

February 19, 2009  
Project No. 207613001

Mr. Darrell Maxey, Director  
Engineering and Construction  
Southern California Regional Rail Authority  
700 South Flower Street, 26<sup>th</sup> Floor  
Los Angeles, California 90017

Subject: Evaluation of Drain Outlet Flow  
Southern California Regional Rail Authority, Metrolink Tunnel 26  
South of Santa Susana Pass Road  
Chatsworth and Simi Valley Areas, California

Dear Mr. Maxey:

In accordance with your request and authorization, Ninyo & Moore has conducted an evaluation of the water flow from the drain outlet at the western and eastern portals of the subject tunnel, located in the Chatsworth and Simi Valley areas of California (site; Figure 1). This evaluation was conducted in response to a letter written to the Southern California Regional Rail Authority (SCRRA) by the California Regional Water Quality Control Board, Los Angeles Region (RWQCB), dated November 19, 2008. The RWQCB letter presented their requirement that information regarding the flow from the drain outlets be submitted to them, in an attempt to evaluate whether the flow represents waste discharge, subject to Section 13260 of the California Water Code (CWC). The purpose of our study was to evaluate the soil, geologic, and groundwater conditions at the site and outlet flow points to comply with the RWQCB letter. This letter describes the site soil, geologic, hydrogeologic, and groundwater conditions, results of the water sampling conducted at the site, flow path, and estimated drainage flow rates from the outlets.

Tunnel 26 trends approximately east-west on the SCRRA Ventura County line between the Chatsworth and Simi Valley Stations in Ventura and Los Angeles Counties (Figure 1). The rail line roughly parallels California Highway 118 under the Santa Susana Pass. The tunnel is 7,369-

feet-long, the crest is located near the middle of the tunnel, and the grade descends 1.0 percent to the east and 0.1 percent to the west from the crest (Mansour, McGinley, and Millar, 2004).

Tunnel 26 contains approximately 75 sumps used for groundwater collection. According to SCRRA records, the sumps are piped to several pumping stations which direct the collected water out of both ends (west and east portals) of the tunnel. The water then flows into separate natural dry drainage channels. According to SCRRA personnel, groundwater seepage would collect and flow under gravity from the ballast at both ends of the tunnel before the drainage system was installed or if the drainage system was not in operation.

Historical observations indicate that the grades or slopes in the tunnels allow water seeping into the tunnel to drain by gravity east and west on the surface of the tunnel invert toward both tunnel portals and then into drainage swales or channels located outside of the tunnel. Tunnel 26 also contains approximately 75 small very shallow local sumps connected into a 4 inch plastic pipe mounted along the side of the tunnel lining. The water pumped into the plastic pipe drains by gravity to the tunnel portals and discharges into the channels located at both tunnel portals. The sump pumps and plastic pipe header system supplement the gravity drainage system and keep water from ponding in the track structure inside of the tunnel.

## **SITE DESCRIPTION**

The tunnel was constructed in 1904, with timber sets, and was lined with concrete in 1922. A major track structure renewal project was executed in 1972 including renewal of the track structure, limited excavation of subgrade rock, and installation of plastic sheeting. The tunnel had water seeping into it and the water drained by gravity along the tunnel invert to both portals. In 1980 and 1998, sump pumps were installed to improve drainage (Mansour, McGinley, and Millar, 2004) and keep the water from ponding in the rails, ties and ballast and causing the track to settle. The track structure was replaced in 2000, and drainage improved by installing and/or refurbishing 75 sump pumps, placed at approximate 100-foot intervals, in shallow 4-foot deep sump holes. Total seepage removed by the pumps measured in 2000 and 2003 was approximately

7 gallons per minute (gpm) (Mansour, McGinley, and Millar, 2004). The improved drainage greatly reduced the ponding and amount of track settlement.

The sumps collect groundwater from several locations along the tunnel. Before drainage improvement, the groundwater seepage caused distress to the rail line ballast and subgrade; thus, its removal was necessary to maintain the stability of the track. The water is pumped into a drainage pipeline which flows to the west and east portals of the tunnel. Outlets for the drainage pipeline direct the flow of water to dry, natural swales.

### **GEOLOGIC SETTING**

According to the United States Geological Survey (USGS) Topographic Map, Santa Susana Quadrangle, California dated 1951 and photorevised in 1969, the location of the outlet for the western portal site is relatively flat and slopes gently to the west. The western outlet site has an approximate elevation of 1,135 feet above mean sea level (msl). According to the USGS Topographic Map, Oat Mountain Quadrangle, California dated 1976, the location of the outlet for the eastern portal is moderately sloped to the southeast. The eastern outlet site has an approximate elevation of 1,090 feet above msl.

The Santa Susana Tunnel is located approximately three quarters of a mile north of Chatsworth Peak in a topographic saddle in the Santa Susana Pass marking the border between the Santa Susana Mountains to the north and the Simi Hills to the south (Department of Conservation, 1997a; Department of Conservation, 1997b). To the west lies Simi Valley. To the east lies San Fernando Valley.

The western portal of Tunnel 26 lies within the eastern portion of Ventura County. The eastern portion of Tunnel 26 lies within the western portion of the Los Angeles County. Tunnel 26 straddles the Santa Susana Mountains which are part of the structural high within the Transverse Ranges of southern California. The Santa Susana Mountains to the north are composed of plutonic and metamorphic rocks that are being thrust over the valley from the north.

The Santa Susana Mountains and Simi Hills make up a portion of the Transverse Ranges of southern California. The Simi Valley and San Fernando Valleys are east-west trending structural troughs within the Transverse Ranges of southern California (Figure 2). As the ranges have been elevated and deformed, the valleys have subsided and filled with sediment. Sediments within the valley generally consist of gravel, sand, silt, and clay and were deposited by alluvial and fluvial processes.

Local fault movement on the Simi Fault zone, north of the site, is vertically oriented. Regional inclination generally dips to the west and northwest at angles ranging from 7 to 50 degrees below horizontal. Other structural features include the Rocky Peak Anticline and an unnamed syncline, both plunging to the west, north of the site (Dibblee Geologic Foundation Map #DF-36, 1992; Dibblee Geologic Foundation Map #DF-38, 1992; Ninyo & Moore, 2007).

The site geology is composed of late Cretaceous, marine clastic rock (Figures 3 and 4). The tunnel was bored through bedrock, which is named the Chatsworth Formation. Two members of the Chatsworth Formation have been mapped: the first is a gray micaceous shale and siltstone and includes some sandstone strata (map symbol Kcsh); the second is a light gray to brown, hard, thick bedded, locally gritty sandstone which includes few thin layers of micaceous siltstone (map symbol Kcs). Sediments within the valleys generally consist of gravel, sand, silt, and clay and were deposited by alluvial and fluvial processes and are classified as Quaternary alluvium (map symbol Qa).

## **HYDROGEOLOGIC SETTING**

Two natural springs, Hummingbird Ranch Spring and Hialeah Spring are present approximately 1½ miles and 1 mile, respectively, to the north of the site. Hummingbird Ranch Spring is at an elevation of approximately 1,450 feet above msl. Hialeah Spring is at an elevation of approximately 1,500 feet msl. The existence of springs at higher elevations in the Chatsworth Formation than the site is evidence that groundwater occurs in the Chatsworth Formation and that it expresses itself naturally at the surface. Highest known groundwater in the alluvium near the eastern portal in the San Fernando Valley ranges from approximately 10 to 20 feet below

ground surface (bgs). Highest known groundwater in the alluvium near the western portal in the Simi Valley also ranges from 10 to 20 feet bgs (Department of Conservation, 1997a; Department of Conservation, 1997b).

The western end of the tunnel is located east of the Simi Valley Hydrologic Subarea of the Calleguas-Conejo Hydrologic Unit, as depicted on a Figure 2-16 of the RWQCB's Water Quality Plan (see Figure 5). In the 2003 Update to Bulletin 118 of Department of Water Resources (DWR), the Simi Valley Groundwater Basin has some impairments from volatile organic compounds (VOCs), and a public well shows a total dissolved solids (TDS) content of 1,580 milligrams per liter (mg/l). The closest well (Well Number 02N17W09N005S) to the western outlet indicated on the DWR website (<http://wdl.water.ca.gov>) is located approximately two miles to the west. The website indicates the latest groundwater level was recorded in this well in 1998 at an elevation of approximately 1,039 feet msl, at a depth of approximately 9 feet bgs. Specific well construction information is not publicly available and the well probably produces from a much deeper zone.

The eastern end of the tunnel is located west of the San Fernando Hydrologic Subarea of the Los Angeles-San Gabriel River Hydrologic Unit (Figure 5). Groundwater quality within the San Fernando Valley has been impaired with VOCs, nitrate, sulfate by urban runoff, erosion, agricultural runoff, and other causes (DWR, 2003). The closest well (Well Number 02N17W12R05) to the eastern outlet indicated on the Los Angeles County Department of Public Works (LADPW) website (<http://dpw2.co.la.ca.us/website/wells>) is located approximately one mile to the east. The website indicates the latest groundwater level was recorded in this well in 2007 at an elevation of approximately 964 feet msl, at a depth of approximately 20 feet bgs. Specific well construction information is not publicly available and the well probably produces from a much deeper zone.

Groundwater seepage was reportedly observed through the concrete lining of the tunnel in relatively few areas, considering the length of the tunnel. In 1999, seepage was reported mostly from the lowest portions of the sidewalls, and not from the upper sidewalls or crown of the

tunnel, indicating a relatively low groundwater level and sporadic occurrence through the length of the tunnel.

### **ESTIMATED WATER FLOW RATE**

The rate of water flow from the west and east ends of the outlet pipeline was measured on January 20, 2009, by logging the length of time to fill a two-gallon plastic bucket. The flow rate at the west end was measured to be approximately 3 gpm. The flow rate at the east end was measured to be approximately 10 gpm. Previous flow rates from the pipeline outlets were reportedly estimated at 5 gpm from the western portal outlet and less than 2 gpm from the eastern portal outlet in 2000 and 2003. The higher flow rates observed in January 2009 probably reflect the influence of approximately 2 inches of rain in mid-December 2008.

### **PATHS OF FLOW**

The water flows from the drain outlets into natural swales at either end of the pipeline. The flow from the western outlet enters the upper reaches of an unnamed, dry wash drainage, and flows to the west for approximately 250 feet (Figure 3). At the west end of the flow, the water percolates into the alluvium of the dry wash. The west flow enters the subsurface and may either re-enter the Chatsworth Formation and deeper rocks or may migrate to the “unconfined Simi Valley aquifer”. This area is outside of and between the Simi Valley Groundwater Basin and the San Fernando Valley Groundwater Basin (Figure 5).

The flow from the eastern outlet enters the upper reaches of an unnamed dry wash drainage, and flows to the east for approximately 500 feet (Figure 4). At the east end of the flow, the water percolates into the alluvium of a dry wash. The east flow enters the subsurface and may either re-enter the Chatsworth Formation and deeper rocks or may migrate to the unconfined aquifer in San Fernando Valley. This area is outside of and between the Simi Valley Groundwater Basin and the San Fernando Valley Groundwater Basin.

## **WATER SAMPLING**

To characterize the groundwater which flows from the outlet pipes, on January 20, 2009, Ninyo & Moore collected water samples from the outlet pipes at both the western and eastern tunnel portals. Water sample W was collected from the outlet at the west tunnel portal; water sample E was collected from the outlet at the east tunnel portal. The samples were collected in appropriate containers prepared by the laboratory which contain preservatives (if needed for the analyses).

## **FIELD PARAMETER RESULTS**

In addition to collecting samples, field water parameters (pH, conductivity, turbidity, dissolved oxygen and temperature) were measured on January 20, 2009, and recorded on field logs. The field parameters are summarized on Table 1.

Conductivity was measured in the field and reported to be 1,420 and 917 microµmhos (µmhos), for samples W and E, respectively. Temperature of the water was measured at 62 and 64 degrees Fahrenheit (°F), for Sample W and E, respectively; pH was measured to be 6.7 and 7.4, for samples W and E, respectively. Dissolved oxygen was reported to be 9.7 and 8.3 mg/l, for samples W and E, respectively.

## **LABORATORY ANALYTICAL RESULTS**

The water samples were analyzed by a variety of test methods, as discussed below, to assess the constituents specified by the RWQCB in their Order No. 93-010, General Waste Discharge Requirements for Specified Discharges to Groundwater in Santa Clara River and Los Angeles River Basins. In addition, the water samples were analyzed for perchlorate because the RWQCB had analyzed a water sample from the tunnel for perchlorate. The analytical results were compared, where applicable, to their respective Primary and Secondary Maximum Contaminant Levels (MCL and SMCL, respectively) and Regulatory Action Levels (RALs) for drinking water, as discussed below. However, Ninyo & Moore does not believe comparison with these standards is applicable because the water is not used for human consumption.



Both water samples W (west portal drain outlet) and E (east portal drain outlet) were analyzed for: metals and boron (via United States Environmental Protection Agency [EPA] Methods 200.7/200.8); mercury (via EPA Method 245.1); anions (fluoride, nitrate, chloride and sulfate via EPA Method 300); cyanide (via SM-4500-CN G); purgeable organics (via EPA Method 524.2); carbamates (via EPA Method 531.1); aroclors (via EPA Method 508); chlorinated herbicides (via EPA Method 515.3); glyphosate (via EPA Method 547); semi-volatile organic compounds (SVOCs; via EPA Method 525.2); ethylene dibromide (EDB) and dibromochloropropane (DBCP; via EPA Method 504.1); thiobencarb (via EPA Method 507); organochlorine pesticides (OCPs) and polychlorinated biphenyls (PCBs; via EPA Method 505); 2,3,7,8-tetrachloro-dibenzo-p-dioxin (dioxin; via EPA Method 1613B); gross alpha and gross beta (via EPA Method 900); radium 226 and 228, and strontium-90 (via EPA Method 903.1); perchlorate (via EPA Method 314.0); and asbestos (via EPA Method 100.2). In addition, both water samples were analyzed for specific conductance (via SIM 2510), surfactants (via SIM 5540C), total dissolved solids (TDS; via SIM 2540C), and color (via SIM 2120B).

The sample analytical test results are shown on Table 1. The complete laboratory analytical reports are presented in Appendix A. Concentrations of analytes for chemicals with an MCL were mostly not detected above reporting limits (RLs) in the two water samples. None of the VOCs, OCPs, chlorinated herbicides, carbamates, PCBs, or asbestos were detected in the two samples. In addition, cyanide, surfactants, glyphosate, thiobencarb, EDB, DBCP, or dioxin were not detected above laboratory RLs. Perchlorate was also not detected above the laboratory RL. Perchlorate was also not detected in a water sample collected from the western portal drainage outlet by the RWQCB in 2003, as referenced in RWQCB's letter dated October 17, 2008, to Aerospace Cancer Museum of Education (ACME).

None of the SVOCs were detected above RLs with the exception of benzo(a)pyrene (b[a]p), which was reported at 0.14 micrograms per liter ( $\mu\text{g/l}$ ) and 3.6  $\mu\text{g/l}$  in the west sample and east sample, respectively. The concentration of b[a]p in sample E (east end) slightly exceeds the MCL of 0.2  $\mu\text{g/l}$ .



Gross alpha, gross beta, radium 226 and 228, and strontium-90 were detected in the water samples (as is common in natural waters) at concentrations below MCLs.

The concentrations of metals are consistent with bedrock groundwater. None of the concentrations of metals exceed MCL, with the exception of aluminum, which was reported at a concentration of 10 mg/l in sample E. However, Ninyo & Moore does not believe comparison with these standards is applicable because the water is not used for human consumption. Concentrations of magnesium were reported at 68 mg/l and 50 mg/l, for samples W and E, respectively, which is consistent with bedrock related groundwater. Magnesium does not have a MCL or SMCL. Fluoride was reported at concentrations below the MCL of 2 mg/l. Nitrate was reported as not detected (above 0.10 mg/l) in both samples, which is below the MCL of 45 mg/l.

Chloride and sulfate were reported below the SMCL of 250 mg/l in both samples. Copper and zinc were reported at concentrations below SMCL of 1 mg/l and 5 mg/l, respectively. Iron was reported at concentrations of 0.320 mg/l and 5.5 mg/l, for samples W and E, respectively, which exceed the SMCL of 0.3 mg/l.

TDS results were reported at concentrations of 980 mg/l and 600 mg/l, for samples W and E, respectively, which exceed the SMCL of 500 mg/l.

Turbidity was measured in the field and reported to be 20 and 730 nephelometric turbidity units (NTUs), for samples W and E, respectively, which exceeds the SMCL of 5 NTUs.

## **DISCUSSION**

The soil in the areas, both east and west, where the water percolates back into the subsurface is composed of a wide range of soil particle sizes. This acts as an effective filter medium to remove and trap suspended solids. In addition, according to the EPA (<http://www.epa.gov/OGWDW/dwh/t-soc/pahs.html>) regarding polycyclic aromatic hydrocarbons such as b(a)p “If released to water, it will be expected to adsorb very strongly to sediments and particulate matter. It will not hydrolyze. It has been shown to be susceptible to significant metabolism by microorganisms in some natural waters without use as carbon or

energy source, but in most waters and in sediments it is stable towards biodegradation.” The relatively long distance from the infiltration areas to the nearest water supply wells (more than a mile) or to either the Simi Valley Groundwater Basin or the San Fernando Valley Groundwater Basin provides ample opportunity for these natural cleansing processes to further improve the quality of the water.

## CONCLUSIONS AND RECOMMENDATIONS

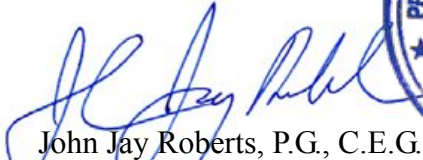
Based on the results of sampling and analyses of the water flowing from the Tunnel 26 drainage pipelines, Ninyo & Moore offers the following conclusions and recommendations:

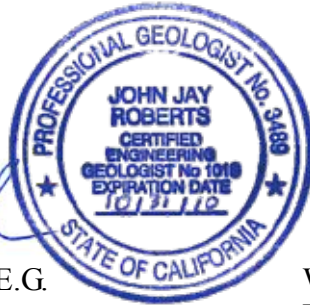
- Tunnel 26 (the Santa Susana Tunnel) is in the Santa Susana Pass in a topographic saddle between the Simi Valley Groundwater Basin and the San Fernando Valley Groundwater Basin. Intercepted groundwater flows from the tunnel and percolates into the subsurface between approximately 250 and 500 feet from the tunnel in areas that are also outside of and between these groundwater basins.
- The water flowing from both ends of the drainage outlets is similar in overall content, with the possible exception of a few constituents. The water flowing from the east end is discernibly more turbid for an unknown reason, possibly related to the steeper grade, higher flow rate, or agitation by the pumping of the drainage water. The elevated aluminum in sample E is likely related to the increased turbidity (primarily due to suspended clay particles, which can adsorb aluminum and are high in aluminum content).
- The TDS and turbidity of the water exceed SMCLs, but should not impact the groundwater due to natural filtration that readily occurs as surface water percolates into the ground. However, Ninyo & Moore does not believe comparison with these standards is applicable because the water is not used for human consumption. The soil in the areas where the water percolates back into the subsurface is composed of a wide range of soil particle sizes, which acts as an effective filter medium to remove and trap suspended solids. In addition, according to the EPA (<http://www.epa.gov/OGWDW/dwh/t-soc/pahs.html>) regarding polycyclic aromatic hydrocarbons (PAHs) such as b(a)p “If released to water, it will be expected to adsorb very strongly to sediments and particulate matter. It will not hydrolyze. It has been shown to be susceptible to significant metabolism by microorganisms in some natural waters without use as carbon or energy source, but in most waters and in sediments it is stable towards biodegradation.” The relatively long distance from the infiltration areas to the nearest water supply wells (more than a mile) or to either the Simi Valley Groundwater Basin or the San Fernando Valley Groundwater Basin provides ample opportunity for these natural cleansing processes.


- The water flowing from the drainage outlets is consistent with native groundwater in the Chatsworth Formation and seeping from bedrock into the respective Simi Valley and San Fernando Valley Groundwater Basins. Benzo(a)pyrene in sample E (east end) with a concentration of 3.6 µg/l slightly exceeds the MCL of 0.2 µg/l. The source of the b(a)p has not been determined; however, may be attributable to suspended particulate matter in the turbid sample E. According to EPA (<http://www.epa.gov/OGWDW/dwh/t-soc/pahs.html>), “benzo(a)pyrene is largely associated with particulate matter, soils, and sediments.” EPA also notes “If released to soil it will be expected to adsorb very strongly and will not be expected to leach to the groundwater. However, its presence in some groundwater samples indicates that it can be transported there by some mechanism.” It is our opinion that b(a)p was detected in sample E because particulate matter causing turbidity contained b(a)p. It should be noted that b(a)p can also be suspended in natural surface waters because it is produced by natural events such as forest and brush fires. Further, EPA states PAHs “are ubiquitous in that they are formed as a result of incomplete combustion of organic materials” and “PAHs are found in exhaust from motor vehicles and other gasoline and diesel engines, emission from coal-, oil-, and wood-burning stoves and furnaces, cigarette smoke; general soot and smoke of industrial, municipal, and domestic origin, and cooked foods, especially charcoal-broiled; in incinerators, coke ovens, and asphalt processing and use.” In fact, not long before the water samples were collected, a major wildfire swept through the area. Ash blown or carried into the tunnel may be responsible for the detection of b(a)p in the water samples.
- The water flowing from the drainage outlets does not represent a potential impact to quality of the groundwater in the Simi Valley and San Fernando Valley Groundwater Basins. The quality of the water is only slightly less than acceptable for drinking water, a characteristic common for shallow groundwater. Therefore, pretreatment of the water prior to its percolation into the natural drainages is not warranted and natural purification processes such as filtration, adsorption, chemical reaction, and biological process, will improve its quality as it travels in the subsurface. As noted previously, the closest wells are more than a mile away from the percolation areas and it is unknown whether the water flowing to those percolation areas are even in the capture zones of those wells.
- The water flowing from the drainage outlets at both ends of Tunnel 26 should not require a Report of Waste Discharge, due to its relatively good water quality and that the flow is not directly made to the groundwater.

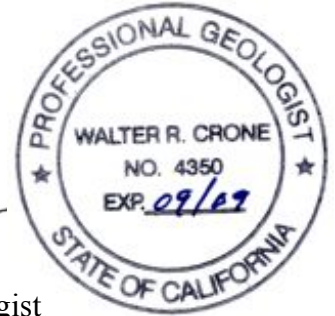
If you have any questions, please contact the undersigned. Ninyo & Moore appreciates the opportunity to provide consulting services to you and the Southern California Regional Rail Authority.

Sincerely,  
**NINYO & MOORE**

  
John Jay Roberts, P.G., C.E.G.  
Senior Geologist



  
Walter R. Crone, P.G., R.E.A.  
Principal Environmental Geologist



JJR/WRC/sc/jad

Attachments: Table 1 – Analytical Results  
Figure 1 – Site Location Map  
Figure 2 – Regional Geologic Map  
Figure 3 – Geologic Map – West Portal  
Figure 4 – Geologic Map – East Portal  
Figure 5 – Tunnel 26 Location/Groundwater Basin  
Appendix A – Analytical Laboratory Reports

Distribution: (1) Addressee  
(6) Gregory Newmark, Esq., Meyers Nave Riback Silver & Wilson

## REFERENCES

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**TABLE 1 – WATER SAMPLE RESULTS**

Sample ID	West Portal Flow	East Portal Flow	State DHS Drinking Water Standards		
			Primary MCL	Secondary MCL	Regulatory Action Levels
Sample Date	1/20/2009	1/20/2009			
<b>Metals (µg/l)</b>					
Aluminum	290	10,000	1,000	200	
Antimony	ND<0.50	ND<0.50	6		
Arsenic	1.2	4.2	10		
Barium	46	140	1000		
Beryllium	ND<10	ND<25	4		
Cadmium	ND<0.50	ND<0.50	5		
Total Chromium	0.74	14	50		
Copper	1.7	15		1,000	1,300
Cyanide	ND<10	ND<10	150		
Iron	320	5,500		300	
Lead	ND<1.0	5.7			15
Magnesium	68,000	50,000			
Mercury	ND<0.20	ND<0.20	2		
Nickel	3.3	9.0	100		
Selenium	1.3	0.65	50		
Silver	ND<0.50	ND<0.50	50		
Thallium	ND<0.50	ND<0.50	2		
Zinc	ND<10	58		5,000	
<b>VOCs (µg/l)</b>					
1,1,1,2-Tetrachloroethane	ND<0.50	ND<0.50			
1,1,1 Trichloroethane	ND<0.50	ND<0.50	200		
1,1,2,2 Tetrachloroethane	ND<0.50	ND<0.50	1		
1,1,2 Trichloroethane	ND<0.50	ND<0.50	5		
1,1 Dichloroethane	ND<0.50	ND<0.50	5		
1,1 Dichloroethylene	ND<0.50	ND<0.50	6		
1,1 Dichloropropene	ND<0.50	ND<0.50			
1,2,3-Trichlorobenzene	ND<0.50	ND<0.50			
1,2,3-Trichloropropane	ND<0.50	ND<0.50			
1,2,4-Trichlorobenzene	ND<0.50	ND<0.50	5		
1,2,4-Trimethylbenzene	ND<0.50	ND<0.50			
1,2 Dichloroethane	ND<0.50	ND<0.50	0.5		
1,2 Dichloropropane	ND<0.50	ND<0.50	5		
1,3-Dichloropropene (total)	ND<0.50	ND<0.50			
1,3,5-Trimethylbenzene	ND<0.50	ND<0.50			
1,3-Dichloropropane	ND<0.50	ND<0.50	0.5		
2,2-Dichloropropane	ND<0.50	ND<0.50			

**TABLE 1 – WATER SAMPLE RESULTS**

Sample ID	West Portal Flow	East Portal Flow	State DHS Drinking Water Standards		
			Primary MCL	Secondary MCL	Regulatory Action Levels
Sample Date	1/20/2009	1/20/2009			
2-Butanone	ND<5.0	ND<5.0			
2-Chloroethyl vinyl ether	ND<1.0	ND<1.0			
2-Chlorotoluene	ND<0.50	ND<0.50			
2-Hexanone	ND<5.0	ND<5.0			
4-Chlorotoluene	ND<0.50	ND<0.50			
4-Methyl-2-pentanone	ND<5.0	ND<5.0			
Acrolein	ND<5.0	ND<5.0			
Acrylonitrile	ND<2.0	ND<2.0			
Benzene	ND<0.50	ND<0.50	1		
Bromobenzene	ND<0.50	ND<0.50			
Bromochloromethane	ND<0.50	ND<0.50			
Bromodichloromethane	ND<0.50	ND<0.50			
Bromoform	ND<0.50	ND<0.50			
Bromomethane	ND<0.50	ND<0.50			
Carbon Tetrachloride	ND<0.50	ND<0.50	0.5		
Chlorobenzene	ND<0.50	ND<0.50			
Chloroethane	ND<0.50	ND<0.50			
Cloroform	ND<0.50	ND<0.50			
Chloromethane	ND<0.50	ND<0.50			
Cis-1,2-Dichloroethene (Cis-1,2-Dichloroethylene)	ND<0.50	ND<0.50	6		
Cis-1,3-Dichloropropene	ND<0.50	ND<0.50			
Dibromochloromethane	ND<0.50	ND<0.50			
Dibromomethane	ND<0.50	ND<0.50			
Dichlorodifluoromethane (Freon 12)	ND<0.50	ND<0.50			
Di-isopropyl ether	ND<3.0	ND<3.0			
Ethyl tert-butyl ether	ND<3.0	ND<3.0			
Ethylbenzene	ND<0.50	ND<0.50	300		
Freon 113	ND<5.0	ND<5.0			
Hexachlorobutadiene	ND<0.50	ND<0.50			
Isopropylbenzene	ND<0.50	ND<0.50			
m,p-Xylene	ND<0.50	ND<0.50	1,750 (total xylenes)		
m-Dichlorobenzene	ND<0.50	ND<0.50			
Methyl tertiary butyl ether (MTBE)	ND<3.0	ND<3.0	13		
Methylene Chloride	ND<0.50	ND<0.50			
Naphthalene	ND<0.50	ND<0.50			
n-Butylbenzene	ND<0.50	ND<0.50			



**TABLE 1 – WATER SAMPLE RESULTS**

Sample ID	West Portal Flow	East Portal Flow	State DHS Drinking Water Standards		
			Primary MCL	Secondary MCL	Regulatory Action Levels
Sample Date	1/20/2009	1/20/2009			
n-Propylbenzene	ND<0.50	ND<0.50			
o-Dichlorobenzene	ND<0.50	ND<0.50			
o-Xylene	ND<0.50	ND<0.50	1,750 (total xylenes)		
p-Dichlorobenzene	ND<0.50	ND<0.50			
p-Isopropyltoluene	ND<0.50	ND<0.50			
sec-Butylbenzene	ND<0.50	ND<0.50			
Styrene	ND<0.50	ND<0.50	100		
Tert-amyl methyl ether	ND<3.0	ND<3.0			
Tert-Butylbenzene	ND<0.50	ND<0.50			
Tetrachloroethene	ND<0.50	ND<0.50	5		
Toluene	ND<0.50	ND<0.50	150		
trans-1,2-Dichloroethene	ND<0.50	ND<0.50	10		
trans-1,3-Dichloropropene	ND<0.50	ND<0.50			
Trichloroethene (Trichloroethylene)	ND<0.50	ND<0.50	5		
Trichlorofluoromethane	ND<5.0	ND<5.0	150		
Vinyl Chloride	ND<0.50	ND<0.50	0.5		
Xylenes	ND<0.50	ND<0.50	1,750		
<b>SVOCs (µg/l)</b>					
Alachlor	ND<0.10	ND<0.10	2		
Atrazine	ND<0.10	ND<0.10	1		
Benzo (a) pyrene	0.14	3.6	0.2		
Bis(2-ethylhexyl)adipate	ND<5.0	ND<5.0			
Bis(2-ethylhexyl)phthalate	ND<3.0	ND<3.0			
Bromacil	ND<1.0	ND<1.0			
Butachlor	ND<0.20	ND<0.20			
Captan	ND<1.0	ND<1.0			
Chloroproham	ND<0.10	ND<0.10			
Cyanazine	ND<0.10	ND<0.10			
Diazinon	ND<0.10	ND<0.10			
Dimethoate	ND<0.20	ND<0.20			
Diphenamid	ND<0.10	ND<0.10			
Disulfoton	ND<0.10	ND<0.10			
EPTC	ND<1.0	ND<1.0			
Metolachlor	ND<0.10	ND<0.10			
Metribuzin	ND<0.10	ND<0.10			
Molinate	ND<0.10	ND<0.10	20		
Prometon	ND<0.20	ND<0.20			

**TABLE 1 – WATER SAMPLE RESULTS**

Sample ID	West Portal Flow	East Portal Flow	State DHS Drinking Water Standards		
			Primary MCL	Secondary MCL	Regulatory Action Levels
Sample Date	1/20/2009	1/20/2009			
Prometryn	ND<0.10	ND<0.10			
Simazine	ND<0.10	ND<0.10	4		
Terbacil	ND<2.0	ND<2.0			
Thiobencarb	ND<0.20	ND<0.20	70	1	
Trithion	ND<0.10	ND<0.10			
<b>SVOCs (µg/l)</b>					
1,2,4 Trichlorobenzene	ND<5.0	ND<5.0			
1,2-Dichlorobenzene	ND<2.0	ND<2.0			
1,2 Diphenylhydrazine	ND<1.0	ND<1.0			
1,3 Dichlorobenzene	ND<1.0	ND<1.0			
1,4 Dichlorobenzene	ND<1.0	ND<1.0			
2,4,6 Trichlorophenol	ND<10	ND<10			
2,4 Dichlorophenol	ND<5.0	ND<5.0			
2,4 Dimethylphenol	ND<2.0	ND<2.0			
2,4 Dinitrophenol	ND<10	ND<10			
2,4 Dinitrotoluene	ND<5.0	ND<5.0			
2,6 Dinitrotoluene	ND<5.0	ND<5.0			
2-Chloronaphthalene	ND<5.0	ND<5.0			
2-Chlorophenol	ND<5.0	ND<5.0			
2-Nitrophenol	ND<10	ND<10			
3,3'-Dichlorobenzidine	ND<5.0	ND<5.0			
4,6-Dinitro-2-methylphenol	ND<5.0	ND<5.0			
4-Bromophenyl phenyl ether	ND<5.0	ND<5.0			
4-Chloro-3-methylphenol	ND<1.0	ND<1.0			
4-Chlorophenyl phenyl ether	ND<5.0	ND<5.0			
4-Nitrophenol	ND<10	ND<10			
Acenaphthene	ND<1.0	ND<1.0			
Acenaphthylene	ND<5.0	ND<5.0			
Anthracene	ND<5.0	ND<5.0			
Benzidine	ND<5.0	ND<5.0			
Benzo (a) Anthracene	ND<5.0	ND<5.0			
Benzo (a) Pyrene	ND<10	ND<10	0.2		
Benzo (b) Fluoranthene	ND<5.0	ND<5.0			
Benzo (g,h,i) Perylene	ND<5.0	ND<5.0			
Benzo (k) Fluoranthene	ND<10	ND<10			
Bis (2-Chloroethoxyl) methane	ND<5.0	ND<5.0			
Bis (2-Chloroethyl) ether	ND<1.0	ND<1.0			

