50TH AVENUE, 1980

SECOND LINE G CULVERT, 1971

54TH AVENUE CREEK SUBSURFACE CULVERT

SOUTHERN PACIFIC RAILROAD

COURTLAND CREEK SUBSURFACE CULVERT (Line G; 1929)

750 50TH AVENUE

5050 COLISEUM WAY

5200 COLISEUM WAY

4930 COLISEUM WAY

COLISEUM WAY

5051 COLISEUM WAY

PERALTA CREEK SUBSURFACE CULVERT

STORMWATER DRAINAGE CHANNEL

50TH AVENUE

PG&E SUBSTATION J

PUMP STATION

DRAINAGE DITCH

EBMUD PROPERTY

NORTH BOUND INTERSTATE 880

SOUTH BOUND INTERSTATE 880

TO BAY

LFMW-1 LFMW-2 LFMW-3 LFMW-4

LF-1 LF-2 LF-3 LF-4 LF-5 LF-6 LF-7 LF-8 LF-9 LF-10 LF-11 LF-12 LF-13 LF-14 LF-15 LF-16 LF-17 LF-F1

CSB-1 CSB-2 CSB-3 CSB-4 CSB-5 CSB-6 CSB-8 CSB-9

CW-1 CW-2 CW-3 CW-4 CW-5 CW-6 CW-7 CW-8 CW-9 CW-10 CW-12 CW-13

MW-4 MW-5 MW-6 MW-7 MW-8

MWA-1 MWA-2 MWA-3

1SW 2SW 3SW/1W-L 4SW 5SW/2W-L 6SW 7SW 8SW

3W-L
Zn 0.1
Ba 0.37
As <0.05

4W-L
Zn 0.08
Ba 0.41
As 0.06

4SW
Zn 0.03
Ba 0.09
As <0.05

5SW
Zn 0.07
Ba 0.11
As 0.05

2W-L
Zn 0.12
Ba 0.13
As 0.06

8SW (Flood-Tide)
Zn 0.05
Ba 0.11
As 0.07

7SW
Zn 0.06
Ba 0.11
As <0.05

6SW
Zn 0.06
Ba 0.11
As 0.07

2SW
Zn 0.55
Ba 0.11
As 0.06

3SW
Zn 0.03
Ba 0.09
As <0.05

1W-L
Zn 0.09
Ba –
As 0.05

1SW
Zn 0.29
Ba 0.15
As <0.05

LEGEND:

- LF-1 ⊕ Monitoring Well Location
- ● Soil Boring Location
- △ Surface Water Sample Location

5SW — Surface Water Sample ID

Zn 0.07	Zinc Concentration in Surface Water
Ba 0.11	Barium Concentration in Surface Water
As 0.05	Arsenic Concentration in Surface Water

Note:
All results reported in mg/kg.

WATER QUALITY CONTROL PLAN
SAN FRANCISCO BAY REGION
RWQCB, JUNE 21, 1995

	Shallow Water	Salinity >5 ppt
Zn	0.058	0.058
Ba	*Not Established*	*Not Established*
As	0.02	0.036

ppt = parts per thousand

0 150
SCALE: feet

LOW TIDE SURFACE WATER QUALITY
OCTOBER 13, 1998
(15:21 - 15:55 HRS)

5050 AND 5200 COLISEUM WAY
OAKLAND, CALIFORNIA

Clayton Project No. 70-97203.00.201

Figure 12

10/27/98
PRES1098.DWG

Clayton ENVIRONMENTAL CONSULTANTS

Work Order Number: 12000

Permit Number: F12-LD0591
Permit Issuance Date: 7/6/98
Permit Expiration Date: Open

ALAMEDA COUNTY FLOOD CONTROL & WATER CONSERVATION DISTRICT
399 Elmhurst St., Hayward, CA 94544
(510) 670-5429

FLOOD ENCROACHMENT PERMIT

This Permit is issued in accordance with District Ordinance 34.

Name & Address of Permittee:
Clayton Environmental
P.O. Box 9019
Pleasanton, CA 94566
Phone Number: 426-2600

Job Site Address:
5200 Coliseum Wy.
Oakland

Line & Segment: H, F

Name & Address of Contractor:

Phone Number:

This Permit authorizes an encroachment into the District right-of-way or facility at the above address; this encroachment shall be subject to the terms and conditions of the said Ordinance 34 and to all other provisions attached and written hereto.

The Permittee intends to perform the following work scope:

Install 4 groundwater monitoring wells and complete soil borings on District property (area 1 and 2) as shown on the attached map.

Unless otherwise specified below, all work or access shall be subject to the terms and conditions of the attached General Provisions:

Bond Information:
$12000 cash

Insp. Fee:
Waived

BY: JK Rogers, ACFC&WCD

Work Completed (Date): _____

Inspector: _____

I certify that the information that I have entered in this permit application is correct, and I agree to comply with the all of the terms and conditions and other requirements of the issued Permit.

See appl.
Signature of Applicant

Date

The Permittee is responsible for notifying the Inspection Office listed on the back of this form.
THIS PERMIT IS INCOMPLETE WITHOUT THE ATTACHED GENERAL PROVISIONS

INSPECTION REQUIREMENTS

- All encroachments authorized by this Permit shall be subject to inspection by a District representative.

- The planned inspections will be performed by the County office(s) designated below; **unless otherwise indicated, it shall be the Permittee's responsibility to notify the designated office(s) - prior to the start of the encroachment.**

___ Case 1:- The work described in this Permit must be inspected and accepted by the District. Contact the Permit Inspection Office at 670-5762 to arrange for the required tests and inspections.

✓ Case 2:- The work described in this Permit must be inspected and accepted by the District. Contact the Maintenance & Operation Department at 670-5534 to arrange for the required tests and inspections. (John Thornton, 670 – 5237)

___ Case 3:- Some or all of the work described in this Permit must be inspected by the following representative of the District:

___ Case 4:- Notification of the District is not required.

CAUTION!

Accessing District right-of-way or opening a District facility without a permit is an infraction or a misdemeanor under the provisions of Chapter 6.36 of the General Ordinance Code of the County of Alameda and could result in a fine or imprisonment. Unauthorized modification of District right-of-way or facilities could be considered as a public nuisance and may be subject to abatement.

ALAMEDA COUNTY FLOOD CONTROL AND WATER CONSERVATION DISTRICT

General Provisions for Encroachment Permits

Unless otherwise exempted or modified by this Permit, these General Provisions shall apply to all authorized encroachments and shall be considered to be an integral part of each Encroachment Permit.

CAUTION: CHECK BOTH SIDES OF THE FRONT SHEET OF THIS PERMIT FOR ANY EXEMPTIONS, MODIFICATIONS, OR ADDITIONS TO THESE PROVISIONS AND FOR ANY OTHER SPECIAL REQUIREMENTS OR LIMITATIONS OF THIS PERMIT.

The District reserves the right to suspend or cancel this Permit, without advance notice, if the Permittee fails to comply with the terms and conditions of these Provisions, or with any other terms and conditions of this Permit. In the event of such suspension or cancellation, the Permittee shall be held liable for all costs incurred by the District in securing and restoring the encroachment site.

---

1. **PERMIT AUTHORITY:-** This Encroachment Permit is issued in accordance with the provisions of the County of Alameda Flood Control Ordinance (Article 7 of Chapter 6 of Title 3 of the Ordinance Code of the County of Alameda) and with Ordinance 34 of the Alameda County Flood Control and Water Conservation District.

2. **ACCEPTANCE OF PERMIT REQUIREMENTS:-** It shall be understood by the Permittee that the performance of any access to or work on the encroachment site, as authorized by this Permit, shall constitute acceptance by the Permittee of the terms and conditions of the said Ordinances, of these General Provisions, and of any other special provisions or requirements written into or attached to this Permit.

3. **PERMIT AVAILABILITY:-** This Permit, or a copy thereof, shall be kept available at the site of the authorized encroachment. It must be shown to any representative of the County or the District or to any law enforcement officer, upon demand.

4. **PERMIT SCOPE:-** The encroachment authorized by this Permit is limited to access to and/or work on District right-of-way or District facilities. This Permit shall not be construed as authorizing access through District right-of-way to adjacent property without the express approval of the affected property owner, nor shall it be construed as authorizing access to District facilities that are located within roadway rights-of-way of any incorporated Cities in the County of Alameda without first obtaining authorization from the said City.

5. **PERMIT TERM:-** Unless otherwise specified in this Permit, the work or access described herein shall begin within ninety days of the date of issuance of this Permit — and the work or access shall be completed prior to the expiration date shown on the front sheet of this Permit.

6. **CHANGES TO PERMIT:-** No change to the location or character of the encroachment herein permitted shall be made without written authorization from the District. Minor construction changes may be made in the field with the concurrence of the District inspector. Any questions related to amending this Permit should be directed to the Permit Center, 399 Elmhurst Street, Hayward, CA 94544; (510) 670-5429.

7. **RELATIONSHIP TO EXISTING AGREEMENTS:-** In the event that the encroachment authorized by this Permit is located within an area which is subject to an existing agreement or easement with or for the District, this Permit shall be regarded as a notice/record of work and as a means of establishing certain safety or inspection requirements specifically for the said encroachment; no new or different rights or obligations other than those written into this Permit are intended to be created, and all existing rights and obligations of the agreement or easement are fully protected. In the case of conflict between an existing agreement/easement and these General Provisions, the terms and conditions of the agreement or easement shall prevail.

8. **DEDICATION OF PROPERTY TO THE DISTRICT:-** Whenever, as a special requirement of this Permit, the Permittee is required to prepare to convey or dedicate an interest in real property to the District, as an easement or as right-of-way, the Permittee shall be responsible for submitting a legal description and a plat map of the property to the District for review, prior to the closeout of this Permit. Normally, such real estate actions will be completed following Permit closeout.

9. **PERMIT TRANSFERABILITY:-** This Permit is not transferable; no parties other than the Permittee, or his/her agents, are authorized to have access or to do work under this Permit.

10. **INSPECTION AND APPROVAL:**- All access or work authorized by this Permit is subject to monitoring, inspection, testing, and approval by a representative of the District. Unless otherwise specified in this Permit, the Permittee shall be responsible for coordinating with the District at the phone number(s) indicated in this Permit. If the Permittee is required to coordinate with the District Inspection Office, their location and phone number is:

Flood Inspection Office
951 Turner Court
Hayward, CA 94545
(510) 670-5762

The District representative(s) will prescribe the necessary inspection and test points; once these requirements are established, it shall be the responsibility of the Permittee to make the appropriate notifications and to furnish the appropriate samples to the District. If the encroachment is completed without the required inspections/tests, if any, the District reserves the right to reject the work -- and to require that it be redone, in part or in whole, at no cost to the District.

11. **TESTING AND CERTIFICATION:**- All materials and equipment intended for use within the District right-of-way or on a District facility, along with certain construction operations, will be subject to verification through testing and/or certification; the specific requirements will be established by consultation with the specified District representative(s).

Typical testing requirements would include the quality and strength of concrete pours, the compaction of fill areas and trench backfills, the strength of reinforced concrete pipe, and the quality and strength of fencing materials. Manufacturer's certifications would typically be required for pre-cast concrete structures and for operating and safety equipment.

12. **START OF WORK:**- The Permittee shall be responsible for notifying the District Inspection Office and/or the other designated District representatives, prior to the start of work or access; see 10. above.

13. **LIABILITY AND INDEMNIFICATION:**- The Alameda County Flood Control and Water Conservation District, the County of Alameda, and the officers, employees, agents, representatives, and/or successors of both agencies shall not be liable for any death, injury, illness, or property damage claim which arises from the actions of the Permittee under this Permit, or which arises from the failure of the Permittee to properly maintain the site of the encroachment authorized by this Permit. If a claim does arise from the foregoing, the Permittee shall defend, indemnify, and hold harmless the District, the County, and their officers, employees, agents, and representatives.

WARNING: BY ACCEPTING THIS PERMIT, YOU ARE AGREEING TO DEFEND, INDEMNIFY, AND HOLD HARMLESS THE DISTRICT, THE COUNTY, THEIR OFFICERS, EMPLOYEES, AGENTS, REPRESENTATIVES, AND/OR SUCCESSORS FROM ANY AND ALL CLAIMS ARISING FROM YOUR ACTIONS UNDER THIS PERMIT.

14. **MAINTENANCE OF THE ENCROACHMENT AREA:**- Upon initiation of the access or work authorized herein, the Permittee shall assume responsibility for the maintenance of the area of the encroachment and shall continue to hold this responsibility pending the closeout of this Permit by the District; throughout this period, the Permittee shall provide access for District maintenance and repair crews through and around the encroachment site as required.

The District will resume overall long-term maintenance responsibility for the encroachment area following final inspection and acceptance by the representative of the District; however, unless otherwise specified in this Permit, this responsibility will be limited to the primary flood control facilities.

CAUTION: THE DISTRICT WILL NOT NORMALLY MAINTAIN PERMITTEE-INSTALLED STORM DRAINAGE SYSTEMS THAT ARE CONNECTED TO EXISTING DISTRICT SYSTEMS. SEPARATE PERMITS WOULD BE REQUIRED IF THE OWNER HAD TO ENTER DISTRICT PROPERTY AT A LATER DATE TO CLEAN OUT OR REPAIR SUCH INSTALLATIONS.

In those cases where the maintenance responsibilities for the facilities affected by this Permit will be shared between the District and others, the District reserves the right to require that such responsibilities be formally established by means of an agreement or easement, prior to the closeout of this Permit.

15. **STANDARDS OF WORK:**- All work authorized herein shall conform to those design guidelines and construction standards specified on the plans or in this Permit, subject to any field modifications directed by the District representative(s). The work shall be performed in a workmanlike, diligent, and expeditious manner -- and shall be completed to the satisfaction of the Director of Public Works.

16. **PERMITS AND APPROVALS FROM OTHER AGENCIES:**- This Permit may not be construed as allowing the Permittee to proceed without first obtaining all necessary approvals, permits, agreements, authorizations, or releases from all other public agencies having jurisdiction -- nor may it be considered as relieving the Permittee from compliance with any of the restrictions imposed by such approvals, permits, agreements, authorizations, or releases.

17. **SUSPENSION OR CANCELLATION OF THIS PERMIT:**- This Permit may be suspended or cancelled, at the discretion of the District, whenever the Permittee is performing in such a manner as to threaten the continuing safe usage of the District right-of-way or facilities, or when storm or flood conditions warrant.

18. **EXCAVATION AND BACKFILLING:-** All excavation and backfilling shall be in accordance with the requirements of the Grading Ordinance of the County of Alameda and with other guidelines of the County, as specified in this Permit.

19. **PROTECTION OF DISTRICT FACILITIES:-** The Permittee shall ensure that existing District storm drain and flood control facilities in the area of the encroachment are fully protected from the effects of erosion and contamination and from other damage throughout the period of access or work. If specified on the plans or in this Permit, or if so directed by the District representative, the Permittee shall be prepared to implement a formal Stormwater Pollution Prevention Plan and/or a Soil Erosion Control Plan, following approval of the Plan(s) by the District.

20. **BREACHING OF DISTRICT DRAINAGE FACILITIES:-** The breaching of any portion of an existing District-maintained storm drain or flood control facility (levee, pipe, channel bank, headwall, manhole, inlet, etc.), if authorized by this Permit, must be witnessed by a District inspector.

    WARNING: BREAKING INTO A DISTRICT DRAINAGE FACILITY WITHOUT A SPECIFIC RELEASE FROM A REPRESENTATIVE OF THE DISTRICT COULD RESULT IN THE ISSUANCE OF A STOP-WORK NOTICE BY THE DISTRICT.

21. **FLOW DIVERSION:-** Diversion of storm drainage flows around or through the encroachment area must be reviewed and approved by a District representative, prior to implementation. If specified on the plans or in this Permit, or if so directed by the District inspector, the Permittee shall be prepared to implement a formal Flow Diversion Plan, following approval of the Plan by the District.

22. **BREACHING OF DISTRICT FENCING:-** In most locations, District right-of-way is secured with chain-link or barbed-wire fencing. If necessary, the Permittee may cut and roll back or remove the fencing in order to gain access to the encroachment area; however, whenever the District fence is open, the Permittee shall be responsible for providing temporary fencing or other measures to secure both the encroachment area and the adjacent right-of-way.

    WARNING: IF YOU OPEN DISTRICT FENCING, YOU WILL BE RESPONSIBLE FOR RE-SECURING THE ADJACENT FLOOD CONTROL FACILITY -- PARTICULARLY DURING NON-WORKING HOURS.

    Unless otherwise specified in this Permit, the Permittee shall be responsible for restoring or replacing all cut or removed fencing; all new fencing shall meet the requirements of the appropriate County Design Guideline.

23. **DEWATERING:-** Dewatering of the encroachment area shall be performed in accordance with a specific plan, previously approved by the District.

    WARNING: DISCHARGES OF UNTREATED, UNTESTED WATER INTO A DISTRICT DRAINAGE FACILITY IS PROHIBITED.

24. **REMOVAL OF MATERIALS AND EQUIPMENT:-** If this Permit authorizes removal of materials and/or equipment from the right-of-way/facility, such materials and equipment shall be taken from the right-of-way/facility and disposed of in a legal manner. The Permittee shall obtain all necessary disposal permits, agreements, licenses, or clearances -- and shall furnish a copy of same to the District inspector, upon demand.

    Notwithstanding the above, and unless otherwise specified in this Permit, all removed and recoverable fencing, fence posts, inlet grates, manhole covers, manhole and inlet frames, and other standard equipment items shall be cleaned and reused whenever possible. The District reserves the right to require that removed equipment which is not reused be returned to the District yard at 951 Turner Court, Hayward.

25. **FINAL CLEAN-UP:-** Upon completion of the authorized access or work, the Permittee shall promptly remove all construction materials and debris from the site of the encroachment. The affected right-of-way or facility shall be left in at least as presentable a condition as existed before the start of the encroachment.

26. **REPAIR OF DAMAGE:-** The Permittee shall be fully responsible for the prompt repair of any portion of the District right-of-way and/or District facilities damaged as a direct or indirect result of the permitted encroachment.

    WARNING: THE DISTRICT RESERVES THE RIGHT TO COMPLETE THE REPAIR OF A RIGHT-OF-WAY OR FACILITY, DAMAGED BY THE PERMITTEE, THAT HAS NOT BEEN ADEQUATELY OR PROMPTLY RESTORED; IN SUCH AN EVENT, THE PERMITTEE SHALL BE RESPONSIBLE FOR THE FULL COSTS THEREOF.

27. **SECURITY DEPOSIT:-** Unless otherwise specified in this Permit, the Permittee shall be required to furnish a construction security deposit as a condition of obtaining this Permit. The purpose of this security is to establish a ready source of funds in the event that the District finds it necessary to take action to remedy a problem caused by the Permittee during or following the period of construction. The District reserves the right to continue to hold this deposit for a reasonable period of time following the completion of the authorized work. Any questions related to the return of a security deposit should be directed to the District Permit Center at (510) 670-5429.

28. **CLOSING THE PERMIT**:- It shall be the responsibility of the Permittee to notify the cognizant District representative(s) upon completion of the authorized access or work. Following such notification, the District will normally perform an inspection of the encroachment site to assure acceptability of the work and to verify restoration of the right-of-way per 24 above. The District will continue to hold the Permittee responsible for the maintenance of the encroachment, per 14. above, and will retain any security deposits, pending the signoff of this Permit by the District representative(s).

29. **FUTURE RELOCATION OF THE ENCROACHMENT**:- The District reserves the right to require that the Permittee (or Owner) relocate, replace, modify, or abandon any construction authorized herein in the event that the District elects, at some future date, to relocate, replace, modify, or abandon the affected right-of-way or facility.

30. **PERMIT PRECEDENCE**:- This Permit is issued on the basis that there is no implied precedence established as to the need for, or the acceptability of, specific terms and conditions for future encroachments.

LAND DEVELOPMENT (510) 670-5429
ALAMEDA COUNTY PUBLIC WORKS AGENCY
399 Elmhurst Street, Hayward, CA 94544

RECEIPT NO. **LD- 0591**

Date: 9/15/98 Amount $ 12000

Received From: MHC, Inc. Cash

Address: 230 Half Mile Rd. Warrant or Check No. 970

Red Bank, NJ 07701 Bank No.

MEMO: Flood Permit - Zone 12 Phone

90 - 990/9600

DIRECTOR OF PUBLIC WORKS

Note: $10 fee for returned checks

By:

WHITE - Auditor CANARY - Engineer PINK - File GOLDENROD - Payee 266-300

ALAMEDA COUNTY PUBLIC WORKS AGENCY

WATER RESOURCES SECTION
951 TURNER COURT, SUITE 300, HAYWARD, CA 94545-2651
PHONE (510) 670-5575 ANDREAS GODFREY FAX (510) 670-5262
(510) 670-5248 ALVIN KAN

RESUBMITTED BY ADDRESS

DRILLING PERMIT APPLICATION

CITY OF

NOTE; OAKLAND ENCROACHMENT PERMIT TO DRILL ALONG SECOND LINE G CULVERT AS SHOWN ON ATTACHED DRAWING. BORING ON PRIVATE PROPERTY AND ON CITY OF OAKLAND PROPERTY/EASEMENT.

FOR APPLICANT TO COMPLETE

LOCATION OF PROJECT Coliseum WAY PROPERTIES
5050 COLISEUM WAY
OAKLAND, CA

California Coordinates Source _____ ft. Accuracy ± ___ ft. SEE MAP
CCN _____ ft. CCE _____ ft.
APN _____

CLIENT
Name MILLENNIUM HOLDINGS
Address 200 INTERNATIONAL CIRCLE
City SUITE 500 Zip
HUNT VALLEY, MD 21030

APPLICANT
Name DONALD ASHTON
CLAYTON ENVIRONMENTAL Fax (925) 426-1057
Address 1252 QUARRY LN Phone (925) 426-2679
City PLEASANTON, CA Zip 94566

FOR OFFICE USE
PERMIT NUMBER 98 WR 286
WELL NUMBER
APN

TYPE OF PROJECT

Well Construction		Geotechnical Investigation	
Cathodic Protection	☐	General	☐
Water Supply	☐	Contamination	☐
Monitoring	☒	Well Destruction	☐

PROPOSED WATER SUPPLY WELL USE

New Domestic	☐	Replacement Domestic	☐
Municipal	☐	Irrigation	☐
Industrial	☐	Other _____	☐

DRILLING METHOD:

Mud Rotary	☐	Air Rotary	☐	Auger	☒
Cable	☐	Other	☒ CPT AND GEOPROBE		

DRILLER'S LICENSE NO. C-57 #483765 GREGG DRILLING

WELL PROJECTS
Drill Hole Diameter 8" in. Maximum Depth 20 ft. Number 1
Casing Diameter 2" in.
Surface Seal Depth 5' ft.

WELL: CW-13 TO 20' T.D.
SOIL BORING — GEOPROBE
CSB-4
CSB-5
CSB-6
CSB-7
TO 20 FEET T.D.

GEOTECHNICAL PROJECTS
Number of Borings _____ Maximum Depth _____ ft.
Hole Diameter _____ in.

ESTIMATED STARTING DATE 7-14-98
ESTIMATED COMPLETION DATE 7-31-98

CPT
CSB-8
TO 60 FEET T.D.

I hereby agree to comply with all requirements of this permit and Alameda County Ordinance No. 73-68.

APPLICANT'S SIGNATURE Donald A Ashton DATE 7-13-98

APPROVED Andrew Godfrey DATE 7-13-98

PERMIT CONDITIONS

Circled Permit Requirements Apply

A. GENERAL
1. A permit application should be submitted so as to arrive at the ACPWA office five days prior to proposed starting date.
2. Submit to ACPWA within 60 days after completion of permitted work the original Department of Water Resources Water Well Drillers Report or equivalent for well projects, or drilling logs and location sketch for geotechnical projects.
3. Permit is void if project not begun within 90 days of approval date.

B. WATER SUPPLY WELLS
1. Minimum surface seal thickness is two inches of cement grout placed by tremie.
2. Minimum seal depth is 50 feet for municipal and industrial wells or 20 feet for domestic and irrigation wells unless a lesser depth is specially approved.

C. GROUNDWATER MONITORING WELLS INCLUDING PIEZOMETERS
1. Minimum surface seal thickness is two inches of cement grout placed by tremie.
2. Minimum seal depth for monitoring wells is the maximum depth practicable or 20 feet.

D. GEOTECHNICAL
Backfill bore hole with compacted cuttings or heavy bentonite and upper two feet with compacted material. In areas of known or suspected contamination, tremied cement grout shall be used in place of compacted cuttings.

E. CATHODIC
Fill hole above anode zone with concrete placed by tremie.

F. WELL DESTRUCTION
See attached

G. SPECIAL CONDITIONS

ALAMEDA COUNTY PUBLIC WORKS AGENCY

WATER RESOURCES SECTION
951 TURNER COURT, SUITE 300, HAYWARD, CA 94545-2651
PHONE (510) 670-6575 ANDREAS GODFREY FAX (510) 670-5262
(510) 670-5248 ALVIN KAN

RESUBMITTED BY ADDRESS

DRILLING PERMIT APPLICATION

FOR APPLICANT TO COMPLETE

LOCATION OF PROJECT Coliseum WAY PROPERTIES
5051 COLISEUM WAY
OAKLAND, CA

California Coordinate Source _____ ft. Accuracy ± ___ ft. SEE MAP
CCN _____ ft. CCE _____ ft.
APN _____

CLIENT
Name MILLENNIUM HOLDINGS
Address 200 INTERNATIONAL CIRCLE
City SUITE 500 Zip _____
HUNT VALLEY, MD 21030

APPLICANT
Name DONALD ASHTON
CLAYTON ENVIRONMENTAL Fax (925) 426-1057
Address 1252 QUARRY LN Phone (925) 426-2679
City PLEASANTON, CA Zip 94566

TYPE OF PROJECT

Well Construction		Geotechnical Investigation	
Cathodic Protection	☐	General	☐
Water Supply	☐	Contamination	☐
Monitoring	☒	Well Destruction	☐

PROPOSED WATER SUPPLY WELL USE

New Domestic	☐	Replacement Domestic	☐
Municipal	☐	Irrigation	☐
Industrial	☐	Other _____	☐

DRILLING METHOD:

Mud Rotary	☐	Air Rotary	☐	Auger	☐
Cable	☐	Other	☒ CPT AND GEOPROBE		

DRILLER'S LICENSE NO. C-57 #487165 GREGG DRILLING

WELL PROJECTS
Drill Hole Diameter 2" in. Maximum Depth 60/20 ft. Number 2
Casing Diameter _____ in.
Surface Seal Depth _____ ft.
CPT To 60 FEET T.D. CSB-9

GEOTECHNICAL PROJECTS
Number of Borings _____ Maximum Depth _____ ft.
Hole Diameter _____ in
GEOPROBE To 20 FT T.D.

ESTIMATED STARTING DATE 7-14-98
ESTIMATED COMPLETION DATE 7-31-98
CSB-1 *

I hereby agree to comply with all requirements of this permit and Alameda County Ordinance No. 73-68.

APPLICANT'S SIGNATURE Donald C Ashton DATE 7-13-98

FOR OFFICE USE

PERMIT NUMBER 98 WR 287
WELL NUMBER _____
APN _____

PERMIT CONDITIONS

Circled Permit Requirements Apply

A. GENERAL
1. A permit application should be submitted so as to arrive at the ACPWA office five days prior to proposed starting date.
2. Submit to ACPWA within 60 days after completion of permitted work the original Department of Water Resources Water Well Drillers Report or equivalent for well projects, or drilling logs and location sketch for geotechnical projects.
3. Permit is void if project not begun within 90 days of approval date.

B. WATER SUPPLY WELLS
1. Minimum surface seal thickness is two inches of cement grout placed by tremie.
2. Minimum seal depth is 50 feet for municipal and industrial wells or 20 feet for domestic and irrigation wells unless a lesser depth is specially approved.

C. GROUNDWATER MONITORING WELLS INCLUDING PIEZOMETERS
1. Minimum surface seal thickness is two inches of cement grout placed by tremie.
2. Minimum seal depth for monitoring wells is the maximum depth practicable or 20 feet.

D. GEOTECHNICAL
Backfill bore hole with compacted cuttings or heavy bentonite and upper two feet with compacted material. In areas of known or suspected contamination, tremied cement grout shall be used in place of compacted cuttings.

E. CATHODIC
Fill hole above anode zone with concrete placed by tremie.

F. WELL DESTRUCTION
See attached.

G. SPECIAL CONDITIONS

APPROVED Andreas Godfrey DATE 7-13-9

* NOTE MAYBE RELOCATED BASED ON RESULTS OF CPT DATA AS MARKED ON MAP ("CSB-1 ALT")

ALAMEDA COUNTY PUBLIC WORKS AGENCY

WATER RESOURCES SECTION
951 TURNER COURT, SUITE 300, HAYWARD, CA 94545-2651
PHONE (510) 670-5575 ANDREAS GODFREY FAX (510) 670-5262
(510) 670-5248 ALVIN KAN

DRILLING PERMIT APPLICATION

FOR APPLICANT TO COMPLETE

LOCATION OF PROJECT COUNTY OF ALAMEDA PUBLIC WORKS AGENCY - 5200 CLAUSEN WAY (Block of) OAKLAND, CA

California Coordinates Source _____ ft. Accuracy = ____ ft.
CCN _____ ft. CCE _____ ft.
APN 34-2391-008

SEE ATTACHED MAP: AREA #1

CLIENT
Name MILLENNIUM HOLDINGS, INC.
Address 200 INTERNATIONAL CIR Phone _____
City SUITE 500 Zip _____
HUNT VALLEY, MD 21030

APPLICANT
Name DONALD ASHTON
CLAYTON ENVIRONMENTAL Fax (925) 426-1057
Address 1252 QUARRY LN Phone (925) 426-2679
City PLEASANTON, CA Zip 94566

TYPE OF PROJECT

Well Construction		Geotechnical Investigation	
Cathodic Protection	☐	General	☐
Water Supply	☐	Contamination	☐
Monitoring	☒	Well Destruction	☐

PROPOSED WATER SUPPLY WELL USE

New Domestic	☐	Replacement Domestic	☐
Municipal	☐	Irrigation	☐
Industrial	☐	Other _____	☐

DRILLING METHOD:

Mud Rotary	☐	Air Rotary	☐	Auger	☒
Cable	☐	Other	☐		

DRILLER'S LICENSE NO. C-57 # 484288
EXPLORATION GEOSERVICES, INC.

WELL PROJECTS
Drill Hole Diameter 8 in. Maximum
Casing Diameter 2 in. Depth 20 ft.
Surface Seal Depth 5 ft. Number 2

MONITORING WELLS CW-6 CW-7

GEOTECHNICAL PROJECTS
Number of Borings _____ Maximum
Hole Diameter _____ in. Depth _____ ft.

ESTIMATED STARTING DATE 9-16-98
ESTIMATED COMPLETION DATE 9-30-98

I hereby agree to comply with all requirements of this permit and Alameda County Ordinance No. 73-68

APPLICANT'S SIGNATURE Donald A Ashton DATE 9-15-98

FOR OFFICE USE
PERMIT NUMBER 98 WR 396
WELL NUMBER _____
APN _____

PERMIT CONDITIONS
Circled Permit Requirements Apply

A. GENERAL
1. A permit application should be submitted so as to arrive at the ACPWA office five days prior to proposed starting date.
2. Submit to ACPWA within 60 days after completion of permitted work the original Department of Water Resources Water Well Drillers Report or equivalent for well projects, or drilling logs and location sketch for geotechnical projects.
3. Permit is void if project not begun within 90 days of approval date.

B. WATER SUPPLY WELLS
1. Minimum surface seal thickness is two inches of cement grout placed by tremie.
2. Minimum seal depth is 50 feet for municipal and industrial wells or 20 feet for domestic and irrigation wells unless a lesser depth is specially approved.

C. GROUNDWATER MONITORING WELLS INCLUDING PIEZOMETERS
1. Minimum surface seal thickness is two inches of cement grout placed by tremie.
2. Minimum seal depth for monitoring wells is the maximum depth practicable or 20 feet.

D. GEOTECHNICAL
Backfill bore hole with compacted cuttings or heavy bentonite and upper two feet with compacted material. In areas of known or suspected contamination, tremied cement grout shall be used in place of compacted cuttings.

E. CATHODIC
Fill hole above anode zone with concrete placed by tremie.

F. WELL DESTRUCTION
See attached.

G. SPECIAL CONDITIONS

APPROVED Andrea Godfrey DATE 9-15-98

ALAMEDA COUNTY PUBLIC WORKS AGENCY

WATER RESOURCES SECTION
951 TURNER COURT, SUITE 300, HAYWARD, CA 94545-2651
PHONE (510) 670-5575 ANDREAS GODFREY FAX (510) 670-5262
(510) 670-5248 ALVIN KAN

DRILLING PERMIT APPLICATION

FOR APPLICANT TO COMPLETE

LOCATION OF PROJECT County of Alameda
Public Works Agency – 5000 Coliseum Way (Block)
Oakland, CA

California Coordinates Source _____ ft. Accuracy ± ___ ft.
CCN _____ ft. CCE _____ ft.
APN 34-2341-009-02 See attached map Area #2

CLIENT
Name Millennium Holdings Inc.
Address 200 International Circle Phone _____
City Suite 500 Zip _____
Hunt Valley, MD 21030

APPLICANT
Name Donald Ashton
Clayton Environmental Fax (925) 426-1057
Address 1252 Quarry Ln Phone (925) 426-2679
City Pleasanton, CA Zip 94566

TYPE OF PROJECT

Well Construction		Geotechnical Investigation	
Cathodic Protection	☐	General	☐
Water Supply	☐	Contamination	☐
Monitoring	☒	Well Destruction	☐

PROPOSED WATER SUPPLY WELL USE

New Domestic	☐	Replacement Domestic	☐
Municipal	☐	Irrigation	☐
Industrial	☐	Other _____	☐

DRILLING METHOD:

Mud Rotary	☐	Air Rotary	☐	Auger	☒
Cable	☐	Other	☐		

DRILLER'S LICENSE NO. C-57 # 484288
Exploration GeoServices, Inc.

WELL PROJECTS
Drill Hole Diameter 8 in. Maximum Depth 20 ft. Number 2
Casing Diameter 4 in.
Surface Seal Depth 5-8 ft.
Monitoring Wells CW-10 CW-12

GEOTECHNICAL PROJECTS # one soil boring to groundwater
Number of Borings _____
Hole Diameter _____ in. Maximum Depth _____ ft.
CSB-1

ESTIMATED STARTING DATE 9-10-98
ESTIMATED COMPLETION DATE 9-30-98

I hereby agree to comply with all requirements of this permit and Alameda County Ordinance No. 73-68.

APPLICANT'S SIGNATURE Donald O. Ashton DATE 9-15-98

FOR OFFICE USE

PERMIT NUMBER 98 WR 397
WELL NUMBER _____
APN _____

PERMIT CONDITIONS

Circled Permit Requirements Apply

(A) GENERAL
(1) A permit application should be submitted so as to arrive at the ACPWA office five days prior to proposed starting date.
(2) Submit to ACPWA within 60 days after completion of permitted work the original Department of Water Resources Water Well Drillers Report or equivalent for well projects, or drilling logs and location sketch for geotechnical projects.
(3) Permit is void if project not begun within 90 days of approval date.

B. WATER SUPPLY WELLS
1. Minimum surface seal thickness is two inches of cement grout placed by tremie.
2. Minimum seal depth is 50 feet for municipal and industrial wells or 20 feet for domestic and irrigation wells unless a lesser depth is specially approved.

(C) GROUNDWATER MONITORING WELLS INCLUDING PIEZOMETERS
(1) Minimum surface seal thickness is two inches of cement grout placed by tremie.
(2) Minimum seal depth for monitoring wells is the maximum depth practicable or 20 feet.

D. GEOTECHNICAL
Backfill bore hole with compacted cuttings or heavy bentonite and upper two feet with compacted material. In areas of known or suspected contamination, tremied cement grout shall be used in place of compacted cuttings.

E. CATHODIC
Fill hole above anode zone with concrete placed by tremie.

F. WELL DESTRUCTION
See attached.

G. SPECIAL CONDITIONS

APPROVED Andrew Kahn DATE 9-15-98

DRILLING, WELL CONSTRUCTION, AND SAMPLING PROTOCOLS FOR BOREHOLE/MONITORING WELL INSTALLATION

BOREHOLE INSTALLATION

Clayton Environmental Consultants, Inc. acquires the proper governmental agency permits to bore, drill, or destroy all proposed boreholes and monitoring wells that intersect with groundwater aquifers and writes a health and safety plan.

Clayton subcontracts only with drillers who possess a current C-57 water well contractor's license issued by the State of California and whose personnel have attended the OSHA 40-hour Hazardous Materials Safety Training. Prior to starting work, a "tailgate" safety meeting including discussion of the safety hazards and precautions relevant to the particular job will be held with all personnel working on the job. Well drillers are identified on permit applications
Borings are drilled dry by hollow- or solid-stem, continuous flight augers. Augers, drill rods, and other working components of the drilling rig are steam-cleaned before arriving onsite to prevent the introduction of contaminants. These components are also steam-cleaned between borings away from boring locations. Cleaned augers, rods, and other components are stored, and/or covered when not in use.

Our bore logs include a detailed description of subsurface stratigraphy. Clayton examines the soil brought to the surface by drilling operations, and samples undisturbed soil every 5 feet or as otherwise specified. Soil cuttings are screened for hydrocarbon contamination using a photoionization detector. Boring logs are filled out in the field by a professional geologist, civil engineer, engineering geologist who is registered by the State of California, or a technician who is trained and working under the supervision of one of the previously mentioned persons, using the Unified Soil Classification System.

SOIL SAMPLING

Soil samples are taken every 5 feet, at areas of obvious contamination, or as otherwise specified, with a California modified split-spoon sampler that is lined with three six-inch brass tubes. The sampler and rod are inserted into the borehole to the current depth and a hammer of known weight and height above the sampler are allowed to free-fall onto the rod, advancing the assembly 18 inches into undisturbed soil. Clayton uses the number of blows necessary to drive the sampler into the ground to help evaluate the consistency of materials encountered. The sampler is then pulled from the borehole and disassembled, and the three brass tubes are separated for inspection and labeling.

Clayton uses new brass liners or liners cleaned with a trisodium phosphate (TSP) solution, double rinsed with clean tap water, and air-dried prior to each sampling. The sampler is also cleaned with TSP and rinsed with tap water between sampling events.

Soil samples selected for laboratory analysis are left in the brass liners, sealed with aluminum foil and plastic caps, taped for air tightness, labeled, and immediately placed

into a pre-cooled ice chest chilled to less than 4 degrees C. Labels contain the following information: site name, date and time sampled, borehole number and depth, and the sampler's initials. The samples are transported under chain-of-custody to a state-certified laboratory. The laboratory analyzes soil samples within the prescribed holding time, storing them at temperatures below 4 degrees C at all times.

Pending results of laboratory analysis, excess drilling and sampling cuttings are placed into Department of Transportation (DOT)-approved drums, labeled with the name of the site, address, and well number, and left at the site. Uncontaminated soil may be disposed of by the client. Soil found to contain levels of contaminants above local or state action levels would require that the client dispose of it in accordance with hazardous waste regulations. At the client's request, we will assist with the disposal of contaminated soil.

WELL CONSTRUCTION

Boreholes are converted to monitoring wells by placing 2-inch or 4-inch diameter well casing with flush-threaded joints and slotted screen into the borehole. Construction materials include polyvinyl chloride (PVC), stainless steel, or low carbon steel. The most suitable material for a particular installation will depend on the parameters to be monitored. All screens and casings used are in a contaminant-free condition when placed in the ground. No thread lubrication is used, other than Teflon tape, for connecting the casing segments.

Wells extend at least 10 feet into the upper saturated zone, but do not extend through any clay layers greater than 5 feet that are below the shallow water table. The standard practice for wells installed at hydrocarbon contamination sites is to construct a well with a 20-foot long perforated interval extending 15 feet below and 5 feet above the water table in an unconfined aquifer. The top of the well is solid casing. The annular space of the borehole is backfilled with washed kiln-dried sand to a point at least 1 foot above the slotted screen. A seal above the filter pack is formed by placing a 1- to 2-foot layer of bentonite pellets on top of the sand. The bentonite pellets are moistened by pouring clean tap water down the hole so that they can expand and seal the annulus. A neat cement grout is placed above the bentonite seal and brought to the ground surface.

Well casings are protected from surface contamination, accidental damage, and unauthorized entry or tampering with watertight locking caps on the well casings. A concrete vault usually surrounds the caps. Wells are clearly identified with a metal tag or other device where the following information is recorded: well number, depth to water, depth of well, casing data including location of screened interval.

WELL DEVELOPMENT

The well seal in newly developed wells must set up for 48 to 72 hours prior to development. Since development of the well can volatilize contaminants present, the well must also settle for at least 48 to 72 hours between development and the first purging/sampling incident.

All monitoring wells are initially developed to clean the well and stabilize sand, gravel, and disturbed aquifer materials around the screened internal perforations. Wells are developed by pumping (or bailing) and surging until water turbidity and specific conductance stabilize. In some cases, where wells are installed in low permeability formations and the wells purge dry, the well is allowed to recover and is purged dry three times. Clean tap water is introduced into the well if it does not recover rapidly enough.

Pending results by laboratory analysis, purge water from well development and sampling is placed into DOT-approved drums, labeled with the name of the site, address, well number, and left at the site. The client may dispose of uncontaminated water. Water found to contain levels of contaminants above local or state action levels requires that the client dispose of it in accordance with hazardous waste requirements. At the client's request, we can assist with the disposal of contaminated purge water.

GROUNDWATER SAMPLING

To collect a representative sample of the groundwater, stagnant water within the well casing and filter material must be purged and fresh aquifer water allowed to replace it. The water is purged from the well by pumping or bailing at least three well volumes. Well volumes are calculated by measuring depth to groundwater to the nearest 0.01 foot upon arrival at the well before any purging has begun. Groundwater samples are collected only after purging has been of sufficient duration for pH, temperature, and electrical conductivity to stabilize. When purging low-yield wells, the wells are purged to dryness. When the well recovers to 80% of the depth measured upon arrival, samples are collected.

Field sampling logs maintained for each well include:

- Monitoring well identification
- Static water level, before and after pumping
- Well depth
- Condition of water prior to purging (e.g., amount of free product)
- Purge rate and volume
- pH, temperature, and conductivity during purging
- Time purged
- Time of sample collection
- Sampling method
- Name of sampler
- Climatic conditions

Water samples are collected using clean Teflon bailers. All equipment that contacts samples is thoroughly cleaned before arrival at the site and between sampling events.

Water is collected in clean laboratory-supplied containers, labeled, placed immediately into an ice chest pre-cooled to 4 degrees C, and transported to Clayton's laboratory for analysis. One trip blank will be furnished in accordance with our quality assurance/quality control (QA/QC) program.

All samples are collected in such a manner so as to minimize the volatilization of a sample due to agitation and/or transfer from bailer to sample container. Samples are collected so

that contaminants most sensitive to volatilization are sampled first.

Preservatives are not added to any sample, unless instructed. If requested, they are supplied by Clayton's laboratory.

All sample containers are labeled in the field. Labels contain the following information: project name, sample identification number, project number, date and time of collection, and sampler's initials.

Under no circumstances are sealed sample containers opened by anyone other than the laboratory personnel who perform the requested analyses. If it is necessary for samples or sample chests to leave the immediate control of the sampler prior to delivery to the laboratory, for example during shipment by an overnight shipper, a custody seal is placed on each sample container and/or sample chest to ensure that the samples have not been tampered with during transportation. The custody seal is signed by the sampler, and the date and time that the seal was placed is recorded. The elapsed time between sample collection and delivery to the laboratory never exceeds 48 hours. Water samples are not held for more than 14 days prior to analysis and are kept at 4C at all times.