**TABLE 1 – WATER SAMPLE RESULTS**

Sample ID	West Portal Flow	East Portal Flow	State DHS Drinking Water Standards		
			Primary MCL	Secondary MCL	Regulatory Action Levels
Sample Date	1/20/2009	1/20/2009			
Bis (2-Chloroisopropyl) ether	ND<2.0	ND<2.0			
Bis (2-Ethylhexyl) phthalate	ND<5.0	ND<5.0			
Butyl Benzyl Phthalate	ND<5.0	ND<5.0			
Chrysene	ND<5.0	ND<5.0			
Dibenzo (a,h)-anthracene	ND<10	ND<10			
Diethyl phthalate	ND<2.0	ND<2.0			
Dimethyl Phthalate	ND<2.0	ND<2.0			
di-n-Butyl phthalate	ND<5.0	ND<5.0			
di-n-Octyl phthalate	ND<5.0	ND<5.0			
Fluoranthene	ND<1.0	ND<1.0			
Fluorene	ND<5.0	ND<5.0			
Hexachlorobenzene	ND<1.0	ND<1.0	1		
Hexachlorobutadiene	ND<1.0	ND<1.0			
Hexachlorocyclopentadiene	ND<10	ND<10	50		
Hexachloroethane	ND<1.0	ND<1.0			
Indeno (1,2,3, cd)-pyrene	ND<10	ND<10			
Isophorone	ND<1.0	ND<1.0			
N-Nitrosodimethylamine	ND<5.0	ND<5.0			
N-Nitrosodi-n-propylamine	ND<5.0	ND<5.0			
N-Nitrosodiphenylamine	ND<1.0	ND<1.0			
Naphthalene	ND<1.0	ND<1.0			
Nitrobenzene	ND<1.0	ND<1.0			
Pentachlorophenol	ND<5.0	ND<5.0	1		
Phenathrene	ND<5.0	ND<5.0			
Phenol	ND<1.0	ND<1.0			
Pyrene	ND<5.0	ND<5.0			
<b>Chlorinated Herbicides (µg/l)</b>					
2,4,5-T	ND<0.20	ND<0.20			
2,4,5-TP (Silvex)	ND<0.20	ND<0.20	50		
2,4-D	ND<0.40	ND<0.40	70		
2,4-DB	ND<2.0	ND<2.0			
3,5-Dichlorobenzoic acid	ND<1.0	ND<1.0			
Acifluorfen	ND<0.40	ND<0.40			
Bentazon	ND<2.0	ND<2.0	18		
Chloramben	ND<1.0	ND<1.0			
Dalapon	ND<0.40	ND<0.40	200		
DCPA	ND<0.10	ND<0.10			

**TABLE 1 – WATER SAMPLE RESULTS**

Sample ID	West Portal Flow	East Portal Flow	State DHS Drinking Water Standards		
			Primary MCL	Secondary MCL	Regulatory Action Levels
<b>Sample Date</b>	1/20/2009	1/20/2009			
Dicamba	ND<0.60	ND<0.60			
Dichloroprop	ND<0.30	ND<0.30			
Dinoseb	ND<0.40	ND<0.40	7		
Pentachlorophenol	ND<0.20	ND<0.20	1		
Picloram	ND<0.60	ND<0.60	500		
<b>Dioxins (pg/l)</b>					
2,3,7,8-Tetra CDD	ND<0.36	ND<0.35	30		
<b>Radionuclides (pCi/l)</b>					
Radium 226	0.308	0.234	3		
Radium 226 counting error	0.251	0.27			
Radium226 MDA	0.373	0.447			
Radium 228	0.345	0	2		
Radium 228 counting error	1.05	0.897			
Radium 228 MDA	0.256	0.0259			
Strontium 90	0.3	0	8		
Strontium 90 counting error	0.676	0.624			
Strontium 90 MDA	0.596	0.596			
<b>Carbamates and Urea Pesticides (µg/l)</b>					
3-Hydroxycarbofuran	ND<2.0	ND<2.0			
Aldicarb	ND<2.0	ND<2.0			
Aldicarb sulfon	ND<2.0	ND<2.0			
Aldicarb sulfoxide	ND<2.0	ND<2.0			
Carbaryl	ND<2.0	ND<2.0			
Carbofuran	ND<5.0	ND<5.0	18		
Methiocarb	ND<3.0	ND<3.0			
Methomyl	ND<2.0	ND<2.0			
Oxamyl	ND<2.0	ND<2.0	50		
Propoxur (Baygon)	ND<5.0	ND<5.0			
<b>Fumigants (µg/l)</b>					
1,2-Dibromo-3-chloropropane (DBCP)	ND<0.10	ND<0.10	2		
1,2-Dibromomethane (EDB)	ND<0.020	ND<0.020	0.05		
<b>Pesticides and PCBs (µg/l)</b>					
4,4,'-DDD	ND<0.01	ND<0.01			
4,4'-DDE	ND<0.01	ND<0.01			
4,4'-DDT	ND<0.01	ND<0.01			
alpha-BHC	ND<0.01	ND<0.01			

**TABLE 1 – WATER SAMPLE RESULTS**

Sample ID	West Portal Flow	East Portal Flow	State DHS Drinking Water Standards		
			Primary MCL	Secondary MCL	Regulatory Action Levels
Sample Date	1/20/2009	1/20/2009			
Aldrin	ND<0.01	ND<0.01			
beta-BHC	ND<0.01	ND<0.01			
Chlordane (tech)	ND<0.10	ND<0.10	0.1		
Chlorothalonil	ND<0.050	ND<0.050			
delta-BHC	ND<0.01	ND<0.01			
Dieldrin	ND<0.01	ND<0.01			
Endosulfan I	ND<0.01	ND<0.01			
Endosulfan II	ND<0.01	ND<0.01			
Endosulfan Sulfate	ND<0.01	ND<0.01			
Endrin	ND<0.01	ND<0.01	2		
Endrin Aldehyde	ND<0.01	ND<0.01			
gamma-BHC (Lindane)	ND<0.01	ND<0.01			
Heptachlor	ND<0.01	ND<0.01	0.01		
Heptachlor Epoxide	ND<0.01	ND<0.01	0.01		
Hexachlorobenzene	ND<0.01	ND<0.01	1		
Hexachlorocyclopentadiene	ND<0.050	ND<0.050	50		
Methoxychlor	ND<0.01	ND<0.01	30		
PCB 1016	ND<0.10	ND<0.10	0.5		
PCB 1221	ND<0.10	ND<0.10	0.5		
PCB 1232	ND<0.10	ND<0.10	0.5		
PCB 1242	ND<0.10	ND<0.10	0.5		
PCB 1248	ND<0.10	ND<0.10	0.5		
PCB 1254	ND<0.10	ND<0.10	0.5		
PCB 1260	ND<0.10	ND<0.10	0.5		
PCBS, total	ND<0.50	ND<0.50	0.5		
Propachlor	ND<0.050	ND<0.050			
Toxaphene	ND<1.0	ND<1.0	3		
Trifluralin	ND<0.01	ND<0.01			
<b>Other</b>					
Perchlorate (µg/l)	ND<2.0	ND<2.0	6		
MBAS (mg/l)	ND<0.050	ND<0.050			
Fluoride (mg/l)	0.34	0.54	2		
Color (color units)	20	50		15	
Glyphosate (µg/l)	ND<5.0	ND<5.0	700		
Asbestos (MFL)	ND<1.10	ND<11.0	7 MFL		
pH (pH units)	6.67	7.43			
Conductivity (µmhos)	1420	917		900 µmhos	

**TABLE 1 – WATER SAMPLE RESULTS**

Sample ID	West Portal Flow	East Portal Flow	State DHS Drinking Water Standards		
			Primary MCL	Secondary MCL	Regulatory Action Levels
Sample Date	1/20/2009	1/20/2009			
Turbidity (NTU)	20	730	5		
Dissolved Oxygen (mg/l)	9.67	8.34			
Temperature (°F)	62	64			
Nitrate (as N) (mg/l)	ND<0.10	ND<0.10	45		
Boron (mg/l)	ND<0.10	ND<0.10			
Sulfate (mg/l)	360	190			
Chloride (mg/l)	51	26			
TDS (mg/l)	980	600			

**Notes:**

ID – identification

VOCs – Volatile Organic Compounds, analyzed in accordance with EPA test 8260B; includes 65 analytes

SVOCs – Semivolatile Organic Compounds; analyzed in accordance with EPA test 8260B

pH analyzed in accordance with EPA test 150.1

Sulfate analyzed in accordance with EPA test 300.0

Chloride analyzed in accordance with EPA test 300.0

Nitrogen, Nitrate analyzed in accordance with EPA test 300.0

Turbidity analyzed in accordance with EPA test 180.1

TDS – Total Dissolved Solids; analyzed in accordance with test SM2540C

PCBs – Polychlorinated Biphenyls

Drinking water metals in accordance with EPA 200.7/200.8

Cyanide in accordance with SM-4500-CN G

Organochloride pesticides in accordance with EPA 505

PCBs in accordance with EPA 505

Perchlorate in accordance with EPA 314.0

mg/l – milligrams per liter

µg/l – micrograms per liter

ND – Not Detected

NTU – nephelometer turbidity units

HSA – Hydrologic Sub Area

NA – Not Applicable

MCL – Maximum Contaminant Level

pg/l – picograms per liter

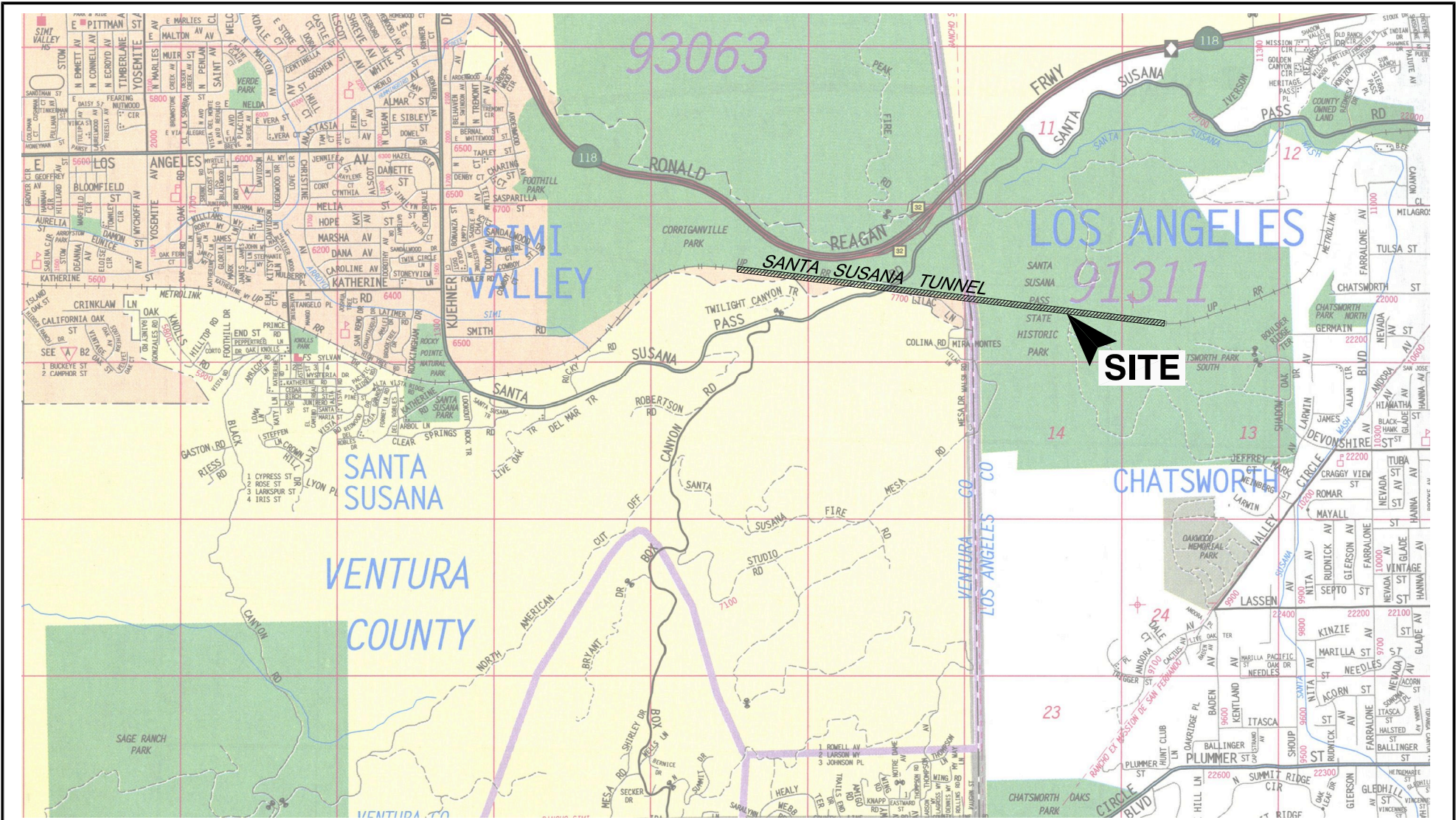
pCi/l – picoCuries per liter

MFL – million fibers per lieter

µmhos – micromhos

Please refer to the attached laboratory reports for additional details.

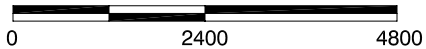




REFERENCE: 2007 THOMAS GUIDE FOR LOS ANGELES/ORANGE COUNTIES, STREET GUIDE AND DIRECTORY



APPROXIMATE SCALE IN FEET



NOTE: ALL DIMENSIONS, DIRECTIONS AND LOCATIONS ARE APPROXIMATE.  
Map © Rand McNally, R.L.07-S-129

**Ninyo & Moore**

**SITE LOCATION MAP**

FIGURE

PROJECT NO.

DATE

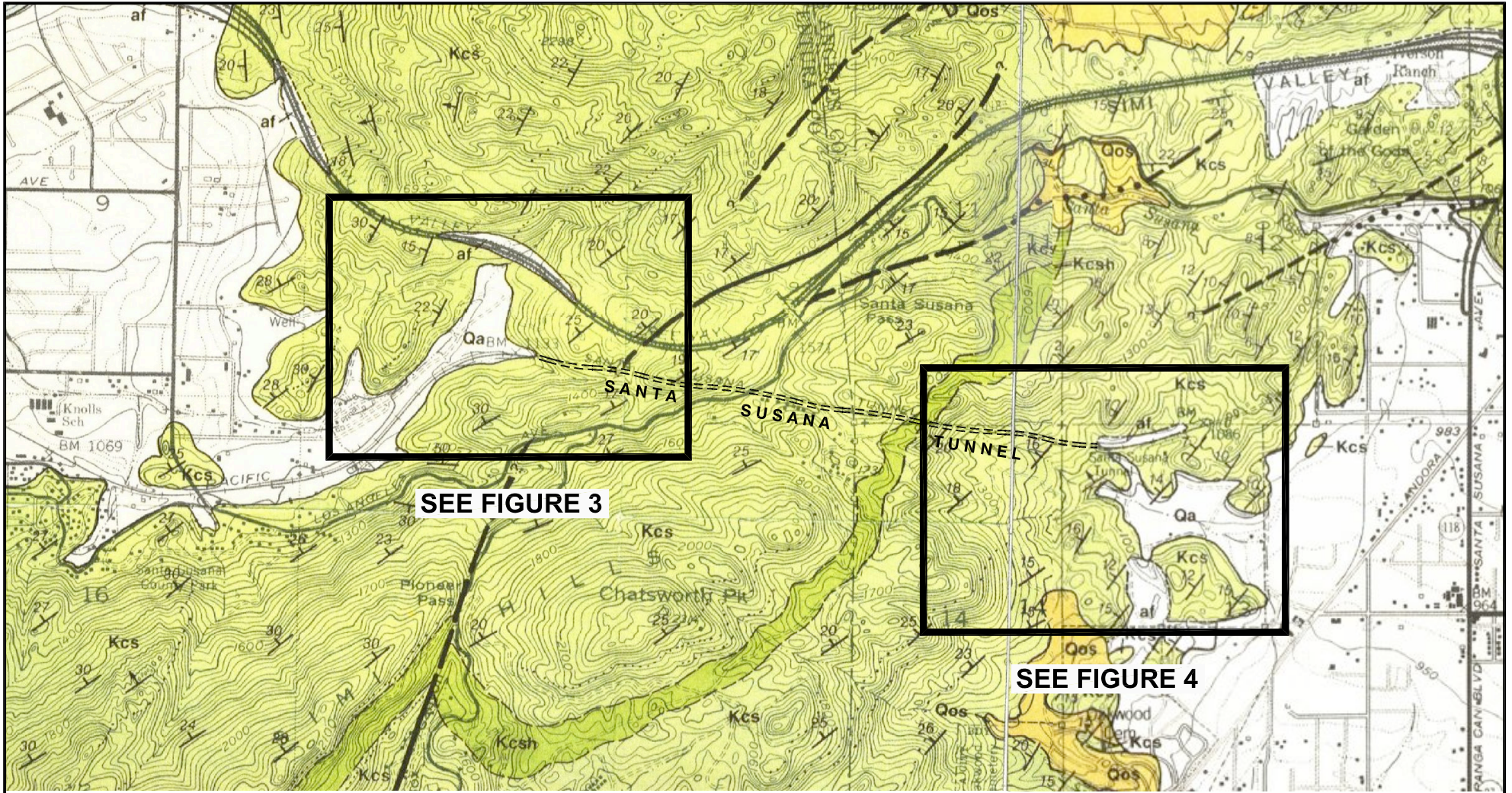
SANTA SUSANA TUNNEL 26  
LOS ANGELES, CALIFORNIA

207613001

2/09

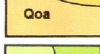
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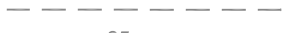






**SEE FIGURE 3**

**SEE FIGURE 4**

-  Surfacial Sediments  
artificial fill  
alluvial gravel, sand and clay of  
valley and floodplain areas
-  Older surficial sediments  
older sandy alluvium
-  Chatsworth Formation  
Kcsh - clay shale  
Kcs - light gray to light brown, sandstone

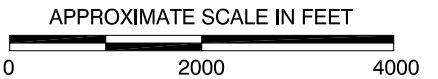
-  Fault - Dashed where inferred, dotted  
where concealed, queried where uncertain.
-  Formation Contact
-  Strike and Dip of Bedding;  
Dip in degrees
-  Strike and Dip of Fault;  
Dip in degrees

(SEE FIGURES 2 AND 3 FOR ADDITIONAL EXPLANATION OF SYMBOLS)



REFERENCE: DIBBLEE, T.W., JR., 1992, GEOLOGIC MAP OF THE OAT MOUNTAIN AND CANOGA PARK (NORTH 1/2) QUADRANGLES AND DIBBLEE, T.W., JR., 1992, GEOLOGIC MAP OF SANTA SUSANA QUADRANGLE

207613-A22.DWG



NOTE: ALL DIMENSIONS, DIRECTIONS AND LOCATIONS ARE APPROXIMATE.

**Ninyo & Moore**

**REGIONAL GEOLOGIC MAP**

FIGURE

PROJECT NO.

DATE

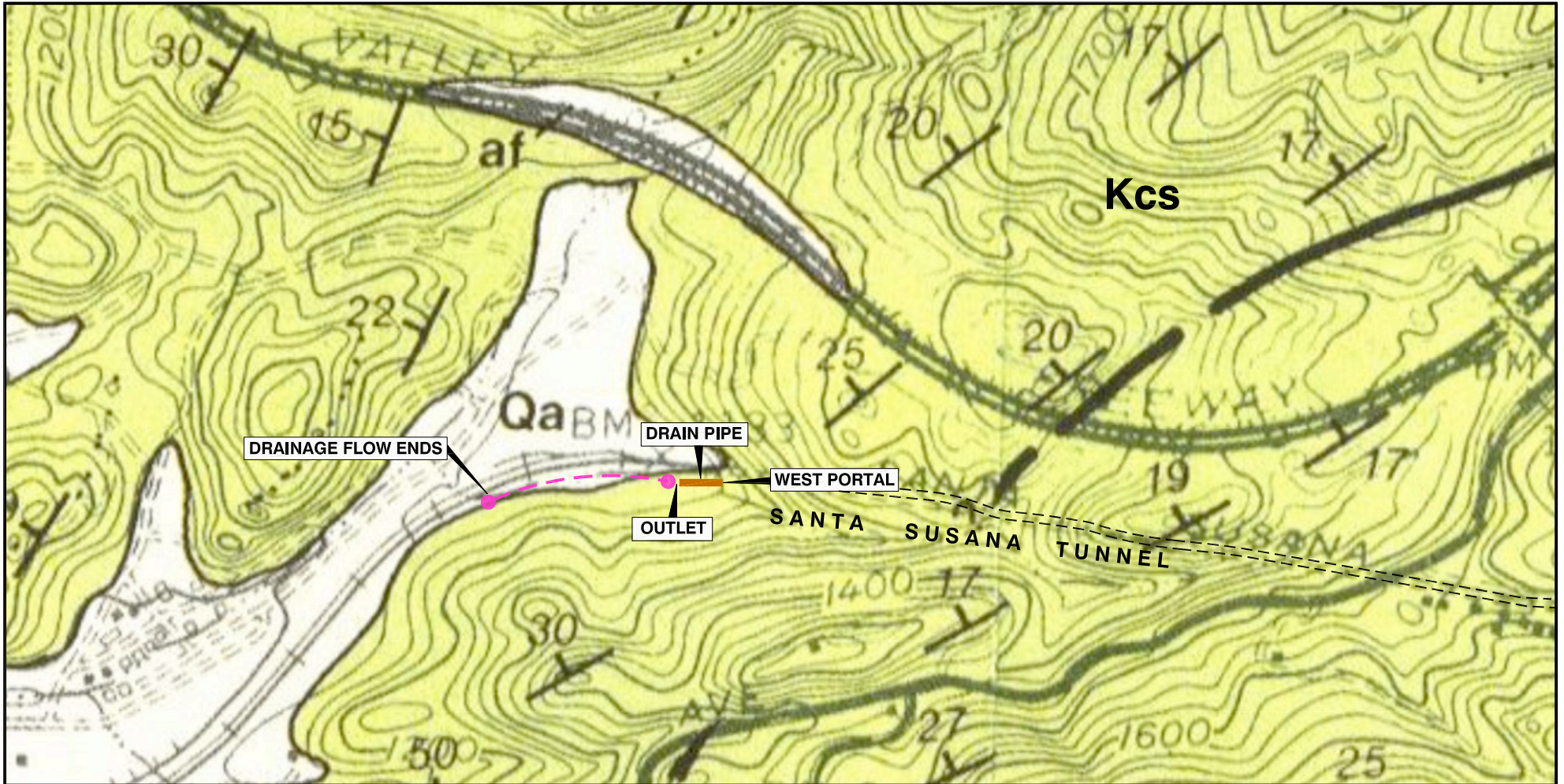
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LOS ANGELES, CALIFORNIA

207613001

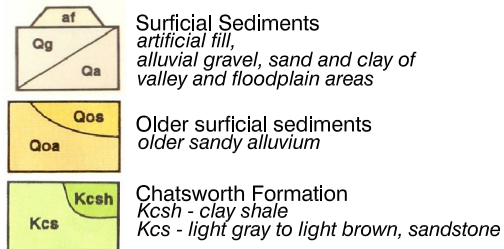
2/09

**2**

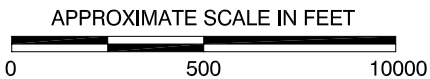




REFERENCE: DIBBLEE, T.W., JR., 1992, GEOLOGIC MAP OF THE OAT MOUNTAIN AND CANOGA PARK (NORTH 1/2) QUADRANGLES AND DIBBLEE, T.W., JR., 1992, GEOLOGIC MAP OF SANTA SUSANA QUADRANGLE



LEGEND	
	STRIKE AND DIP OF BEDDING; DIP IN DEGREES
	ARTIFICIAL CUT AND FILL
	ALLUVIUM
	CHATSWORTH FORMATION
	APPROXIMATE LOCATION OF FAULT



NOTE: ALL DIMENSIONS, DIRECTIONS AND LOCATIONS ARE APPROXIMATE.

**Ninyo & Moore**

**WEST PORTAL OF TUNNEL 26 MAP**

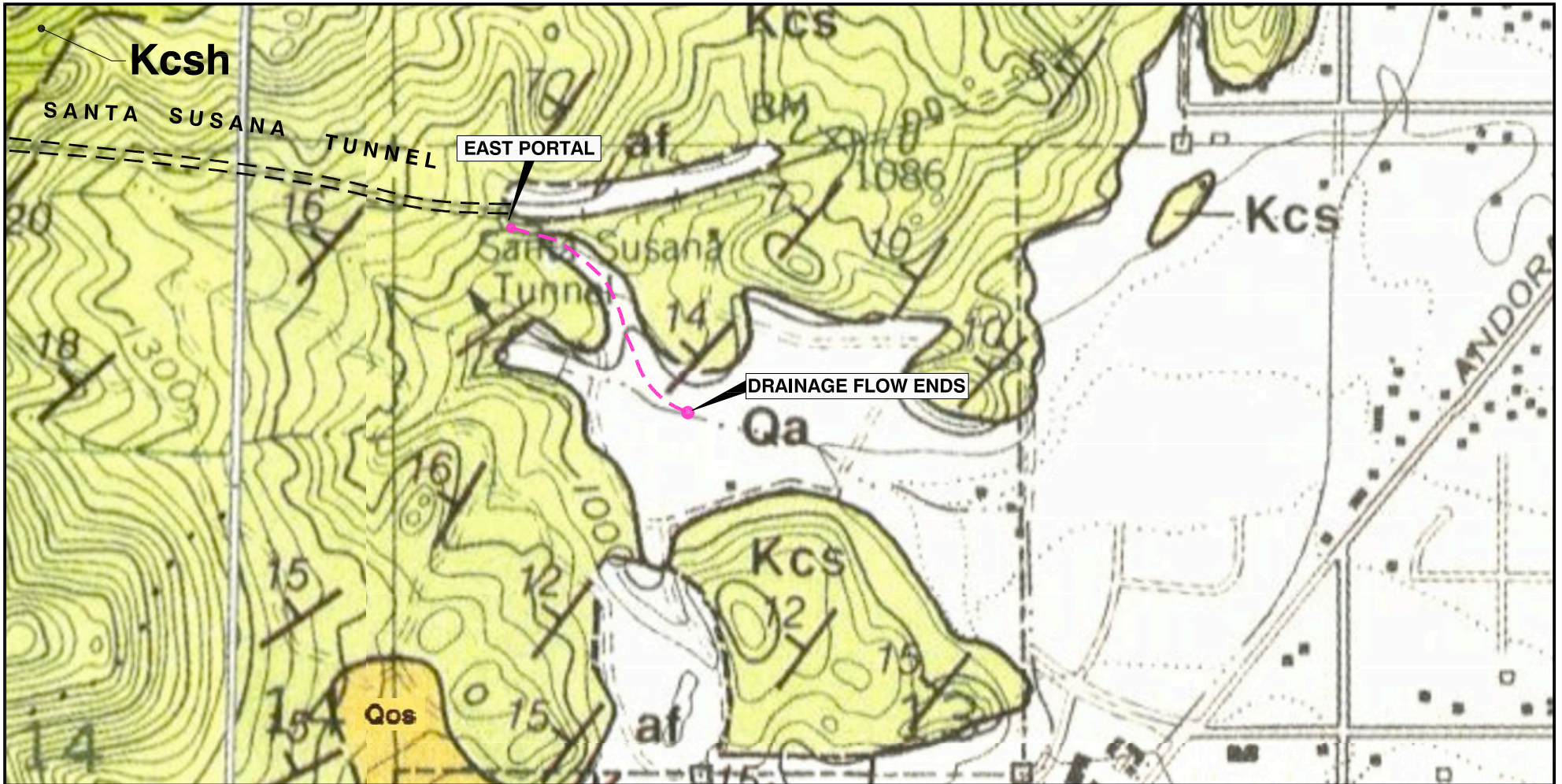
FIGURE

PROJECT NO.	DATE
207613001	2/09

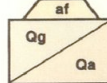
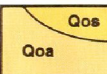
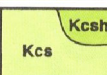
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LOS ANGELES, CALIFORNIA




**3**

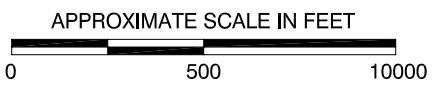




REFERENCE: DIBBLEE, T.W., JR., 1992, GEOLOGIC MAP OF THE OAT MOUNTAIN AND CANOGA PARK (NORTH 1/2) QUADRANGLES AND DIBBLEE, T.W., JR., 1992, GEOLOGIC MAP OF SANTA SUSANA QUADRANGLE

-  **af** Surficial Sediments  
artificial fill,  
alluvial gravel, sand and clay of  
valley and floodplain areas
-  **Qos** Older surficial sediments  
older sandy alluvium
-  **Kcsh** Chatsworth Formation  
Kcsh - clay shale  
Kcs - light gray to light brown,  
sandstone

LEGEND	
<b>af</b>	ARTIFICIAL CUT AND FILL
<b>Qa</b>	ALLUVIAL GRAVEL, SAND AND SILT
<b>Kcs</b>	CHATSWORTH FORMATION
<b>Kcsh</b>	CHATSWORTH FORMATION
	17 STRIKE AND DIP OF BEDDING; DIP IN DEGREES
	17 STRIKE AND DIP OF FAULT; DIP IN DEGREES
	APPROXIMATE LOCATION OF FAULT



NOTE: ALL DIMENSIONS, DIRECTIONS AND LOCATIONS ARE APPROXIMATE.

**Ninyo & Moore**

**EAST PORTAL OF TUNNEL 26 MAP**

FIGURE

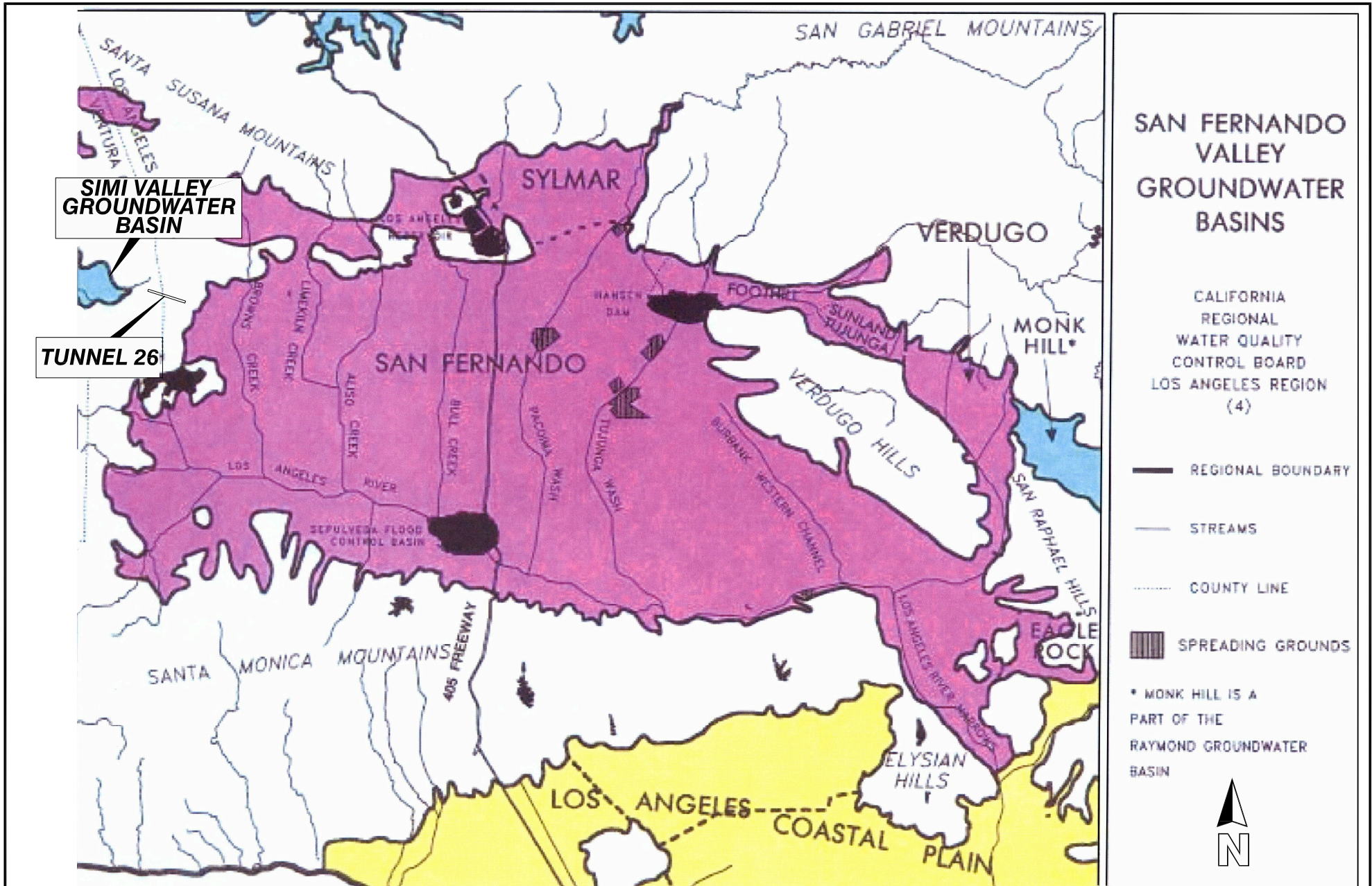
PROJECT NO.	DATE
207613001	2/09

SANTA SUSANA TUNNEL 26  
LOS ANGELES, CALIFORNIA

**4**

207613-A44.DWG





REFERENCE: LARWQCB, 1995, WATER QUALITY CONTROL PLAN, MODIFIED FROM FIGURE 2-16.

**Ninyo & Moore**

**TUNNEL LOCATION/GROUNDWATER BASINS**

FIGURE



NOTE: ALL DIMENSIONS, DIRECTIONS AND LOCATIONS ARE APPROXIMATE.

PROJECT NO.

DATE

SANTA SUSANA TUNNEL 26  
CHATSWORTH, CALIFORNIA

207613001

2/09

**5**

**APPENDIX A**  
**ANALYTICAL LABORATORY REPORTS**

January 28, 2009



Jay Roberts  
Ninyo & Moore  
475 Goddard Suite 200  
Irvine, CA 92618  
TEL: (949) 753-7070  
FAX: (949) 753-7071

ELAP No.: 1838  
NELAP No.: 02107CA  
NEVADA: CA-401  
Arizona: AZ0689  
CSDLAC No.: 10196  
Workorder No.: 103365

RE: Metrolink Tunnel 26, 207613001

Attention: Jay Roberts

Enclosed are the results for sample(s) received on January 20, 2009 by Advanced Technology Laboratories. The sample(s) are tested for the parameters as indicated in the enclosed chain of custody in accordance with the applicable laboratory certifications.

Thank you for the opportunity to service the needs of your company.

Please feel free to call me at (562)989-4045 if I can be of further assistance to your company.

Sincerely,



Eddie P. Rodriguez  
Laboratory Director

The cover letter and the case narrative are an integral part of this analytical report and cannot be reproduced in part or in its entirety without written permission from the client and Advanced Technology Laboratories.

---

**CLIENT:** Ninyo & Moore  
**Project:** Metrolink Tunnel 26, 207613001  
**Lab Order:** 103365

---

**CASE NARRATIVE**

The samples for EPA 525.2, SM2120B, EPA 508, EPA 524.2, EPA 515.3, EPA 531.1, EPA 547, EPA 507, EPA 504.1, EPA 1613B, EPA 900, EPA 903.1, EPA Ra-05, EPA 905.0 and EPA 100.2 analyses were subcontracted to Weck Laboratories, Inc. with ELAP Cert.#1132.