To document and trace samples from time of collection, a signed chain-of-custody record is filled out by the sampler and accompanies the samples through the laboratory analyses. The completed chain-of-custody is included with the analytical report from the laboratory.

REFERENCES

Groundwater Monitoring Guidelines, Revised February 1990. Alameda County District Groundwater Protection Program.

Leaking Underground Fuel Tank (LUFT) Field Manual: Guidelines for Site Assessment, Cleanup, and Underground Tank Closure, May 1988. State of California LUFT Task Force.

Regional Board Staff Recommendations for Initial Evaluation and Investigation of Underground Tanks, Revised November 1989. North Coast, San Francisco Bay, and Central Valley regions of the California State Water Quality Control Board.

Standards for the Construction and Destruction of Wells and Other Deep Excavations in Santa Clara County, Revised June 1989. Santa Clara Valley Water District.

Clayton Environmental Pleasanton, California	LOG OF BORING CSB-1 (Page 1 of 1)

Lemperes & Wulfsburg 5200 Coliseum Way Oakland, California	Date Completed	: 9/21/98	Boring Location	: CSB-1
	Drilling Method	: Hollow Stem Auger	Logged By	: Don Ashton
	Driller	: Gregg Drilling		
	Sampling Method	: Split Spoon		
	Clayton Rep.	: Don Ashton		

Depth in Feet	Surf. Elev.	USCS	GRAPHIC	DESCRIPTION	Samples	Well1: Elev.:
0	0	SW		Gravelly SAND; (FILL); dark yellowish brown (10YR4/4); fines nonplastic 5%; sands fine to coarse 70%; gravels fine to coarse, to 2 inches, 25%, angular; dry; no odor		
5	-5	CL		CLAY; very dark grayish brown (2.5YR3/2); plastic fines 95%; fine to medium sands 5%; firm; moist; no odor; rootlets common; at 6-8 feet CLAY; (FILL); black; strong creosote like odor; slight sheen; wet; rocks with dark red coloration to 1 inch (10YR3/6); some brick rubble	1 2	▼
		SM		Silty SAND with gravel; gray (10YR5/1); non plastic fines 15%; fine to coarse sands 80%; fine gravel 5%; medium dense; medium; slight hydrocarbon odor	3	
10	-10	SP		SAND; yellowish brown (10YR5/4); fine to coarse sands 100%; wet		
		SP		Clayey SAND; light olive brown (2.5Y5/3); plastic fines 40%; fine sands 60%; stiff; wet Boring terminated at 15 feet below surface grade.	4 5	
15	-15					
20						

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Clayton Environmental Pleasanton, California	LOG OF BORING CSB-3 (Page 1 of 1)

Lemperes & Wulfsburg
5200 Coliseum Way
Oakland, California

Date Completed	: 7/23/98	Boring Location	: CSB-3
Drilling Method	: Hollow Stem Auger	Logged By	: Marc Mullaney
Driller	: Exploration Geoservices		
Sampling Method	: Split Spoon		
Clayton Rep.	: Marc Mullaney		

Depth in Feet	Surf. Elev.	USCS	GRAPHIC	DESCRIPTION	Elev.:
0	0	AC		Asphalt	
		GW		Baserock 3/4 inch	
		SW		SAND; (FILL); brown (10YR4/3); medium well sorted sand; moist; no odor	
5	-5			Groundwater encountered at 7 feet below surface grade ▼	
		ML		SILT; dark grayish brown (10YR4/2); wet; non plastic	
		CL		Gravelly CLAY; olive brown (2.5Y4/4); slightly plastic fines 70%; gravels to 1/2 inch 30%; saturated; no odor	
10	-10			Boring terminated at 10 feet below surface grade.	
15	-15				
20					

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Clatyton Environmental Pleasanton, California	LOG OF BORING CSB-4 (Page 1 of 1)

Lemperes & Wulfsburg
5200 Coliseum Way
Oakland, California

Date Completed	: 7/24/98	Boring Location	: CSB-4
Drilling Method	: Geoprobe	Logged By	: Marc Mullaney
Driller	: ECA		
Sampling Method	: Macrocore		
Clayton Rep.	: Marc Mullaney		

Elev.:

Depth in Feet	Surf. Elev.	USCS	GRAPHIC	DESCRIPTION
0	0	AC		Asphalt
		GW		Baserock 3/4 inch
				Silty, gravelly sandy CLAY; (FILL); dark brown (10YR3/3); fines 65%; fine to coarse sands 25%; gravels to 1/2 inch 10%; moist; no odor
5	-5	CL		
				Groundwater encountered at 7 feet below surface grade ▼
				Boring terminated at 10 feet below surface grade.
10	-10			
15	-15			
20				

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Clayton Environmental Pleasanton, California	LOG OF BORING CSB-5 (Page 1 of 1)

Lemperes & Wulfsburg
5200 Coliseum Way
Oakland, California

Date Completed	: 7/24/98	Boring Location	: CSB-5
Drilling Method	: Geoprobe	Logged By	: Marc Mullaney
Driller	: ECA		
Sampling Method	: Macrocore		
Clayton Rep.	: Marc Mullaney		

Depth in Feet	Surf. Elev.	USCS	GRAPHIC	DESCRIPTION	Elev.:
0	0	AC		Asphalt	
		GW		Baserock 3/4 inch	
				Silty, sandy GRAVEL; (FILL); dark brown (10YR3/3); non-plastic fines 30%; fine to medium sands 30%; gravels to 1 inch 40%; moist; no odor	
5	-5	GM		Groundwater encountered at 6.8 feet below surface grade ▼	
				Boring terminated at 10 feet below surface grade.	
10	-10				
15	-15				
20					

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Clayton Environmental Pleasanton, California	LOG OF BORING CSB-6 (Page 1 of 1)

Lemperes & Wulfsburg
5200 Coliseum Way
Oakland, California

Date Completed	: 7/24/98	Boring Location	: CSB-6
Drilling Method	: Geoprobe	Logged By	: Marc Mullaney
Driller	: ECA		
Sampling Method	: Macrocore		
Clayton Rep.	: Marc Mullaney		

Elev.:

Depth in Feet	Surf. Elev.	USCS	GRAPHIC	DESCRIPTION
0	0	AC/GW		Asphalt
				Baserock 3/4 inch
		GM		Silty, sandy GRAVEL; (FILL); dark brown (10YR3/3); non-plastic fines 30%; fine to coarse sands 30%; gravels to 1 inch 40%; moist; no odor
5	-5	SW		SAND; (FILL); brown (10YR4/3); medium well sorted sand; moist; no odor
				Groundwater encountered at 7 feet below surface grade ▼
10	-10			Boring terminated at 10 feet below surface grade.
15	-15			
20				

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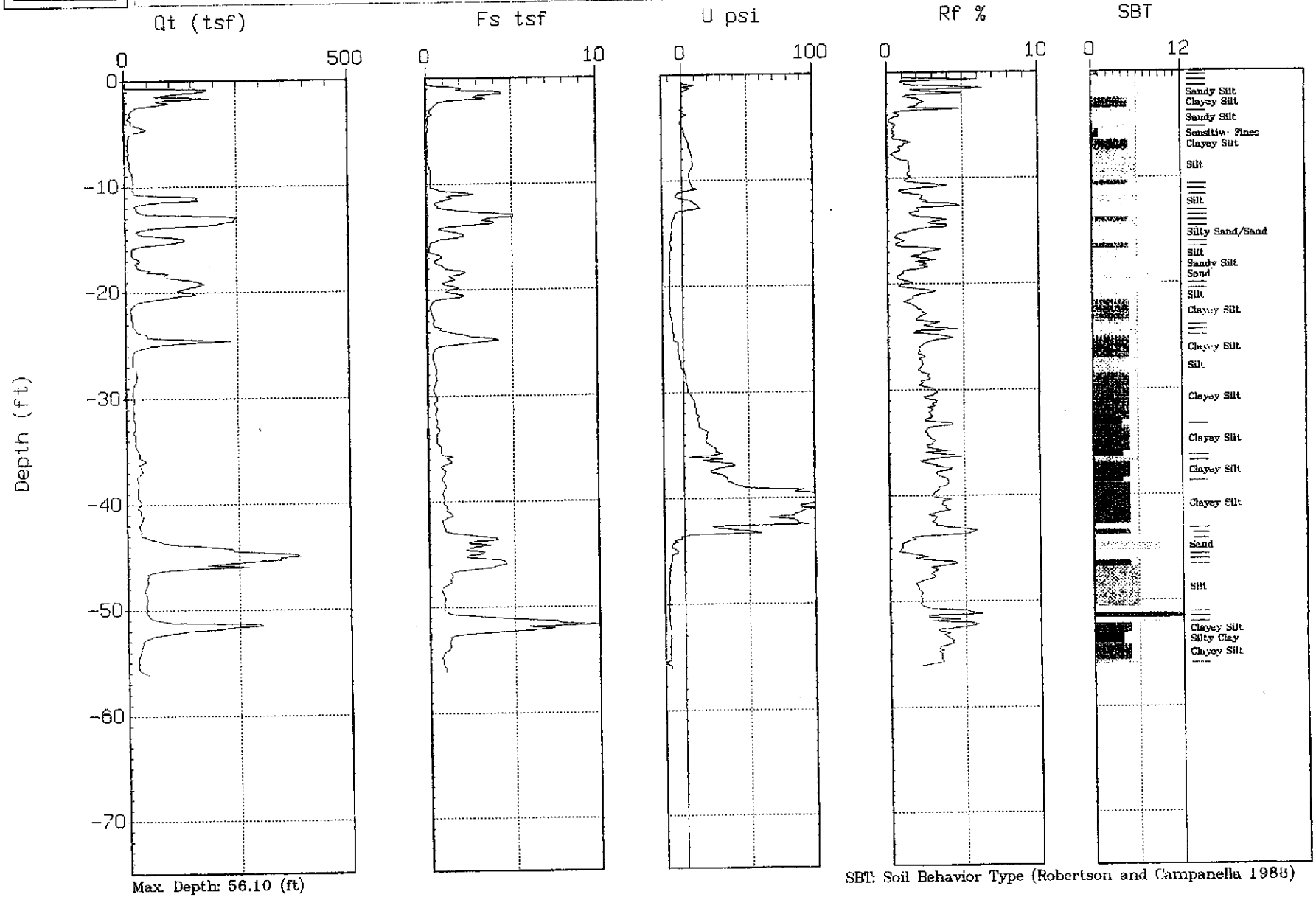
GREGG

CLAYTON

Site : 5050 COLLISEUM GEOLOGIST: MARC MULLANEY
Location : CSB-08 Date : 07:14:98 08:41



Max. Depth: 56.10 (ft)

Depth Inc.: 0.164 (ft)

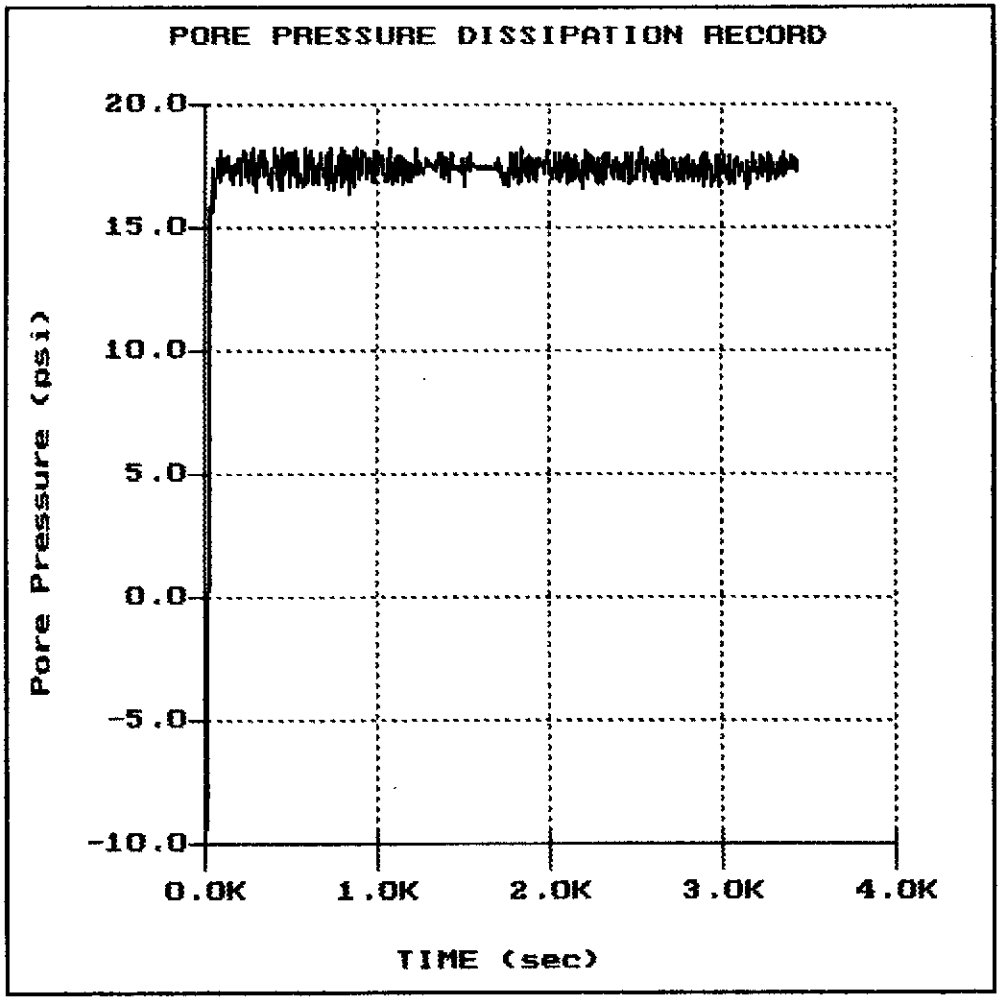
SBT: Soil Behavior Type (Robertson and Campanella 1988)

CLAYTON

Hole:CPT-8
Location:5050 COLLISEUM

Cone:10 TON AD005
Date:07:14:98 08:41

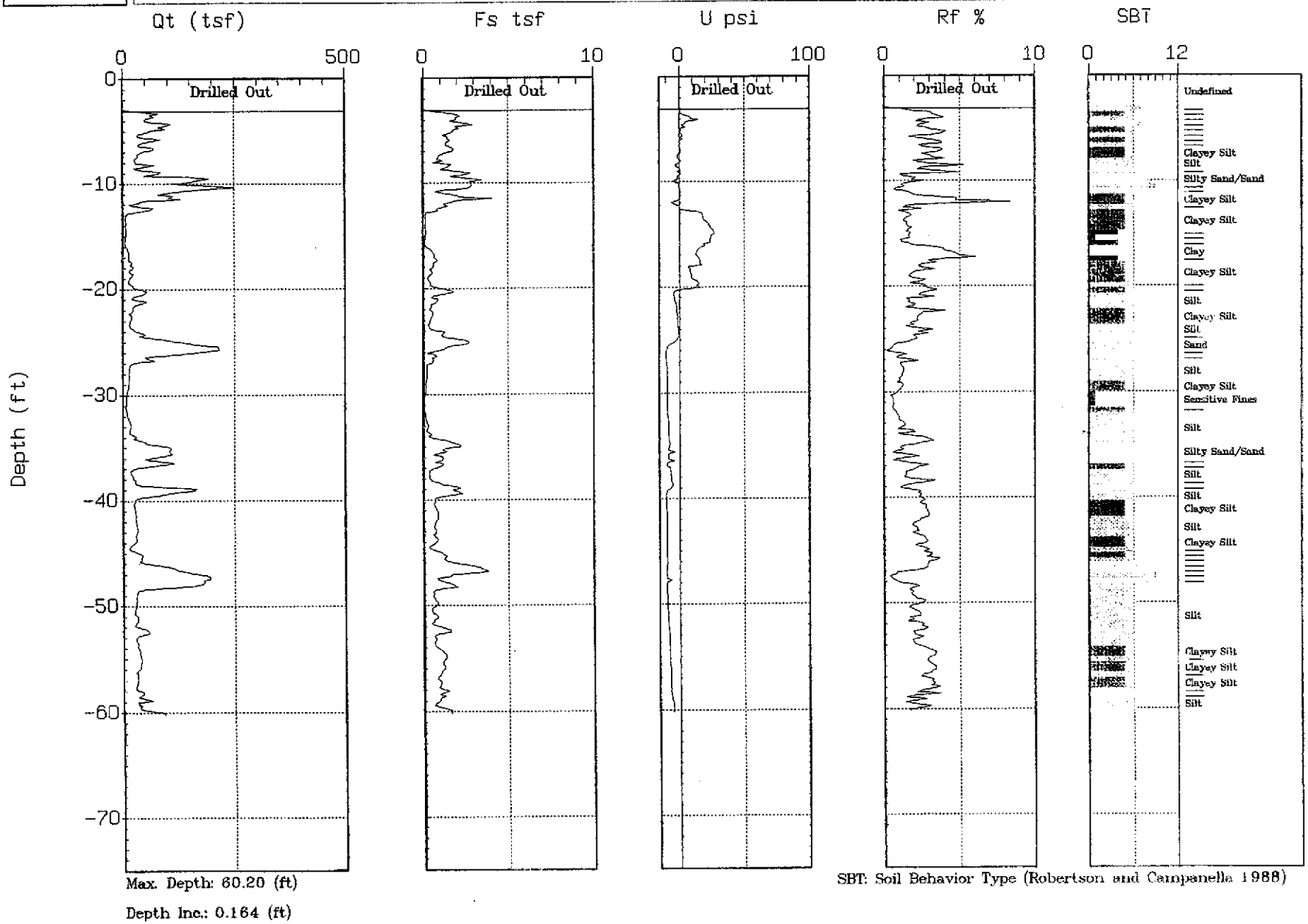
File: 070C08.PPD
Depth (m): 13.40
(ft): 43.96
Duration : 3435.0s



GREGG

CLAYTON

Site : 5050 COLLISEUM GEOLOGIST: MARC MULLANEY
Location : CSB-09 Date : 07:14:98 12:05



Max. Depth: 60.20 (ft)

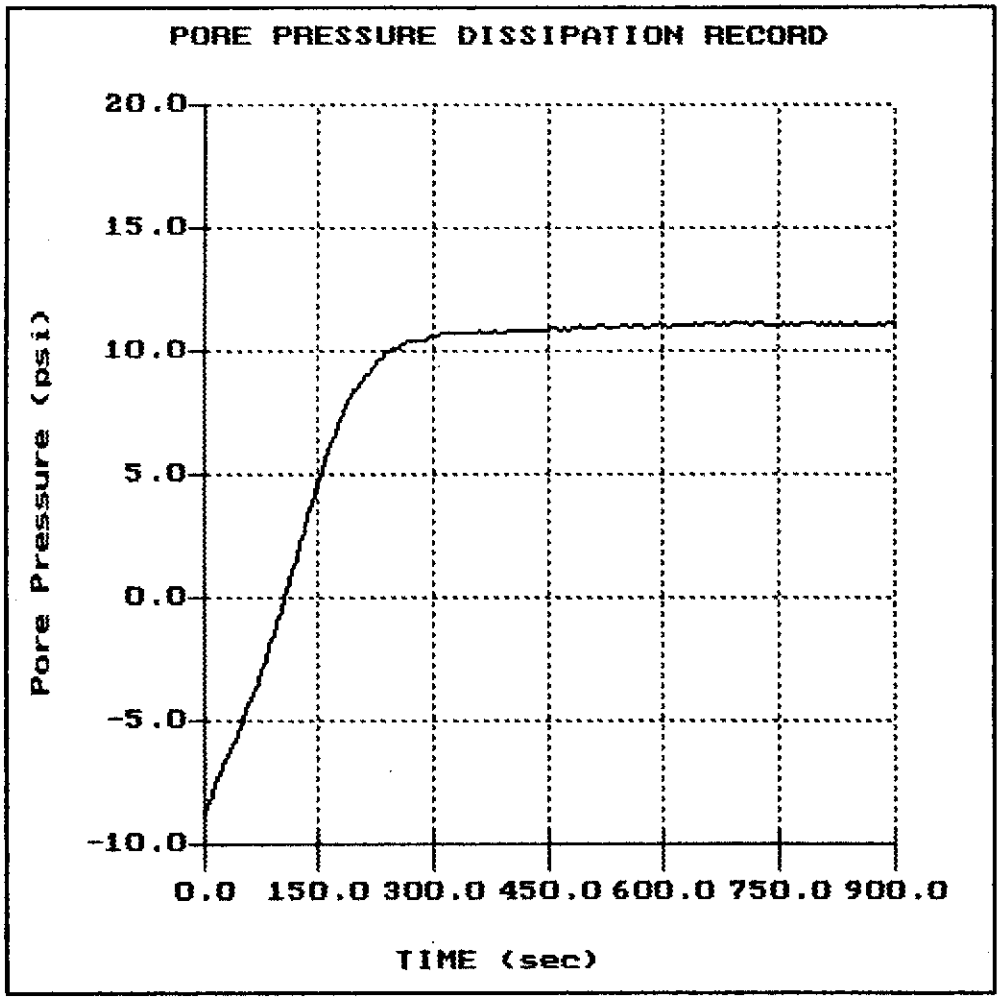
Depth Inc.: 0.164 (ft)

SBT: Soil Behavior Type (Robertson and Campanella 1988)

CLAYTON

Hole: CPT-9
Location:5050 COLLISEUM

Cone: 10 TON ADOOS
Date:07:14:98 12:05



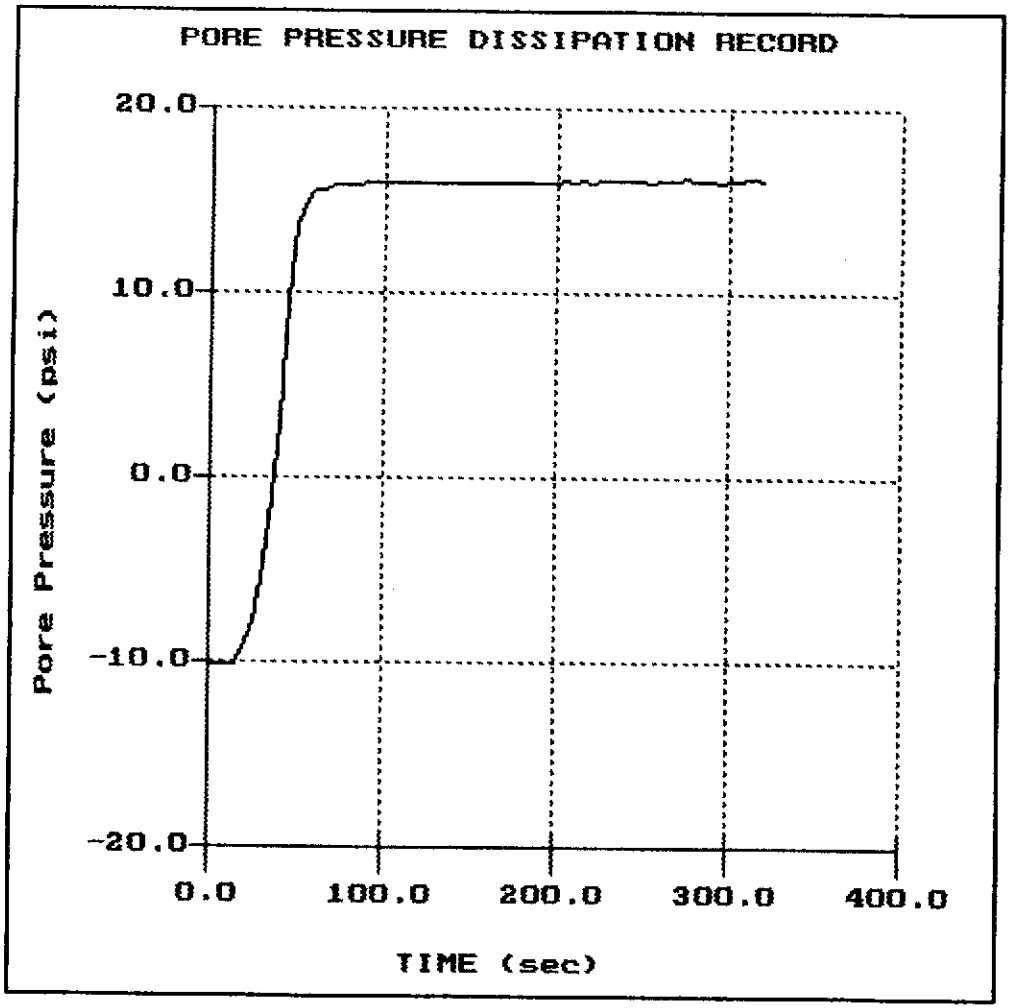
File: 070C09.PPD
Depth (m): 11.05
(ft): 36.25
Duration : 900.0s

CLAYTON

Hole: CPT-9
Location:5050 COLLISEUM

Cone: 10 TON ADOO5
Date:07:14:98 12:05

File: 070C09.PPD
Depth (m): 14.50
(ft): 47.57
Duration : 320.0s



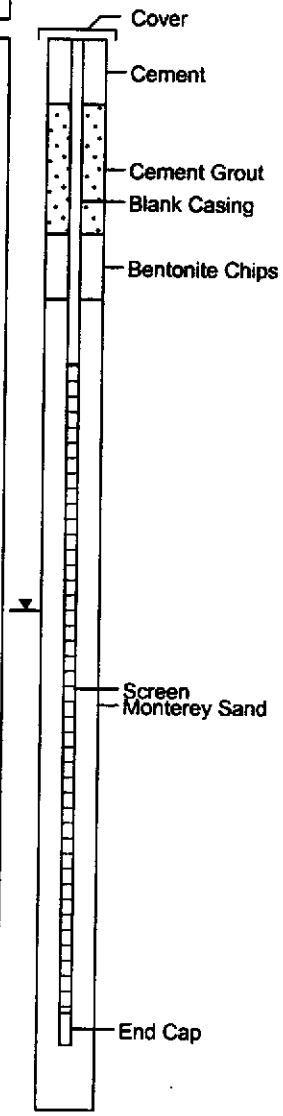
Clayton Environmental Pleasanton, California	LOG OF BORING CW-6 (Page 1 of 1)

Lemperes & Wulfsburg
5200 Coliseum Way
Oakland, California

Date Completed	: 9/21/98	Boring Location	: CW-6
Drilling Method	: Hollow Stem Auger	Logged By	: Don Ashton
Driller	: Gregg Drilling		
Sampling Method	: Split Spoon		
Clayton Rep.	: Don Ashton		

Depth in Feet	Surf. Elev.	USCS	GRAPHIC	DESCRIPTION	Samples
0	0	SP-SC		Gravelly SAND; light yellowish brown (10YR); fines nonplastic 10%; sands fine to coarse 70%; gravels to 1 inch 20%; dry; no odor	
				Sandy CLAY; very dark grayish brown (2.5Y3/2); plastic fines 50%; fine to coarse sands 40 %;fine to coarse gravels 10%; very stiff; moist; no odor	
5	-5	CL			1
10	-10	ML		SILT; light yellowish brown (2.5YR6/4); non-plastic fines 100%; highly fractured lithic; very stiff; wet	2
		CL/OL		CLAY; black (2.5Y - N2/); plastic clays 100%; very organic - rootlets common; hummus odor; moist; firm	
15	-15				
20					

Well1: CW-6
Elev.:



Well Construction Information

WELL CONSTRUCTION

Date Compl.	: 9/21/98
Hole Diameter	: 8 inches
Drill. Method	: Hollow Stem Auger
Clayton Rep.	: Don Ashton

WELL CASING

Material	: Sch. 40 PVC
Diameter	: 2 inches
Joints	: Threaded

WELL SCREEN

Material	: Sch. 40 PVC
Diameter	: 2 inches
Joints	: Threaded
Opening	: 0.01 inch slot
SAND PACK	: 2/16 Monterey Sand
ANNULUS SEAL	: Bentonite Chip

NOTES

Boring terminated at 15 feet below surface grade. Attempted split spoon sample to 16.5 feet, twice with no sample recovery

10-13-1998 c:\mtech5\acegeo\cw-6.bor

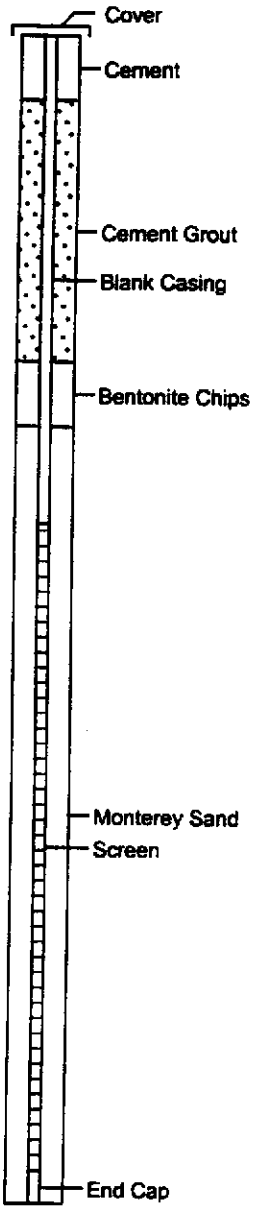
Clayton Environmental Pleasanton, California	LOG OF BORING CW-7 (Page 1 of 1)

Lemperes & Wulfsburg
5200 Coliseum Way
Oakland, California

Date Completed	: 9/21/98	Boring Location	: CW-7
Drilling Method	: Hollow Stem Auger	Logged By	: Don Ashton
Driller	: Gregg Drilling		
Sampling Method	: Split Spoon		
Clayton Rep.	: Don Ashton		

Depth in Feet	Surf. Elev.	USCS	GRAPHIC	DESCRIPTION	Samples
0	0	SW		Sandy GRAVEL; light yellowish brown (10YR); non plastic fines 10%; sand fine to coarse 70%; gravel 20%, to 1 inch; dry; no odor	
		SW		Gravelly SAND; very dark gray (2.5Y to N3/) to light gray mottled; (FILL); fines non-plastic 5 to 10%; sand fine to coarse 80%; gravel fine to coarse, to 3/4 inch 10-15%	
5	-5	CL		CLAY; (FILL); light olive brown (2.5Y5/3) to greenish blue mottled with very dark gray sand; plastic fines 60-70%; sand 30-40%; stiff; moist	1
		CL		Sandy SILT; black; (slurry - FILL); @ 10 feet wood fragments, no sample; no hydrocarbon odor, hummus odor; black silty sands (wet) cuttings only; slurry consistancy	
10	-10				
15	-15	CL		CLAY; (FILL); olive gray (5Y5/2) with greenish hue; low-medium plastic clay 100%; wood fibers 2+ inches long throughout	
		ML		SILT; non plastic to low plastic fines 90%; fine sand 10%	2
		SP		SAND; (FILL); fine sand 100%; wet; fines track; sands fine 100%; dense; no odor; wood fragments 3 inches; discolored soil in contact	
20					

Well1: CW-7
Elev.:



Well Construction Information

WELL CONSTRUCTION

Date Compl.	: 9/21/98
Hole Diameter	: 8 inches
Drill. Method	: Hollow Stem Auger
Clayton Rep.	: Don Ashton

WELL CASING

Material	: Sch. 40 PVC
Diameter	: 2 inches
Joints	: Threaded

WELL SCREEN

Material	: Sch. 40 PVC
Diameter	: 2 inches
Joints	: Threaded
Opening	: 0.01 inch slot
SAND PACK	: Monterey Sand
ANNULUS SEAL	: Bentonite Chip

NOTES

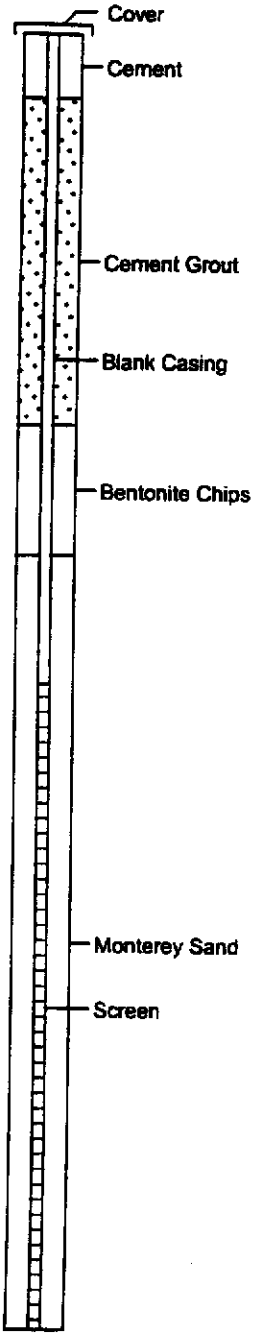
Boring terminated at 18 feet below surface grade.

10-13-1998 c:\mtech5\acegen\cw-7.bor

Clatyton Environmental Pleasanton, California	LOG OF BORING CW-8 (Page 1 of 1)
Lemperes & Wulfsburg 5200 Coliseum Way Oakland, California	Date Completed : 7/23/98 Drilling Method : Hollow Stem Auger Driller : Exploration Geoservices Sampling Method : Split Spoon Clayton Rep. : Marc Mullaney Boring Location : CW-8 Logged By : Marc Mullaney

Depth in Feet	Surf. Elev.	USCS	GRAPHIC	DESCRIPTION	Samples
0	0	AC		Asphalt	
		CL		Sandy gravelly CLAY; black (N2.5/); non plastic fines 50%; sands 20%; gravels up to 3/8 inch 30%; moist; no odor	1
5	-5				
		CH		CLAY; black (N3/); saturated; root structure; plastic; no odor	2
10	-10				
		CL		Gravelly sandy CLAY; yellowish brown (2.5Y5/4); non plastic fines 60%; fine to coarse sands 30%; gravels 10%; saturated	3
15	-15				
		SC		Very clayey SAND; yellowish brown(2.5Y5/3); non plastic fines 40%; fine to medium sands 60%; stiff; damp	4
20					

Well1: CW-8
Elev.:



Well Construction Information

WELL CONSTRUCTION

Date Compl.	: 7/23/98
Hole Diameter	: 8 inches
Drill. Method	: Hollow Stem Auger
Clayton Rep.	: Marc Mullaney

WELL CASING

Material	: Sch. 40 PVC
Diameter	: 2 inches
Joints	: Threaded

WELL SCREEN

Material	: Sch. 40 PVC
Diameter	: 2 inches
Joints	: Threaded
Opening	: 0.01 inch slot
SAND PACK	: 2/12 Monterey Sand
ANNULUS SEAL	: Bentonite Chip

NOTES

Boring terminated at 20 feet below surface grade.

10-13-1998 c:\mlech5\acegeo\cw-8.bor

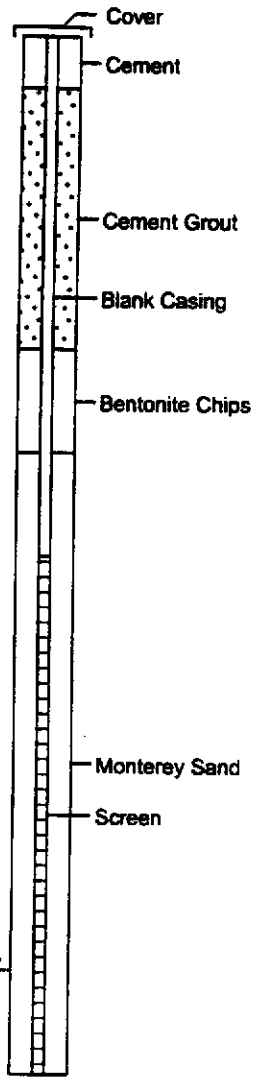
Clayton Environmental Pleasanton, California	LOG OF BORING CW-9 (Page 1 of 1)

Lemperes & Wulfsburg
5200 Coliseum Way
Oakland, California

Date Completed	: 7/23/98	Boring Location	: CW-9
Drilling Method	: Hollow Stem Auger	Logged By	: Marc Mullaney
Driller	: Exploration Geoservices		
Sampling Method	: Split Spoon		
Clayton Rep.	: Marc Mullaney		

Depth in Feet	Surf. Elev.	USCS	GRAPHIC	DESCRIPTION	Samples
0	0	AC		Asphalt	
		CL		Sandy silty CLAY; yellowish brown (2.5Y3/1); slightly plastic fines 60%; fine to medium sand 40%; damp; no odor	1
10	-10	CL		Slightly silty CLAY; black (N3/); saturated; plastic; organic matter; possible hydrocarbon odor	2
15	-15	SC		Very sandy CLAY; (2.5Y5/4); slightly plastic fines 55%; fine to medium sands 45%; saturated; root structures	3
20	-20	GC		Clayey sandy Gravel; yellowish brown (2.5Y5/3); fines 30%; fine to coarse sand 30%; gravels to 1 inch 40%; with plastic clay lenses; wet; no odor	4
25					

Well1: CW-8
Elev.:



Well Construction Information

WELL CONSTRUCTION

Date Compl.	: 7/23/98
Hole Diameter	: 8 inches
Drill. Method	: Hollow Stem Auger
Clayton Rep.	: Marc Mullaney

WELL CASING

Material	: Sch. 40 PVC
Diameter	: 2 inches
Joints	: Threaded

WELL SCREEN

Material	: Sch. 40 PVC
Diameter	: 2 inches
Joints	: Threaded
Opening	: 0.01 inch slot
SAND PACK	: 2/12 Monterey Sand
ANNULUS SEAL	: Bentonite Chip

NOTES

Boring terminated at 20 feet below surface grade. Sampled to 21 feet with split spoon sampler.

10-13-1998 c:\mtech5\acegeo\cw-9.bor

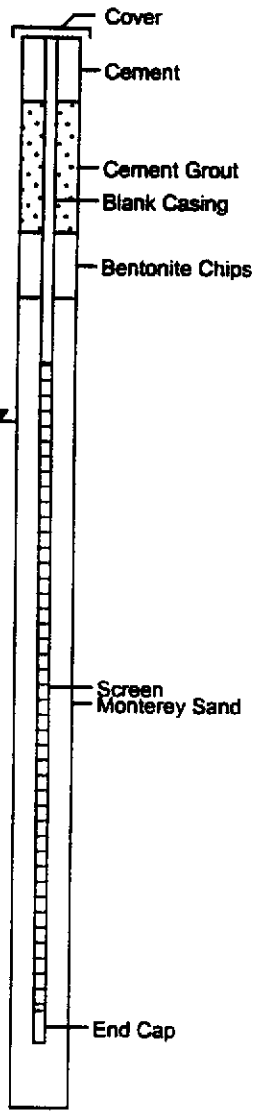
Clayton Environmental Pleasanton, California	LOG OF BORING CW-10 (Page 1 of 1)

Lemperes & Wulfsburg
5200 Coliseum Way
Oakland, California

Date Completed	: 9/21/98	Boring Location	: CW-10
Drilling Method	: Hollow Stem Auger	Logged By	: Don Ashton
Driller	: Gregg Drilling		
Sampling Method	: Split Spoon		
Clayton Rep.	: Don Ashton		

Depth in Feet	Surf. Elev.	USCS	GRAPHIC	DESCRIPTION	Samples
0	0	SW		Gravelly SAND; (FILL); dark yellowish brown (10YR4/4); fines nonplastic 5%; sand fines to coarse 70%; gravel fine to coarse to 2 inches, 25%; medium dense; dry; no odor	
5	-5	SP		SAND; (FILL); gray (10YR5/1) to dark gray (10YR4/1); trace fines; fine to medium sand 100%; damp at 7.5 feet silty SAND; fines 30%; fine sand 70%; wet	1
10	-10	SM		clayey SAND with gravel; (FILL); yellowish brown (10YR5/4); plastic fines 25%; sands fine to coarse 60%; gravel to 1 inch 15%; wet; firm; creosote odor; wood fragments to 6 inches long with creosote odor, staining of soil in contant	2
15	-15	SM/ ML		Sandy SILT to silty SAND; light olive brown (2.5Y5/3); fines 40 to 60%; firm; wet; no odor	3
20					

Well1: CW-10
Elev.:



Well Construction Information

WELL CONSTRUCTION

Date Compl.	: 9/21/98
Hole Diameter	: 8 inches
Drill. Method	: Hollow Stem Auger
Clayton Rep.	: Don Ashton

WELL CASING

Material	: Sch. 40 PVC
Diameter	: 2 inches
Joints	: Threaded

WELL SCREEN

Material	: Sch. 40 PVC
Diameter	: 2 inches
Joints	: Threaded
Opening	: 0.01 inch slot
SAND PACK	: 2/16 Monterey Sand
ANNULUS SEAL	: Bentonite Chip

NOTES

Boring terminated at 15 feet below surface grade, sampled to 16.5 feet below grade.

10-13-1998 c:\mlech5\acegeo\cw-10.bor

Clayton Environmental
Pleasanton, California

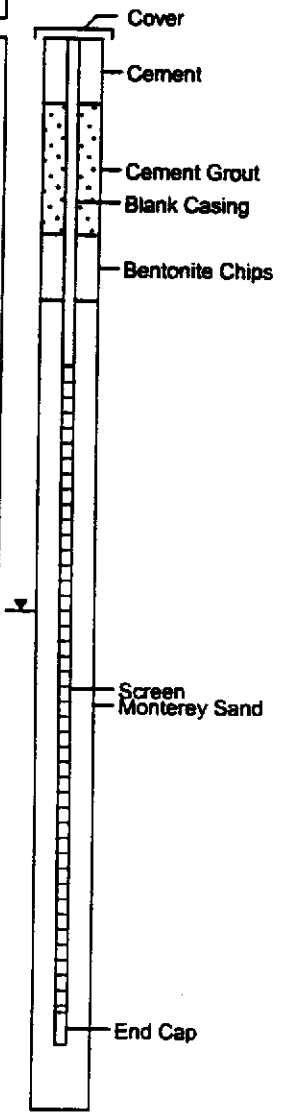
LOG OF BORING CW-12

Lemperes & Wulfsburg
5200 Coliseum Way
Oakland, California

Date Completed	: 9/21/98	Boring Location	: CW-12
Drilling Method	: Hollow Stem Auger	Logged By	: Don Ashton
Driller	: Gregg Drilling		
Sampling Method	: Split Spoon		
Clayton Rep.	: Don Ashton		

Depth in Feet	Surf. Elev.	USCS	GRAPHIC	DESCRIPTION	Samples
0	0	SW		Gravelly SAND; (FILL); dark yellowish brown (10YR4/4); fines nonplastic 5%; sands fine to coarse 70%; gravels fine to coarse 25%; dry; no odor	
		SP		SAND; (FILL); gray (10YR5/1); trace fines; fine to medium sands 100%;damp	
5	-5	SP		SAND; fines 10%; fine sand 90%	1
		SW		Clayey SAND with gravel; (FILL); yellowish brown (10YR5/4); plastic fines 25%; fine to coarse sands 60%; gravel to 1 inch, rare to 3 inches 15%; firm; wet; no odor; rare clayey sands, gray, (10YR-N5) with greenish hue	2
10	-10	SP		Silty SAND; light olive brown (2.5Y5/3); fines 40%; fine sands 60%; trace carbonaceous masses to 1/4 inch; firm; wet; no odor	
15	-15	SW		Clayey gravelly SAND; light olive brown (2.5Y5/3); plastic fines 15%; fine to coarse sands 70%; gravel to 1 inch 15%; wet; firm to stiff; no odor	3
20					

Well1: CW-12
Elev.:



Well Construction Information

WELL CONSTRUCTION

Date Compl.	: 9/21/98
Hole Diameter	: 8 inches
Drill. Method	: Hollow Stem Auger
Clayton Rep.	: Don Ashton

WELL CASING

Material	: Sch. 40 PVC
Diameter	: 2 inches
Joints	: Threaded

WELL SCREEN

Material	: Sch. 40 PVC
Diameter	: 2 inches
Joints	: Threaded
Opening	: 0.01 inch slot
SAND PACK	: 2/16 Monterey Sand
ANNULUS SEAL	: Bentonite Chip

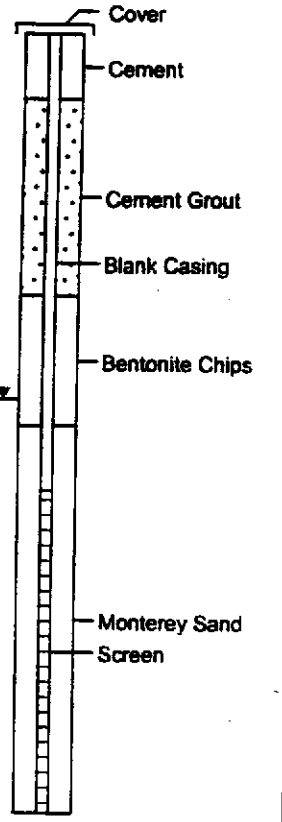
NOTES

Boring terminated at 15 feet below surface grade. Sampled to 16.5 feet below surface grade.