**Advanced Technology Laboratories**

**ANALYTICAL RESULTS**

Print Date: 28-Jan-09

**CLIENT:** Ninyo & Moore  
**Lab Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001  
**Lab ID:** 103365-001

**Client Sample ID:** W  
**Collection Date:** 1/20/2009 8:00:00 AM  
**Matrix:** WATER

Analyses	Result	PQL	Qual	Units	DF	Date Analyzed
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**DRINKING WATER METALS BY ICP**

**EPA 200.7**

**EPA 200.7**

RunID: ICP6_090127A	QC Batch: 52462				PrepDate: 1/26/2009	Analyst: <b>CL</b>
Boron	ND	0.10		mg/L	1	1/27/2009 03:17 PM
Iron	0.32	0.10		mg/L	1	1/27/2009 03:17 PM

**ICPMS METALS**

**EPA 200.8**

**EPA 200.8**

RunID: ICP7_090123C	QC Batch: 52388				PrepDate: 1/22/2009	Analyst: <b>SRB</b>
Aluminum	290	50		µg/L	1	1/23/2009 03:02 PM
Antimony	ND	0.50		µg/L	1	1/23/2009 03:02 PM
Arsenic	1.2	1.0		µg/L	1	1/23/2009 03:02 PM
Barium	46	1.0		µg/L	1	1/23/2009 03:02 PM
Beryllium	ND	10		µg/L	20	1/23/2009 03:40 PM
Cadmium	ND	0.50		µg/L	1	1/23/2009 03:02 PM
Chromium	0.74	0.50		µg/L	1	1/23/2009 03:02 PM
Copper	1.7	1.0		µg/L	1	1/23/2009 03:02 PM
Lead	ND	1.0		µg/L	1	1/23/2009 03:02 PM
Magnesium	68000	1000		µg/L	20	1/23/2009 03:40 PM
Nickel	3.3	1.0		µg/L	1	1/23/2009 03:02 PM
Selenium	1.3	0.50		µg/L	1	1/23/2009 03:02 PM
Silver	ND	0.50		µg/L	1	1/23/2009 03:02 PM
Thallium	ND	0.50		µg/L	1	1/23/2009 03:02 PM
Zinc	ND	10		µg/L	1	1/23/2009 03:02 PM

**CYANIDE, TOTAL**

**SM4500-CN E**

RunID: WETCHEM3_090120C	QC Batch: 52419				PrepDate: 1/20/2009	Analyst: <b>AMM</b>
Cyanide	ND	0.010		mg/L	1	1/22/2009

**SURFACTANTS**

**SM5540C**

RunID: WETCHEM3_090120B	QC Batch: 52374				PrepDate: 1/20/2009	Analyst: <b>AMM</b>
MBAS	ND	0.050		mg/L	1	1/21/2009

**ANIONS BY ION CHROMATOGRAPHY**

**EPA 300.0**

RunID: IC3_090121B	QC Batch: R104852				PrepDate:	Analyst: <b>CBB</b>
Chloride	51	25		mg/L	50	1/21/2009 04:18 PM

**Qualifiers:** B Analyte detected in the associated Method Blank E Value above quantitation range  
H Holding times for preparation or analysis exceeded ND Not Detected at the Reporting Limit  
S Spike/Surrogate outside of limits due to matrix interference Results are wet unless otherwise specified  
DO Surrogate Diluted Out



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**ANALYTICAL RESULTS**

Print Date: 28-Jan-09

**CLIENT:** Ninyo & Moore  
**Lab Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001  
**Lab ID:** 103365-001

**Client Sample ID:** W  
**Collection Date:** 1/20/2009 8:00:00 AM  
**Matrix:** WATER

Analyses	Result	PQL	Qual	Units	DF	Date Analyzed
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**ANIONS BY ION CHROMATOGRAPHY**

**EPA 300.0**

RunID: IC3_090121B	QC Batch: R104852				PrepDate:	Analyst: <b>CBB</b>
Fluoride	0.34	0.10		mg/L	1	1/21/2009 03:30 PM

**ANIONS BY ION CHROMATOGRAPHY**

**EPA 300.0**

RunID: IC3_090121B	QC Batch: R104852				PrepDate:	Analyst: <b>CBB</b>
Nitrogen, Nitrate (As N)	ND	0.10		mg/L	1	1/21/2009 03:30 PM

**ANIONS BY ION CHROMATOGRAPHY**

**EPA 300.0**

RunID: IC3_090121B	QC Batch: R104852				PrepDate:	Analyst: <b>CBB</b>
Sulfate	360	50		mg/L	50	1/21/2009 04:18 PM

**MERCURY BY COLD VAPOR TECHNIQUE**

**EPA 245.1**

RunID: AA5_090122G	QC Batch: 52340				PrepDate: 1/21/2009	Analyst: <b>LKN</b>
Mercury	ND	0.20		µg/L	1	1/22/2009 03:37 PM

**TOTAL FILTERABLE RESIDUE**

**SM2540C**

RunID: WETCHEM_090123C	QC Batch: 52450				PrepDate: 1/22/2009	Analyst: <b>PU</b>
Total Dissolved Solids (Residue, Filterable)	980	10		mg/L	1	1/22/2009 09:00 AM

**Qualifiers:** B Analyte detected in the associated Method Blank  
 H Holding times for preparation or analysis exceeded  
 S Spike/Surrogate outside of limits due to matrix interference  
 DO Surrogate Diluted Out  
 E Value above quantitation range  
 ND Not Detected at the Reporting Limit  
 Results are wet unless otherwise specified



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**ANALYTICAL RESULTS**

Print Date: 28-Jan-09

**CLIENT:** Ninyo & Moore  
**Lab Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001  
**Lab ID:** 103365-002

**Client Sample ID:** E  
**Collection Date:** 1/20/2009 11:40:00 AM  
**Matrix:** WATER

Analyses	Result	PQL	Qual	Units	DF	Date Analyzed
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**DRINKING WATER METALS BY ICP**

**EPA 200.7**

**EPA 200.7**

RunID: ICP6_090127A	QC Batch: 52462				PrepDate: 1/26/2009	Analyst: <b>CL</b>
Boron	ND	0.10		mg/L	1	1/27/2009 03:21 PM
Iron	5.5	0.10		mg/L	1	1/27/2009 03:21 PM

**ICPMS METALS**

**EPA 200.8**

**EPA 200.8**

RunID: ICP7_090123C	QC Batch: 52388				PrepDate: 1/22/2009	Analyst: <b>SRB</b>
Aluminum	10000	1000		µg/L	20	1/23/2009 03:52 PM
Antimony	ND	0.50		µg/L	1	1/23/2009 03:15 PM
Arsenic	4.2	1.0		µg/L	1	1/23/2009 03:15 PM
Barium	140	10		µg/L	10	1/23/2009 03:57 PM
Beryllium	ND	25		µg/L	50	1/23/2009 04:12 PM
Cadmium	ND	0.50		µg/L	1	1/23/2009 03:15 PM
Chromium	14	0.50		µg/L	1	1/23/2009 03:15 PM
Copper	15	1.0		µg/L	1	1/23/2009 03:15 PM
Lead	5.7	1.0		µg/L	1	1/23/2009 03:15 PM
Magnesium	50000	1000		µg/L	20	1/23/2009 03:52 PM
Nickel	9.0	1.0		µg/L	1	1/23/2009 03:15 PM
Selenium	0.65	0.50		µg/L	1	1/23/2009 03:15 PM
Silver	ND	0.50		µg/L	1	1/23/2009 03:15 PM
Thallium	ND	0.50		µg/L	1	1/23/2009 03:15 PM
Zinc	58	10		µg/L	1	1/23/2009 03:15 PM

**CYANIDE, TOTAL**

**SM4500-CN E**

RunID: WETCHEM3_090120C	QC Batch: 52419				PrepDate: 1/20/2009	Analyst: <b>AMM</b>
Cyanide	ND	0.010		mg/L	1	1/22/2009

**SURFACTANTS**

**SM5540C**

RunID: WETCHEM3_090120B	QC Batch: 52374				PrepDate: 1/20/2009	Analyst: <b>AMM</b>
MBAS	ND	0.050		mg/L	1	1/21/2009

**ANIONS BY ION CHROMATOGRAPHY**

**EPA 300.0**

RunID: IC3_090121B	QC Batch: R104852				PrepDate:	Analyst: <b>CBB</b>
Chloride	26	10		mg/L	20	1/21/2009 05:04 PM

**Qualifiers:** B Analyte detected in the associated Method Blank E Value above quantitation range  
H Holding times for preparation or analysis exceeded ND Not Detected at the Reporting Limit  
S Spike/Surrogate outside of limits due to matrix interference Results are wet unless otherwise specified  
DO Surrogate Diluted Out



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**ANALYTICAL RESULTS**

Print Date: 28-Jan-09

**CLIENT:** Ninyo & Moore  
**Lab Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001  
**Lab ID:** 103365-002

**Client Sample ID:** E  
**Collection Date:** 1/20/2009 11:40:00 AM  
**Matrix:** WATER

Analyses	Result	PQL	Qual	Units	DF	Date Analyzed
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**ANIONS BY ION CHROMATOGRAPHY**

**EPA 300.0**

RunID: IC3_090121B	QC Batch: R104852				PrepDate:	Analyst: <b>CBB</b>
Fluoride	0.54	0.10		mg/L	1	1/21/2009 03:42 PM

**ANIONS BY ION CHROMATOGRAPHY**

**EPA 300.0**

RunID: IC3_090121B	QC Batch: R104852				PrepDate:	Analyst: <b>CBB</b>
Nitrogen, Nitrate (As N)	ND	0.10		mg/L	1	1/21/2009 03:42 PM

**ANIONS BY ION CHROMATOGRAPHY**

**EPA 300.0**

RunID: IC3_090121B	QC Batch: R104852				PrepDate:	Analyst: <b>CBB</b>
Sulfate	190	20		mg/L	20	1/21/2009 05:04 PM

**MERCURY BY COLD VAPOR TECHNIQUE**

**EPA 245.1**

RunID: AA5_090122G	QC Batch: 52340				PrepDate: 1/21/2009	Analyst: <b>LKN</b>
Mercury	ND	0.20		µg/L	1	1/22/2009 03:39 PM

**TOTAL FILTERABLE RESIDUE**

**SM2540C**

RunID: WETCHEM_090123C	QC Batch: 52450				PrepDate: 1/22/2009	Analyst: <b>PU</b>
Total Dissolved Solids (Residue, Filterable)	600	10		mg/L	1	1/22/2009 09:00 AM

**Qualifiers:** B Analyte detected in the associated Method Blank  
 H Holding times for preparation or analysis exceeded  
 S Spike/Surrogate outside of limits due to matrix interference  
 DO Surrogate Diluted Out  
 E Value above quantitation range  
 ND Not Detected at the Reporting Limit  
 Results are wet unless otherwise specified



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**CLIENT:** Ninyo & Moore  
**Work Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001

**ANALYTICAL QC SUMMARY REPORT**

**TestCode: 160.1\_2540C\_W**

Sample ID: <b>103365-002B-DUP</b>	SampType: <b>DUP</b>	TestCode: <b>160.1_2540C</b>	Units: <b>mg/L</b>	Prep Date: <b>1/22/2009</b>	RunNo: <b>104824</b>						
Client ID: <b>E</b>	Batch ID: <b>52450</b>	TestNo: <b>SM2540C</b>		Analysis Date: <b>1/22/2009</b>	SeqNo: <b>1639860</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

Total Dissolved Solids (Residue, Filtera 604.000 10 599.0 0.831 10

Sample ID: <b>LCS-52450</b>	SampType: <b>LCS</b>	TestCode: <b>160.1_2540C</b>	Units: <b>mg/L</b>	Prep Date: <b>1/22/2009</b>	RunNo: <b>104824</b>						
Client ID: <b>LCSW</b>	Batch ID: <b>52450</b>	TestNo: <b>SM2540C</b>		Analysis Date: <b>1/22/2009</b>	SeqNo: <b>1639861</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

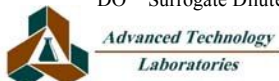
Total Dissolved Solids (Residue, Filtera 974.000 10 970.0 0 100 80 120

Sample ID: <b>MB-52450</b>	SampType: <b>MBLK</b>	TestCode: <b>160.1_2540C</b>	Units: <b>mg/L</b>	Prep Date: <b>1/22/2009</b>	RunNo: <b>104824</b>						
Client ID: <b>PBW</b>	Batch ID: <b>52450</b>	TestNo: <b>SM2540C</b>		Analysis Date: <b>1/22/2009</b>	SeqNo: <b>1639862</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

Total Dissolved Solids (Residue, Filtera ND 10

**Qualifiers:**

- B Analyte detected in the associated Method Blank
- ND Not Detected at the Reporting Limit
- DO Surrogate Diluted Out
- E Value above quantitation range
- R RPD outside accepted recovery limits
- Calculations are based on raw values
- H Holding times for preparation or analysis exceeded
- S Spike/Surrogate outside of limits due to matrix interference



**CLIENT:** Ninyo & Moore  
**Work Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001

## ANALYTICAL QC SUMMARY REPORT

**TestCode: 200.7\_DW**

Sample ID: <b>MB-52462</b>	SampType: <b>MBLK</b>	TestCode: <b>200.7_DW</b>	Units: <b>mg/L</b>	Prep Date: <b>1/26/2009</b>	RunNo: <b>104943</b>						
Client ID: <b>PBW</b>	Batch ID: <b>52462</b>	TestNo: <b>EPA 200.7</b>	<b>EPA 200.7</b>	Analysis Date: <b>1/27/2009</b>	SeqNo: <b>1641868</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

Boron	ND	0.10
Iron	ND	0.10

Sample ID: <b>LCS-52462</b>	SampType: <b>LCS</b>	TestCode: <b>200.7_DW</b>	Units: <b>mg/L</b>	Prep Date: <b>1/26/2009</b>	RunNo: <b>104943</b>						
Client ID: <b>LCSW</b>	Batch ID: <b>52462</b>	TestNo: <b>EPA 200.7</b>	<b>EPA 200.7</b>	Analysis Date: <b>1/27/2009</b>	SeqNo: <b>1641869</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

Boron	1.810	0.10	2.000	0	90.5	85	115
Iron	3.792	0.10	4.000	0	94.8	85	115

Sample ID: <b>103365-001AMS</b>	SampType: <b>MS</b>	TestCode: <b>200.7_DW</b>	Units: <b>mg/L</b>	Prep Date: <b>1/26/2009</b>	RunNo: <b>104943</b>						
Client ID: <b>W</b>	Batch ID: <b>52462</b>	TestNo: <b>EPA 200.7</b>	<b>EPA 200.7</b>	Analysis Date: <b>1/27/2009</b>	SeqNo: <b>1641870</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

Boron	2.302	1.0	2.000	0.06386	112	78	121
Iron	4.814	1.0	4.000	0.3233	112	65	129

Sample ID: <b>103365-001AMSD</b>	SampType: <b>MSD</b>	TestCode: <b>200.7_DW</b>	Units: <b>mg/L</b>	Prep Date: <b>1/26/2009</b>	RunNo: <b>104943</b>						
Client ID: <b>W</b>	Batch ID: <b>52462</b>	TestNo: <b>EPA 200.7</b>	<b>EPA 200.7</b>	Analysis Date: <b>1/27/2009</b>	SeqNo: <b>1641871</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

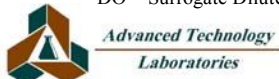
Boron	2.228	1.0	2.000	0.06386	108	78	121	2.302	3.27	20
Iron	4.668	1.0	4.000	0.3233	109	65	129	4.814	3.10	20

Sample ID: <b>103365-001ADUP</b>	SampType: <b>DUP</b>	TestCode: <b>200.7_DW</b>	Units: <b>mg/L</b>	Prep Date: <b>1/26/2009</b>	RunNo: <b>104943</b>						
Client ID: <b>W</b>	Batch ID: <b>52462</b>	TestNo: <b>EPA 200.7</b>	<b>EPA 200.7</b>	Analysis Date: <b>1/27/2009</b>	SeqNo: <b>1641873</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

Boron	0.064	0.10						0.06386	0	20
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**Qualifiers:**

- |   |  |  |
|---|--|--|
| B Analyte detected in the associated Method Blank | E Value above quantitation range       | H Holding times for preparation or analysis exceeded           |
| ND Not Detected at the Reporting Limit            | R RPD outside accepted recovery limits | S Spike/Surrogate outside of limits due to matrix interference |
| DO Surrogate Diluted Out                          | Calculations are based on raw values   |  |



**CLIENT:** Ninyo & Moore  
**Work Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001

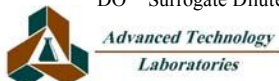
## ANALYTICAL QC SUMMARY REPORT

**TestCode:** 200.7\_DW

Sample ID: <b>103365-001ADUP</b>	SampType: <b>DUP</b>	TestCode: <b>200.7_DW</b>	Units: <b>mg/L</b>	Prep Date: <b>1/26/2009</b>	RunNo: <b>104943</b>						
Client ID: <b>W</b>	Batch ID: <b>52462</b>	TestNo: <b>EPA 200.7</b>	<b>EPA 200.7</b>	Analysis Date: <b>1/27/2009</b>	SeqNo: <b>1641873</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Iron	0.375	0.10						0.3233	14.9	20	

**Qualifiers:**

- |   |  |  |
|---|--|--|
| B Analyte detected in the associated Method Blank | E Value above quantitation range       | H Holding times for preparation or analysis exceeded           |
| ND Not Detected at the Reporting Limit            | R RPD outside accepted recovery limits | S Spike/Surrogate outside of limits due to matrix interference |
| DO Surrogate Diluted Out                          | Calculations are based on raw values   |  |



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**CLIENT:** Ninyo & Moore  
**Work Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001

## ANALYTICAL QC SUMMARY REPORT

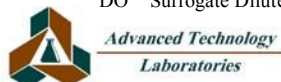
**TestCode: 200.8\_W**

Sample ID: <b>MB-52388</b>	SampType: <b>MBLK</b>	TestCode: <b>200.8_W</b>	Units: <b>µg/L</b>	Prep Date: <b>1/22/2009</b>	RunNo: <b>104825</b>						
Client ID: <b>PBW</b>	Batch ID: <b>52388</b>	TestNo: <b>EPA 200.8</b>	<b>EPA 200.8</b>	Analysis Date: <b>1/23/2009</b>	SeqNo: <b>1639863</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Aluminum	ND	50									
Antimony	0.033	0.50									
Arsenic	ND	1.0									
Barium	ND	1.0									
Beryllium	ND	0.50									
Cadmium	ND	0.50									
Chromium	0.153	0.50									
Copper	ND	1.0									
Lead	ND	1.0									
Magnesium	ND	50									
Nickel	ND	1.0									
Selenium	ND	0.50									
Silver	ND	0.50									
Thallium	ND	0.50									
Zinc	ND	10									

Sample ID: <b>LCS-52388</b>	SampType: <b>LCS</b>	TestCode: <b>200.8_W</b>	Units: <b>µg/L</b>	Prep Date: <b>1/22/2009</b>	RunNo: <b>104825</b>						
Client ID: <b>LCSW</b>	Batch ID: <b>52388</b>	TestNo: <b>EPA 200.8</b>	<b>EPA 200.8</b>	Analysis Date: <b>1/23/2009</b>	SeqNo: <b>1639864</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Aluminum	103.918	50	100.0	0	104	85	115				
Antimony	9.548	0.50	10.00	0.03250	95.2	85	115				
Arsenic	9.536	1.0	10.00	0	95.4	85	115				
Barium	10.039	1.0	10.00	0	100	85	115				
Beryllium	9.698	0.50	10.00	0	97.0	85	115				
Cadmium	9.350	0.50	10.00	0	93.5	85	115				
Chromium	10.180	0.50	10.00	0.1525	100	85	115				
Copper	10.853	1.0	10.00	0	109	85	115				
Lead	10.056	1.0	10.00	0	101	85	115				
Magnesium	528.141	50	500.0	0	106	85	115				

**Qualifiers:**

- |   |  |  |
|---|--|--|
| B Analyte detected in the associated Method Blank | E Value above quantitation range       | H Holding times for preparation or analysis exceeded           |
| ND Not Detected at the Reporting Limit            | R RPD outside accepted recovery limits | S Spike/Surrogate outside of limits due to matrix interference |
| DO Surrogate Diluted Out                          | Calculations are based on raw values   |  |



**CLIENT:** Ninyo & Moore  
**Work Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001

## ANALYTICAL QC SUMMARY REPORT

**TestCode: 200.8\_W**

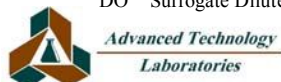
Sample ID: <b>LCS-52388</b>		SampType: <b>LCS</b>		TestCode: <b>200.8_W</b>		Units: <b>µg/L</b>		Prep Date: <b>1/22/2009</b>		RunNo: <b>104825</b>	
Client ID: <b>LCSW</b>		Batch ID: <b>52388</b>		TestNo: <b>EPA 200.8</b>		<b>EPA 200.8</b>		Analysis Date: <b>1/23/2009</b>		SeqNo: <b>1639864</b>	
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Nickel	9.984	1.0	10.00	0	99.8	85	115				
Selenium	9.976	0.50	10.00	0	99.8	85	115				
Silver	9.218	0.50	10.00	0	92.2	85	115				
Thallium	9.943	0.50	10.00	0	99.4	85	115				
Zinc	96.104	10	100.0	0	96.1	85	115				

Sample ID: <b>103365-001A-MS</b>		SampType: <b>MS</b>		TestCode: <b>200.8_W</b>		Units: <b>µg/L</b>		Prep Date: <b>1/22/2009</b>		RunNo: <b>104825</b>	
Client ID: <b>W</b>		Batch ID: <b>52388</b>		TestNo: <b>EPA 200.8</b>		<b>EPA 200.8</b>		Analysis Date: <b>1/23/2009</b>		SeqNo: <b>1639866</b>	
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Aluminum	406.824	50	100.0	286.3	120	70	130				
Antimony	10.651	0.50	10.00	0.2988	104	70	130				
Arsenic	11.316	1.0	10.00	1.166	102	70	130				
Barium	54.129	1.0	10.00	45.72	84.1	70	130				
Cadmium	9.964	0.50	10.00	0.01625	99.5	70	130				
Chromium	10.300	0.50	10.00	0.7438	95.6	70	130				
Copper	10.838	1.0	10.00	1.689	91.5	70	130				
Lead	10.036	1.0	10.00	0.2375	98.0	70	130				
Nickel	12.128	1.0	10.00	3.289	88.4	70	130				
Selenium	11.051	0.50	10.00	1.288	97.6	70	130				
Silver	9.776	0.50	10.00	0	97.8	70	130				
Thallium	9.556	0.50	10.00	0	95.6	70	130				
Zinc	90.953	10	100.0	5.472	85.5	70	130				

Sample ID: <b>103365-001A-MSD</b>		SampType: <b>MSD</b>		TestCode: <b>200.8_W</b>		Units: <b>µg/L</b>		Prep Date: <b>1/22/2009</b>		RunNo: <b>104825</b>	
Client ID: <b>W</b>		Batch ID: <b>52388</b>		TestNo: <b>EPA 200.8</b>		<b>EPA 200.8</b>		Analysis Date: <b>1/23/2009</b>		SeqNo: <b>1639867</b>	
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Aluminum	404.550	50	100.0	286.3	118	70	130	406.8	0.560	20	
Antimony	10.484	0.50	10.00	0.2988	102	70	130	10.65	1.59	20	

**Qualifiers:**

- |   |  |  |
|---|--|--|
| B Analyte detected in the associated Method Blank | E Value above quantitation range       | H Holding times for preparation or analysis exceeded           |
| ND Not Detected at the Reporting Limit            | R RPD outside accepted recovery limits | S Spike/Surrogate outside of limits due to matrix interference |
| DO Surrogate Diluted Out                          | Calculations are based on raw values   |  |



**CLIENT:** Ninyo & Moore  
**Work Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001

## ANALYTICAL QC SUMMARY REPORT

**TestCode: 200.8\_W**

Sample ID: <b>103365-001A-MSD</b>		SampType: <b>MSD</b>		TestCode: <b>200.8_W</b>		Units: <b>µg/L</b>		Prep Date: <b>1/22/2009</b>		RunNo: <b>104825</b>	
Client ID: <b>W</b>		Batch ID: <b>52388</b>		TestNo: <b>EPA 200.8</b>		<b>EPA 200.8</b>		Analysis Date: <b>1/23/2009</b>		SeqNo: <b>1639867</b>	
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Arsenic	11.299	1.0	10.00	1.166	101	70	130	11.32	0.155	20	
Barium	52.776	1.0	10.00	45.72	70.6	70	130	54.13	2.53	20	
Cadmium	9.574	0.50	10.00	0.01625	95.6	70	130	9.964	3.99	20	
Chromium	9.961	0.50	10.00	0.7438	92.2	70	130	10.30	3.34	20	
Copper	10.634	1.0	10.00	1.689	89.5	70	130	10.84	1.90	20	
Lead	9.271	1.0	10.00	0.2375	90.3	70	130	10.04	7.92	20	
Nickel	11.469	1.0	10.00	3.289	81.8	70	130	12.13	5.58	20	
Selenium	11.320	0.50	10.00	1.288	100	70	130	11.05	2.40	20	
Silver	9.193	0.50	10.00	0	91.9	70	130	9.776	6.15	20	
Thallium	9.185	0.50	10.00	0	91.9	70	130	9.556	3.96	20	
Zinc	90.741	10	100.0	5.472	85.3	70	130	90.95	0.233	20	

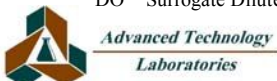
Sample ID: <b>103365-001A-MS</b>		SampType: <b>MS</b>		TestCode: <b>200.8_W</b>		Units: <b>µg/L</b>		Prep Date: <b>1/22/2009</b>		RunNo: <b>104825</b>	
Client ID: <b>W</b>		Batch ID: <b>52388</b>		TestNo: <b>EPA 200.8</b>		<b>EPA 200.8</b>		Analysis Date: <b>1/23/2009</b>		SeqNo: <b>1639870</b>	
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Magnesium	73252.875	1000	500.0	81500	-1650	70	130				S

Sample ID: <b>103365-001A-MSD</b>		SampType: <b>MSD</b>		TestCode: <b>200.8_W</b>		Units: <b>µg/L</b>		Prep Date: <b>1/22/2009</b>		RunNo: <b>104825</b>	
Client ID: <b>W</b>		Batch ID: <b>52388</b>		TestNo: <b>EPA 200.8</b>		<b>EPA 200.8</b>		Analysis Date: <b>1/23/2009</b>		SeqNo: <b>1639871</b>	
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Magnesium	73899.375	1000	500.0	81500	-1520	70	130	80000	7.93	20	S

Sample ID: <b>103365-001A-MS</b>		SampType: <b>MS</b>		TestCode: <b>200.8_W</b>		Units: <b>µg/L</b>		Prep Date: <b>1/22/2009</b>		RunNo: <b>104825</b>	
Client ID: <b>W</b>		Batch ID: <b>52388</b>		TestNo: <b>EPA 200.8</b>		<b>EPA 200.8</b>		Analysis Date: <b>1/23/2009</b>		SeqNo: <b>1639873</b>	
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Beryllium	8.500	25	10.00	0	85.0	70	130				

**Qualifiers:**

- |   |  |  |
|---|--|--|
| B Analyte detected in the associated Method Blank | E Value above quantitation range       | H Holding times for preparation or analysis exceeded           |
| ND Not Detected at the Reporting Limit            | R RPD outside accepted recovery limits | S Spike/Surrogate outside of limits due to matrix interference |
| DO Surrogate Diluted Out                          | Calculations are based on raw values   |  |



**CLIENT:** Ninyo & Moore  
**Work Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001

## ANALYTICAL QC SUMMARY REPORT

**TestCode:** 200.8\_W

Sample ID: <b>103365-001A-MSD</b>	SampType: <b>MSD</b>	TestCode: <b>200.8_W</b>	Units: <b>µg/L</b>	Prep Date: <b>1/22/2009</b>	RunNo: <b>104825</b>						
Client ID: <b>W</b>	Batch ID: <b>52388</b>	TestNo: <b>EPA 200.8</b>	<b>EPA 200.8</b>	Analysis Date: <b>1/23/2009</b>	SeqNo: <b>1639874</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Beryllium	10.250	25	10.00	0	103	70	130	4.715	0	20	

**Qualifiers:**

- |    |   |                                      |                                      |   |  |
|----|---|--------------------------------------|--------------------------------------|---|--|
| B  | Analyte detected in the associated Method Blank | E                                    | Value above quantitation range       | H | Holding times for preparation or analysis exceeded           |
| ND | Not Detected at the Reporting Limit             | R                                    | RPD outside accepted recovery limits | S | Spike/Surrogate outside of limits due to matrix interference |
| DO | Surrogate Diluted Out                           | Calculations are based on raw values |                                      |   |  |



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**CLIENT:** Ninyo & Moore  
**Work Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001

## ANALYTICAL QC SUMMARY REPORT

**TestCode: 245.1\_W**

Sample ID: <b>MB-52340</b>	SampType: <b>MBLK</b>	TestCode: <b>245.1_W</b>	Units: <b>µg/L</b>	Prep Date: <b>1/21/2009</b>	RunNo: <b>104782</b>						
Client ID: <b>PBW</b>	Batch ID: <b>52340</b>	TestNo: <b>EPA 245.1</b>		Analysis Date: <b>1/22/2009</b>	SeqNo: <b>1639015</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Mercury	ND	0.20									

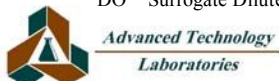
Sample ID: <b>LCS-52340</b>	SampType: <b>LCS</b>	TestCode: <b>245.1_W</b>	Units: <b>µg/L</b>	Prep Date: <b>1/21/2009</b>	RunNo: <b>104782</b>						
Client ID: <b>LCSW</b>	Batch ID: <b>52340</b>	TestNo: <b>EPA 245.1</b>		Analysis Date: <b>1/22/2009</b>	SeqNo: <b>1639016</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Mercury	10.774	0.20	10.00	0	108	85	115				

Sample ID: <b>103366-005B-MS</b>	SampType: <b>MS</b>	TestCode: <b>245.1_W</b>	Units: <b>µg/L</b>	Prep Date: <b>1/21/2009</b>	RunNo: <b>104782</b>						
Client ID: <b>ZZZZZZ</b>	Batch ID: <b>52340</b>	TestNo: <b>EPA 245.1</b>		Analysis Date: <b>1/22/2009</b>	SeqNo: <b>1639017</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Mercury	10.963	0.20	10.00	0	110	70	130				

Sample ID: <b>103366-005B-MSD</b>	SampType: <b>MSD</b>	TestCode: <b>245.1_W</b>	Units: <b>µg/L</b>	Prep Date: <b>1/21/2009</b>	RunNo: <b>104782</b>						
Client ID: <b>ZZZZZZ</b>	Batch ID: <b>52340</b>	TestNo: <b>EPA 245.1</b>		Analysis Date: <b>1/22/2009</b>	SeqNo: <b>1639018</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Mercury	11.001	0.20	10.00	0	110	70	130	10.96	0.347	20	

**Qualifiers:**

- |   |  |  |
|---|--|--|
| B Analyte detected in the associated Method Blank | E Value above quantitation range       | H Holding times for preparation or analysis exceeded           |
| ND Not Detected at the Reporting Limit            | R RPD outside accepted recovery limits | S Spike/Surrogate outside of limits due to matrix interference |
| DO Surrogate Diluted Out                          | Calculations are based on raw values   |  |



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**Project:** Metrolink Tunnel 26, 207613001

## ANALYTICAL QC SUMMARY REPORT

**TestCode: 300\_W\_CL**

Sample ID: <b>MB-R104852</b>	SampType: <b>MBLK</b>	TestCode: <b>300_W_CL</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>PBW</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640352</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Chloride	ND	0.50									

Sample ID: <b>LCS-R104852</b>	SampType: <b>LCS</b>	TestCode: <b>300_W_CL</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>LCSW</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640353</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Chloride	2.410	0.50	2.500	0	96.4	90	110				

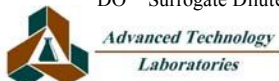
Sample ID: <b>103365-001B-DUP</b>	SampType: <b>DUP</b>	TestCode: <b>300_W_CL</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>W</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640355</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Chloride	54.570	25						51.24	6.29	20	

Sample ID: <b>103365-001B-MS</b>	SampType: <b>MS</b>	TestCode: <b>300_W_CL</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>W</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640356</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Chloride	180.755	25	125.0	51.24	104	80	120				

Sample ID: <b>103365-001B-MSD</b>	SampType: <b>MSD</b>	TestCode: <b>300_W_CL</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>W</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640357</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Chloride	178.960	25	125.0	51.24	102	80	120	180.8	0.998	20	

**Qualifiers:**

- |   |  |  |
|---|--|--|
| B Analyte detected in the associated Method Blank | E Value above quantitation range       | H Holding times for preparation or analysis exceeded           |
| ND Not Detected at the Reporting Limit            | R RPD outside accepted recovery limits | S Spike/Surrogate outside of limits due to matrix interference |
| DO Surrogate Diluted Out                          | Calculations are based on raw values   |  |



**CLIENT:** Ninyo & Moore  
**Work Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001

## ANALYTICAL QC SUMMARY REPORT

**TestCode: 300\_W\_F**

Sample ID: <b>MB-R104852</b>	SampType: <b>MBLK</b>	TestCode: <b>300_W_F</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>PBW</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640331</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Fluoride	ND	0.10									

Sample ID: <b>LCS-R104852</b>	SampType: <b>LCS</b>	TestCode: <b>300_W_F</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>LCSW</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640332</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Fluoride	2.443	0.10	2.500	0	97.7	90	110				

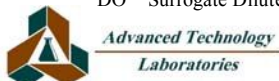
Sample ID: <b>103365-001B-DUP</b>	SampType: <b>DUP</b>	TestCode: <b>300_W_F</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>W</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640335</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Fluoride	0.314	0.10						0.3394	7.74	20	

Sample ID: <b>103365-001B-MS</b>	SampType: <b>MS</b>	TestCode: <b>300_W_F</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>W</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640336</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Fluoride	122.885	5.0	125.0	0.3394	98.0	80	120				

Sample ID: <b>103365-001B-MSD</b>	SampType: <b>MSD</b>	TestCode: <b>300_W_F</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>W</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640337</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Fluoride	122.340	5.0	125.0	0.3394	97.6	80	120	122.9	0.444	20	

**Qualifiers:**

- |   |  |  |
|---|--|--|
| B Analyte detected in the associated Method Blank | E Value above quantitation range       | H Holding times for preparation or analysis exceeded           |
| ND Not Detected at the Reporting Limit            | R RPD outside accepted recovery limits | S Spike/Surrogate outside of limits due to matrix interference |
| DO Surrogate Diluted Out                          | Calculations are based on raw values   |  |