10-13-1998 c:\mlech5\acegeo\cw-12.bor

Clayton Environmental Pleasanton, California	LOG OF BORING CW-13 (Page 1 of 1)
Lemperes & Wulfsburg 5200 Coliseum Way Oakland, California	Date Completed : 7/23/98 Drilling Method : Hollow Stem Auger Driller : Exploration Geoservices Sampling Method : Split Spoon Clayton Rep. : Marc Mullaney Boring Location : CW-13 Logged By : Marc Mullaney

Depth in Feet	Surf. Elev.	USCS	GRAPHIC	DESCRIPTION	Samples	Blow Count
0	0					
		SW		Sandy GRAVEL; (FILL); brown (10YR4/3); sands fine to coarse 40%; gravels to 1inch 60%; wet; no odor	1	5 6 3
5	-5					
10	-10	GC		Clayey sandy GRAVEL; yellowish brown (2.5Y4/4); fines 20%; fine to coarse sands 30%; gravels to 1 inch 50%; wet	2	13 17 16
15	-15					
20						



Well Construction Information

WELL CONSTRUCTION

Date Compl.	: 7/23/98
Hole Diameter	: 8 inches
Drill. Method	: Hollow Stem Auger
Clayton Rep.	: Marc Mullaney

WELL CASING

Material	: Sch. 40 PVC
Diameter	: 2 inches
Joints	: Threaded

WELL SCREEN

Material	: Sch. 40 PVC
Diameter	: 2 inches
Joints	: Threaded
Opening	: 0.01 inch slot
SAND PACK	: 2/12 Monterey Sand
ANNULUS SEAL	: Bentonite Chip

NOTES

Boring terminated at 12 feet below surface grade.

10-13-1998 c:\mtech5\acegeo\cw-13.BOR

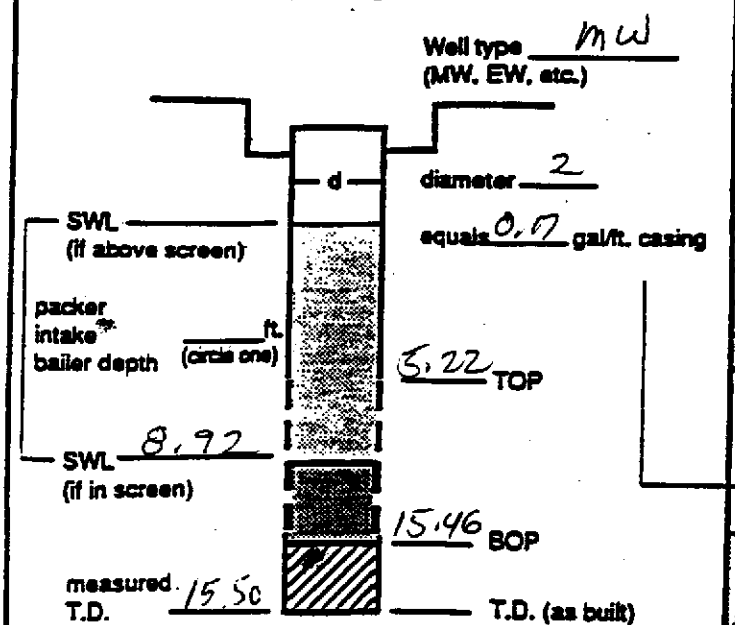
WELL DEVELOPMENT [illegible]

(fill out completely)

WELL OR LOCATION CW-6

PROJECT 70-97203.00.201 SAMPLER D ASHTON DATE 9-25-98/9-29-98

Well / Hydrologic statistics



Action	Time	Pump rate	IWL (low yield)
Start pump / Begin			
SURGE	17:56		
PURGE	18:05		
	18:15	5g	
START (9/29/98)	11:25		
Stop			
Sampled			
(Final IWL)			

Purge calculation

0.17 gal/ft. * 6.54 ft. = 1.11 gals x 10 = 11.1 gals.

(SWL to BOP or packer to BOP) (one volume) (purge volume- 10 casings)

Head purge calculation (Airlift only)

___ gal/ft. * ___ ft. = ___ gals.

packer to SWL: ___

Actual gallons purged 12 f

Actual volumes purged 10 f

Well yield ⊕ HY
(see below)

Equipment Used / Sampling Method / Description of Event/Comments:

17:56 SURGE 8'-15.4' 10 STROKES

DTW = DEPTH TO WATER

Gallons purged *	TEMP °C/°F (circle one)	EC mS/cm (us/cm)	Ph	TURBIDITY (NTU)		DTW
#1. 5g				HEAVY SILT OLIVE BROWN		
2. 8g	22.0	5.28	6.13	LIGHT BROWN	9/29/98 dh	9.03
3. 9g	22.5	5.27	6.50	↓	↓	9.06
4. 10g	22.6	5.27	6.62	↓		9.04
5. 11g	23.1	5.32	6.68	VERY LIGHT BROWN		9.04
6. 12g	23.0	5.25	6.79	↓	↓	9.07
7.						
8.						
9.						
10.						
11.						
12.						

* Take measurement at approximately each casing volume purged.

⊕ HY- Minimal W.L. drop

MY - WL drop - able to purge 3 volumes during one sitting by reducing pump rate or cycling pump.

LY - Able to purge 3 volumes by returning later or next day.

VLY - Minimal recharge - unable to purge 3 volumes.

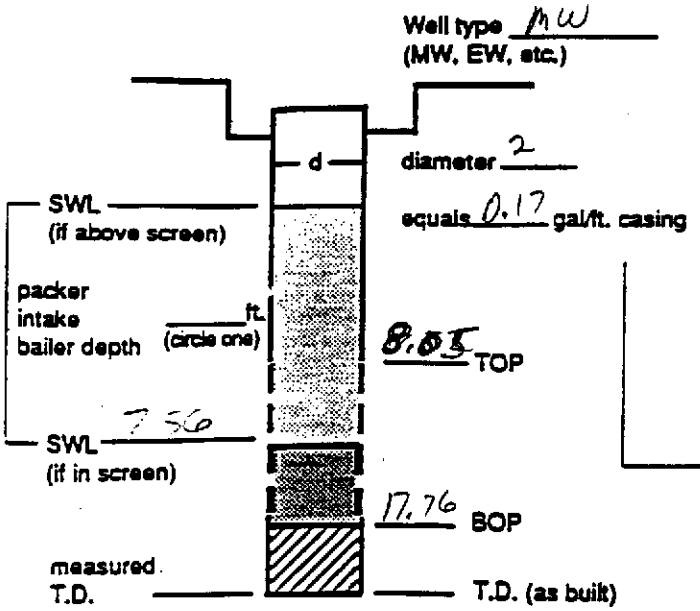
WELL DEVELOPMENT DATA SHEET

(fill out completely)

WELL OR LOCATION CW-7

PROJECT 70-97203.00.201 SAMPLER D. ASHTON DATE 9-25-98

Well / Hydrologic statistics



Action	Time	Pump rate	WL (low yield)
Start pump / Begin			
SURGE	16:55		
PURGE	17:10		
	17:20		
	17:30		
			16.52'
	17:25		
Stop	16		
Sampled			
(Final IWL)			

Purge calculation

0.17 gal/ft. * 10.2 ft. = 1.73 gals x 10 = 17.30 gals.

SWL to BOP or packer to BOP | one volume | purge volume- 10 casings

Head purge calculation (Airlift only)

____ gal/ft. * ____ ft. = ____ gals.

packer to SWL

Actual gallons purged 24.1

Actual volumes purged 14

Well yield ⊕ (see below) HY

Equipment Used / Sampling Method / Description of Event/Comments:

16:45 SURGE TO STROKES 8.05'-17.7'

Gallons purged *	TEMP (°C) °F (circle one)	EC (µs / cm)	Ph	TURBIDITY (NTU)		
1. 5				BLACK HEAVY SILT		
2. 10				BLACK HEAVY SILT		
3. 12.5				BLACK LIGHT SILT	DTW 16.52	
4. 16	22.3	1.219 mS/cm	10.41	CLOUDY SLIGHT SAND		
5. 19.3	20.6	1.016	10.32	CLOUDY		
6. 22.5	21.1	.969	10.20	SLIGHT CLOUDY		
7. 25.8	21.2	.991	10.14	SLIT. CLOUDY		
8.						
9.						
10.						
11.						
12.						

* Take measurement at approximately each casing volume purged.

⊕ HY- Minimal W.L. drop | MY - WL drop - able to purge 3 volumes during one sitting by reducing pump rate or cycling pump. | LY - Able to purge 3 volumes by returning later or next day. | VLY - Minimal recharge - unable to purge 3 volumes.

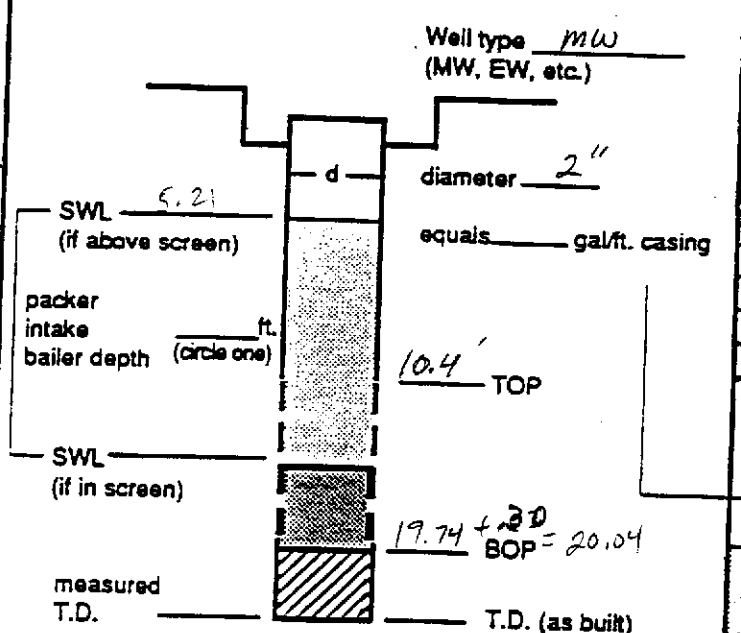
WELL DEVELOPMENT DATA SHEET

(fill out completely)

WELL OR LOCATION CW-8

PROJECT 70-97203.60.300 SAMPLER ASHTON DATE 9-11-98

Well / Hydrologic statistics



Action	Time	Pump rate	IWL (low yield)
Start pump / Begin	13:36		
	13:57	10 g	MY
	14:18	14 g TOTAL	DTW 19.85
			LY
Stop			
Sampled	19:15		
(Final IWL)			

Purge calculation

0.16 gal/ft. * 14.83 ft. = 2.37 gals x 10 = 23.7 gals.

(SWL to BOP or packer to BOP) (one volume) (purge volume-10 casings)

Head purge calculation (Airlift only)

____ gal/ft. * ____ ft. = ____ gals.

packer to SWL

Actual gallons purged 14.0

Actual volumes purged 5.91

Well yield ⊕ MY
(see below)

Equipment Used / Sampling Method / Description of Event/Comments:

SURGE WELL; 9'-14' IN 5 STAGES
14'-19.7' IN 4 STAGES

80% SAMPLE DEPTH = 5.21 + (14.83 x .2) = 8.18'
19:15 DTW 5.45' SAMPLED - WATER CLEAR

Gallons purged *	TEMP °C/°F (circle one)	EC ~~(us / cm)~~	Ph	TURBIDITY (NTU)		
1. 10.1	21.5	4.64 ms/cm	7.15		MODERATE SILT	PEAK VALUES/TIME
2. 14.0	21.9	3.01	7.54		SLIGHTLY CLOUDY	"
3.						
4.						
5.						
6.						
7.						
8.						
9.						
10.						
11.						
12.						

* Take measurement at approximately each casing volume purged.

⊕ HY- Minimal W.L. drop

MY - WL drop - able to purge 3 volumes during one sitting by reducing pump rate or cycling pump.

LY - Able to purge 3 volumes by returning later or next day.

VLY - Minimal recharge - unable to purge 3 volumes.

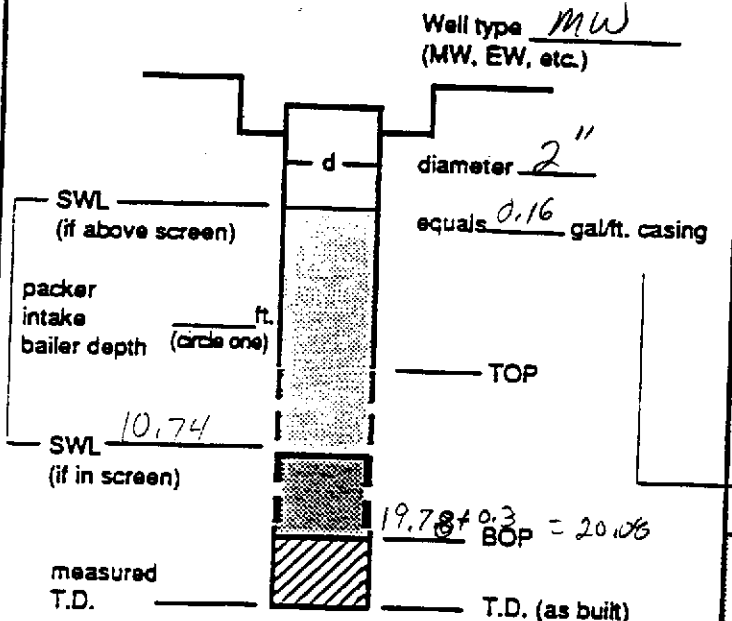
WELL DEVELOPMENT DATA SHEET

(fill out completely)

WELL OR LOCATION CW-9

PROJECT 70-97203.00.300 SAMPLER ASHTON DATE 9-11-99

Well / Hydrologic statistics



Action	Time	Pump rate	IWL (low yield)
Start pump / Begin	15:38		
	16:13	10 g	
	16:25	13.1 g	
	16:47	20.1 g	
	16:56	22.1 g	
	17:03	23.1 g	
Stop			
Sampled	19:30		
(Final IWL)			

Purge calculation

0.16 gal/ft. * 9.34 ft. = 1.49 gals x 10 = 14.9 gals.

(SWL to BOP or packer to BOP) (one volume) (purge volume-10 casings)

Head purge calculation (Airlift only) *

____ gal/ft. * ____ ft. = ____ gals.

packer to SWL

Actual gallons purged 23.1

Actual volumes purged 15.5

Well yield ⊕ (see below) HY

Equipment Used / Sampling Method / Description of Event/Comments:

SUBMERSIBLE PUMP: 10' TO 15' 10 STAINLESS
15' TO 20' 10 STAINLESS
50' MEASURING = 20.74 - (9.34 x 1/2) = 12.61'
19:30 DTW 11.35 WATER CLEAR

Gallons purged *	TEMP °C / °F (circle one)	ms EC (~~us~~ / cm)	Ph	TURBIDITY (NTU)		
1. 10 g	20.2	30.7	6.88		HEAVY SILT SUSPENDED SEDIMENT	
2. 13.1	20.1	30.3	6.83		MODERATELY SILTY	
3. 20.1	19.9	31.2	6.72		LIGHT SILTY	
4. 22.1	20.2	31.1	6.76		CLOUDY	
5. 23.1	20.2	31.1	6.72		CLOUDY	
6.						
7.						
8.						
9.						
10.						
11.						
12.						

* Take measurement at approximately each casing volume purged.

⊕ HY- Minimal W.L. drop MY - WL drop - able to purge 3 volumes during one sitting by reducing pump rate or cycling pump. LY - Able to purge 3 volumes by returning later or next day. VLY - Minimal recharge - unable to purge 3 volumes.

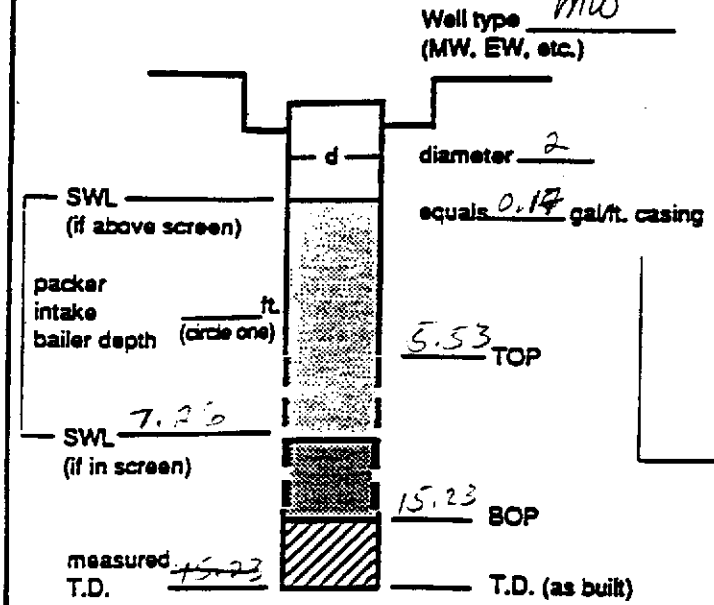
WELL DEVELOPMENT DATA SHEET

(fill out completely)

WELL OR LOCATION CW-10

PROJECT 70-97203.00.201 SAMPLER D. ASHTON DATE 9-25-98

Well / Hydrologic statistics



Action	Time	Pump rate	IWL (low yield)
Start pump / Begin	09:30	OPENING WELL	
SURGE WELL	12:15		
	13:05	7	11.47'
	13:24	10	
	13:57	12.5	
	14:05	15	
Stop	14:14	17.2	
Sampled	14:22	19.0	6.85'
(Final IWL)			

Purge calculation

0.17 gal/ft. • 7.97 ft. = 1.36 gals x 10 = 13.6 gals.

(0.17: gal/ft. — one volume; 7.97: ft. SWL to BOP or packer to BOP; 13.6: purge volume-10 casings)

Head purge calculation (Airlift only)

____ gal/ft. • ____ ft. = ____ gals.

packer to SWL

Actual gallons purged 19

Actual volumes purged 14

Well yield ⊕ (see below) HY

Equipment Used / Sampling Method / Description of Event/Comments:

12:15 SURGE WELL 10' - 15.23' 10 TIMES & 10' - 7' 10 TIMES

Gallons purged *	TEMP °C/°F (circle one)	mS EC (µs / cm)	Ph	TURBIDITY (NTU)		
1. 7a	21.1	24.6	6.48	HAZY LT. OLIVE BROWN	DTW 11.47	
2. 10g	21.1	25.1	6.68	"		
3. 13.2a	21.4	25.6	6.77	V. CLOUDY		
4. ⇒ 15.2	21.5	24.1	6.81	CLOUDY		
5. 17.2	21.6	24.8	6.84	CLOUDY		
6. 19.0	21.4	24.7	6.91	LT. CLOUDY	DTW 6.85	
7.						
8.						
9.						
10.						
11.						
12.						

* Take measurement at approximately each casing volume purged.

⊕ HY- Minimal W.L drop MY - WL drop - able to purge 3 volumes during one sitting by reducing pump rate or cycling pump. LY - Able to purge 3 volumes by returning later or next day. VLY - Minimal recharge - unable to purge 3 volumes.

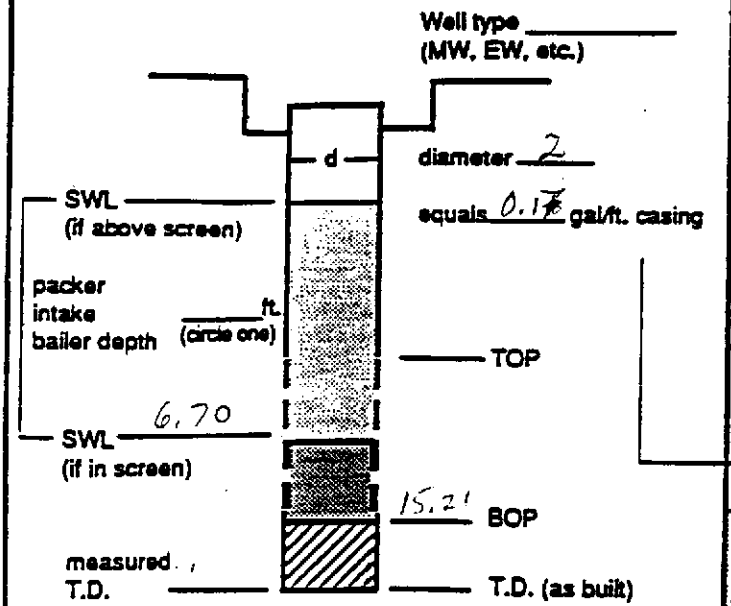
WELL DEVELOPMENT DATA SHEET

(fill out completely)

WELL OR LOCATION CW-12

PROJECT 70-97203.00.201 SAMPLER D. ASHTON DATE 9-25-98

Well / Hydrologic statistics



Action	Time	Pump rate	IWL (low yield)
Start pump / Begin	09:32	OPEN WELL	
SURGE WELL	12:30		
	13:45	SURGE	
	14:45	11.5	
	14:55	10.0	
	15:02	15.2	
Stop			
Sampled			
(Final IWL)			

Purge calculation

0.17 gal/ft. (SWL to BOP or packer to BOP) * 8.51 ft. = 1.45 gals (one volume) x 10 = 14.50 gals. (purge volume-10 casings)

Head purge calculation (Airlift only)

____ gal/ft. * ____ ft. = ____ gals.
packer to SWL

Actual gallons purged 15.2

Actual volumes purged 10.5

Well yield ⊕ (see below) HY

Equipment Used / Sampling Method / Description of Event/Comments:

12:30 SURGE WELL 10' TO 15.21 & 10' TO 6' 10 TIMES EACH.