**CLIENT:** Ninyo & Moore  
**Work Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001

## ANALYTICAL QC SUMMARY REPORT

**TestCode: 300\_W\_NO3**

Sample ID: <b>MB-R104852</b>	SampType: <b>MBLK</b>	TestCode: <b>300_W_NO3</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>PBW</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640366</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Nitrogen, Nitrate (As N)	ND	0.10									

Sample ID: <b>LCS-R104852</b>	SampType: <b>LCS</b>	TestCode: <b>300_W_NO3</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>LCSW</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640367</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Nitrogen, Nitrate (As N)	2.379	0.10	2.500	0	95.2	90	110				

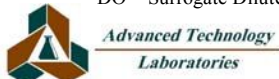
Sample ID: <b>103365-001B-DUP</b>	SampType: <b>DUP</b>	TestCode: <b>300_W_NO3</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>W</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640370</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Nitrogen, Nitrate (As N)	ND	0.10						0	0	20	

Sample ID: <b>103365-001B-MS</b>	SampType: <b>MS</b>	TestCode: <b>300_W_NO3</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>W</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640371</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Nitrogen, Nitrate (As N)	119.460	5.0	125.0	0	95.6	80	120				

Sample ID: <b>103365-001B-MSD</b>	SampType: <b>MSD</b>	TestCode: <b>300_W_NO3</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>W</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640372</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Nitrogen, Nitrate (As N)	118.010	5.0	125.0	0	94.4	80	120	119.5	1.22	20	

**Qualifiers:**

- |   |  |  |
|---|--|--|
| B Analyte detected in the associated Method Blank | E Value above quantitation range       | H Holding times for preparation or analysis exceeded           |
| ND Not Detected at the Reporting Limit            | R RPD outside accepted recovery limits | S Spike/Surrogate outside of limits due to matrix interference |
| DO Surrogate Diluted Out                          | Calculations are based on raw values   |  |



**CLIENT:** Ninyo & Moore  
**Work Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001

## ANALYTICAL QC SUMMARY REPORT

**TestCode: 300\_W\_SO4**

Sample ID: <b>MB-R104852</b>	SampType: <b>MBLK</b>	TestCode: <b>300_W_SO4</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>PBW</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640377</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Sulfate	ND	1.0									

Sample ID: <b>LCS-R104852</b>	SampType: <b>LCS</b>	TestCode: <b>300_W_SO4</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>LCSW</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640378</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Sulfate	4.583	1.0	5.000	0	91.7	90	110				

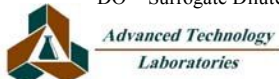
Sample ID: <b>103365-001B-DUP</b>	SampType: <b>DUP</b>	TestCode: <b>300_W_SO4</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>W</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640380</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Sulfate	361.220	50						359.5	0.481	20	

Sample ID: <b>103365-001B-MS</b>	SampType: <b>MS</b>	TestCode: <b>300_W_SO4</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>W</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640381</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Sulfate	630.515	50	250.0	359.5	108	80	120				

Sample ID: <b>103365-001B-MSD</b>	SampType: <b>MSD</b>	TestCode: <b>300_W_SO4</b>	Units: <b>mg/L</b>	Prep Date:	RunNo: <b>104852</b>						
Client ID: <b>W</b>	Batch ID: <b>R104852</b>	TestNo: <b>EPA 300.0</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1640382</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual
Sulfate	635.650	50	250.0	359.5	110	80	120	630.5	0.811	20	

**Qualifiers:**

- |   |  |  |
|---|--|--|
| B Analyte detected in the associated Method Blank | E Value above quantitation range       | H Holding times for preparation or analysis exceeded           |
| ND Not Detected at the Reporting Limit            | R RPD outside accepted recovery limits | S Spike/Surrogate outside of limits due to matrix interference |
| DO Surrogate Diluted Out                          | Calculations are based on raw values   |  |



**CLIENT:** Ninyo & Moore  
**Work Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001

## ANALYTICAL QC SUMMARY REPORT

**TestCode:** 335.2\_4500CNE\_W

Sample ID: <b>103365-001CMS</b>	SampType: <b>MS</b>	TestCode: <b>335.2_4500C</b>	Units: <b>mg/L</b>	Prep Date: <b>1/20/2009</b>	RunNo: <b>104774</b>						
Client ID: <b>W</b>	Batch ID: <b>52419</b>	TestNo: <b>SM4500-CN E</b>		Analysis Date: <b>1/22/2009</b>	SeqNo: <b>1638916</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

Cyanide	0.368	0.010	0.4000	0.003000	91.2	80	120				
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Sample ID: <b>103365-001CMSD</b>	SampType: <b>MSD</b>	TestCode: <b>335.2_4500C</b>	Units: <b>mg/L</b>	Prep Date: <b>1/20/2009</b>	RunNo: <b>104774</b>						
Client ID: <b>W</b>	Batch ID: <b>52419</b>	TestNo: <b>SM4500-CN E</b>		Analysis Date: <b>1/22/2009</b>	SeqNo: <b>1638917</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

Cyanide	0.382	0.010	0.4000	0.003000	94.8	80	120	0.3680	3.73	20	
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Sample ID: <b>LCS-52419</b>	SampType: <b>LCS</b>	TestCode: <b>335.2_4500C</b>	Units: <b>mg/L</b>	Prep Date: <b>1/20/2009</b>	RunNo: <b>104774</b>						
Client ID: <b>LCSW</b>	Batch ID: <b>52419</b>	TestNo: <b>SM4500-CN E</b>		Analysis Date: <b>1/22/2009</b>	SeqNo: <b>1638920</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

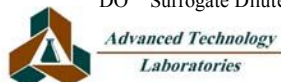
Cyanide	0.368	0.010	0.4000	0	92.0	80	120				
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Sample ID: <b>MB-52419</b>	SampType: <b>MBLK</b>	TestCode: <b>335.2_4500C</b>	Units: <b>mg/L</b>	Prep Date: <b>1/20/2009</b>	RunNo: <b>104774</b>						
Client ID: <b>PBW</b>	Batch ID: <b>52419</b>	TestNo: <b>SM4500-CN E</b>		Analysis Date: <b>1/22/2009</b>	SeqNo: <b>1638921</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

Cyanide	ND	0.010									
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**Qualifiers:**

- |   |  |  |
|---|--|--|
| B Analyte detected in the associated Method Blank | E Value above quantitation range       | H Holding times for preparation or analysis exceeded           |
| ND Not Detected at the Reporting Limit            | R RPD outside accepted recovery limits | S Spike/Surrogate outside of limits due to matrix interference |
| DO Surrogate Diluted Out                          | Calculations are based on raw values   |  |



**CLIENT:** Ninyo & Moore  
**Work Order:** 103365  
**Project:** Metrolink Tunnel 26, 207613001

## ANALYTICAL QC SUMMARY REPORT

**TestCode:** 425.1\_5540C\_W

Sample ID: <b>103365-001BMS</b>	SampType: <b>MS</b>	TestCode: <b>425.1_5540C</b>	Units: <b>mg/L</b>	Prep Date: <b>1/20/2009</b>	RunNo: <b>104712</b>						
Client ID: <b>W</b>	Batch ID: <b>52374</b>	TestNo: <b>SM5540C</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1637721</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

MBAS	0.436	0.050	0.5000	0	87.2	80	120				
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Sample ID: <b>103365-001BMSD</b>	SampType: <b>MSD</b>	TestCode: <b>425.1_5540C</b>	Units: <b>mg/L</b>	Prep Date: <b>1/20/2009</b>	RunNo: <b>104712</b>						
Client ID: <b>W</b>	Batch ID: <b>52374</b>	TestNo: <b>SM5540C</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1637722</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

MBAS	0.457	0.050	0.5000	0	91.4	80	120	0.4360	4.70	20	
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Sample ID: <b>LCS-52374</b>	SampType: <b>LCS</b>	TestCode: <b>425.1_5540C</b>	Units: <b>mg/L</b>	Prep Date: <b>1/20/2009</b>	RunNo: <b>104712</b>						
Client ID: <b>LCSW</b>	Batch ID: <b>52374</b>	TestNo: <b>SM5540C</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1637724</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

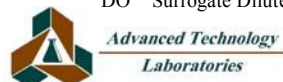
MBAS	0.466	0.050	0.5000	0	93.2	80	120				
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Sample ID: <b>MB-52374</b>	SampType: <b>MBLK</b>	TestCode: <b>425.1_5540C</b>	Units: <b>mg/L</b>	Prep Date: <b>1/20/2009</b>	RunNo: <b>104712</b>						
Client ID: <b>PBW</b>	Batch ID: <b>52374</b>	TestNo: <b>SM5540C</b>		Analysis Date: <b>1/21/2009</b>	SeqNo: <b>1637725</b>						
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	RPD Ref Val	%RPD	RPDLimit	Qual

MBAS	ND	0.050									
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**Qualifiers:**

- |   |  |  |
|---|--|--|
| B Analyte detected in the associated Method Blank | E Value above quantitation range       | H Holding times for preparation or analysis exceeded           |
| ND Not Detected at the Reporting Limit            | R RPD outside accepted recovery limits | S Spike/Surrogate outside of limits due to matrix interference |
| DO Surrogate Diluted Out                          | Calculations are based on raw values   |  |



**CERTIFICATE OF ANALYSIS**

<b>Client:</b> Advanced Technology Laboratories 3275 Walnut Street Signal Hill, CA 90755	<b>Report Date:</b> 02/13/09 14:39
	<b>Received Date:</b> 01/21/09 12:50
	<b>Turn Around:</b> Normal
<b>Attention:</b> Rachelle Arada	<b>Work Order #:</b> 9A21040
<b>Phone:</b> (562) 989-4045	<b>PO Number:</b> SCO4289
<b>Fax:</b> (562) 989-4040	<b>Client Project:</b> Attachment B

**NELAP #04229CA ELAP#1132 NEVADA #CA211 HAWAII LACSD #10143**

*The results in this report apply to the samples analyzed in accordance with the Chain of Custody document. Weck Laboratories, Inc. certifies that the test results meet all NELAC requirements unless noted in the case narrative. This analytical report is confidential and is only intended for the use of Weck Laboratories, Inc. and its client. This report contains the Chain of Custody document, which is an integral part of it, and can only be reproduced in full with the authorization of Weck Laboratories, Inc.*

Dear Rachelle Arada :

Enclosed are the results of analyses for samples received 01/21/09 12:50 with the Chain of Custody document. The samples were received in good condition, at 7.9 °C and on ice. All analysis met the method criteria except as noted below or in the report with data qualifiers.

**Reviewed by:**

Kim G Tu  
Project Manager





Advanced Technology Laboratories  
3275 Walnut Street  
Signal Hill CA, 90755

**Report ID:** 9A21040  
**Project ID:** Attachment B

**Date Received:** 01/21/09 12:50  
**Date Reported:** 02/13/09 14:39

**ANALYTICAL REPORT FOR SAMPLES**

<b>Sample ID</b>	<b>Sampled by:</b>	<b>Sample Comments</b>	<b>Lab ID</b>	<b>Matrix</b>	<b>Date Sampled</b>
103365-001/W	Client		9A21040-01	Water	01/20/09 08:00
103365-002/E	Client		9A21040-02	Water	01/20/09 11:40



Advanced Technology Laboratories  
3275 Walnut Street  
Signal Hill CA, 90755

Report ID: 9A21040  
Project ID: Attachment B

Date Received: 01/21/09 12:50  
Date Reported: 02/13/09 14:39

9A21040-01 103365-001/W

Sampled: 01/20/09 08:00

Sampled By: Client

Matrix: Water

Acid and Base/Neutral Extractables by EPA Method 625

Method: EPA 625 Batch: W9A1117 Prepared: 01/23/09 14:32 Analyzed: 01/27/09 18:13 Analyst: Ict

Analyte	Result	MRL	Units	Dilution	Qualifier
Surrogate: 2,4,6-Tribromophenol	76 %	0.1-157			
Surrogate: 2-Fluorobiphenyl	72 %	22-130			
Surrogate: 2-Fluorophenol	48 %	6-96			
Surrogate: Nitrobenzene-d5	74 %	34-139			
Surrogate: Phenol-d5	28 %	2-70			
Surrogate: Terphenyl-dl4	67 %	6-145			
1,2,4-Trichlorobenzene	ND	5.0	ug/l	1	
1,2-Dichlorobenzene	ND	2.0	ug/l	1	
1,2-Diphenylhydrazine	ND	1.0	ug/l	1	
1,3-Dichlorobenzene	ND	1.0	ug/l	1	
1,4-Dichlorobenzene	ND	1.0	ug/l	1	
2,4,6-Trichlorophenol	ND	10	ug/l	1	
2,4-Dichlorophenol	ND	5.0	ug/l	1	
2,4-Dimethylphenol	ND	2.0	ug/l	1	
2,4-Dinitrophenol	ND	10	ug/l	1	
2,4-Dinitrotoluene	ND	5.0	ug/l	1	
2,6-Dinitrotoluene	ND	5.0	ug/l	1	
2-Chloronaphthalene	ND	5.0	ug/l	1	
2-Chlorophenol	ND	5.0	ug/l	1	
2-Nitrophenol	ND	10	ug/l	1	
3,3'-Dichlorobenzidine	ND	5.0	ug/l	1	
4,6-Dinitro-2-methylphenol	ND	5.0	ug/l	1	
4-Bromophenyl phenyl ether	ND	5.0	ug/l	1	
4-Chloro-3-methylphenol	ND	1.0	ug/l	1	
4-Chlorophenyl phenyl ether	ND	5.0	ug/l	1	
4-Nitrophenol	ND	10	ug/l	1	
Acenaphthene	ND	1.0	ug/l	1	
Acenaphthylene	ND	5.0	ug/l	1	
Anthracene	ND	5.0	ug/l	1	
Benzidine	ND	5.0	ug/l	1	
Benzo (a) anthracene	ND	5.0	ug/l	1	
Benzo (a) pyrene	ND	10	ug/l	1	
Benzo (b) fluoranthene	ND	5.0	ug/l	1	
Benzo (g,h,i) perylene	ND	5.0	ug/l	1	
Benzo (k) fluoranthene	ND	10	ug/l	1	
Bis(2-chloroethoxy)methane	ND	5.0	ug/l	1	
Bis(2-chloroethyl)ether	ND	1.0	ug/l	1	
Bis(2-chloroisopropyl)ether	ND	2.0	ug/l	1	
Bis(2-ethylhexyl)phthalate	ND	5.0	ug/l	1	
Butyl benzyl phthalate	ND	5.0	ug/l	1	





Advanced Technology Laboratories  
3275 Walnut Street  
Signal Hill CA, 90755

Report ID: 9A21040  
Project ID: Attachment B

Date Received: 01/21/09 12:50  
Date Reported: 02/13/09 14:39

9A21040-01 103365-001/W

Sampled: 01/20/09 08:00

Sampled By: Client

Matrix: Water

Acid and Base/Neutral Extractables by EPA Method 625

Method: EPA 625	Batch: W9A1117	Prepared: 01/23/09 14:32	Analyzed: 01/27/09 18:13	Analyst: Ict	
Analyte	Result	MRL	Units	Dilution	Qualifier
Chrysene	ND	5.0	ug/l	1	
Dibenzo (a,h) anthracene	ND	10	ug/l	1	
Diethyl phthalate	ND	2.0	ug/l	1	
Dimethyl phthalate	ND	2.0	ug/l	1	
Di-n-butyl phthalate	ND	5.0	ug/l	1	
Di-n-octyl phthalate	ND	5.0	ug/l	1	
Fluoranthene	ND	1.0	ug/l	1	
Fluorene	ND	5.0	ug/l	1	
Hexachlorobenzene	ND	1.0	ug/l	1	
Hexachlorobutadiene	ND	1.0	ug/l	1	
Hexachlorocyclopentadiene	ND	10	ug/l	1	
Hexachloroethane	ND	1.0	ug/l	1	
Indeno (1,2,3-cd) pyrene	ND	10	ug/l	1	
Isophorone	ND	1.0	ug/l	1	
Naphthalene	ND	1.0	ug/l	1	
Nitrobenzene	ND	1.0	ug/l	1	
N-Nitrosodimethylamine	ND	5.0	ug/l	1	
N-Nitrosodi-n-propylamine	ND	5.0	ug/l	1	
N-Nitrosodiphenylamine	ND	1.0	ug/l	1	
Pentachlorophenol	ND	5.0	ug/l	1	
Phenanthrene	ND	5.0	ug/l	1	
Phenol	ND	1.0	ug/l	1	
Pyrene	ND	5.0	ug/l	1	

Carbamates and Urea Pesticides

Method: EPA 531.1	Batch: W9B0243	Prepared: 02/02/09 15:02	Analyzed: 02/03/09 02:51	Analyst: hmc	
Analyte	Result	MRL	Units	Dilution	Qualifier
3-Hydroxycarbofuran	ND	2.0	ug/l	1	
Aldicarb	ND	2.0	ug/l	1	
Aldicarb sulfone	ND	2.0	ug/l	1	
Aldicarb sulfoxide	ND	2.0	ug/l	1	
Carbaryl	ND	2.0	ug/l	1	
Carbofuran	ND	5.0	ug/l	1	
Methiocarb	ND	3.0	ug/l	1	
Methomyl	ND	2.0	ug/l	1	
Oxamyl	ND	2.0	ug/l	1	
Propoxur (Baygon)	ND	5.0	ug/l	1	

Chlorinated Herbicides

Method: EPA 515.3	Batch: W9A1461	Prepared: 01/30/09 00:00	Analyzed: 02/12/09 12:21	Analyst: dav
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Advanced Technology Laboratories  
3275 Walnut Street  
Signal Hill CA, 90755

Report ID: 9A21040  
Project ID: Attachment B

Date Received: 01/21/09 12:50  
Date Reported: 02/13/09 14:39

9A21040-01 103365-001/W

Sampled: 01/20/09 08:00

Sampled By: Client

Matrix: Water

**Chlorinated Herbicides**

Method: EPA 515.3	Batch: W9A1461	Prepared: 01/30/09 00:00	Analyzed: 02/12/09 12:21	Analyst: dav	
Analyte	Result	MRL	Units	Dilution	Qualifier
Surrogate: 2,4-DCAA	117 %	70-130			
2,4,5-T	ND	0.20	ug/l	1	
2,4,5-TP (Silvex)	ND	0.20	ug/l	1	
2,4-D	ND	0.40	ug/l	1	
2,4-DB	ND	2.0	ug/l	1	
3,5-Dichlorobenzoic acid	ND	1.0	ug/l	1	
Acifluorfen	ND	0.40	ug/l	1	
Bentazon	ND	2.0	ug/l	1	
Chloramben	ND	1.0	ug/l	1	
Dalapon	ND	0.40	ug/l	1	
DCPA	ND	0.10	ug/l	1	
Dicamba	ND	0.60	ug/l	1	
Dichloroprop	ND	0.30	ug/l	1	
Dinoseb	ND	0.40	ug/l	1	
Pentachlorophenol	ND	0.20	ug/l	1	
Picloram	ND	0.60	ug/l	1	

**Chlorinated Pesticides and/or PCBs**

Method: EPA 508	Batch: W9A1251	Prepared: 01/27/09 00:00	Analyzed: 01/30/09 15:00	Analyst: dav	
Analyte	Result	MRL	Units	Dilution	Qualifier
Surrogate: Decachlorobiphenyl	95 %	70-130			
Surrogate: Tetrachloro-meta-xylene	88 %	70-130			
4,4'-DDD	ND	0.010	ug/l	1	
4,4'-DDE	ND	0.010	ug/l	1	
4,4'-DDT	ND	0.010	ug/l	1	
Aldrin	ND	0.010	ug/l	1	
alpha-BHC	ND	0.010	ug/l	1	
beta-BHC	ND	0.010	ug/l	1	
Chlordane (tech)	ND	0.10	ug/l	1	
Chlorothalonil	ND	0.050	ug/l	1	
delta-BHC	ND	0.010	ug/l	1	
Dieldrin	ND	0.010	ug/l	1	
Endosulfan I	ND	0.010	ug/l	1	
Endosulfan II	ND	0.010	ug/l	1	
Endosulfan sulfate	ND	0.010	ug/l	1	
Endrin	ND	0.010	ug/l	1	
Endrin aldehyde	ND	0.010	ug/l	1	
gamma-BHC (Lindane)	ND	0.010	ug/l	1	
Heptachlor	ND	0.010	ug/l	1	
Heptachlor epoxide	ND	0.010	ug/l	1	



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Signal Hill CA, 90755

Report ID: 9A21040  
Project ID: Attachment B

Date Received: 01/21/09 12:50  
Date Reported: 02/13/09 14:39

**9A21040-01 103365-001/W**

Sampled: 01/20/09 08:00

Sampled By: Client

Matrix: Water

**Chlorinated Pesticides and/or PCBs**

Method: EPA 508	Batch: W9A1251	Prepared: 01/27/09 00:00	Analyzed: 01/30/09 15:00	Analyst: dav	
Analyte	Result	MRL	Units	Dilution	Qualifier
Hexachlorobenzene	ND	0.010	ug/l	1	
Hexachlorocyclopentadiene	ND	0.050	ug/l	1	
Methoxychlor	ND	0.010	ug/l	1	
PCB-1016	ND	0.10	ug/l	1	
PCB-1221	ND	0.10	ug/l	1	
PCB-1232	ND	0.10	ug/l	1	
PCB-1242	ND	0.10	ug/l	1	
PCB-1248	ND	0.10	ug/l	1	
PCB-1254	ND	0.10	ug/l	1	
PCB-1260	ND	0.10	ug/l	1	
PCBs, Total	ND	0.50	ug/l	1	
Propachlor	ND	0.050	ug/l	1	
Toxaphene	ND	1.0	ug/l	1	
Trifluralin	ND	0.010	ug/l	1	

**Conventional Chemistry/Physical Parameters by APHA/EPA/ASTM Methods**

Method: SM2120B	Batch: W9A1024	Prepared: 01/21/09 17:08	Analyzed: 01/21/09 18:30	Analyst: sml	
Analyte	Result	MRL	Units	Dilution	Qualifier
<b>Color</b>	<b>20</b>	3.0	Color Units	1	

**Fumigants by EPA Method 504.1**

Method: EPA 504.1	Batch: W9A1294	Prepared: 01/28/09 08:58	Analyzed: 01/29/09 16:30	Analyst: cwn	
Analyte	Result	MRL	Units	Dilution	Qualifier
1,2-Dibromo-3-chloropropane	ND	0.010	ug/l	1	
1,2-Dibromoethane (EDB)	ND	0.020	ug/l	1	

**Glyphosate by EPA 547**

Method: EPA 547	Batch: W9B0149	Prepared: 01/30/09 17:26	Analyzed: 01/30/09 18:29	Analyst: hmc	
Analyte	Result	MRL	Units	Dilution	Qualifier
Glyphosate	ND	5.0	ug/l	1	

**Radiological Parameters by APHA/EPA Methods**

Method: EPA 900.0	Batch: W9A1074	Prepared: 01/22/09 14:59	Analyzed: 01/30/09 10:17	Analyst: aab	
Analyte	Result	MRL	Units	Dilution	Qualifier
<b>Gross Beta</b>	<b>9.6</b>		pCi/L	1	
<b>Gross Beta counting error (+/-)</b>	<b>1.4</b>		pCi/L	1	
<b>Gross Beta MDA95</b>	<b>2.0</b>		pCi/L	1	

Method: SM7110C	Batch: W9A1141	Prepared: 01/24/09 12:37	Analyzed: 01/27/09 17:01	Analyst: abd	
Analyte	Result	MRL	Units	Dilution	Qualifier



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Sampled: 01/20/09 08:00      **9A21040-01**      **103365-001/W**      Sampled By: Client      Matrix: Water

**Radiological Parameters by APHA/EPA Methods**

Method: SM7110C	Batch: W9A1141	Prepared: 01/24/09 12:37	Analyzed: 01/27/09 17:01	Analyst: abd	
Analyte	Result	MRL	Units	Dilution	Qualifier
<b>Gross Alpha</b>	<b>5.92</b>		pCi/L	1	
<b>Gross Alpha counting error (+/-)</b>	<b>1.09</b>		pCi/L	1	
<b>Gross Alpha MDA95</b>	<b>0.343</b>		pCi/L	1	

**Semivolatile Organic Compounds by GC/MS**

Method: EPA 525.2	Batch: W9A1226	Prepared: 01/27/09 08:00	Analyzed: 01/31/09 05:00	Analyst: lct	
Analyte	Result	MRL	Units	Dilution	Qualifier
<i>Surrogate: 1,3-Dimethyl-2-NB</i>	98 %	73-136			
<i>Surrogate: Perylene-d12</i>	92 %	48-141			
<i>Surrogate: Triphenyl phosphate</i>	110 %	71-150			
Alachlor	ND	0.10	ug/l	1	
Atrazine	ND	0.10	ug/l	1	
<b>Benzo (a) pyrene</b>	<b>0.14</b>	0.10	ug/l	1	
Bis(2-ethylhexyl)adipate	ND	5.0	ug/l	1	
Bis(2-ethylhexyl)phthalate	ND	3.0	ug/l	1	
Bromacil	ND	1.0	ug/l	1	
Butachlor	ND	0.20	ug/l	1	
Captan	ND	1.0	ug/l	1	
Chloroprotham	ND	0.10	ug/l	1	
Cyanazine	ND	0.10	ug/l	1	
Diazinon	ND	0.10	ug/l	1	
Dimethoate	ND	0.20	ug/l	1	
Diphenamid	ND	0.10	ug/l	1	
Disulfoton	ND	0.10	ug/l	1	
EPTC	ND	1.0	ug/l	1	
Metolachlor	ND	0.10	ug/l	1	
Metribuzin	ND	0.10	ug/l	1	
Molinate	ND	0.10	ug/l	1	
Prometon	ND	0.20	ug/l	1	
Prometryn	ND	0.10	ug/l	1	
Simazine	ND	0.10	ug/l	1	
Terbacil	ND	2.0	ug/l	1	
Thiobencarb	ND	0.20	ug/l	1	
Trithion	ND	0.10	ug/l	1	

**Subcontracted Analyses**

Method: EPA 100.2	Batch: W9A1456	Prepared: 01/22/09 10:38	Analyzed: 01/27/09 10:39	Analyst: sub	
Analyte	Result	MRL	Units	Dilution	Qualifier
Asbestos	ND	1.10	MFL	1	<b>S_EMS</b>



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9A21040-01 103365-001/W

Sampled: 01/20/09 08:00

Sampled By: Client

Matrix: Water

Subcontracted Analyses

Method: EPA 1613	Batch: W9B0541	Prepared: 02/04/09 09:34	Analyzed: 02/04/09 09:34	Analyst: sub	
Analyte	Result	MRL	Units	Dilution	Qualifier
2,3,7,8-TCDD (Dioxin)	ND	5.00	pg/l	1	S_MAX

Method: EPA 903.1	Batch: W9B0841	Prepared: 01/27/09 11:40	Analyzed: 01/30/09 14:32	Analyst: sub	
Analyte	Result	MRL	Units	Dilution	Qualifier
Radium 226	0.308		pCi/L	1	S_FGL
Radium 226 counting error	0.251		pCi/L	1	S_FGL
Radium 226 MDA	0.373		pCi/L	1	S_FGL
Radium 228	0.345		pCi/L	1	S_FGL
Radium 228 counting error (+/-)	1.05		pCi/L	1	S_FGL
Radium 228 MDA	0.256		pCi/L	1	S_FGL
Strontium 90	0.300		pCi/L	1	S_FGL
Strontium 90 counting error	0.676		pCi/L	1	S_FGL
Strontium 90 MDA	0.596		pCi/L	1	S_FGL

Volatile Organic Compounds by EPA Method 524.2

Method: EPA 524.2	Batch: W9A1094	Prepared: 01/22/09 08:37	Analyzed: 01/22/09 18:02	Analyst: mdt	
Analyte	Result	MRL	Units	Dilution	Qualifier
Surrogate: 1,2-Dichlorobenzene-d4	97 %	70-130			
Surrogate: 4-Bromofluorobenzene	100 %	70-130			
1,1,1,2-Tetrachloroethane	ND	0.50	ug/l	1	
1,1,1-Trichloroethane	ND	0.50	ug/l	1	
1,1,2,2-Tetrachloroethane	ND	0.50	ug/l	1	
1,1,2-Trichloroethane	ND	0.50	ug/l	1	
1,1-Dichloroethane	ND	0.50	ug/l	1	
1,1-Dichloroethene	ND	0.50	ug/l	1	
1,1-Dichloropropene	ND	0.50	ug/l	1	
1,2,3-Trichlorobenzene	ND	0.50	ug/l	1	
1,2,3-Trichloropropane	ND	0.50	ug/l	1	
1,2,4-Trichlorobenzene	ND	0.50	ug/l	1	
1,2,4-Trimethylbenzene	ND	0.50	ug/l	1	
1,2-Dichloroethane	ND	0.50	ug/l	1	
1,2-Dichloropropane	ND	0.50	ug/l	1	
1,3 Dichloropropene (Total)	ND	0.50	ug/l	1	
1,3,5-Trimethylbenzene	ND	0.50	ug/l	1	
1,3-Dichloropropane	ND	0.50	ug/l	1	
2,2-Dichloropropane	ND	0.50	ug/l	1	
2-Butanone	ND	5.0	ug/l	1	
2-Chloroethyl vinyl ether	ND	1.0	ug/l	1	
2-Chlorotoluene	ND	0.50	ug/l	1	
2-Hexanone	ND	5.0	ug/l	1	



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9A21040-01 103365-001/W

Sampled: 01/20/09 08:00

Sampled By: Client

Matrix: Water

**Volatile Organic Compounds by EPA Method 524.2**

Method: EPA 524.2	Batch: W9A1094	Prepared: 01/22/09 08:37	Analyzed: 01/22/09 18:02	Analyst: mdt	
Analyte	Result	MRL	Units	Dilution	Qualifier
4-Chlorotoluene	ND	0.50	ug/l	1	
4-Methyl-2-pentanone	ND	5.0	ug/l	1	
Benzene	ND	0.50	ug/l	1	
Bromobenzene	ND	0.50	ug/l	1	
Bromochloromethane	ND	0.50	ug/l	1	
Bromodichloromethane	ND	0.50	ug/l	1	
Bromoform	ND	0.50	ug/l	1	
Bromomethane	ND	0.50	ug/l	1	
Carbon tetrachloride	ND	0.50	ug/l	1	
Chlorobenzene	ND	0.50	ug/l	1	
Chloroethane	ND	0.50	ug/l	1	
Chloroform	ND	0.50	ug/l	1	
Chloromethane	ND	0.50	ug/l	1	
cis-1,2-Dichloroethene	ND	0.50	ug/l	1	
cis-1,3-Dichloropropene	ND	0.50	ug/l	1	
Dibromochloromethane	ND	0.50	ug/l	1	
Dibromomethane	ND	0.50	ug/l	1	
Dichlorodifluoromethane (Freon 12)	ND	0.50	ug/l	1	
Di-isopropyl ether	ND	3.0	ug/l	1	
Ethyl tert-butyl ether	ND	3.0	ug/l	1	
Ethylbenzene	ND	0.50	ug/l	1	
Freon 113	ND	5.0	ug/l	1	
Hexachlorobutadiene	ND	0.50	ug/l	1	
Isopropylbenzene	ND	0.50	ug/l	1	
m,p-Xylene	ND	0.50	ug/l	1	
m-Dichlorobenzene	ND	0.50	ug/l	1	
Methyl tert-butyl ether (MTBE)	ND	3.0	ug/l	1	
Methylene chloride	ND	0.50	ug/l	1	
Naphthalene	ND	0.50	ug/l	1	
n-Butylbenzene	ND	0.50	ug/l	1	
n-Propylbenzene	ND	0.50	ug/l	1	
o-Dichlorobenzene	ND	0.50	ug/l	1	
o-Xylene	ND	0.50	ug/l	1	
p-Dichlorobenzene	ND	0.50	ug/l	1	
p-Isopropyltoluene	ND	0.50	ug/l	1	
sec-Butylbenzene	ND	0.50	ug/l	1	
Styrene	ND	0.50	ug/l	1	
Tert-amyl methyl ether	ND	3.0	ug/l	1	
tert-Butylbenzene	ND	0.50	ug/l	1	
Tetrachloroethene	ND	0.50	ug/l	1	





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**9A21040-01      103365-001/W**

**Sampled:** 01/20/09 08:00

**Sampled By:** Client

**Matrix:** Water

**Volatile Organic Compounds by EPA Method 524.2**

Method: EPA 524.2      Batch: W9A1094      Prepared: 01/22/09 08:37      Analyzed: 01/22/09 18:02      Analyst: mdt

Analyte	Result	MRL	Units	Dilution	Qualifier
Toluene	ND	0.50	ug/l	1	
trans-1,2-Dichloroethene	ND	0.50	ug/l	1	
trans-1,3-Dichloropropene	ND	0.50	ug/l	1	
Trichloroethene	ND	0.50	ug/l	1	
Trichlorofluoromethane	ND	5.0	ug/l	1	
Vinyl chloride	ND	0.50	ug/l	1	
Xylenes (total)	ND	0.50	ug/l	1	

Method: EPA 524.2      Batch: W9A1166      Prepared: 01/23/09 13:01      Analyzed: 01/23/09 17:02      Analyst: mdt

Analyte	Result	MRL	Units	Dilution	Qualifier
<i>Surrogate: 1,2-Dichlorobenzene-d4</i>	119 %	70-130			
<i>Surrogate: 4-Bromofluorobenzene</i>	118 %	70-130			
Acrolein	ND	5.0	ug/l	1	
Acrylonitrile	ND	2.0	ug/l	1	



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9A21040-02 103365-002/E

Sampled: 01/20/09 11:40

Sampled By: Client

Matrix: Water

Acid and Base/Neutral Extractables by EPA Method 625

Method: EPA 625 Batch: W9A1117 Prepared: 01/23/09 14:32 Analyzed: 01/27/09 18:41 Analyst: Ict