Gallons purged *	TEMP °C / °F (circle one)	MS EC (µs / cm)	Ph	TURBIDITY (NTU)		
1. 5g				HEAVY SILT LT GRAY BROWN		
2. 11.5g	20.6	22.9 ms	7.24	CLOUDY LTR SILT		
3. 14.0g	21.4	20.8 ms	7.33	CLOUDY		
4. 15.2g	21.5	35.6 µs/cm	7.32	CLOUDY		
5.						
6.						
7.						
8.						
9.						
10.						
11.						
12.						

* Take measurement at approximately each casing volume purged.

⊕ HY- Minimal W.L. drop MY - WL drop - able to purge 3 volumes during one sitting by reducing pump rate or cycling pump. LY - Able to purge 3 volumes by returning later or next day. VLY - Minimal recharge - unable to purge 3 volumes.

WELL DEVELOPMENT DATA SHEET

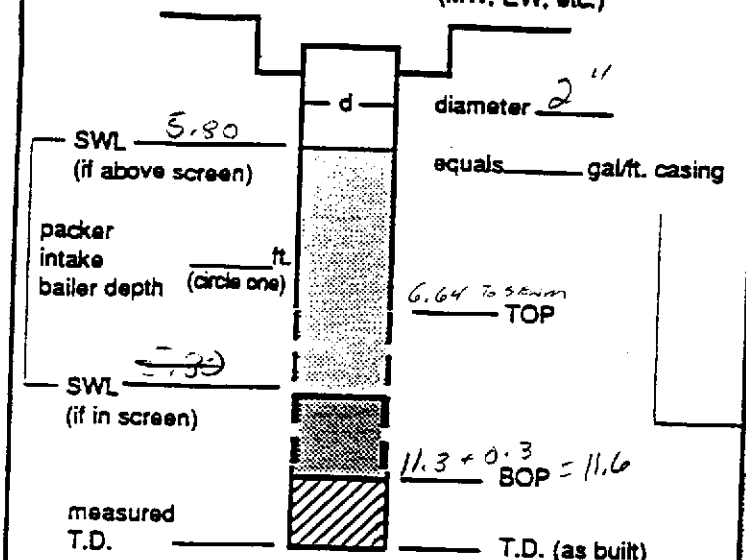
(fill out completely)

WELL OR LOCATION CW-13

PROJECT 70-97203.00.300 SAMPLER ASHTON DATE 9-11-93

Well / Hydrologic statistics

Well type MW (MW, EW, etc.)



Action	Time	Pump rate	IWL (low yield)
Start pump / Begin	17:21	~~10~~	
	17:51	10 g	
	18:11	15 g	
	18:40	17 g	
	18:56	19 g	HY
Stop			
Sampled	19:45		
(Final IWL)			

Purge calculation

0.16 gal/ft. * 5.80 ft. = 0.93 gals x 10 = 9.3 gals.

SWL to BOP or packer to BOP; one volume; purge volume-10 casings

Head purge calculation (Airlift only)

____ gal/ft. * ____ ft. = ____ gals.

packer to SWL

Actual gallons purged 19 g

Actual volumes purged 20.4

Well yield ⊕ (see below) HY

Equipment Used / Sampling Method / Description of Event/Comments:

SURGED WELL: 6.6' TO 1.6' 5 STROKES

80% RECOVERY - SAMPLE DEPTH 5.80' + (5.80 x .2) = 6.96'

DTW - 19:45 5.82' SAMPLED D- WATER CLEAR TO SLIGHTLY CLOUDY

Gallons purged *	TEMP °C °F (circle one)	EC mS µs / cm	Ph	TURBIDITY (NTU)		
1. 10 g	21.7	7.62	5.78		HEAVY SILT DARK BROWN	
2. 15 g	23.2	7.51	5.67		HEAVY SILT	
3. 17 g	22.4	7.59	5.70		MODERATE SILT	
4. 19 g	21.8	7.57	5.66		V. CLOUDY	
5.						
6.						
7.						
8.						
9.						
10.						
11.						
12.						

* Take measurement at approximately each casing volume purged.

⊕ HY- Minimal W.L. drop MY - WL drop - able to purge 3 volumes during one sitting by reducing pump rate or cycling pump. LY - Able to purge 3 volumes by returning later or next day. VLY - Minimal recharge - unable to purge 3 volumes.

ROBERT BEIN, WILLIAM FROST & ASSOCIATES
PROFESSIONAL ENGINEERS, PLANNERS & SURVEYORS

October 15, 1998

Clayton Environmental Consultants
San Francisco Regional Office
1252 Quarry Lane
Pleasanton, CA 94566
Attn: Mr. Don Ashton

Subject: Coliseum Way Well Elevations

Based upon our field survey on Monday October 12, 1998 we have determined the elevations of certain wells at the subject site. We have based our elevations on a City of Oakland benchmark number 1094 on Coliseum Way and 50th Avenue. The elevation of the benchmark is 4.85 feet. We are currently researching the datum of the City benchmark. Our adjusted field elevations are:

CW6	10.20
CW7	8.86
CW8	6.24
CW9	7.35
CW10	5.33
CW12	4.84
CW13	4.47
LF5	5.05
LF10	6.45
LF11	5.96
LF12	5.70

DATUM = MLLW,
ADD 3.0 FOR MSL

Please do not hesitate to call if you have any questions.

Sincerely,

Patrick J. Tami, L.S.

H:\GRP40\PDATA\600107\OFFICE\WPWIN\07LTR001.WPD

JOB #: 70-97203.CC.300

SAMPLING DATA SHEET

JOB LOCATION: 2 CLISEnm WAY
OAKLAND, CA

SAMPLING LOCATION: MW-2
DEPTH TO WATER: 6.65
WELL BOTTOM DEPTH: 17.34
WELL CASING VOLUME: 6.95 GAL
CASING VOLUMES PURGED: 3+
PURGE RATE: .75 GPM (1244 START)

DATE PURGED: 9/11/98
PURGE METHOD: DISP. BAILER
DATE & TIME SAMPLED: 9/11/98 1558
SAMPLING METHOD: DISP. BAILER
SAMPLE TYPE: ✓ GRAB ___ COMPOSITE
PRESERVATIVES: HCl
OF CONTAINERS: 6
FIELD TECH: D. WATTS
WEATHER CONDITIONS: CLEAR/WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW ~~(ntu)~~
1248	7.0	780	7.03	73.7	10.66
1255	14.0	800	7.02	74.7	13.90
1309	21.0	870	6.73	74.3	15.39
WELL PURGED DRY AFTER 24 GAL					

NOTES: DTW = DEPTH TO WATER
SAMPLED AT 6.80 DTW

SAMPLING DATA SHEET

JOB #: 20-97203.00.300

JOB LOCATION: COLISEUM WAY OAKLAND, CA

SAMPLING LOCATION: MWA-3

DEPTH TO WATER: 8.75

WELL BOTTOM DEPTH: 14.66

WELL CASING VOLUME: 3.85 GAL

CASING VOLUMES PURGED: 2+

PURGE RATE: .83 GPM (1216 START)

DATE PURGED: 9/11/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/11/98 1549

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NA

OF CONTAINERS: 2

FIELD TECH: D. WATTS

WEATHER CONDITIONS: CLEAR/WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW ~~(ntu)~~
1219	4.0	900	6.95	72.5	11.02
1223	8.0	950	6.98	71.1	13.10
WELL PUMPED DRY AFTER 10.0 GAL					

NOTES: DTW = DEPTH TO WATER

SAMPLED AT 11.33 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY OAKLAND, CA

SAMPLING LOCATION: MW-4

DEPTH TO WATER: 12.06

WELL BOTTOM DEPTH: 18.91

WELL CASING VOLUME: 1.10 GAL

CASING VOLUMES PURGED: 4+

PURGE RATE: .35 GPM (1143 START)

DATE PURGED: 9/11/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/11/98 1540

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NA

OF CONTAINERS: 2

FIELD TECH: D. WATTS

WEATHER CONDITIONS: CLEAR/WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW ~~(ntu)~~
1145	1.25	1500	5.58	71.6	13.32
1147	2.25	1340	5.85	70.2	14.49
1151	3.50	1270	6.03	70.1	16.66
1156	4.50	1280	5.98	70.7	17.40

NOTES: DTW = DEPTH TO WATER

SAMPLED AT 11.68 DTW

SAMPLING DATA SHEET

JOB #: 70-97203.00,300

JOB LOCATION: Coliseum Way, Oakland, CA

SAMPLING LOCATION: MW-5

DEPTH TO WATER: 8.72

WELL BOTTOM DEPTH: 18.95

WELL CASING VOLUME: 1.64 GAL

CASING VOLUMES PURGED: 4 +

PURGE RATE: .37 GPM (1028 START)

DATE PURGED: 9/11/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/11/98 1530

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NA

OF CONTAINERS: 2

FIELD TECH: D. Watts

WEATHER CONDITIONS: Cloudy / Warm

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW (ntu)
1031	1.75	1530	6.95	68.8	8.90
1037	3.50	1330	6.93	67.3	8.95
1042	5.25	1260	6.99	68.0	8.80
1047	7.00	1220	6.99	67.7	9.11

NOTES: DTW = DEPTH TO WATER

SAMPLED AT 8.70 DTW

SAMPLING DATA SHEET

JOB #: 70-97203.00.300

JOB LOCATION: COLISEUM WAY, OAKLAND, CA

SAMPLING LOCATION: MW-6

DEPTH TO WATER: 6.02

WELL BOTTOM DEPTH: 18.53

WELL CASING VOLUME: 2.00 GAL

CASING VOLUMES PURGED: 4 +

PURGE RATE: .39 gpm (0938 START)

DATE PURGED: 9/11/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/11/98 1510

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: HCl

OF CONTAINERS: 6

FIELD TECH: R. WYATT

WEATHER CONDITIONS: CLEAR / WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW (ntu)
0942	2.00	1580	7.22	68.5	10.70
0947	4.00	1520	7.32	67.7	13.01
0953	6.00	1540	7.21	67.5	15.05
0959	8.25	1600	7.18	66.0	17.17

NOTES: DTW = DEPTH TO WATER

SAMPLED AT 6.14 DTW

JOB #: 20-97203.00 300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY OAKLAND, CA

SAMPLING LOCATION: MW-7

DEPTH TO WATER: 17.70

WELL BOTTOM DEPTH: 18.95

WELL CASING VOLUME: .20 GAL

CASING VOLUMES PURGED:

PURGE RATE: .05 GPM (0909 START)

DATE PURGED: 9/11/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/11/98 1454

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NA

OF CONTAINERS: 2

FIELD TECH: D. WATTS

WEATHER CONDITIONS: CLEAR/WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW (ntu)
0914	.25	1780	6.73	73.1	18.41
WELL PURGED DRY AFTER .30 GAL					

NOTES: DTW = DEPTH TO WATER
SAMPLED AT 17.95 DTW

JOB #: 20-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way. Oakland, CA

SAMPLING LOCATION: MW-8

DEPTH TO WATER: 7.15

WELL BOTTOM DEPTH: 19.00

WELL CASING VOLUME: 1.90 GAL

CASING VOLUMES PURGED: 4+

PURGE RATE: .40 GPM (0830 START)

DATE PURGED: 9/11/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/11/98 1438

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: ~~Heeded~~ NA

OF CONTAINERS: 2

FIELD TECH: D. Watts

WEATHER CONDITIONS: Clear / Cool

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW ~~(neu)~~
0834	2.0	2040	6.70	73.0	9.21
0839	4.0	2110	6.72	71.6	9.70
0845	6.0	2260	6.61	70.0	11.45
0850	8.0	2330	6.67	68.1	13.51

NOTES: DTW = DEPTH TO WATER
SAMPLED AT 8.35 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way Oakland, CA

SAMPLING LOCATION: CW-1

DEPTH TO WATER: 8.85

WELL BOTTOM DEPTH: 13.35

WELL CASING VOLUME: .75 GAL

CASING VOLUMES PURGED: 4

PURGE RATE: .23 GPM (1522 START)

DATE PURGED: 9/10/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/10/98 1751

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: Hcl

OF CONTAINERS: 5

FIELD TECH: D. Watts

WEATHER CONDITIONS: Clear/Warm

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW ~~(ntu)~~
1524	.75	1480	6.28	80.3	9.65
1527	1.50	1400	6.54	77.8	11.00
1530	2.25	1200	6.51	76.9	11.71
1535	3.00	1250	6.70	76.2	12.95

NOTES: DTW = DEPTH TO WATER

SAMPLED AT 9.43 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way Oakland, CA

SAMPLING LOCATION: CW-2

DEPTH TO WATER: 9.10

WELL BOTTOM DEPTH: 13.16

WELL CASING VOLUME: .65 GAL

CASING VOLUMES PURGED: 4 +

PURGE RATE: .34 GPM (1549 START)

DATE PURGED: 9/10/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/10/98 1735

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓GRAB ___COMPOSITE

PRESERVATIVES: HCl

OF CONTAINERS: 5

FIELD TECH: D. Watts

WEATHER CONDITIONS: Cloudy/Warm

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW ~~(ntu)~~
1551	.75	980	6.80	76.6	10.50
1553	1.50	800	6.81	75.0	10.61
1555	2.25	820	6.90	74.5	10.93
1557	2.75	800	6.81	75.1	11.20

NOTES: DTW = DEPTH TO WATER

SAMPLED AT 10.10 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY OAKLAND, CA

SAMPLING LOCATION: CW-3

DEPTH TO WATER: 8.44

WELL BOTTOM DEPTH: 13.21

WELL CASING VOLUME: .76 GAL

CASING VOLUMES PURGED: 4 +

PURGE RATE: .41 GPM (1613 START)

DATE PURGED: 9/10/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/10/98 1746

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: HCl

OF CONTAINERS: 5

FIELD TECH: D. WATTS

WEATHER CONDITIONS: COOL / CLEAR

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW ~~(ntu)~~
1615	1.00	1130	10.18	74.2	9.22
1617	1.75	1170	10.35	73.3	9.29
1619	2.50	1170	10.26	72.5	9.32
1621	3.25	1180	10.10	73.3	9.20

NOTES: DTW = DEPTH TO WATER

SAMPLED AT 8.81 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way, Oakland, CA

SAMPLING LOCATION: CW-4

DEPTH TO WATER: 7.70

WELL BOTTOM DEPTH: 13.85

WELL CASING VOLUME: .984 Gal

CASING VOLUMES PURGED: 4 +

PURGE RATE: .36 GPM (1634 START)

DATE PURGED: 9/10/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/10/98 1720

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: HCl

OF CONTAINERS: 5

FIELD TECH: D. Watts

WEATHER CONDITIONS: Clear/Warm

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW ~~(ntu)~~
1636	1.0	940	9.65	72.3	7.81
1639	2.0	930	9.50	75.3	7.85
1642	3.0	950	9.38	71.6	7.85
1645	4.0	940	9.40	69.6	7.86

NOTES: DTW = DEPTH TO WATER
SAMPLED AT 7.73 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way Oakland, CA

SAMPLING LOCATION: CW-5

DEPTH TO WATER: 7.76

WELL BOTTOM DEPTH: 13.60

WELL CASING VOLUME: .93 GAL

CASING VOLUMES PURGED: 4 +

PURGE RATE: .40 GPM (1658 START)

DATE PURGED: 9/10/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/10/98 1717

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: HCl

OF CONTAINERS: 5

FIELD TECH: D. Watts

WEATHER CONDITIONS: Clear/Warm

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW ~~(ntu)~~
1703	1.0	910	7.09	71.0	7.78
1704	2.0	900	7.13	70.7	7.80
1706	3.0	810	7.33	70.1	7.82
1708	4.0	800	7.35	70.1	7.86

NOTES: DTW = DEPTH TO WATER

SAMPLED AT 7.86 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way Oakland, CA

SAMPLING LOCATION: LF-3

DEPTH TO WATER: 5.16

WELL BOTTOM DEPTH: 14.80

WELL CASING VOLUME: 1.60 GAL

CASING VOLUMES PURGED: 4 +

PURGE RATE: .46 GPM (1057 START)

DATE PURGED: 9/10/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/10/98 1638

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: HCl

OF CONTAINERS: 6

FIELD TECH: D. Watts

WEATHER CONDITIONS: Cloudy/Warm

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	TURBIDITY ΔTW (ntu)
1100	1.75	1850	6.31	77.0	5.52
1104	3.50	1970	6.37	77.3	5.72
1107	5.25	1940	6.39	74.5	5.93
1111	6.50	1950	6.43	73.2	5.97

NOTES: DTW = DEPTH TO WATER
Sampled @ 5.13 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY OAKLAND, CA

DATE PURGED: 9/10/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/10/98 1625

SAMPLING LOCATION: LF-8

SAMPLING METHOD: DISP. BAILER

DEPTH TO WATER: 4.88

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

WELL BOTTOM DEPTH: 14.56

PRESERVATIVES: HCl

WELL CASING VOLUME: ~~1.55~~ 6.30 GAL

OF CONTAINERS: 6

CASING VOLUMES PURGED: ~~1.30 GAL~~ 4 +

FIELD TECH: D. WATTS

PURGE RATE: 1.24 GPM (1018 START)

WEATHER CONDITIONS: COOL/CLEAR

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW ~~(ntu)~~
1022	7.0	~~1370~~ (370)	6.75	71.1	6.51
1029	14.0	1260	6.97	74.7	7.20
1034	20.0	1240	6.75	75.4	7.23
1039	26.0	1240	6.90	75.7	7.35

NOTES: DTW = DEPTH TO WATER

SAMPLED @ 4.85 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION:	COLISEUM WAY OAKLAND, CA	DATE PURGED:	9/10/98
		PURGE METHOD:	Disp. Bailer
		DATE & TIME SAMPLED:	9/10/98 1612
SAMPLING LOCATION:	LF-4	SAMPLING METHOD:	Disp. Bailer
DEPTH TO WATER:	5.17	SAMPLE TYPE:	✓ GRAB ___ COMPOSITE
WELL BOTTOM DEPTH:	18.16	PRESERVATIVES:	HCl
WELL CASING VOLUME:	2.08 GAL	# OF CONTAINERS:	6
CASING VOLUMES PURGED:	3 +	FIELD TECH:	D. WATTS
PURGE RATE:	.32 GPM (0921 START)	WEATHER CONDITIONS:	COOL / CLEAR

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW (ntu)
0925	2.25	1250	6.55	68.2	9.40
0930	4.25	1170	6.55	66.4	13.31
0937	6.25	1260	6.61	65.4	15.90
WELL PURGED DRY AFTER 2.25 GAL					

NOTES: DTW = DEPTH TO WATER

SAMPLED @ 1253 DTW

JOB #: 70-97203.00.308

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY OAKLAND, CA

SAMPLING LOCATION: LF-16

DEPTH TO WATER: 6.40

WELL BOTTOM DEPTH: ≈ 24.3

WELL CASING VOLUME: 2.86

CASING VOLUMES PURGED: 3+

PURGE RATE: .44 GPM (START 1148)

DATE PURGED: 9/10/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/10/98 1540

SAMPLING METHOD: DISP BAILER

SAMPLE TYPE: X GRAB ___ COMPOSITE

PRESERVATIVES: N/A

OF CONTAINERS:

FIELD TECH: K. Reeve / D. WATTS

WEATHER CONDITIONS: CLEAR WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(µmhos/cm)~~	PH	TEMPERATURE ~~(°F)~~ C	~~TURBIDITY~~ DTW ~~(ntu)~~
1153	3.0	10.94 mS/cm	4.69	21.6	13.50
1158	6.0	12.48	4.51	20.7	16.20
1207	9.0	13.14	4.51	20.4	20.2
WELL PURGED DRY AFTER 11 GAL					

NOTES: DTW = Depth TO WATER

SAMPLED AT 7.15 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way, Oakland, CA

SAMPLING LOCATION: LF-2

DEPTH TO WATER: 4.85

WELL BOTTOM DEPTH: 14.67

WELL CASING VOLUME: 1.60 GAL

CASING VOLUMES PURGED: 3 +

PURGE RATE: .30 GPM (0844 START)

DATE PURGED: 9/10/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/10/98 1558

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: HCl

OF CONTAINERS: 6

FIELD TECH: D. Watts

WEATHER CONDITIONS: Cool/Clear

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW ~~(ntu)~~
0847	1.75	2330	6.20	72.7	9.71
0852	3.50	1850	6.21	71.6	11.65
0900	5.25	1720	6.30	67.2	DRY
WELL PULLED DRY AFTER 5.5 GAL					

NOTES: DTW = DEPTH TO WATER

Sampled @ 5.58 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY, OAKLAND, CA

SAMPLING LOCATION: LF14

DEPTH TO WATER: 6.27

WELL BOTTOM DEPTH: 24.65

WELL CASING VOLUME: 2.94

CASING VOLUMES PURGED: 4

PURGE RATE: ~.48 GPM START 1048

DATE PURGED: 9/10/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/10/98 1525 ✓

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: X GRAB ___ COMPOSITE

PRESERVATIVES: N/A

OF CONTAINERS:

FIELD TECH: K. REEVE / D. WATTS

WEATHER CONDITIONS: CLEAR WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE ~~(°F)~~ C	~~TURBIDITY~~ DTW ~~(ntu)~~
1054	3.0	5.25	4.95	21.3	12.50
1100	6.0	5.40	4.92	20.0	15.2
1106	9.0	5.76	4.93	20.0	15.38
1113	12.0	5.82	5.00	19.9	17.00

NOTES: DTW = DEPTH TO WATER
SAMPLED AT 6.55 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way Oakland, CA

SAMPLING LOCATION: LF 6

DEPTH TO WATER: 5.95

WELL BOTTOM DEPTH: 19.85

WELL CASING VOLUME: 2.25

CASING VOLUMES PURGED: 4

PURGE RATE: .5 GPM START 1010

DATE PURGED: 9/10/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/10/98 1515 ✓

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: X GRAB ___ COMPOSITE

PRESERVATIVES: N/A

OF CONTAINERS:

FIELD TECH: K. Reeve / D. Watt

WEATHER CONDITIONS: CLEAR WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE ~~(°F)~~ C	TURBIDITY ~~(ntu)~~ DTW
1014	2.25	6.29	6.64	22.2	9.25
1018	4.50	6.01	5.38	21.5	10.12
1023	6.75	6.05	5.15	21.5	10.65
1028	9.00	6.03	5.13	21.6	10.80

NOTES: DTW - DEPTH TO WATER
SAMPLED AT 6.0 DTW

JOB #: 70-9720J.00 Jo

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way, Oakland, CA

SAMPLING LOCATION: LF7

DEPTH TO WATER: 4.58

WELL BOTTOM DEPTH: 21.2

WELL CASING VOLUME: 2.66

CASING VOLUMES PURGED: 4

PURGE RATE: .50 hPm START 0931

DATE PURGED: 9/10/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/10/98 1503

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: X GRAB ___ COMPOSITE

PRESERVATIVES: N/A

OF CONTAINERS:

FIELD TECH: K. Reed / D. WATTS

WEATHER CONDITIONS: CLEAR WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE ~~(°F)~~ C	~~TURBIDITY~~ DTW ~~(ntu)~~
0936	2.75	1.84	7.81	21.1	8.70
0942	5.50	1.69	7.32	21.1	10.10
0947	8.25	1.68	7.25	20.2	10.47
0953	11.00	1.66	7.37	20.0	10.78

NOTES: DTW = DEPTH TO WATER

SAMPLED AT 5.55 DTW

JOB #: 72-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way Oakland, CA

SAMPLING LOCATION: LF13

DEPTH TO WATER: 3.64

WELL BOTTOM DEPTH: 14.6

WELL CASING VOLUME: 3 7.12

CASING VOLUMES PURGED: 2

PURGE RATE: .986pm START 0837

DATE PURGED: 9/10/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/10/98

SAMPLING METHOD: Disp. Bailer 1450

SAMPLE TYPE: X GRAB ___ COMPOSITE

PRESERVATIVES: N/A

OF CONTAINERS: 6

FIELD TECH: K. Reeve / D. WATTS

WEATHER CONDITIONS: Clear Warm

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE ~~(°F)~~ C	~~TURBIDITY~~ DTW ~~(ntu)~~
0843	7.12	1.52	~~4.00~~ 6.30	21.2	8.15
0851	14.24	1.44	7.34	21.7	11.95
WELL PURGED DRY AFTER 16.6 GALLONS					

NOTES: DTW = Depth to water

WELL WENT DRY

SAMPLED AT 3.65 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY OAKLAND, CA

SAMPLING LOCATION: LFMW-4

DEPTH TO WATER: 5.76

WELL BOTTOM DEPTH: 29.16

WELL CASING VOLUME: 3.75 GAL

CASING VOLUMES PURGED: 4

PURGE RATE: ~~.42~~ ~~.54~~ GPM (0948 START)

DATE PURGED: 9/9/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/9/98 1521

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NA

OF CONTAINERS: 2

FIELD TECH: K. REEVE / D. WATTS

WEATHER CONDITIONS: COOL / OVERCAST

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(umhos/cm)~~	PH	TEMPERATURE ~~(F)~~ °C	TURBIDITY DTW ~~(ntu)~~
0856	3.75	24.40 ms/cm	7.64	18.9	12.93
0906	7.50	21.40	6.71	20.0	15.70
0914	11.25	15.32	6.57	19.7	18.35
0924	15.00	~~11.01~~ 11.01 ms/cm	5.96	19.6	21.87

NOTES: DTW = DEPTH TO WATER
SAMPLED AT 5.99 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY, OAKLAND, CA

SAMPLING LOCATION: LFMW-1

DEPTH TO WATER: 5.15

WELL BOTTOM DEPTH: 28.33

WELL CASING VOLUME: 3.75 GAL

CASING VOLUMES PURGED: 4

PURGE RATE: .44 GPM (0992 START)

DATE PURGED: 9/9/91

PURGE METHOD: D.SP. BAILER

DATE & TIME SAMPLED: 9/9/91 1529

SAMPLING METHOD: D.SP. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NA

OF CONTAINERS: 2

FIELD TECH: K. REEVE / D. WATTS

WEATHER CONDITIONS: COOL / OVERCAST

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (~~umhos/cm~~)	PH	TEMPERATURE (~~oF~~) °C	~~TURBIDITY~~ DTW (ntu) e
0940	3.75	.695 ms/cm	6.70	21.2	9.81
0947	7.50	1.224	7.03	20.9	13.0
0958	11.25	1.257	7.17	20.3	16.24
1006	15.00	1.905	6.95	20.2	20.04

NOTES: DTW = DEPTH TO WATER

SAMPLED AT 5.12 DTW

JOB #: 70-97203.00300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way Oakland, CA

SAMPLING LOCATION: LF-17

DEPTH TO WATER: ~~20~~. 5.9

WELL BOTTOM DEPTH: 20.25

WELL CASING VOLUME: 9.35

CASING VOLUMES PURGED: 4

PURGE RATE: 1.15 GPM START 1048

DATE PURGED: 9/9/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/9/98 1550

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: X GRAB ___ COMPOSITE

PRESERVATIVES: N/A

OF CONTAINERS: 2

FIELD TECH: K. REEVE, D. WATTS

WEATHER CONDITIONS: Cool / OVERCAST

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(µmhos/cm)~~ m	PH	TEMPERATURE ~~(°F)~~ C	~~TURBIDITY~~ DTW ~~(ntu)~~
1055	9.5	1.48	7.54	20.1	9.25
1105	19.0	1.45	7.07	18.8	12.80
1112	28.5	2.05	6.96	18.5	15.70
1121	38.0	2.39	6.87	18.5	18.55

NOTES: DTW = Depth to water

SAMPLED AT 5.59 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way Oakland, CA

SAMPLING LOCATION: LFMW-3

DEPTH TO WATER: 5.30

WELL BOTTOM DEPTH: 27.25

WELL CASING VOLUME: 3.52 GAL

CASING VOLUMES PURGED: 4+

PURGE RATE: .55 GPM (1105 START)

DATE PURGED: 9/9/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/9/98 1555

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: HCl

OF CONTAINERS: 4

FIELD TECH: D. Watts

WEATHER CONDITIONS: Cool / Overcast

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW (ntu)
1109	3.50	2560	5.08	72.8	7.35
1118	7.00	2770	5.07	71.4	9.54
1124	10.50	2740	5.17	71.6	10.61
1131	14.25	2770	5.24	71.1	13.78

NOTES:

DTW = Depth to Water

Sampled at 5.33 DTW

JOB #: 20-97203.00.308

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way Oakland, CA

SAMPLING LOCATION: LFMW2

DEPTH TO WATER: 3.60

WELL BOTTOM DEPTH: 27.1

WELL CASING VOLUME: 3.75

CASING VOLUMES PURGED: 4

PURGE RATE: .486pm START 1152

DATE PURGED: 9/9/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/9/98 1608

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: X GRAB ___ COMPOSITE

PRESERVATIVES: N/A

OF CONTAINERS:

FIELD TECH: K. Reeve / D. Watts

WEATHER CONDITIONS: Cool / Overcast

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°F) C	~~TURBIDITY~~ DTW (ntu)
1159	3.75	4.80 mska	5.75	22.1	6.1
1207	7.5	4.94	4.91	22.3	6.85
1215	11.25	5.32	4.78	21.8	9.50
1223	15.00	6.19	4.62	21.3	11.51

NOTES: DTW = Depth to water

SAMPLED AT 3.70 DTW

JOB #: 70-97203.00.30

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way Oakland, CA

SAMPLING LOCATION: LF-11

DEPTH TO WATER: 3.05

WELL BOTTOM DEPTH: 19.88

WELL CASING VOLUME: 11 GAL

CASING VOLUMES PURGED: 2 +

PURGE RATE: .71 GPM (1155 START)

DATE PURGED: 9/9/98

PURGE METHOD: D.sp. BAILER

DATE & TIME SAMPLED: 9/9/98 1630

SAMPLING METHOD: D.sp. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: HCl

OF CONTAINERS: 4

FIELD TECH: D. WATTS

WEATHER CONDITIONS: COOL / OVERCAST

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW (ntu)
1208	11.0	5130	5.30	71.2	11.40
1225	22.0	6790	5.34	69.6	15.71
1230	WELL	PURGED DRY	AFTER	25 GAL	

NOTES:

DTW = DEPTH TO WATER

SAMPLED AT 17.08 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way, Oakland, CA

SAMPLING LOCATION: LF-1

DEPTH TO WATER: 2.35

WELL BOTTOM DEPTH: 19.8

WELL CASING VOLUME: 2.80

CASING VOLUMES PURGED: 4

PURGE RATE: .47 GPM (START 1240)

DATE PURGED: 9/9/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/9/98 1650

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: X GRAB ___ COMPOSITE

PRESERVATIVES: N/A

OF CONTAINERS: 9 6 15

FIELD TECH: K. Reese / D. Watts

WEATHER CONDITIONS: Cool / Overcast

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(µmhos/cm)~~	PH	TEMPERATURE ~~(°F)~~ C	TURBIDITY DTW ~~(ntu)~~
1246	3.00	7.80 ms/cm	5.89	21.3	10.32
1252	5.75	8.24	4.87	20.4	11.95
1257	8.75	10.92	4.64	20.3	14.30
1304	11.25	28.20	4.12	19.7	16.65

NOTES: DTW = Depth to Water

Sampled at 3.56 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way
Oakland, CA

SAMPLING LOCATION: LF-12

DEPTH TO WATER: ~~14.66~~ 6.75

WELL BOTTOM DEPTH: 14.66

WELL CASING VOLUME: 5.14 GAL

CASING VOLUMES PURGED: 2+

PURGE RATE: 1.1 GPM (1438 SHEET)

DATE PURGED: 9/9/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/9/98 1705

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: N/A

OF CONTAINERS: 2

FIELD TECH: D. WATTS

WEATHER CONDITIONS: Cool / Overcast

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW (ntu)
1441	6.0	3860	3.75	70.7	70.70
1447	11.0	3450	4.85	70.4	13.51
1449	WELL Purged Dry	AFTER 12	GAL		

NOTES:

DTW = DEPTH TO WATER
SAMPLED AT 6.95 DTW

JOB #: 70-97203.00-3000

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way, Oakland, CA

SAMPLING LOCATION: LF-5

DEPTH TO WATER: 5.76

WELL BOTTOM DEPTH: 20.75

WELL CASING VOLUME: 2.40

CASING VOLUMES PURGED:

PURGE RATE: .45 GPM START 1436

DATE PURGED: 9/9/98

PURGE METHOD: DISP. Bailers

DATE & TIME SAMPLED: 9/9/98 1716

SAMPLING METHOD: DISP. Bailers

SAMPLE TYPE: X GRAB ___ COMPOSITE

PRESERVATIVES: N/A

OF CONTAINERS: 4

FIELD TECH: K. Reem / D. WATTS

WEATHER CONDITIONS: Cool OVERCAST

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°F) C	~~TURBIDITY~~ DTW (ntu)
1442	2.50	17.20	5.45	22.6	9.2
1447	5.0	16.52	6.21	22.1	10.18
1453	7.50	14.94	6.33	22.0	10.36
1458	10.0	1336	6.22	22.6	10.65

NOTES: DTW = DEPTH TO WATER

SAMPLED AT 5.95 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY, OAKLAND, CA

SAMPLING LOCATION: LF-10

DEPTH TO WATER: 6.30

WELL BOTTOM DEPTH: 14.70

WELL CASING VOLUME: 5.50 GAL

CASING VOLUMES PURGED: 1

PURGE RATE: 1.29 GPM (1503 START)

DATE PURGED: 9/9/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/9/98 1729

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: ✓GRAB ___COMPOSITE

PRESERVATIVES: HCl

OF CONTAINERS: 8 6 2

FIELD TECH: D. WATTS

WEATHER CONDITIONS: COOL / WIND: WEST

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW ~~(ntu)~~
1506	6.0	4290	7.79	70.0	11.22
1510	WELL PUMPED DRY AFTER 9 GAL				

NOTES:

DTW = DEPTH TO WATER

SAMPLED AT 12.23 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way
OAKLAND, CA

SAMPLING LOCATION: LF-12(-H)
DEPTH TO WATER: 7.02
WELL BOTTOM DEPTH: N/A
WELL CASING VOLUME: N/A
CASING VOLUMES PURGED: N/A
PURGE RATE: N/A

DATE PURGED: N/A
PURGE METHOD: N/A
DATE & TIME SAMPLED: 10/8/98 1508
SAMPLING METHOD: Disp. BAILER
SAMPLE TYPE: ✓ GRAB ___ COMPOSITE
PRESERVATIVES: NP
OF CONTAINERS: 3
FIELD TECH: D. WATTS
WEATHER CONDITIONS: CLEAR/WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(umhos/cm)~~ mS/cm	PH	TEMPERATURE ~~(°F)~~ °C	~~TURBIDITY~~ DTW ~~(ntu)~~
1508	N/A	7.45	3.39	23.4	7.02

NOTES: DTW = DEPTH TO WATER
HIGH TIDE

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way
Oakland, CA

SAMPLING LOCATION: CW-13(-H)
DEPTH TO WATER: 6.03
WELL BOTTOM DEPTH: N/A
WELL CASING VOLUME: N/A
CASING VOLUMES PURGED: N/A
PURGE RATE: N/A

DATE PURGED: N/A
PURGE METHOD: N/A
DATE & TIME SAMPLED: 10/9/98 1524
SAMPLING METHOD: Disp. Bailer
SAMPLE TYPE: ✓ GRAB ___ COMPOSITE
PRESERVATIVES: NP
OF CONTAINERS: 3
FIELD TECH: D. Watts
WEATHER CONDITIONS: Clear / Warm

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(µmhos/cm)~~ mS/cm	PH	TEMPERATURE ~~(°F)~~ °C	~~TURBIDITY~~ DTW ~~(ntu)~~
1524	N/A	6.92	5.07	25.0	6.03

NOTES: DTW = Depth to Water
High Tide

JOB #: 70-97203.06, 300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY OAKLAND, CA

SAMPLING LOCATION: CW-12(-H)

DEPTH TO WATER: 6.48

WELL BOTTOM DEPTH: N/A

WELL CASING VOLUME: N/A

CASING VOLUMES PURGED: N/A

PURGE RATE: N/A

DATE PURGED: N/A

PURGE METHOD: N/A

DATE & TIME SAMPLED: 10/8/98 1545

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 3

FIELD TECH: D. WATTS

WEATHER CONDITIONS: CLEAR/WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (~~µmhos/cm~~) EW	PH	TEMPERATURE ~~(°F)~~ EW °C	~~TURBIDITY~~ DTW ~~(ntu)~~ EW
1545	N/A	13.66 (ms/cm)	6.10	25.0	6.48

NOTES: DTW = DEPTH TO WATER

HIGH TIDE

SAMPLING DATA SHEET

JOB #: 76-97203.00.300

JOB LOCATION: COLISEUM WAY. OAKLAND, CA

SAMPLING LOCATION: CW-10(-H)

DEPTH TO WATER: 5.36

WELL BOTTOM DEPTH: N/A

WELL CASING VOLUME: N/A

CASING VOLUMES PURGED: N/A

PURGE RATE: N/A

DATE PURGED: N/A

PURGE METHOD: N/A

DATE & TIME SAMPLED: 10/2/98 1557

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 3

FIELD TECH: D. WATTS

WEATHER CONDITIONS: CLOUDY / WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(µmhos/cm)~~ mS/cm	PH	TEMPERATURE ~~(°F)~~ °C	~~TURBIDITY~~ DTW ~~(ntu)~~
1557	N/A	25.5	6.79	25.0	5.36

NOTES:

DTW = DEPTH TO WATER

HIGH TIDE

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY OAKLAND, CA

SAMPLING LOCATION: TW (-L)

DEPTH TO WATER: N/A

WELL BOTTOM DEPTH: N/A

WELL CASING VOLUME: N/A

CASING VOLUMES PURGED: N/A

PURGE RATE: N/A

DATE PURGED: N/A

PURGE METHOD: N/A

DATE & TIME SAMPLED: 10/8/98 2001

SAMPLING METHOD: GRAB

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 3

FIELD TECH: D. WATTS

WEATHER CONDITIONS: CLEAR / COOL

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(µmhos/cm)~~ mS/cm	PH	TEMPERATURE ~~(°F)~~ °C	TURBIDITY (ntu)
2001	N/A	11.37	7.75	18.3	N/A

NOTES: LOW TIDE

JOB #: 70-9725.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way Oakland, CA

SAMPLING LOCATION: ZW (-2)

DEPTH TO WATER: N/A

WELL BOTTOM DEPTH: N/A

WELL CASING VOLUME: N/A

CASING VOLUMES PURGED: N/A

PURGE RATE: N/A

DATE PURGED: N/A

PURGE METHOD: N/A

DATE & TIME SAMPLED: 10/9/98 2005

SAMPLING METHOD: GRAB

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 3

FIELD TECH: D. WATTS

WEATHER CONDITIONS: CLEAR/COOL

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(umhos/cm)~~	PH	TEMPERATURE ~~(°F)~~ °C	TURBIDITY (ntu)
2005	N/A	26.4 (mS/cm)	7.49	17.9	N/A

NOTES: LOW TIDE

JOB #: 71-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way Oakland, CA

SAMPLING LOCATION: LF-12 (-L)

DEPTH TO WATER: 7.09

WELL BOTTOM DEPTH: N/A

WELL CASING VOLUME: N/A

CASING VOLUMES PURGED: N/A

PURGE RATE: NA

DATE PURGED: N/A

PURGE METHOD: N/A

DATE & TIME SAMPLED: 10/8/98 2125

SAMPLING METHOD: D.SP. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 3

FIELD TECH: D. WATTS

WEATHER CONDITIONS: CLEAR/COOL

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(µmhos/cm)~~ dlw	PH	TEMPERATURE dlw ~~(°F)~~ °C	~~TURBIDITY~~ DTW ~~(ntu)~~ dlw
2125	N/A	7.00 (mS/cm)	3.94	20.7	7.09

NOTES: DTW = DEPTH TO WATER

LOW TIDE

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY, OAKLAND, CA

SAMPLING LOCATION: CW-13 (-L)

DEPTH TO WATER: 6.09

WELL BOTTOM DEPTH: N/A

WELL CASING VOLUME: N/A

CASING VOLUMES PURGED: N/A

PURGE RATE: N/A

DATE PURGED: N/A

PURGE METHOD: N/A

DATE & TIME SAMPLED: 10/8/98 2150

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 3

FIELD TECH: D. WATTS

WEATHER CONDITIONS: CLEAR / COOL

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(µmhos/cm)~~ mS/cm	PH	TEMPERATURE ~~(°F)~~ °C	TURBIDITY DTW ~~(ntu)~~
2150	N/A	6.83	6.15	18.2	6.09

NOTES: DTW = DEPTH TO WATER

LOW TIDE

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way Oakland, CA

SAMPLING LOCATION: CW-12 (-L)

DEPTH TO WATER: 6.52

WELL BOTTOM DEPTH: N/A

WELL CASING VOLUME: N/A

CASING VOLUMES PURGED: N/A

PURGE RATE: N/A

DATE PURGED: N/A

PURGE METHOD: N/A

DATE & TIME SAMPLED: 10/8/98 2211

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 3

FIELD TECH: D. WATTS

WEATHER CONDITIONS: Clear / Cool

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(mmhos/cm)~~	PH	TEMPERATURE ~~(°F)~~ °C	~~TURBIDITY~~ DTW ~~(NTU)~~
2219	N/A	12.09 (m3/cm)	6.75	18.9	6.52

NOTES: DTW = Depth to Water

Low Tide

JOB #: 70-97203.00, 300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY OAKLAND, CA

SAMPLING LOCATION: CW-10(-L)

DEPTH TO WATER: 7.18

WELL BOTTOM DEPTH: N/A

WELL CASING VOLUME: N/A

CASING VOLUMES PURGED: N/A

PURGE RATE: N/A

DATE PURGED: N/A

PURGE METHOD: N/A

DATE & TIME SAMPLED: 10/9/98 2219

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 3

FIELD TECH: D. WATTS

WEATHER CONDITIONS: CLEAR/COOL

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(µmhos/cm)~~ mS/cm	PH	TEMPERATURE ~~°F~~ °C	~~TURBIDITY~~ DTW ~~(ntu)~~
2219	N/A	22.1	7.10	19.1	7.18

NOTES: DTW = DEPTH TO WATER

LOW TIDE

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: COLUSA WAY OAKLAND, CA

SAMPLING LOCATION: CW-6 (-H)

DEPTH TO WATER: 9.06

WELL BOTTOM DEPTH: N/A

WELL CASING VOLUME: N/A

CASING VOLUMES PURGED: N/A

PURGE RATE: N/A

DATE PURGED: N/A

PURGE METHOD: N/A

DATE & TIME SAMPLED: 10/9/98 1513

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 3

FIELD TECH: J. RAJAN

WEATHER CONDITIONS: CLEAR/WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(umhos/cm)~~ mS/cm	PH	TEMPERATURE ~~(F)~~ °C	~~TURBIDITY~~ DTW ~~(ntu)~~
1513	N/A	5.30	6.67	22.2	9.06