Analyte	Result	MRL	Units	Dilution	Qualifier
Surrogate: 2,4,6-Tribromophenol	80 %	0.1-157			
Surrogate: 2-Fluorobiphenyl	74 %	22-130			
Surrogate: 2-Fluorophenol	46 %	6-96			
Surrogate: Nitrobenzene-d5	75 %	34-139			
Surrogate: Phenol-d5	28 %	2-70			
Surrogate: Terphenyl-dl4	79 %	6-145			
1,2,4-Trichlorobenzene	ND	5.0	ug/l	1	
1,2-Dichlorobenzene	ND	2.0	ug/l	1	
1,2-Diphenylhydrazine	ND	1.0	ug/l	1	
1,3-Dichlorobenzene	ND	1.0	ug/l	1	
1,4-Dichlorobenzene	ND	1.0	ug/l	1	
2,4,6-Trichlorophenol	ND	10	ug/l	1	
2,4-Dichlorophenol	ND	5.0	ug/l	1	
2,4-Dimethylphenol	ND	2.0	ug/l	1	
2,4-Dinitrophenol	ND	10	ug/l	1	
2,4-Dinitrotoluene	ND	5.0	ug/l	1	
2,6-Dinitrotoluene	ND	5.0	ug/l	1	
2-Chloronaphthalene	ND	5.0	ug/l	1	
2-Chlorophenol	ND	5.0	ug/l	1	
2-Nitrophenol	ND	10	ug/l	1	
3,3'-Dichlorobenzidine	ND	5.0	ug/l	1	
4,6-Dinitro-2-methylphenol	ND	5.0	ug/l	1	
4-Bromophenyl phenyl ether	ND	5.0	ug/l	1	
4-Chloro-3-methylphenol	ND	1.0	ug/l	1	
4-Chlorophenyl phenyl ether	ND	5.0	ug/l	1	
4-Nitrophenol	ND	10	ug/l	1	
Acenaphthene	ND	1.0	ug/l	1	
Acenaphthylene	ND	5.0	ug/l	1	
Anthracene	ND	5.0	ug/l	1	
Benzidine	ND	5.0	ug/l	1	
Benzo (a) anthracene	ND	5.0	ug/l	1	
Benzo (a) pyrene	ND	10	ug/l	1	
Benzo (b) fluoranthene	ND	5.0	ug/l	1	
Benzo (g,h,i) perylene	ND	5.0	ug/l	1	
Benzo (k) fluoranthene	ND	10	ug/l	1	
Bis(2-chloroethoxy)methane	ND	5.0	ug/l	1	
Bis(2-chloroethyl)ether	ND	1.0	ug/l	1	
Bis(2-chloroisopropyl)ether	ND	2.0	ug/l	1	
Bis(2-ethylhexyl)phthalate	ND	5.0	ug/l	1	
Butyl benzyl phthalate	ND	5.0	ug/l	1	



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9A21040-02 103365-002/E

Sampled: 01/20/09 11:40

Sampled By: Client

Matrix: Water

Acid and Base/Neutral Extractables by EPA Method 625

Method: EPA 625	Batch: W9A1117	Prepared: 01/23/09 14:32	Analyzed: 01/27/09 18:41	Analyst: Ict	
Analyte	Result	MRL	Units	Dilution	Qualifier
Chrysene	ND	5.0	ug/l	1	
Dibenzo (a,h) anthracene	ND	10	ug/l	1	
Diethyl phthalate	ND	2.0	ug/l	1	
Dimethyl phthalate	ND	2.0	ug/l	1	
Di-n-butyl phthalate	ND	5.0	ug/l	1	
Di-n-octyl phthalate	ND	5.0	ug/l	1	
Fluoranthene	ND	1.0	ug/l	1	
Fluorene	ND	5.0	ug/l	1	
Hexachlorobenzene	ND	1.0	ug/l	1	
Hexachlorobutadiene	ND	1.0	ug/l	1	
Hexachlorocyclopentadiene	ND	10	ug/l	1	
Hexachloroethane	ND	1.0	ug/l	1	
Indeno (1,2,3-cd) pyrene	ND	10	ug/l	1	
Isophorone	ND	1.0	ug/l	1	
Naphthalene	ND	1.0	ug/l	1	
Nitrobenzene	ND	1.0	ug/l	1	
N-Nitrosodimethylamine	ND	5.0	ug/l	1	
N-Nitrosodi-n-propylamine	ND	5.0	ug/l	1	
N-Nitrosodiphenylamine	ND	1.0	ug/l	1	
Pentachlorophenol	ND	5.0	ug/l	1	
Phenanthrene	ND	5.0	ug/l	1	
Phenol	ND	1.0	ug/l	1	
Pyrene	ND	5.0	ug/l	1	

Carbamates and Urea Pesticides

Method: EPA 531.1	Batch: W9B0243	Prepared: 02/02/09 15:02	Analyzed: 02/03/09 03:46	Analyst: hmc	
Analyte	Result	MRL	Units	Dilution	Qualifier
3-Hydroxycarbofuran	ND	2.0	ug/l	1	
Aldicarb	ND	2.0	ug/l	1	
Aldicarb sulfone	ND	2.0	ug/l	1	
Aldicarb sulfoxide	ND	2.0	ug/l	1	
Carbaryl	ND	2.0	ug/l	1	
Carbofuran	ND	5.0	ug/l	1	
Methiocarb	ND	3.0	ug/l	1	
Methomyl	ND	2.0	ug/l	1	
Oxamyl	ND	2.0	ug/l	1	
Propoxur (Baygon)	ND	5.0	ug/l	1	

Chlorinated Herbicides

Method: EPA 515.3	Batch: W9A1461	Prepared: 01/30/09 00:00	Analyzed: 02/12/09 12:21	Analyst: dav
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9A21040-02 103365-002/E

Sampled: 01/20/09 11:40

Sampled By: Client

Matrix: Water

Chlorinated Herbicides

Method: EPA 515.3	Batch: W9A1461	Prepared: 01/30/09 00:00	Analyzed: 02/12/09 12:21	Analyst: dav	
Analyte	Result	MRL	Units	Dilution	Qualifier
Surrogate: 2,4-DCAA	107 %	70-130			
2,4,5-T	ND	0.20	ug/l	1	
2,4,5-TP (Silvex)	ND	0.20	ug/l	1	
2,4-D	ND	0.40	ug/l	1	
2,4-DB	ND	2.0	ug/l	1	
3,5-Dichlorobenzoic acid	ND	1.0	ug/l	1	
Acifluorfen	ND	0.40	ug/l	1	
Bentazon	ND	2.0	ug/l	1	
Chloramben	ND	1.0	ug/l	1	
Dalapon	ND	0.40	ug/l	1	
DCPA	ND	0.10	ug/l	1	
Dicamba	ND	0.60	ug/l	1	
Dichloroprop	ND	0.30	ug/l	1	
Dinoseb	ND	0.40	ug/l	1	
Pentachlorophenol	ND	0.20	ug/l	1	
Picloram	ND	0.60	ug/l	1	

Chlorinated Pesticides and/or PCBs

Method: EPA 508	Batch: W9A1251	Prepared: 01/27/09 00:00	Analyzed: 01/30/09 15:28	Analyst: dav	
Analyte	Result	MRL	Units	Dilution	Qualifier
Surrogate: Decachlorobiphenyl	46 %	70-130			S-GC
Surrogate: Tetrachloro-meta-xylene	92 %	70-130			
4,4'-DDD	ND	0.010	ug/l	1	
4,4'-DDE	ND	0.010	ug/l	1	
4,4'-DDT	ND	0.010	ug/l	1	
Aldrin	ND	0.010	ug/l	1	
alpha-BHC	ND	0.010	ug/l	1	
beta-BHC	ND	0.010	ug/l	1	
Chlordane (tech)	ND	0.10	ug/l	1	
Chlorothalonil	ND	0.050	ug/l	1	
delta-BHC	ND	0.010	ug/l	1	
Dieldrin	ND	0.010	ug/l	1	
Endosulfan I	ND	0.010	ug/l	1	
Endosulfan II	ND	0.010	ug/l	1	
Endosulfan sulfate	ND	0.010	ug/l	1	
Endrin	ND	0.010	ug/l	1	
Endrin aldehyde	ND	0.010	ug/l	1	
gamma-BHC (Lindane)	ND	0.010	ug/l	1	
Heptachlor	ND	0.010	ug/l	1	
Heptachlor epoxide	ND	0.010	ug/l	1	



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**9A21040-02 103365-002/E**

Sampled: 01/20/09 11:40

Sampled By: Client

Matrix: Water

**Chlorinated Pesticides and/or PCBs**

Method: EPA 508	Batch: W9A1251	Prepared: 01/27/09 00:00	Analyzed: 01/30/09 15:28	Analyst: dav	
Analyte	Result	MRL	Units	Dilution	Qualifier
Hexachlorobenzene	ND	0.010	ug/l	1	
Hexachlorocyclopentadiene	ND	0.050	ug/l	1	
Methoxychlor	ND	0.010	ug/l	1	
PCB-1016	ND	0.10	ug/l	1	
PCB-1221	ND	0.10	ug/l	1	
PCB-1232	ND	0.10	ug/l	1	
PCB-1242	ND	0.10	ug/l	1	
PCB-1248	ND	0.10	ug/l	1	
PCB-1254	ND	0.10	ug/l	1	
PCB-1260	ND	0.10	ug/l	1	
PCBs, Total	ND	0.50	ug/l	1	
Propachlor	ND	0.050	ug/l	1	
Toxaphene	ND	1.0	ug/l	1	
Trifluralin	ND	0.010	ug/l	1	

**Conventional Chemistry/Physical Parameters by APHA/EPA/ASTM Methods**

Method: SM2120B	Batch: W9A1024	Prepared: 01/21/09 17:08	Analyzed: 01/21/09 18:30	Analyst: sml	
Analyte	Result	MRL	Units	Dilution	Qualifier
<b>Color</b>	<b>50</b>	15	Color Units	5	

**Fumigants by EPA Method 504.1**

Method: EPA 504.1	Batch: W9A1294	Prepared: 01/28/09 08:58	Analyzed: 01/29/09 16:30	Analyst: cwn	
Analyte	Result	MRL	Units	Dilution	Qualifier
1,2-Dibromo-3-chloropropane	ND	0.010	ug/l	1	
1,2-Dibromoethane (EDB)	ND	0.020	ug/l	1	

**Glyphosate by EPA 547**

Method: EPA 547	Batch: W9B0149	Prepared: 01/30/09 17:26	Analyzed: 01/30/09 18:39	Analyst: hmc	
Analyte	Result	MRL	Units	Dilution	Qualifier
Glyphosate	ND	5.0	ug/l	1	

**Radiological Parameters by APHA/EPA Methods**

Method: EPA 900.0	Batch: W9A1074	Prepared: 01/22/09 14:59	Analyzed: 01/30/09 10:17	Analyst: aab	
Analyte	Result	MRL	Units	Dilution	Qualifier
<b>Gross Beta</b>	<b>8.0</b>		pCi/L	1	
<b>Gross Beta counting error (+/-)</b>	<b>1.4</b>		pCi/L	1	
<b>Gross Beta MDA95</b>	<b>2.1</b>		pCi/L	1	

Method: SM7110C	Batch: W9A1141	Prepared: 01/24/09 12:37	Analyzed: 01/27/09 17:01	Analyst: abd	
Analyte	Result	MRL	Units	Dilution	Qualifier



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Date Received: 01/21/09 12:50  
Date Reported: 02/13/09 14:39

Sampled: 01/20/09 11:40      9A21040-02      103365-002/E      Sampled By: Client      Matrix: Water

**Radiological Parameters by APHA/EPA Methods**

Method: SM7110C	Batch: W9A1141	Prepared: 01/24/09 12:37	Analyzed: 01/27/09 17:01	Analyst: abd	
Analyte	Result	MRL	Units	Dilution	Qualifier
<b>Gross Alpha</b>	<b>2.43</b>		pCi/L	1	
<b>Gross Alpha counting error (+/-)</b>	<b>0.900</b>		pCi/L	1	
<b>Gross Alpha MDA95</b>	<b>0.343</b>		pCi/L	1	

**Semivolatile Organic Compounds by GC/MS**

Method: EPA 525.2	Batch: W9A1226	Prepared: 01/27/09 08:00	Analyzed: 01/31/09 05:26	Analyst: lct	
Analyte	Result	MRL	Units	Dilution	Qualifier
<i>Surrogate: 1,3-Dimethyl-2-NB</i>	104 %	73-136			
<i>Surrogate: Perylene-d12</i>	51 %	48-141			
<i>Surrogate: Triphenyl phosphate</i>	110 %	71-150			
Alachlor	ND	0.10	ug/l	1	
Atrazine	ND	0.10	ug/l	1	
<b>Benzo (a) pyrene</b>	<b>3.6</b>	0.10	ug/l	1	
Bis(2-ethylhexyl)adipate	ND	5.0	ug/l	1	
Bis(2-ethylhexyl)phthalate	ND	3.0	ug/l	1	
Bromacil	ND	1.0	ug/l	1	
Butachlor	ND	0.20	ug/l	1	
Captan	ND	1.0	ug/l	1	
Chloroprotham	ND	0.10	ug/l	1	
Cyanazine	ND	0.10	ug/l	1	
Diazinon	ND	0.10	ug/l	1	
Dimethoate	ND	0.20	ug/l	1	
Diphenamid	ND	0.10	ug/l	1	
Disulfoton	ND	0.10	ug/l	1	
EPTC	ND	1.0	ug/l	1	
Metolachlor	ND	0.10	ug/l	1	
Metribuzin	ND	0.10	ug/l	1	
Molinate	ND	0.10	ug/l	1	
Prometon	ND	0.20	ug/l	1	
Prometryn	ND	0.10	ug/l	1	
Simazine	ND	0.10	ug/l	1	
Terbacil	ND	2.0	ug/l	1	
Thiobencarb	ND	0.20	ug/l	1	
Trithion	ND	0.10	ug/l	1	

**Subcontracted Analyses**

Method: EPA 100.2	Batch: W9A1456	Prepared: 01/22/09 10:38	Analyzed: 01/27/09 10:39	Analyst: sub	
Analyte	Result	MRL	Units	Dilution	Qualifier
Asbestos	ND	11.0	MFL	1	<b>S_EMS</b>





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9A21040-02 103365-002/E

Sampled: 01/20/09 11:40

Sampled By: Client

Matrix: Water

Subcontracted Analyses

Method: EPA 1613	Batch: W9B0541	Prepared: 02/04/09 09:34	Analyzed: 02/04/09 09:34	Analyst: sub	
Analyte	Result	MRL	Units	Dilution	Qualifier
2,3,7,8-TCDD (Dioxin)	ND	5.00	pg/l	1	S_MAX

Method: EPA 903.1	Batch: W9B0841	Prepared: 01/27/09 11:40	Analyzed: 01/30/09 14:32	Analyst: sub	
Analyte	Result	MRL	Units	Dilution	Qualifier
Radium 226	0.234		pCi/L	1	S_FGL
Radium 226 counting error	0.270		pCi/L	1	S_FGL
Radium 226 MDA	0.447		pCi/L	1	S_FGL
Radium 228	0.00		pCi/L	1	S_FGL
Radium 228 counting error (+/-)	0.897		pCi/L	1	S_FGL
Radium 228 MDA	0.259		pCi/L	1	S_FGL
Strontium 90	0.00		pCi/L	1	S_FGL
Strontium 90 counting error	0.624		pCi/L	1	S_FGL
Strontium 90 MDA	0.596		pCi/L	1	S_FGL

Volatile Organic Compounds by EPA Method 524.2

Method: EPA 524.2	Batch: W9A1094	Prepared: 01/22/09 08:37	Analyzed: 01/22/09 18:34	Analyst: mdt	
Analyte	Result	MRL	Units	Dilution	Qualifier
Surrogate: 1,2-Dichlorobenzene-d4	96 %	70-130			
Surrogate: 4-Bromofluorobenzene	99 %	70-130			
1,1,1,2-Tetrachloroethane	ND	0.50	ug/l	1	
1,1,1-Trichloroethane	ND	0.50	ug/l	1	
1,1,2,2-Tetrachloroethane	ND	0.50	ug/l	1	
1,1,2-Trichloroethane	ND	0.50	ug/l	1	
1,1-Dichloroethane	ND	0.50	ug/l	1	
1,1-Dichloroethene	ND	0.50	ug/l	1	
1,1-Dichloropropene	ND	0.50	ug/l	1	
1,2,3-Trichlorobenzene	ND	0.50	ug/l	1	
1,2,3-Trichloropropane	ND	0.50	ug/l	1	
1,2,4-Trichlorobenzene	ND	0.50	ug/l	1	
1,2,4-Trimethylbenzene	ND	0.50	ug/l	1	
1,2-Dichloroethane	ND	0.50	ug/l	1	
1,2-Dichloropropane	ND	0.50	ug/l	1	
1,3 Dichloropropene (Total)	ND	0.50	ug/l	1	
1,3,5-Trimethylbenzene	ND	0.50	ug/l	1	
1,3-Dichloropropane	ND	0.50	ug/l	1	
2,2-Dichloropropane	ND	0.50	ug/l	1	
2-Butanone	ND	5.0	ug/l	1	
2-Chloroethyl vinyl ether	ND	1.0	ug/l	1	
2-Chlorotoluene	ND	0.50	ug/l	1	
2-Hexanone	ND	5.0	ug/l	1	



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9A21040-02 103365-002/E

Sampled: 01/20/09 11:40

Sampled By: Client

Matrix: Water

**Volatile Organic Compounds by EPA Method 524.2**

Method: EPA 524.2	Batch: W9A1094	Prepared: 01/22/09 08:37	Analyzed: 01/22/09 18:34	Analyst: mdt	
Analyte	Result	MRL	Units	Dilution	Qualifier
4-Chlorotoluene	ND	0.50	ug/l	1	
4-Methyl-2-pentanone	ND	5.0	ug/l	1	
Benzene	ND	0.50	ug/l	1	
Bromobenzene	ND	0.50	ug/l	1	
Bromochloromethane	ND	0.50	ug/l	1	
Bromodichloromethane	ND	0.50	ug/l	1	
Bromoform	ND	0.50	ug/l	1	
Bromomethane	ND	0.50	ug/l	1	
Carbon tetrachloride	ND	0.50	ug/l	1	
Chlorobenzene	ND	0.50	ug/l	1	
Chloroethane	ND	0.50	ug/l	1	
Chloroform	ND	0.50	ug/l	1	
Chloromethane	ND	0.50	ug/l	1	
cis-1,2-Dichloroethene	ND	0.50	ug/l	1	
cis-1,3-Dichloropropene	ND	0.50	ug/l	1	
Dibromochloromethane	ND	0.50	ug/l	1	
Dibromomethane	ND	0.50	ug/l	1	
Dichlorodifluoromethane (Freon 12)	ND	0.50	ug/l	1	
Di-isopropyl ether	ND	3.0	ug/l	1	
Ethyl tert-butyl ether	ND	3.0	ug/l	1	
Ethylbenzene	ND	0.50	ug/l	1	
Freon 113	ND	5.0	ug/l	1	
Hexachlorobutadiene	ND	0.50	ug/l	1	
Isopropylbenzene	ND	0.50	ug/l	1	
m,p-Xylene	ND	0.50	ug/l	1	
m-Dichlorobenzene	ND	0.50	ug/l	1	
Methyl tert-butyl ether (MTBE)	ND	3.0	ug/l	1	
Methylene chloride	ND	0.50	ug/l	1	
Naphthalene	ND	0.50	ug/l	1	
n-Butylbenzene	ND	0.50	ug/l	1	
n-Propylbenzene	ND	0.50	ug/l	1	
o-Dichlorobenzene	ND	0.50	ug/l	1	
o-Xylene	ND	0.50	ug/l	1	
p-Dichlorobenzene	ND	0.50	ug/l	1	
p-Isopropyltoluene	ND	0.50	ug/l	1	
sec-Butylbenzene	ND	0.50	ug/l	1	
Styrene	ND	0.50	ug/l	1	
Tert-amyl methyl ether	ND	3.0	ug/l	1	
tert-Butylbenzene	ND	0.50	ug/l	1	
Tetrachloroethene	ND	0.50	ug/l	1	



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**9A21040-02      103365-002/E**

**Sampled:** 01/20/09 11:40

**Sampled By:** Client

**Matrix:** Water

**Volatile Organic Compounds by EPA Method 524.2**

Method: EPA 524.2      Batch: W9A1094      Prepared: 01/22/09 08:37      Analyzed: 01/22/09 18:34      Analyst: mdt

Analyte	Result	MRL	Units	Dilution	Qualifier
Toluene	ND	0.50	ug/l	1	
trans-1,2-Dichloroethene	ND	0.50	ug/l	1	
trans-1,3-Dichloropropene	ND	0.50	ug/l	1	
Trichloroethene	ND	0.50	ug/l	1	
Trichlorofluoromethane	ND	5.0	ug/l	1	
Vinyl chloride	ND	0.50	ug/l	1	
Xylenes (total)	ND	0.50	ug/l	1	

Method: EPA 524.2      Batch: W9A1166      Prepared: 01/23/09 13:01      Analyzed: 01/23/09 17:36      Analyst: mdt

Analyte	Result	MRL	Units	Dilution	Qualifier
<i>Surrogate: 1,2-Dichlorobenzene-d4</i>	117 %	70-130			
<i>Surrogate: 4-Bromofluorobenzene</i>	118 %	70-130			
Acrolein	ND	5.0	ug/l	1	
Acrylonitrile	ND	2.0	ug/l	1	



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# QUALITY CONTROL SECTION



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Report ID: 9A21040  
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Date Received: 01/21/09 12:50  
Date Reported: 02/13/09 14:39

**Acid and Base/Neutral Extractables by EPA Method 625 - Quality Control**

**Batch W9A1117 - EPA 625**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Blank (W9A1117-BLK1)</b>		Analyzed: 01/27/09 16:49								
<i>Surrogate: 2-Fluorophenol</i>	51.3		ug/l	100		51	6-96			
<i>Surrogate: Phenol-d5</i>	30.7		ug/l	100		31	2-70			
<i>Surrogate: Nitrobenzene-d5</i>	38.0		ug/l	50.0		76	34-139			
<i>Surrogate: 2-Fluorobiphenyl</i>	36.6		ug/l	50.0		73	22-130			
<i>Surrogate: 2,4,6-Tribromophenol</i>	77.6		ug/l	100		78	0.1-157			
<i>Surrogate: Terphenyl-dl4</i>	33.0		ug/l	50.0		66	6-145			
N-Nitrosodimethylamine	ND	5.0	ug/l							
Phenol	ND	1.0	ug/l							
Bis(2-chloroethyl)ether	ND	1.0	ug/l							
2-Chlorophenol	ND	5.0	ug/l							
1,3-Dichlorobenzene	ND	1.0	ug/l							
1,4-Dichlorobenzene	ND	1.0	ug/l							
1,2-Dichlorobenzene	ND	2.0	ug/l							
Bis(2-chloroisopropyl)ether	ND	2.0	ug/l							
N-Nitrosodi-n-propylamine	ND	5.0	ug/l							
Hexachloroethane	ND	1.0	ug/l							
Nitrobenzene	ND	1.0	ug/l							
Isophorone	ND	1.0	ug/l							
2-Nitrophenol	ND	10	ug/l							
2,4-Dimethylphenol	ND	2.0	ug/l							
Bis(2-chloroethoxy)methane	ND	5.0	ug/l							
2,4-Dichlorophenol	ND	5.0	ug/l							
1,2,4-Trichlorobenzene	ND	5.0	ug/l							
Naphthalene	ND	1.0	ug/l							
Hexachlorobutadiene	ND	1.0	ug/l							
4-Chloro-3-methylphenol	ND	1.0	ug/l							
Hexachlorocyclopentadiene	ND	10	ug/l							
2,4,6-Trichlorophenol	ND	10	ug/l							
2-Chloronaphthalene	ND	5.0	ug/l							
Dimethyl phthalate	ND	2.0	ug/l							
2,6-Dinitrotoluene	ND	5.0	ug/l							
Acenaphthylene	ND	5.0	ug/l							
Acenaphthene	ND	1.0	ug/l							
2,4-Dinitrophenol	ND	10	ug/l							
4-Nitrophenol	ND	10	ug/l							
2,4-Dinitrotoluene	ND	5.0	ug/l							
Diethyl phthalate	ND	2.0	ug/l							
4-Chlorophenyl phenyl ether	ND	5.0	ug/l							
Fluorene	ND	5.0	ug/l							
4,6-Dinitro-2-methylphenol	ND	5.0	ug/l							
N-Nitrosodiphenylamine	ND	1.0	ug/l							
1,2-Diphenylhydrazine	ND	1.0	ug/l							
4-Bromophenyl phenyl ether	ND	5.0	ug/l							
Hexachlorobenzene	ND	1.0	ug/l							



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**Acid and Base/Neutral Extractables by EPA Method 625 - Quality Control**

**Batch W9A1117 - EPA 625**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Blank (W9A1117-BLK1)</b>										
Analyzed: 01/27/09 16:49										
Pentachlorophenol	ND	5.0	ug/l							
Phenanthrene	ND	5.0	ug/l							
Anthracene	ND	5.0	ug/l							
Di-n-butyl phthalate	ND	5.0	ug/l							
Fluoranthene	ND	1.0	ug/l							
Benzidine	ND	5.0	ug/l							
Pyrene	ND	5.0	ug/l							
Butyl benzyl phthalate	ND	5.0	ug/l							
3,3'-Dichlorobenzidine	ND	5.0	ug/l							
Bis(2-ethylhexyl)phthalate	ND	5.0	ug/l							
Benzo (a) anthracene	ND	5.0	ug/l							
Chrysene	ND	5.0	ug/l							
Di-n-octyl phthalate	ND	5.0	ug/l							
Benzo (b) fluoranthene	ND	5.0	ug/l							
Benzo (k) fluoranthene	ND	10	ug/l							
Benzo (a) pyrene	ND	10	ug/l							
Indeno (1,2,3-cd) pyrene	ND	10	ug/l							
Dibenzo (a,h) anthracene	ND	10	ug/l							
Benzo (g,h,i) perylene	ND	5.0	ug/l							

**LCS (W9A1117-BS1)**

Analyzed: 01/27/09 17:17

<i>Surrogate: 2-Fluorophenol</i>	45.6		ug/l	100		46	6-96			
<i>Surrogate: Phenol-d5</i>	27.8		ug/l	100		28	2-70			
<i>Surrogate: Nitrobenzene-d5</i>	34.0		ug/l	50.0		68	34-139			
<i>Surrogate: 2-Fluorobiphenyl</i>	34.5		ug/l	50.0		69	22-130			
<i>Surrogate: 2,4,6-Tribromophenol</i>	82.4		ug/l	100		82	0.1-157			
<i>Surrogate: Terphenyl-d14</i>	32.8		ug/l	50.0		66	6-145			
N-Nitrosodimethylamine	23.6	5.0	ug/l	50.0		47	27-78			
Phenol	15.5	1.0	ug/l	50.0		31	5-112			
Bis(2-chloroethyl)ether	32.9	1.0	ug/l	50.0		66	12-158			
2-Chlorophenol	35.7	5.0	ug/l	50.0		71	23-134			
1,3-Dichlorobenzene	36.3	1.0	ug/l	50.0		73	0.1-172			
1,4-Dichlorobenzene	36.4	1.0	ug/l	50.0		73	20-124			
1,2-Dichlorobenzene	36.5	2.0	ug/l	50.0		73	32-129			
Bis(2-chloroisopropyl)ether	35.4	2.0	ug/l	50.0		71	36-166			
N-Nitrosodi-n-propylamine	34.3	5.0	ug/l	50.0		69	0.1-230			
Hexachloroethane	36.5	1.0	ug/l	50.0		73	40-113			
Nitrobenzene	35.2	1.0	ug/l	50.0		70	35-180			
Isophorone	35.5	1.0	ug/l	50.0		71	21-196			
2-Nitrophenol	41.9	10	ug/l	50.0		84	29-182			
2,4-Dimethylphenol	33.2	2.0	ug/l	50.0		66	1.33-117			
Bis(2-chloroethoxy)methane	36.6	5.0	ug/l	50.0		73	33-184			
2,4-Dichlorophenol	39.5	5.0	ug/l	50.0		79	39-135			
1,2,4-Trichlorobenzene	36.7	5.0	ug/l	50.0		73	44-142			





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**Acid and Base/Neutral Extractables by EPA Method 625 - Quality Control**

**Batch W9A1117 - EPA 625**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>LCS (W9A1117-BS1)</b>										
Analyzed: 01/27/09 17:17										
Naphthalene	35.4	1.0	ug/l	50.0		71	21-133			
Hexachlorobutadiene	38.2	1.0	ug/l	50.0		76	24-116			
4-Chloro-3-methylphenol	35.4	1.0	ug/l	50.0		71	22-147			
Hexachlorocyclopentadiene	24.7	10	ug/l	50.0		49	0.1-136			
2,4,6-Trichlorophenol	37.3	10	ug/l	50.0		75	37-144			
2-Chloronaphthalene	38.8	5.0	ug/l	50.0		78	60-118			
Dimethyl phthalate	37.6	2.0	ug/l	50.0		75	0.1-112			
2,6-Dinitrotoluene	39.9	5.0	ug/l	50.0		80	50-158			
Acenaphthylene	38.6	5.0	ug/l	50.0		77	33-145			
Acenaphthene	44.0	1.0	ug/l	50.0		88	47-145			
2,4-Dinitrophenol	47.9	10	ug/l	50.0		96	0.1-191			
4-Nitrophenol	16.4	10	ug/l	50.0		33	0.1-132			
2,4-Dinitrotoluene	46.6	5.0	ug/l	50.0		93	39-139			
Diethyl phthalate	39.9	2.0	ug/l	50.0		80	0.1-112			
4-Chlorophenyl phenyl ether	44.4	5.0	ug/l	50.0		89	25-158			
Fluorene	45.0	5.0	ug/l	50.0		90	59-121			
4,6-Dinitro-2-methylphenol	46.1	5.0	ug/l	50.0		92	0.1-181			
N-Nitrosodiphenylamine	39.0	1.0	ug/l	50.0		78	48-129			
4-Bromophenyl phenyl ether	41.4	5.0	ug/l	50.0		83	56-127			
Hexachlorobenzene	38.9	1.0	ug/l	50.0		78	0.1-152			
Pentachlorophenol	46.8	5.0	ug/l	50.0		94	14-176			
Phenanthrene	42.8	5.0	ug/l	50.0		86	54-120			
Anthracene	43.2	5.0	ug/l	50.0		86	27-133			
Di-n-butyl phthalate	47.1	5.0	ug/l	50.0		94	1-118			
Fluoranthene	49.2	1.0	ug/l	50.0		98	26-137			
Pyrene	47.3	5.0	ug/l	50.0		95	52-115			
Butyl benzyl phthalate	48.6	5.0	ug/l	50.0		97	0.1-152			
3,3'-Dichlorobenzidine	48.5	5.0	ug/l	50.0		97	0.1-262			
Bis(2-ethylhexyl)phthalate	48.0	5.0	ug/l	50.0		96	8-158			
Benzo (a) anthracene	47.8	5.0	ug/l	50.0		96	33-143			
Chrysene	42.0	5.0	ug/l	50.0		84	17-168			
Di-n-octyl phthalate	43.0	5.0	ug/l	50.0		86	6-146			
Benzo (b) fluoranthene	31.1	5.0	ug/l	50.0		62	24-159			
Benzo (k) fluoranthene	45.4	10	ug/l	50.0		91	11-162			
Benzo (a) pyrene	38.7	10	ug/l	50.0		77	17-163			
Indeno (1,2,3-cd) pyrene	33.4	10	ug/l	50.0		67	0.1-171			
Dibenzo (a,h) anthracene	35.3	10	ug/l	50.0		71	0.1-227			
Benzo (g,h,i) perylene	32.0	5.0	ug/l	50.0		64	0.1-219			
<b>LCS Dup (W9A1117-BSD1)</b>										
Analyzed: 01/27/09 17:45										
Surrogate: 2-Fluorophenol	45.4		ug/l	100		45	6-96			
Surrogate: Phenol-d5	27.3		ug/l	100		27	2-70			
Surrogate: Nitrobenzene-d5	34.7		ug/l	50.0		69	34-139			
Surrogate: 2-Fluorobiphenyl	34.6		ug/l	50.0		69	22-130			



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Report ID: 9A21040  
Project ID: Attachment B

Date Received: 01/21/09 12:50  
Date Reported: 02/13/09 14:39

**Acid and Base/Neutral Extractables by EPA Method 625 - Quality Control**

**Batch W9A1117 - EPA 625**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>LCS Dup (W9A1117-BSD1)</b>										
Analyzed: 01/27/09 17:45										
<i>Surrogate: 2,4,6-Tribromophenol</i>	84.9		ug/l	100		85	0.1-157			
<i>Surrogate: Terphenyl-dl4</i>	34.8		ug/l	50.0		70	6-145			
N-Nitrosodimethylamine	24.5	5.0	ug/l	50.0		49	27-78	4	30	
Phenol	15.6	1.0	ug/l	50.0		31	5-112	0.6	30	
Bis(2-chloroethyl)ether	34.2	1.0	ug/l	50.0		68	12-158	4	30	
2-Chlorophenol	36.8	5.0	ug/l	50.0		74	23-134	3	30	
1,3-Dichlorobenzene	37.4	1.0	ug/l	50.0		75	0.1-172	3	30	
1,4-Dichlorobenzene	37.7	1.0	ug/l	50.0		75	20-124	4	30	
1,2-Dichlorobenzene	37.5	2.0	ug/l	50.0		75	32-129	3	30	
Bis(2-chloroisopropyl)ether	37.3	2.0	ug/l	50.0		75	36-166	5	30	
N-Nitrosodi-n-propylamine	35.2	5.0	ug/l	50.0		70	0.1-230	3	30	
Hexachloroethane	37.5	1.0	ug/l	50.0		75	40-113	3	30	
Nitrobenzene	36.7	1.0	ug/l	50.0		73	35-180	4	30	
Isophorone	36.4	1.0	ug/l	50.0		73	21-196	3	30	
2-Nitrophenol	42.9	10	ug/l	50.0		86	29-182	2	30	
2,4-Dimethylphenol	34.2	2.0	ug/l	50.0		68	1.33-117	3	30	
Bis(2-chloroethoxy)methane	37.8	5.0	ug/l	50.0		76	33-184	3	30	
2,4-Dichlorophenol	40.4	5.0	ug/l	50.0		81	39-135	2	30	
1,2,4-Trichlorobenzene	37.5	5.0	ug/l	50.0		75	44-142	2	30	
Naphthalene	36.7	1.0	ug/l	50.0		73	21-133	4	30	
Hexachlorobutadiene	39.3	1.0	ug/l	50.0		79	24-116	3	30	
4-Chloro-3-methylphenol	36.6	1.0	ug/l	50.0		73	22-147	3	30	
Hexachlorocyclopentadiene	26.5	10	ug/l	50.0		53	0.1-136	7	30	
2,4,6-Trichlorophenol	38.3	10	ug/l	50.0		77	37-144	2	30	
2-Chloronaphthalene	39.3	5.0	ug/l	50.0		79	60-118	1	30	
Dimethyl phthalate	39.1	2.0	ug/l	50.0		78	0.1-112	4	30	
2,6-Dinitrotoluene	41.4	5.0	ug/l	50.0		83	50-158	4	30	
Acenaphthylene	39.8	5.0	ug/l	50.0		80	33-145	3	30	
Acenaphthene	46.2	1.0	ug/l	50.0		92	47-145	5	30	
2,4-Dinitrophenol	50.9	10	ug/l	50.0		102	0.1-191	6	30	
4-Nitrophenol	17.0	10	ug/l	50.0		34	0.1-132	4	30	
2,4-Dinitrotoluene	49.7	5.0	ug/l	50.0		99	39-139	6	30	
Diethyl phthalate	42.6	2.0	ug/l	50.0		85	0.1-112	6	30	
4-Chlorophenyl phenyl ether	47.0	5.0	ug/l	50.0		94	25-158	6	30	
Fluorene	48.0	5.0	ug/l	50.0		96	59-121	6	30	
4,6-Dinitro-2-methylphenol	48.4	5.0	ug/l	50.0		97	0.1-181	5	30	
N-Nitrosodiphenylamine	41.4	1.0	ug/l	50.0		83	48-129	6	30	
4-Bromophenyl phenyl ether	43.9	5.0	ug/l	50.0		88	56-127	6	30	
Hexachlorobenzene	41.5	1.0	ug/l	50.0		83	0.1-152	7	30	
Pentachlorophenol	49.4	5.0	ug/l	50.0		99	14-176	5	30	
Phenanthrene	44.9	5.0	ug/l	50.0		90	54-120	5	30	
Anthracene	45.5	5.0	ug/l	50.0		91	27-133	5	30	
Di-n-butyl phthalate	49.8	5.0	ug/l	50.0		100	1-118	6	30	
Fluoranthene	52.0	1.0	ug/l	50.0		104	26-137	6	30	



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**Acid and Base/Neutral Extractables by EPA Method 625 - Quality Control**

**Batch W9A1117 - EPA 625**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>LCS Dup (W9A1117-BSD1)</b>										
Analyzed: 01/27/09 17:45										
Pyrene	49.7	5.0	ug/l	50.0		99	52-115	5	30	
Butyl benzyl phthalate	50.8	5.0	ug/l	50.0		102	0.1-152	4	30	
3,3'-Dichlorobenzidine	48.2	5.0	ug/l	50.0		96	0.1-262	0.8	30	
Bis(2-ethylhexyl)phthalate	50.6	5.0	ug/l	50.0		101	8-158	5	30	
Benzo (a) anthracene	50.4	5.0	ug/l	50.0		101	33-143	5	30	
Chrysene	44.7	5.0	ug/l	50.0		89	17-168	6	30	
Di-n-octyl phthalate	45.8	5.0	ug/l	50.0		92	6-146	6	30	
Benzo (b) fluoranthene	38.6	5.0	ug/l	50.0		77	24-159	21	30	
Benzo (k) fluoranthene	45.1	10	ug/l	50.0		90	11-162	0.6	30	
Benzo (a) pyrene	41.6	10	ug/l	50.0		83	17-163	7	30	
Indeno (1,2,3-cd) pyrene	33.3	10	ug/l	50.0		67	0.1-171	0.2	30	
Dibenzo (a,h) anthracene	35.4	10	ug/l	50.0		71	0.1-227	0.3	30	
Benzo (g,h,i) perylene	31.7	5.0	ug/l	50.0		63	0.1-219	0.9	30	



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**Carbamates and Urea Pesticides - Quality Control**

**Batch W9B0243 - EPA 531.1**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Blank (W9B0243-BLK1)</b>										
Analyzed: 02/02/09 22:16										
Aldicarb sulfoxide	ND	2.0	ug/l							
Aldicarb sulfone	ND	2.0	ug/l							
Oxamyl	ND	2.0	ug/l							
Methomyl	ND	2.0	ug/l							
3-Hydroxycarbofuran	ND	2.0	ug/l							
Aldicarb	ND	2.0	ug/l							
Propoxur (Baygon)	ND	5.0	ug/l							
Carbofuran	ND	5.0	ug/l							
Carbaryl	ND	2.0	ug/l							
Methiocarb	ND	3.0	ug/l							
<b>LCS (W9B0243-BS1)</b>										
Analyzed: 02/02/09 20:26										
Aldicarb sulfoxide	11.2	2.0	ug/l	10.0		112	80-120			
Aldicarb sulfone	11.1	2.0	ug/l	10.0		111	80-120			
Oxamyl	10.3	2.0	ug/l	10.0		103	80-120			
Methomyl	11.4	2.0	ug/l	10.0		114	80-120			
3-Hydroxycarbofuran	10.6	2.0	ug/l	10.0		106	80-120			
Aldicarb	12.0	2.0	ug/l	10.0		120	80-120			
Propoxur (Baygon)	11.9	5.0	ug/l	10.0		119	80-120			
Carbofuran	11.9	5.0	ug/l	10.0		119	80-120			
Carbaryl	10.8	2.0	ug/l	10.0		108	80-120			
Methiocarb	11.1	3.0	ug/l	10.0		111	80-120			
<b>Matrix Spike (W9B0243-MS1)</b>										
Source: 9A24006-01 Analyzed: 02/03/09 08:21										
Aldicarb sulfoxide	7.61	2.0	ug/l	10.0	ND	76	65-135			
Aldicarb sulfone	7.92	2.0	ug/l	10.0	ND	79	65-135			
Oxamyl	7.31	2.0	ug/l	10.0	ND	73	65-135			
Methomyl	8.13	2.0	ug/l	10.0	ND	81	65-135			
3-Hydroxycarbofuran	7.41	2.0	ug/l	10.0	ND	74	65-135			
Aldicarb	7.69	2.0	ug/l	10.0	ND	77	65-135			
Propoxur (Baygon)	8.03	5.0	ug/l	10.0	ND	80	65-135			
Carbofuran	8.79	5.0	ug/l	10.0	ND	88	65-135			
Carbaryl	7.47	2.0	ug/l	10.0	ND	75	65-135			
Methiocarb	7.91	3.0	ug/l	10.0	ND	79	65-135			
<b>Matrix Spike Dup (W9B0243-MSD1)</b>										
Source: 9A24006-01 Analyzed: 02/03/09 09:16										
Aldicarb sulfoxide	7.87	2.0	ug/l	10.0	ND	79	65-135	3	30	
Aldicarb sulfone	8.26	2.0	ug/l	10.0	ND	83	65-135	4	30	
Oxamyl	7.99	2.0	ug/l	10.0	ND	80	65-135	9	30	
Methomyl	7.97	2.0	ug/l	10.0	ND	80	65-135	2	30	
3-Hydroxycarbofuran	7.88	2.0	ug/l	10.0	ND	79	65-135	6	30	
Aldicarb	7.69	2.0	ug/l	10.0	ND	77	65-135	0.05	30	
Propoxur (Baygon)	8.10	5.0	ug/l	10.0	ND	81	65-135	0.9	30	
Carbofuran	8.96	5.0	ug/l	10.0	ND	90	65-135	2	30	
Carbaryl	7.42	2.0	ug/l	10.0	ND	74	65-135	0.7	30	



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**Carbamates and Urea Pesticides - Quality Control**

**Batch W9B0243 - EPA 531.1**

Analyte	Reporting Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Matrix Spike Dup (W9B0243-MSD1)</b>		<b>Source: 9A24006-01</b>		Analyzed: 02/03/09 09:16						
Methiocarb	8.06	3.0	ug/l	10.0	ND	81	65-135	2	30	



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**Chlorinated Pesticides and/or PCBs - Quality Control**

**Batch W9A1251 - EPA 508**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Blank (W9A1251-BLK1)</b>		Analyzed: 01/30/09 13:37								
Surrogate: Tetrachloro-meta-xylene	0.0819		ug/l	0.100		82	70-130			
Surrogate: Decachlorobiphenyl	0.111		ug/l	0.100		111	70-130			
Aldrin	ND	0.010	ug/l							
alpha-BHC	ND	0.010	ug/l							
beta-BHC	ND	0.010	ug/l							
delta-BHC	ND	0.010	ug/l							
gamma-BHC (Lindane)	ND	0.010	ug/l							
4,4'-DDD	ND	0.010	ug/l							
4,4'-DDE	ND	0.010	ug/l							
4,4'-DDT	ND	0.010	ug/l							
Dieldrin	ND	0.010	ug/l							
Endosulfan I	ND	0.010	ug/l							
Endosulfan II	ND	0.010	ug/l							
Endosulfan sulfate	ND	0.010	ug/l							
Endrin	ND	0.010	ug/l							
Endrin aldehyde	ND	0.010	ug/l							
Heptachlor	ND	0.010	ug/l							
Heptachlor epoxide	ND	0.010	ug/l							
Methoxychlor	ND	0.010	ug/l							
Chlorothalonil	ND	0.050	ug/l							
Hexachlorobenzene	ND	0.010	ug/l							
Hexachlorocyclopentadiene	ND	0.050	ug/l							
Propachlor	ND	0.050	ug/l							
Trifluralin	ND	0.010	ug/l							
Chlordane (tech)	ND	0.10	ug/l							
Toxaphene	ND	1.0	ug/l							
PCB-1016	ND	0.10	ug/l							
PCB-1221	ND	0.10	ug/l							
PCB-1232	ND	0.10	ug/l							
PCB-1242	ND	0.10	ug/l							
PCB-1248	ND	0.10	ug/l							
PCB-1254	ND	0.10	ug/l							
PCB-1260	ND	0.10	ug/l							
PCBs, Total	ND	0.50	ug/l							

**LCS (W9A1251-BS1)**

Analyzed: 01/30/09 14:05

Surrogate: Tetrachloro-meta-xylene	0.0839		ug/l	0.100		84	70-130			
Surrogate: Decachlorobiphenyl	0.110		ug/l	0.100		110	70-130			
Aldrin	0.0950	0.010	ug/l	0.100		95	58-120			
alpha-BHC	0.0829	0.010	ug/l	0.100		83	62-125			
beta-BHC	0.0946	0.010	ug/l	0.100		95	54-139			
delta-BHC	0.101	0.010	ug/l	0.100		101	63-142			
gamma-BHC (Lindane)	0.0884	0.010	ug/l	0.100		88	61-128			
4,4'-DDD	0.0937	0.010	ug/l	0.100		94	47-147			





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Date Reported: 02/13/09 14:39

**Chlorinated Pesticides and/or PCBs - Quality Control**

**Batch W9A1251 - EPA 508**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
Analyzed: 01/30/09 14:05										
4,4'-DDE	0.103	0.010	ug/l	0.100		103	54-130			
4,4'-DDT	0.131	0.010	ug/l	0.100		131	42-143			
Dieldrin	0.103	0.010	ug/l	0.100		103	52-130			
Endosulfan I	0.0716	0.010	ug/l	0.100		72	44-119			
Endosulfan II	0.0799	0.010	ug/l	0.100		80	39-120			
Endosulfan sulfate	0.0976	0.010	ug/l	0.100		98	63-158			
Endrin	0.111	0.010	ug/l	0.100		111	57-148			
Endrin aldehyde	0.0929	0.010	ug/l	0.100		93	53-123			
Heptachlor	0.100	0.010	ug/l	0.100		100	56-142			
Heptachlor epoxide	0.103	0.010	ug/l	0.100		103	57-124			
Methoxychlor	0.119	0.010	ug/l	0.100		119	45-165			

**LCS Dup (W9A1251-BSD1)**

Analyzed: 01/30/09 14:33

<i>Surrogate: Tetrachloro-meta-xylene</i>	0.0898		ug/l	0.100		90	70-130			
<i>Surrogate: Decachlorobiphenyl</i>	0.111		ug/l	0.100		111	70-130			
Aldrin	0.0975	0.010	ug/l	0.100		98	58-120	3	25	
alpha-BHC	0.0880	0.010	ug/l	0.100		88	62-125	6	25	
beta-BHC	0.100	0.010	ug/l	0.100		100	54-139	6	25	
delta-BHC	0.101	0.010	ug/l	0.100		101	63-142	0.09	25	
gamma-BHC (Lindane)	0.0924	0.010	ug/l	0.100		92	61-128	4	25	
4,4'-DDD	0.0922	0.010	ug/l	0.100		92	47-147	2	25	
4,4'-DDE	0.100	0.010	ug/l	0.100		100	54-130	3	25	
4,4'-DDT	0.130	0.010	ug/l	0.100		130	42-143	0.9	25	
Dieldrin	0.0995	0.010	ug/l	0.100		99	52-130	3	25	
Endosulfan I	0.0701	0.010	ug/l	0.100		70	44-119	2	25	
Endosulfan II	0.0789	0.010	ug/l	0.100		79	39-120	1	25	
Endosulfan sulfate	0.101	0.010	ug/l	0.100		101	63-158	3	25	
Endrin	0.112	0.010	ug/l	0.100		112	57-148	1	25	
Endrin aldehyde	0.0931	0.010	ug/l	0.100		93	53-123	0.3	25	
Heptachlor	0.104	0.010	ug/l	0.100		104	56-142	3	25	
Heptachlor epoxide	0.101	0.010	ug/l	0.100		101	57-124	1	25	
Methoxychlor	0.122	0.010	ug/l	0.100		122	45-165	3	25	

**Batch W9A1461 - EPA 515.3**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
Analyzed: 02/12/09 12:21										
<i>Surrogate: 2,4-DCAA</i>	10.1		ug/l	10.0		101	70-130			
Dalapon	ND	0.40	ug/l							
3,5-Dichlorobenzoic acid	ND	1.0	ug/l							
Dicamba	ND	0.60	ug/l							
Dichloroprop	ND	0.30	ug/l							
2,4-D	ND	0.40	ug/l							



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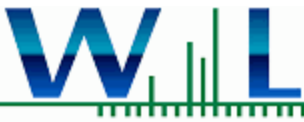
**Chlorinated Herbicides - Quality Control**

**Batch W9A1461 - EPA 515.3**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Blank (W9A1461-BLK1)</b>										
Analyzed: 02/12/09 12:21										
Pentachlorophenol	ND	0.20	ug/l							
2,4,5-TP (Silvex)	ND	0.20	ug/l							
2,4,5-T	ND	0.20	ug/l							
2,4-DB	ND	2.0	ug/l							
Dinoseb	ND	0.40	ug/l							
Bentazon	ND	2.0	ug/l							
DCPA	ND	0.10	ug/l							
Picloram	ND	0.60	ug/l							
Acifluorfen	ND	0.40	ug/l							
Chloramben	ND	1.0	ug/l							

<b>LCS (W9A1461-BS1)</b>										
Analyzed: 02/12/09 12:21										
<i>Surrogate: 2,4-DCAA</i>	9.77		ug/l	10.0		98	70-130			
Dalapon	1.00	0.40	ug/l	1.00		100	70-130			
3,5-Dichlorobenzoic acid	0.801	1.0	ug/l	1.00		80	70-130			
Dicamba	1.08	0.60	ug/l	1.00		108	70-130			
Dichloroprop	0.701	0.30	ug/l	1.00		70	70-130			
2,4-D	0.924	0.40	ug/l	1.00		92	70-130			
Pentachlorophenol	0.895	0.20	ug/l	1.00		90	70-130			
2,4,5-TP (Silvex)	0.894	0.20	ug/l	1.00		89	70-130			
2,4,5-T	0.870	0.20	ug/l	1.00		87	70-130			
2,4-DB	1.04	2.0	ug/l	1.00		104	70-130			
Dinoseb	0.771	0.40	ug/l	1.00		77	70-130			
Bentazon	0.784	2.0	ug/l	1.00		78	70-130			
DCPA	0.859	0.10	ug/l	1.00		86	70-130			
Picloram	0.935	0.60	ug/l	1.00		94	70-130			
Acifluorfen	0.721	0.40	ug/l	1.00		72	70-130			

<b>Matrix Spike (W9A1461-MS1)</b>										
Source: 9A21040-01 Analyzed: 02/12/09 12:21										
<i>Surrogate: 2,4-DCAA</i>	10.1		ug/l	10.0		101	70-130			
Dalapon	1.14	0.40	ug/l	1.00	ND	114	70-130			
3,5-Dichlorobenzoic acid	0.960	1.0	ug/l	1.00	ND	96	70-130			
Dicamba	1.14	0.60	ug/l	1.00	ND	114	70-130			
Dichloroprop	0.774	0.30	ug/l	1.00	ND	77	70-130			
2,4-D	0.960	0.40	ug/l	1.00	ND	96	70-130			
Pentachlorophenol	1.00	0.20	ug/l	1.00	ND	100	70-130			
2,4,5-TP (Silvex)	1.04	0.20	ug/l	1.00	ND	104	70-130			
2,4,5-T	0.961	0.20	ug/l	1.00	ND	96	70-130			
2,4-DB	4.17	2.0	ug/l	1.00	ND	417	70-130			<b>MS-05</b>
Dinoseb	0.901	0.40	ug/l	1.00	ND	90	70-130			
Bentazon	0.849	2.0	ug/l	1.00	ND	85	70-130			
DCPA	1.12	0.10	ug/l	1.00	ND	112	70-130			
Picloram	1.05	0.60	ug/l	1.00	ND	105	70-130			
Acifluorfen	1.01	0.40	ug/l	1.00	ND	101	70-130			



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**Chlorinated Herbicides - Quality Control**

**Batch W9A1461 - EPA 515.3**

Analyte	Reporting Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Matrix Spike (W9A1461-MS2)</b>										
<b>Source: 9A21040-02</b>			<b>Analyzed: 02/12/09 12:21</b>							
<i>Surrogate: 2,4-DCAA</i>	10.9		ug/l	10.0		109	70-130			
Dalapon	1.26	0.40	ug/l	1.00	ND	126	70-130			
3,5-Dichlorobenzoic acid	1.06	1.0	ug/l	1.00	ND	106	70-130			
Dicamba	1.28	0.60	ug/l	1.00	ND	128	70-130			
Dichloroprop	0.886	0.30	ug/l	1.00	ND	89	70-130			
2,4-D	1.04	0.40	ug/l	1.00	ND	104	70-130			
Pentachlorophenol	1.06	0.20	ug/l	1.00	ND	106	70-130			
2,4,5-TP (Silvex)	1.07	0.20	ug/l	1.00	ND	107	70-130			
2,4,5-T	1.04	0.20	ug/l	1.00	ND	104	70-130			
2,4-DB	3.88	2.0	ug/l	1.00	ND	388	70-130			MS-05
Dinoseb	0.979	0.40	ug/l	1.00	ND	98	70-130			
Bentazon	0.846	2.0	ug/l	1.00	ND	85	70-130			
DCPA	1.05	0.10	ug/l	1.00	ND	105	70-130			
Picloram	1.11	0.60	ug/l	1.00	ND	111	70-130			
Acifluorfen	1.12	0.40	ug/l	1.00	ND	112	70-130			
<b>Matrix Spike Dup (W9A1461-MSD1)</b>										
<b>Source: 9A21040-01</b>			<b>Analyzed: 02/12/09 12:21</b>							
<i>Surrogate: 2,4-DCAA</i>	10.1		ug/l	10.0		101	70-130			
Dalapon	0.366	0.40	ug/l	1.00	ND	37	70-130	103	30	MS-05
3,5-Dichlorobenzoic acid	0.965	1.0	ug/l	1.00	ND	96	70-130	0.5	30	
Dicamba	1.13	0.60	ug/l	1.00	ND	113	70-130	1	30	
Dichloroprop	0.759	0.30	ug/l	1.00	ND	76	70-130	2	30	
2,4-D	0.981	0.40	ug/l	1.00	ND	98	70-130	2	30	
Pentachlorophenol	1.02	0.20	ug/l	1.00	ND	102	70-130	1	30	
2,4,5-TP (Silvex)	1.06	0.20	ug/l	1.00	ND	106	70-130	2	30	
2,4,5-T	1.01	0.20	ug/l	1.00	ND	101	70-130	5	30	
2,4-DB	3.81	2.0	ug/l	1.00	ND	381	70-130	9	30	MS-05
Dinoseb	0.914	0.40	ug/l	1.00	ND	91	70-130	1	30	
Bentazon	0.836	2.0	ug/l	1.00	ND	84	70-130	2	30	
DCPA	0.959	0.10	ug/l	1.00	ND	96	70-130	15	30	
Picloram	1.03	0.60	ug/l	1.00	ND	103	70-130	2	30	
Acifluorfen	1.00	0.40	ug/l	1.00	ND	100	70-130	0.5	30	
<b>Matrix Spike Dup (W9A1461-MSD2)</b>										
<b>Source: 9A21040-02</b>			<b>Analyzed: 02/12/09 12:21</b>							
<i>Surrogate: 2,4-DCAA</i>	10.2		ug/l	10.0		102	70-130			
Dalapon	1.29	0.40	ug/l	1.00	ND	129	70-130	2	30	
3,5-Dichlorobenzoic acid	0.998	1.0	ug/l	1.00	ND	100	70-130	6	30	
Dicamba	1.13	0.60	ug/l	1.00	ND	113	70-130	13	30	
Dichloroprop	0.731	0.30	ug/l	1.00	ND	73	70-130	19	30	
2,4-D	0.990	0.40	ug/l	1.00	ND	99	70-130	4	30	
Pentachlorophenol	0.999	0.20	ug/l	1.00	ND	100	70-130	6	30	
2,4,5-TP (Silvex)	1.04	0.20	ug/l	1.00	ND	104	70-130	3	30	
2,4,5-T	0.981	0.20	ug/l	1.00	ND	98	70-130	5	30	
2,4-DB	3.87	2.0	ug/l	1.00	ND	387	70-130	0.1	30	MS-05
Dinoseb	0.909	0.40	ug/l	1.00	ND	91	70-130	7	30	



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**Chlorinated Herbicides - Quality Control**

**Batch W9A1461 - EPA 515.3**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Matrix Spike Dup (W9A1461-MSD2)</b>		<b>Source: 9A21040-02</b>		<b>Analyzed: 02/12/09 12:21</b>						
Bentazon	0.864	2.0	ug/l	1.00	ND	86	70-130	2	30	
DCPA	1.03	0.10	ug/l	1.00	ND	103	70-130	2	30	
Picloram	0.977	0.60	ug/l	1.00	ND	98	70-130	12	30	
Acifluorfen	1.09	0.40	ug/l	1.00	ND	109	70-130	2	30	

**Conventional Chemistry/Physical Parameters by APHA/EPA/ASTM Methods - Quality Control**

**Batch W9A1024 - SM2120B**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>LCS (W9A1024-BS1)</b>		<b>Analyzed: 01/21/09 18:30</b>								
Color	10.0	3.0	Color Units	10.0		100	95-105			
<b>LCS (W9A1024-BS2)</b>		<b>Analyzed: 01/21/09 18:30</b>								
Color	10.0	3.0	Color Units	10.0		100	95-105			
<b>Duplicate (W9A1024-DUP1)</b>		<b>Source: 9A20031-01 Analyzed: 01/21/09 18:30</b>								
Color	ND	3.0	Color Units		0.00				10	
<b>Duplicate (W9A1024-DUP2)</b>		<b>Source: 9A20048-01 Analyzed: 01/21/09 18:30</b>								
Color	ND	3.0	Color Units		0.00				10	



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**Fumigants by EPA Method 504.1 - Quality Control**

**Batch W9A1294 - EPA 504.1**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Blank (W9A1294-BLK1)</b>				Analyzed: 01/29/09 16:30						
1,2-Dibromoethane (EDB)	ND	0.020	ug/l							
1,2-Dibromo-3-chloropropane	ND	0.010	ug/l							
<b>LCS (W9A1294-BS1)</b>				Analyzed: 01/29/09 16:30						
1,2-Dibromoethane (EDB)	0.0210	0.020	ug/l	0.0200		105	70-130			
1,2-Dibromo-3-chloropropane	0.0240	0.010	ug/l	0.0200		120	70-130			
<b>LCS (W9A1294-BS2)</b>				Analyzed: 01/29/09 16:30						
1,2-Dibromoethane (EDB)	0.112	0.020	ug/l	0.100		112	70-130			
1,2-Dibromo-3-chloropropane	0.106	0.010	ug/l	0.100		106	70-130			
<b>Matrix Spike (W9A1294-MS1)</b>				Source: 9A21040-01		Analyzed: 01/29/09 16:30				
1,2-Dibromoethane (EDB)	0.101	0.020	ug/l	0.100	ND	101	65-135			
1,2-Dibromo-3-chloropropane	0.0790	0.010	ug/l	0.100	ND	79	65-135			
<b>Matrix Spike Dup (W9A1294-MSD1)</b>				Source: 9A21040-01		Analyzed: 01/29/09 16:30				
1,2-Dibromoethane (EDB)	0.110	0.020	ug/l	0.100	ND	110	65-135	9	30	
1,2-Dibromo-3-chloropropane	0.0860	0.010	ug/l	0.100	ND	86	65-135	8	30	

**Glyphosate by EPA 547 - Quality Control**

**Batch W9B0149 - EPA 547**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Blank (W9B0149-BLK1)</b>				Analyzed: 01/30/09 17:26						
Glyphosate	ND	5.0	ug/l							
<b>LCS (W9B0149-BS1)</b>				Analyzed: 01/30/09 18:06						
Glyphosate	22.3	5.0	ug/l	25.0		89	71-137			
<b>Matrix Spike (W9B0149-MS1)</b>				Source: 9A22029-02		Analyzed: 01/30/09 19:11				
Glyphosate	25.6	5.0	ug/l	25.0	ND	102	68-134			
<b>Matrix Spike (W9B0149-MS2)</b>				Source: 9A24006-01		Analyzed: 01/30/09 19:53				
Glyphosate	24.7	5.0	ug/l	25.0	ND	99	68-134			
<b>Matrix Spike Dup (W9B0149-MSD1)</b>				Source: 9A22029-02		Analyzed: 01/30/09 19:22				
Glyphosate	24.5	5.0	ug/l	25.0	ND	98	68-134	4	30	
<b>Matrix Spike Dup (W9B0149-MSD2)</b>				Source: 9A24006-01		Analyzed: 01/30/09 20:04				
Glyphosate	22.5	5.0	ug/l	25.0	ND	90	68-134	9	30	



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**Radiological Parameters by APHA/EPA Methods - Quality Control**

**Batch W9A1074 - EPA 900.0**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Blank (W9A1074-BLK1)</b>				Analyzed: 01/30/09 10:17						
Gross Beta	0.0		pCi/L							
Gross Beta counting error (+/-)	0.70		pCi/L							
Gross Beta MDA95	1.1		pCi/L							
<b>LCS (W9A1074-BS1)</b>				Analyzed: 01/30/09 10:17						
Gross Beta	39		pCi/L	30.0		130	70-130			
<b>Matrix Spike (W9A1074-MS1)</b>				Source: 9A19001-01		Analyzed: 01/30/09 10:17				
Gross Beta	38		pCi/L	30.0	2.0	119	70-130			
<b>Matrix Spike Dup (W9A1074-MSD1)</b>				Source: 9A19001-01		Analyzed: 01/30/09 10:17				
Gross Beta	38		pCi/L	30.0	2.0	121	70-130	2	30	

**Batch W9A1141 - SM7110C**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Blank (W9A1141-BLK1)</b>				Analyzed: 01/27/09 17:01						
Gross Alpha	0.00		pCi/L							
Gross Alpha counting error (+/-)	0.628		pCi/L							
Gross Alpha MDA95	0.343		pCi/L							
<b>LCS (W9A1141-BS1)</b>				Analyzed: 01/27/09 17:01						
Gross Alpha	19.6		pCi/L	18.0		109	70-130			
<b>LCS Dup (W9A1141-BSD1)</b>				Analyzed: 01/27/09 17:01						
Gross Alpha	15.9		pCi/L	18.0		88	70-130	21	30	





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**Semivolatile Organic Compounds by GC/MS - Quality Control**

**Batch W9A1226 - EPA 525.2**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Blank (W9A1226-BLK1)</b>		Analyzed: 01/31/09 03:15								
Surrogate: 1,3-Dimethyl-2-NB	4.80		ug/l	5.00		96	73-136			
Surrogate: Perylene-d12	4.35		ug/l	5.00		87	48-141			
Surrogate: Triphenyl phosphate	4.57		ug/l	5.00		91	71-150			
Benzo (a) pyrene	ND	0.10	ug/l							
Bis(2-ethylhexyl)adipate	ND	5.0	ug/l							
Bis(2-ethylhexyl)phthalate	ND	3.0	ug/l							
Alachlor	ND	0.10	ug/l							
Atrazine	ND	0.10	ug/l							
Bromacil	ND	1.0	ug/l							
Butachlor	ND	0.20	ug/l							
Captan	ND	1.0	ug/l							
Chloroprotham	ND	0.10	ug/l							
Cyanazine	ND	0.10	ug/l							
Diazinon	ND	0.10	ug/l							
Dimethoate	ND	0.20	ug/l							
Diphenamid	ND	0.10	ug/l							
Disulfoton	ND	0.10	ug/l							
EPTC	ND	1.0	ug/l							
Metolachlor	ND	0.10	ug/l							
Metribuzin	ND	0.10	ug/l							
Molinate	ND	0.10	ug/l							
Prometon	ND	0.20	ug/l							
Prometryn	ND	0.10	ug/l							
Simazine	ND	0.10	ug/l							
Terbacil	ND	2.0	ug/l							
Thiobencarb	ND	0.20	ug/l							
Trithion	ND	0.10	ug/l							

**LCS (W9A1226-BS1)**

Analyzed: 01/31/09 03:41

Surrogate: 1,3-Dimethyl-2-NB	4.79		ug/l	5.00		96	73-136			
Surrogate: Perylene-d12	4.81		ug/l	5.00		96	48-141			
Surrogate: Triphenyl phosphate	4.80		ug/l	5.00		96	71-150			
Benzo (a) pyrene	5.52	0.10	ug/l	5.00		110	70-130			
Bis(2-ethylhexyl)adipate	5.78	5.0	ug/l	5.00		116	70-130			
Bis(2-ethylhexyl)phthalate	5.74	3.0	ug/l	5.00		115	70-130			
Alachlor	5.78	0.10	ug/l	5.00		116	68-141			
Atrazine	4.26	0.10	ug/l	5.00		85	70-130			
Bromacil	5.75	1.0	ug/l	5.00		115	40-139			
Butachlor	6.23	0.20	ug/l	5.00		125	60-154			
Captan	4.80	1.0	ug/l	5.00		96	0-200			
Chloroprotham	5.18	0.10	ug/l	5.00		104	0-200			
Cyanazine	4.67	0.10	ug/l	5.00		93	0-200			
Diazinon	7.72	0.10	ug/l	5.00		154	51-128			
Dimethoate	3.06	0.20	ug/l	5.00		61	11-180			

Q-08



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**Semivolatile Organic Compounds by GC/MS - Quality Control**

**Batch W9A1226 - EPA 525.2**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>LCS (W9A1226-BS1)</b>										
Analyzed: 01/31/09 03:41										
Diphenamid	5.45	0.10	ug/l	5.00		109	0-200			
Disulfoton	5.07	0.10	ug/l	5.00		101	0-200			
EPTC	4.72	1.0	ug/l	5.00		94	70-130			
Metolachlor	5.38	0.10	ug/l	5.00		108	64-149			
Metribuzin	4.73	0.10	ug/l	5.00		95	52-130			
Molinate	4.82	0.10	ug/l	5.00		96	70-130			
Prometon	3.04	0.20	ug/l	5.00		61	12-154			
Prometryn	4.08	0.10	ug/l	5.00		82	51-147			
Simazine	5.34	0.10	ug/l	5.00		107	53-131			
Terbacil	5.45	2.0	ug/l	5.00		109	70-130			
Thiobencarb	5.63	0.20	ug/l	5.00		113	70-132			
Trithion	ND	0.10	ug/l	5.00			0-200			

<b>Matrix Spike (W9A1226-MS1)</b>										
Source: 9A23056-02 Analyzed: 01/31/09 04:08										
Surrogate: 1,3-Dimethyl-2-NB	5.05		ug/l	5.00		101	73-136			
Surrogate: Perylene-d12	3.48		ug/l	5.00		70	48-141			
Surrogate: Triphenyl phosphate	4.14		ug/l	5.00		83	71-150			
Benzo (a) pyrene	4.19	0.10	ug/l	5.00	ND	84	70-130			
Bis(2-ethylhexyl)adipate	4.70	5.0	ug/l	5.00	ND	94	70-130			
Bis(2-ethylhexyl)phthalate	4.10	3.0	ug/l	5.00	ND	82	70-130			
Alachlor	4.97	0.10	ug/l	5.00	ND	99	68-141			
Atrazine	3.18	0.10	ug/l	5.00	ND	64	70-130			MS-03
Bromacil	5.72	1.0	ug/l	5.00	ND	114	40-139			
Butachlor	5.16	0.20	ug/l	5.00	ND	103	60-154			
Captan	4.61	1.0	ug/l	5.00	ND	92	0-200			
Chloroprotham	5.29	0.10	ug/l	5.00	ND	106	0-200			
Cyanazine	2.97	0.10	ug/l	5.00	ND	59	0-200			
Diazinon	5.68	0.10	ug/l	5.00	ND	114	51-128			
Dimethoate	3.23	0.20	ug/l	5.00	ND	65	11-180			
Diphenamid	4.58	0.10	ug/l	5.00	ND	92	0-200			
Disulfoton	4.55	0.10	ug/l	5.00	ND	91	0-200			
EPTC	4.82	1.0	ug/l	5.00	ND	96	70-130			
Metolachlor	4.46	0.10	ug/l	5.00	ND	89	64-149			
Metribuzin	4.47	0.10	ug/l	5.00	ND	89	52-130			
Molinate	4.92	0.10	ug/l	5.00	ND	98	70-130			
Prometon	1.04	0.20	ug/l	5.00	ND	21	12-154			
Prometryn	1.79	0.10	ug/l	5.00	ND	36	54-147			MS-03
Simazine	4.22	0.10	ug/l	5.00	ND	84	53-131			
Terbacil	4.50	2.0	ug/l	5.00	ND	90	70-130			
Thiobencarb	6.03	0.20	ug/l	5.00	ND	121	70-132			
Trithion	6.14	0.10	ug/l	5.00	ND	123	0-200			

<b>Matrix Spike Dup (W9A1226-MSD1)</b>										
Source: 9A23056-02 Analyzed: 01/31/09 04:34										
Surrogate: 1,3-Dimethyl-2-NB	5.05		ug/l	5.00		101	73-136			
Surrogate: Perylene-d12	3.30		ug/l	5.00		66	48-141			



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**Semivolatile Organic Compounds by GC/MS - Quality Control**

**Batch W9A1226 - EPA 525.2**

Analyte	Reporting Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Matrix Spike Dup (W9A1226-MSD1)</b>		<b>Source: 9A23056-02</b>		<b>Analyzed: 01/31/09 04:34</b>						
<i>Surrogate: Triphenyl phosphate</i>	3.82		ug/l	5.00		76	71-150			
Benzo (a) pyrene	3.92	0.10	ug/l	5.00	ND	78	70-130	7	30	
Bis(2-ethylhexyl)adipate	4.07	5.0	ug/l	5.00	ND	81	70-130	14	30	
Bis(2-ethylhexyl)phthalate	3.45	3.0	ug/l	5.00	ND	69	70-130	17	30	MS-03
Alachlor	3.87	0.10	ug/l	5.00	ND	77	68-141	25	30	
Atrazine	2.71	0.10	ug/l	5.00	ND	54	70-130	16	30	MS-03
Bromacil	5.50	1.0	ug/l	5.00	ND	110	40-139	4	30	
Butachlor	4.44	0.20	ug/l	5.00	ND	89	60-154	15	30	
Captan	4.58	1.0	ug/l	5.00	ND	92	0-200	0.7	200	
Chloroprotham	5.33	0.10	ug/l	5.00	ND	107	0-200	0.8	200	
Cyanazine	2.43	0.10	ug/l	5.00	ND	49	0-200	20	200	
Diazinon	4.36	0.10	ug/l	5.00	ND	87	51-128	26	30	
Dimethoate	3.31	0.20	ug/l	5.00	ND	66	11-180	2	30	
Diphenamid	4.15	0.10	ug/l	5.00	ND	83	0-200	10	200	
Disulfoton	4.14	0.10	ug/l	5.00	ND	83	0-200	9	200	
EPTC	4.63	1.0	ug/l	5.00	ND	93	70-130	4	30	
Metolachlor	3.76	0.10	ug/l	5.00	ND	75	64-149	17	30	
Metribuzin	3.71	0.10	ug/l	5.00	ND	74	52-130	19	30	
Molinate	4.85	0.10	ug/l	5.00	ND	97	70-130	1	30	
Prometon	0.760	0.20	ug/l	5.00	ND	15	12-154	31	30	MS-03, Q-12
Prometryn	1.16	0.10	ug/l	5.00	ND	23	54-147	43	30	MS-03
Simazine	3.22	0.10	ug/l	5.00	ND	64	53-131	27	30	
Terbacil	4.37	2.0	ug/l	5.00	ND	87	70-130	3	30	
Thiobencarb	5.65	0.20	ug/l	5.00	ND	113	70-132	7	30	
Trithion	5.43	0.10	ug/l	5.00	ND	109	0-200	12	200	



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Report ID: 9A21040  
Project ID: Attachment B

Date Received: 01/21/09 12:50  
Date Reported: 02/13/09 14:39

**Volatile Organic Compounds by EPA Method 524.2 - Quality Control**

**Batch W9A1094 - EPA 524.2**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Blank (W9A1094-BLK1)</b>				Analyzed: 01/22/09 09:43						
<i>Surrogate: 1,2-Dichlorobenzene-d4</i>	9.97		ug/l	10.0		100	70-130			
<i>Surrogate: 4-Bromofluorobenzene</i>	9.95		ug/l	10.0		100	70-130			
Dichlorodifluoromethane (Freon 12)	ND	0.50	ug/l							
Chloromethane	ND	0.50	ug/l							
Vinyl chloride	ND	0.50	ug/l							
Bromomethane	ND	0.50	ug/l							
Chloroethane	ND	0.50	ug/l							
Trichlorofluoromethane	ND	5.0	ug/l							
Freon 113	ND	5.0	ug/l							
1,1-Dichloroethene	ND	0.50	ug/l							
Methylene chloride	ND	0.50	ug/l							
trans-1,2-Dichloroethene	ND	0.50	ug/l							
Methyl tert-butyl ether (MTBE)	ND	3.0	ug/l							
1,1-Dichloroethane	ND	0.50	ug/l							
Di-isopropyl ether	ND	3.0	ug/l							
Ethyl tert-butyl ether	ND	3.0	ug/l							
2,2-Dichloropropane	ND	0.50	ug/l							
cis-1,2-Dichloroethene	ND	0.50	ug/l							
Bromochloromethane	ND	0.50	ug/l							
Chloroform	ND	0.50	ug/l							
1,1,1-Trichloroethane	ND	0.50	ug/l							
Carbon tetrachloride	ND	0.50	ug/l							
1,1-Dichloropropene	ND	0.50	ug/l							
Benzene	ND	0.50	ug/l							
1,2-Dichloroethane	ND	0.50	ug/l							
Tert-amyl methyl ether	ND	3.0	ug/l							
Trichloroethene	ND	0.50	ug/l							
1,2-Dichloropropane	ND	0.50	ug/l							
Dibromomethane	ND	0.50	ug/l							
Bromodichloromethane	ND	0.50	ug/l							
cis-1,3-Dichloropropene	ND	0.50	ug/l							
4-Methyl-2-pentanone	ND	5.0	ug/l							
2-Chloroethyl vinyl ether	ND	1.0	ug/l							
Toluene	ND	0.50	ug/l							
trans-1,3-Dichloropropene	ND	0.50	ug/l							
1,1,2-Trichloroethane	ND	0.50	ug/l							
Tetrachloroethene	ND	0.50	ug/l							
1,3-Dichloropropane	ND	0.50	ug/l							
Dibromochloromethane	ND	0.50	ug/l							
2-Hexanone	ND	5.0	ug/l							
Chlorobenzene	ND	0.50	ug/l							
1,1,1,2-Tetrachloroethane	ND	0.50	ug/l							
Ethylbenzene	ND	0.50	ug/l							
m,p-Xylene	ND	0.50	ug/l							



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**Volatile Organic Compounds by EPA Method 524.2 - Quality Control**

**Batch W9A1094 - EPA 524.2**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>Blank (W9A1094-BLK1)</b>				Analyzed: 01/22/09 09:43						
o-Xylene	ND	0.50	ug/l							
Styrene	ND	0.50	ug/l							
Bromoform	ND	0.50	ug/l							
Isopropylbenzene	ND	0.50	ug/l							
Bromobenzene	ND	0.50	ug/l							
1,1,2,2-Tetrachloroethane	ND	0.50	ug/l							
1,2,3-Trichloropropane	ND	0.50	ug/l							
n-Propylbenzene	ND	0.50	ug/l							
2-Chlorotoluene	ND	0.50	ug/l							
4-Chlorotoluene	ND	0.50	ug/l							
1,3,5-Trimethylbenzene	ND	0.50	ug/l							
tert-Butylbenzene	ND	0.50	ug/l							
1,2,4-Trimethylbenzene	ND	0.50	ug/l							
sec-Butylbenzene	ND	0.50	ug/l							
m-Dichlorobenzene	ND	0.50	ug/l							
p-Isopropyltoluene	ND	0.50	ug/l							
p-Dichlorobenzene	ND	0.50	ug/l							
o-Dichlorobenzene	ND	0.50	ug/l							
n-Butylbenzene	ND	0.50	ug/l							
1,2,4-Trichlorobenzene	ND	0.50	ug/l							
Hexachlorobutadiene	ND	0.50	ug/l							
Naphthalene	ND	0.50	ug/l							
1,2,3-Trichlorobenzene	ND	0.50	ug/l							
Xylenes (total)	ND	0.50	ug/l							
1,3 Dichloropropene (Total)	ND	0.50	ug/l							

**LCS (W9A1094-BS1)**

Analyzed: 01/22/09 11:21

Surrogate: 1,2-Dichlorobenzene-d4	10.4		ug/l	10.0		104	70-130			
Surrogate: 4-Bromofluorobenzene	10.1		ug/l	10.0		101	70-130			
Dichlorodifluoromethane (Freon 12)	6.88	0.50	ug/l	6.00		115	70-130			
Chloromethane	6.57	0.50	ug/l	6.00		110	70-130			
Vinyl chloride	6.43	0.50	ug/l	6.00		107	70-130			
Bromomethane	5.78	0.50	ug/l	6.00		96	70-130			
Chloroethane	7.13	0.50	ug/l	6.00		119	70-130			
Trichlorofluoromethane	7.28	5.0	ug/l	6.00		121	70-130			
Freon 113	7.31	5.0	ug/l	6.00		122	70-130			
1,1-Dichloroethene	6.93	0.50	ug/l	6.00		116	70-130			
Methylene chloride	6.87	0.50	ug/l	6.00		114	70-130			
trans-1,2-Dichloroethene	7.12	0.50	ug/l	6.00		119	70-130			
Methyl tert-butyl ether (MTBE)	6.97	3.0	ug/l	6.00		116	70-130			
1,1-Dichloroethane	6.84	0.50	ug/l	6.00		114	70-130			
Di-isopropyl ether	7.33	3.0	ug/l	6.00		122	70-130			
Ethyl tert-butyl ether	7.01	3.0	ug/l	6.00		117	70-130			
2-Butanone	6.69	5.0	ug/l	6.00		112	70-130			



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**Volatile Organic Compounds by EPA Method 524.2 - Quality Control**

**Batch W9A1094 - EPA 524.2**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>LCS (W9A1094-BS1)</b>										
Analyzed: 01/22/09 11:21										
2,2-Dichloropropane	7.06	0.50	ug/l	6.00		118	70-130			
cis-1,2-Dichloroethene	7.11	0.50	ug/l	6.00		118	70-130			
Bromochloromethane	7.40	0.50	ug/l	6.00		123	70-130			
Chloroform	7.13	0.50	ug/l	6.00		119	70-130			
1,1,1-Trichloroethane	7.40	0.50	ug/l	6.00		123	70-130			
Carbon tetrachloride	7.43	0.50	ug/l	6.00		124	70-130			
1,1-Dichloropropene	6.99	0.50	ug/l	6.00		116	70-130			
Benzene	7.06	0.50	ug/l	6.00		118	70-130			
1,2-Dichloroethane	7.19	0.50	ug/l	6.00		120	70-130			
Tert-amyl methyl ether	6.90	3.0	ug/l	6.00		115	70-130			
Trichloroethene	6.66	0.50	ug/l	6.00		111	70-130			
1,2-Dichloropropane	7.01	0.50	ug/l	6.00		117	70-130			
Dibromomethane	7.36	0.50	ug/l	6.00		123	70-130			
Bromodichloromethane	7.25	0.50	ug/l	6.00		121	70-130			
cis-1,3-Dichloropropene	7.19	0.50	ug/l	6.00		120	70-130			
4-Methyl-2-pentanone	6.87	5.0	ug/l	6.00		114	70-130			
2-Chloroethyl vinyl ether	6.76	1.0	ug/l	6.00		113	70-130			
Toluene	7.02	0.50	ug/l	6.00		117	70-130			
trans-1,3-Dichloropropene	7.01	0.50	ug/l	6.00		117	70-130			
1,1,2-Trichloroethane	6.86	0.50	ug/l	6.00		114	70-130			
Tetrachloroethene	7.03	0.50	ug/l	6.00		117	70-130			
1,3-Dichloropropane	7.10	0.50	ug/l	6.00		118	70-130			
Dibromochloromethane	7.09	0.50	ug/l	6.00		118	70-130			
2-Hexanone	7.01	5.0	ug/l	6.00		117	70-130			
Chlorobenzene	7.27	0.50	ug/l	6.00		121	70-130			
1,1,1,2-Tetrachloroethane	7.25	0.50	ug/l	6.00		121	70-130			
Ethylbenzene	7.35	0.50	ug/l	6.00		122	70-130			
m,p-Xylene	14.5	0.50	ug/l	12.0		121	70-130			
o-Xylene	7.09	0.50	ug/l	6.00		118	70-130			
Styrene	7.21	0.50	ug/l	6.00		120	70-130			
Bromoform	7.36	0.50	ug/l	6.00		123	70-130			
Isopropylbenzene	7.41	0.50	ug/l	6.00		124	70-130			
Bromobenzene	7.04	0.50	ug/l	6.00		117	70-130			
1,1,2,2-Tetrachloroethane	7.30	0.50	ug/l	6.00		122	70-130			
1,2,3-Trichloropropane	7.46	0.50	ug/l	6.00		124	70-130			
n-Propylbenzene	7.37	0.50	ug/l	6.00		123	70-130			
2-Chlorotoluene	7.08	0.50	ug/l	6.00		118	70-130			
4-Chlorotoluene	7.25	0.50	ug/l	6.00		121	70-130			
1,3,5-Trimethylbenzene	7.37	0.50	ug/l	6.00		123	70-130			
tert-Butylbenzene	7.29	0.50	ug/l	6.00		122	70-130			
1,2,4-Trimethylbenzene	7.32	0.50	ug/l	6.00		122	70-130			
sec-Butylbenzene	7.25	0.50	ug/l	6.00		121	70-130			
m-Dichlorobenzene	7.25	0.50	ug/l	6.00		121	70-130			
p-Isopropyltoluene	7.50	0.50	ug/l	6.00		125	70-130			



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Date Reported: 02/13/09 14:39

**Volatile Organic Compounds by EPA Method 524.2 - Quality Control**

**Batch W9A1094 - EPA 524.2**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
Analyzed: 01/22/09 11:21										
<b>LCS (W9A1094-BS1)</b>										
p-Dichlorobenzene	7.13	0.50	ug/l	6.00		119	70-130			
o-Dichlorobenzene	7.40	0.50	ug/l	6.00		123	70-130			
n-Butylbenzene	7.28	0.50	ug/l	6.00		121	70-130			
1,2,4-Trichlorobenzene	7.10	0.50	ug/l	6.00		118	70-130			
Hexachlorobutadiene	6.91	0.50	ug/l	6.00		115	70-130			
Naphthalene	7.01	0.50	ug/l	6.00		117	70-130			
1,2,3-Trichlorobenzene	7.48	0.50	ug/l	6.00		125	70-130			

**LCS Dup (W9A1094-BSD1)**

Analyzed: 01/22/09 11:52

<i>Surrogate: 1,2-Dichlorobenzene-d4</i>	10.5		ug/l	10.0		105	70-130			
<i>Surrogate: 4-Bromofluorobenzene</i>	10.2		ug/l	10.0		102	70-130			
Dichlorodifluoromethane (Freon 12)	6.18	0.50	ug/l	6.00		103	70-130	11	30	
Chloromethane	6.09	0.50	ug/l	6.00		102	70-130	8	30	
Vinyl chloride	5.96	0.50	ug/l	6.00		99	70-130	8	30	
Bromomethane	5.79	0.50	ug/l	6.00		96	70-130	0.2	30	
Chloroethane	6.69	0.50	ug/l	6.00		112	70-130	6	30	
Trichlorofluoromethane	6.81	5.0	ug/l	6.00		114	70-130	7	30	
Freon 113	6.89	5.0	ug/l	6.00		115	70-130	6	30	
1,1-Dichloroethane	6.90	0.50	ug/l	6.00		115	70-130	0.4	30	
Methylene chloride	6.71	0.50	ug/l	6.00		112	70-130	2	30	
trans-1,2-Dichloroethene	6.73	0.50	ug/l	6.00		112	70-130	6	30	
Methyl tert-butyl ether (MTBE)	7.22	3.0	ug/l	6.00		120	70-130	4	30	
1,1-Dichloroethane	6.77	0.50	ug/l	6.00		113	70-130	1	30	
Di-isopropyl ether	7.09	3.0	ug/l	6.00		118	70-130	3	30	
Ethyl tert-butyl ether	6.90	3.0	ug/l	6.00		115	70-130	2	30	
2-Butanone	6.53	5.0	ug/l	6.00		109	70-130	2	30	
2,2-Dichloropropane	7.24	0.50	ug/l	6.00		121	70-130	3	30	
cis-1,2-Dichloroethene	6.80	0.50	ug/l	6.00		113	70-130	4	30	
Bromochloromethane	6.80	0.50	ug/l	6.00		113	70-130	8	30	
Chloroform	7.00	0.50	ug/l	6.00		117	70-130	2	30	
1,1,1-Trichloroethane	6.95	0.50	ug/l	6.00		116	70-130	6	30	
Carbon tetrachloride	6.94	0.50	ug/l	6.00		116	70-130	7	30	
1,1-Dichloropropene	6.63	0.50	ug/l	6.00		110	70-130	5	30	
Benzene	6.89	0.50	ug/l	6.00		115	70-130	2	30	
1,2-Dichloroethane	6.97	0.50	ug/l	6.00		116	70-130	3	30	
Tert-amyl methyl ether	6.61	3.0	ug/l	6.00		110	70-130	4	30	
Trichloroethene	6.69	0.50	ug/l	6.00		112	70-130	0.4	30	
1,2-Dichloropropane	6.70	0.50	ug/l	6.00		112	70-130	5	30	
Dibromomethane	7.14	0.50	ug/l	6.00		119	70-130	3	30	
Bromodichloromethane	6.91	0.50	ug/l	6.00		115	70-130	5	30	
cis-1,3-Dichloropropene	6.86	0.50	ug/l	6.00		114	70-130	5	30	
4-Methyl-2-pentanone	6.81	5.0	ug/l	6.00		114	70-130	0.9	30	
2-Chloroethyl vinyl ether	6.40	1.0	ug/l	6.00		107	70-130	5	30	
Toluene	6.93	0.50	ug/l	6.00		116	70-130	1	30	





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**Volatile Organic Compounds by EPA Method 524.2 - Quality Control**

**Batch W9A1094 - EPA 524.2**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
LCS Dup (W9A1094-BSD1) Analyzed: 01/22/09 11:52										
trans-1,3-Dichloropropene	6.84	0.50	ug/l	6.00		114	70-130	2	30	
1,1,2-Trichloroethane	6.88	0.50	ug/l	6.00		115	70-130	0.3	30	
Tetrachloroethene	6.97	0.50	ug/l	6.00		116	70-130	0.9	30	
1,3-Dichloropropane	6.89	0.50	ug/l	6.00		115	70-130	3	30	
Dibromochloromethane	7.24	0.50	ug/l	6.00		121	70-130	2	30	
2-Hexanone	7.11	5.0	ug/l	6.00		118	70-130	1	30	
Chlorobenzene	7.09	0.50	ug/l	6.00		118	70-130	3	30	
1,1,1,2-Tetrachloroethane	7.33	0.50	ug/l	6.00		122	70-130	1	30	
Ethylbenzene	7.22	0.50	ug/l	6.00		120	70-130	2	30	
m,p-Xylene	14.4	0.50	ug/l	12.0		120	70-130	0.8	30	
o-Xylene	7.07	0.50	ug/l	6.00		118	70-130	0.3	30	
Styrene	7.10	0.50	ug/l	6.00		118	70-130	2	30	
Bromoform	7.45	0.50	ug/l	6.00		124	70-130	1	30	
Isopropylbenzene	7.19	0.50	ug/l	6.00		120	70-130	3	30	
Bromobenzene	6.97	0.50	ug/l	6.00		116	70-130	1	30	
1,1,2,2-Tetrachloroethane	6.94	0.50	ug/l	6.00		116	70-130	5	30	
1,2,3-Trichloropropane	7.17	0.50	ug/l	6.00		120	70-130	4	30	
n-Propylbenzene	7.23	0.50	ug/l	6.00		120	70-130	2	30	
2-Chlorotoluene	6.87	0.50	ug/l	6.00		114	70-130	3	30	
4-Chlorotoluene	7.08	0.50	ug/l	6.00		118	70-130	2	30	
1,3,5-Trimethylbenzene	7.08	0.50	ug/l	6.00		118	70-130	4	30	
tert-Butylbenzene	7.14	0.50	ug/l	6.00		119	70-130	2	30	
1,2,4-Trimethylbenzene	7.12	0.50	ug/l	6.00		119	70-130	3	30	
sec-Butylbenzene	7.10	0.50	ug/l	6.00		118	70-130	2	30	
m-Dichlorobenzene	7.03	0.50	ug/l	6.00		117	70-130	3	30	
p-Isopropyltoluene	7.26	0.50	ug/l	6.00		121	70-130	3	30	
p-Dichlorobenzene	7.07	0.50	ug/l	6.00		118	70-130	0.8	30	
o-Dichlorobenzene	7.29	0.50	ug/l	6.00		122	70-130	1	30	
n-Butylbenzene	7.14	0.50	ug/l	6.00		119	70-130	2	30	
1,2,4-Trichlorobenzene	7.09	0.50	ug/l	6.00		118	70-130	0.1	30	
Hexachlorobutadiene	7.24	0.50	ug/l	6.00		121	70-130	5	30	
Naphthalene	7.66	0.50	ug/l	6.00		128	70-130	9	30	
1,2,3-Trichlorobenzene	7.62	0.50	ug/l	6.00		127	70-130	2	30	

**Batch W9A1166 - EPA 524.2**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
Blank (W9A1166-BLK1) Analyzed: 01/23/09 16:28										
Surrogate: 1,2-Dichlorobenzene-d4	11.8		ug/l	10.0		118	70-130			
Surrogate: 4-Bromofluorobenzene	11.5		ug/l	10.0		115	70-130			
Acrolein	ND	5.0	ug/l							
Acrylonitrile	ND	2.0	ug/l							



Advanced Technology Laboratories  
3275 Walnut Street  
Signal Hill CA, 90755

Report ID: 9A21040  
Project ID: Attachment B

Date Received: 01/21/09 12:50  
Date Reported: 02/13/09 14:39

**Volatile Organic Compounds by EPA Method 524.2 - Quality Control**

**Batch W9A1166 - EPA 524.2**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	% REC Limits	RPD	RPD Limit	Data Qualifiers
<b>LCS (W9A1166-BS1)</b>				Analyzed: 01/23/09 14:44						
Surrogate: 1,2-Dichlorobenzene-d4	11.6		ug/l	10.0		116	70-130			
Surrogate: 4-Bromofluorobenzene	11.6		ug/l	10.0		116	70-130			
Acrolein	22.2	5.0	ug/l	20.0		111	70-130			
Acrylonitrile	20.8	2.0	ug/l	20.0		104	70-130			
<b>LCS Dup (W9A1166-BSD1)</b>				Analyzed: 01/23/09 15:19						
Surrogate: 1,2-Dichlorobenzene-d4	11.6		ug/l	10.0		116	70-130			
Surrogate: 4-Bromofluorobenzene	11.3		ug/l	10.0		113	70-130			
Acrolein	22.7	5.0	ug/l	20.0		114	70-130	2	30	
Acrylonitrile	21.1	2.0	ug/l	20.0		106	70-130	2	30	



Advanced Technology Laboratories  
3275 Walnut Street  
Signal Hill CA, 90755

**Report ID:** 9A21040  
**Project ID:** Attachment B

**Date Received:** 01/21/09 12:50  
**Date Reported:** 02/13/09 14:39

### Notes and Definitions

- S-GC** Surrogate recovery outside of control limits due to a possible matrix effect. The data was accepted based on valid recovery of the remaining surrogate.
- S\_MAX** Analysis subcontracted to Maxxam Analytics INC., NELAP Certificate 02106A
- S\_FGL** Analysis subcontracted to FGL Laboratories, NELAC Certificate 01110CA
- S\_EMS** Analysis subcontracted to EMS Laboratories, non NELAP certified, but is ELAP certified (ELAP Certificate 1119)
- Q-12** The RPD result exceeded the QC control limits possibly due to a possible matrix effect; however, both percent recoveries were acceptable. Sample results for the QC batch were accepted based on the percent recoveries and/or other acceptable QC data.
- Q-08** High bias in the QC sample does not affect sample result since analyte was not detected.
- MS-05** The spike recovery and/or RPD were outside acceptance limits for the MS and/or MSD due to possible matrix interference. The LCS and/or LCSD were within acceptance limits showing that the laboratory is in control and the data is acceptable.
- MS-03** Multiple analyses indicate the percent recovery is out of acceptance limits due to a possible matrix effect.
- ND** NOT DETECTED at or above the Reporting Limit. If J-value reported, then NOT DETECTED at or above the Method Detection Limit (MDL)
- dry** Sample results reported on a dry weight basis
- RPD** Relative Percent Difference
- % Rec** Percent Recovery
- Sub** Subcontracted analysis, original report available upon request
- MDL** Method Detection Limit
- MDA** Minimum Detectable Activity
- MRL** Method Reporting Limit

Any remaining sample(s) will be disposed of one month from the final report date unless other arrangements are made in advance.

An Absence of Total Coliform meets the drinking water standards as established by the California Department of Health Services.

The Reporting Limit (RL) is referenced as the Laboratory's Practical Quantitation Limit (PQL) or the Detection Limit for Reporting Purposes (DLR).

All samples collected by Weck Laboratories have been sampled in accordance to laboratory SOP Number MIS002.



Your Project #: 9A21040-01  
Your C.O.C. #: n/a

Attention: Kim G. Tu  
WECK LABORATORIES INC  
14859 East Clark Ave  
Industry, CA  
USA 91745

Report Date: 2009/02/06

### CERTIFICATE OF ANALYSIS

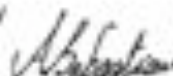
**MAXXAM JOB #: A607801**  
Received: 2009/01/23, 12:22

Sample Matrix: Water  
# Samples Received: 2

Analytes	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Method Reference
2,3,7,8-TCDF in Water (16136) 8	2	2009/02/04	2009/02/04	EPL SOP-00410	EPA 16136 mod.

(1) This test was performed in Maxxam Mississauga under Maxxam Burlington SCC Accreditation

#### Encryption Key

 Ancy Sebastian

20 Feb 2009 07:42:41 -0500

Please direct all questions regarding this Certificate of Analysis to your Project Manager.

ANCY SEBASTIAN, C.Tech., Senior Project Manager, Air Toxics  
Email: Ancy.Sebastian@maxxamanalytics.com  
Phone# (905) 617-5831

Maxxam has procedures in place to guard against improper use of the electronic signature and have the required "signatories", as per section 5.13.2 of ISO/IEC 17025:2005(E), signing the reports. SCC and CALA have approved this reporting process and electronic report format.

Maxxam Analytics Inc. is a NELAC accredited laboratory. Certificate # CANA001. Use of the NELAC logo however does not insure that Maxxam is accredited for all of the methods indicated. This certificate shall not be reproduced except in full, without the written approval of Maxxam Analytics Inc. Maxxam has procedures in place to guard against improper use of the electronic signature and have the required "signatories", as per section

Total cover pages: 1

Page 1 of 5

Maxxam Job #: A907801  
 Report Date: 2009/02/06

 WECK LABORATORIES INC  
 Client Project #: SA21040-01

**DIOXINS AND FURANS BY HRMS (WATER)**

Maxxam ID		904120					
Sampling Date		2009/01/03					
		08:00					
CDC Number		N/A		TOXIC EQUIVALENCY		# of	
	Units	SA21040-01-103265-091W	EDL	TEF (2005 WHO)	TEQ/EDL	Isomers	QC Batch

2,3,7,8-Tetra CDD *	pg/L	<0.36	0.36	1.00	0.360	N/A	1734950
TOTAL TOXIC EQUIVALENCY	pg/L	N/A	N/A	N/A	0.360	N/A	N/A
<b>Surrogate Recovery (%)</b>							
C13-2378 TetraCDD	%	101	N/A	N/A	N/A	N/A	1734950

N/A = Not Applicable  
 EDL = Estimated Detection Limit  
 QC Batch = Quality Control Batch  
 T-CDD = Chloro Dibenzo-p-Dioxin  
 TEF = Toxic Equivalency Factor, TEQ = Toxic Equivalency Quotient  
 The Total Toxic Equivalency (TEQ) value reported is the sum of Toxic Equivalent Quotients for the congeners tested.  
 EDL = Estimated Detection Limit  
 WHO(2005): The 2005 World Health Organization, Human and Mammalian Toxic Equivalency Factors for Dioxins and Dioxin-like Compounds

Maxxam ID		904130					
Sampling Date		2009/01/03					
		11:40					
CDC Number		N/A		TOXIC EQUIVALENCY		# of	
	Units	SA21040-02-103365-002/E	EDL	TEF (2005 WHO)	TEQ/EDL	Isomers	QC Batch

2,3,7,8-Tetra CDD *	pg/L	<0.36	0.36	1.00	0.360	N/A	1734950
TOTAL TOXIC EQUIVALENCY	pg/L	N/A	N/A	N/A	0.360	N/A	N/A
<b>Surrogate Recovery (%)</b>							
C13-2378 TetraCDD	%	110	N/A	N/A	N/A	N/A	1734950

N/A = Not Applicable  
 EDL = Estimated Detection Limit  
 QC Batch = Quality Control Batch  
 T-CDD = Chloro Dibenzo-p-Dioxin  
 TEF = Toxic Equivalency Factor, TEQ = Toxic Equivalency Quotient  
 The Total Toxic Equivalency (TEQ) value reported is the sum of Toxic Equivalent Quotients for the congeners tested.  
 EDL = Estimated Detection Limit  
 WHO(2005): The 2005 World Health Organization, Human and Mammalian Toxic Equivalency Factors for Dioxins and Dioxin-like Compounds

Maxxam Job #: A907801  
 Report Date: 2009/02/06

 WECK LABORATORIES INC  
 Client Project #: SA21040-01

**Test Summary**

<b>Maxxam ID</b>	BD4129	<b>Collected</b>	2009/01/20
<b>Sample ID</b>	SA21040-01-103365-001W	<b>Shipped</b>	
<b>Matrix</b>	Water	<b>Received</b>	2009/01/23

Test Description	Instrumentation	Batch	Extracted	Analyzed	Analyst
2,3,7,8-TCDF in Water (16136)	HRMS/MS	1734950	2009/02/04	2009/02/04	BY

<b>Maxxam ID</b>	BD4130	<b>Collected</b>	2009/01/20
<b>Sample ID</b>	SA21040-02-103365-002E	<b>Shipped</b>	
<b>Matrix</b>	Water	<b>Received</b>	2009/01/23

Test Description	Instrumentation	Batch	Extracted	Analyzed	Analyst
2,3,7,8-TCDF in Water (16136)	HRMS/MS	1734950	2009/02/04	2009/02/04	BY

Maxxam Job #: A807801  
Report Date: 2008/02/06

WECK LABORATORIES INC  
Client Project #: SA21040-01

**DIOXINS AND FURANS BY HRMS (WATER)**

2,3,7,8-TCDF in Water (16138) HRMS: Cleanup spike not added

Results relate only to the items tested.



WECK LABORATORIES INC  
 Attention: Kim G Tu  
 Client Project #: SAQ1040-01  
 P.O. #:  
 Project name:

Quality Assurance Report

Maxxam Job Number: GA807801

QA/QC Batch			Date Analyzed					
Num Int	QC Type	Parameter	yyyy/mm/dd	Value	%Recovery	Units	QC Limits	
1754950 BY	Soaked Blank	C13-2378 TetraCDD	2009/02/04		107	%	24 - 164	
		2,3,7,8-Tetra CDD	2009/02/04	ND, EDL=0.50	95	pg/L	67 - 159	
	Method Blank	C13-2378 TetraCDD	2009/02/04		100	%	24 - 164	
		2,3,7,8-Tetra CDD	2009/02/04	ND, EDL=0.35		pg/L		

ND = Not detected  
 SPKCE = Fortified sample



90249

Weck Laboratories, Inc.

Environmental and Analytical Services - Since 1964

## SUBCONTRACT ORDER

Subcontract Laboratory:  
FGL Environmental - Sub - contract  
853 Corporation Street  
Santa Paula, CA 93060  
Phone : (805) 392-2000  
Fax: (805) 525-4172

Turn Around Time: Normal

Project Manager: Kim G Tu

Name of Sampler: \_\_\_\_\_

Sampler Employed by: \_\_\_\_\_

Sample ID: 9A21046-01 Sample ID: 103365-001/W Matrix: Water Date Sampled: 01/20/09 Time Sampled: 08:00

## Sample comment:

Analysis	Due	Expires	Comments
Strontium 90-SUB	02/04/09 12:00	07/19/09 08:00	
Radium 228-FGL Sub	02/04/09 12:00	07/19/09 08:00	
Radium 226-FGL Sub	02/04/09 12:00	07/19/09 08:00	

Containers Supplied:

1 L Poly - Radiochemistry 1 L Poly - Radiochemistry 1 L Poly - Rad 226 - HNO 1 L Poly - Strontium 90 - 1

Sample ID: 9A21046-02 Sample ID: 103365-002/E Matrix: Water Date Sampled: 01/20/09 Time Sampled: 11:40

## Sample comment:

Analysis	Due	Expires	Comments
Strontium 90-SUB	02/04/09 12:00	07/19/09 11:40	
Radium 228-FGL Sub	02/04/09 12:00	07/19/09 11:40	
Radium 226-FGL Sub	02/04/09 12:00	07/19/09 11:40	

Containers Supplied:

1 L Poly - Radiochemistry 1 L Poly - Radiochemistry 1 L Poly - Rad 226 - HNO 1 L Poly - Strontium 90 - 1

Remarks / Special Comments:

Sample Condition:

Temperature: \_\_\_\_\_

Preserved: Yes / No

Evidence Seal Intact: Yes / No

Container Attacked: Yes / No

Preserved at Lab: Yes / No

Relinquished By: James Grier 1/22/09 11:20

Received By: M. Kelly 1/22/09 11:20

Relinquished By: M. Kelly 1/22/09 15:05

Received By: DMG 1/22/09 15:20

### Santa Paula - Condition Upon Receipt (Attach to COC)

#### Sample Receipt:

- Number of ice chests/packages received:  
None as OTC if received over the counter unpackaged. 1
- Were samples received in a chilled condition? Temps: 20.1 /      /      /      /       
Acceptable is 2° to 6° C. Also acceptable is received on ice (ROI) for the same day of sampling or received at room temperature (RRT) if sampled within one hour of receipt. Client contact for temperature failures must be documented below. If many packages are received at one time check for tests/H.T.'s/rushes/Bacti's to prioritize further review. Please notify Microbiology personnel immediately of bacti samples received.
- Do the number of bottles received agree with the COC?  Yes  No  N/A
- Were samples received intact? (i.e. no broken bottles, leaks etc.)  Yes  No
- Were sample custody seals intact?  N/A  Yes  No

Sign and date the COC, obtain LIMS sample numbers, select methods/tests and print labels.

#### Sample Verification, Labeling and Distribution:

- Were all requested analyses understood and acceptable?  Yes  No
- Did bottle labels correspond with the client's ID's?  Yes  No
- Were all bottles requiring sample preservation properly preserved?  Yes  No  N/A FGL
- VOAs checked for Headspace?  Yes  No  N/A
- Were all analyses within holding times at time of receipt?  Yes  No
- Have rush or project due dates been checked and accepted?  N/A  Yes  No

Attach labels to the containers and include a copy of the COC for lab delivery.

Sample Receipt, Login and Verification completed by (initials): [Signature]

#### Discrepancy Documentation:

Any items above which are "No" or do not meet specifications (i.e. temps) must be resolved.

- Person Contacted: \_\_\_\_\_ Phone Number: \_\_\_\_\_  
Initiated By: \_\_\_\_\_ Date: \_\_\_\_\_  
Problem: \_\_\_\_\_

Resolution: \_\_\_\_\_

- Person Contacted: \_\_\_\_\_ Phone Number: \_\_\_\_\_  
Initiated By: \_\_\_\_\_ Date: \_\_\_\_\_  
Problem: \_\_\_\_\_

Resolution: \_\_\_\_\_

(2-7987)  
Weck Laboratories, Inc.

SP 0900691

IV-01/22/2009-13:18:42

Analytical Chemists  
February 12, 2009

**Weck Laboratories, Inc.**  
14859 East Clark Ave.  
City of Industry, CA 91745-1396

Lab ID : SP 0900691  
Customer : 2-7987

## Laboratory Report

**Introduction:** This report package contains total of 5 pages divided into 3 sections:

Case Narrative (2 pages) : An overview of the work performed at FGL.  
Sample Results (2 pages) : Results for each sample submitted.  
Quality Control (1 page) : Supporting Quality Control (QC) results.

### Case Narrative

This Case Narrative pertains to the following samples:

Sample Description	Date Sampled	Date Received	FGL Lab ID #	Matrix
103365-001/W	01/20/2009	01/22/2009	SP 0900691-001	DW
103365-002/E	01/20/2009	01/22/2009	SP 0900691-002	DW

**Sampling and Receipt Information:** All samples were received, prepared and analyzed within the method specified holding times. All samples arrived on ice. All samples were checked for pH if acid or base preservation is required (except for VOAs). For details of sample receipt information, please see the attached Chain of Custody and Condition Upon Receipt Form.

**Quality Control:** All samples were prepared and analyzed according to the following tables:

### Radio QC

903.0	01/30/2009:201258 All analysis quality controls are within established criteria.
	01/27/2009:200891 All preparation quality controls are within established criteria.
905.0	02/10/2009:201878 All analysis quality controls are within established criteria.
	02/09/2009:201391 All preparation quality controls are within established criteria, except: The following note applies to Total Strontium: 435 Sample matrix may be affecting this analyte. Data was accepted based on the LCS or CCV recovery.
Ra - 05	02/03/2009:201423 All analysis quality controls are within established criteria.
	02/03/2009:201424 All analysis quality controls are within established criteria.
	01/28/2009:200894 All preparation quality controls are within established criteria.

February 12, 2009  
**Weck Laboratories, Inc.**

Lab ID : SP 0900691  
Customer : 2-7987

**Certification::** I certify that this data package is in compliance with NELAC standards, both technically and for completeness, except for any conditions listed above. Release of the data contained in this data package is authorized by the Laboratory Director or his designee, as verified by the following electronic signature.

KD:DMB

Approved By **Kelly A. Dunnahoo, B.S.**



Digitally signed by Kelly A. Dunnahoo, B.S.  
Title: Laboratory Director  
Date: 2009-02-12

---

Analytical Chemists  
February 12, 2009

Lab ID : SP 0900691-001  
Customer ID : 2-7987

**Weck Laboratories, Inc.**  
14859 East Clark Ave.  
City of Industry, CA 91745-1396

Sampled On : January 20, 2009-08:00  
Sampled By : Not Available  
Received On : January 22, 2009-15:00  
Matrix : Drinking Water

Description : 103365-001/W  
Project : 9A21040-01

### Sample Result - Radio

Constituent	Result ± Error	MDA	Units	MCL/AL	Sample Preparation		Sample Analysis	
					Method	Date/ID	Method	Date/ID
<b>Radio Chemistry</b> <sup>P:15</sup>								
Strontium 90	0.300 ± 0.676	0.596	pCi/L	8	905.0	02/09/09:201391	905.0	02/10/09:201878
Total Alpha Radium (226)	0.308 ± 0.251	0.373	pCi/L	3	903.0	01/27/09:200891	903.0	01/30/09:201258
Ra 228	0.345 ± 1.05	0.256	pCi/L	2	Ra - 05	01/28/09:200894	Ra - 05	02/03/09:201423

ND=Non-Detected. PQL=Practical Quantitation Limit. Containers: (P) Plastic Preservatives: HNO3 pH < 2

MDA = Minimum Detectable Activity (Calculated at the 95% confidence level) = Data utilized by DHS to determine matrix interference.  
MCL / AL = Maximum Contamination Level / Action Level. Alpha's Action Level of 5 pCi/L is based on the Assigned Value (AV).  
AV = (Gross Alpha Result + (0.84 x Error)). CCR Section 64442: Drinking Water Compliance Note: Do the following  
If Gross Alpha's (AV) exceeds 5 pCi/L run Uranium. If Gross Alpha's (AV) minus Uranium exceeds 5 pCi/L run Radium 226.

**Drinking Water Compliance:**

Gross Alpha (AV) minus Uranium is less than or equal to 15 pCi/L  
Uranium is less than or equal to 20 pCi/L  
Radium 226 + Radium 228 is less than or equal to 5 pCi/L

Note: Samples are held for 3-6 months prior to disposal.

Analytical Chemists  
February 12, 2009

Lab ID : SP 0900691-002  
Customer ID : 2-7987

**Weck Laboratories, Inc.**  
14859 East Clark Ave.  
City of Industry, CA 91745-1396

Sampled On : January 20, 2009-11:40  
Sampled By : Not Available  
Received On : January 22, 2009-15:00  
Matrix : Drinking Water

Description : 103365-002/E  
Project : 9A21040-02

## Sample Result - Radio

Constituent	Result ± Error	MDA	Units	MCL/AL	Sample Preparation		Sample Analysis	
					Method	Date/ID	Method	Date/ID
<b>Radio Chemistry</b> <sup>P:15</sup>								
Strontium 90	0.000 ± 0.624	0.596	pCi/L	8	905.0	02/09/09:201391	905.0	02/10/09:201878
Total Alpha Radium (226)	0.234 ± 0.270	0.447	pCi/L	3	903.0	01/27/09:200891	903.0	01/30/09:201258
Ra 228	0.000 ± 0.897	0.259	pCi/L	2	Ra - 05	01/28/09:200894	Ra - 05	02/03/09:201424

ND=Non-Detected. PQL=Practical Quantitation Limit. Containers: (P) Plastic Preservatives: HNO3 pH < 2

MDA = Minimum Detectable Activity (Calculated at the 95% confidence level) = Data utilized by DHS to determine matrix interference.  
MCL / AL = Maximum Contamination Level / Action Level. Alpha's Action Level of 5 pCi/L is based on the Assigned Value (AV).  
AV = (Gross Alpha Result + (0.84 x Error)). CCR Section 64442: Drinking Water Compliance Note: Do the following  
If Gross Alpha's (AV) exceeds 5 pCi/L run Uranium. If Gross Alpha's (AV) minus Uranium exceeds 5 pCi/L run Radium 226.

### Drinking Water Compliance:

Gross Alpha (AV) minus Uranium is less than or equal to 15 pCi/L  
Uranium is less than or equal to 20 pCi/L  
Radium 226 + Radium 228 is less than or equal to 5 pCi/L

Note: Samples are held for 3-6 months prior to disposal.



## Analytical Chemists

February 12, 2009  
Weck Laboratories, Inc.

Lab ID : SP 0900691  
Customer : 2-7987

### Quality Control - Radio

Constituent	Method	Date/ID	Type	Units	Conc.	QC Data	DQO	Note
<b>Radio</b>								
Alpha	903.0	01/30/2009:201258	CCV CCB	cpm cpm	10880	81.7 % 0.100	62 - 106 0.23	
Total Alpha Radium (226)	903.0	01/27/2009:200891	RgBlk LCS BS BSD BSRPD	pCi/L pCi/L pCi/L pCi/L pCi/L	18.12 18.12 18.12 18.12	0.10 66.7 % 60.2 % 54.9 % 9.2%	2 52-89 43-92 43-92 ≤35.5	
Beta	905.0	02/10/2009:201878	CCV CCB	cpm cpm	11360	88.1 % 0.4600	85 - 95 0.67	
Total Strontium	905.0	02/09/2009:201391	RgBlk LRS BS BSD BSRPD	pCi/L pCi/L pCi/L pCi/L pCi/L	35.53 35.52 35.52 35.52	0.85 88.0 % 155 % 148 % 4.6%	2 53-133 75-125 75-125 ≤20	435 435
Beta	Ra - 05	02/03/2009:201423	CCV CCB	cpm cpm	11360	88.7 % 0.4200	85 - 95 0.7	
	Ra - 05	02/03/2009:201424	CCV CCB	cpm cpm	11360	89.1 % 0.4600	85 - 95 0.75	
Ra 228	Ra - 05	01/28/2009:200894	RgBlk	pCi/L		-0.04	3	
			LRS	pCi/L	90.61	37.7 %	27-59	
			BS	pCi/L	90.61	92.0 %	75-125	
			BSD	pCi/L	90.61	94.2 %	75-125	
			BSRPD	pCi/L	90.61	2.4%	≤25	
<b>Definition</b>								
CCV : Continuing Calibration Verification - Analyzed to verify the instrument calibration is within criteria.								
CCB : Continuing Calibration Blank - Analyzed to verify the instrument baseline is within criteria.								
RgBlk : Method Reagent Blank - Prepared to correct for any reagent contributions to sample result.								
LCS : Laboratory Control Standard/Sample - Prepared to verify that the preparation process is not affecting analyte recovery.								
BS : Blank Spikes - A blank is spiked with a known amount of analyte. It is prepared to verify that the preparation process is not affecting analyte recovery.								
BSD : Blank Spike Duplicate of BS/BSD pair - A blank duplicate is spiked with a known amount of analyte. It is prepared to verify that the preparation process is not affecting analyte recovery.								
BSRPD : BS/BSD Relative Percent Difference (RPD) - The BS relative percent difference is an indication of precision for the preparation and analysis.								
DQO : Data Quality Objective - This is the criteria against which the quality control data is compared.								
<b>Explanation</b>								
435 : Sample matrix may be affecting this analyte. Data was accepted based on the LCS or CCV recovery.								

**Advanced Technology Laboratories**

3275 Walnut Avenue, Signal Hill, CA 90755-0225  
 www.atlabs.com  
 TEL: (562) 989-4040 FAX: (562) 989-4040

**CHAIN-OF-CUSTODY RECORD**

Page 1 of 15

9A21040

QC Level: RTNE

## Subcontractor:

Weick Laboratory  
 14859 E. Clark Avenue  
 City of Industry, CA 91745

TEL: (626) 336-2139  
 FAX: (626) 336-2634  
 Acct #:


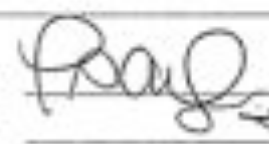
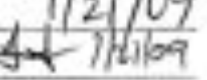
Field Sampler: Tommy Muller

20-Jan-09

Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests		
				EPA 804.1		
103365-0011 / W	Water	1/20/2009 8:00:00 AM	VDA	1		
103365-0021 / E	Water	1/20/2009 11:42:00 AM	VDA	1		

General Comments: Please email sample receipt acknowledgement to the PM.  
 Please use PO#: SC04286 Please fax results by: NORMAL TAT  
 SEND REPORT TO RACHELLE ARADA

Please see attached quote for project reference. w

	Date/Time		Date/Time
Relinquished by: 	1/20/09	Received by: 	1/21/09 @ 12:50
Relinquished by: _____	_____	Received by: 	1/21/09 7:50

7.9°C

**Advanced Technology Laboratories**

3275 Walnut Avenue, Signal Hill, CA 90755-8225  
 www.atglobal.com  
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**CHAIN-OF-CUSTODY RECORD**

2 of 15  
 Page 1 of 1

9A21040

QC Level: RTNE

## Subcontractor:

Weck Laboratory  
 14850 E. Clark Avenue  
 City of Industry, CA 91745

TEL: (526) 336-2139  
 FAX: (526) 336-2634  
 Acct #:

Field Sampler: Tommy Mutter

28-Jan-09


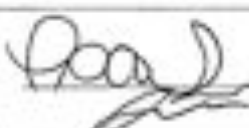
Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests	
				EPA 824.2	
103365-001H / W	Water	1/20/2009 8:00:00 AM	VCA	1	
103365-002H / E	Water	1/20/2009 11:40:00 AM	VCA	1	

General Comments: Please email sample receipt acknowledgement to the PM.

Please use PO#: SC04289

Please fax results by: NORMAL TAT

SEND REPORT TO RACHELLE ARADA - EPA 824.2 VOC + Acetone + Benzene + Beryllium or

	Date/Time		Date/Time
Relinquished by: 	1/20/09	Received by: 	1/21/09 @ 12:50
Relinquished by: _____	_____	Received by: _____	1/21/09 1150

7.9c.

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FAX: (562) 989-4040

**CHAIN-OF-CUSTODY RECORD**

Page 1 of 5

9A21040

QC Level: RTNE

**Subcontractor:**

Weck Laboratory

14859 E. Clark Avenue

City of Industry, CA 91745

TEL: (526) 336-2139

FAX: (526) 336-2634

Acct #:

Field Sampler: Tommy Mutter

28-Jan-09


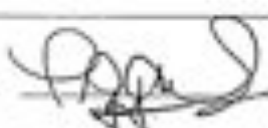
Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests	
				EPA 525.2	
103365-001E / W	Water	1/20/2009 8:00:00 AM	300ZA	1	
103365-002E / E	Water	1/20/2009 11:40:00 AM	300ZA	1	

General Comments: Please email sample receipt acknowledgement to the PM.

Please use PO#: SC04289

Please fax results by: NORMAL TAT

SEND REPORT TO RACHELLE ARADA - EPA 525-2 - Regulated 3 + 27 compounds cr

	Date/Time		Date/Time
Relinquished by: 	1/20/09	Received by: 	1/21/09 @ 12:50
Relinquished by:		Received by:	1/21/09 11:00

7.9°C

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FAX: (562) 969-4040

**CHAIN-OF-CUSTODY RECORD**

Page 1 of 1

9A21040

QC Level: RTNE

## Subcontractor:

Wick Laboratory

14859 E. Clark Avenue

City of Industry, CA 91745

TEL: (626) 336-2139

FAX: (626) 336-2634

Acct #:

Field Sampler: Tommy Muller

20-Jan-09

Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests		
				EPA 831.1		
103365-001J / W	Water	1/20/2009 8:00:00 AM	VQA	1		
103365-002J / E	Water	1/20/2009 11:40:00 AM	VQA	1		

General Comments: Please email sample receipt acknowledgement to the PM.

Please use PO#: 5004269

Please fax results by: NORMAL TAT

SEND REPORT TO RACHELLE ARADA

Relinquished by: <u>fl</u>	Date/Time: <u>1/20/09</u>	Received by: <u>[Signature]</u>	Date/Time: <u>1/21/09 @ 12:50</u>
Relinquished by: _____	Date/Time: _____	Received by: _____	Date/Time: <u>1/21/09 11:50</u>

7.9C

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**CHAIN-OF-CUSTODY RECORD**

Page 15 of 15

9A21040

QC Level: RTNE

## Subcontractor:

Weck Laboratory

14859 E. Clark Avenue

City of Industry, CA 91745

TEL: (562) 336-2139

FAX: (562) 336-2634

Acct #:

Field Sampler: Tommy Muller

20-Jan-09

Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests		
				EPA 547		
103365-001K / W	Water	1/20/2009 8:00:00 AM	VQA	1		
103365-002K / E	Water	1/20/2009 11:42:00 AM	VQA	1		

General Comments: Please email sample receipt acknowledgement to the PM.

Please use POR: SC04299

Please fax results by: NORMAL TAT

SEND REPORT TO RACHELLE ARADA

	Date/Time		Date/Time
Relinquished by: <i>fl</i>	1/20/09	Received by: <i>Tommy Muller</i>	1/21/09 11:50
Relinquished by: _____	_____	Received by: _____	_____

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**CHAIN-OF-CUSTODY RECORD**

Page 1 of 15

9A21040

QC Level: RTNE

## Subcontractor:

Weick Laboratory

14859 E. Clark Avenue

City of Industry, CA 91745

TEL: (562) 336-2139

FAX: (562) 336-2634

Acct #:

Field Sampler: Tommy Muller

20-Jan-09



Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests		
				EPA 515.3		
103385-001G / W	Water	1/20/2009 8:00:00 AM	802A	1		
103385-002G / E	Water	1/20/2009 11:40:00 AM	802A	1		

General Comments: Please email sample receipt acknowledgement to the PM.

Please use PO# 5C04288

Please fax results by: NORMAL TAT

SEND REPORT TO RACHELLE ARADA

Relinquished by: 	Date/Time: 1/20/09	Received by: 	Date/Time: 1/21/09 @ 12:50
Relinquished by: _____	Date/Time: _____	Received by: _____	Date/Time: 1/21/09 1:50

7.9°C



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**CHAIN-OF-CUSTODY RECORD**

Page 2 of 2

9A21040

QC Level: RTNE

## Subcontractor:

Weick Laboratory

14859 E. Clark Avenue

City of Industry, CA 91745

TEL: (626) 338-2139

FAX: (626) 338-2534

Acct #:

Field Sampler: Tommy Mutter

20-Jan-09



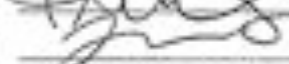
Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests		
				EPA 508		
103385-001D / W	Water	1/20/2009 8:00:00 AM	3202A	1		
103385-002D / E	Water	1/20/2009 11:40:00 AM	3202A	1		

General Comments: Please email sample receipt acknowledgement to the PM.

Please use PQR: SC04289

Please fax results by: NORMAL TAT

SEND REPORT TO RACHELLE AMADA

Relinquished by: 	Date/Time: 1/20/09	Received by: 	Date/Time: 1/21/09 @ 12:50
Relinquished by: _____	Date/Time: _____	Received by: 	Date/Time: 1/21/09 11:50

790

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**CHAIN-OF-CUSTODY RECORD**

Page 1 of 1

9A21040

QC Level: RTNE

## Subcontractor:

Wick Laboratory

14859 E. Clark Avenue

City of Industry, CA 91745

TEL: (626) 338-2139

FAX: (626) 338-2634

Acct #:

Field Sampler: Tommy Mutter

20-Jan-09

Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests		
				Ash_TEM		
103365-001L / W	Water	1/20/2009 8:00:00 AM	320ZP	1		
103365-002L / E	Water	1/20/2009 11:42:00 AM	320ZP	1		

General Comments: Please email sample receipt acknowledgement to the PM.

Please use PO#: SC04289

Please fax results by: NORMAL TAT

ANALYZE THE SAMPLES FOR ASBESTOS TEM BY EPA 100.2

SEND REPORT TO RACHELLE ARADA

	Date/Time		Date/Time
Relinquished by: <i>fl</i>	1/20/09	Received by: <i>Paul</i>	1/24/09 @ 12:30
Relinquished by: _____	_____	Received by: <i>R</i>	1/24/09 1150

7.9'e

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FAX: (562) 989-4040

**CHAIN-OF-CUSTODY RECORD**9/15  
Page 1 of 1

9A21040

QC Level: RTNE

## Subcontractor:

Wleck Laboratory

14859 E. Clark Avenue

City of Industry, CA 91745

TEL: (626) 336-2138

FAX: (626) 336-2834

Acct #:

Field Sampler: Tommy Muller

20-Jan-09

Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests	
				EPA 1613	
103365-001F / W	Water	1/20/2009 8:00:00 AM	3202A	1	
103365-002F / E	Water	1/20/2009 11:40:00 AM	3202A	1	

## General Comments:



Please email sample receipt acknowledgement to the PM.

Please use POR: SC04289

Please fax results by: NORMAL TAT

ANALYZE THE SAMPLES FOR 2,3,7,8-TCDD BY 1/21/09

SEND REPORT TO RACHELLE ARADA

	Date/Time		Date/Time
Relinquished by: 	1/20/09	Received by: 	1/21/09 @ 12:50
Relinquished by:		Received by:	1/21/09 11:50

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9A2104D

QC Level: RTNE

## Subcontractor:

Weick Laboratory  
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City of Industry, CA 91745TEL: (626) 336-2139  
FAX: (626) 336-2634  
Acct #:

Field Sampler: Tommy Mutter

20-Jan-09

Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests	
				EPA 9353	
103365-001M / W	Water	1/20/2009 8:00:00 AM	3202P	1	
103365-002M / E	Water	1/20/2009 11:40:00 AM	3202P	1	

Gross Alpha &amp; Beta

General Comments: Please email sample receipt acknowledgement to the PM.  
Please use POR: SC04289 Please fax results by: NORMAL TAT  
ANALYZE THE SAMPLES FOR GROSS ALPHA & GROSS BETA BY EPA 900  
SEND REPORT TO RACHELLE ARADA

Relinquished by:	Date/Time	Received by:	Date/Time
<i>[Signature]</i>	1/20/09	<i>[Signature]</i>	1/21/09 @ 12:00
Relinquished by:		Received by:	1/21/09 11:50

7.9°C

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FAX: (562) 989-4040

**CHAIN-OF-CUSTODY RECORD**

Page 1 of 15

9A21040

QC Level: RTNE

**Subcontractor:**

Weick Laboratory

14859 E. Clark Avenue

City of Industry, CA 91745

TEL: (626) 336-2139

FAX: (626) 336-2634

Acct #:

Field Sampler: Tommy Muller

20-Jan-09

Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests	
				E903.1	
103385-001Q / W	Water	1/20/2009 8:00:00 AM	3300P	1	
103385-002Q / E	Water	1/20/2009 11:40:00 AM	3300P	1	

Radium 226/228

General Comments: Please email sample receipt acknowledgement to the PM.

Please use POR: SCD4389

Please fax results by: NORMAL TAT

SEND REPORT TO RACHELLE ARADA

	Date/Time		Date/Time
Relinquished by: <i>fl</i>	1/20/09	Received by: <i>Hand</i>	1/21/09 @ 12:50
Relinquished by: _____	_____	Received by: _____	1/21/09 1150

7.9c

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 www.atlplab.com  
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**CHAIN-OF-CUSTODY RECORD**

12/15  
 Page 1 of 1

9A21040

QC Level: RTNE

## Subcontractor:

Weick Laboratory  
 14859 E. Clark Avenue  
 City of Industry, CA 91745


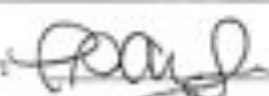
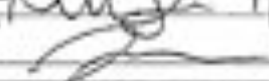
TEL: (626) 336-2139  
 FAX: (626) 336-2634  
 Acct #:

Field Sampler: Tommy Muller

20-Jan-09

Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests	
				Ra-05	
103385-001H / W	Water	1/20/2009 8:00:00 AM	3202P	1	
103385-002H / E	Water	1/20/2009 11:40:00 AM	3202P	1	

General Comments: Please email sample receipt acknowledgement to the PM.  
 Please use PO#: SC04289 Please fax results by: NORMAL TAT  
 SEND REPORT TO RACHELLE ARADA

	Date/Time		Date/Time
Relinquished by: 	1/20/09	Received by: 	1/21/09 @ 12:50
Relinquished by: _____	_____	Received by: 	1/21/09 1:50

7.9c

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TEL: (562) 989-4045

FAX: (562) 989-4040

**CHAIN-OF-CUSTODY RECORD**

Page 1 of 1

9A21040

QC Level: RTNE

## Subcontractor:

Weck Laboratory  
14859 E. Clark Avenue  
City of Industry, CA 91745TEL: (626) 336-2130  
FAX: (626) 336-2634  
Acct #:

Field Sampler: Tommy Muller

20-Jan-09

Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests	
				E505.0	
103365-0015 / W	Water	1/20/2009 8:00:00 AM	3202P	1	
103365-0025 / E	Water	1/20/2009 11:40:00 AM	3202P	1	

Stentium

General Comments: Please email sample receipt acknowledgement to the PM.  
Please use PO#: SC04289 Please fax results by: NORMAL TAT  
SEND REPORT TO RACHELLE ARADA

Relinquished by: <u>fl.</u>	Date/Time: <u>1/20/09</u>	Received by: <u>[Signature]</u>	Date/Time: <u>1/21/09 @ 12:50</u>
Relinquished by: _____	Date/Time: _____	Received by: <u>[Signature]</u>	Date/Time: <u>1/21/09 RISC</u>

7.9°C



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**CHAIN-OF-CUSTODY RECORD**

Page 19 of 15

9A21040

QC Level: RTNE

**Subcontractor:**

Weck Laboratory  
 14859 E. Clark Avenue  
 City of Industry, CA 91745

TEL: (525) 335-2139  
 FAX: (525) 335-2634  
 Acct #:

Field Sampler: Tommy Muller

20-Jan-09

Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests		
				SM21300		
103365-001P / W	Water	1/20/09 8:00:00 AM	3202P	1		
103365-002P / E	Water	1/20/09 11:40:00 AM	3202P	1		

color

General Comments: Please email sample receipt acknowledgement to the PM.  
 Please use PO#: SC04289 Please fax results by: NORMAL TAT  
 SEND REPORT TO RACHELLE ARADA

	Date/Time		Date/Time
Relinquished by: <i>fl</i>	1/20/09	Received by: <i>Tommy Muller</i>	1/21/09 11:50
Relinquished by: _____	_____	Received by: _____	_____

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**CHAIN-OF-CUSTODY RECORD**

1/15  
 Page 4 of 5

9A21040

QC Level: RTNE

## Subcontractor:

Weck Laboratory  
 14859 E. Clark Avenue  
 City of Industry, CA 91745


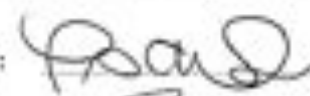
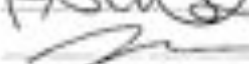
TEL: (626) 336-2139  
 FAX: (626) 336-2534  
 Acct #:

Field Sampler:

21-Jan-09

Sample ID	Matrix	Date Collected	Bottle Type	Requested Tests		
				EPA 625		
102365-001N / W	Water	1/20/2009 8:00:00 AM	3202A	1		
102365-002N / E	Water	1/22/2009 11:40:00 AM	3202A	1		

General Comments: Please email sample receipt acknowledgement to the PM.  
 Please use PO#: SCD4289 Please fax results by: Normal TAT  
 SEND REPORT TO RACHELLE ARADA

	Date/Time		Date/Time
Relinquished by: 	1/21/09	Received by: 	1/21/09 @ 12:50
Relinquished by:		Received by: 	1/21/09 11:50

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### CHAIN OF CUSTODY RECORD



**Advanced Technology Laboratories**

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Signal Hill, CA 90755  
(562) 989-4045 • Fax (562) 989-4040

**FOR LABORATORY USE ONLY:**

P.O.# \_\_\_\_\_

Logged By \_\_\_\_\_

Date: 1/20/09

Method of Transport

- Client
- ATL
- CA OverN
- FEDEX
- Other: \_\_\_\_\_

Sample Condition Upon Receipt

1. OK/CLEARED:  Y  N  4 SEALED: Y  N
2. HEADSPACE (VOA): Y  N  5. # OF SPLS MATCH DOC: Y  N
3. CONTAINER INTACT: Y  N  6. PRESERVED: Y  N

Client: <u>Ninyo &amp; Moore</u>	Address: <u>475 Goddard Suite 200</u>	TEL: <u>949   753-7070</u>
Attn: <u>Jay Roberts</u>	City: <u>Irvine</u> State: <u>CA</u> Zip Code: <u>92618</u>	FAX: <u>949   753-7071</u>

Project Name: <u>Material Transfer Trail 26</u>	Project #: <u>207613001</u>	Sampler: <u>Tammy Mutter</u>	(Signature) <u>Tammy Mutter</u>
Relinquished by: <u>Tammy Mutter</u> Date: <u>1/20/09</u> Time: <u>15:50</u>	Received by: <u>C. Hyatt</u> Date: <u>1/20/09</u> Time: <u>16:00</u>	Relinquished by: _____ Date: _____ Time: _____	Received by: _____ Date: _____ Time: _____
Relinquished by: _____ Date: _____ Time: _____	Received by: _____ Date: _____ Time: _____	Relinquished by: _____ Date: _____ Time: _____	Received by: _____ Date: _____ Time: _____

I hereby authorize ATL to perform the work indicated below: Project Mgr./Submitter: <u>Tammy Mutter</u> <u>1/20/09</u>	Send Report To: Attn: <u>Jay Roberts</u> Co: <u>NTM</u> Address: <u>SAME</u> City: _____ State: _____ Zip: _____	Bill To: Attn: <u>SAME</u> Co: _____ Address: _____ City: _____	Special Instructions/Comments
---	--	---	-------------------------------

**Sample/Records - Archival & Disposal**  
Unless otherwise requested by client, all samples will be disposed 45 days after receipt and records will be disposed 1 year after submittal of final report.

**Storage Fees (applies when storage is requested):**

- Sample: \$2.00 / sample / mo (after 45 days)
- Records: \$1.00 / ATL workorder / mo (after 1 year)

Code or Add Analyses/ Requested	SPECIFY APPROPRIATE MATRIX		PRESERVATION	Q.A./Q.C.
	WATER	OTHER		
<del>Asbestos</del>	<del>SW/CS</del>	<del>Logcode</del>	OTHER _____	REMARKS
<del>Lead</del>	<del>Trace Metals</del>	<del>Trace Organics</del>		
<del>Mercury</del>	<del>Trace Metals</del>	<del>Trace Organics</del>		
<del>PCB</del>	<del>Trace Metals</del>	<del>Trace Organics</del>		
<del>PAHs</del>	<del>Trace Metals</del>	<del>Trace Organics</del>		
<del>PFAS</del>	<del>Trace Metals</del>	<del>Trace Organics</del>		
<del>THP</del>	<del>Trace Metals</del>	<del>Trace Organics</del>		
<del>Trace Metals</del>	<del>Trace Metals</del>	<del>Trace Organics</del>		
<del>Trace Organics</del>	<del>Trace Metals</del>	<del>Trace Organics</del>		
<del>Trace Organics</del>	<del>Trace Metals</del>	<del>Trace Organics</del>		
<del>VOC</del>	<del>Trace Metals</del>	<del>Trace Organics</del>		
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<del>VOC</del>	<del>Trace Metals</del>	<del>Trace Organics</del>		
<del>VOC</del>	<del>Trace Metals</del>	<del>Trace Organics</del>		
<del>VOC</del>	<del>Trace Metals</del>	<del>Trace Organics</del>		

I T E M	LAB USE ONLY:		Sample Description		
	Batch #	Lab No.	Sample I.D. / Location	Date	Time
	<u>NTM 26 - 111</u>	<u>W</u>	<u>W</u>	<u>1/20/09</u>	<u>8:00</u>
	<u>↓ - 112</u>	<u>E</u>	<u>E</u>	<u>1/20/09</u>	<u>11:40</u>

\* TAT starts 8 a.m. following day if samples received after 3 p.m.

TAT: A= Overnight < 24 hr B= Emergency Next workday C= Critical 2 Workdays D= Urgent 3 Workdays E= Routine 7 Workdays

Preservatives: H=HCl N=HNO3 S=H2SO4 C=4°C Z=Zn(Ac)2 O=NaOH T=Na2SO3

Container Types: T=Tube V=VOA L=Liter P=Pint J=Jar B=TeaJar G=Glass P=Plastic M=Metal

# CHAIN OF CUSTODY RECORD



**Advanced Technology  
Laboratories**

3275 Walnut Avenue  
Signal Hill, CA 90755  
(562) 989-4045 • Fax (562) 989-4040

FOR LABORATORY USE ONLY:

P.O.#: \_\_\_\_\_  
Logged By: [Signature] Date: 1/10/09

Method of Transport

- Client
- ATL
- CA OverN
- FEDEX
- Other: \_\_\_\_\_

Sample Condition Upon Receipt

- 1. CHILLED Y  N  4. SEALED Y  N
- 2. HEADSPACE (VOA) Y  N  5. # OF SPLS BATCH CDC Y  N
- 3. CONTAINER INTACT Y  N  6. PRESERVED Y  N

Client: Ninyo & Moore Address: 475 Goddard Suite 200 TEL: 949 | 753-7070  
 Attn: Jay Roberts City: Irvine State: CA Zip Code: 92618 FAX: 949 | 753-7071

Project Name: Metrolink Tunnel 26 Project #: 207613001 Sampler: (Print Name) Tommy Mutter (Signature) [Signature]  
 Relinquished by: (Signature and Printed Name) [Signature] Date: 1/10/09 Time: 15:50 Received by: (Signature and Printed Name) [Signature] Date: 1/10/09 Time: 1:00

I hereby authorize ATL to perform the work indicated below:  
 Project Mgr./Submitter: Tommy Mutter 1/10/09  
 Send Report To: Attn: Jay Roberts Co: N+M Address: SAME City: \_\_\_\_\_ State: \_\_\_\_\_ Zip: \_\_\_\_\_  
 Bill To: Attn: SAME Co: \_\_\_\_\_ Address: \_\_\_\_\_ City: \_\_\_\_\_ State: \_\_\_\_\_ Zip: \_\_\_\_\_  
 Special Instructions/Comments: \_\_\_\_\_

**Sample/Records - Archival & Disposal**  
 Unless otherwise requested by client, all samples will be disposed 45 days after receipt and records will be disposed 1 year after submittal of final report.  
**Storage Fees (applies when storage is requested):**  
 • Sample: \$2.00 / sample / mo (after 45 days)  
 • Records: \$1.00 / ATL workorder / mo (after 1 year)

ITEM	LAB USE ONLY:		Sample Description				Circle or Add Analysis(es) Requested	SPECIFY APPROPRIATE MATRIX								PRESERVATION	Q.A./Q.C.			
	Batch #:	Lab No.	Sample I.D. / Location	Date	Time									RTNE <input type="checkbox"/>	CT <input type="checkbox"/>					
						TAT #		Type	OTHER		REMARKS									
			<u>W</u>	<u>1/10/09</u>	<u>9:00</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>E</u>		
			<u>E</u>	<u>1/10/09</u>	<u>11:00</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>E</u>		

• TAT starts 8 a.m. following day if samples received after 3 p.m.  
 TAT: **A=** Overnight < 24 hr    **B=** Emergency Next workday    **C=** Critical 2 Workdays    **D=** Urgent 3 Workdays    **E=** Routine 7 Workdays  
 Container Types: T=Tube V=VOA L=Liter P=Pint J=Jar B=Tedlar G=Glass P=Plastic M=Metal  
 Preservatives: H=HCl N=HNO<sub>3</sub> S=H<sub>2</sub>SO<sub>4</sub> C=4°C Z=Zn(AC)<sub>2</sub> O=NaOH T=Na<sub>2</sub>S<sub>2</sub>O<sub>5</sub>