NOTES:
DTW = DEPTH TO WATER
HIGH TIDE

SAMPLING DATA SHEET

JOB #: 70-97203.00.300

JOB LOCATION: COLISEUM WAY
OAKLAND, CA

SAMPLING LOCATION: CW-7 (-H)
DEPTH TO WATER: 7.71
WELL BOTTOM DEPTH: N/A
WELL CASING VOLUME: N/A
CASING VOLUMES PURGED: N/A
PURGE RATE: N/A

DATE PURGED: N/A
PURGE METHOD: N/A
DATE & TIME SAMPLED: 10/8/98 15:23
SAMPLING METHOD: Disposable Bailer
SAMPLE TYPE: X GRAB ___ COMPOSITE
PRESERVATIVES: NP
OF CONTAINERS: 3
FIELD TECH: J. RAJAN
WEATHER CONDITIONS: CLEAR/WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°f)	~~TURBIDITY~~ DTW ~~(ntu)~~
15:23	N/A	2.21	9.44	25.0	7.71

NOTES: DTW = DEPTH TO WATER
HIGH TIDE

JOB #: 70-47203.00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way, Oakland, CA

SAMPLING LOCATION: CW-6 (-L)

DEPTH TO WATER: 9.07

WELL BOTTOM DEPTH: N/A

WELL CASING VOLUME: N/A

CASING VOLUMES PURGED: N/A

PURGE RATE: N/A

DATE PURGED: N/A

PURGE METHOD: N/A

DATE & TIME SAMPLED: 10/8/98

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 3

FIELD TECH: J. RAJAN

WEATHER CONDITIONS: Clear / Cool

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(µmhos/cm)~~ (mS/cm)	PH	TEMPERATURE ~~(°F)~~ °C	~~TURBIDITY~~ DTW ~~(ntu)~~
21:01	N/A	4.33	6.16	19.8	9.07

NOTES:
DTW = DEPTH TO WATER
LOW TIDE

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY
OAKLAND, CA

SAMPLING LOCATION: CW-7 (-L)

DEPTH TO WATER: 7.71

WELL BOTTOM DEPTH: N/A

WELL CASING VOLUME: N/A

CASING VOLUMES PURGED: N/A

PURGE RATE: N/A

DATE PURGED: N/A

PURGE METHOD: N/A

DATE & TIME SAMPLED: 10/8/98

SAMPLING METHOD: Disp. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 3

FIELD TECH: J. RAJAN

WEATHER CONDITIONS: CLEAR / COOL

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(µmhos/cm)~~ mS/cm	PH	TEMPERATURE ~~°F~~ °C	~~TURBIDITY~~ DTW ~~(ntu)~~
21:16	N/A	1.19	10.31	19.7	7.71

NOTES: DTW = DEPTH TO WATER
LOW TIDE

JOB #: 71-97203, 00.300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY, OAKLAND, CA

SAMPLING LOCATION: 3W (-L)

DEPTH TO WATER: N/A

WELL BOTTOM DEPTH: N/A

WELL CASING VOLUME: N/A

CASING VOLUMES PURGED: N/A

PURGE RATE: N/A

DATE PURGED: N/A

PURGE METHOD: N/A

DATE & TIME SAMPLED: 10/8/98

SAMPLING METHOD: GRAB

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 3

FIELD TECH: J. INJAN

WEATHER CONDITIONS: CLEAR / COOL

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(µmhos/cm)~~ mS/cm	PH	TEMPERATURE ~~(°F)~~ °C	TURBIDITY (ntu)
19:50	N/A	23.6	8.39	18.2	N/A

NOTES: LOW TIDE

JOB #: 70-97203.00,300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY OAKLAND, CA

SAMPLING LOCATION: 4W (-L)

DEPTH TO WATER: N/A

WELL BOTTOM DEPTH: N/A

WELL CASING VOLUME: N/A

CASING VOLUMES PURGED: N/A

PURGE RATE: N/A

DATE PURGED: N/A

PURGE METHOD: N/A

DATE & TIME SAMPLED: 10/8/98

SAMPLING METHOD: GRAB

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 3

FIELD TECH: J. RUJAN

WEATHER CONDITIONS: CLEAR / COOL

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(µmhos/cm)~~ mS/cm	PH	TEMPERATURE ~~(°F)~~ °C	TURBIDITY (ntu)
20:01	N/A	24.1	7.97	16.9	N/A

NOTES:

LOW TIDE

JOB #: 70 - 97203 00.300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way, Oakland, CA

SAMPLING LOCATION: CW-6

DEPTH TO WATER: 9.03

WELL BOTTOM DEPTH: 15.50

WELL CASING VOLUME: 1.1 GAL

CASING VOLUMES PURGED: 4 +

PURGE RATE: .28 GPM (1225 START)

DATE PURGED: 9/29/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/29/98 1300

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓GRAB ___COMPOSITE

PRESERVATIVES: HCl

OF CONTAINERS: 7

FIELD TECH: D. Watts / S. Whiton

WEATHER CONDITIONS: Cool / Overcast

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(umhos/cm)~~ (ms/cm)	PH	TEMPERATURE ~~(oF)~~ °C	~~TURBIDITY~~ DTW ~~(ntu)~~
1228	1.00	5.18	6.74	22.8	9.07
1231	2.00	5.24	6.79	22.9	9.07
1235	3.00	5.24	6.70	23.2	9.09
1241	4.50	5.20	6.71	23.0	9.10

NOTES: DTW = Depth to Water

SAMPLING DATA SHEET

JOB #: 70-97203.00.300

JOB LOCATION: Coliseum Way, Oakland, CA

SAMPLING LOCATION: CW-7

DEPTH TO WATER: 7.87

WELL BOTTOM DEPTH: 17.75

WELL CASING VOLUME: 1.58

CASING VOLUMES PURGED: 4+

PURGE RATE: .38 GPM (1325 Start)

DATE PURGED: 9/29/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/29/98 1405

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: HCl

OF CONTAINERS:

FIELD TECH: D. Watts / S. Whiton

WEATHER CONDITIONS: Cool / Overcast

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY ~~(µmhos/cm)~~ (ms/cm) SW	PH	TEMPERATURE ~~°F~~ °C SW	~~TURBIDITY~~ DTW ~~(ntu)~~ SW
1327	1.5	1.036	10.41	21.8	8.60
1333	3.0	1.221	10.26	21.6	9.22
1338	4.5	1.105	10.17	21.8	9.92
1342	6.5	1.354	9.79	21.4	11.55

NOTES:

DTW = Depth To Water

SAMPLED AT 8.00 DTW

JOB #: 70-97203.00, 300

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way, Oakland, CA

SAMPLING LOCATION: CW-10

DEPTH TO WATER: 7.53

WELL BOTTOM DEPTH: 15.21

WELL CASING VOLUME: 1.23

CASING VOLUMES PURGED: 4+

PURGE RATE: 0.29 gpm (1510 START)

DATE PURGED: 9/29/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/29/98 1536

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 4

FIELD TECH: D. Watts / S. Whiton

WEATHER CONDITIONS: Cool / Overcast

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°F) °C	~~TURBIDITY~~ DTW ~~(ntu)~~
1513	1.25	21.4	7.48	20.8	8.46
1518	2.50	24.5	7.29	21.0	9.85
1522	3.75	24.2	7.42	19.5	10.44
1527	5.00	24.9	7.25	20.9	11.11

NOTES: DTW = DEPTH TO WATER

Sampled at 9.06 DTW

JOB #: 70-97203.00.30

SAMPLING DATA SHEET

JOB LOCATION: Coliseum Way Oakland, CA

SAMPLING LOCATION: CW-12

DEPTH TO WATER: 6.98

WELL BOTTOM DEPTH: 15.08

WELL CASING VOLUME: 1.30

CASING VOLUMES PURGED: 4+ (~~1555 START~~ SW)

PURGE RATE: 0.48 GPM (1555 START)

DATE PURGED: 9/29/98

PURGE METHOD: Disp. Bailer

DATE & TIME SAMPLED: 9/29/98 1619

SAMPLING METHOD: Disp. Bailer

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: NP

OF CONTAINERS: 2

FIELD TECH: D. Watts / S. Whiton

WEATHER CONDITIONS: Cool / Overcast

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (~~µmhos/cm~~ mS/cm) SW	PH	TEMPERATURE (~~°F~~ °C) SW	~~TURBIDITY~~ DTW (~~NTU~~)
1557	1.50	17.09	7.87	20.7	7.70
1601	3.00	19.75	7.82	20.7	8.00
1604	4.25	20.60	7.97	20.5	8.48
1606	5.25	19.81	7.95	20.8	8.44

NOTES:

DTW = Depth to water

Sampled at 6.90 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY OAKLAND, CA

SAMPLING LOCATION: LF-15

DEPTH TO WATER: 5.55

WELL BOTTOM DEPTH: 20.21

WELL CASING VOLUME: 2.35 GAL

CASING VOLUMES PURGED: 4 +

PURGE RATE: (1726 START)

DATE PURGED: 9/11/98

PURGE METHOD: PERISTALTIC Pump

DATE & TIME SAMPLED: 9/11/98 1825

SAMPLING METHOD: PERISTALTIC Pump

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: HCl

OF CONTAINERS: 4

FIELD TECH: D. WATTS

WEATHER CONDITIONS: CLEAR / WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°F)	~~TURBIDITY~~ DTW ~~(ntu)~~
1741	2.50	3140	5.91	75.0	11.30
1756	5.00	3050	5.50	71.9	13.20
1911	7.50	3120	5.45	71.0	14.51
1824	9.50	3200	5.57	69.9	16.15

NOTES:

DTW = DEPTH TO WATER

SAMPLED AT 16.15 DTW

JOB #: 70-97203.00.300

SAMPLING DATA SHEET

JOB LOCATION: COLISEUM WAY OAKLAND, CA

SAMPLING LOCATION: MW-1

DEPTH TO WATER: 9.74

WELL BOTTOM DEPTH: 17.83

WELL CASING VOLUME: 5.26 GAL

CASING VOLUMES PURGED: 2 +

PURGE RATE: .93 GPM / 1355 START

DATE PURGED: 9/11/98

PURGE METHOD: DISP. BAILER

DATE & TIME SAMPLED: 9/11/98 1618

SAMPLING METHOD: DISP. BAILER

SAMPLE TYPE: ✓ GRAB ___ COMPOSITE

PRESERVATIVES: HCl

OF CONTAINERS: 6

FIELD TECH: P. WATTS

WEATHER CONDITIONS: CLEAR / WARM

TIME (24 hr)	VOLUME REMOVED (gal)	ELECTRICAL CONDUCTIVITY (µmhos/cm)	PH	TEMPERATURE (°F)	~~TURBIDITY~~ DTW (ntu)
1359	6.0	2000	6.18	83.5	13.44
1405	11.0	1650	6.21	85.0	16.61
WELL PURGED DRY AFTER 13 GAL					

NOTES: DTW = DEPTH TO WATER

SAMPLED AT 13.80 DTW

MONITORING WELL DATA SHEET

DATE: 9/30/98

CLIENT: COLISEUM PROPERTIES

FACILITY: COLISEUM WAY
OAKLAND, CA

SR

PROJECT #: 20-97203.00.300, 201

MILEAGE: N/A

FIELD TECH: D. WATTS/J. RAJAN

PAGE: 1 OF: 7

WELL #	LFMW-4	LFMW-1	LF-17	LFMW-3	LFMW-2	LF-F1
TIME OPENED (24 hr)	1153	1145	~~2[illegible]~~	1232	1233	1234
TIME (24 hr)	1520	1523	1528	15:32	16:44	15:42
WATER DEPTH (ft)	6.10	5.45	6.00	5.40	3.45	2.83
WELL DEPTH (ft)						
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS:

MONITORING WELL DATA SHEET

DATE: 9/25/98 | PROJECT #: 70-97253.00.302

CLIENT: Coliseum Way | MILEAGE:

FACILITY: Oakland | FIELD TECH: Watts / Rajan

PAGE: 2 OF: 7

JR →

WELL #	LF-11	LF-1	LF-15	LF-16	LF-12	LF-5
TIME OPENED (24 hr)	1234	1245	1251	1253	1257	14:33
TIME (24 hr)	15:38	1547	15:53	~~16:02~~ 14:52	1448	B 14:45
WATER DEPTH (ft)	3.16	2.49	5.99	~~8.32~~	7.18	6.10 * DW
WELL DEPTH (ft)						
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS: * DW SOUNDER

JR SOUNDER = 6.12

(JOE RAJAN'S SOUNDER READS .02' DEEPER THAN DAVID WATTS SOUNDER)

MONITORING WELL DATA SHEET

DATE: 9/30/98

PROJECT #: 70-97203.10.300

CLIENT: Millennium

MILEAGE:

FACILITY: Coliseum WAY

FIELD TECH: D WATTS / J. RAJAN

PAGE: 3 OF: 7

JR

WELL #	LF-10	LF-2	LF-4	LF-8	LF-3	LF-14
TIME OPENED (24 hr)	13 03	1304	1305	1307	1308	13 10
TIME (24 hr)	14.52	~~1455~~ 1455	16.16	16.19	16.23	16:12
WATER DEPTH (ft)	6.52	5.00	5.40	5.02	5.25	6.50
WELL DEPTH (ft)						
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS:

MONITORING WELL DATA SHEET

DATE: 9-30-98

PROJECT #: 70-97203.00.300

CLIENT: MILLENNIUM

MILEAGE:

FACILITY: COLISEUM WAY

FIELD TECH: D. WATTS / T. RAJAN

PAGE: 4 OF: 7

JR → | DW →

WELL #	LF-13	LF-7	LF-6	CW-10	CW-12	MWA-1
TIME OPENED (24 hr)	13.12	13.14	13.15	1321	13:22	1325
TIME (24 hr)	1627	1637	1643	1511	1514	1533
WATER DEPTH (ft)	3.75	4.69	6.04	7.18	6.79	10.09
WELL DEPTH (ft)						
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS:

MONITORING WELL DATA SHEET

DATE: 9-30-98

PROJECT #: 70-97203.00.300

CLIENT: MILLENNIUM

MILEAGE:

FACILITY: COLISEUM WAY

FIELD TECH: D WATTS / J. RAJAN

PAGE: 5 OF: 7

DW →

WELL #	MWA-2	MWA-3	MW#-4	MW-5	MW#-6	MW#-7
TIME OPENED (24 hr)	1327	1329	1329	1331	1337	1339
TIME (24 hr)	1526	1530	1536	1540	1545	1548
WATER DEPTH (ft)	6.78	8.93	12.00	8.79	6.19	17.96
WELL DEPTH (ft)						
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS:

MONITORING WELL DATA SHEET

DATE: 9-30-98

PROJECT #: 70-97203.00.300

CLIENT: MILLENNIUM

MILEAGE:

FACILITY: COLISEUM WAY

FIELD TECH: D. WATTS / J. RAJAN

PAGE: 6 OF: 7

NW →

WELL #	MW 8	CW9	CW8	CW7	CW6	CW1
TIME OPENED (24 hr)	1344	1346	1347	1351	1352	1358
TIME (24 hr) W	~~1552~~ (1552)	1555	1600	1604	1609	1614
WATER DEPTH (ft)	7.55	11.42	5.41	7.61	8.99	9.01
WELL DEPTH (ft)						
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS:

MONITORING WELL DATA SHEET

DATE: 9-30-98

PROJECT #: 20-97253.00, 2000

CLIENT: MILLENNIUM

MILEAGE:

FACILITY: COLISEUM

FIELD TECH: D WATTS / J RAJAN

PAGE: 1 OF: 1

DW →

WELL #	CW-2	CW-3	CW-4	CW-5	CW-13	
TIME OPENED (24 hr)	13:59	14:00	14:03	14:04	1518	
TIME (24 hr)	1618	1620	1623	1626	1528	
WATER DEPTH (ft)	9.24	8.57	7.90	7.89	6.27	
WELL DEPTH (ft)						
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS:

MONITORING WELL DATA SHEET

DATE: 10/8/98

CLIENT: Coliseum Properties

FACILITY: Coliseum Way
Oakland, CA

PROJECT #: 20-97203.00.300

MILEAGE: N/A

FIELD TECH: D. Watts / J. Rajan

PAGE: 1 OF: 4

WELL #	LF-12	CW-13	CW-12	CW-10	SND4-3	SND4-4
TIME OPENED (24 hr)	1220	1223	1226	1227	N/A	N/A
TIME (24 hr)	1355	1357	1358	1359	1401	1405
WATER DEPTH (ft)	7.02	6.09	6.62	6.61	3.99	7.22
WELL DEPTH (ft)					~~+/-~~ ±22.62	
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS: WEST

MONITORING WELL DATA SHEET

DATE: 10/8/98

CLIENT: COLISEUM PROPERTIES

FACILITY: COLISEUM WAY
OAKLAND, CA

PROJECT #: 20-97203.00.300

MILEAGE: N/A

FIELD TECH: D. WATTS/S. RAJAN

PAGE: 2 OF: 4

WELL #	LF-12	CW-13	CW-12	CW-10	SND6-3	SND6-4
TIME OPENED (24 hr)	N/A	N/A	N/A	N/A	N/A	N/A
TIME (24 hr)	1449	1451	1452	1454	1456	1459
WATER DEPTH (ft)	7.01	6.03	6.56	6.64	3.75	7.03
WELL DEPTH (ft)					+12.89	
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS:

MONITORING WELL DATA SHEET

DATE: 10/8/98

CLIENT: COLISEUM PROPERTIES

FACILITY: COLISEUM WAY
OAKLAND, CA

PROJECT #: 70-9720 3.00.300

MILEAGE: N/A

FIELD TECH: D. WATTS / J. RAJAN

PAGE: 3 OF 4

WELL #	LF-12	CW-13	CW-12	CW-10	SNDG-3	SNDG-4
TIME OPENED (24 hr)	N/A	N/A	N/A	N/A	N/A	N/A
TIME (24 hr)	2012	2015	2018	2020	2022	2027
WATER DEPTH (ft)	7.09	6.09	6.47	6.86	9.38	12.66
WELL DEPTH (ft)			-29'		[illegible]	
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS:

MONITORING WELL DATA SHEET

DATE: 10/8/98
PROJECT #: 70-97203.00.300
CLIENT: COLISEUM PROPERTIES
MILEAGE: N/A
FACILITY: COLISEUM WAY
OAKLAND, CA
FIELD TECH: D. WATTS / J. RAJAN
PAGE: 4 OF 4

WELL #	LF-12	CW-13	CW-12	CW-10	SNDG-3	SNDG-4
TIME OPENED (24 hr)	N/A	N/A	N/A	N/A	N/A	N/A
TIME (24 hr)	2103	2105	2107	2108	2110	2115
WATER DEPTH (ft)	7.09	6.09	6.49	7.01	9.15	12.65
WELL DEPTH (ft)					--	
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS:

MONITORING WELL DATA SHEET

DATE: 10/8/98

CLIENT: Coliseum Properties

FACILITY: Coliseum Way
Oakland, CA

PROJECT #: 70-97203.00.300

MILEAGE: N/A

FIELD TECH: D. Watts / J. Rajan

PAGE: 1 OF: 4

WELL #	CW-6	CW-7	SNDG-1	SNDG-2	CW-6	CW-7
TIME OPENED (24 hr)	1245	1240	N/A	N/A	N/A	N/A
TIME (24 hr)	1407	1410	1413	1416	1430	1433
WATER DEPTH (ft)	9.07 *	2.73 *	5.12 *	0.88 *	9.06	7.71
WELL DEPTH (ft)					--	
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS: EAST

MONITORING WELL DATA SHEET

DATE: 10/8/98

CLIENT: COLISEUM PROPERTIES

FACILITY: COLISEUM WAY
OAKLAND, CA

PROJECT #: 70-97203.00.300

MILEAGE: N/A

FIELD TECH: D. WATTS / T. RAJAN

PAGE: 2 OF: 4

WELL #	SNDG-1	SNDG-2				
TIME OPENED (24 hr)	N/A	N/A				
TIME (24 hr)	1435	1438				
WATER DEPTH (ft)	4.88	0.72				
WELL DEPTH (ft)					--	
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS:

MONITORING WELL DATA SHEET

DATE: 10/8/98

CLIENT: COLISEUM PROPERTIES

FACILITY: COLISEUM WAY
OAKLAND, CA

PROJECT #: 70-97203.00.30C

MILEAGE: N/A

FIELD TECH: D. WATTS / J. RAJAN

PAGE: 3 OF: 4

WELL #	CW-6	CW-7	SNDG-1	SNDG-2	CW-6	CW-7
TIME OPENED (24 hr)	1245	1240	N/A	N/A	1245	1240
TIME (24 hr)	2012	2015	2017	2025	21.00	21:15
WATER DEPTH (ft)	9.07	7.71	8.15	5.15	9.07	7.71
WELL DEPTH (ft)					--	
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS:

MONITORING WELL DATA SHEET

DATE: 10/8/98

CLIENT: COLISEUM PROPERTIES

FACILITY: COLISEUM WAY
OAKLAND, CA

PROJECT #: 70-97203.00.300

MILEAGE: N/A

FIELD TECH: D. WATTS / J. RAJAN

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WELL #	SNDG-1	SNDG-2				
TIME OPENED (24 hr)	21:22	21:25				
TIME (24 hr)	8.15	5.15				
WATER DEPTH (ft)						
WELL DEPTH (ft)					--	
WELL DIAMETER (in)						
WELL VOLUME (gal)						
SHEEN OR FILM						
PRODUCT THICKNESS (ft)						
FIELD SAMPLE COLOR						
PURGE						
DEVELOP						
SAMPLE						
METHOD						
PURGED WATER VOL. (gal)						
PURGED COLOR						
PURGED PROD. VOL. (gal)						
PURGE SEQUENCE						
PROD DETECT METHOD						

COMMENTS: