LIMITED PHASE TWO
ENVIRONMENTAL SITE ASSESSMENT
APPROXIMATE 6.08 ACRE PARCEL
PART OF SCHERER BROS LUMBER PROPERTY
9 9TH AVENUE NORTHEAST
MINNEAPOLIS, MINNESOTA

Prepared for:

SCHERER LIMITED PARTNERSHIP
MINNEAPOLIS, MN
AND
RYAN COMPANIES US, INC.
MINNEAPOLIS, MN
AND
CITY OF MINNEAPOLIS, ACTING BY AND THROUGH
ITS PARK AND RECREATION BOARD
MINNEAPOLIS, MINNESOTA

October 2009

Prepared by:

Liesch Companies

Minneapolis • Chicago • Los Angeles • Madison • Milwaukee • Phoenix

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MINNEAPOLIS, MINNESOTA

Prepared by:

LIESCH ASSOCIATES, INC.
13400 15TH AVENUE NORTH
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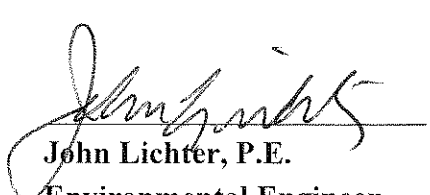
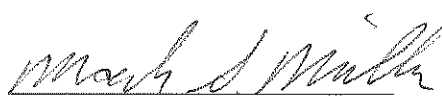
(763) 489-3100

October 22, 2009
Project Number: 6202670.02

This report was prepared by me
or under my direct supervision.



John Lichter, P.E.
Environmental Engineer



Mark S. Miller
Project Manager

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APPENDICES

1.0 INTRODUCTION

1.1 General

Liesch Associates, Inc. (**Liesch**) was retained by Scherer Limited Partnership to conduct a Limited Phase Two Environmental Site Assessment (**ESA**) and to prepare this Limited Phase Two ESA Report for an approximate 6.08-acre developed parcel of land with a main address of 9 9th Avenue NE and related addresses of 15 8th Avenue NE and 8 8th Avenue NE, City of Minneapolis (the **City**), County of Hennepin, State of Minnesota (the **Property**). The Property is located in part of the southeast 1/4 of the southeast 1/4, Section 15, Township 29 North, Range 24 West. The Property is part of a larger parcel of land commonly referred to as the "**Scherer Bros Lumber Company Site**". Scherer Limited Partnership is the "Owner" of the Scherer Bros Lumber Company Site. **Figure 1** in **Appendix A** shows the location of the Property. A Survey showing the Property crosshatched and the remainder of the Scherer Bros Lumber Company Site is included as **Figure 2** in **Appendix A**. The purpose of the Limited Phase Two ESA was to obtain preliminary environmental information on the soils at the Property.

Property and Surrounding Properties Description

General Area	Commercial, residential, park and Mississippi River.
Site Improvements	Building used for sale and storage of building supplies and , lumber and millworking purposes. Two open sided lumber storage building (one partially on the Property) and paved lumber storage areas. Buildings constructed from 1936 up to 1977.
Adjacent to North	Vacated 9th Avenue NE and Scherer Bros buildings and storage operations.
Adjacent to East	Sibley St. NE with Scherer Bros parking lot and truck maintenance building with multi-tenant commercial buildings beyond.
Adjacent to South	8th Ave. NE with Boom Island Park and residential properties to the southeast of the Property across 8th Avenue N.E.
Adjacent to West	Mississippi River with open area and commercial land use across the river.

The Property has one building which occupies the eastern portion of the Property and was constructed over a period of time beginning in 1936 with the last reported construction being in 1977 (the **Main Building**). In addition to the Main Building, two open sided lumber storage buildings, one located partially on the Property, are located on the north-central portion of the Property (the **Storage Buildings**). The Main Building and Storage Buildings are collectively referred to as the "**Buildings**"). A Site Plan for the Scherer Bros Lumber Co. Site is included as **Figure 3** in **Appendix A**.

Scherer Bros Limited Partnership, the owner of the Property (the **Owner**) plans to sell the Property for commercial redevelopment which would include a multi-story office building. **Figure 4** in **Appendix A** illustrates Ryan companies US, Inc.'s (**Ryan**) Proposed Site Plan.

1.2 Background

Concurrent with conducting the Limited Phase Two ESA, Liesch prepared a Phase One ESA Report for Ryan and Scherer Limited Partnership, dated July 16, 2009 (the Phase One **ESA Report**).

The Phase One ESA Report identified recognized environmental conditions (**RECs**), historical RECs and items of environmental concern on and adjacent to the Property, which are summarized below:

RECs identified for the Property are:

- Preliminary results from the Limited Phase Two ESA identified elevated concentrations of lead, diesel range organics (**DRO**) and the volatile organic compound (**VOC**) naphthalene. Lead was reported at 10,300 milligrams per kilogram (**mg/kg**) in the soil sample from 7-feet to 9-feet below ground surface (**bgs**). The Minnesota Pollution Control Agency (**MPCA**) Tier 1 Soil Leachate Value (**SLV**) and Tier 2 Industrial Soil Reference Value (**SRV**) for lead are 525 mg/kg and 700 mg/kg, respectively. DRO, which does not have a MPCA action level established, was reported at 439 mg/kg. Naphthalene was reported at 0.432 mg/kg and the MPCA Tier 1 SLV and Tier 2 Industrial SRV are 7.5 mg/kg and 28 mg/kg, respectively. The release for these findings was reported to the Minnesota State Duty Officer on July 13, 2009 on behalf of Scherer Limited Partnership.

- The western portion of the Property was formerly a side-channel to the Mississippi River and Hall's Island. The side channel was filled in the late 1960s. The source of the fill is

unknown and no analytical information is known to have been completed for the fill material. Based on the unknown characteristics of the fill material, the fill is considered a REC for the Property.

One historic REC was identified for the Property:

- A leaking underground storage tank (**LUST**) site (LEAK NO: 1057) is located adjacent to the east of the Property on a portion the Scherer Bros Lumber Company Site. The MPCA issued closure of this LUST site on April 17, 1992. Closed LUST sites do not require additional investigation or remediation.

With respect to the potential for sub-surface environmental impacts, the following items of environmental note were identified for the Property.

- The Scherer Brothers Lumber LUST site is located up-gradient of the Property. Review of the MPCA LUST file for the Scherer Brothers Lumber LUST site identified residual petroleum impacts to soil and ground water were present. Due to the Scherer Brothers Lumber LUST site being adjacent to the Property, and the reported residual petroleum contamination reported for the soil and ground water, the Scherer Brothers Lumber LUST site is considered a potential vapor intrusion condition (**pVIC**) for the Property.

- A UST was formerly located adjacent to the northern boundary of the Property. The UST was used to fuel delivery trucks for the Scherer Bros Lumber Company. The UST was removed in the late 1970s or early 1980s. No record of leaks were reported for the UST, however, no analytical information was collected to determine if there were any impacts to the soils and/or ground water.

- Historical information identified a shingle mill and cedar post sawing mill on the southwest corner of the Property. A tank (no size or contents listed) and a chimney were noted in association with the mill.

- Information reviewed from the City Directories identified a variety of commercial/industrial land use in the area of the Property. Based on the review of the City Directories, it was not readily ascertainable if these commercial/industrial activities may have resulted in impacts to soil and/or groundwater.

1.3 Scope

Liesch submitted a proposal to Scherer Limited Partnership c/o Ryan dated June 22, 2009 (the **Phase Two ESA Proposal**) which provided a scope of work for the Limited Phase Two ESA. Due to the Phase One ESA being prepared concurrently with the Limited Phase Two ESA, and the limited operational and historical information for the Property reviewed at the time of the Phase Two ESA Proposal being submitted and accepted by Scherer Limited Partnership, the majority of the soil boring locations were based on geotechnical requirements for the proposed redevelopment. **Figure 4** in **Appendix A** is a Proposed Site Plan overlaid onto the Survey of the Scherer Bros Lumber Company Site).

The scope-of-work for the Limited Phase Two ESA, as provided in the Liesch Phase Two ESA Proposal, is summarized below:

1. Obtain evidence of the MPCA being provided with the MPCA Petroleum Remediation Section Notification for the Limited Phase Two work, required since the Property is a closed LUST site.
2. Provide environmental oversight for twelve (12) soil borings to be completed by American Engineering Testing, Inc. (**AET**).
3. Prepare a Site Safety Plan for the Limited Phase Two.
4. A Liesch field technician will field screen the soil sample for visual and olfactory evidence of environmental contamination. Soil samples will also be field screened for the presence of organic vapors using a photoionization detector (**PID**) in accordance with the MPCA Guidance Document 4-04: Soil Sample Collection and Analysis Procedures. Liesch used a PID equipped with a 10.6 e.V. lamp to conduct field screening.
5. Collect a minimum of one soil sample from each soil boring for laboratory analysis to characterize the soil with the odors, staining and/or highest organic vapor concentrations. The soil samples will be analyzed for asbestos VOCs, RCRA Metals, GRO and DRO.
6. Preparation of a brief report summarizing the findings of the Limited Phase Two.

Subsequent to the submittal of the Liesch Phase Two ESA Proposal, it was determined that a MPCA Petroleum Remediation Section Notification was not required due to the LUST site being located on a separate parcel of the Scherer Bros Lumber Company Site addressed as 52 9th Avenue NE, located across Sibley Street to the east of the Property.

The scope of the Phase Two ESA consisted of the installation of eleven (11) soil borings on the Property and one soil boring located on the portion of the Scherer Bros Lumber Company Site adjacent to the north of the Property. Nine of the eleven soil borings were located primarily to

address geotechnical needs of the proposed redevelopment. However, two of the soil borings were located in areas to address preliminary environmental issues, including the UST removed in the mid-1980's located adjacent to the north of the Property near Building #6 (see **Figure 5** in **Appendix A** for location of former UST basin) and the closed LUST site to the east of the Property. **Figure 6** in **Appendix A** shows the soil boring locations.

Liesch representative Tom Johnson was present on the Property to oversee drilling activities, field screen soils and collect soil samples.

AET was retained by Scherer Limited Partnership to complete the twelve soil borings which were generally identified by AET for geotechnical information, with the two previously mentioned borings located by Liesch to assess possible petroleum impacts on the Property.

Soil samples were collected using a CME 55 drill rig. The drill rig was equipped with a 3 ¼" hollow stem auger. Soil samples were collected continuously to the termination of the boring or 20 feet bgs, whichever was deeper. Soil borings that were greater than 20 feet bgs were sampled at 5 foot intervals to the termination of the boring. All soil borings were completed using standard penetration testing and split spoon sampling procedures. All augers and sampling equipment were steam cleaned prior to the site investigation and between boring locations. Each boring was sampled continuously from the surface to termination of the boring. The split spoon sampler was washed with a non-phosphate detergent and rinsed with water between samples on those locations in which analytical samples were collected.

The soils were field screened by Liesch for visual and olfactory evidence of environmental contamination. Soils were screened for organic vapors using a PID equipped with a 10.6 e.V. lamp in accordance with the MPCA Guidance Document 4-04: Soil Sample Collection and Analysis Procedures. Soil samples were collected from the borings and select samples were analyzed for volatile organic compounds (**VOCs**), gasoline range organics (**GRO**) and diesel range organics (**DRO**), the eight Resource Conservation and Recovery Act (**RCRA**) metals and asbestos.

During field screening of soil samples Liesch noted clinkers (the incombustible residue, fused into an irregular lump, that remains after the combustion of coal) and possible black foundry sand in soil boring B-3 (see **Figure 6** in **Appendix A** for location). Based on past experience with clinkers and foundry sand, Liesch recommended to Ryan that the aforementioned sample should be analyzed for semi-volatile organic compounds (**SVOCs**). In an email to Liesch from Ryan dated July 8, 2009, Ryan authorized the SVOC analysis.

The following identifies the analytical methods used for the laboratory analysis of the soil samples.

- VOCs – U.S. Environmental Protection Agency (**EPA**) Method 8260
- RCRA metals – EPA Method 6010 (arsenic, barium, cadmium, chromium, lead, selenium and silver), EPA 7471 (mercury)
- DRO – Wisconsin Modified DRO
- GRO – Wisconsin Modified GRO
- SVOCs – EPA Method 8270
- Asbestos – EPA Method 600/R-93/116

2.0 LIMITED PHASE TWO ASSESSMENT

2.1 Boring Installation

Drilling of the soil borings B-1 through B-12 was completed July 6 through July 13, 2009 by AET utilizing hollow stem auger with split spoon sampler techniques to levels listed below:

- B-1 was completed at approximately 100 feet bgs;
- B-2, B-5, B-6 and B-12 were completed at approximately 61 feet bgs;
- B-3 was completed at approximately 119 feet bgs;
- B-4 was competed at approximately 80 feet bgs;
- B-7, B-8, B-9 and B-11 were completed at approximately 16 feet bgs, and
- B-10 was completed at approximately 21 feet bgs.

Soil samples were collected from a split spoon sampler. The drill rig and all down-hole tools were steam cleaned prior to use at the Property. All sampling tools were cleaned prior to use for successive borings. Soil types were identified during sample collection. Soil boring logs were completed by Liesch in the field and are included in **Appendix B**. Upon completion, soil borings were properly abandoned in accordance with Minnesota Department of Health (**MDH**) requirements.

2.2 Sample Collection and Analysis

All soil samples collected during soil boring completion were obtained directly from the split spoon sampler and field screened by a Liesch field technician for visual and olfactory evidence of environmental contamination. Soil samples were also field screened for the presence of organic vapors. Field screening for organic vapors was completed using a PID in accordance with Part I of

MPCA Guidance Document 4-04, *Soil Sample Collection and Analysis Procedures*. Liesch used a PID equipped with a 10.6 e.V. lamp to conduct field screening. Screening of the soil samples for organic vapors was measured by using a quart-size polyethylene freezer bag filled approximately 1/2 full of the soil sample to be analyzed. Soil clumps were broken and the bag shaken for approximately 15 seconds. After allowing the headspace to develop for approximately ten minutes, each field screened sample was analyzed using the PID and the maximum concentration recorded.

Soil samples selected for laboratory analyses were placed in the appropriate laboratory provided sample containers, labeled and placed in an ice-chilled cooler and transported to Pace Analytical Services, Inc. (**Pace**), Minnesota Laboratory Certification Number: 027-053-137, for laboratory analysis. The samples were analyzed within appropriate holding times.

Soil samples submitted for laboratory analysis, and the parameters analyzed for each of the soil samples, are indicated on **Table 1** in **Appendix C**. Analytical results for the VOCs, GRO, DRO, RCRA Metals and SVOCs are summarized in **Table 2** in **Appendix C** and the asbestos results are summarized in **Table 3** in **Appendix C**.

3.0 ASSESSMENT RESULTS/FINDINGS

3.1 Soil Borings Field Screening Results

All soil borings were located in asphalt paved areas with the exception of B-11, which was located in a landscaped area. Surficial soils were generally identified as fill material (gravel, rock, silt, and clay) ranging from the surface to a depth of 4 feet to 16.5 feet bgs. The fill material identified debris including pieces of concrete, brick, asphalt, wood, foundry sand, clinkers, ash, glass and rubber. Odors were noted in soil borings B-3 (creosote odor) and B-5 (petroleum odor).

Field screening observations, including the PID organic vapor measurements, are provided in the boring log summaries included in **Appendix B**. As observed from the boring logs, soil samples from boring locations B-1, B-2, B-4, B-6, B-7, B-9 through B-12 were measured at less than (<) one part per million (**ppm**) organic vapors as measured by headspace techniques.

Organic vapors measured in B-3 were <1 ppm from the surface to a depth of 4 feet bgs. Soil boring B-3, depth interval 7 feet bgs to 9 feet bgs, recorded the maximum organic vapor measurement at approximately 8 ppm. Below 14.5 feet bgs organic vapors were <1 ppm. Organic vapors measured in soil boring B-5 from the surface to 11 feet bgs ranged from approximately 1 ppm (at the surface) to a maximum of approximately 5 ppm (at the 4 feet-6 feet bgs sample interval). Below 12 feet bgs, organic vapors were <1 ppm. Organic vapors in soil boring B-8 ranged from 1 ppm to a maximum of 5 ppm from the surface to a depth of 6 feet bgs.

The 5 ppm organic vapors were detected in the sample from the depth interval of 2 feet to 4 feet bgs.

Soil analytical results are presented in **Table 2**, **Appendix C**. The depth interval for soil samples collected for laboratory analyses was based on information obtained during field screening of the soils. Generally, soil samples were collected for laboratory analyses from a depth interval above the observed ground water elevation and at the highest concentration of organic vapors recorded. In boring locations where no elevated levels of organic vapors were noted, the depth at which the sample was collected varied to characterize fill soil conditions across the Property. Two soil samples were submitted from soil boring B-10 in order to characterize fill material and to obtain a sample from a depth corresponding to a level below the USTs previously removed from the adjacent Property (see **Figure 4** in **Appendix A** for former UST basin location). Soil samples for asbestos analysis were obtained from the interval immediately below the granular asphalt pavement base to determine if historic handling of vermiculite at the Property may have impacted soils prior to paving the area.

As shown in **Table 2** in **Appendix B**, GRO was not detected in any of the samples submitted for analyses. VOCs were reported to be below laboratory reporting limits and RCRA Metals were either below laboratory reporting limits or below MPCA Tier 1 SLVs and MPCA Tier 2 Industrial SRVs for soil samples analyzed, with the exception of B-3 (7 feet-9 feet bgs). As previously summarized in **Section 1.2**, lead reported at 10,300 mg/kg for the sample from soil boring B-3 (7 feet-9 feet bgs) exceeded the MPCA Tier 1 SLV and MPCA Tier 2 Industrial SRV of 525 mg/kg and 700 mg/kg, respectively. Soil boring B-3 (7 feet-9 feet bgs) was also analyzed for SVOCs, due to the observed clinkers and possible foundry sand, and the Benzo(a)Pyrene (**BaP**) Equivalents, a calculated value from the analysis of polynuclear aromatic hydrocarbons (**PAH**), was reported at 5.36 mg/kg which exceeded the MPCA Tier 2 SRV of 3 mg/kg. One VOC, naphthalene, was detected in B-3 (7 feet-9 feet bgs) at 0.432 mg/kg, which is below the MPCA Tier 1 SLV and MPCA Tier 2 Industrial SRV of 7.5 mg/kg and 28 mg/kg, respectively.

The soil sample from B-4 was also analyzed for SVOCs, due to ash material observed in the boring, and the BaP Equivalents were reported at 3.52 mg/kg which exceeded the MPCA Tier 2 SRV of 3 mg/kg.

DRO was reported for the soil samples as follows:

- B-1 (12 feet-14 feet bgs) – 28.1 mg/kg
- B-2 (6 feet-8 feet bgs) – 186 mg/kg
- B-3 (7 feet--9 feet bgs) – 449 mg/kg

- B-4 (4 feet-6 feet bgs) - 65.4 mg/kg
- B-5 (4 feet-6 feet bgs) - 396 mg/kg
- B-6 (2 feet-4 feet bgs) - 69.6 mg/kg
- B-7 (1 foot-3 feet bgs) - 49.4 mg/kg
- B-8 (3 feet-5 feet bgs) – 25.8 mg/kg
- B-9 (4 feet-6 feet bgs) -319 mg/kg.

The aforementioned sample locations were generally located in the paved parking area located west of the Building.

As shown in **Table 3** in **Appendix B**, asbestos was not reported above laboratory reporting limits in any of the samples collected on the Property (soil borings B-1 through B-11). The analytical report for soil boring B-12 (6 inches-1 foot bgs), which is located on the portion of the Scherer Bros Lumber Co. Site adjacent to the north of the Property, reported the asbestos crysotile at <1%.

The Pace analytical reports are included in **Appendix D**.

4.0 DISCUSSION

Results of the analysis of the soil sample from soil boring B-3 (7 feet-9 feet bgs) collected at the Property identified a lead concentration of 10,300 mg/kg, which is above the MPCA Tier 1 SLV and MPCA Tier 2 Industrial SRV of 525 mg/kg and 700 mg/kg, respectively. BaP Equivalents were reported for soil boring B-3 (7 feet-9 feet bgs) at 5.36 mg/kg and at soil boring B-4 (7 feet-9 feet bgs) at 3.52 mg/kg both of which exceed the BaP Equivalents for the MPCA Tier 2 SRV of 3 mg/kg.

Based on the analytical information for soil boring B-3, the Owner and its attorneys, Fredrickson & Byron, P.A. were notified of the results of the soil sample analyses. Based on the results of the findings for soil boring B-3, Ms. Susan Steinwall with Fredrickson & Byron, P.A., reported a release to the Minnesota State Duty Officer on July 13, 2009. The report number issued by the State Duty Officer is #104811.

The location of soil borings B-3 and B-4 correspond to the general area where historical information noted in the Phase One ESA Report, identified a shingle mill and cedar post sawing mill on the southwest corner of the Property. A tank (no size or contents listed) and a chimney were noted in association with the mill. The clinkers reported in the soils in B-3 and B-4 may have been associated with the chimney reported for the shingle mill and cedar post sawing mill.

As previously identified, DRO was detected in soil samples from soil borings B-1 through B-9 ranging from 28.1 mg/kg to 449 mg/kg. The MPCA does not have an established cleanup standard for DRO. The presence of DRO identified in the soils may be associated with the fill brought onto the western portion of the Property which was formerly a side-channel to the Mississippi River and Hall's Island. The side channel was filled in the late 1960s. The source of the fill is unknown.

Analytical results from soil boring B-10, located on the Property adjacent to a former UST basin, and B-11, located down-gradient of a closed LUST site on the adjacent parcel, did not identify readily apparent petroleum impacts on the Property.

Asbestos was not identified on the Property. As previously identified vermiculite, which has been reported to contain asbestos fibers from certain quarries, was reported to have been historically warehoused and possible used at the Property. Asbestos was identified in the sample from B-12 on the parcel to the north of the Property.

5.0 CONCLUSIONS AND RECOMMENDATIONS

Work performed for the Limited Phase Two ESA included: completion of eleven soil borings on the Property and one soil boring located on the Scherer Bros Lumber Company Site to the north of the Property to assess sub-surface conditions; field screening of soil samples from the soil borings; collection of select soil samples from the soil borings for laboratory analysis; and preparation of this Limited Phase Two ESA Report. The soil borings were completed to assess the environmental and geotechnical conditions at the Property. Based on the results of the Limited Phase Two ESA, the following areas were identified as exhibiting environmental concern.

- Elevated lead and BaP Equivalents, exceeding the MPCA Tier 1 SLV and/or MPCA Tier 2 Industrial SRVs, were noted in soil samples in the area of soil borings B-3 and B-4. This area corresponds to the general area where historical information, as reported in the Phase One ESA Report, identified a shingle mill and cedar post sawing mill on the southwest corner of the Property. A tank (no size or contents listed) and a chimney were noted in association with the mill. The clinkers reported in the soils in B-3 and B-4 may have been associated withthe chimney reported for the shingle mill and cedar post sawing mill.

- Elevated DRO was noted in soil samples from B-1 through B-9 on the Property. The source of the DRO on the Property is not definitively known. However, the presence of DRO identified in the soils may be associated with the fill brought onto the western portion of the Property which was formerly a side-channel to the Mississippi River and Hall's Island. The side channel was filled in the late 1960s. The source of the fill is unknown.

- All soil samples on the Property identified fill ranging from 2.5 feet to 19 feet bgs. Debris in the fill material was noted to contain concrete, brick, asphalt, wood, foundry sand, clinkers, ash, glass and rubber.

Liesch recommends the following:

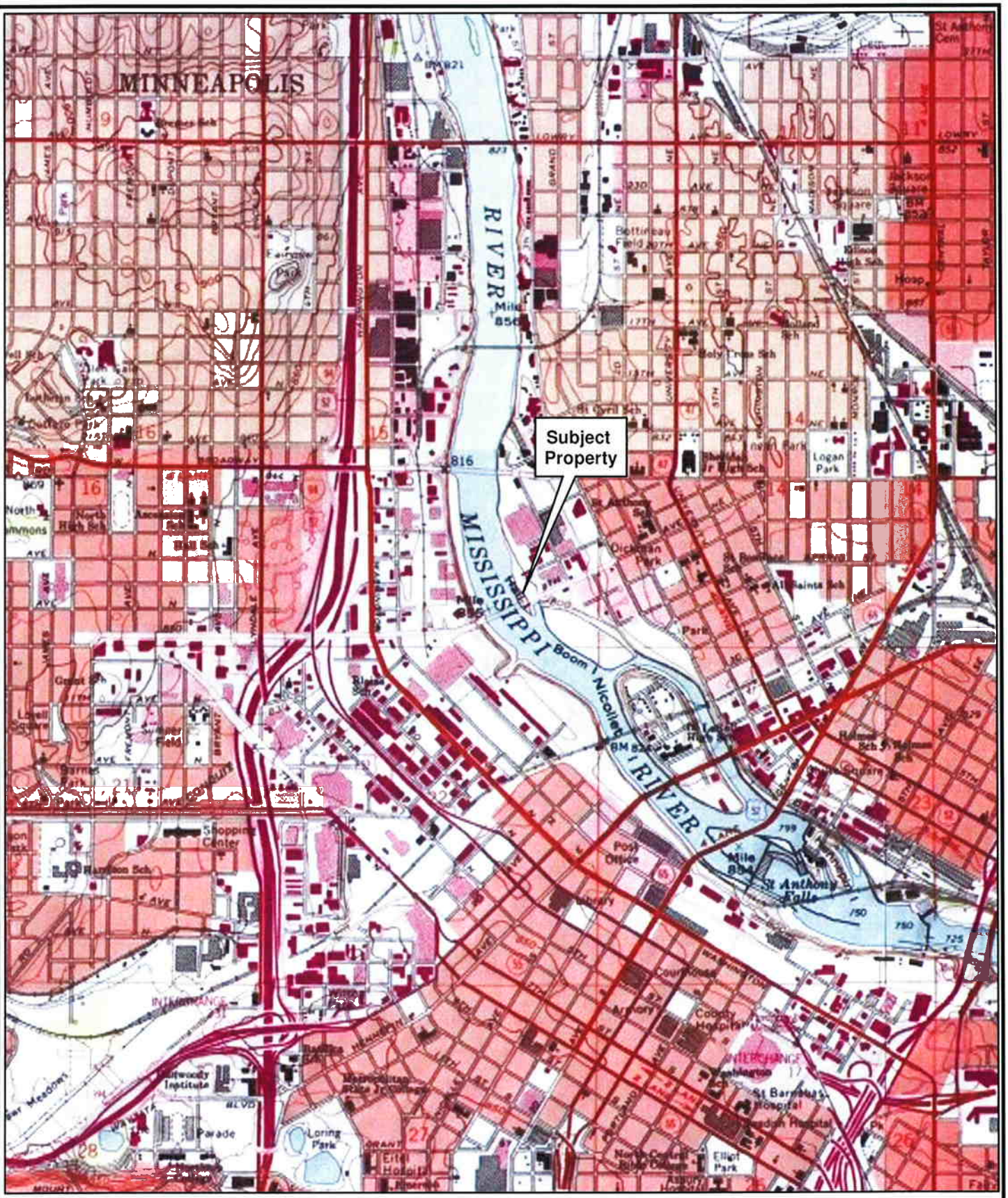
- Enter the Property into the MPCA Voluntary Investigation and Cleanup (**VIC**) Program for non-petroleum impacts and the MPCA Petroleum Brownfields (**PB**) Program for petroleum impacts. Liesch recommends providing the MPCA a copy of the Phase One ESA Report and this Limited Phase Two ESA Report, along with the program Application and a proposed actions letter. The purpose of entering the Property into the aforementioned programs is to obtain approval for environmental remediation and/or redevelopment activities at the Property and to ultimately obtain closure and no further action letters for the Property.

- Develop a work plan for a Supplemental Limited Phase Two ESA (**Supplemental Phase Two ESA**) to further evaluate lead and BaP Equivalents in the area of soil boring B-3 and B-4, assess soil conditions beneath the Buildings, further evaluate fill on the Property, assess soil vapor issues as they relate to the Buildings and a proposed building to be constructed for redevelopment and to assess potential impacts to ground water at the Property. Liesch recommends that the work plan be submitted to the MPCA VIC Program for review and approval prior to implementing additional investigation activities. Please note, the MPCA PB Program does not approve work plans.

- Based on the results of this Limited Phase Two ESA Report and the Supplemental Phase Two ESA, prepare a response action plan (**RAP**), identifying environmental response actions to impacts identified on the Property. The RAP would be designed to manage impacted soils either on-site or for off-site disposal.

- If development is to occur in the area of B-12, further investigation for asbestos would be necessary.

APPENDIX A



Source: USGS 7.5-min. Minneapolis South and Minneapolis North, MN, Quadrangle Maps, dated 1967 Revised 1993
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1 Inch = 2,000 Feet

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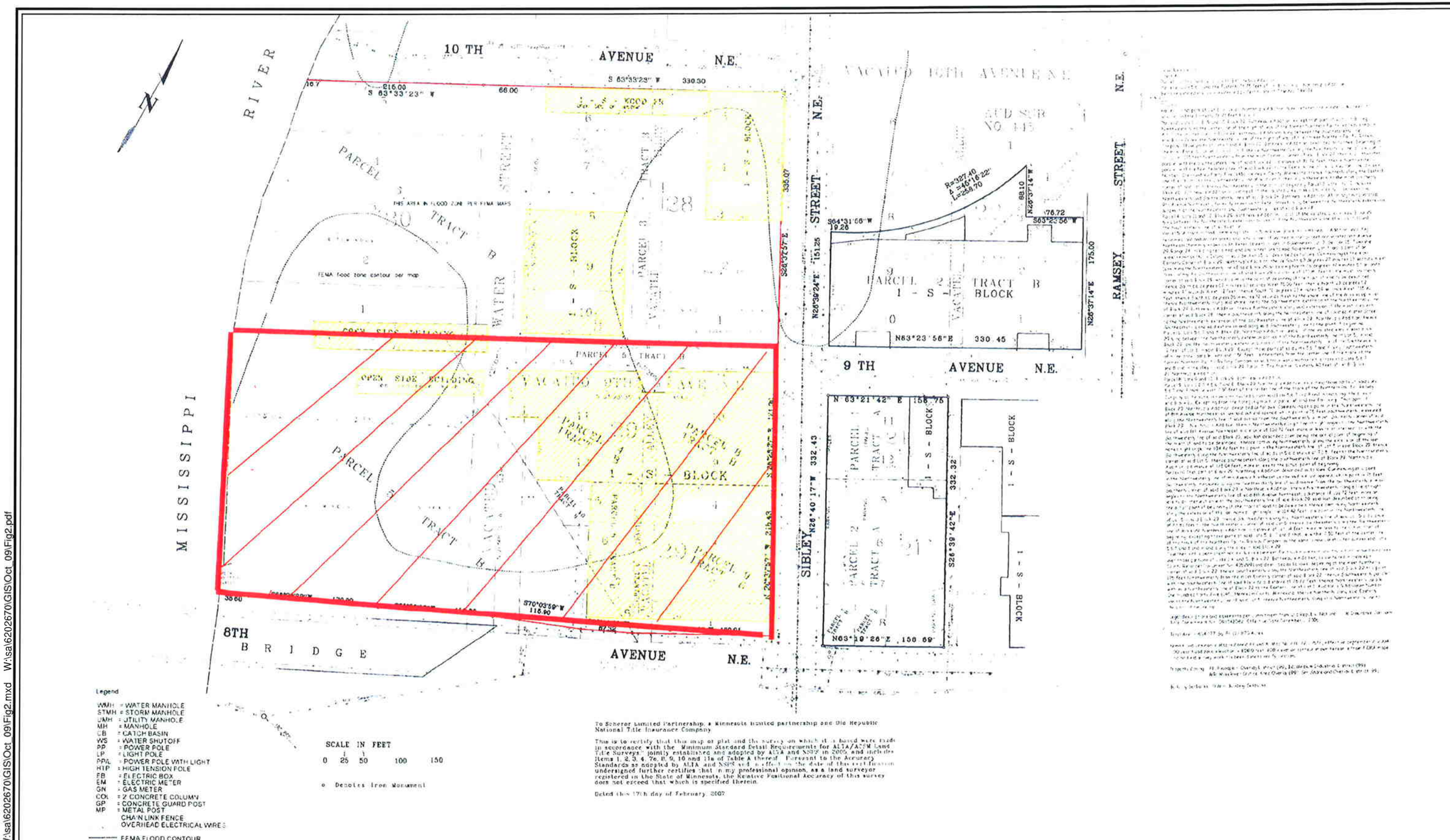
Ryan - Scherer Bros
9 Ninth Ave. NE, Minneapolis, MN

Oct 09

Property Location

Figure 1



To Scherer Limited Partnership, a Minnesota limited partnership and Old Republic National Title Insurance Company:

This is to certify that this map or plat and the survey on which it is based were made in accordance with the "Minimum Standard Detail Requirements for ALTA/ACSM Land Title Surveys" jointly established and adopted by ALTA and NSPS in 2005, and includes Items 1, 2, 3, 4, 7a, 8, 9, 10 and 11a of Table A thereof. Pursuant to the Accuracy Standards as adopted by ALTA and NSPS and in effect on the date of this certification, undersigned further certifies that, to my professional opinion, as a land surveyor registered in the State of Minnesota, the Relative Positional Accuracy of this survey does not exceed that which is specified therein.

Dated this 17th day of February, 2007.

Source: Lot Surveys Company, Inc., dated 02/17/2007, modified by Ryan Companies US, Inc. 05/29/2009

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Ryan - Scherer Bros 9 Ninth Ave. NE, Minneapolis, MN	Oct 09
Survey	Figure 2

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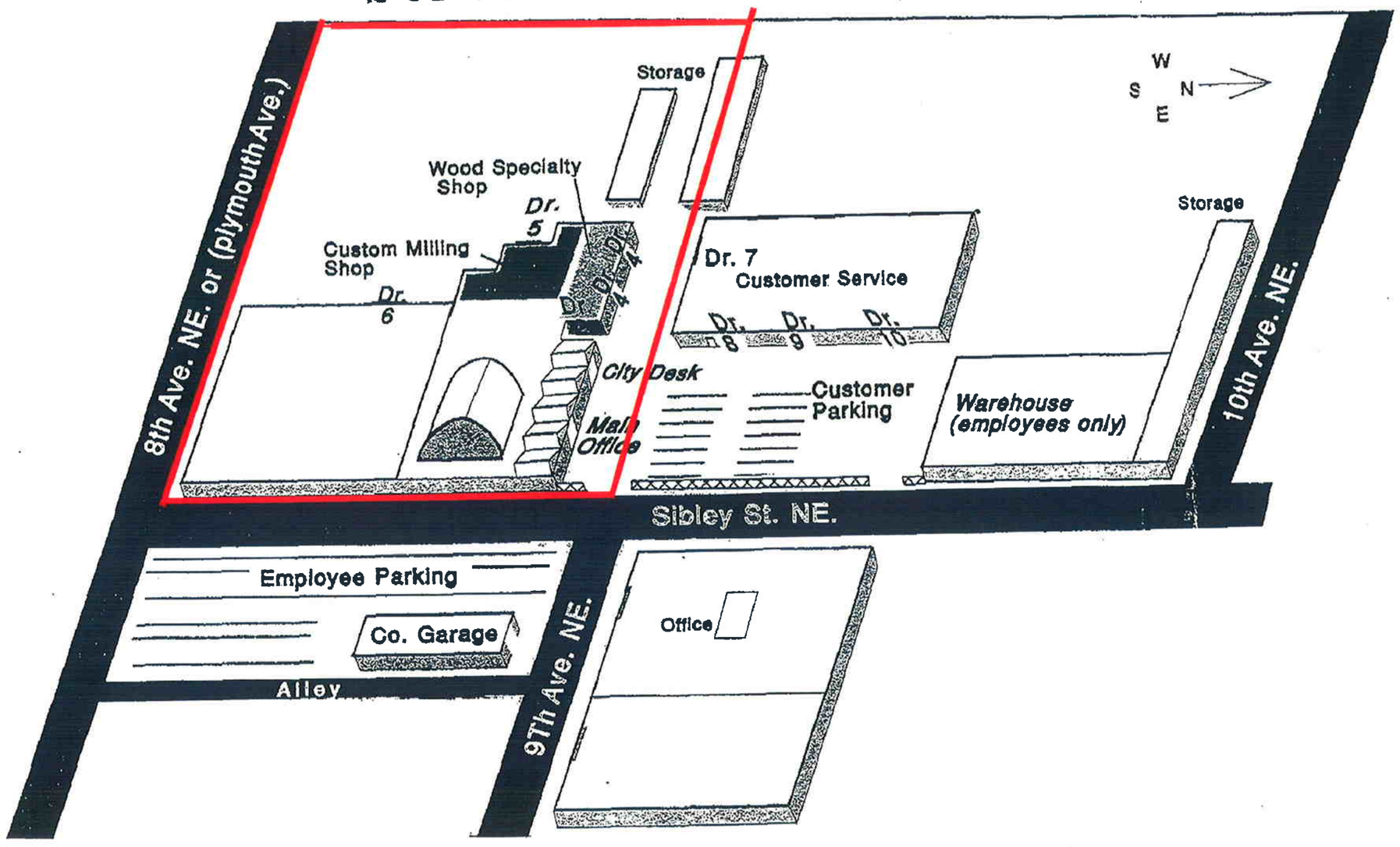
Scherer Bros. Lumber River Yard



Source: Dave Olson of Scherer Bros Lumber Co., 06/25/2009

Ryan - Scherer Bros 9 Ninth Ave. NE, Minneapolis, MN	Oct 09	Figure 3
Site Plan		

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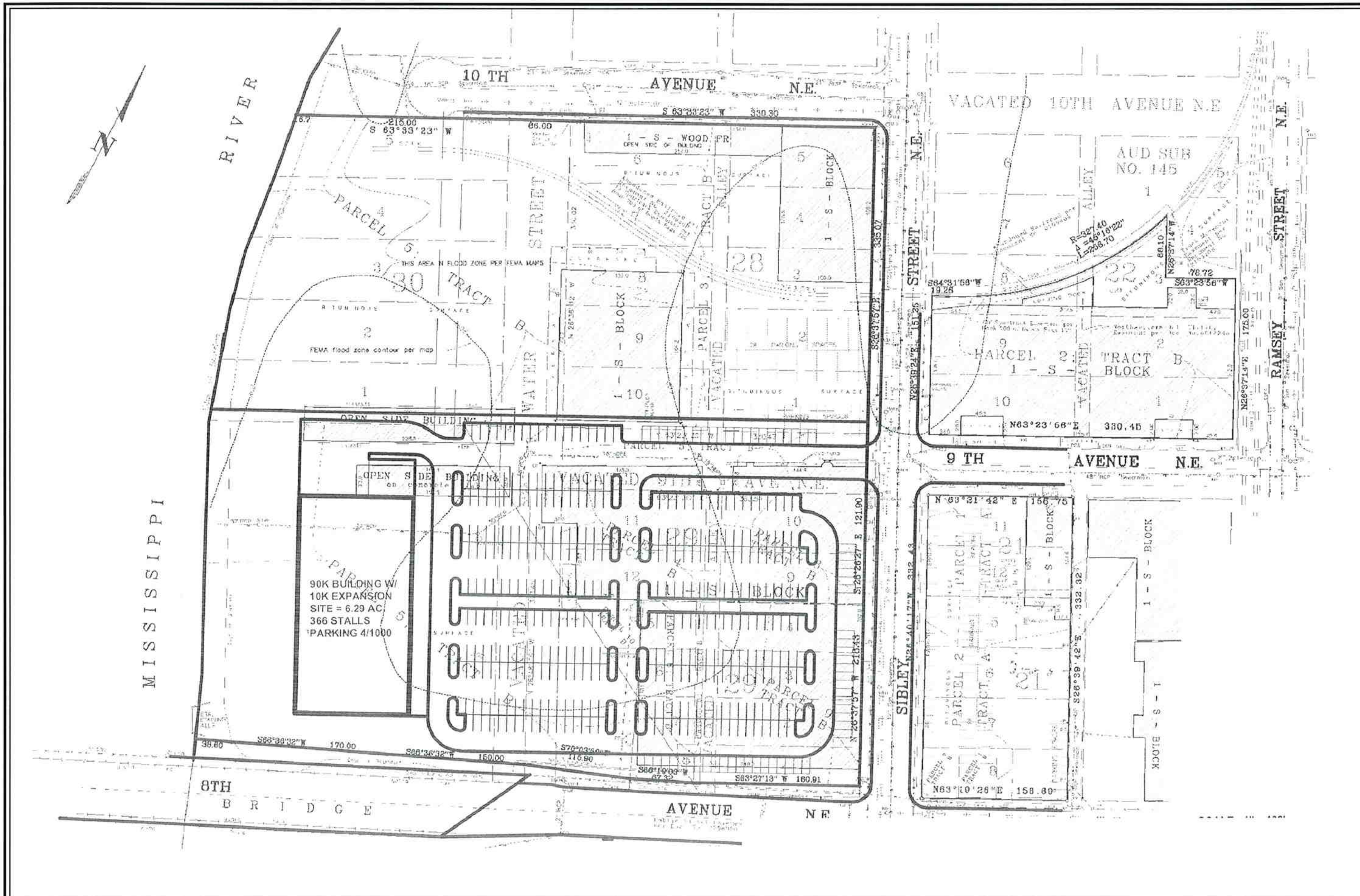

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Figure 4

Ryan - Scherer Bros
9 Ninth Ave, NE, Minneapolis, MN

Proposed Site Plan

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Source: Ryan Companies US, Inc., received by Liesch Associates, Inc. 06/04/2009

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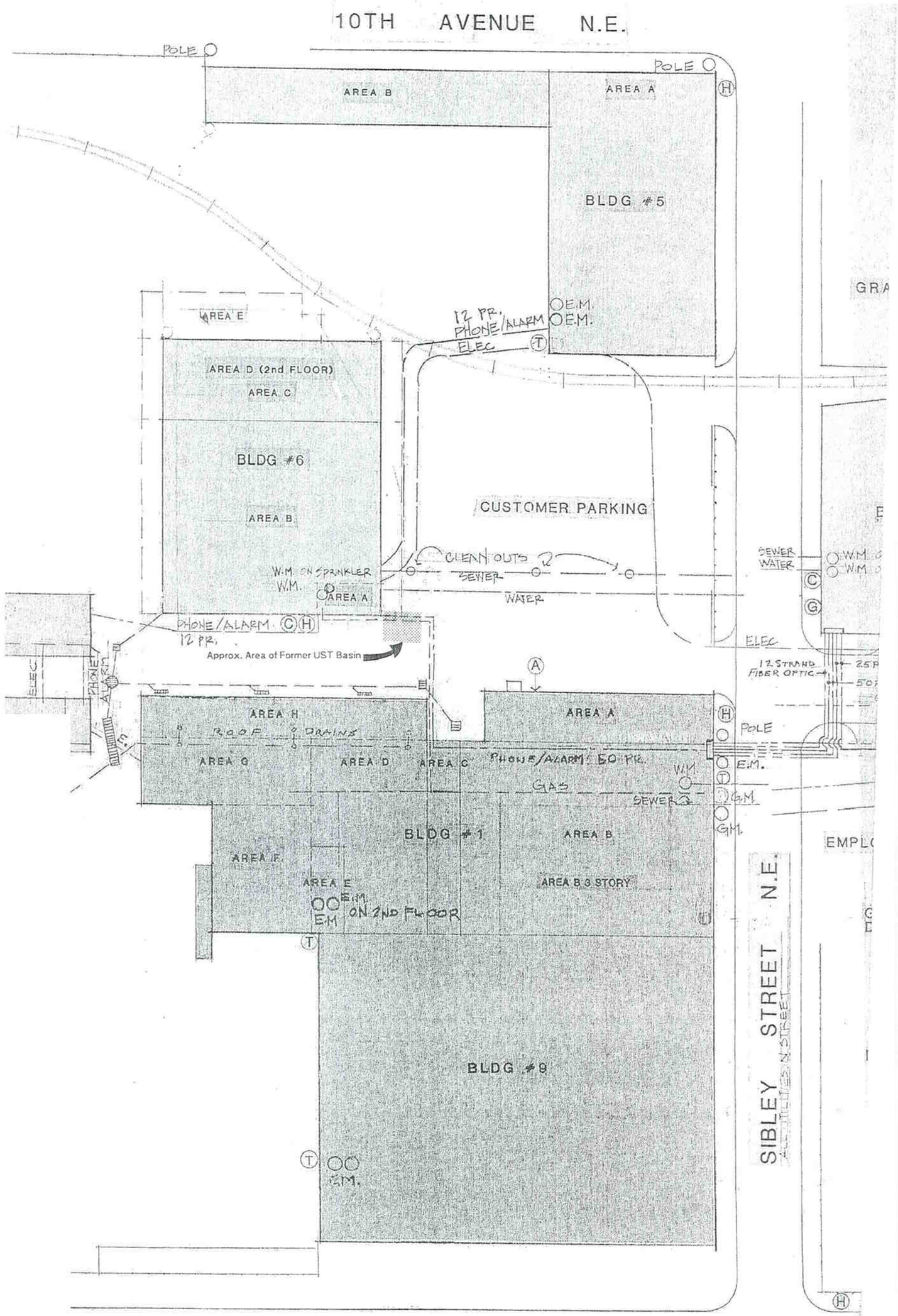

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Source: Ryan Companies US, Inc., undated

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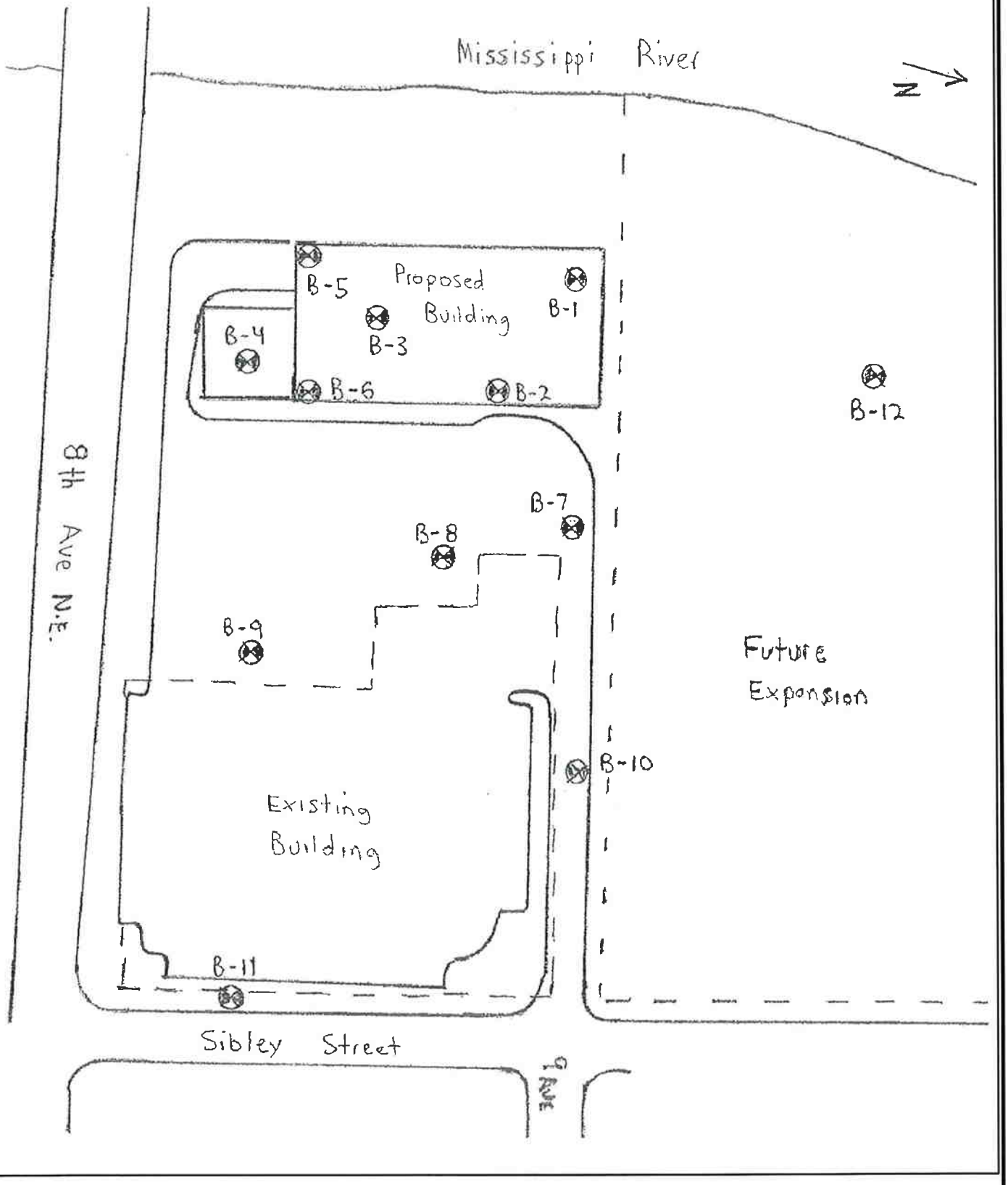
Building and Approximate UST Location Map

Oct 09

Figure 5



Source: American Engineering Testing, Inc., dated 07/16/2009

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	Soil Boring Locations	**Figure 6**

APPENDIX B

LIESCH ASSOCIATES, INC.

Project: Scherer Brothers	**Logged by: Tom Johnson**
Date: 7-6-09	**Drilling Contractor: AET**
Boring ID: B-1	**Driller/Assistant Name: Denny/Shawn**
Boring Depth (feet): 100.5	**Drilling Method: HAS/Mud Rotary**
Depth to Groundwater (feet):	**Weather: Partly Sunny 70°**
Boring Location:	

Depth (feet)	Sample Lithology: color, grain size, grain size distribution, stiffness and other sample / drilling notes	Moisture (dry/moist/wet/ saturated)	Chemical staining or odor	USCS	Sample Recovery-feet (i.e. 1.5 of 2)	PID (ppm)	Lab Sample Collected
	Asphalt Surface					<1	
0-1	Brown Gravelly fill	Dry	None	Fill		<1	
1-2	Dark brown silty sand fill	Dry	None	Fill		<1	Asbestos
2-4	Black sandy silt with organics	Moist	None	Fill		<1	
4.5-6.5	Black organic clay with trace of concrete	Moist	None	Fill		<1	
7-9	Fine white sand with pieces of sandstone	Moist	None	Fill		<1	
9.5-11.5	Sandstone fill	Sat. @ 10'	None	Fill		<1	
12-14.5	Black silty fine to medium sand with pieces of brick	Moist	None	Fill		<1	Soil
18-21	Grey lean silty clay stiff	Moist	None	Native		<1	
24-26	Grey lean clay stiff	Moist	None	Native		<1	
29-31	Grey lean clay less stiff more ?	Moist	None	Native		<1	
34-36	Grey medium soft sand clay silt	Moist	None	Native		<1	
39-41	Grey/tan soft sandy clay	Moist/Wet	None	Native		<1	
44-46	Grey fine sandy clay	Wet	None	Native		<1	
49-51	Grey fine silty sand trace of clay	Saturated	None	Native		<1	
55-56	Grey fine silty sand trace of clay	Saturated	None	Native		<1	
56-61	Grey fine silty sand trace of clay	Saturated	None	Native		<1	
64-66	Grey lean sandy clay stiff	Moist	None	Native		<1	
69-71	Grey fine silty sand	Wet & Sat.	None	Native		<1	
63-76	Grey fine sand - less silt	Saturated	None	Native		<1	
79-81	Grey fine silty clayey sand changing to clay at 80'	Saturated	None	Native		<1	
84-86	Grey silt with trace of sand	Wet	None	Native		<1	
89-91	Brown silty sandy clay	Wet	None	Native		<1	
94-96	Light brown clay changing to medium coarse clayey sand	Wet	None	Native		<1	
98-100	Brown grey gravelly sand	Sat	None	Native		<1	

Notes: Mud ? @ 45', no contamo, 12-14' Soil Sample, 1-2' Asbestos

LIESCH ASSOCIATES, INC.

Project: Scherer Brothers	**Logged by: Tom Johnson**
Date: 7-9-09	**Drilling Contractor: AET**
Boring ID: B-2	**Driller/Assistant Name: Denny/Shawn**
Boring Depth (feet): 61	**Drilling Method: HAS/Mud Rotary**
Depth to Groundwater (feet):	**Weather: Overcast 64-70°**
Boring Location:	

Depth	Sample Lithology: color, grain size, grain size distribution, stiffness and other sample / drilling notes	Moisture (dry/moist/wet/ saturated)	Chemical staining or odor	USCS	Sample Recovery-feet (i.e. 1.5 of 2)	PID (ppm)	Lab Sample Collected
0-2	Brown silty sand fill with gravel and rock	Dry	None	Fill		<1	Asbestos
2-4	Brown silty sand fill with gravel and rock	Dry	None	Fill		<1	
4-6	Dark brown silty sand with brick and rock	Dry	None	Fill		<1	
0.5-8	brown/grey silty sand with fill, brick	Moist	None	Fill		<1	Soil
8.5-11.5	Dark brown peat changing to grey sand silt	Wet to Sat.	None	Native		<1	
11.5-13.5	Silty sand with rock - limited recovery	Saturated	None	Native		<1	
14-16	Grey sandy silt - silty sand, fine grained	Saturated	None	Native		<1	
16.5-18.5	Grey silty clay - trace of sand	Moist	None	Native		<1	
19-21.5	Grey silty clay - trace of sand and gravel	Moist	None	Native		<1	
34-36	Grey clayey silt - silty clay	Moist	None	Native		<1	
39-41	Grey clay with trace of sand	Moist	None	Native		<1	
44-46	Grey clayey silt with fines	Moist	None	Native		<1	
49-50	Grey fine sandy silt	Moist	None	Native		<1	
54-56	Grey sandy silt with trace of clay	Moist	None	Native		<1	
59-61	Grey silty sand fine to medium grained	Moist	None	Native		<1	

Notes: 0-8' Soil Sample, 1-2' Asbestos

LIESCH ASSOCIATES, INC.

Project: Scherer Brothers	**Logged by: Tom Johnson**
Date: 7-7-09	**Drilling Contractor: AET**
Boring ID: B-3	**Driller/Assistant Name: Denny/Shawn**
Boring Depth (feet): 120	**Drilling Method: HAS/Mud Rotary**
Depth to Groundwater (feet): 14	**Weather: Mostly Sunny 72-80°**
Boring Location:	

Depth	Sample Lithology: color, grain size, grain size distribution, stiffness and other sample / drilling notes	Moisture (dry/moist/wet/ saturated)	Chemical staining or odor	USCS	Sample Recovery-feet (i.e. 1.5 of 2)	PID (ppm)	Lab Sample Collected
0-6"	Asphalt Surface						
3"-6"	Gravel fill		None	Fill			6"-1'
9"-1.5'	Limestone rock pieces		None	Fill			Asbestos
2-4	Brown silty sand fill asphalt @ 3.5'	Moist	None	Fill	6"	<1	
4.5-6.5	Gravel, brick, wood - limited recovery	Moist	Slight creosote odor from pieces of wood	Fill		1	
7-9	Fill, silty sand with gravel and foundry sand clinkers	Saturated	None	Fill	6"	8	Soil
9.5-11.5	Sandy fill, foundry sand	Saturated	None	Fill	16"	2	
12-14	Black silt and sand fill	Saturated	None	Fill	12"	2.0	
14.5-16.5	Dark grey gravelly sand	Saturated	None	Fill	12"	<1	
15-21.5	Grey clay	Wet	None	Native		<1	
24-26	Grey clay	Moist	None	Native		<1	
29-31	Grey clay	Moist	None	Native		<1	
34-36	Grey silt with trace of sand	Moist	None	Native		<1	
39-41	Grey clay	Moist	None	Native		<1	
44-46	Clay	Moist	None	Native		<1	
46-51	Clay	Moist	None	Native		<1	
59-61	Grey very fine silty sand, sandy silt	Wet	None	Native		<1	
64-66	Grey very fine sand and silt	Saturated	None	Native		<1	
69-71	Grey sand silt very fine	Saturated	None	Native		<1	
74-76	Grey sandy silt with trace of clay	Wet	None	Native		<1	
79-81	Grey lean clay fill	Moist	None	Native		<1	
84-86	Light brown/grey brown clay till trace of gravel	Moist	None	Native		<1	
89-91	Grey sand gravel with silt	Moist	None	Native		<1	
94-96	Boulders	Wet to Sat.	None	Native		<1	
99-101	Black rock - boulder	Saturated	None	Native		<1	
104-105	No recovery	Wet	None	Native			
109	Rust tan sandstone	Saturated	None	Native		<1	
119	Limited recovery	Moist/Wet	None	Native		<1	

Notes: 7-9' Soil Sample, 6"-1' Asbestos

LIESCH ASSOCIATES, INC.

Project: Scherer Brothers	**Logged by: Tom Johnson**
Date: 7-10-09	**Drilling Contractor: AET**
Boring ID: B-4	**Driller/Assistant Name: Denny/Shawn**
Boring Depth (feet): 80	**Drilling Method: HAS/Mud Rotary**
Depth to Groundwater (feet):	**Weather: Mostly Sunny 72-80°**
Boring Location:	

Depth	Sample Lithology: color, grain size, grain size distribution, stiffness and other sample / drilling notes	Moisture (dry/moist/wet/ saturated)	Chemical staining or odor	USCS	Sample Recovery-feet (i.e. 1.5 of 2)	PID (ppm)	Lab Sample Collected
	Asphalt Surface	Dry	None				
0-2	Dark brown silty sand and gravel	Dry	None	Fill		<1	Asbestos
2-4	Limited recovery limestone rock	Moist	None	Fill		<1	
4.5-6.5	Rock silty sand with cinder/clinkers - limited recovery not enough for sample	Moist	None	Fill		<1	
7-9	Black sandy fill with evidence of furnace type waste - glass, clinkers, ash	Moist	None	Fill		<1	Soil
9.5-11.5	Black sandy fill with evidence of furnace type waste - glass, clinkers, ash	Moist	None	Fill		<1	
12-13.5	Dark brown silty clay changing to grey silty sand	Moist	None	Native		<1	
14-16.5	Silty sand with wood and peat	Moist	None	Native		<1	
17-19.5	Grey silty clay	Moist	None	Native		<1	
24-16	Grey silt	Moist	None	Native		<1	
	Set up mud rotary	Moist	None	Native			
29-31	Grey sandy clay	Moist	None	Native		<1	
34-36	Grey sandy silt	Moist	None	Native		<1	
34-41	Grey sandy silt	Saturated	None	Native		<1	
45-46	Grey sandy silt	Saturated	None	Native		<1	
49-51	Grey sandy silt, silty sand	Saturated	None	Native		<1	
54-56	Grey sandy clayey silt	Saturated	None	Native		<1	
59-61	Grey sandy clay	Wet	None	Native		<1	
64-66	Grey sandy clay	Wet	None	Native		<1	
69-71	Loose silty sand - sandy silt	Saturated	None	Native		<1	
75-76	Gray till with gravel and rock - limited recovery	Wet	None	Native		<1	
79-80	Coarse sandy gravel	Saturated	None	Native		<1	

Notes: 7-9' Soil Sample, 1-2' Asbestos

LIESCH ASSOCIATES, INC.

Project: Scherer Brothers	**Logged by: Tom Johnson**
Date: 7-8-09	**Drilling Contractor: AET**
Boring ID: B-5	**Driller/Assistant Name: Denny/Shawn**
Boring Depth (feet): 61	**Drilling Method: HAS/Mud Rotary**
Depth to Groundwater (feet):	**Weather: Mostly Sunny 72-80°**
Boring Location:	

Depth	Sample Lithology: color, grain size, grain size distribution, stiffness and other sample / drilling notes	Moisture (dry/moist/wet/ saturated)	Chemical staining or odor	USCS	Sample Recovery-feet (i.e. 1.5 of 2)	PID (ppm)	Lab Sample Collected
	Asphalt Surface						
0-2	Dark brown silty sand fill with gravel	Moist	None	Fill		1	Asbestos
2-4	Dark brown silty sand with rock	Moist	None	Fill		1	
4-6	Dark brown silty sand with rock	Moist	Slight Petro Odor	Fill		5	Soil
7-9	Dark brown silty sand	Moist	Slight Odor	Fill		2	
9.5-11	Dark brown silty sand changing to concrete	Wet	None	Fill		1	
12-13	Concrete pieces with dark brown silty sand	Saturated	None	Fill		<1	
14.5-16	Weathered limestone	Saturated	None	Fill		<1	
18-20	Black medium sand	Saturated	None	Fill		<1	
24-25	Grey silty sand with clay	Saturated	None	Native		<1	
29-31	Grey sandy clay	Wet	None	Native			
34-36	Grey silty sand with clay	Wet	None	Native		<1	
39-41	Grey sandy clay	Moist	None	Native		<1	
44-46	Grey sandy silt, clayey silt	Moist to Wet	None	Native		<1	
49-51	Grey silty clay	Moist	None	Native		<1	
54-56	Grey silty clay	Moist	None	Native		<1	
59-61	Grey silty clay	Moist	None	Native		<1	

Notes: 4-6' Soil Sample, 1.5-2' Asbestos

LIESCH ASSOCIATES, INC.

Project: Scherer Brothers	**Logged by: Tom Johnson**
Date: 7-8-09	**Drilling Contractor: AET**
Boring ID: B-6	**Driller/Assistant Name: Denny/Shawn**
Boring Depth (feet): 61	**Drilling Method: HAS/Mud Rotary**
Depth to Groundwater (feet):	**Weather: Mostly Sunny 72-80°**
Boring Location:	

Depth	Sample Lithology: color, grain size, grain size distribution, stiffness and other sample / drilling notes	Moisture (dry/moist/wet/ saturated)	Chemical staining or odor	USCS	Sample Recovery-feet (i.e. 1.5 of 2)	PID (ppm)	Lab Sample Collected
	Asphalt Surface						
0-2	Brown silty sand with gravel	Dry	None	Fill		<1	Asbestos
2-4	Grey to dark brown silty sand fill with gravel	Moist	None	Fill		<1	Soil
4-6.5	Grey silty sand	Moist	None	Fill		<1	
6.5-8.5	Dark grey clay with sand layer changing to dark brown peat	Moist/wet	None	Native		<1	
9-11.5	Peat changing to sandy gravel with rock	Saturated	None	Native		<1	
12-14	Medium to coarse sandy gravel	Saturated	None	Native		<1	
	Started with mud rotary	Saturated	None	Native		<1	
14.5-16.5	Grey silty clay	Sat. to Wet	None	Native		<1	
17-19	Grey clay	Saturated	None	Native		<1	
19.5-21	Grey clay	Saturated	None	Native		<1	
24-26	Sandy silt	Saturated	None	Native		<1	
29-31	Sandy silt	Saturated	None	Native		<1	
34-36	Silty sand, sandy silt	Saturated	None	Native		<1	
39-41	Silty sand fine to medium grained	Saturated	None	Native		<1	
44-46	Medium to coarse sandy gravel	Saturated	None	Native		<1	
49-51	Sandy gravel	Saturated	None	Native		<1	
54-56	Sandy gravel	Saturated	None	Native		<1	
59-61	Sandy gravel	Saturated	None	Native		<1	

Notes: 2-4' Soil Sample, 1-2' Asbestos

LIESCH ASSOCIATES, INC.

Project: Scherer Brothers	**Logged by: Tom Johnson**
Date: 7-8-09	**Drilling Contractor: AET**
Boring ID: B-7	**Driller/Assistant Name: Denny/Shawn**
Boring Depth (feet): 16	**Drilling Method: HAS/Mud Rotary**
Depth to Groundwater (feet):	**Weather: Clear 75°**
Boring Location:	

Depth	Sample Lithology: color, grain size, grain size distribution, stiffness and other sample / drilling notes	Moisture (dry/moist/wet/ saturated)	Chemical staining or odor	USCS	Sample Recovery-feet (i.e. 1.5 of 2)	PID (ppm)	Lab Sample Collected
0-2	Brown silty sand	Dry	none	Fill		<1	Asbestos
2-4	Dark brown silty sand - peat fill	Dry	none	Fill		<1	Soil
4-6	Black organic silty sand	Moist	none	Fill		<1	
6-8	Dark grey organic sandy silt with trace of clay	Wet	none	Fill		<1	
8.5-11	Sandy silt changing to coarse sand with gravel @ 10.8'	Saturated	none	Fill		<1	
11.3-14	Grey sandy clay fill	Wet	none	Fill		<1	
14-16	Grey sand clay fill sand seam @ 15.5'	Moist to Wet	none	Fill		<1	

Notes: 1-3' Soil Sample, 1-2' Asbestos

LIESCH ASSOCIATES, INC.

Project: Scherer Brothers	**Logged by: Tom Johnson**
Date: 7-8-09	**Drilling Contractor: AET**
Boring ID: B-8	**Driller/Assistant Name: Denny/Shawn**
Boring Depth (feet): 16.5	**Drilling Method: HAS**
Depth to Groundwater (feet):	**Weather: Partly Cloudy 75°**
Boring Location:	

Depth	Sample Lithology: color, grain size, grain size distribution, stiffness and other sample / drilling notes	Moisture (dry/moist/wet/ saturated)	Chemical staining or odor	USCS	Sample Recovery-feet (i.e. 1.5 of 2)	PID (ppm)	Lab Sample Collected
	Asphalt						
0-2	Dark brown sandy gravel fill	Moist	None	Fill		1	Asbestos
2-4	Silty sand fill - peat fill with wood and rubber	Moist	None	Fill		5	Soil
4-6	Dark grey fine silty sand	Wet	None	Fill		1	
6-8	Grey medium grained clayey sand	Wet	None	Native		<1	
8.5-10	Coarse sand changing to grey clay	Wet to Sat.	None	Native		<1	
10.5-11	Clay	Saturated	None	Native		<1	
12-13.5	Grey clay trace of sand	Wet	None	Native		<1	
14-16.5	Grey clay	Wet	None	Native		<1	

Notes: 3-5' Soil Sample, 1-2' Asbestos

LIESCH ASSOCIATES, INC.

Project: Scherer Brothers	**Logged by: Tom Johnson**
Date: 7-8-09	**Drilling Contractor: AET**
Boring ID: B-9	**Driller/Assistant Name: Denny/Shawn**
Boring Depth (feet): 16	**Drilling Method: HAS**
Depth to Groundwater (feet):	**Weather: Partly Sunny 70-80°**
Boring Location:	

Depth	Sample Lithology: color, grain size, grain size distribution, stiffness and other sample / drilling notes	Moisture (dry/moist/wet/ saturated)	Chemical staining or odor	USCS	Sample Recovery-feet (i.e. 1.5 of 2)	PID (ppm)	Lab Sample Collected
	Asphalt						
0-2	Brown sandy fill	Dry	None	Fill	16"	<1	Asbestos
2-4	Dark brown sandy fill, piece of coal slag trace of clay till	Dry	None	Fill	16"	<1	Soil
4.5-6	Brown sand changing to dark brown silty peat	Moist	None	Native	12"	<1	
7.5-8.5	Grey fine silty sand	Moist	None	Native	18"	<1	
9-11	Grey brown sandy silt, silty sand	Saturated	None	Native	20"	<1	
12-14	Silty sand with gravel	Saturated	None	Native	20"	<1	
14-16	Silty sand changing to sandy clay @ 15'	Saturated	None	Native	20"	<1	

Notes: 3-5' Soil Sample, 1.5-2' Asbestos

LIESCH ASSOCIATES, INC.

Project: Scherer Brothers	**Logged by: Tom Johnson**
Date: 7-8-09	**Drilling Contractor: AET**
Boring ID: B-10	**Driller/Assistant Name: Denny/Shawn**
Boring Depth (feet): 21	**Drilling Method: HAS**
Depth to Groundwater (feet):	**Weather: Partly Sunny 70-80°**
Boring Location:	

Depth	Sample Lithology: color, grain size, grain size distribution, stiffness and other sample / drilling notes	Moisture (dry/moist/wet/ saturated)	Chemical staining or odor	USCS	Sample Recovery-feet (i.e. 1.5 of 2)	PID (ppm)	Lab Sample Collected
	Asphalt						
0-2	Brown silty sand fill		None	Fill		<1	Asbestos
2-4	Silty sand changing to light brown clay @ 3.5'		None	Fill		<1	Soil
4-6	Tan medium to coarse sand with trace of gravel	Dry to Moist	None	Native		<1	
6-8.5	Tan medium to coarse sand with gravel and rock	Moist	None	Native		<1	
9-11	Tan coarse sandy gravel	Saturated	None	Native		<1	Soil
12-13.5	Grey sandy clay fill	Moist	None	Native		<1	
14-16	Clay		None	Native		<1	
16-18.5	Grey clay		None	Native		<1	
19.5-21	Grey clay		None	Native		<1	

Notes: 4-6' Soil Sample, 1-2' Asbestos, 9-11' Soil sample submitted later

LIESCH ASSOCIATES, INC.

Project: Scherer Brothers	**Logged by: Tom Johnson**
Date: 7-8-09	**Drilling Contractor: AET**
Boring ID: B-11	**Driller/Assistant Name: Denny/Shawn**
Boring Depth (feet): 21	**Drilling Method: HAS**
Depth to Groundwater (feet):	**Weather: Partly Sunny 70-80°**
Boring Location:	

Depth	Sample Lithology: color, grain size, grain size distribution, stiffness and other sample / drilling notes	Moisture (dry/moist/wet/ saturated)	Chemical staining or odor	USCS	Sample Recovery-feet (i.e. 1.5 of 2)	PID (ppm)	Lab Sample Collected
0-4	Dark brown sandy silt with organics (topsoil)	Dry	None	Fill		<1	
4-8	Dark brown sandy silt changing to medium to coarse sand	Dry	None	Native		<1	
8-12	Tan-light brown medium sand, little to no silt changing to medium to coarse sand. Water @ 11.7' trace of gravel @ Interface		None	Native		<1	
12-16	Tan medium sand with trace of silt changing to tan coarse sand with gravel @ 14.5' - 15.5 changest o grey stiff clay	Moist	None	Native		<1	

Notes: 4-6' Soil Sample, 1-2' Asbestos, 9-11' Soil sample submitted later

LIESCH ASSOCIATES, INC.

Project: Scherer Brothers	**Logged by: Tom Johnson**
Date: 7-6-09	**Drilling Contractor: AET**
Boring ID: B-12	**Driller/Assistant Name: Denny/Shawn**
Boring Depth (feet): 60	**Drilling Method: HAS/Mod Rotary**
Depth to Groundwater (feet):	**Weather: Partly Cloudy 78°**
Boring Location:	

Depth	Sample Lithology: color, grain size, grain size distribution, stiffness and other sample / drilling notes	Moisture (dry/moist/wet/ saturated)	Chemical staining or odor	USCS	Sample Recovery-feet (I.e. 1.5 of 2)	PID (ppm)	Lab Sample Collected
	Asphalt						
0-2	Black silty sand and gravelly fill, wood (railroad tie)	Moist	None	Fill	18"	<1	
2.5-3.5	Gravelly sand fill changing to black silt fill	Moist	None	Fill	20"	<1	
4-6	Black peaty fill with gravel, brick, glass	Moist	None	Fill	18"	<1	Asbestos
5.5-8.5	Peat fill - some pieces of glass	Moist	None	Fill	12"	<1	
9-11	Limited recovery			Fill		<1	Soil
11.5-13.5	Grey medium grained sand	Saturated	None	Native	16"	<1	
14-16	Grey medium sand, becoming more fine changing to gravel clay @ 15.5'	Wet	None	Native	20"	<1	
19.5-21.5	Grey sand and silt silty sand	Saturated	None	Native	22"	<1	
24-26	Grey silty clay	Wet to Moist	None	Native	20"	<1	
39-31	Grey silty clay	Moist	None	Native	18"	<1	
34-36	Gray clay	Moist	None	Native	22"	<1	
39-41	Gray clay more silt less stiff	Moist	None	Native	20"	<1	
44-46	Grey clay	Moist	None	Native	22"	<1	
49-51	Grey silty clay	Moist	None	Native	24"	<1	
51-56	Grey sandy silt, loose	Saturated	None	Native	20"	<1	
59-60	Grey sandy silt, loose	Saturated	None	Native	20"	<1	

Notes: 11-13' Soil Sample, 6-10' Asbestos

APPENDIX C

TABLE 1
SCHERER BROS LUMBER CO. PROPERTY
SOIL SAMPLE COLLECTION AND PARAMETER SUMMARY

Sample ID (Sample Depth)	Parameters Analyzed					
	VOCs	DRO	GRO	SVOCs	RCRA Metals	Asbestos
B-1 (1'-2')						X
B-1 (12'-14')	X	X	X		X	
B-2 (1'-2')						X
B-2 (6'-8')	X	X	X		X	
B-3 (6"-1')						X
B-3 (7'-9')	X	X	X	X	X	
B-4 (1'-2')						X
B-4 (7'-9')	X	X	X	X	X	
B-5 (1.5'-5')						X
B-5 (4'-6')	X	X	X		X	
B-6 (1'-2')						X
B-6 (2'-4')	X	X	X		X	
B-7 (1'-2')						X
B-7 (1'-3')	X	X	X		X	
B-8 (1'-2')						X
B-8 (3'-5')	X	X	X		X	
B-9 (1.5'-2')						X
B-9 (3'-5')	X	X	X		X	
B-10 (1'-2')						X
B-10 (4'-6')	X	X	X		X	
B-10 (9'-11')	X	X	X		X	
B-11 (12'-13')	X	X	X		X	
B-12 (6"-1')						X
B-12 (11'-13')	X	X	X		X	

Notes:
X - Sample Analyzed

W:\sa\6202670\.02 - Limited Phase Two\[Table 1.xls]TABLE 1

TABLE 2
SCHERER BROS. LUMBER CO. PROPERTY
SOIL SAMPLE ANALYTICAL RESULTS SUMMARY

Parameter	units	SAMPLE LOCATION (DEPTH OF SAMPLE IN FEET)													MPCA Tier 1 SLVs	MPCA Tier 2 Industrial SRVs
		B-1 (12'-14')	B-2 (6'-8')	B-3 (7'-9')	B-4 (7'-9')	B-5 (4'-6')	B-6 (2'-4')	B-7 (1'-3')	B-8 (3'-5')	B-9 (3'-5')	B-10 (4-6')	B-10 (9'-10')	B-11 (12'-13')	B-12 (11'-13')		
DRO[1]	mg/kg	28.1	186	449	65.4	396	69.6	49.4	25.8	319	ND	ND	ND	ND	NE	NE
GRO	mg/kg	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	NE	NE
VOCs [2]																
Naphthalene	ug/kg	ND	ND	0.432	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	7.5	28
SVOC																
Anthracene	mg/kg	NT	NT	2.2	ND	NT	NT	NT	NT	NT	NT	NT	NT	NT	942	45400
Benzo(a)anthracene	mg/kg	NT	NT	3.2	2.3	NT	NT	NT	NT	NT	NT	NT	NT	NT	*	**
Benzo(a)pyrene	mg/kg	NT	NT	4.2	2.7	NT	NT	NT	NT	NT	NT	NT	NT	NT	*	**
Benzo(b)fluoranthene	mg/kg	NT	NT	6	3.9	NT	NT	NT	NT	NT	NT	NT	NT	NT	*	**
Benzo(g,h,i)perylene	mg/kg	NT	NT	3.7	2.3	NT	NT	NT	NT	NT	NT	NT	NT	NT	NE	NE
Benzo(k)fluranthene	mg/kg	NT	NT	1.9	ND	NT	NT	NT	NT	NT	NT	NT	NT	NT	*	**
Chrysene	mg/kg	NT	NT	3.6	2.4	NT	NT	NT	NT	NT	NT	NT	NT	NT	*	**
Fluoranthene	mg/kg	NT	NT	6.3	4.5	NT	NT	NT	NT	NT	NT	NT	NT	NT	295	6800
Indeno(1,2,3-cd)pyrene	mg/kg	NT	NT	2.9	1.8	NT	NT	NT	NT	NT	NT	NT	NT	NT	*	**
Phenanthrene	mg/kg	NT	NT	8.5	3.5	NT	NT	NT	NT	NT	NT	NT	NT	NT	NE	NE
Pyrene	mg/kg	NT	NT	6.0	4.0	NT	NT	NT	NT	NT	NT	NT	NT	NT	272	5800
BaP Equivalents	mg/kg	NT	NT	5.36	3.52	NT	NT	NT	NT	NT	NT	NT	NT	NT	NE	3
Carcinogenic BaP Equivalents	mg/kg	NT	NT	6.87	4.33	NT	NT	NT	NT	NT	NT	NT	NT	NT	10.2	NE
RCRA Metals																
Arsenic	mg/kg	1.4	7.7	1.0	5.5	6.6	9.5	9.2	3.3	8.9	4.2	10.1	1.9	1.3	15.1	20
Barium	mg/kg	25.7	75.8	35.5	132	85.5	74.7	252	39.7	170	49.9	115	11.0	58.9	842	18,000
Cadmium	mg/kg	0.12	0.32	0.46	0.41	0.33	0.26	0.14	0.55	1.4	0.66	0.077	0.29	0.12	4.4	200
Chromium	mg/kg	9.4	10.7	12.3	18.9	20.1	17	11.9	9.9	14.4	9.1	17.6	9.9	10.2	18/1,000,000 [3]	200/100000 [3]
Lead	mg/kg	22.5	53.8	10300	158	88.7	53.2	503	13.2	389	3.9	8	1.8	5.8	525	700
Mercury	mg/kg	0.038	ND	0.21	0.54	0.11	0.070	0.082	ND	0.32	ND	0.032	ND	0.052	1.6	1.5
Selenium	mg/kg	1.4	0.91	ND	ND	0.72	1.8	ND	0.90	1.7	1.1	2.3	ND	0.58	1.5	1,300
Silver	mg/kg	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	3.9	1,300
Date Collected		7/7/2009	7/9/2009	7/7/2009	7/10/2009	7/8/2009	7/9/2009	7/8/2009	7/8/2009	7/8/2009	7/8/2009	7/8/2009	7/13/2009	7/6/2009		

Notes:
[1] Diesel Range Organics with Silica Gel Cleanup Procedure
[2] Only detected compounds shown
[3] Chromium VI/Chromium III
GRO - Gasoline Range Organics
VOCs - Volatile Organic Compounds
SVOCs - Semi-Volatile Organic Compounds
mg/kg - milligrams per kilogram
ug/kg - micrograms per kilogram
RCRA - Resource Conservation and Recovery Act
ND - Not Detected
NE- Not Established
NT - Not Tested
* - See Carcinogenic BaP Equivalents
** - See BaP Equivalents

TABLE 3
SCHERER BROS LUMBER CO. PROJECT
SOIL SAMPLE ASBESTOS RESULTS SUMMARY

Sample ID (Sample Depth)	Parameter Asbestos	Date Collected
B-1 (1'-2')	ND	7/7/2009
B-2 (1'-2')	ND	7/9/2009
B-3 (6"-1')	ND	7/7/2009
B-4 (1'-2')	ND	7/10/2009
B-5 (1.5'-5')	ND	7/8/2009
B-6 (1'-2')	ND	7/9/2009
B-7 (1'-2')	ND	7/8/2009
B-8 (1'-2')	ND	7/8/2009
B-9 (1.5'-2')	ND	7/8/2009
B-10 (1'-2')	ND	7/8/2009
B-11 (12'-13')	ND	7/13/2009
B-12 (6"-1')	<1% crysotile	7/6/2009

Notes:
ND - Not Detected
< - Less Than

APPENDIX D

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July 10, 2009

Mr. Mark Miller
Liesch Associates, Inc.
13400 15th Avenue North
Plymouth, MN 55441

RE: Project: Ryan-Scherer
Pace Project No.: 1098841

Dear Mr. Miller:
Enclosed are the analytical results for sample(s) received by the laboratory on July 08, 2009. The results relate only to the samples included in this report. Results reported herein conform to the most current NELAC standards, where applicable, unless otherwise narrated in the body of the report.

If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Carol Davy

Carol Davy

carol.davy@pacelabs.com
Project Manager

Enclosures

REPORT OF LABORATORY ANALYSIS

Pace Analytical Services, Inc.
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CERTIFICATIONS

Project: Ryan-Scherer
Pace Project No.: 1098841

Minnesota Certification IDs
Wisconsin Certification #: 999407970
Washington Certification #: C754
Alaska Certification #: UST-078
Arizona Certification #: AZ-0014
Tennessee Certification #: 02818
Pennsylvania Certification #: 68-00563
Oregon Certification #: MN200001
North Dakota Certification #: R-036
North Carolina Certification #: 530
New York Certification #: 11647
New Jersey Certification #: MN-002
Montana Certification #: MT CERT0092
Minnesota Certification #: 027-053-137
Maine Certification #: 2007029
Louisiana Certification #: LA080009
Louisiana Certification #: 03086
Kansas Certification #: E-10167
Iowa Certification #: 368
Illinois Certification #: 200011
Florida/NELAP Certification #: E87605
California Certification #: 01155CA

Montana Certification IDs
Montana Certification #: MT CERT0040
Idaho Certification #: MT00012
EPA Region 8 Certification #: 8TMS-Q

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SAMPLE SUMMARY

Project: Ryan-Scherer
Pace Project No.: 1098841

Lab ID	Sample ID	Matrix	Date Collected	Date Received
1098841001	B-9 1.5'-2'	Solid	07/08/09 11:30	07/08/09 15:35
1098841002	B-9 3-5'	Solid	07/08/09 11:30	07/08/09 15:35
1098841003	B-8 1-2'	Solid	07/08/09 12:00	07/08/09 15:35
1098841004	B-8 3-5'	Solid	07/08/09 12:00	07/08/09 15:35
1098841005	B-5 1.5-2'	Solid	07/08/09 13:00	07/08/09 15:35
1098841006	B-5 4-6'	Solid	07/08/09 13:00	07/08/09 15:35
1098841007	B-7 1-2'	Solid	07/08/09 14:00	07/08/09 15:35
1098841008	B-7 1-3'	Solid	07/08/09 14:00	07/08/09 15:35
1098841009	B-10 1-2'	Solid	07/08/09 15:00	07/08/09 15:35
1098841010	B-10 4-6'	Solid	07/08/09 15:00	07/08/09 15:35

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SAMPLE ANALYTE COUNT

Project: Ryan-Scherer
Pace Project No.: 1098841

Lab ID	Sample ID	Method	Analysts	Analytes Reported
1098841002	B-9 3-5'	% Moisture	MWD	1
		EPA 6010	IP	7
		EPA 7471	TEM	1
		EPA 8260	DJT	71
		WI MOD DRO	JLR	2
		WI MOD GRO	AMS1	2
1098841004	B-8 3-5'	% Moisture	MWD	1
		EPA 6010	IP	7
		EPA 7471	TEM	1
		EPA 8260	DJT	71
		WI MOD DRO	JLR	2
		WI MOD GRO	AMS1	2
1098841006	B-5 4-6'	% Moisture	MWD	1
		EPA 6010	IP	7
		EPA 7471	TEM	1
		EPA 8260	DJT	71
		WI MOD DRO	JLR	2
		WI MOD GRO	AMS1	2
1098841008	B-7 1-3'	% Moisture	MWD	1
		EPA 6010	IP	7
		EPA 7471	TEM	1
		EPA 8260	DJT	71
		WI MOD DRO	JLR	2
		WI MOD GRO	AMS1	2
1098841010	B-10 4-6'	% Moisture	MWD	1
		EPA 6010	IP	7
		EPA 7471	TEM	1
		EPA 8260	DJT	71
		WI MOD DRO	JLR	2
		WI MOD GRO	AMS1	2

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-9 3-5' **Lab ID: 1098841002** Collected: 07/08/09 11:30 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
WIDRO GCS Silica Gel	Analytical Method: WI MOD DRO Preparation Method: WI MOD DRO								
Diesel Range Organics	**319**	mg/kg	59.6	29.8	5	07/08/09 11:28	07/09/09 13:53		T6
n-Triacontane (S)	52	%	50-150		5	07/08/09 11:28	07/09/09 13:53		
WIGRO GCV	Analytical Method: WI MOD GRO Preparation Method: TPH GRO/PVOC WI ext.								
Gasoline Range Organics	ND	mg/kg	6.2	3.1	1	07/09/09 12:44	07/10/09 10:59		
a,a,a-Trifluorotoluene (S)	97	%	80-125		1	07/09/09 12:44	07/10/09 10:59	98-08-8	
6010 MET ICP	Analytical Method: EPA 6010 Preparation Method: EPA 3050								
Arsenic	**8.9**	mg/kg	0.56	0.32	1	07/08/09 17:49	07/09/09 09:48	7440-38-2	
Barium	**170**	mg/kg	0.56	0.28	1	07/08/09 17:49	07/09/09 09:48	7440-39-3	M0
Cadmium	**1.4**	mg/kg	0.056	0.028	1	07/08/09 17:49	07/09/09 09:48	7440-43-9	
Chromium	**14.4**	mg/kg	0.56	0.28	1	07/08/09 17:49	07/09/09 09:48	7440-47-3	
Lead	**389**	mg/kg	0.34	0.17	1	07/08/09 17:49	07/09/09 09:48	7439-92-1	P6
Selenium	**1.7**	mg/kg	0.85	0.42	1	07/08/09 17:49	07/09/09 09:48	7782-49-2	
Silver	ND	mg/kg	0.56	0.28	1	07/08/09 17:49	07/09/09 09:48	7440-22-4	
7471 Mercury	Analytical Method: EPA 7471 Preparation Method: EPA 7471								
Mercury	**0.32**	mg/kg	0.024	0.012	1	07/08/09 17:58	07/09/09 08:31	7439-97-6	M0
Dry Weight	Analytical Method: % Moisture								
Percent Moisture	**19.4**	%	0.10	0.10	1		07/08/09 00:00		
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Acetone	ND	ug/kg	620	310	1	07/09/09 00:00	07/09/09 16:41	67-64-1	L1
Allyl chloride	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	107-05-1	
Benzene	ND	ug/kg	62.0	31.0	1	07/09/09 00:00	07/09/09 16:41	71-43-2	
Bromobenzene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	108-86-1	
Bromochloromethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	74-97-5	
Bromodichloromethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	75-27-4	
Bromoform	ND	ug/kg	1240	248	1	07/09/09 00:00	07/09/09 16:41	75-25-2	
Bromomethane	ND	ug/kg	620	310	1	07/09/09 00:00	07/09/09 16:41	74-83-9	
2-Butanone (MEK)	ND	ug/kg	620	310	1	07/09/09 00:00	07/09/09 16:41	78-93-3	L1
n-Butylbenzene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	104-51-8	
sec-Butylbenzene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	135-98-8	
tert-Butylbenzene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	98-06-6	
Carbon tetrachloride	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	56-23-5	
Chlorobenzene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	108-90-7	
Chloroethane	ND	ug/kg	620	124	1	07/09/09 00:00	07/09/09 16:41	75-00-3	
Chloroform	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	67-66-3	
Chloromethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	74-87-3	
2-Chlorotoluene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	95-49-8	
4-Chlorotoluene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	106-43-4	
1,2-Dibromo-3-chloropropane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	96-12-8	
Dibromochloromethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	124-48-1	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-9 3-5' **Lab ID: 1098841002** Collected: 07/08/09 11:30 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
1,2-Dibromoethane (EDB)	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	106-93-4	
Dibromomethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	74-95-3	
1,2-Dichlorobenzene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	95-50-1	
1,3-Dichlorobenzene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	541-73-1	
1,4-Dichlorobenzene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	106-46-7	
Dichlorodifluoromethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	75-71-8	
1,1-Dichloroethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	75-34-3	
1,2-Dichloroethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	107-06-2	
1,1-Dichloroethene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	75-35-4	
cis-1,2-Dichloroethene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	156-59-2	
trans-1,2-Dichloroethene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	156-60-5	
Dichlorofluoromethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	75-43-4	
1,2-Dichloropropane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	78-87-5	
1,3-Dichloropropane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	142-28-9	
2,2-Dichloropropane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	594-20-7	
1,1-Dichloropropene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	563-58-6	
cis-1,3-Dichloropropene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	10061-02-6	
Diethyl ether (Ethyl ether)	ND	ug/kg	620	310	1	07/09/09 00:00	07/09/09 16:41	60-29-7	
Ethylbenzene	ND	ug/kg	62.0	31.0	1	07/09/09 00:00	07/09/09 16:41	100-41-4	
Hexachloro-1,3-butadiene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	87-68-3	
Isopropylbenzene (Cumene)	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	98-82-8	
p-Isopropyltoluene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	99-87-6	
Methylene Chloride	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/kg	620	310	1	07/09/09 00:00	07/09/09 16:41	108-10-1	
Methyl-tert-butyl ether	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	1634-04-4	
Naphthalene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	91-20-3	
n-Propylbenzene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	103-65-1	
Styrene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	79-34-5	
Tetrachloroethene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	127-18-4	
Tetrahydrofuran	ND	ug/kg	2480	1240	1	07/09/09 00:00	07/09/09 16:41	109-99-9	L1
Toluene	ND	ug/kg	62.0	31.0	1	07/09/09 00:00	07/09/09 16:41	108-88-3	
1,2,3-Trichlorobenzene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	87-61-6	
1,2,4-Trichlorobenzene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	120-82-1	
1,1,1-Trichloroethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	71-55-6	
1,1,2-Trichloroethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	79-00-5	
Trichloroethene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	79-01-6	
Trichlorofluoromethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	75-69-4	
1,2,3-Trichloropropane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	96-18-4	
1,1,2-Trichlorotrifluoroethane	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	76-13-1	
1,2,4-Trimethylbenzene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	95-63-6	
1,3,5-Trimethylbenzene	ND	ug/kg	248	124	1	07/09/09 00:00	07/09/09 16:41	108-67-8	
Vinyl chloride	ND	ug/kg	62.0	31.0	1	07/09/09 00:00	07/09/09 16:41	75-01-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-9 3-5' **Lab ID: 1098841002** Collected: 07/08/09 11:30 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Xylene (Total)	ND	ug/kg	186	93.1	1	07/09/09 00:00	07/09/09 16:41	1330-20-7	
Dibromofluoromethane (S)	82	%	61-139		1	07/09/09 00:00	07/09/09 16:41	1868-53-7	
1,2-Dichloroethane-d4 (S)	79	%	68-136		1	07/09/09 00:00	07/09/09 16:41	17060-07-0	
Toluene-d8 (S)	94	%	68-133		1	07/09/09 00:00	07/09/09 16:41	2037-26-5	
4-Bromofluorobenzene (S)	93	%	68-126		1	07/09/09 00:00	07/09/09 16:41	460-00-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-8 3-5' **Lab ID: 1098841004** Collected: 07/08/09 12:00 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
WIDRO GCS Silica Gel	Analytical Method: WI MOD DRO Preparation Method: WI MOD DRO								
Diesel Range Organics	**25.8**	mg/kg	11.1	5.5	1	07/08/09 11:28	07/09/09 13:38		T6
n-Triacontane (S)	56	%	50-150		1	07/08/09 11:28	07/09/09 13:38		
WIGRO GCV	Analytical Method: WI MOD GRO Preparation Method: TPH GRO/PVOC WI ext.								
Gasoline Range Organics	ND	mg/kg	5.9	2.9	1	07/09/09 12:44	07/09/09 15:09		
a,a,a-Trifluorotoluene (S)	97	%	80-125		1	07/09/09 12:44	07/09/09 15:09	98-08-8	
6010 MET ICP	Analytical Method: EPA 6010 Preparation Method: EPA 3050								
Arsenic	**3.3**	mg/kg	0.50	0.28	1	07/08/09 17:49	07/09/09 10:14	7440-38-2	
Barium	**39.7**	mg/kg	0.50	0.25	1	07/08/09 17:49	07/09/09 10:14	7440-39-3	
Cadmium	**0.55**	mg/kg	0.050	0.025	1	07/08/09 17:49	07/09/09 10:14	7440-43-9	
Chromium	**9.9**	mg/kg	0.50	0.25	1	07/08/09 17:49	07/09/09 10:14	7440-47-3	
Lead	**13.2**	mg/kg	0.30	0.15	1	07/08/09 17:49	07/09/09 10:14	7439-92-1	
Selenium	**0.90**	mg/kg	0.75	0.38	1	07/08/09 17:49	07/09/09 10:14	7782-49-2	
Silver	ND	mg/kg	0.50	0.25	1	07/08/09 17:49	07/09/09 10:14	7440-22-4	
7471 Mercury	Analytical Method: EPA 7471 Preparation Method: EPA 7471								
Mercury	ND	mg/kg	0.020	0.010	1	07/08/09 17:58	07/09/09 08:38	7439-97-6	
Dry Weight	Analytical Method: % Moisture								
Percent Moisture	**13.4**	%	0.10	0.10	1		07/08/09 00:00		
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Acetone	ND	ug/kg	578	289	1	07/09/09 00:00	07/09/09 17:01	67-64-1	L1
Allyl chloride	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	107-05-1	
Benzene	ND	ug/kg	57.8	28.9	1	07/09/09 00:00	07/09/09 17:01	71-43-2	
Bromobenzene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	108-86-1	
Bromochloromethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	74-97-5	
Bromodichloromethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	75-27-4	
Bromoform	ND	ug/kg	1160	231	1	07/09/09 00:00	07/09/09 17:01	75-25-2	
Bromomethane	ND	ug/kg	578	289	1	07/09/09 00:00	07/09/09 17:01	74-83-9	
2-Butanone (MEK)	ND	ug/kg	578	289	1	07/09/09 00:00	07/09/09 17:01	78-93-3	L1
n-Butylbenzene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	104-51-8	
sec-Butylbenzene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	135-98-8	
tert-Butylbenzene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	98-06-6	
Carbon tetrachloride	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	56-23-5	
Chlorobenzene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	108-90-7	
Chloroethane	ND	ug/kg	578	116	1	07/09/09 00:00	07/09/09 17:01	75-00-3	
Chloroform	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	67-66-3	
Chloromethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	74-87-3	
2-Chlorotoluene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	95-49-8	
4-Chlorotoluene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	106-43-4	
1,2-Dibromo-3-chloropropane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	96-12-8	
Dibromochloromethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	124-48-1	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-8 3-5' **Lab ID: 1098841004** Collected: 07/08/09 12:00 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
1,2-Dibromoethane (EDB)	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	106-93-4	
Dibromomethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	74-95-3	
1,2-Dichlorobenzene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	95-50-1	
1,3-Dichlorobenzene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	541-73-1	
1,4-Dichlorobenzene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	106-46-7	
Dichlorodifluoromethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	75-71-8	
1,1-Dichloroethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	75-34-3	
1,2-Dichloroethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	107-06-2	
1,1-Dichloroethene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	75-35-4	
cis-1,2-Dichloroethene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	156-59-2	
trans-1,2-Dichloroethene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	156-60-5	
Dichlorofluoromethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	75-43-4	
1,2-Dichloropropane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	78-87-5	
1,3-Dichloropropane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	142-28-9	
2,2-Dichloropropane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	594-20-7	
1,1-Dichloropropene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	563-58-6	
cis-1,3-Dichloropropene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	10061-02-6	
Diethyl ether (Ethyl ether)	ND	ug/kg	578	289	1	07/09/09 00:00	07/09/09 17:01	60-29-7	
Ethylbenzene	ND	ug/kg	57.8	28.9	1	07/09/09 00:00	07/09/09 17:01	100-41-4	
Hexachloro-1,3-butadiene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	87-68-3	
Isopropylbenzene (Cumene)	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	98-82-8	
p-Isopropyltoluene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	99-87-6	
Methylene Chloride	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/kg	578	289	1	07/09/09 00:00	07/09/09 17:01	108-10-1	
Methyl-tert-butyl ether	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	1634-04-4	
Naphthalene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	91-20-3	
n-Propylbenzene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	103-65-1	
Styrene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	79-34-5	
Tetrachloroethene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	127-18-4	
Tetrahydrofuran	ND	ug/kg	2310	1160	1	07/09/09 00:00	07/09/09 17:01	109-99-9	L1
Toluene	ND	ug/kg	57.8	28.9	1	07/09/09 00:00	07/09/09 17:01	108-88-3	
1,2,3-Trichlorobenzene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	87-61-6	
1,2,4-Trichlorobenzene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	120-82-1	
1,1,1-Trichloroethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	71-55-6	
1,1,2-Trichloroethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	79-00-5	
Trichloroethene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	79-01-6	
Trichlorofluoromethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	75-69-4	
1,2,3-Trichloropropane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	96-18-4	
1,1,2-Trichlorotrifluoroethane	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	76-13-1	
1,2,4-Trimethylbenzene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	95-63-6	
1,3,5-Trimethylbenzene	ND	ug/kg	231	116	1	07/09/09 00:00	07/09/09 17:01	108-67-8	
Vinyl chloride	ND	ug/kg	57.8	28.9	1	07/09/09 00:00	07/09/09 17:01	75-01-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-8 3-5' **Lab ID: 1098841004** Collected: 07/08/09 12:00 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Xylene (Total)	ND	ug/kg	173	86.6	1	07/09/09 00:00	07/09/09 17:01	1330-20-7	
Dibromofluoromethane (S)	99	%	61-139		1	07/09/09 00:00	07/09/09 17:01	1868-53-7	
1,2-Dichloroethane-d4 (S)	94	%	68-136		1	07/09/09 00:00	07/09/09 17:01	17060-07-0	
Toluene-d8 (S)	111	%	68-133		1	07/09/09 00:00	07/09/09 17:01	2037-26-5	
4-Bromofluorobenzene (S)	107	%	68-126		1	07/09/09 00:00	07/09/09 17:01	460-00-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-5 4-6' **Lab ID: 1098841006** Collected: 07/08/09 13:00 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
WIDRO GCS Silica Gel	Analytical Method: WI MOD DRO Preparation Method: WI MOD DRO								
Diesel Range Organics	**396**	mg/kg	51.4	25.7	5	07/08/09 11:28	07/09/09 14:01		T6
n-Triacontane (S)	50	%	50-150		5	07/08/09 11:28	07/09/09 14:01		
WIGRO GCV	Analytical Method: WI MOD GRO Preparation Method: TPH GRO/PVOC WI ext.								
Gasoline Range Organics	ND	mg/kg	5.3	2.6	1	07/09/09 12:44	07/10/09 11:21		
a,a,a-Trifluorotoluene (S)	97	%	80-125		1	07/09/09 12:44	07/10/09 11:21	98-08-8	
6010 MET ICP	Analytical Method: EPA 6010 Preparation Method: EPA 3050								
Arsenic	**6.6**	mg/kg	0.44	0.25	1	07/08/09 17:49	07/09/09 10:20	7440-38-2	
Barium	**85.5**	mg/kg	0.44	0.22	1	07/08/09 17:49	07/09/09 10:20	7440-39-3	
Cadmium	**0.33**	mg/kg	0.044	0.022	1	07/08/09 17:49	07/09/09 10:20	7440-43-9	
Chromium	**20.1**	mg/kg	0.44	0.22	1	07/08/09 17:49	07/09/09 10:20	7440-47-3	
Lead	**88.7**	mg/kg	0.27	0.13	1	07/08/09 17:49	07/09/09 10:20	7439-92-1	
Selenium	**0.72**	mg/kg	0.67	0.33	1	07/08/09 17:49	07/09/09 10:20	7782-49-2	
Silver	ND	mg/kg	0.44	0.22	1	07/08/09 17:49	07/09/09 10:20	7440-22-4	
7471 Mercury	Analytical Method: EPA 7471 Preparation Method: EPA 7471								
Mercury	**0.11**	mg/kg	0.020	0.0099	1	07/08/09 17:58	07/09/09 08:39	7439-97-6	
Dry Weight	Analytical Method: % Moisture								
Percent Moisture	**7.8**	%	0.10	0.10	1		07/08/09 00:00		
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Acetone	ND	ug/kg	543	271	1	07/09/09 00:00	07/09/09 17:22	67-64-1	L1
Allyl chloride	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	107-05-1	
Benzene	ND	ug/kg	54.3	27.1	1	07/09/09 00:00	07/09/09 17:22	71-43-2	
Bromobenzene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	108-86-1	
Bromochloromethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	74-97-5	
Bromodichloromethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	75-27-4	
Bromoform	ND	ug/kg	1090	217	1	07/09/09 00:00	07/09/09 17:22	75-25-2	
Bromomethane	ND	ug/kg	543	271	1	07/09/09 00:00	07/09/09 17:22	74-83-9	
2-Butanone (MEK)	ND	ug/kg	543	271	1	07/09/09 00:00	07/09/09 17:22	78-93-3	L1
n-Butylbenzene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	104-51-8	
sec-Butylbenzene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	135-98-8	
tert-Butylbenzene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	98-06-6	
Carbon tetrachloride	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	56-23-5	
Chlorobenzene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	108-90-7	
Chloroethane	ND	ug/kg	543	109	1	07/09/09 00:00	07/09/09 17:22	75-00-3	
Chloroform	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	67-66-3	
Chloromethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	74-87-3	
2-Chlorotoluene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	95-49-8	
4-Chlorotoluene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	106-43-4	
1,2-Dibromo-3-chloropropane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	96-12-8	
Dibromochloromethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	124-48-1	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-5 4-6' **Lab ID: 1098841006** Collected: 07/08/09 13:00 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
1,2-Dibromoethane (EDB)	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	106-93-4	
Dibromomethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	74-95-3	
1,2-Dichlorobenzene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	95-50-1	
1,3-Dichlorobenzene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	541-73-1	
1,4-Dichlorobenzene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	106-46-7	
Dichlorodifluoromethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	75-71-8	
1,1-Dichloroethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	75-34-3	
1,2-Dichloroethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	107-06-2	
1,1-Dichloroethene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	75-35-4	
cis-1,2-Dichloroethene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	156-59-2	
trans-1,2-Dichloroethene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	156-60-5	
Dichlorofluoromethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	75-43-4	
1,2-Dichloropropane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	78-87-5	
1,3-Dichloropropane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	142-28-9	
2,2-Dichloropropane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	594-20-7	
1,1-Dichloropropene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	563-58-6	
cis-1,3-Dichloropropene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	10061-02-6	
Diethyl ether (Ethyl ether)	ND	ug/kg	543	271	1	07/09/09 00:00	07/09/09 17:22	60-29-7	
Ethylbenzene	ND	ug/kg	54.3	27.1	1	07/09/09 00:00	07/09/09 17:22	100-41-4	
Hexachloro-1,3-butadiene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	87-68-3	
Isopropylbenzene (Cumene)	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	98-82-8	
p-Isopropyltoluene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	99-87-6	
Methylene Chloride	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/kg	543	271	1	07/09/09 00:00	07/09/09 17:22	108-10-1	
Methyl-tert-butyl ether	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	1634-04-4	
Naphthalene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	91-20-3	
n-Propylbenzene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	103-65-1	
Styrene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	79-34-5	
Tetrachloroethene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	127-18-4	
Tetrahydrofuran	ND	ug/kg	2170	1090	1	07/09/09 00:00	07/09/09 17:22	109-99-9	L1
Toluene	ND	ug/kg	54.3	27.1	1	07/09/09 00:00	07/09/09 17:22	108-88-3	
1,2,3-Trichlorobenzene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	87-61-6	
1,2,4-Trichlorobenzene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	120-82-1	
1,1,1-Trichloroethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	71-55-6	
1,1,2-Trichloroethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	79-00-5	
Trichloroethene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	79-01-6	
Trichlorofluoromethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	75-69-4	
1,2,3-Trichloropropane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	96-18-4	
1,1,2-Trichlorotrifluoroethane	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	76-13-1	
1,2,4-Trimethylbenzene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	95-63-6	
1,3,5-Trimethylbenzene	ND	ug/kg	217	109	1	07/09/09 00:00	07/09/09 17:22	108-67-8	
Vinyl chloride	ND	ug/kg	54.3	27.1	1	07/09/09 00:00	07/09/09 17:22	75-01-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-5 4-6' **Lab ID: 1098841006** Collected: 07/08/09 13:00 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Xylene (Total)	ND	ug/kg	163	81.4	1	07/09/09 00:00	07/09/09 17:22	1330-20-7	
Dibromofluoromethane (S)	94	%	61-139		1	07/09/09 00:00	07/09/09 17:22	1868-53-7	
1,2-Dichloroethane-d4 (S)	90	%	68-136		1	07/09/09 00:00	07/09/09 17:22	17060-07-0	
Toluene-d8 (S)	103	%	68-133		1	07/09/09 00:00	07/09/09 17:22	2037-26-5	
4-Bromofluorobenzene (S)	101	%	68-126		1	07/09/09 00:00	07/09/09 17:22	460-00-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-7 1-3' **Lab ID: 1098841008** Collected: 07/08/09 14:00 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
WIDRO GCS Silica Gel	Analytical Method: WI MOD DRO Preparation Method: WI MOD DRO								
Diesel Range Organics	**49.4**	mg/kg	11.5	5.8	1	07/08/09 11:28	07/09/09 14:42		T6
n-Triacontane (S)	51	%	50-150		1	07/08/09 11:28	07/09/09 14:42		
WIGRO GCV	Analytical Method: WI MOD GRO Preparation Method: TPH GRO/PVOC WI ext.								
Gasoline Range Organics	ND	mg/kg	5.7	2.9	1	07/09/09 12:44	07/10/09 11:45		
a,a,a-Trifluorotoluene (S)	95	%	80-125		1	07/09/09 12:44	07/10/09 11:45	98-08-8	
6010 MET ICP	Analytical Method: EPA 6010 Preparation Method: EPA 3050								
Arsenic	**9.2**	mg/kg	0.44	0.25	1	07/08/09 17:49	07/09/09 10:26	7440-38-2	
Barium	**252**	mg/kg	0.44	0.22	1	07/08/09 17:49	07/09/09 10:26	7440-39-3	
Cadmium	**0.14**	mg/kg	0.044	0.022	1	07/08/09 17:49	07/09/09 10:26	7440-43-9	
Chromium	**11.9**	mg/kg	0.44	0.22	1	07/08/09 17:49	07/09/09 10:26	7440-47-3	
Lead	**503**	mg/kg	0.26	0.13	1	07/08/09 17:49	07/09/09 10:26	7439-92-1	
Selenium	ND	mg/kg	0.66	0.33	1	07/08/09 17:49	07/09/09 10:26	7782-49-2	
Silver	ND	mg/kg	0.44	0.22	1	07/08/09 17:49	07/09/09 10:26	7440-22-4	
7471 Mercury	Analytical Method: EPA 7471 Preparation Method: EPA 7471								
Mercury	**0.082**	mg/kg	0.021	0.010	1	07/08/09 17:58	07/09/09 08:41	7439-97-6	
Dry Weight	Analytical Method: % Moisture								
Percent Moisture	**15.6**	%	0.10	0.10	1		07/08/09 00:00		
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Acetone	ND	ug/kg	592	296	1	07/09/09 00:00	07/09/09 17:42	67-64-1	L1
Allyl chloride	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	107-05-1	
Benzene	ND	ug/kg	59.2	29.6	1	07/09/09 00:00	07/09/09 17:42	71-43-2	
Bromobenzene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	108-86-1	
Bromochloromethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	74-97-5	
Bromodichloromethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	75-27-4	
Bromoform	ND	ug/kg	1180	237	1	07/09/09 00:00	07/09/09 17:42	75-25-2	
Bromomethane	ND	ug/kg	592	296	1	07/09/09 00:00	07/09/09 17:42	74-83-9	
2-Butanone (MEK)	ND	ug/kg	592	296	1	07/09/09 00:00	07/09/09 17:42	78-93-3	L1
n-Butylbenzene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	104-51-8	
sec-Butylbenzene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	135-98-8	
tert-Butylbenzene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	98-06-6	
Carbon tetrachloride	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	56-23-5	
Chlorobenzene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	108-90-7	
Chloroethane	ND	ug/kg	592	118	1	07/09/09 00:00	07/09/09 17:42	75-00-3	
Chloroform	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	67-66-3	
Chloromethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	74-87-3	
2-Chlorotoluene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	95-49-8	
4-Chlorotoluene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	106-43-4	
1,2-Dibromo-3-chloropropane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	96-12-8	
Dibromochloromethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	124-48-1	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-7 1-3' **Lab ID: 1098841008** Collected: 07/08/09 14:00 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
1,2-Dibromoethane (EDB)	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	106-93-4	
Dibromomethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	74-95-3	
1,2-Dichlorobenzene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	95-50-1	
1,3-Dichlorobenzene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	541-73-1	
1,4-Dichlorobenzene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	106-46-7	
Dichlorodifluoromethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	75-71-8	
1,1-Dichloroethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	75-34-3	
1,2-Dichloroethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	107-06-2	
1,1-Dichloroethene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	75-35-4	
cis-1,2-Dichloroethene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	156-59-2	
trans-1,2-Dichloroethene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	156-60-5	
Dichlorofluoromethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	75-43-4	
1,2-Dichloropropane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	78-87-5	
1,3-Dichloropropane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	142-28-9	
2,2-Dichloropropane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	594-20-7	
1,1-Dichloropropene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	563-58-6	
cis-1,3-Dichloropropene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	10061-02-6	
Diethyl ether (Ethyl ether)	ND	ug/kg	592	296	1	07/09/09 00:00	07/09/09 17:42	60-29-7	
Ethylbenzene	ND	ug/kg	59.2	29.6	1	07/09/09 00:00	07/09/09 17:42	100-41-4	
Hexachloro-1,3-butadiene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	87-68-3	
Isopropylbenzene (Cumene)	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	98-82-8	
p-Isopropyltoluene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	99-87-6	
Methylene Chloride	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/kg	592	296	1	07/09/09 00:00	07/09/09 17:42	108-10-1	
Methyl-tert-butyl ether	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	1634-04-4	
Naphthalene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	91-20-3	
n-Propylbenzene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	103-65-1	
Styrene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	79-34-5	
Tetrachloroethene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	127-18-4	
Tetrahydrofuran	ND	ug/kg	2370	1180	1	07/09/09 00:00	07/09/09 17:42	109-99-9	L1
Toluene	ND	ug/kg	59.2	29.6	1	07/09/09 00:00	07/09/09 17:42	108-88-3	
1,2,3-Trichlorobenzene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	87-61-6	
1,2,4-Trichlorobenzene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	120-82-1	
1,1,1-Trichloroethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	71-55-6	
1,1,2-Trichloroethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	79-00-5	
Trichloroethene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	79-01-6	
Trichlorofluoromethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	75-69-4	
1,2,3-Trichloropropane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	96-18-4	
1,1,2-Trichlorotrifluoroethane	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	76-13-1	
1,2,4-Trimethylbenzene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	95-63-6	
1,3,5-Trimethylbenzene	ND	ug/kg	237	118	1	07/09/09 00:00	07/09/09 17:42	108-67-8	
Vinyl chloride	ND	ug/kg	59.2	29.6	1	07/09/09 00:00	07/09/09 17:42	75-01-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-7 1-3' **Lab ID: 1098841008** Collected: 07/08/09 14:00 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Xylene (Total)	ND	ug/kg	178	88.9	1	07/09/09 00:00	07/09/09 17:42	1330-20-7	
Dibromofluoromethane (S)	88	%	61-139		1	07/09/09 00:00	07/09/09 17:42	1868-53-7	
1,2-Dichloroethane-d4 (S)	84	%	68-136		1	07/09/09 00:00	07/09/09 17:42	17060-07-0	
Toluene-d8 (S)	98	%	68-133		1	07/09/09 00:00	07/09/09 17:42	2037-26-5	
4-Bromofluorobenzene (S)	96	%	68-126		1	07/09/09 00:00	07/09/09 17:42	460-00-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-10 4-6' **Lab ID: 1098841010** Collected: 07/08/09 15:00 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
WIDRO GCS Silica Gel	Analytical Method: WI MOD DRO Preparation Method: WI MOD DRO								
Diesel Range Organics	ND	mg/kg	10.4	5.2	1	07/08/09 11:28	07/09/09 13:45		
n-Triacontane (S)	64	%	50-150		1	07/08/09 11:28	07/09/09 13:45		
WIGRO GCV	Analytical Method: WI MOD GRO Preparation Method: TPH GRO/PVOC WI ext.								
Gasoline Range Organics	ND	mg/kg	5.4	2.7	1	07/09/09 12:44	07/09/09 15:31		
a,a,a-Trifluorotoluene (S)	96	%	80-125		1	07/09/09 12:44	07/09/09 15:31	98-08-8	
6010 MET ICP	Analytical Method: EPA 6010 Preparation Method: EPA 3050								
Arsenic	**4.2**	mg/kg	0.47	0.26	1	07/08/09 17:49	07/09/09 10:32	7440-38-2	
Barium	**49.9**	mg/kg	0.47	0.24	1	07/08/09 17:49	07/09/09 10:32	7440-39-3	
Cadmium	**0.66**	mg/kg	0.047	0.024	1	07/08/09 17:49	07/09/09 10:32	7440-43-9	
Chromium	**9.1**	mg/kg	0.47	0.24	1	07/08/09 17:49	07/09/09 10:32	7440-47-3	
Lead	**3.9**	mg/kg	0.28	0.14	1	07/08/09 17:49	07/09/09 10:32	7439-92-1	
Selenium	**1.1**	mg/kg	0.71	0.35	1	07/08/09 17:49	07/09/09 10:32	7782-49-2	
Silver	ND	mg/kg	0.47	0.24	1	07/08/09 17:49	07/09/09 10:32	7440-22-4	
7471 Mercury	Analytical Method: EPA 7471 Preparation Method: EPA 7471								
Mercury	ND	mg/kg	0.018	0.0091	1	07/08/09 17:58	07/09/09 08:42	7439-97-6	
Dry Weight	Analytical Method: % Moisture								
Percent Moisture	**6.1**	%	0.10	0.10	1		07/08/09 00:00		
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Acetone	ND	ug/kg	533	266	1	07/09/09 00:00	07/09/09 18:02	67-64-1	L1
Allyl chloride	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	107-05-1	
Benzene	ND	ug/kg	53.3	26.6	1	07/09/09 00:00	07/09/09 18:02	71-43-2	
Bromobenzene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	108-86-1	
Bromochloromethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	74-97-5	
Bromodichloromethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	75-27-4	
Bromoform	ND	ug/kg	1070	213	1	07/09/09 00:00	07/09/09 18:02	75-25-2	
Bromomethane	ND	ug/kg	533	266	1	07/09/09 00:00	07/09/09 18:02	74-83-9	
2-Butanone (MEK)	ND	ug/kg	533	266	1	07/09/09 00:00	07/09/09 18:02	78-93-3	L1
n-Butylbenzene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	104-51-8	
sec-Butylbenzene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	135-98-8	
tert-Butylbenzene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	98-06-6	
Carbon tetrachloride	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	56-23-5	
Chlorobenzene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	108-90-7	
Chloroethane	ND	ug/kg	533	107	1	07/09/09 00:00	07/09/09 18:02	75-00-3	
Chloroform	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	67-66-3	
Chloromethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	74-87-3	
2-Chlorotoluene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	95-49-8	
4-Chlorotoluene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	106-43-4	
1,2-Dibromo-3-chloropropane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	96-12-8	
Dibromochloromethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	124-48-1	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-10 4-6' **Lab ID: 1098841010** Collected: 07/08/09 15:00 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
1,2-Dibromoethane (EDB)	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	106-93-4	
Dibromomethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	74-95-3	
1,2-Dichlorobenzene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	95-50-1	
1,3-Dichlorobenzene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	541-73-1	
1,4-Dichlorobenzene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	106-46-7	
Dichlorodifluoromethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	75-71-8	
1,1-Dichloroethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	75-34-3	
1,2-Dichloroethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	107-06-2	
1,1-Dichloroethene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	75-35-4	
cis-1,2-Dichloroethene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	156-59-2	
trans-1,2-Dichloroethene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	156-60-5	
Dichlorofluoromethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	75-43-4	
1,2-Dichloropropane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	78-87-5	
1,3-Dichloropropane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	142-28-9	
2,2-Dichloropropane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	594-20-7	
1,1-Dichloropropene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	563-58-6	
cis-1,3-Dichloropropene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	10061-02-6	
Diethyl ether (Ethyl ether)	ND	ug/kg	533	266	1	07/09/09 00:00	07/09/09 18:02	60-29-7	
Ethylbenzene	ND	ug/kg	53.3	26.6	1	07/09/09 00:00	07/09/09 18:02	100-41-4	
Hexachloro-1,3-butadiene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	87-68-3	
Isopropylbenzene (Cumene)	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	98-82-8	
p-Isopropyltoluene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	99-87-6	
Methylene Chloride	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/kg	533	266	1	07/09/09 00:00	07/09/09 18:02	108-10-1	
Methyl-tert-butyl ether	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	1634-04-4	
Naphthalene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	91-20-3	
n-Propylbenzene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	103-65-1	
Styrene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	79-34-5	
Tetrachloroethene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	127-18-4	
Tetrahydrofuran	ND	ug/kg	2130	1070	1	07/09/09 00:00	07/09/09 18:02	109-99-9	L1
Toluene	ND	ug/kg	53.3	26.6	1	07/09/09 00:00	07/09/09 18:02	108-88-3	
1,2,3-Trichlorobenzene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	87-61-6	
1,2,4-Trichlorobenzene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	120-82-1	
1,1,1-Trichloroethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	71-55-6	
1,1,2-Trichloroethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	79-00-5	
Trichloroethene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	79-01-6	
Trichlorofluoromethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	75-69-4	
1,2,3-Trichloropropane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	96-18-4	
1,1,2-Trichlorotrifluoroethane	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	76-13-1	
1,2,4-Trimethylbenzene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	95-63-6	
1,3,5-Trimethylbenzene	ND	ug/kg	213	107	1	07/09/09 00:00	07/09/09 18:02	108-67-8	
Vinyl chloride	ND	ug/kg	53.3	26.6	1	07/09/09 00:00	07/09/09 18:02	75-01-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098841

Sample: B-10 4-6' **Lab ID: 1098841010** Collected: 07/08/09 15:00 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Xylene (Total)	ND	ug/kg	160	79.9	1	07/09/09 00:00	07/09/09 18:02	1330-20-7	
Dibromofluoromethane (S)	84	%	61-139		1	07/09/09 00:00	07/09/09 18:02	1868-53-7	
1,2-Dichloroethane-d4 (S)	79	%	68-136		1	07/09/09 00:00	07/09/09 18:02	17060-07-0	
Toluene-d8 (S)	95	%	68-133		1	07/09/09 00:00	07/09/09 18:02	2037-26-5	
4-Bromofluorobenzene (S)	95	%	68-126		1	07/09/09 00:00	07/09/09 18:02	460-00-4	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098841

QC Batch: MPRP/16350 Analysis Method: % Moisture
QC Batch Method: % Moisture Analysis Description: Dry Weight/Percent Moisture
Associated Lab Samples: 1098841002, 1098841004, 1098841006, 1098841008, 1098841010

SAMPLE DUPLICATE: 646913

Parameter	Units	1098772001 Result	Dup Result	RPD	Max RPD	Qualifiers
Percent Moisture	%	12.9	14.6	12	30	

SAMPLE DUPLICATE: 647361

Parameter	Units	1098838005 Result	Dup Result	RPD	Max RPD	Qualifiers
Percent Moisture	%	10.4	9.1	14	30	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098841

QC Batch: MPRP/16356 Analysis Method: EPA 6010
QC Batch Method: EPA 3050 Analysis Description: 6010 MET
Associated Lab Samples: 1098841002, 1098841004, 1098841006, 1098841008, 1098841010

METHOD BLANK: 647319 Matrix: Solid
Associated Lab Samples: 1098841002, 1098841004, 1098841006, 1098841008, 1098841010

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Arsenic	mg/kg	ND	0.44	07/09/09 09:40	
Barium	mg/kg	ND	0.44	07/09/09 09:40	
Cadmium	mg/kg	ND	0.044	07/09/09 09:40	
Chromium	mg/kg	ND	0.44	07/09/09 09:40	
Lead	mg/kg	ND	0.27	07/09/09 09:40	
Selenium	mg/kg	ND	0.66	07/09/09 09:40	
Silver	mg/kg	ND	0.44	07/09/09 09:40	

LABORATORY CONTROL SAMPLE: 647320

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Arsenic	mg/kg	47.2	41.6	88	80-120	
Barium	mg/kg	47.2	44.4	94	80-120	
Cadmium	mg/kg	47.2	42.0	89	80-120	
Chromium	mg/kg	47.2	43.8	93	80-120	
Lead	mg/kg	47.2	43.4	92	80-120	
Selenium	mg/kg	47.2	41.8	89	80-120	
Silver	mg/kg	23.6	21.6	91	80-120	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 647321 647322

Parameter	Units	1098841002 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Arsenic	mg/kg	8.9	52.6	54.5	58.5	61.5	94	97	75-125	5	30	
Barium	mg/kg	170	52.6	54.5	185	195	28	45	75-125	5	30	M0
Cadmium	mg/kg	1.4	52.6	54.5	48.2	50.6	89	90	75-125	5	30	
Chromium	mg/kg	14.4	52.6	54.5	62.2	67.0	91	97	75-125	7	30	
Lead	mg/kg	389	52.6	54.5	367	432	-43	78	75-125	16	30	P6
Selenium	mg/kg	1.7	52.6	54.5	48.5	51.6	89	92	75-125	6	30	
Silver	mg/kg	ND	26.3	27.2	24.2	26.4	92	97	75-125	9	30	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098841

QC Batch: MSV/12632 Analysis Method: EPA 8260
QC Batch Method: EPA 5035/5030B Analysis Description: 8260 MSV 5030 Med Level
Associated Lab Samples: 1098841002, 1098841004, 1098841006, 1098841008, 1098841010

METHOD BLANK: 647629 Matrix: Solid
Associated Lab Samples: 1098841002, 1098841004, 1098841006, 1098841008, 1098841010

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
1,1,1,2-Tetrachloroethane	ug/kg	ND	200	07/09/09 16:00	
1,1,1-Trichloroethane	ug/kg	ND	200	07/09/09 16:00	
1,1,2,2-Tetrachloroethane	ug/kg	ND	200	07/09/09 16:00	
1,1,2-Trichloroethane	ug/kg	ND	200	07/09/09 16:00	
1,1,2-Trichlorotrifluoroethane	ug/kg	ND	200	07/09/09 16:00	
1,1-Dichloroethane	ug/kg	ND	200	07/09/09 16:00	
1,1-Dichloroethene	ug/kg	ND	200	07/09/09 16:00	
1,1-Dichloropropene	ug/kg	ND	200	07/09/09 16:00	
1,2,3-Trichlorobenzene	ug/kg	ND	200	07/09/09 16:00	
1,2,3-Trichloropropane	ug/kg	ND	200	07/09/09 16:00	
1,2,4-Trichlorobenzene	ug/kg	ND	200	07/09/09 16:00	
1,2,4-Trimethylbenzene	ug/kg	ND	200	07/09/09 16:00	
1,2-Dibromo-3-chloropropane	ug/kg	ND	200	07/09/09 16:00	
1,2-Dibromoethane (EDB)	ug/kg	ND	200	07/09/09 16:00	
1,2-Dichlorobenzene	ug/kg	ND	200	07/09/09 16:00	
1,2-Dichloroethane	ug/kg	ND	200	07/09/09 16:00	
1,2-Dichloropropane	ug/kg	ND	200	07/09/09 16:00	
1,3,5-Trimethylbenzene	ug/kg	ND	200	07/09/09 16:00	
1,3-Dichlorobenzene	ug/kg	ND	200	07/09/09 16:00	
1,3-Dichloropropane	ug/kg	ND	200	07/09/09 16:00	
1,4-Dichlorobenzene	ug/kg	ND	200	07/09/09 16:00	
2,2-Dichloropropane	ug/kg	ND	200	07/09/09 16:00	
2-Butanone (MEK)	ug/kg	ND	500	07/09/09 16:00	
2-Chlorotoluene	ug/kg	ND	200	07/09/09 16:00	
4-Chlorotoluene	ug/kg	ND	200	07/09/09 16:00	
4-Methyl-2-pentanone (MIBK)	ug/kg	ND	500	07/09/09 16:00	
Acetone	ug/kg	ND	500	07/09/09 16:00	
Allyl chloride	ug/kg	ND	200	07/09/09 16:00	
Benzene	ug/kg	ND	50.0	07/09/09 16:00	
Bromobenzene	ug/kg	ND	200	07/09/09 16:00	
Bromochloromethane	ug/kg	ND	200	07/09/09 16:00	
Bromodichloromethane	ug/kg	ND	200	07/09/09 16:00	
Bromoform	ug/kg	ND	1000	07/09/09 16:00	
Bromomethane	ug/kg	ND	500	07/09/09 16:00	
Carbon tetrachloride	ug/kg	ND	200	07/09/09 16:00	
Chlorobenzene	ug/kg	ND	200	07/09/09 16:00	
Chloroethane	ug/kg	ND	500	07/09/09 16:00	
Chloroform	ug/kg	ND	200	07/09/09 16:00	
Chloromethane	ug/kg	ND	200	07/09/09 16:00	
cis-1,2-Dichloroethene	ug/kg	ND	200	07/09/09 16:00	
cis-1,3-Dichloropropene	ug/kg	ND	200	07/09/09 16:00	
Dibromochloromethane	ug/kg	ND	200	07/09/09 16:00	
Dibromomethane	ug/kg	ND	200	07/09/09 16:00	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098841

METHOD BLANK: 647629 Matrix: Solid

Associated Lab Samples: 1098841002, 1098841004, 1098841006, 1098841008, 1098841010

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Dichlorodifluoromethane	ug/kg	ND	200	07/09/09 16:00	
Dichlorofluoromethane	ug/kg	ND	200	07/09/09 16:00	
Diethyl ether (Ethyl ether)	ug/kg	ND	500	07/09/09 16:00	
Ethylbenzene	ug/kg	ND	50.0	07/09/09 16:00	
Hexachloro-1,3-butadiene	ug/kg	ND	200	07/09/09 16:00	
Isopropylbenzene (Cumene)	ug/kg	ND	200	07/09/09 16:00	
Methyl-tert-butyl ether	ug/kg	ND	200	07/09/09 16:00	
Methylene Chloride	ug/kg	ND	200	07/09/09 16:00	
n-Butylbenzene	ug/kg	ND	200	07/09/09 16:00	
n-Propylbenzene	ug/kg	ND	200	07/09/09 16:00	
Naphthalene	ug/kg	ND	200	07/09/09 16:00	
p-Isopropyltoluene	ug/kg	ND	200	07/09/09 16:00	
sec-Butylbenzene	ug/kg	ND	200	07/09/09 16:00	
Styrene	ug/kg	ND	200	07/09/09 16:00	
tert-Butylbenzene	ug/kg	ND	200	07/09/09 16:00	
Tetrachloroethene	ug/kg	ND	200	07/09/09 16:00	
Tetrahydrofuran	ug/kg	ND	2000	07/09/09 16:00	
Toluene	ug/kg	ND	50.0	07/09/09 16:00	
trans-1,2-Dichloroethene	ug/kg	ND	200	07/09/09 16:00	
trans-1,3-Dichloropropene	ug/kg	ND	200	07/09/09 16:00	
Trichloroethene	ug/kg	ND	200	07/09/09 16:00	
Trichlorofluoromethane	ug/kg	ND	200	07/09/09 16:00	
Vinyl chloride	ug/kg	ND	50.0	07/09/09 16:00	
Xylene (Total)	ug/kg	ND	150	07/09/09 16:00	
1,2-Dichloroethane-d4 (S)	%	102	68-136	07/09/09 16:00	
4-Bromofluorobenzene (S)	%	118	68-126	07/09/09 16:00	
Dibromofluoromethane (S)	%	107	61-139	07/09/09 16:00	
Toluene-d8 (S)	%	120	68-133	07/09/09 16:00	

LABORATORY CONTROL SAMPLE & LCSD: 647630 647631

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
1,1,1,2-Tetrachloroethane	ug/kg	1000	1180	1190	118	119	75-125	1	20	
1,1,1-Trichloroethane	ug/kg	1000	1090	1150	109	115	75-130	5	20	
1,1,2,2-Tetrachloroethane	ug/kg	1000	1200	1220	120	122	70-139	2	20	
1,1,2-Trichloroethane	ug/kg	1000	1140	1130	114	113	75-125	1	20	
1,1,2-Trichlorotrifluoroethane	ug/kg	1000	1350	1410	135	141	58-142	5	20	
1,1-Dichloroethane	ug/kg	1000	1090	1120	109	112	75-126	3	20	
1,1-Dichloroethene	ug/kg	1000	1140	1200	114	120	71-127	5	20	
1,1-Dichloropropene	ug/kg	1000	1120	1180	112	118	75-125	5	20	
1,2,3-Trichlorobenzene	ug/kg	1000	1100	1220	110	122	75-133	10	20	
1,2,3-Trichloropropane	ug/kg	1000	1200	1250	120	125	75-126	3	20	
1,2,4-Trichlorobenzene	ug/kg	1000	1100	1210	110	121	75-134	10	20	
1,2,4-Trimethylbenzene	ug/kg	1000	1150	1230	115	123	75-136	7	20	
1,2-Dibromo-3-chloropropane	ug/kg	1000	1350	1260	135	126	69-136	7	20	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098841

LABORATORY CONTROL SAMPLE & LCSD: 647630 647631

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
1,2-Dibromoethane (EDB)	ug/kg	1000	1180	1190	118	119	75-125	1	20	
1,2-Dichlorobenzene	ug/kg	1000	1160	1220	116	122	75-125	5	20	
1,2-Dichloroethane	ug/kg	1000	1060	1060	106	106	75-135	0	20	
1,2-Dichloropropane	ug/kg	1000	1100	1160	110	116	75-125	6	20	
1,3,5-Trimethylbenzene	ug/kg	1000	1120	1190	112	119	75-136	6	20	
1,3-Dichlorobenzene	ug/kg	1000	1140	1220	114	122	75-125	7	20	
1,3-Dichloropropane	ug/kg	1000	1170	1180	117	118	75-125	1	20	
1,4-Dichlorobenzene	ug/kg	1000	1130	1210	113	121	75-125	7	20	
2,2-Dichloropropane	ug/kg	1000	1100	1120	110	112	30-150	2	20	
2-Butanone (MEK)	ug/kg	1000	1660	1290	166	129	49-149	25	20	L0,R1
2-Chlorotoluene	ug/kg	1000	1120	1180	112	118	75-125	5	20	
4-Chlorotoluene	ug/kg	1000	1130	1200	113	120	75-126	6	20	
4-Methyl-2-pentanone (MIBK)	ug/kg	1000	1210	1210	121	121	73-134	0	20	
Acetone	ug/kg	2500	4090	3360	164	134	57-150	20	20	L0
Allyl chloride	ug/kg	1000	1010	1070	101	107	69-139	5	20	
Benzene	ug/kg	1000	1080	1140	108	114	75-130	5	20	
Bromobenzene	ug/kg	1000	1190	1220	119	122	75-125	3	20	
Bromochloromethane	ug/kg	1000	1110	1150	111	115	75-125	4	20	
Bromodichloromethane	ug/kg	1000	1100	1120	110	112	75-130	1	20	
Bromoform	ug/kg	2000	2410	2370	120	119	75-128	1	20	
Bromomethane	ug/kg	1000	955	995	96	99	47-150	4	20	
Carbon tetrachloride	ug/kg	1000	1140	1170	114	117	67-138	3	20	
Chlorobenzene	ug/kg	1000	1130	1180	113	118	75-125	4	20	
Chloroethane	ug/kg	1000	829	921	83	92	54-150	11	20	
Chloroform	ug/kg	1000	1050	1080	105	108	75-131	3	20	
Chloromethane	ug/kg	1000	885	906	89	91	65-126	2	20	
cis-1,2-Dichloroethene	ug/kg	1000	1100	1130	110	113	75-125	3	20	
cis-1,3-Dichloropropene	ug/kg	1000	1130	1180	113	118	75-125	5	20	
Dibromochloromethane	ug/kg	1000	1200	1170	120	117	75-125	3	20	
Dibromomethane	ug/kg	1000	1110	1110	111	111	75-125	0	20	
Dichlorodifluoromethane	ug/kg	1000	887	921	89	92	37-125	4	20	
Dichlorofluoromethane	ug/kg	1000	1040	1080	104	108	30-150	3	20	
Diethyl ether (Ethyl ether)	ug/kg	1000	1170	1130	117	113	67-135	4	20	
Ethylbenzene	ug/kg	1000	1130	1170	113	117	75-125	4	20	
Hexachloro-1,3-butadiene	ug/kg	1000	1200	1250	120	125	75-150	4	20	
Isopropylbenzene (Cumene)	ug/kg	1000	1120	1180	112	118	75-125	6	20	
Methyl-tert-butyl ether	ug/kg	1000	1130	1120	113	112	75-133	2	20	
Methylene Chloride	ug/kg	1000	1140	1170	114	117	75-130	3	20	
n-Butylbenzene	ug/kg	1000	1080	1220	108	122	75-138	12	20	
n-Propylbenzene	ug/kg	1000	1140	1220	114	122	75-129	7	20	
Naphthalene	ug/kg	1000	1060	1220	106	122	73-128	14	20	
p-Isopropyltoluene	ug/kg	1000	1120	1210	112	121	75-134	8	20	
sec-Butylbenzene	ug/kg	1000	1140	1220	114	122	75-133	7	20	
Styrene	ug/kg	1000	1120	1160	112	116	75-125	4	20	
tert-Butylbenzene	ug/kg	1000	1120	1200	112	120	75-130	7	20	
Tetrachloroethene	ug/kg	1000	1140	1200	114	120	75-125	6	20	
Tetrahydrofuran	ug/kg	10000	13400	12100	134	121	75-133	10	20	L0
Toluene	ug/kg	1000	1120	1180	112	118	75-125	5	20	

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Minneapolis, MN 55414
(612)607-1700

QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098841

LABORATORY CONTROL SAMPLE & LCSD: 647630 647631

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
trans-1,2-Dichloroethene	ug/kg	1000	1090	1130	109	113	75-125	4	20	
trans-1,3-Dichloropropene	ug/kg	1000	1180	1200	118	120	65-129	1	20	
Trichloroethene	ug/kg	1000	1060	1140	106	114	75-132	8	20	
Trichlorofluoromethane	ug/kg	1000	1090	1150	109	115	30-150	6	20	
Vinyl chloride	ug/kg	1000	940	971	94	97	75-125	3	20	
Xylene (Total)	ug/kg	3000	3430	3540	114	118	75-125	3	20	
1,2-Dichloroethane-d4 (S)	%				98	103	68-136			
4-Bromofluorobenzene (S)	%				107	115	68-126			
Dibromofluoromethane (S)	%				102	109	61-139			
Toluene-d8 (S)	%				108	115	68-133			

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 647632 647633

Parameter	Units	1098841002 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
1,1,1,2-Tetrachloroethane	ug/kg	ND	1240	1240	1090	1220	88	99	74-133	12	30	
1,1,1-Trichloroethane	ug/kg	ND	1240	1240	1080	1210	87	98	73-150	12	30	
1,1,2,2-Tetrachloroethane	ug/kg	ND	1240	1240	1130	1190	91	96	65-145	5	30	
1,1,2-Trichloroethane	ug/kg	ND	1240	1240	1060	1150	85	92	71-145	8	30	
1,1,2-Trichlorotrifluoroethane	ug/kg	ND	1240	1240	1360	1500	109	121	30-150	10	30	
1,1-Dichloroethane	ug/kg	ND	1240	1240	1050	1130	84	91	71-150	8	30	
1,1-Dichloroethene	ug/kg	ND	1240	1240	1130	1270	91	102	75-150	11	30	
1,1-Dichloropropene	ug/kg	ND	1240	1240	1160	1270	94	102	30-150	9	30	
1,2,3-Trichlorobenzene	ug/kg	ND	1240	1240	1090	1190	88	96	30-150	8	30	
1,2,3-Trichloropropane	ug/kg	ND	1240	1240	1130	1240	91	100	30-150	9	30	
1,2,4-Trichlorobenzene	ug/kg	ND	1240	1240	1100	1220	89	99	75-145	10	30	
1,2,4-Trimethylbenzene	ug/kg	ND	1240	1240	1120	1250	90	101	71-150	11	30	
1,2-Dibromo-3-chloropropane	ug/kg	ND	1240	1240	1180	1160	95	94	65-136	2	30	
1,2-Dibromoethane (EDB)	ug/kg	ND	1240	1240	1090	1200	88	96	75-145	10	30	
1,2-Dichlorobenzene	ug/kg	ND	1240	1240	1100	1200	89	97	75-140	9	30	
1,2-Dichloroethane	ug/kg	ND	1240	1240	996	1080	80	87	73-146	8	30	
1,2-Dichloropropane	ug/kg	ND	1240	1240	1060	1180	86	95	75-147	11	30	
1,3,5-Trimethylbenzene	ug/kg	ND	1240	1240	1100	1240	89	100	70-150	12	30	
1,3-Dichlorobenzene	ug/kg	ND	1240	1240	1100	1220	89	99	75-141	10	30	
1,3-Dichloropropane	ug/kg	ND	1240	1240	1090	1180	88	95	30-150	8	30	
1,4-Dichlorobenzene	ug/kg	ND	1240	1240	1100	1220	89	98	75-139	10	30	
2,2-Dichloropropane	ug/kg	ND	1240	1240	1070	1140	87	92	30-150	6	30	
2-Butanone (MEK)	ug/kg	ND	1240	1240	1380	1380	111	111	41-150	0	30	
2-Chlorotoluene	ug/kg	ND	1240	1240	1090	1200	88	96	30-150	10	30	
4-Chlorotoluene	ug/kg	ND	1240	1240	1080	1200	87	96	30-150	10	30	
4-Methyl-2-pentanone (MIBK)	ug/kg	ND	1240	1240	1150	1210	93	98	60-150	5	30	
Acetone	ug/kg	ND	3100	3100	4160	4220	134	136	51-150	1	30	
Allyl chloride	ug/kg	ND	1240	1240	926	998	75	80	30-150	7	30	
Benzene	ug/kg	ND	1240	1240	1070	1170	86	94	73-150	9	30	
Bromobenzene	ug/kg	ND	1240	1240	1120	1230	90	99	30-150	10	30	
Bromochloromethane	ug/kg	ND	1240	1240	1060	1140	85	92	30-150	7	30	
Bromodichloromethane	ug/kg	ND	1240	1240	1030	1130	83	91	71-138	9	30	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098841

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 647632 647633

Parameter	Units	1098841002 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Bromoform	ug/kg	ND	2480	2480	2280	2390	92	96	64-128	4	30	
Bromomethane	ug/kg	ND	1240	1240	872	1030	70	83	30-150	17	30	
Carbon tetrachloride	ug/kg	ND	1240	1240	1130	1250	91	101	67-150	10	30	
Chlorobenzene	ug/kg	ND	1240	1240	1100	1220	88	98	74-142	11	30	
Chloroethane	ug/kg	ND	1240	1240	854	899	69	72	30-150	5	30	
Chloroform	ug/kg	ND	1240	1240	1010	1090	81	88	74-150	8	30	
Chloromethane	ug/kg	ND	1240	1240	851	954	69	77	50-150	11	30	
cis-1,2-Dichloroethene	ug/kg	ND	1240	1240	1070	1150	86	92	75-147	7	30	
cis-1,3-Dichloropropene	ug/kg	ND	1240	1240	1070	1200	86	97	68-133	12	30	
Dibromochloromethane	ug/kg	ND	1240	1240	1070	1180	86	95	71-128	10	30	
Dibromomethane	ug/kg	ND	1240	1240	1020	1110	82	89	69-137	8	30	
Dichlorodifluoromethane	ug/kg	ND	1240	1240	757	875	61	70	50-150	14	30	
Dichlorofluoromethane	ug/kg	ND	1240	1240	1030	1130	83	91	50-150	9	30	
Diethyl ether (Ethyl ether)	ug/kg	ND	1240	1240	1070	1150	86	93	30-150	7	30	
Ethylbenzene	ug/kg	ND	1240	1240	1120	1260	90	101	74-150	11	30	
Hexachloro-1,3-butadiene	ug/kg	ND	1240	1240	1300	1410	105	114	54-150	9	30	
Isopropylbenzene (Cumene)	ug/kg	ND	1240	1240	1140	1280	92	103	75-150	11	30	
Methyl-tert-butyl ether	ug/kg	ND	1240	1240	1050	1090	84	88	70-142	4	30	
Methylene Chloride	ug/kg	ND	1240	1240	1110	1200	80	88	67-144	8	30	
n-Butylbenzene	ug/kg	ND	1240	1240	1120	1300	90	105	55-150	15	30	
n-Propylbenzene	ug/kg	ND	1240	1240	1130	1290	91	104	50-150	13	30	
Naphthalene	ug/kg	ND	1240	1240	1210	1310	98	105	64-150	8	30	
p-Isopropyltoluene	ug/kg	ND	1240	1240	1140	1280	92	103	75-138	11	30	
sec-Butylbenzene	ug/kg	ND	1240	1240	1160	1320	94	106	75-144	13	30	
Styrene	ug/kg	ND	1240	1240	1090	1210	88	97	75-144	10	30	
tert-Butylbenzene	ug/kg	ND	1240	1240	1120	1220	90	99	54-150	9	30	
Tetrachloroethene	ug/kg	ND	1240	1240	1170	1290	94	104	75-150	9	30	
Tetrahydrofuran	ug/kg	ND	12400	12400	11700	11500	94	93	50-150	2	30	
Toluene	ug/kg	ND	1240	1240	1130	1280	91	103	73-144	12	30	
trans-1,2-Dichloroethene	ug/kg	ND	1240	1240	1110	1180	89	95	75-150	7	30	
trans-1,3-Dichloropropene	ug/kg	ND	1240	1240	1100	1190	89	96	66-127	8	30	
Trichloroethene	ug/kg	ND	1240	1240	1080	1190	87	96	75-150	10	30	
Trichlorofluoromethane	ug/kg	ND	1240	1240	1100	1190	89	96	50-150	8	30	
Vinyl chloride	ug/kg	ND	1240	1240	917	1030	74	83	50-150	12	30	
Xylene (Total)	ug/kg	ND	3720	3720	3350	3700	90	99	75-148	10	30	
1,2-Dichloroethane-d4 (S)	%						77	83	68-136			
4-Bromofluorobenzene (S)	%						85	92	68-126			
Dibromofluoromethane (S)	%						80	86	61-139			
Toluene-d8 (S)	%						86	97	68-133			

Pace Analytical Services, Inc.
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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098841

QC Batch: OEXT/11083 Analysis Method: WI MOD DRO
QC Batch Method: WI MOD DRO Analysis Description: WIDRO Solid GCV
Associated Lab Samples: 1098841002, 1098841004, 1098841006, 1098841008, 1098841010

METHOD BLANK: 647304 Matrix: Solid
Associated Lab Samples: 1098841002, 1098841004, 1098841006, 1098841008, 1098841010

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Diesel Range Organics	mg/kg	ND	10.0	07/09/09 13:22	
n-Triacontane (S)	%	67	50-150	07/09/09 13:22	

LABORATORY CONTROL SAMPLE & LCSD: 647305 647306

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
Diesel Range Organics	mg/kg	80	58.6	59.6	73	74	70-120	2	20	
n-Triacontane (S)	%				81	71	50-150			

REPORT OF LABORATORY ANALYSIS

Pace Analytical Services, Inc.
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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098841

QC Batch: MERP/3607 Analysis Method: EPA 7471
QC Batch Method: EPA 7471 Analysis Description: 7471 Mercury
Associated Lab Samples: 1098841002, 1098841004, 1098841006, 1098841008, 1098841010

METHOD BLANK: 647323 Matrix: Solid
Associated Lab Samples: 1098841002, 1098841004, 1098841006, 1098841008, 1098841010

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Mercury	mg/kg	ND	0.020	07/09/09 08:28	

LABORATORY CONTROL SAMPLE: 647324

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Mercury	mg/kg	.43	0.43	101	80-120	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 647325 647326

Parameter	Units	1098841002 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Mercury	mg/kg	0.32	.58	.56	0.74	0.70	72	69	80-120	4	20	M0

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098841

QC Batch: GCV/6256 Analysis Method: WI MOD GRO
QC Batch Method: TPH GRO/PVOC WI ext. Analysis Description: WIGRO Solid GCV
Associated Lab Samples: 1098841002, 1098841004, 1098841006, 1098841008, 1098841010

METHOD BLANK: 647612 Matrix: Solid
Associated Lab Samples: 1098841002, 1098841004, 1098841006, 1098841008, 1098841010

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Gasoline Range Organics	mg/kg	ND	5.0	07/09/09 14:46	
a,a,a-Trifluorotoluene (S)	%	94	80-125	07/09/09 14:46	

LABORATORY CONTROL SAMPLE & LCSD: 647613 647614

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
Gasoline Range Organics	mg/kg	50	59.8	55.7	120	111	80-120	7	20	
a,a,a-Trifluorotoluene (S)	%				99	101	80-125			

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QUALIFIERS

Project: Ryan-Scherer
Pace Project No.: 1098841

DEFINITIONS

DF - Dilution Factor, if reported, represents the factor applied to the reported data due to changes in sample preparation, dilution of the sample aliquot, or moisture content.

ND - Not Detected at or above adjusted reporting limit.

J - Estimated concentration above the adjusted method detection limit and below the adjusted reporting limit.

MDL - Adjusted Method Detection Limit.

S - Surrogate

1,2-Diphenylhydrazine (8270 listed analyte) decomposes to Azobenzene.

Consistent with EPA guidelines, unrounded data are displayed and have been used to calculate % recovery and RPD values.

LCS(D) - Laboratory Control Sample (Duplicate)

MS(D) - Matrix Spike (Duplicate)

DUP - Sample Duplicate

RPD - Relative Percent Difference

NC - Not Calculable.

Pace Analytical is NELAP accredited. Contact your Pace PM for the current list of accredited analytes.

U - Indicates the compound was analyzed for, but not detected.

BATCH QUALIFIERS

Batch: GCV/6257

[M5]	A matrix spike/matrix spike duplicate was not performed for this batch due to insufficient sample volume.

ANALYTE QUALIFIERS

L0	Analyte recovery in the laboratory control sample (LCS) was outside QC limits.
L1	Analyte recovery in the laboratory control sample (LCS) was above QC limits. Results may be biased high.
M0	Matrix spike recovery was outside laboratory control limits.
P6	Matrix spike recovery was outside laboratory control limits due to a parent sample concentration notably higher than the spike level.
R1	RPD value was outside control limits.
T6	High boiling point hydrocarbons are present in the sample.

APPLIED ENVIRONMENTAL SCIENCES, INC.
BULK ASBESTOS LABORATORY WORKSHEET *(Revised August 15, 20*

RUSH

FOR LAB USE ONLY
Project: 09-246 Approved By:
Date Received: 7/10/09 Rec. By: Floyd Schneider
Date Analyzed: 7/10-11/09 Anal. By: Floyd Johnson
Customer Contact: Phone:
Fax:
Report Mailed:

Customer: Paco Analytical **Date sampled:** 7/8/09
Ryan-Scherer
Project Location / Number Workorder/P.O.# 1098841 **Page** 1 of 1

Customer ID # / Lab ID #	Sample Location	Sample Description (Include Color)	Description of Individual Layers: Layer	% of total sample	Percent Asbestos by Layer: Chrysotile	Amosite	Crocidolite	Tremolite	Actinolite	Antho-phyllite	Results / Notes
B-9 / 1312	1.5'-2'	Brown-gray granular	1.								ND
			2.								
			3.								
			4.								
			5.								
B-8 / 1313	1-2'	Gray chunky, granular	1.								ND
			2.								
			3.								
			4.								
			5.								
B-5 / 1314	1.5-2'	Brown, granular	1.								ND
			2.								
			3.								
			4.								
			5.								
B-7 / 1315	1-2'	Brown-gray, granular	1.								ND
			2.								
			3.								
			4.								
			5.								
B-10 / 1316	1-2'	Brown, granular	1.								ND
			2.								
			3.								
			4.								
			5.								
			1.								
			2.								
			3.								
			4.								
			5.								

Samples Collected by: Customer

Released by / Date:

Applied Environmental Sciences, Inc.
8441 Wayzata Boulevard, Suite 103
Minneapolis, MN 55426
(763) 545-5510, Fax (763) 545-7883

* = Composite result. Please note asbestos content by layer.

ND = None Detected
NA = Not Analyzed

Analyzed by Polarized Light Microscopy, EPA Method 600/R-93/116

X RUSH X

Chain of Custody

Pace Analytical®
www.pacelabs.com

Workorder: 1098841 **Workorder Name:** Ryan-Scherer **Results Requested** 7/13/09 ~~7/10/2009~~

Report / Invoice To	Subcontract To
Carol Davy Pace Analytical Minnesota 1700 Elm Street Suite 200 Minneapolis, MN 55414 Phone (612)607-1700 Email: carol.davy@pacelabs.com	P.O. 1098841

Item	Sample ID	Collect Date/Time	Lab ID	Matrix	Preserved Containers: Unpreserved	Requested Analysis: Bulk Asbestos	LAB USE ONLY
1	B-9 1.5'-2'	7/8/2009 11:30	1098841001	Solid	1	X	
2	B-8 1-2'	7/8/2009 12:00	1098841003	Solid	1	X	
3	B-5 1.5-2'	7/8/2009 13:00	1098841005	Solid	1	X	
4	B-7 1-2'	7/8/2009 14:00	1098841007	Solid	1	X	
5	B-10 1-2'	7/8/2009 15:00	1098841009	Solid	1	X	

Transfers	Released By	Date/Time	Received By	Date/Time
1	Carol Davy [illegible]	7/9/09 11:00		
2				
3				
4				
5				

Comments:

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CHAIN-OF-CUSTODY / Analytical Request Document

The Chain-of-Custody is a LEGAL DOCUMENT. All relevant fields must be completed accurately.

1098841

Page: 1 of 1

1203215

Section A Required Client Information:

Company:	Liesch Assoc.
Address:	13400 15th Ave N
	Plymouth, MN
Email To:	Mark Miller
Phone:	763-489-3125 Fax: 489-3101
Requested Due Date/TAT:	Friday/Monday

Section B Required Project Information:

Report To:	Mark Miller
Copy To:	John Lichter
Purchase Order No.:	
Project Name:	Ryan-Scherer
Project Number:	

Section C Invoice Information:

Attention:	Melody Hintzen
Company Name:	Liesch
Address:	Same
Pace Quote Reference:	
Pace Project Manager:	
Pace Profile #:	

REGULATORY AGENCY

☐ NPDES ☐ GROUND WATER ☐ DRINKING WATER
☐ UST ☐ RCRA ☐ OTHER

Site Location STATE: MN

Section D Required Client Information

Matrix Codes MATRIX / CODE: Drinking Water DW, Water WT, Waste Water WW, Product P, Soil/Solid SL, Oil OL, Wipe WP, Air AR, Tissue TS, Other OT

SAMPLE ID (A-Z, 0-9 / ,-) Sample IDs MUST BE UNIQUE

Requested Analysis Filtered (Y/N)

ITEM #	SAMPLE ID	MATRIX CODE	SAMPLE TYPE (G=GRAB C=COMP)	Composite Start DATE	Composite Start TIME	Composite End/Grab DATE	Composite End/Grab TIME	SAMPLE TEMP AT COLLECTION	# OF CONTAINERS	Unpreserved	H_2SO_4	HNO_3	HCl	NaOH	$Na_2S_2O_3$	Methanol	Other	SVOC-Full list	Asbestos	GRO	DRO	VOC	RCRA Metals	% Solids	Residual Chlorine (Y/N)	Pace Project No./ Lab I.D.
1	B-3 7-9'	SL	G			7-7-09	1030		1	X								1		← 5 day turn						
2	B-9 1.5'-2'	SL	G			7-8-09	1130		1	X									1							001
3	B-9 3-5'	SL	G			7-8-09	1130		8	4						4				2	2	2	1	1		002
4	B-8 1-2'	SL	G			7-8-09	1200		1	X									1							003
5	B-8 3-5'	SL	G			7-8-09	1200		8	4						4				2	2	2	1	1		004
6	B-5 1.5-2'	SL	G			7-8-09	1300		1	1									1							005
7	B-5 4-6'	SL	G			7-8-09	1300		8	4						4				2	2	2	1	1		006
8	B-7 1'-2'	SL	G			7-8-09	1400		1	1									1							007
9	B-7 1'-3'	SL	G			7-8-09	1400		8	4						4				2	2	2	1	1		008
10	B-10 1'-2'	SL	G			7-8-09	1500		1	1									1							009
11	B-10 4-6'	SL	G			7-8-09	1500		8	4						4				2	2	2	1	1		010
12																										

ADDITIONAL COMMENTS	RELINQUISHED BY / AFFILIATION	DATE	TIME	ACCEPTED BY / AFFILIATION	DATE	TIME	SAMPLE CONDITIONS			
Rush 2-day turn	C. Johnson Liesch	7-8-09	1535	[signature]	7/8/09	1535	6.4	Y	N	Y

33 of 34

ORIGINAL

SAMPLER NAME AND SIGNATURE

PRINT Name of SAMPLER: Tom Johnson

SIGNATURE of SAMPLER: [signature] DATE Signed (MM/DD/YY): 7/8/09 1535

Temp in °C | Received on Ice (Y/N) | Custody Sealed Cooler (Y/N) | Samples Intact (Y/N)

*Important Note: By signing this form you are accepting Pace's NET 30 day payment terms and agreeing to late charges of 1.5% per month for any invoices not paid within 30 days.

F-ALL-Q-020rev.07, 15-May-2007

Sample Condition Upon Receipt

Pace Analytical

Client Name: Lesch Project # 10988441

Courier: ☐ Fed Ex ☐ UPS ☐ USPS ☑ Client ☐ Commercial ☐ Pace Other _____

Tracking #: _____ [redacted]

Custody Seal on Cooler/Box Present: ☐ yes ☑ no Seals intact: ☐ yes ☑ no

Packing Material: ☐ Bubble Wrap ☑ Bubble Bags ☐ None ☐ Other _____ Temp Blank: Yes ✓ No _____

Thermometer Used ~~80344042~~, 179425 Type of Ice: (Wet) Blue None ☐ Samples on ice, cooling process has begun

Cooler Temperature 6.4 Biological Tissue is Frozen: Yes No

Temp should be above freezing to 6°C

Date and Initials of person examining contents: [signature] 7/8/09

Comments:

Chain of Custody Present:	☑Yes ☐No ☐N/A	1.
Chain of Custody Filled Out:	☑Yes ☐No ☐N/A	2.
Chain of Custody Relinquished:	☑Yes ☐No ☐N/A	3.
Sampler Name & Signature on COC:	☑Yes ☐No ☐N/A	4.
Samples Arrived within Hold Time:	☑Yes ☐No ☐N/A	5.
Short Hold Time Analysis (<72hr):	☐Yes ☐No ☑N/A	6.
Rush Turn Around Time Requested:	☑Yes ☐No ☐N/A	7. 2 day
Sufficient Volume:	☑Yes ☐No ☐N/A	8.
Correct Containers Used:	☑Yes ☐No ☐N/A	9.
-Pace Containers Used:	☑Yes ☐No ☐N/A	
Containers Intact:	☑Yes ☐No ☐N/A	10.
Filtered volume received for Dissolved tests	☐Yes ☐No ☑N/A	11.
Sample Labels match COC:	☐Yes ☑No ☐N/A	12. Missing DWC For Sample B8-3-5' Client Sent in an empty Container that was Labled
-Includes date/time/ID/Analysis Matrix: SL		
All containers needing acid/base preservation have been checked. Noncompliance are noted in 13.	☐Yes ☐No ☑N/A	13. B-10 4-6" For RCRA metals test
All containers needing preservation are found to be in compliance with EPA recommendation.	☐Yes ☐No ☑N/A	
Exceptions: VOA,Coliform, TOC, Oil and Grease, WI-DRO (water)	☐Yes ☑No	Initial when completed: — Lot # of added preservative:
Samples checked for dechlorination:	☐Yes ☐No ☑N/A	14.
Headspace in VOA Vials (>6mm):	☐Yes ☐No ☑N/A	15.
Trip Blank Present:	☐Yes ☐No ☑N/A	16. No trip blanks recieved
Trip Blank Custody Seals Present	☐Yes ☐No ☑N/A	
Pace Trip Blank Lot # (if purchased): —		

Client Notification/ Resolution: Field Data Required? Y / N

Person Contacted: _____ Date/Time: _____

Comments/ Resolution: _____

One DRO jar used for metals + moisture for B-10 4-6" (received empty)

Project Manager Review: ADO **Date:** 7-8-09

NEW 7/8/09 SH

Note: Whenever there is a discrepancy affecting North Carolina compliance samples, a copy of this form will be sent to the North Carolina DEHNR Certification Office (i.e out of hold, incorrect preservative, out of temp, incorrect containers)

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(612)607-1700

July 10, 2009

Tom Johnson
Liesch Associates, Inc.
13400 15th Avenue South
Plymouth, MN 55441

RE: Project: Ryan-Scherer
Pace Project No.: 1098730

Dear Tom Johnson:
Enclosed are the analytical results for sample(s) received by the laboratory on July 07, 2009. The results relate only to the samples included in this report. Results reported herein conform to the most current NELAC standards, where applicable, unless otherwise narrated in the body of the report.

If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Carol Davy

carol.davy@pacelabs.com
Project Manager

Enclosures

REPORT OF LABORATORY ANALYSIS

Pace Analytical Services, Inc.
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CERTIFICATIONS

Project: Ryan-Scherer
Pace Project No.: 1098730

Minnesota Certification IDs

Wisconsin Certification #: 999407970
Washington Certification #: C754
Alaska Certification #: UST-078
Arizona Certification #: AZ-0014
Tennessee Certification #: 02818
Pennsylvania Certification #: 68-00563
Oregon Certification #: MN200001
North Dakota Certification #: R-036
North Carolina Certification #: 530
New York Certification #: 11647
New Jersey Certification #: MN-002
Montana Certification #: MT CERT0092
Minnesota Certification #: 027-053-137
Maine Certification #: 2007029
Louisiana Certification #: LA080009
Louisiana Certification #: 03086
Kansas Certification #: E-10167
Iowa Certification #: 368
Illinois Certification #: 200011
Florida/NELAP Certification #: E87605
California Certification #: 01155CA

Montana Certification IDs

Montana Certification #: MT CERT0040
Idaho Certification #: MT00012
EPA Region 8 Certification #: 8TMS-Q

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SAMPLE SUMMARY

Project: Ryan-Scherer
Pace Project No.: 1098730

Lab ID	Sample ID	Matrix	Date Collected	Date Received
1098730001	B-1 1'-2'	Solid	07/06/09 09:30	07/07/09 12:07
1098730002	B-1 12'-14'	Solid	07/06/09 10:00	07/07/09 12:07
1098730003	B-12 6"-1'	Solid	07/06/09 15:30	07/07/09 12:07
1098730004	B-12 11'-13'	Solid	07/06/09 15:30	07/07/09 12:07
1098730005	B-3 6"-1'	Solid	07/07/09 10:00	07/07/09 12:07
1098730006	B-3 7'-9'	Solid	07/07/09 10:30	07/07/09 12:07

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SAMPLE ANALYTE COUNT

Project: Ryan-Scherer
Pace Project No.: 1098730

Lab ID	Sample ID	Method	Analysts	Analytes Reported
1098730002	**B-1 12'-14'**	% Moisture	MWD	1
		EPA 6010	IP	7
		EPA 7471	TEM	1
		EPA 8260	RTP	71
		WI MOD DRO	JLR	2
		WI MOD GRO	AMS1	2
1098730004	**B-12 11'-13'**	% Moisture	MWD	1
		EPA 6010	IP	7
		EPA 7471	TEM	1
		EPA 8260	RTP	71
		WI MOD DRO	JLR	2
		WI MOD GRO	AMS1	2
1098730006	**B-3 7'-9'**	% Moisture	MWD	1
		EPA 6010	IP	7
		EPA 7471	TEM	1
		EPA 8260	RTP	71
		WI MOD DRO	JLR	2
		WI MOD GRO	AMS1	2

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098730

Sample: B-1 12'-14' **Lab ID: 1098730002** Collected: 07/06/09 10:00 Received: 07/07/09 12:07 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
WIDRO GCS Silica Gel	Analytical Method: WI MOD DRO Preparation Method: WI MOD DRO								
Diesel Range Organics	**28.1**	mg/kg	11.5	5.7	1	07/07/09 19:52	07/08/09 20:50		
n-Triacontane (S)	71	%	50-150		1	07/07/09 19:52	07/08/09 20:50		
WIGRO GCV	Analytical Method: WI MOD GRO Preparation Method: TPH GRO/PVOC WI ext.								
Gasoline Range Organics	ND	mg/kg	6.1	3.0	1	07/07/09 15:17	07/08/09 14:38		
a,a,a-Trifluorotoluene (S)	96	%	80-125		1	07/07/09 15:17	07/08/09 14:38	98-08-8	
6010 MET ICP	Analytical Method: EPA 6010 Preparation Method: EPA 3050								
Arsenic	**1.4**	mg/kg	0.60	0.34	1	07/07/09 15:08	07/08/09 10:44	7440-38-2	
Barium	**25.7**	mg/kg	0.60	0.30	1	07/07/09 15:08	07/08/09 10:44	7440-39-3	
Cadmium	**0.12**	mg/kg	0.060	0.030	1	07/07/09 15:08	07/08/09 10:44	7440-43-9	
Chromium	**9.4**	mg/kg	0.60	0.30	1	07/07/09 15:08	07/08/09 10:44	7440-47-3	
Lead	**22.5**	mg/kg	0.36	0.18	1	07/07/09 15:08	07/08/09 10:44	7439-92-1	
Selenium	**1.4**	mg/kg	0.90	0.45	1	07/07/09 15:08	07/08/09 10:44	7782-49-2	
Silver	ND	mg/kg	0.60	0.30	1	07/07/09 15:08	07/08/09 10:44	7440-22-4	
7471 Mercury	Analytical Method: EPA 7471 Preparation Method: EPA 7471								
Mercury	**0.038**	mg/kg	0.024	0.012	1	07/08/09 10:11	07/08/09 13:42	7439-97-6	
Dry Weight	Analytical Method: % Moisture								
Percent Moisture	**18.1**	%	0.10	0.10	1		07/07/09 00:00		
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Acetone	ND	ug/kg	616	308	1	07/08/09 00:00	07/08/09 20:18	67-64-1	
Allyl chloride	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	107-05-1	
Benzene	ND	ug/kg	61.6	30.8	1	07/08/09 00:00	07/08/09 20:18	71-43-2	
Bromobenzene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	108-86-1	L1
Bromochloromethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	74-97-5	
Bromodichloromethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	75-27-4	
Bromoform	ND	ug/kg	1230	246	1	07/08/09 00:00	07/08/09 20:18	75-25-2	
Bromomethane	ND	ug/kg	616	308	1	07/08/09 00:00	07/08/09 20:18	74-83-9	
2-Butanone (MEK)	ND	ug/kg	616	308	1	07/08/09 00:00	07/08/09 20:18	78-93-3	
n-Butylbenzene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	104-51-8	
sec-Butylbenzene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	135-98-8	
tert-Butylbenzene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	98-06-6	
Carbon tetrachloride	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	56-23-5	
Chlorobenzene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	108-90-7	
Chloroethane	ND	ug/kg	616	123	1	07/08/09 00:00	07/08/09 20:18	75-00-3	
Chloroform	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	67-66-3	
Chloromethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	74-87-3	
2-Chlorotoluene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	95-49-8	
4-Chlorotoluene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	106-43-4	
1,2-Dibromo-3-chloropropane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	96-12-8	
Dibromochloromethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	124-48-1	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098730

Sample: B-1 12'-14' **Lab ID: 1098730002** Collected: 07/06/09 10:00 Received: 07/07/09 12:07 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
1,2-Dibromoethane (EDB)	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	106-93-4	
Dibromomethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	74-95-3	
1,2-Dichlorobenzene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	95-50-1	
1,3-Dichlorobenzene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	541-73-1	
1,4-Dichlorobenzene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	106-46-7	
Dichlorodifluoromethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	75-71-8	
1,1-Dichloroethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	75-34-3	
1,2-Dichloroethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	107-06-2	
1,1-Dichloroethene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	75-35-4	
cis-1,2-Dichloroethene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	156-59-2	
trans-1,2-Dichloroethene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	156-60-5	
Dichlorofluoromethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	75-43-4	
1,2-Dichloropropane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	78-87-5	
1,3-Dichloropropane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	142-28-9	
2,2-Dichloropropane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	594-20-7	
1,1-Dichloropropene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	563-58-6	
cis-1,3-Dichloropropene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	10061-02-6	
Diethyl ether (Ethyl ether)	ND	ug/kg	616	308	1	07/08/09 00:00	07/08/09 20:18	60-29-7	
Ethylbenzene	ND	ug/kg	61.6	30.8	1	07/08/09 00:00	07/08/09 20:18	100-41-4	
Hexachloro-1,3-butadiene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	87-68-3	
Isopropylbenzene (Cumene)	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	98-82-8	
p-Isopropyltoluene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	99-87-6	
Methylene Chloride	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/kg	616	308	1	07/08/09 00:00	07/08/09 20:18	108-10-1	
Methyl-tert-butyl ether	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	1634-04-4	
Naphthalene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	91-20-3	
n-Propylbenzene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	103-65-1	
Styrene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	79-34-5	
Tetrachloroethene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	127-18-4	L1
Tetrahydrofuran	ND	ug/kg	2460	1230	1	07/08/09 00:00	07/08/09 20:18	109-99-9	
Toluene	ND	ug/kg	61.6	30.8	1	07/08/09 00:00	07/08/09 20:18	108-88-3	
1,2,3-Trichlorobenzene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	87-61-6	
1,2,4-Trichlorobenzene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	120-82-1	
1,1,1-Trichloroethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	71-55-6	
1,1,2-Trichloroethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	79-00-5	
Trichloroethene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	79-01-6	
Trichlorofluoromethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	75-69-4	
1,2,3-Trichloropropane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	96-18-4	
1,1,2-Trichlorotrifluoroethane	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	76-13-1	
1,2,4-Trimethylbenzene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	95-63-6	
1,3,5-Trimethylbenzene	ND	ug/kg	246	123	1	07/08/09 00:00	07/08/09 20:18	108-67-8	
Vinyl chloride	ND	ug/kg	61.6	30.8	1	07/08/09 00:00	07/08/09 20:18	75-01-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098730

Sample: B-1 12'-14' **Lab ID: 1098730002** Collected: 07/06/09 10:00 Received: 07/07/09 12:07 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Xylene (Total)	ND	ug/kg	185	92.4	1	07/08/09 00:00	07/08/09 20:18	1330-20-7	
Dibromofluoromethane (S)	84	%	61-139		1	07/08/09 00:00	07/08/09 20:18	1868-53-7	
1,2-Dichloroethane-d4 (S)	82	%	68-136		1	07/08/09 00:00	07/08/09 20:18	17060-07-0	
Toluene-d8 (S)	94	%	68-133		1	07/08/09 00:00	07/08/09 20:18	2037-26-5	
4-Bromofluorobenzene (S)	95	%	68-126		1	07/08/09 00:00	07/08/09 20:18	460-00-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098730

Sample: B-12 11'-13' **Lab ID: 1098730004** Collected: 07/06/09 15:30 Received: 07/07/09 12:07 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
WIDRO GCS Silica Gel	Analytical Method: WI MOD DRO Preparation Method: WI MOD DRO								
Diesel Range Organics	ND	mg/kg	11.9	5.9	1	07/07/09 19:52	07/08/09 20:43		
n-Triacontane (S)	80	%	50-150		1	07/07/09 19:52	07/08/09 20:43		
WIGRO GCV	Analytical Method: WI MOD GRO Preparation Method: TPH GRO/PVOC WI ext.								
Gasoline Range Organics	ND	mg/kg	6.3	3.2	1	07/07/09 15:17	07/09/09 11:19		
a,a,a-Trifluorotoluene (S)	94	%	80-125		1	07/07/09 15:17	07/09/09 11:19	98-08-8	
6010 MET ICP	Analytical Method: EPA 6010 Preparation Method: EPA 3050								
Arsenic	**1.3**	mg/kg	0.55	0.31	1	07/07/09 15:08	07/08/09 11:03	7440-38-2	
Barium	**58.9**	mg/kg	0.55	0.27	1	07/07/09 15:08	07/08/09 11:03	7440-39-3	
Cadmium	**0.12**	mg/kg	0.055	0.027	1	07/07/09 15:08	07/08/09 11:03	7440-43-9	
Chromium	**10.2**	mg/kg	0.55	0.27	1	07/07/09 15:08	07/08/09 11:03	7440-47-3	
Lead	**5.8**	mg/kg	0.33	0.16	1	07/07/09 15:08	07/08/09 11:03	7439-92-1	
Selenium	**0.85**	mg/kg	0.82	0.41	1	07/07/09 15:08	07/08/09 11:03	7782-49-2	
Silver	ND	mg/kg	0.55	0.27	1	07/07/09 15:08	07/08/09 11:03	7440-22-4	
7471 Mercury	Analytical Method: EPA 7471 Preparation Method: EPA 7471								
Mercury	**0.052**	mg/kg	0.021	0.011	1	07/08/09 10:11	07/08/09 13:46	7439-97-6	
Dry Weight	Analytical Method: % Moisture								
Percent Moisture	**20.1**	%	0.10	0.10	1		07/07/09 00:00		
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Acetone	ND	ug/kg	640	320	1	07/08/09 00:00	07/08/09 20:39	67-64-1	
Allyl chloride	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	107-05-1	
Benzene	ND	ug/kg	64.0	32.0	1	07/08/09 00:00	07/08/09 20:39	71-43-2	
Bromobenzene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	108-86-1	L1
Bromochloromethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	74-97-5	
Bromodichloromethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	75-27-4	
Bromoform	ND	ug/kg	1280	256	1	07/08/09 00:00	07/08/09 20:39	75-25-2	
Bromomethane	ND	ug/kg	640	320	1	07/08/09 00:00	07/08/09 20:39	74-83-9	
2-Butanone (MEK)	ND	ug/kg	640	320	1	07/08/09 00:00	07/08/09 20:39	78-93-3	
n-Butylbenzene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	104-51-8	
sec-Butylbenzene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	135-98-8	
tert-Butylbenzene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	98-06-6	
Carbon tetrachloride	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	56-23-5	
Chlorobenzene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	108-90-7	
Chloroethane	ND	ug/kg	640	128	1	07/08/09 00:00	07/08/09 20:39	75-00-3	
Chloroform	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	67-66-3	
Chloromethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	74-87-3	
2-Chlorotoluene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	95-49-8	
4-Chlorotoluene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	106-43-4	
1,2-Dibromo-3-chloropropane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	96-12-8	
Dibromochloromethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	124-48-1	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098730

Sample: B-12 11'-13' **Lab ID: 1098730004** Collected: 07/06/09 15:30 Received: 07/07/09 12:07 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
1,2-Dibromoethane (EDB)	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	106-93-4	
Dibromomethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	74-95-3	
1,2-Dichlorobenzene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	95-50-1	
1,3-Dichlorobenzene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	541-73-1	
1,4-Dichlorobenzene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	106-46-7	
Dichlorodifluoromethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	75-71-8	
1,1-Dichloroethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	75-34-3	
1,2-Dichloroethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	107-06-2	
1,1-Dichloroethene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	75-35-4	
cis-1,2-Dichloroethene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	156-59-2	
trans-1,2-Dichloroethene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	156-60-5	
Dichlorofluoromethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	75-43-4	
1,2-Dichloropropane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	78-87-5	
1,3-Dichloropropane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	142-28-9	
2,2-Dichloropropane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	594-20-7	
1,1-Dichloropropene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	563-58-6	
cis-1,3-Dichloropropene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	10061-02-6	
Diethyl ether (Ethyl ether)	ND	ug/kg	640	320	1	07/08/09 00:00	07/08/09 20:39	60-29-7	
Ethylbenzene	ND	ug/kg	64.0	32.0	1	07/08/09 00:00	07/08/09 20:39	100-41-4	
Hexachloro-1,3-butadiene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	87-68-3	
Isopropylbenzene (Cumene)	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	98-82-8	
p-Isopropyltoluene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	99-87-6	
Methylene Chloride	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/kg	640	320	1	07/08/09 00:00	07/08/09 20:39	108-10-1	
Methyl-tert-butyl ether	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	1634-04-4	
Naphthalene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	91-20-3	
n-Propylbenzene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	103-65-1	
Styrene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	79-34-5	
Tetrachloroethene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	127-18-4	L1
Tetrahydrofuran	ND	ug/kg	2560	1280	1	07/08/09 00:00	07/08/09 20:39	109-99-9	
Toluene	ND	ug/kg	64.0	32.0	1	07/08/09 00:00	07/08/09 20:39	108-88-3	
1,2,3-Trichlorobenzene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	87-61-6	
1,2,4-Trichlorobenzene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	120-82-1	
1,1,1-Trichloroethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	71-55-6	
1,1,2-Trichloroethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	79-00-5	
Trichloroethene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	79-01-6	
Trichlorofluoromethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	75-69-4	
1,2,3-Trichloropropane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	96-18-4	
1,1,2-Trichlorotrifluoroethane	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	76-13-1	
1,2,4-Trimethylbenzene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	95-63-6	
1,3,5-Trimethylbenzene	ND	ug/kg	256	128	1	07/08/09 00:00	07/08/09 20:39	108-67-8	
Vinyl chloride	ND	ug/kg	64.0	32.0	1	07/08/09 00:00	07/08/09 20:39	75-01-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098730

Sample: B-12 11'-13' **Lab ID: 1098730004** Collected: 07/06/09 15:30 Received: 07/07/09 12:07 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Xylene (Total)	ND	ug/kg	192	96.0	1	07/08/09 00:00	07/08/09 20:39	1330-20-7	
Dibromofluoromethane (S)	84	%	61-139		1	07/08/09 00:00	07/08/09 20:39	1868-53-7	
1,2-Dichloroethane-d4 (S)	81	%	68-136		1	07/08/09 00:00	07/08/09 20:39	17060-07-0	
Toluene-d8 (S)	95	%	68-133		1	07/08/09 00:00	07/08/09 20:39	2037-26-5	
4-Bromofluorobenzene (S)	94	%	68-126		1	07/08/09 00:00	07/08/09 20:39	460-00-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098730

Sample: B-3 7'-9' **Lab ID: 1098730006** Collected: 07/07/09 10:30 Received: 07/07/09 12:07 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
WIDRO GCS Silica Gel	Analytical Method: WI MOD DRO Preparation Method: WI MOD DRO								
Diesel Range Organics	**449**	mg/kg	53.3	26.6	1	07/07/09 19:52	07/09/09 09:14		T6
n-Triacontane (S)	73	%	50-150		1	07/07/09 19:52	07/09/09 09:14		1M
WIGRO GCV	Analytical Method: WI MOD GRO Preparation Method: TPH GRO/PVOC WI ext.								
Gasoline Range Organics	ND	mg/kg	6.0	3.0	1	07/07/09 15:17	07/09/09 11:43		
a,a,a-Trifluorotoluene (S)	95	%	80-125		1	07/07/09 15:17	07/09/09 11:43	98-08-8	
6010 MET ICP	Analytical Method: EPA 6010 Preparation Method: EPA 3050								
Arsenic	**1.0**	mg/kg	0.56	0.31	1	07/07/09 15:08	07/08/09 11:10	7440-38-2	
Barium	**35.5**	mg/kg	0.56	0.28	1	07/07/09 15:08	07/08/09 11:10	7440-39-3	
Cadmium	**0.46**	mg/kg	0.056	0.028	1	07/07/09 15:08	07/08/09 11:10	7440-43-9	
Chromium	**12.3**	mg/kg	0.56	0.28	1	07/07/09 15:08	07/08/09 11:10	7440-47-3	
Lead	**10300**	mg/kg	0.67	0.33	2	07/07/09 15:08	07/08/09 11:31	7439-92-1	
Selenium	ND	mg/kg	0.84	0.42	1	07/07/09 15:08	07/08/09 11:10	7782-49-2	
Silver	ND	mg/kg	0.56	0.28	1	07/07/09 15:08	07/08/09 11:10	7440-22-4	
7471 Mercury	Analytical Method: EPA 7471 Preparation Method: EPA 7471								
Mercury	**0.21**	mg/kg	0.020	0.010	1	07/08/09 10:11	07/08/09 13:47	7439-97-6	
Dry Weight	Analytical Method: % Moisture								
Percent Moisture	**13.8**	%	0.10	0.10	1		07/07/09 00:00		
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Acetone	ND	ug/kg	580	290	1	07/08/09 00:00	07/08/09 20:59	67-64-1	
Allyl chloride	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	107-05-1	
Benzene	ND	ug/kg	58.0	29.0	1	07/08/09 00:00	07/08/09 20:59	71-43-2	
Bromobenzene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	108-86-1	L1
Bromochloromethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	74-97-5	
Bromodichloromethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	75-27-4	
Bromoform	ND	ug/kg	1160	232	1	07/08/09 00:00	07/08/09 20:59	75-25-2	
Bromomethane	ND	ug/kg	580	290	1	07/08/09 00:00	07/08/09 20:59	74-83-9	
2-Butanone (MEK)	ND	ug/kg	580	290	1	07/08/09 00:00	07/08/09 20:59	78-93-3	
n-Butylbenzene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	104-51-8	
sec-Butylbenzene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	135-98-8	
tert-Butylbenzene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	98-06-6	
Carbon tetrachloride	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	56-23-5	
Chlorobenzene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	108-90-7	
Chloroethane	ND	ug/kg	580	116	1	07/08/09 00:00	07/08/09 20:59	75-00-3	
Chloroform	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	67-66-3	
Chloromethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	74-87-3	
2-Chlorotoluene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	95-49-8	
4-Chlorotoluene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	106-43-4	
1,2-Dibromo-3-chloropropane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	96-12-8	
Dibromochloromethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	124-48-1	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098730

Sample: B-3 7'-9' **Lab ID: 1098730006** Collected: 07/07/09 10:30 Received: 07/07/09 12:07 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
1,2-Dibromoethane (EDB)	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	106-93-4	
Dibromomethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	74-95-3	
1,2-Dichlorobenzene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	95-50-1	
1,3-Dichlorobenzene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	541-73-1	
1,4-Dichlorobenzene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	106-46-7	
Dichlorodifluoromethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	75-71-8	
1,1-Dichloroethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	75-34-3	
1,2-Dichloroethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	107-06-2	
1,1-Dichloroethene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	75-35-4	
cis-1,2-Dichloroethene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	156-59-2	
trans-1,2-Dichloroethene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	156-60-5	
Dichlorofluoromethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	75-43-4	
1,2-Dichloropropane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	78-87-5	
1,3-Dichloropropane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	142-28-9	
2,2-Dichloropropane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	594-20-7	
1,1-Dichloropropene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	563-58-6	
cis-1,3-Dichloropropene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	10061-02-6	
Diethyl ether (Ethyl ether)	ND	ug/kg	580	290	1	07/08/09 00:00	07/08/09 20:59	60-29-7	
Ethylbenzene	ND	ug/kg	58.0	29.0	1	07/08/09 00:00	07/08/09 20:59	100-41-4	
Hexachloro-1,3-butadiene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	87-68-3	
Isopropylbenzene (Cumene)	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	98-82-8	
p-Isopropyltoluene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	99-87-6	
Methylene Chloride	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/kg	580	290	1	07/08/09 00:00	07/08/09 20:59	108-10-1	
Methyl-tert-butyl ether	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	1634-04-4	
Naphthalene	**432**	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	91-20-3	
n-Propylbenzene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	103-65-1	
Styrene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	79-34-5	
Tetrachloroethene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	127-18-4	L1
Tetrahydrofuran	ND	ug/kg	2320	1160	1	07/08/09 00:00	07/08/09 20:59	109-99-9	
Toluene	ND	ug/kg	58.0	29.0	1	07/08/09 00:00	07/08/09 20:59	108-88-3	
1,2,3-Trichlorobenzene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	87-61-6	
1,2,4-Trichlorobenzene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	120-82-1	
1,1,1-Trichloroethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	71-55-6	
1,1,2-Trichloroethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	79-00-5	
Trichloroethene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	79-01-6	
Trichlorofluoromethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	75-69-4	
1,2,3-Trichloropropane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	96-18-4	
1,1,2-Trichlorotrifluoroethane	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	76-13-1	
1,2,4-Trimethylbenzene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	95-63-6	
1,3,5-Trimethylbenzene	ND	ug/kg	232	116	1	07/08/09 00:00	07/08/09 20:59	108-67-8	
Vinyl chloride	ND	ug/kg	58.0	29.0	1	07/08/09 00:00	07/08/09 20:59	75-01-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098730

Sample: B-3 7'-9' **Lab ID: 1098730006** Collected: 07/07/09 10:30 Received: 07/07/09 12:07 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Xylene (Total)	ND	ug/kg	174	87.0	1	07/08/09 00:00	07/08/09 20:59	1330-20-7	
Dibromofluoromethane (S)	88	%	61-139		1	07/08/09 00:00	07/08/09 20:59	1868-53-7	
1,2-Dichloroethane-d4 (S)	85	%	68-136		1	07/08/09 00:00	07/08/09 20:59	17060-07-0	
Toluene-d8 (S)	97	%	68-133		1	07/08/09 00:00	07/08/09 20:59	2037-26-5	
4-Bromofluorobenzene (S)	94	%	68-126		1	07/08/09 00:00	07/08/09 20:59	460-00-4	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098730

QC Batch: MPRP/16342 Analysis Method: EPA 6010
QC Batch Method: EPA 3050 Analysis Description: 6010 MET
Associated Lab Samples: 1098730002, 1098730004, 1098730006

METHOD BLANK: 646658 Matrix: Solid
Associated Lab Samples: 1098730002, 1098730004, 1098730006

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Arsenic	mg/kg	ND	0.42	07/08/09 10:35	
Barium	mg/kg	ND	0.42	07/08/09 10:35	
Cadmium	mg/kg	ND	0.042	07/08/09 10:35	
Chromium	mg/kg	ND	0.42	07/08/09 10:35	
Lead	mg/kg	ND	0.25	07/08/09 10:35	
Selenium	mg/kg	ND	0.64	07/08/09 10:35	
Silver	mg/kg	ND	0.42	07/08/09 10:35	

LABORATORY CONTROL SAMPLE: 646659

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Arsenic	mg/kg	48.1	41.7	87	80-120	
Barium	mg/kg	48.1	44.3	92	80-120	
Cadmium	mg/kg	48.1	42.2	88	80-120	
Chromium	mg/kg	48.1	44.1	92	80-120	
Lead	mg/kg	48.1	43.6	91	80-120	
Selenium	mg/kg	48.1	40.2	84	80-120	
Silver	mg/kg	24	21.8	90	80-120	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 646660 646661

Parameter	Units	1098730002 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Arsenic	mg/kg	1.4	60.5	57	58.8	52.3	95	89	75-125	12	30	
Barium	mg/kg	25.7	60.5	57	81.0	78.7	91	93	75-125	3	30	
Cadmium	mg/kg	0.12	60.5	57	56.0	51.6	92	90	75-125	8	30	
Chromium	mg/kg	9.4	60.5	57	61.1	59.6	85	88	75-125	2	30	
Lead	mg/kg	22.5	60.5	57	68.3	71.5	76	86	75-125	5	30	
Selenium	mg/kg	1.4	60.5	57	49.0	47.8	79	81	75-125	2	30	
Silver	mg/kg	ND	30.3	28.6	25.8	23.4	85	82	75-125	9	30	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098730

QC Batch: MPRP/16344 Analysis Method: % Moisture
QC Batch Method: % Moisture Analysis Description: Dry Weight/Percent Moisture
Associated Lab Samples: 1098730002, 1098730004, 1098730006

SAMPLE DUPLICATE: 646715

Parameter	Units	1098730002 Result	Dup Result	RPD	Max RPD	Qualifiers
Percent Moisture	%	18.1	16.6	9	30	

SAMPLE DUPLICATE: 646716

Parameter	Units	1098731001 Result	Dup Result	RPD	Max RPD	Qualifiers
Percent Moisture	%	11.2	11.6	4	30	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098730

QC Batch: OEXT/11068 Analysis Method: WI MOD DRO
QC Batch Method: WI MOD DRO Analysis Description: WIDRO Solid GCV
Associated Lab Samples: 1098730002, 1098730004, 1098730006

METHOD BLANK: 646640 Matrix: Solid
Associated Lab Samples: 1098730002, 1098730004, 1098730006

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Diesel Range Organics	mg/kg	ND	10.0	07/08/09 20:19	
n-Triacontane (S)	%	87	50-150	07/08/09 20:19	

LABORATORY CONTROL SAMPLE & LCSD: 646641 646642

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
Diesel Range Organics	mg/kg	80	63.3	64.2	79	80	70-120	1	20	
n-Triacontane (S)	%				80	80	50-150			

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098730

QC Batch: GCV/6251 Analysis Method: WI MOD GRO
QC Batch Method: TPH GRO/PVOC WI ext. Analysis Description: WIGRO Solid GCV
Associated Lab Samples: 1098730002, 1098730004, 1098730006

METHOD BLANK: 646717 Matrix: Solid
Associated Lab Samples: 1098730002, 1098730004, 1098730006

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Gasoline Range Organics	mg/kg	ND	5.0	07/08/09 13:30	
a,a,a-Trifluorotoluene (S)	%	96	80-125	07/08/09 13:30	

LABORATORY CONTROL SAMPLE & LCSD: 646718 646719

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
Gasoline Range Organics	mg/kg	50	55.8	55.2	112	110	80-120	1	20	
a,a,a-Trifluorotoluene (S)	%				100	100	80-125			

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098730

QC Batch: MSV/12619 Analysis Method: EPA 8260
QC Batch Method: EPA 5035/5030B Analysis Description: 8260 MSV 5030 Med Level
Associated Lab Samples: 1098730002, 1098730004, 1098730006

METHOD BLANK: 646959 Matrix: Solid
Associated Lab Samples: 1098730002, 1098730004, 1098730006

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
1,1,1,2-Tetrachloroethane	ug/kg	ND	200	07/08/09 19:17	
1,1,1-Trichloroethane	ug/kg	ND	200	07/08/09 19:17	
1,1,2,2-Tetrachloroethane	ug/kg	ND	200	07/08/09 19:17	
1,1,2-Trichloroethane	ug/kg	ND	200	07/08/09 19:17	
1,1,2-Trichlorotrifluoroethane	ug/kg	ND	200	07/08/09 19:17	
1,1-Dichloroethane	ug/kg	ND	200	07/08/09 19:17	
1,1-Dichloroethene	ug/kg	ND	200	07/08/09 19:17	
1,1-Dichloropropene	ug/kg	ND	200	07/08/09 19:17	
1,2,3-Trichlorobenzene	ug/kg	ND	200	07/08/09 19:17	
1,2,3-Trichloropropane	ug/kg	ND	200	07/08/09 19:17	
1,2,4-Trichlorobenzene	ug/kg	ND	200	07/08/09 19:17	
1,2,4-Trimethylbenzene	ug/kg	ND	200	07/08/09 19:17	
1,2-Dibromo-3-chloropropane	ug/kg	ND	200	07/08/09 19:17	
1,2-Dibromoethane (EDB)	ug/kg	ND	200	07/08/09 19:17	
1,2-Dichlorobenzene	ug/kg	ND	200	07/08/09 19:17	
1,2-Dichloroethane	ug/kg	ND	200	07/08/09 19:17	
1,2-Dichloropropane	ug/kg	ND	200	07/08/09 19:17	
1,3,5-Trimethylbenzene	ug/kg	ND	200	07/08/09 19:17	
1,3-Dichlorobenzene	ug/kg	ND	200	07/08/09 19:17	
1,3-Dichloropropane	ug/kg	ND	200	07/08/09 19:17	
1,4-Dichlorobenzene	ug/kg	ND	200	07/08/09 19:17	
2,2-Dichloropropane	ug/kg	ND	200	07/08/09 19:17	
2-Butanone (MEK)	ug/kg	ND	500	07/08/09 19:17	
2-Chlorotoluene	ug/kg	ND	200	07/08/09 19:17	
4-Chlorotoluene	ug/kg	ND	200	07/08/09 19:17	
4-Methyl-2-pentanone (MIBK)	ug/kg	ND	500	07/08/09 19:17	
Acetone	ug/kg	ND	500	07/08/09 19:17	
Allyl chloride	ug/kg	ND	200	07/08/09 19:17	
Benzene	ug/kg	ND	50.0	07/08/09 19:17	
Bromobenzene	ug/kg	ND	200	07/08/09 19:17	
Bromochloromethane	ug/kg	ND	200	07/08/09 19:17	
Bromodichloromethane	ug/kg	ND	200	07/08/09 19:17	
Bromoform	ug/kg	ND	1000	07/08/09 19:17	
Bromomethane	ug/kg	ND	500	07/08/09 19:17	
Carbon tetrachloride	ug/kg	ND	200	07/08/09 19:17	
Chlorobenzene	ug/kg	ND	200	07/08/09 19:17	
Chloroethane	ug/kg	ND	500	07/08/09 19:17	
Chloroform	ug/kg	ND	200	07/08/09 19:17	
Chloromethane	ug/kg	ND	200	07/08/09 19:17	
cis-1,2-Dichloroethene	ug/kg	ND	200	07/08/09 19:17	
cis-1,3-Dichloropropene	ug/kg	ND	200	07/08/09 19:17	
Dibromochloromethane	ug/kg	ND	200	07/08/09 19:17	
Dibromomethane	ug/kg	ND	200	07/08/09 19:17	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098730

METHOD BLANK: 646959 Matrix: Solid

Associated Lab Samples: 1098730002, 1098730004, 1098730006

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Dichlorodifluoromethane	ug/kg	ND	200	07/08/09 19:17	
Dichlorofluoromethane	ug/kg	ND	200	07/08/09 19:17	
Diethyl ether (Ethyl ether)	ug/kg	ND	500	07/08/09 19:17	
Ethylbenzene	ug/kg	ND	50.0	07/08/09 19:17	
Hexachloro-1,3-butadiene	ug/kg	ND	200	07/08/09 19:17	
Isopropylbenzene (Cumene)	ug/kg	ND	200	07/08/09 19:17	
Methyl-tert-butyl ether	ug/kg	ND	200	07/08/09 19:17	
Methylene Chloride	ug/kg	ND	200	07/08/09 19:17	
n-Butylbenzene	ug/kg	ND	200	07/08/09 19:17	
n-Propylbenzene	ug/kg	ND	200	07/08/09 19:17	
Naphthalene	ug/kg	ND	200	07/08/09 19:17	
p-Isopropyltoluene	ug/kg	ND	200	07/08/09 19:17	
sec-Butylbenzene	ug/kg	ND	200	07/08/09 19:17	
Styrene	ug/kg	ND	200	07/08/09 19:17	
tert-Butylbenzene	ug/kg	ND	200	07/08/09 19:17	
Tetrachloroethene	ug/kg	ND	200	07/08/09 19:17	
Tetrahydrofuran	ug/kg	ND	2000	07/08/09 19:17	
Toluene	ug/kg	ND	50.0	07/08/09 19:17	
trans-1,2-Dichloroethene	ug/kg	ND	200	07/08/09 19:17	
trans-1,3-Dichloropropene	ug/kg	ND	200	07/08/09 19:17	
Trichloroethene	ug/kg	ND	200	07/08/09 19:17	
Trichlorofluoromethane	ug/kg	ND	200	07/08/09 19:17	
Vinyl chloride	ug/kg	ND	50.0	07/08/09 19:17	
Xylene (Total)	ug/kg	ND	150	07/08/09 19:17	
1,2-Dichloroethane-d4 (S)	%	107	68-136	07/08/09 19:17	
4-Bromofluorobenzene (S)	%	124	68-126	07/08/09 19:17	
Dibromofluoromethane (S)	%	111	61-139	07/08/09 19:17	
Toluene-d8 (S)	%	126	68-133	07/08/09 19:17	

LABORATORY CONTROL SAMPLE & LCSD: 646960 646961

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
1,1,1,2-Tetrachloroethane	ug/kg	1000	1220	1190	122	119	75-125	2	20	
1,1,1-Trichloroethane	ug/kg	1000	1110	1090	111	109	75-130	2	20	
1,1,2,2-Tetrachloroethane	ug/kg	1000	1200	1130	120	113	70-139	5	20	
1,1,2-Trichloroethane	ug/kg	1000	1160	1140	116	114	75-125	2	20	
1,1,2-Trichlorotrifluoroethane	ug/kg	1000	1350	1380	135	138	58-142	2	20	
1,1-Dichloroethane	ug/kg	1000	1090	1070	109	107	75-126	2	20	
1,1-Dichloroethene	ug/kg	1000	1170	1160	117	116	71-127	1	20	
1,1-Dichloropropene	ug/kg	1000	1190	1160	119	116	75-125	3	20	
1,2,3-Trichlorobenzene	ug/kg	1000	1250	1170	125	117	75-133	7	20	
1,2,3-Trichloropropane	ug/kg	1000	1190	1150	119	115	75-126	4	20	
1,2,4-Trichlorobenzene	ug/kg	1000	1310	1230	131	123	75-134	6	20	
1,2,4-Trimethylbenzene	ug/kg	1000	1250	1190	125	119	75-136	5	20	
1,2-Dibromo-3-chloropropane	ug/kg	1000	1180	1120	118	112	69-136	5	20	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098730

LABORATORY CONTROL SAMPLE & LCSD: 646960 646961

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
1,2-Dibromoethane (EDB)	ug/kg	1000	1200	1180	120	118	75-125	1	20	
1,2-Dichlorobenzene	ug/kg	1000	1240	1180	124	118	75-125	5	20	
1,2-Dichloroethane	ug/kg	1000	1030	1000	103	100	75-135	3	20	
1,2-Dichloropropane	ug/kg	1000	1180	1150	118	115	75-125	2	20	
1,3,5-Trimethylbenzene	ug/kg	1000	1220	1180	122	118	75-136	4	20	
1,3-Dichlorobenzene	ug/kg	1000	1250	1190	125	119	75-125	5	20	
1,3-Dichloropropane	ug/kg	1000	1200	1170	120	117	75-125	2	20	
1,4-Dichlorobenzene	ug/kg	1000	1250	1190	125	119	75-125	5	20	
2,2-Dichloropropane	ug/kg	1000	1040	1030	104	103	30-150	1	20	
2-Butanone (MEK)	ug/kg	1000	1150	1170	115	117	49-149	1	20	
2-Chlorotoluene	ug/kg	1000	1200	1140	120	114	75-125	5	20	
4-Chlorotoluene	ug/kg	1000	1200	1150	120	115	75-126	4	20	
4-Methyl-2-pentanone (MIBK)	ug/kg	1000	1110	1100	111	110	73-134	1	20	
Acetone	ug/kg	2500	2930	2940	117	118	57-150	0	20	
Allyl chloride	ug/kg	1000	1010	1010	101	101	69-139	0	20	
Benzene	ug/kg	1000	1120	1110	112	111	75-130	2	20	
Bromobenzene	ug/kg	1000	1270	1220	127	122	75-125	4	20	L0
Bromochloromethane	ug/kg	1000	1140	1090	114	109	75-125	4	20	
Bromodichloromethane	ug/kg	1000	1140	1090	114	109	75-130	4	20	
Bromoform	ug/kg	2000	2300	2240	115	112	75-128	3	20	
Bromomethane	ug/kg	1000	879	871	88	87	47-150	1	20	
Carbon tetrachloride	ug/kg	1000	1140	1130	114	113	67-138	1	20	
Chlorobenzene	ug/kg	1000	1210	1170	121	117	75-125	3	20	
Chloroethane	ug/kg	1000	788	841	79	84	54-150	6	20	
Chloroform	ug/kg	1000	1050	1040	105	104	75-131	1	20	
Chloromethane	ug/kg	1000	917	907	92	91	65-126	1	20	
cis-1,2-Dichloroethene	ug/kg	1000	1150	1110	115	111	75-125	4	20	
cis-1,3-Dichloropropene	ug/kg	1000	1200	1160	120	116	75-125	4	20	
Dibromochloromethane	ug/kg	1000	1170	1160	117	116	75-125	1	20	
Dibromomethane	ug/kg	1000	1130	1090	113	109	75-125	4	20	
Dichlorodifluoromethane	ug/kg	1000	944	946	94	95	37-125	0	20	
Dichlorofluoromethane	ug/kg	1000	1040	1020	104	102	30-150	2	20	
Diethyl ether (Ethyl ether)	ug/kg	1000	1090	1080	109	108	67-135	1	20	
Ethylbenzene	ug/kg	1000	1210	1180	121	118	75-125	3	20	
Hexachloro-1,3-butadiene	ug/kg	1000	1350	1300	135	130	75-150	4	20	
Isopropylbenzene (Cumene)	ug/kg	1000	1220	1190	122	119	75-125	2	20	
Methyl-tert-butyl ether	ug/kg	1000	1070	1060	107	106	75-133	1	20	
Methylene Chloride	ug/kg	1000	1110	1070	111	107	75-130	4	20	
n-Butylbenzene	ug/kg	1000	1280	1220	128	122	75-138	4	20	
n-Propylbenzene	ug/kg	1000	1240	1200	124	120	75-129	3	20	
Naphthalene	ug/kg	1000	1250	1170	125	117	73-128	7	20	
p-Isopropyltoluene	ug/kg	1000	1240	1190	124	119	75-134	4	20	
sec-Butylbenzene	ug/kg	1000	1270	1230	127	123	75-133	4	20	
Styrene	ug/kg	1000	1200	1170	120	117	75-125	3	20	
tert-Butylbenzene	ug/kg	1000	1180	1170	118	117	75-130	1	20	
Tetrachloroethene	ug/kg	1000	1260	1220	126	122	75-125	3	20	L0
Tetrahydrofuran	ug/kg	10000	10600	10300	106	103	75-133	3	20	
Toluene	ug/kg	1000	1220	1190	122	119	75-125	3	20	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098730

LABORATORY CONTROL SAMPLE & LCSD: 646960 646961

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
trans-1,2-Dichloroethene	ug/kg	1000	1110	1090	111	109	75-125	2	20	
trans-1,3-Dichloropropene	ug/kg	1000	1210	1170	121	117	65-129	3	20	
Trichloroethene	ug/kg	1000	1170	1150	117	115	75-132	2	20	
Trichlorofluoromethane	ug/kg	1000	1110	1070	111	107	30-150	4	20	
Vinyl chloride	ug/kg	1000	1010	988	101	99	75-125	2	20	
Xylene (Total)	ug/kg	3000	3630	3520	121	117	75-125	3	20	
1,2-Dichloroethane-d4 (S)	%				100	98	68-136			
4-Bromofluorobenzene (S)	%				116	111	68-126			
Dibromofluoromethane (S)	%				108	104	61-139			
Toluene-d8 (S)	%				119	115	68-133			

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 646962 646963

Parameter	Units	1098730002 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
1,1,1,2-Tetrachloroethane	ug/kg	ND	1200	1250	1250	1230	104	99	74-133	2	30	
1,1,1-Trichloroethane	ug/kg	ND	1200	1250	1210	1180	101	95	73-150	2	30	
1,1,2,2-Tetrachloroethane	ug/kg	ND	1200	1250	1210	1170	101	94	65-145	3	30	
1,1,2-Trichloroethane	ug/kg	ND	1200	1250	1180	1100	98	89	71-145	6	30	
1,1,2-Trichlorotrifluoroethane	ug/kg	ND	1200	1250	1520	1520	127	122	30-150	0	30	
1,1-Dichloroethane	ug/kg	ND	1200	1250	1150	1130	96	91	71-150	2	30	
1,1-Dichloroethene	ug/kg	ND	1200	1250	1270	1280	106	103	75-150	1	30	
1,1-Dichloropropene	ug/kg	ND	1200	1250	1290	1270	107	102	30-150	2	30	
1,2,3-Trichlorobenzene	ug/kg	ND	1200	1250	1270	1220	106	98	30-150	4	30	
1,2,3-Trichloropropane	ug/kg	ND	1200	1250	1190	1160	99	94	30-150	2	30	
1,2,4-Trichlorobenzene	ug/kg	ND	1200	1250	1320	1300	110	105	75-145	2	30	
1,2,4-Trimethylbenzene	ug/kg	ND	1200	1250	1300	1260	109	101	71-150	3	30	
1,2-Dibromo-3-chloropropane	ug/kg	ND	1200	1250	1190	1130	99	91	65-136	5	30	
1,2-Dibromoethane (EDB)	ug/kg	ND	1200	1250	1190	1150	99	92	75-145	3	30	
1,2-Dichlorobenzene	ug/kg	ND	1200	1250	1250	1220	104	98	75-140	3	30	
1,2-Dichloroethane	ug/kg	ND	1200	1250	1070	1030	89	83	73-146	4	30	
1,2-Dichloropropane	ug/kg	ND	1200	1250	1210	1180	101	95	75-147	3	30	
1,3,5-Trimethylbenzene	ug/kg	ND	1200	1250	1270	1240	106	100	70-150	2	30	
1,3-Dichlorobenzene	ug/kg	ND	1200	1250	1270	1230	106	99	75-141	3	30	
1,3-Dichloropropane	ug/kg	ND	1200	1250	1190	1150	99	92	30-150	3	30	
1,4-Dichlorobenzene	ug/kg	ND	1200	1250	1260	1230	105	99	75-139	2	30	
2,2-Dichloropropane	ug/kg	ND	1200	1250	1080	1030	90	83	30-150	5	30	
2-Butanone (MEK)	ug/kg	ND	1200	1250	1150	1120	96	90	41-150	2	30	
2-Chlorotoluene	ug/kg	ND	1200	1250	1230	1210	102	97	30-150	2	30	
4-Chlorotoluene	ug/kg	ND	1200	1250	1230	1220	103	98	30-150	1	30	
4-Methyl-2-pentanone (MIBK)	ug/kg	ND	1200	1250	1170	1150	98	93	60-150	2	30	
Acetone	ug/kg	ND	3000	3110	3190	2870	106	92	51-150	11	30	
Allyl chloride	ug/kg	ND	1200	1250	1100	1000	91	80	30-150	9	30	
Benzene	ug/kg	ND	1200	1250	1180	1150	98	92	73-150	2	30	
Bromobenzene	ug/kg	ND	1200	1250	1270	1270	106	102	30-150	0	30	
Bromochloromethane	ug/kg	ND	1200	1250	1150	1080	96	87	30-150	6	30	
Bromodichloromethane	ug/kg	ND	1200	1250	1160	1130	97	91	71-138	3	30	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098730

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 646962 646963

Parameter	Units	1098730002 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Bromoform	ug/kg	ND	2410	2490	2350	2310	98	93	64-128	2	30	
Bromomethane	ug/kg	ND	1200	1250	907	926	75	74	30-150	2	30	
Carbon tetrachloride	ug/kg	ND	1200	1250	1270	1240	106	100	67-150	3	30	
Chlorobenzene	ug/kg	ND	1200	1250	1240	1230	103	99	74-142	1	30	
Chloroethane	ug/kg	ND	1200	1250	975	956	81	77	30-150	2	30	
Chloroform	ug/kg	ND	1200	1250	1100	1080	92	87	74-150	2	30	
Chloromethane	ug/kg	ND	1200	1250	1020	1020	85	82	50-150	0	30	
cis-1,2-Dichloroethene	ug/kg	ND	1200	1250	1170	1130	98	91	75-147	4	30	
cis-1,3-Dichloropropene	ug/kg	ND	1200	1250	1230	1180	102	95	68-133	4	30	
Dibromochloromethane	ug/kg	ND	1200	1250	1180	1140	99	92	71-128	4	30	
Dibromomethane	ug/kg	ND	1200	1250	1140	1090	95	87	69-137	5	30	
Dichlorodifluoromethane	ug/kg	ND	1200	1250	1090	1170	90	94	50-150	8	30	
Dichlorofluoromethane	ug/kg	ND	1200	1250	1130	1110	94	89	50-150	2	30	
Diethyl ether (Ethyl ether)	ug/kg	ND	1200	1250	1150	1110	96	89	30-150	3	30	
Ethylbenzene	ug/kg	ND	1200	1250	1260	1230	105	99	74-150	2	30	
Hexachloro-1,3-butadiene	ug/kg	ND	1200	1250	1490	1450	124	117	54-150	2	30	
Isopropylbenzene (Cumene)	ug/kg	ND	1200	1250	1280	1240	106	100	75-150	3	30	
Methyl-tert-butyl ether	ug/kg	ND	1200	1250	1100	1050	92	85	70-142	4	30	
Methylene Chloride	ug/kg	ND	1200	1250	1130	1090	94	88	67-144	4	30	
n-Butylbenzene	ug/kg	ND	1200	1250	1360	1330	113	107	55-150	2	30	
n-Propylbenzene	ug/kg	ND	1200	1250	1330	1300	110	104	50-150	2	30	
Naphthalene	ug/kg	ND	1200	1250	1270	1250	106	101	64-150	1	30	
p-Isopropyltoluene	ug/kg	ND	1200	1250	1330	1300	111	104	75-138	2	30	
sec-Butylbenzene	ug/kg	ND	1200	1250	1350	1300	113	105	75-144	4	30	
Styrene	ug/kg	ND	1200	1250	1220	1180	102	95	75-144	3	30	
tert-Butylbenzene	ug/kg	ND	1200	1250	1270	1240	106	100	54-150	2	30	
Tetrachloroethene	ug/kg	ND	1200	1250	1360	1290	113	104	75-150	5	30	
Tetrahydrofuran	ug/kg	ND	12000	12500	11000	10600	92	85	50-150	4	30	
Toluene	ug/kg	ND	1200	1250	1250	1230	104	99	73-144	1	30	
trans-1,2-Dichloroethene	ug/kg	ND	1200	1250	1200	1190	100	96	75-150	1	30	
trans-1,3-Dichloropropene	ug/kg	ND	1200	1250	1200	1170	100	94	66-127	3	30	
Trichloroethene	ug/kg	ND	1200	1250	1250	1220	104	98	75-150	2	30	
Trichlorofluoromethane	ug/kg	ND	1200	1250	1200	1210	100	97	50-150	1	30	
Vinyl chloride	ug/kg	ND	1200	1250	1060	1100	88	89	50-150	4	30	
Xylene (Total)	ug/kg	ND	3600	3740	3750	3640	104	98	75-148	3	30	
1,2-Dichloroethane-d4 (S)	%						86	77	68-136			
4-Bromofluorobenzene (S)	%						99	91	68-126			
Dibromofluoromethane (S)	%						93	86	61-139			
Toluene-d8 (S)	%						104	95	68-133			

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098730

QC Batch: MERP/3602 Analysis Method: EPA 7471
QC Batch Method: EPA 7471 Analysis Description: 7471 Mercury
Associated Lab Samples: 1098730002, 1098730004, 1098730006

METHOD BLANK: 646671 Matrix: Solid
Associated Lab Samples: 1098730002, 1098730004, 1098730006

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Mercury	mg/kg	ND	0.018	07/08/09 13:35	

LABORATORY CONTROL SAMPLE: 646672

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Mercury	mg/kg	.45	0.46	101	80-120	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 646673 646674

Parameter	Units	1097946016 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Mercury	mg/kg	ND	.48	.45	0.52	0.49	107	107	80-120	6	20	

MATRIX SPIKE SAMPLE: 646707

Parameter	Units	1098733008 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
Mercury	mg/kg	0.035	.55	0.62	107	80-120	

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QUALIFIERS

Project: Ryan-Scherer
Pace Project No.: 1098730

DEFINITIONS

DF - Dilution Factor, if reported, represents the factor applied to the reported data due to changes in sample preparation, dilution of the sample aliquot, or moisture content.

ND - Not Detected at or above adjusted reporting limit.

J - Estimated concentration above the adjusted method detection limit and below the adjusted reporting limit.

MDL - Adjusted Method Detection Limit.

S - Surrogate

1,2-Diphenylhydrazine (8270 listed analyte) decomposes to Azobenzene.

Consistent with EPA guidelines, unrounded data are displayed and have been used to calculate % recovery and RPD values.

LCS(D) - Laboratory Control Sample (Duplicate)

MS(D) - Matrix Spike (Duplicate)

DUP - Sample Duplicate

RPD - Relative Percent Difference

NC - Not Calculable.

Pace Analytical is NELAP accredited. Contact your Pace PM for the current list of accredited analytes.

U - Indicates the compound was analyzed for, but not detected.

BATCH QUALIFIERS

Batch: GCV/6252

[M5] A matrix spike/matrix spike duplicate was not performed for this batch due to insufficient sample volume.

ANALYTE QUALIFIERS

1M Higher final volume.

L0 Analyte recovery in the laboratory control sample (LCS) was outside QC limits.

L1 Analyte recovery in the laboratory control sample (LCS) was above QC limits. Results may be biased high.

T6 High boiling point hydrocarbons are present in the sample.

* RUSH *

Chain of Custody

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Workorder: 1098730 **Workorder Name:** Ryan-Scherer **Results Requested** 7/9/2009

Report / Invoice To	Subcontract To
Carol Davy Pace Analytical Minnesota 1700 Elm Street Suite 200 Minneapolis, MN 55414 Phone (612)607-1700 Email: carol.davy@pacelabs.com	P.O. 1098730

Item	Sample ID	Collect Date/Time	Lab ID	Matrix	Preserved Containers: Unpreserved	Requested Analysis: Bulk Asbestos	LAB USE ONLY
1	B-1 1'-2'	7/6/2009 09:30	1098730001	Solid	1	X	
2	B-12 6"-1'	7/6/2009 15:30	1098730003	Solid	1	X	
3	B-3 6"-1'	7/7/2009 10:00	1098730005	Solid	1	X	
4							
5							

Comments

Transfers	Released By	Date/Time	Received By	Date/Time
1	Carol Davy / Pace MN	7/7/09 1345	Floyd Johnson - AES	7/8/09 10:45 AM
2				
3				
4				
5				

APPLIED ENVIRONMENTAL SCIENCES, INC.
BULK ASBESTOS LABORATORY WORKSHEET *(Revised August 15, 2007)*

RUSH

FOR LAB USE ONLY
Project: 09-361 Approved By:
Date Received: 7/8/09 Rec. By: Lloyd Johnson
Date Analyzed: 7/8/09 Anal. By: Lloyd Johnson
Customer Contact: Phone:
Fax: 7/9/09
Report Mailed:

Customer: Pace Analytical **Date sampled:** 7/6,7/09

Project Location / Number Ryan-Scherer **Page** 1 of 1

Customer ID # / Lab ID #	Sample Location	Sample Description (Include Color)	Description of Individual Layers: Layer	% of total sample	Percent Asbestos by Layer: Chrysotile	Amosite	Crocidolite	Tremolite	Actinolite	Antho-phyllite	Results / Notes
B-1 / 1300	1'-2'	Gray "soil" sample	1. 2. 3. 4. 5.								ND
B-12 / 1301	6"-1'	Gray "soil" sample	1. 2. 3. 4. 5.								<1% Chrysotile
B-3 / 1302	6"-1'	Brown-gray "soil" sample	1. 2. 3. 4. 5.								ND
			1. 2. 3. 4. 5.								
			1. 2. 3. 4. 5.								
			1. 2. 3. 4. 5.								

Samples Collected by: Customer

Released by / Date:

Applied Environmental Sciences, Inc.
8441 Wayzata Boulevard, Suite 103
Minneapolis, MN 55426
(763) 545-5510, Fax (763) 545-7883

* = Composite result. Please note asbestos content by layer.

ND = None Detected
NA = Not Analyzed

Analyzed by Polarized Light Microscopy, EPA Method 600/R-93/116

CHAIN-OF-CUSTODY / Analytical Request Document

1133

1098730

The Chain-of-Custody is a LEGAL DOCUMENT. All relevant fields must be completed accurately.

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RUSH!

Page: 1 of 1

1289300

Section A Required Client Information:		Section C Invoice Information:	
Company: Liesch Assoc	Report To: Mark Miller	Attention: Melody Hintzen	
Address: 13400 15th Ave N Plymouth, MN	Copy To: John Lichter	Company Name: Liesch	REGULATORY AGENCY
		Address:	☐ NPDES ☐ GROUND WATER ☐ DRINKING WATER
Email To: MarkMiller	Purchase Order No.:	Pace Quote Reference:	☐ UST ☐ RCRA ☐ OTHER
Phone: 763 489-3125 Fax: 489-3101	Project Name: Ryan-Scherer	Pace Project Manager:	Site Location STATE:
Requested Due Date/TAT:	Project Number:	Pace Profile #:	

ITEM #	Section D Required Client Information — SAMPLE ID (A-Z, 0-9 / ,-) Sample IDs MUST BE UNIQUE	MATRIX CODE (see valid codes to left)	SAMPLE TYPE (G=GRAB C=COMP)	COLLECTED: COMPOSITE START DATE	COMPOSITE START TIME	COMPOSITE END/GRAB DATE	COMPOSITE END/GRAB TIME	SAMPLE TEMP AT COLLECTION	# OF CONTAINERS	Preservatives: Unpreserved	H_2SO_4	HNO_3	HCl	NaOH	$Na_2S_2O_3$	Methanol	Other	Analysis Test Y/N	Requested Analysis Filtered (Y/N): Asbestos	VOC	GRO	DRO	RCRA metals w/o Solids	Residual Chlorine (Y/N)	Pace Project No./ Lab I.D.
1	B-1 1'-2'	SL	G			7-6-09	930		1	1																1098730001
2	B-1 12'-14'	SL	G				1000		2	4						4				2	2	2	1	1		002
3	B-12 6"-1'	SL	G				1330		1	1									1	-						003
4	B-12 11'-13'	SL	G				1330		2	4						4				2	2	2	1	1		004
5	B-3 6"-1'	SL	G			7-7-09	1000		1	1									1							005
6	B-3 7-9'	SL	G			7-7-09	1030		2	4						4				2	2	2	1	1		006
7																										
8																										
9																										
10																										
11																										
12																										

Matrix Codes (MATRIX / CODE): Drinking Water DW; Water WT; Waste Water WW; Product P; Soil/Solid SL; Oil OL; Wipe WP; Air AR; Tissue TS; Other OT

ADDITIONAL COMMENTS	RELINQUISHED BY / AFFILIATION	DATE	TIME	ACCEPTED BY / AFFILIATION	DATE	TIME	SAMPLE CONDITIONS: Temp in °C	Received on Ice (Y/N)	Custody Sealed Cooler (Y/N)	Samples Intact (Y/N)
Rush 2-day Turnaround	Tom Johnson Liesch	7-7-09	12:07pm	Shawn Davis	7-7-09	1209	4.8c	Y	N	Y

SAMPLER NAME AND SIGNATURE

PRINT Name of SAMPLER: Tom Johnson

SIGNATURE of SAMPLER: [signature] DATE Signed (MM/DD/YY): 7-7-09 12:07p

ORIGINAL

*Important Note: By signing this form you are accepting Pace's NET 30 day payment terms and agreeing to late charges of 1.5% per month for any invoices not paid within 30 days.

Sample Condition Upon Receipt

Pace Analytical

Client Name: Lirsch Project # 1098730

Courier: ☐ Fed Ex ☐ UPS ☐ USPS ☒ Client ☐ Commercial ☐ Pace Other _____

Tracking #: _____

Optional: Proj. Due Date: Proj. Name:

Custody Seal on Cooler/Box Present: ☐ yes ☒ no Seals intact: ☐ yes ☒ no

Packing Material: ☐ Bubble Wrap ☒ Bubble Bags ☐ None ☐ Other _____ Temp Blank: Yes ☒ No ☐

Thermometer Used: 80344042, (179425) Type of Ice: (Wet) (Blue) None ☐ Samples on ice, cooling process has begun

Cooler Temperature: 4-8° Biological Tissue Is Frozen: Yes No

Temp should be above freezing to 6°C

Date and Initials of person examining contents: BD 7-7-09

		Comments:
Chain of Custody Present:	☒Yes ☐No ☐N/A	1.
Chain of Custody Filled Out:	☒Yes ☐No ☐N/A	2.
Chain of Custody Relinquished:	☒Yes ☐No ☐N/A	3.
Sampler Name & Signature on COC:	☒Yes ☐No ☐N/A	4.
Samples Arrived within Hold Time:	☒Yes ☐No ☐N/A	5.
Short Hold Time Analysis (<72hr):	☐Yes ☒No ☐N/A	6.
Rush Turn Around Time Requested:	☒Yes ☐No ☐N/A	7.
Sufficient Volume:	☒Yes ☐No ☐N/A	8.
Correct Containers Used:	☒Yes ☐No ☐N/A	9.
-Pace Containers Used:	☒Yes ☐No ☐N/A	
Containers Intact:	☒Yes ☐No ☐N/A	10.
Filtered volume received for Dissolved tests	☐Yes ☒No ☐N/A	11.
Sample Labels match COC:	☐Yes ☒No ☐N/A	12.
-Includes date/time/ID/Analysis Matrix: SL		
All containers needing acid/base preservation have been checked. Noncompliance are noted in 13.	☐Yes ☐No ☒N/A	13. 2 jars-B-3 7-9' / 1 jar - B-12 6'1" / 1 Dry weight B-1- 12'14'
All containers needing preservation are found to be in compliance with EPA recommendation.	☐Yes ☐No ☒N/A	
Exceptions: VOA,Coliform, TOC, Oil and Grease, WI-DRO (water)	☐Yes ☒No	Initial when completed: BD Lot # of added preservative:
Samples checked for dechlorination:	☐Yes ☒No ☐N/A	14.
Headspace in VOA Vials (>6mm):	☐Yes ☐No ☒N/A	15.
Trip Blank Present:	☐Yes ☒No ☐N/A	16.
Trip Blank Custody Seals Present	☐Yes ☐No ☒N/A	
Pace Trip Blank Lot # (if purchased):		

Client Notification/ Resolution: Field Data Required? Y / N

Person Contacted: _____ Date/Time: _____

Comments/ Resolution: _____

Project Manager Review: _____ Date: 7-7-09

Note: Whenever there is a discrepancy affecting North Carolina compliance samples, a copy of this form will be sent to the North Carolina DEHNR Certification Office (i.e out of hold, incorrect preservative, out of temp, incorrect containers)

7/7/09

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Minneapolis, MN 55414
(612)607-1700

July 13, 2009

Tom Johnson
Liesch Associates, Inc.
13400 15th Avenue South
Plymouth, MN 55441

RE: Project: Ryan-Scherer
Pace Project No.: 1098927

Dear Tom Johnson:
Enclosed are the analytical results for sample(s) received by the laboratory on July 09, 2009. The results relate only to the samples included in this report. Results reported herein conform to the most current NELAC standards, where applicable, unless otherwise narrated in the body of the report.

If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Carol Davy

Carol Davy

carol.davy@pacelabs.com
Project Manager

Enclosures

REPORT OF LABORATORY ANALYSIS

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CERTIFICATIONS

Project: Ryan-Scherer
Pace Project No.: 1098927

Minnesota Certification IDs

Wisconsin Certification #: 999407970
Washington Certification #: C754
Alaska Certification #: UST-078
Arizona Certification #: AZ-0014
Tennessee Certification #: 02818
Pennsylvania Certification #: 68-00563
Oregon Certification #: MN200001
North Dakota Certification #: R-036
North Carolina Certification #: 530
New York Certification #: 11647
New Jersey Certification #: MN-002
Montana Certification #: MT CERT0092
Minnesota Certification #: 027-053-137
Maine Certification #: 2007029
Louisiana Certification #: LA080009
Louisiana Certification #: 03086
Kansas Certification #: E-10167
Iowa Certification #: 368
Illinois Certification #: 200011
Florida/NELAP Certification #: E87605
California Certification #: 01155CA

Montana Certification IDs

Montana Certification #: MT CERT0040
Idaho Certification #: MT00012
EPA Region 8 Certification #: 8TMS-Q

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SAMPLE SUMMARY

Project: Ryan-Scherer
Pace Project No.: 1098927

Lab ID	Sample ID	Matrix	Date Collected	Date Received
1098927001	B-2 6'-8'	Solid	07/09/09 09:00	07/09/09 14:35
1098927002	B-2 1-2'	Solid	07/09/09 09:00	07/09/09 14:35
1098927003	B-6 1-2'	Solid	07/09/09 12:00	07/09/09 14:35
1098927004	B-6 2'-4'	Solid	07/09/09 12:00	07/09/09 14:35
1098927005	VOA Blank	Solid		07/09/09 14:35

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SAMPLE ANALYTE COUNT

Project: Ryan-Scherer
Pace Project No.: 1098927

Lab ID	Sample ID	Method	Analysts	Analytes Reported
1098927001	B-2 6'-8'	% Moisture	MWD	1
		EPA 6010	IP	7
		EPA 7471	TEM	1
		EPA 8260	DJT	71
		WI MOD DRO	JLR	2
		WI MOD GRO	AMS1	2
1098927004	B-6 2'-4'	% Moisture	MWD	1
		EPA 6010	IP	7
		EPA 7471	TEM	1
		EPA 8260	DJT	71
		WI MOD DRO	JLR	2
		WI MOD GRO	AMS1	2
1098927005	VOA Blank	EPA 8260	DJT	71

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098927

Sample: B-2 6'-8' **Lab ID: 1098927001** Collected: 07/09/09 09:00 Received: 07/09/09 14:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
WIDRO GCS Silica Gel	Analytical Method: WI MOD DRO Preparation Method: WI MOD DRO								
Diesel Range Organics	**186**	mg/kg	20.8	10.4	2	07/10/09 14:44	07/13/09 13:36		T6
n-Triacontane (S)	64	%	50-150		2	07/10/09 14:44	07/13/09 13:36		
WIGRO GCV	Analytical Method: WI MOD GRO Preparation Method: TPH GRO/PVOC WI ext.								
Gasoline Range Organics	ND	mg/kg	5.4	2.7	1	07/10/09 11:03	07/10/09 16:41		
a,a,a-Trifluorotoluene (S)	95	%	80-125		1	07/10/09 11:03	07/10/09 16:41	98-08-8	
6010 MET ICP	Analytical Method: EPA 6010 Preparation Method: EPA 3050								
Arsenic	**7.7**	mg/kg	0.49	0.28	1	07/09/09 18:15	07/10/09 12:17	7440-38-2	
Barium	**75.8**	mg/kg	0.49	0.25	1	07/09/09 18:15	07/10/09 12:17	7440-39-3	
Cadmium	**0.32**	mg/kg	0.049	0.025	1	07/09/09 18:15	07/10/09 12:17	7440-43-9	
Chromium	**10.7**	mg/kg	0.49	0.25	1	07/09/09 18:15	07/10/09 12:17	7440-47-3	
Lead	**53.8**	mg/kg	0.30	0.15	1	07/09/09 18:15	07/10/09 12:17	7439-92-1	
Selenium	**0.91**	mg/kg	0.74	0.37	1	07/09/09 18:15	07/10/09 12:17	7782-49-2	
Silver	ND	mg/kg	0.49	0.25	1	07/09/09 18:15	07/10/09 12:17	7440-22-4	
7471 Mercury	Analytical Method: EPA 7471 Preparation Method: EPA 7471								
Mercury	ND	mg/kg	0.020	0.010	1	07/09/09 18:29	07/10/09 07:31	7439-97-6	
Dry Weight	Analytical Method: % Moisture								
Percent Moisture	**8.0**	%	0.10	0.10	1		07/09/09 00:00		
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Acetone	ND	ug/kg	523	262	1	07/10/09 11:59	07/10/09 18:51	67-64-1	
Allyl chloride	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	107-05-1	
Benzene	ND	ug/kg	52.3	26.2	1	07/10/09 11:59	07/10/09 18:51	71-43-2	
Bromobenzene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	108-86-1	
Bromochloromethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	74-97-5	
Bromodichloromethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	75-27-4	
Bromoform	ND	ug/kg	1050	209	1	07/10/09 11:59	07/10/09 18:51	75-25-2	
Bromomethane	ND	ug/kg	523	262	1	07/10/09 11:59	07/10/09 18:51	74-83-9	
2-Butanone (MEK)	ND	ug/kg	523	262	1	07/10/09 11:59	07/10/09 18:51	78-93-3	
n-Butylbenzene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	104-51-8	
sec-Butylbenzene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	135-98-8	
tert-Butylbenzene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	98-06-6	
Carbon tetrachloride	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	56-23-5	
Chlorobenzene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	108-90-7	
Chloroethane	ND	ug/kg	523	105	1	07/10/09 11:59	07/10/09 18:51	75-00-3	
Chloroform	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	67-66-3	
Chloromethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	74-87-3	
2-Chlorotoluene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	95-49-8	
4-Chlorotoluene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	106-43-4	
1,2-Dibromo-3-chloropropane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	96-12-8	
Dibromochloromethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	124-48-1	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098927

Sample: B-2 6'-8' **Lab ID: 1098927001** Collected: 07/09/09 09:00 Received: 07/09/09 14:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
1,2-Dibromoethane (EDB)	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	106-93-4	
Dibromomethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	74-95-3	
1,2-Dichlorobenzene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	95-50-1	
1,3-Dichlorobenzene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	541-73-1	
1,4-Dichlorobenzene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	106-46-7	
Dichlorodifluoromethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	75-71-8	
1,1-Dichloroethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	75-34-3	
1,2-Dichloroethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	107-06-2	
1,1-Dichloroethene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	75-35-4	
cis-1,2-Dichloroethene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	156-59-2	
trans-1,2-Dichloroethene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	156-60-5	
Dichlorofluoromethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	75-43-4	
1,2-Dichloropropane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	78-87-5	
1,3-Dichloropropane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	142-28-9	
2,2-Dichloropropane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	594-20-7	
1,1-Dichloropropene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	563-58-6	
cis-1,3-Dichloropropene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	10061-02-6	
Diethyl ether (Ethyl ether)	ND	ug/kg	523	262	1	07/10/09 11:59	07/10/09 18:51	60-29-7	
Ethylbenzene	ND	ug/kg	52.3	26.2	1	07/10/09 11:59	07/10/09 18:51	100-41-4	
Hexachloro-1,3-butadiene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	87-68-3	
Isopropylbenzene (Cumene)	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	98-82-8	
p-Isopropyltoluene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	99-87-6	
Methylene Chloride	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/kg	523	262	1	07/10/09 11:59	07/10/09 18:51	108-10-1	
Methyl-tert-butyl ether	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	1634-04-4	
Naphthalene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	91-20-3	
n-Propylbenzene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	103-65-1	
Styrene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	79-34-5	
Tetrachloroethene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	127-18-4	
Tetrahydrofuran	ND	ug/kg	2090	1050	1	07/10/09 11:59	07/10/09 18:51	109-99-9	
Toluene	ND	ug/kg	52.3	26.2	1	07/10/09 11:59	07/10/09 18:51	108-88-3	
1,2,3-Trichlorobenzene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	87-61-6	
1,2,4-Trichlorobenzene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	120-82-1	
1,1,1-Trichloroethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	71-55-6	
1,1,2-Trichloroethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	79-00-5	
Trichloroethene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	79-01-6	
Trichlorofluoromethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	75-69-4	
1,2,3-Trichloropropane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	96-18-4	
1,1,2-Trichlorotrifluoroethane	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	76-13-1	
1,2,4-Trimethylbenzene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	95-63-6	
1,3,5-Trimethylbenzene	ND	ug/kg	209	105	1	07/10/09 11:59	07/10/09 18:51	108-67-8	
Vinyl chloride	ND	ug/kg	52.3	26.2	1	07/10/09 11:59	07/10/09 18:51	75-01-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098927

Sample: B-2 6'-8' **Lab ID: 1098927001** Collected: 07/09/09 09:00 Received: 07/09/09 14:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Xylene (Total)	ND	ug/kg	157	78.5	1	07/10/09 11:59	07/10/09 18:51	1330-20-7	
Dibromofluoromethane (S)	104	%	61-139		1	07/10/09 11:59	07/10/09 18:51	1868-53-7	
1,2-Dichloroethane-d4 (S)	108	%	68-136		1	07/10/09 11:59	07/10/09 18:51	17060-07-0	
Toluene-d8 (S)	130	%	68-133		1	07/10/09 11:59	07/10/09 18:51	2037-26-5	
4-Bromofluorobenzene (S)	126	%	68-126		1	07/10/09 11:59	07/10/09 18:51	460-00-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098927

Sample: B-6 2'-4' **Lab ID: 1098927004** Collected: 07/09/09 12:00 Received: 07/09/09 14:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
WIDRO GCS Silica Gel	Analytical Method: WI MOD DRO Preparation Method: WI MOD DRO								
Diesel Range Organics	**69.9**	mg/kg	10.2	5.1	1	07/10/09 14:44	07/13/09 13:21		T6
n-Triacontane (S)	72	%	50-150		1	07/10/09 14:44	07/13/09 13:21		
WIGRO GCV	Analytical Method: WI MOD GRO Preparation Method: TPH GRO/PVOC WI ext.								
Gasoline Range Organics	ND	mg/kg	5.7	2.8	1	07/10/09 11:03	07/10/09 17:04		
a,a,a-Trifluorotoluene (S)	97	%	80-125		1	07/10/09 11:03	07/10/09 17:04	98-08-8	
6010 MET ICP	Analytical Method: EPA 6010 Preparation Method: EPA 3050								
Arsenic	**9.5**	mg/kg	0.45	0.25	1	07/09/09 18:15	07/10/09 12:35	7440-38-2	
Barium	**74.7**	mg/kg	0.45	0.23	1	07/09/09 18:15	07/10/09 12:35	7440-39-3	
Cadmium	**0.26**	mg/kg	0.045	0.023	1	07/09/09 18:15	07/10/09 12:35	7440-43-9	
Chromium	**17.0**	mg/kg	0.45	0.23	1	07/09/09 18:15	07/10/09 12:35	7440-47-3	
Lead	**53.2**	mg/kg	0.27	0.14	1	07/09/09 18:15	07/10/09 12:35	7439-92-1	
Selenium	**1.5**	mg/kg	0.68	0.34	1	07/09/09 18:15	07/10/09 12:35	7782-49-2	
Silver	ND	mg/kg	0.45	0.23	1	07/09/09 18:15	07/10/09 12:35	7440-22-4	
7471 Mercury	Analytical Method: EPA 7471 Preparation Method: EPA 7471								
Mercury	**0.070**	mg/kg	0.019	0.0097	1	07/09/09 18:29	07/10/09 07:32	7439-97-6	
Dry Weight	Analytical Method: % Moisture								
Percent Moisture	**11.5**	%	0.10	0.10	1		07/09/09 00:00		
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Acetone	ND	ug/kg	577	288	1	07/10/09 11:59	07/10/09 21:14	67-64-1	
Allyl chloride	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	107-05-1	
Benzene	ND	ug/kg	57.7	28.8	1	07/10/09 11:59	07/10/09 21:14	71-43-2	
Bromobenzene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	108-86-1	
Bromochloromethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	74-97-5	
Bromodichloromethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	75-27-4	
Bromoform	ND	ug/kg	1150	231	1	07/10/09 11:59	07/10/09 21:14	75-25-2	
Bromomethane	ND	ug/kg	577	288	1	07/10/09 11:59	07/10/09 21:14	74-83-9	
2-Butanone (MEK)	ND	ug/kg	577	288	1	07/10/09 11:59	07/10/09 21:14	78-93-3	
n-Butylbenzene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	104-51-8	
sec-Butylbenzene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	135-98-8	
tert-Butylbenzene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	98-06-6	
Carbon tetrachloride	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	56-23-5	
Chlorobenzene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	108-90-7	
Chloroethane	ND	ug/kg	577	115	1	07/10/09 11:59	07/10/09 21:14	75-00-3	
Chloroform	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	67-66-3	
Chloromethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	74-87-3	
2-Chlorotoluene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	95-49-8	
4-Chlorotoluene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	106-43-4	
1,2-Dibromo-3-chloropropane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	96-12-8	
Dibromochloromethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	124-48-1	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098927

Sample: B-6 2'-4' **Lab ID: 1098927004** Collected: 07/09/09 12:00 Received: 07/09/09 14:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
1,2-Dibromoethane (EDB)	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	106-93-4	
Dibromomethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	74-95-3	
1,2-Dichlorobenzene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	95-50-1	
1,3-Dichlorobenzene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	541-73-1	
1,4-Dichlorobenzene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	106-46-7	
Dichlorodifluoromethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	75-71-8	
1,1-Dichloroethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	75-34-3	
1,2-Dichloroethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	107-06-2	
1,1-Dichloroethene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	75-35-4	
cis-1,2-Dichloroethene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	156-59-2	
trans-1,2-Dichloroethene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	156-60-5	
Dichlorofluoromethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	75-43-4	
1,2-Dichloropropane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	78-87-5	
1,3-Dichloropropane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	142-28-9	
2,2-Dichloropropane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	594-20-7	
1,1-Dichloropropene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	563-58-6	
cis-1,3-Dichloropropene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	10061-02-6	
Diethyl ether (Ethyl ether)	ND	ug/kg	577	288	1	07/10/09 11:59	07/10/09 21:14	60-29-7	
Ethylbenzene	ND	ug/kg	57.7	28.8	1	07/10/09 11:59	07/10/09 21:14	100-41-4	
Hexachloro-1,3-butadiene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	87-68-3	
Isopropylbenzene (Cumene)	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	98-82-8	
p-Isopropyltoluene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	99-87-6	
Methylene Chloride	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/kg	577	288	1	07/10/09 11:59	07/10/09 21:14	108-10-1	
Methyl-tert-butyl ether	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	1634-04-4	
Naphthalene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	91-20-3	
n-Propylbenzene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	103-65-1	
Styrene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	79-34-5	
Tetrachloroethene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	127-18-4	
Tetrahydrofuran	ND	ug/kg	2310	1150	1	07/10/09 11:59	07/10/09 21:14	109-99-9	
Toluene	ND	ug/kg	57.7	28.8	1	07/10/09 11:59	07/10/09 21:14	108-88-3	
1,2,3-Trichlorobenzene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	87-61-6	
1,2,4-Trichlorobenzene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	120-82-1	
1,1,1-Trichloroethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	71-55-6	
1,1,2-Trichloroethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	79-00-5	
Trichloroethene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	79-01-6	
Trichlorofluoromethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	75-69-4	
1,2,3-Trichloropropane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	96-18-4	
1,1,2-Trichlorotrifluoroethane	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	76-13-1	
1,2,4-Trimethylbenzene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	95-63-6	
1,3,5-Trimethylbenzene	ND	ug/kg	231	115	1	07/10/09 11:59	07/10/09 21:14	108-67-8	
Vinyl chloride	ND	ug/kg	57.7	28.8	1	07/10/09 11:59	07/10/09 21:14	75-01-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098927

Sample: B-6 2'-4' **Lab ID: 1098927004** Collected: 07/09/09 12:00 Received: 07/09/09 14:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Xylene (Total)	ND	ug/kg	173	86.5	1	07/10/09 11:59	07/10/09 21:14	1330-20-7	
Dibromofluoromethane (S)	94	%	61-139		1	07/10/09 11:59	07/10/09 21:14	1868-53-7	
1,2-Dichloroethane-d4 (S)	90	%	68-136		1	07/10/09 11:59	07/10/09 21:14	17060-07-0	
Toluene-d8 (S)	103	%	68-133		1	07/10/09 11:59	07/10/09 21:14	2037-26-5	
4-Bromofluorobenzene (S)	100	%	68-126		1	07/10/09 11:59	07/10/09 21:14	460-00-4	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098927

Sample: VOA Blank **Lab ID: 1098927005** Collected: Received: 07/09/09 14:35 Matrix: Solid

Results reported on a "wet-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Acetone	ND	ug/kg	500	250	1	07/10/09 11:59	07/10/09 16:08	67-64-1	
Allyl chloride	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	107-05-1	
Benzene	ND	ug/kg	50.0	25.0	1	07/10/09 11:59	07/10/09 16:08	71-43-2	
Bromobenzene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	108-86-1	
Bromochloromethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	74-97-5	
Bromodichloromethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	75-27-4	
Bromoform	ND	ug/kg	1000	200	1	07/10/09 11:59	07/10/09 16:08	75-25-2	
Bromomethane	ND	ug/kg	500	250	1	07/10/09 11:59	07/10/09 16:08	74-83-9	
2-Butanone (MEK)	ND	ug/kg	500	250	1	07/10/09 11:59	07/10/09 16:08	78-93-3	
n-Butylbenzene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	104-51-8	
sec-Butylbenzene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	135-98-8	
tert-Butylbenzene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	98-06-6	
Carbon tetrachloride	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	56-23-5	
Chlorobenzene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	108-90-7	
Chloroethane	ND	ug/kg	500	100	1	07/10/09 11:59	07/10/09 16:08	75-00-3	
Chloroform	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	67-66-3	
Chloromethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	74-87-3	
2-Chlorotoluene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	95-49-8	
4-Chlorotoluene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	106-43-4	
1,2-Dibromo-3-chloropropane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	96-12-8	
Dibromochloromethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	106-93-4	
Dibromomethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	74-95-3	
1,2-Dichlorobenzene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	95-50-1	
1,3-Dichlorobenzene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	541-73-1	
1,4-Dichlorobenzene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	106-46-7	
Dichlorodifluoromethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	75-71-8	
1,1-Dichloroethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	75-34-3	
1,2-Dichloroethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	107-06-2	
1,1-Dichloroethene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	75-35-4	
cis-1,2-Dichloroethene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	156-59-2	
trans-1,2-Dichloroethene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	156-60-5	
Dichlorofluoromethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	75-43-4	
1,2-Dichloropropane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	78-87-5	
1,3-Dichloropropane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	142-28-9	
2,2-Dichloropropane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	594-20-7	
1,1-Dichloropropene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	563-58-6	
cis-1,3-Dichloropropene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	10061-02-6	
Diethyl ether (Ethyl ether)	ND	ug/kg	500	250	1	07/10/09 11:59	07/10/09 16:08	60-29-7	
Ethylbenzene	ND	ug/kg	50.0	25.0	1	07/10/09 11:59	07/10/09 16:08	100-41-4	
Hexachloro-1,3-butadiene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	87-68-3	
Isopropylbenzene (Cumene)	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	98-82-8	
p-Isopropyltoluene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	99-87-6	
Methylene Chloride	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	75-09-2	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098927

Sample: VOA Blank **Lab ID: 1098927005** Collected: Received: 07/09/09 14:35 Matrix: Solid

Results reported on a "wet-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
4-Methyl-2-pentanone (MIBK)	ND	ug/kg	500	250	1	07/10/09 11:59	07/10/09 16:08	108-10-1	
Methyl-tert-butyl ether	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	1634-04-4	
Naphthalene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	91-20-3	
n-Propylbenzene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	103-65-1	
Styrene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	79-34-5	
Tetrachloroethene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	127-18-4	
Tetrahydrofuran	ND	ug/kg	2000	1000	1	07/10/09 11:59	07/10/09 16:08	109-99-9	
Toluene	ND	ug/kg	50.0	25.0	1	07/10/09 11:59	07/10/09 16:08	108-88-3	
1,2,3-Trichlorobenzene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	87-61-6	
1,2,4-Trichlorobenzene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	120-82-1	
1,1,1-Trichloroethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	71-55-6	
1,1,2-Trichloroethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	79-00-5	
Trichloroethene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	79-01-6	
Trichlorofluoromethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	75-69-4	
1,2,3-Trichloropropane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	96-18-4	
1,1,2-Trichlorotrifluoroethane	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	76-13-1	
1,2,4-Trimethylbenzene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	95-63-6	
1,3,5-Trimethylbenzene	ND	ug/kg	200	100	1	07/10/09 11:59	07/10/09 16:08	108-67-8	
Vinyl chloride	ND	ug/kg	50.0	25.0	1	07/10/09 11:59	07/10/09 16:08	75-01-4	
Xylene (Total)	ND	ug/kg	150	75.0	1	07/10/09 11:59	07/10/09 16:08	1330-20-7	
Dibromofluoromethane (S)	104	%	61-139		1	07/10/09 11:59	07/10/09 16:08	1868-53-7	
1,2-Dichloroethane-d4 (S)	97	%	68-136		1	07/10/09 11:59	07/10/09 16:08	17060-07-0	
Toluene-d8 (S)	112	%	68-133		1	07/10/09 11:59	07/10/09 16:08	2037-26-5	
4-Bromofluorobenzene (S)	112	%	68-126		1	07/10/09 11:59	07/10/09 16:08	460-00-4	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098927

QC Batch: MPRP/16375
QC Batch Method: % Moisture
Analysis Method: % Moisture
Analysis Description: Dry Weight/Percent Moisture
Associated Lab Samples: 1098927001, 1098927004

SAMPLE DUPLICATE: 647951

Parameter	Units	1098943001 Result	Dup Result	RPD	Max RPD	Qualifiers
Percent Moisture	%	10.2	9.9	2	30	

SAMPLE DUPLICATE: 647952

Parameter	Units	1098896001 Result	Dup Result	RPD	Max RPD	Qualifiers
Percent Moisture	%	10.8	10.8	0	30	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098927

QC Batch: MSV/12637 Analysis Method: EPA 8260
QC Batch Method: EPA 5035/5030B Analysis Description: 8260 MSV 5030 Med Level
Associated Lab Samples: 1098927001, 1098927004, 1098927005

METHOD BLANK: 648305 Matrix: Solid
Associated Lab Samples: 1098927001, 1098927004, 1098927005

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
1,1,1,2-Tetrachloroethane	ug/kg	ND	200	07/10/09 15:48	
1,1,1-Trichloroethane	ug/kg	ND	200	07/10/09 15:48	
1,1,2,2-Tetrachloroethane	ug/kg	ND	200	07/10/09 15:48	
1,1,2-Trichloroethane	ug/kg	ND	200	07/10/09 15:48	
1,1,2-Trichlorotrifluoroethane	ug/kg	ND	200	07/10/09 15:48	
1,1-Dichloroethane	ug/kg	ND	200	07/10/09 15:48	
1,1-Dichloroethene	ug/kg	ND	200	07/10/09 15:48	
1,1-Dichloropropene	ug/kg	ND	200	07/10/09 15:48	
1,2,3-Trichlorobenzene	ug/kg	ND	200	07/10/09 15:48	
1,2,3-Trichloropropane	ug/kg	ND	200	07/10/09 15:48	
1,2,4-Trichlorobenzene	ug/kg	ND	200	07/10/09 15:48	
1,2,4-Trimethylbenzene	ug/kg	ND	200	07/10/09 15:48	
1,2-Dibromo-3-chloropropane	ug/kg	ND	200	07/10/09 15:48	
1,2-Dibromoethane (EDB)	ug/kg	ND	200	07/10/09 15:48	
1,2-Dichlorobenzene	ug/kg	ND	200	07/10/09 15:48	
1,2-Dichloroethane	ug/kg	ND	200	07/10/09 15:48	
1,2-Dichloropropane	ug/kg	ND	200	07/10/09 15:48	
1,3,5-Trimethylbenzene	ug/kg	ND	200	07/10/09 15:48	
1,3-Dichlorobenzene	ug/kg	ND	200	07/10/09 15:48	
1,3-Dichloropropane	ug/kg	ND	200	07/10/09 15:48	
1,4-Dichlorobenzene	ug/kg	ND	200	07/10/09 15:48	
2,2-Dichloropropane	ug/kg	ND	200	07/10/09 15:48	
2-Butanone (MEK)	ug/kg	ND	500	07/10/09 15:48	
2-Chlorotoluene	ug/kg	ND	200	07/10/09 15:48	
4-Chlorotoluene	ug/kg	ND	200	07/10/09 15:48	
4-Methyl-2-pentanone (MIBK)	ug/kg	ND	500	07/10/09 15:48	
Acetone	ug/kg	ND	500	07/10/09 15:48	
Allyl chloride	ug/kg	ND	200	07/10/09 15:48	
Benzene	ug/kg	ND	50.0	07/10/09 15:48	
Bromobenzene	ug/kg	ND	200	07/10/09 15:48	
Bromochloromethane	ug/kg	ND	200	07/10/09 15:48	
Bromodichloromethane	ug/kg	ND	200	07/10/09 15:48	
Bromoform	ug/kg	ND	1000	07/10/09 15:48	
Bromomethane	ug/kg	ND	500	07/10/09 15:48	
Carbon tetrachloride	ug/kg	ND	200	07/10/09 15:48	
Chlorobenzene	ug/kg	ND	200	07/10/09 15:48	
Chloroethane	ug/kg	ND	500	07/10/09 15:48	
Chloroform	ug/kg	ND	200	07/10/09 15:48	
Chloromethane	ug/kg	ND	200	07/10/09 15:48	
cis-1,2-Dichloroethene	ug/kg	ND	200	07/10/09 15:48	
cis-1,3-Dichloropropene	ug/kg	ND	200	07/10/09 15:48	
Dibromochloromethane	ug/kg	ND	200	07/10/09 15:48	
Dibromomethane	ug/kg	ND	200	07/10/09 15:48	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098927

METHOD BLANK: 648305 Matrix: Solid

Associated Lab Samples: 1098927001, 1098927004, 1098927005

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Dichlorodifluoromethane	ug/kg	ND	200	07/10/09 15:48	
Dichlorofluoromethane	ug/kg	ND	200	07/10/09 15:48	
Diethyl ether (Ethyl ether)	ug/kg	ND	500	07/10/09 15:48	
Ethylbenzene	ug/kg	ND	50.0	07/10/09 15:48	
Hexachloro-1,3-butadiene	ug/kg	ND	200	07/10/09 15:48	
Isopropylbenzene (Cumene)	ug/kg	ND	200	07/10/09 15:48	
Methyl-tert-butyl ether	ug/kg	ND	200	07/10/09 15:48	
Methylene Chloride	ug/kg	ND	200	07/10/09 15:48	
n-Butylbenzene	ug/kg	ND	200	07/10/09 15:48	
n-Propylbenzene	ug/kg	ND	200	07/10/09 15:48	
Naphthalene	ug/kg	ND	200	07/10/09 15:48	
p-Isopropyltoluene	ug/kg	ND	200	07/10/09 15:48	
sec-Butylbenzene	ug/kg	ND	200	07/10/09 15:48	
Styrene	ug/kg	ND	200	07/10/09 15:48	
tert-Butylbenzene	ug/kg	ND	200	07/10/09 15:48	
Tetrachloroethene	ug/kg	ND	200	07/10/09 15:48	
Tetrahydrofuran	ug/kg	ND	2000	07/10/09 15:48	
Toluene	ug/kg	ND	50.0	07/10/09 15:48	
trans-1,2-Dichloroethene	ug/kg	ND	200	07/10/09 15:48	
trans-1,3-Dichloropropene	ug/kg	ND	200	07/10/09 15:48	
Trichloroethene	ug/kg	ND	200	07/10/09 15:48	
Trichlorofluoromethane	ug/kg	ND	200	07/10/09 15:48	
Vinyl chloride	ug/kg	ND	50.0	07/10/09 15:48	
Xylene (Total)	ug/kg	ND	150	07/10/09 15:48	
1,2-Dichloroethane-d4 (S)	%	108	68-136	07/10/09 15:48	
4-Bromofluorobenzene (S)	%	126	68-126	07/10/09 15:48	
Dibromofluoromethane (S)	%	113	61-139	07/10/09 15:48	
Toluene-d8 (S)	%	125	68-133	07/10/09 15:48	

LABORATORY CONTROL SAMPLE & LCSD: 648306 648307

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
1,1,1,2-Tetrachloroethane	ug/kg	1000	1100	1120	110	112	75-125	2	20	
1,1,1-Trichloroethane	ug/kg	1000	1090	1080	109	108	75-130	1	20	
1,1,2,2-Tetrachloroethane	ug/kg	1000	1010	1020	101	102	70-139	1	20	
1,1,2-Trichloroethane	ug/kg	1000	1010	1010	101	101	75-125	0	20	
1,1,2-Trichlorotrifluoroethane	ug/kg	1000	1430	1460	143	146	58-142	2	20	L3
1,1-Dichloroethane	ug/kg	1000	1040	1030	104	103	75-126	1	20	
1,1-Dichloroethene	ug/kg	1000	1180	1170	118	117	71-127	0	20	
1,1-Dichloropropene	ug/kg	1000	1150	1160	115	116	75-125	1	20	
1,2,3-Trichlorobenzene	ug/kg	1000	1000	970	100	97	75-133	3	20	
1,2,3-Trichloropropane	ug/kg	1000	1040	1040	104	104	75-126	0	20	
1,2,4-Trichlorobenzene	ug/kg	1000	1080	1050	108	105	75-134	3	20	
1,2,4-Trimethylbenzene	ug/kg	1000	1150	1110	115	111	75-136	3	20	
1,2-Dibromo-3-chloropropane	ug/kg	1000	952	958	95	96	69-136	1	20	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098927

LABORATORY CONTROL SAMPLE & LCSD: 648306 648307

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
1,2-Dibromoethane (EDB)	ug/kg	1000	1030	1050	103	105	75-125	2	20	
1,2-Dichlorobenzene	ug/kg	1000	1090	1090	109	109	75-125	0	20	
1,2-Dichloroethane	ug/kg	1000	950	943	95	94	75-135	1	20	
1,2-Dichloropropane	ug/kg	1000	1090	1070	109	107	75-125	2	20	
1,3,5-Trimethylbenzene	ug/kg	1000	1150	1110	115	111	75-136	3	20	
1,3-Dichlorobenzene	ug/kg	1000	1140	1110	114	111	75-125	3	20	
1,3-Dichloropropane	ug/kg	1000	1040	1070	104	107	75-125	2	20	
1,4-Dichlorobenzene	ug/kg	1000	1130	1100	113	110	75-125	2	20	
2,2-Dichloropropane	ug/kg	1000	941	1030	94	103	30-150	9	20	
2-Butanone (MEK)	ug/kg	1000	1050	1050	105	105	49-149	0	20	
2-Chlorotoluene	ug/kg	1000	1120	1100	112	110	75-125	2	20	
4-Chlorotoluene	ug/kg	1000	1120	1090	112	109	75-126	3	20	
4-Methyl-2-pentanone (MIBK)	ug/kg	1000	901	942	90	94	73-134	4	20	
Acetone	ug/kg	2500	2770	2660	111	107	57-150	4	20	
Allyl chloride	ug/kg	1000	813	975	81	97	69-139	18	20	
Benzene	ug/kg	1000	1060	1060	106	106	75-130	0	20	
Bromobenzene	ug/kg	1000	1120	1130	112	113	75-125	1	20	
Bromochloromethane	ug/kg	1000	1020	1030	102	103	75-125	1	20	
Bromodichloromethane	ug/kg	1000	1040	1030	104	103	75-130	1	20	
Bromoform	ug/kg	2000	2020	2090	101	105	75-128	4	20	
Bromomethane	ug/kg	1000	824	880	82	88	47-150	7	20	
Carbon tetrachloride	ug/kg	1000	1130	1160	113	116	67-138	2	20	
Chlorobenzene	ug/kg	1000	1110	1120	111	112	75-125	1	20	
Chloroethane	ug/kg	1000	920	907	92	91	54-150	1	20	
Chloroform	ug/kg	1000	979	1000	98	100	75-131	3	20	
Chloromethane	ug/kg	1000	894	915	89	91	65-126	2	20	
cis-1,2-Dichloroethene	ug/kg	1000	1030	1050	103	105	75-125	2	20	
cis-1,3-Dichloropropene	ug/kg	1000	1080	1080	108	108	75-125	0	20	
Dibromochloromethane	ug/kg	1000	1060	1090	106	109	75-125	2	20	
Dibromomethane	ug/kg	1000	986	1010	99	101	75-125	2	20	
Dichlorodifluoromethane	ug/kg	1000	961	996	96	100	37-125	4	20	
Dichlorofluoromethane	ug/kg	1000	1030	1040	103	104	30-150	1	20	
Diethyl ether (Ethyl ether)	ug/kg	1000	972	995	97	100	67-135	2	20	
Ethylbenzene	ug/kg	1000	1130	1140	113	114	75-125	0	20	
Hexachloro-1,3-butadiene	ug/kg	1000	1200	1250	120	125	75-150	4	20	
Isopropylbenzene (Cumene)	ug/kg	1000	1160	1160	116	116	75-125	0	20	
Methyl-tert-butyl ether	ug/kg	1000	910	951	91	95	75-133	4	20	
Methylene Chloride	ug/kg	1000	1010	1010	101	101	75-130	1	20	
n-Butylbenzene	ug/kg	1000	1150	1100	115	110	75-138	5	20	
n-Propylbenzene	ug/kg	1000	1190	1160	119	116	75-129	2	20	
Naphthalene	ug/kg	1000	898	890	90	89	73-128	1	20	
p-Isopropyltoluene	ug/kg	1000	1170	1150	117	115	75-134	2	20	
sec-Butylbenzene	ug/kg	1000	1220	1200	122	120	75-133	2	20	
Styrene	ug/kg	1000	1090	1090	109	109	75-125	0	20	
tert-Butylbenzene	ug/kg	1000	1130	1120	113	112	75-130	1	20	
Tetrachloroethene	ug/kg	1000	1200	1200	120	120	75-125	0	20	
Tetrahydrofuran	ug/kg	10000	8860	9210	89	92	75-133	4	20	
Toluene	ug/kg	1000	1140	1150	114	115	75-125	1	20	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098927

LABORATORY CONTROL SAMPLE & LCSD: 648306 648307

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
trans-1,2-Dichloroethene	ug/kg	1000	1080	1080	108	108	75-125	0	20	
trans-1,3-Dichloropropene	ug/kg	1000	1020	1040	102	104	65-129	3	20	
Trichloroethene	ug/kg	1000	1120	1120	112	112	75-132	0	20	
Trichlorofluoromethane	ug/kg	1000	1120	1160	112	116	30-150	3	20	
Vinyl chloride	ug/kg	1000	987	999	99	100	75-125	1	20	
Xylene (Total)	ug/kg	3000	3360	3390	112	113	75-125	1	20	
1,2-Dichloroethane-d4 (S)	%				94	92	68-136			
4-Bromofluorobenzene (S)	%				105	105	68-126			
Dibromofluoromethane (S)	%				99	100	61-139			
Toluene-d8 (S)	%				111	111	68-133			

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098927

QC Batch: MPRP/16374
QC Batch Method: EPA 3050
Analysis Method: EPA 6010
Analysis Description: 6010 MET
Associated Lab Samples: 1098927001, 1098927004

METHOD BLANK: 647928 Matrix: Solid
Associated Lab Samples: 1098927001, 1098927004

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Arsenic	mg/kg	ND	0.42	07/10/09 12:08	
Barium	mg/kg	ND	0.42	07/10/09 12:08	
Cadmium	mg/kg	ND	0.042	07/10/09 12:08	
Chromium	mg/kg	ND	0.42	07/10/09 12:08	
Lead	mg/kg	ND	0.25	07/10/09 12:08	
Selenium	mg/kg	ND	0.63	07/10/09 12:08	
Silver	mg/kg	ND	0.42	07/10/09 12:08	

LABORATORY CONTROL SAMPLE: 647929

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Arsenic	mg/kg	43.5	40.8	94	80-120	
Barium	mg/kg	43.5	43.0	99	80-120	
Cadmium	mg/kg	43.5	41.1	95	80-120	
Chromium	mg/kg	43.5	43.1	99	80-120	
Lead	mg/kg	43.5	41.8	96	80-120	
Selenium	mg/kg	43.5	39.2	90	80-120	
Silver	mg/kg	21.7	20.7	95	80-120	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 647930 647931

Parameter	Units	1098927001 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Arsenic	mg/kg	7.7	38.6	39.7	47.5	46.2	103	97	75-125	3	30	
Barium	mg/kg	75.8	38.6	39.7	116	105	104	75	75-125	10	30	
Cadmium	mg/kg	0.32	38.6	39.7	38.6	38.7	99	97	75-125	0	30	
Chromium	mg/kg	10.7	38.6	39.7	50.9	49.7	104	98	75-125	2	30	
Lead	mg/kg	53.8	38.6	39.7	83.6	83.8	78	76	75-125	0	30	
Selenium	mg/kg	0.91	38.6	39.7	37.1	37.4	94	92	75-125	1	30	
Silver	mg/kg	ND	19.2	19.8	19.3	19.5	100	98	75-125	1	30	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098927

QC Batch: MERP/3610 Analysis Method: EPA 7471
QC Batch Method: EPA 7471 Analysis Description: 7471 Mercury
Associated Lab Samples: 1098927001, 1098927004

METHOD BLANK: 647935 Matrix: Solid
Associated Lab Samples: 1098927001, 1098927004

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Mercury	mg/kg	ND	0.017	07/10/09 07:20	

LABORATORY CONTROL SAMPLE: 647936

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Mercury	mg/kg	.5	0.52	105	80-120	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 647937 647938

Parameter	Units	1098613001 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Mercury	mg/kg	0.013J	.49	.46	0.54	0.50	107	106	80-120	6	20	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098927

QC Batch: OEXT/11090 Analysis Method: WI MOD DRO
QC Batch Method: WI MOD DRO Analysis Description: WIDRO Solid GCV
Associated Lab Samples: 1098927001, 1098927004

METHOD BLANK: 647978 Matrix: Solid
Associated Lab Samples: 1098927001, 1098927004

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Diesel Range Organics	mg/kg	ND	10.0	07/10/09 15:43	
n-Triacontane (S)	%	79	50-150	07/10/09 15:43	

LABORATORY CONTROL SAMPLE & LCSD: 647979 647980

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
Diesel Range Organics	mg/kg	80	55.7	57.3	70	72	70-120	3	20	
n-Triacontane (S)	%				76	71	50-150			

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098927

QC Batch: GCV/6261 Analysis Method: WI MOD GRO
QC Batch Method: TPH GRO/PVOC WI ext. Analysis Description: WIGRO Solid GCV
Associated Lab Samples: 1098927001, 1098927004

METHOD BLANK: 648217 Matrix: Solid
Associated Lab Samples: 1098927001, 1098927004

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Gasoline Range Organics	mg/kg	ND	5.0	07/10/09 15:33	
a,a,a-Trifluorotoluene (S)	%	94	80-125	07/10/09 15:33	

LABORATORY CONTROL SAMPLE & LCSD: 648218 648219

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
Gasoline Range Organics	mg/kg	50	55.9	53.1	112	106	80-120	5	20	
a,a,a-Trifluorotoluene (S)	%				100	98	80-125			

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QUALIFIERS

Project: Ryan-Scherer
Pace Project No.: 1098927

DEFINITIONS

DF - Dilution Factor, if reported, represents the factor applied to the reported data due to changes in sample preparation, dilution of the sample aliquot, or moisture content.

ND - Not Detected at or above adjusted reporting limit.

J - Estimated concentration above the adjusted method detection limit and below the adjusted reporting limit.

MDL - Adjusted Method Detection Limit.

S - Surrogate

1,2-Diphenylhydrazine (8270 listed analyte) decomposes to Azobenzene.

Consistent with EPA guidelines, unrounded data are displayed and have been used to calculate % recovery and RPD values.

LCS(D) - Laboratory Control Sample (Duplicate)

MS(D) - Matrix Spike (Duplicate)

DUP - Sample Duplicate

RPD - Relative Percent Difference

NC - Not Calculable.

Pace Analytical is NELAP accredited. Contact your Pace PM for the current list of accredited analytes.

U - Indicates the compound was analyzed for, but not detected.

BATCH QUALIFIERS

Batch: MSV/12638

[M5] A matrix spike/matrix spike duplicate was not performed for this batch due to insufficient sample volume.

ANALYTE QUALIFIERS

L3 Analyte recovery in the laboratory control sample (LCS) exceeded QC limits. Analyte presence below reporting limits in associated samples. Results unaffected by high bias.

T6 High boiling point hydrocarbons are present in the sample.

APPLIED ENVIRONMENTAL SCIENCES, INC.
BULK ASBESTOS LABORATORY WORKSHEET *(Revised August 15, 2007)*

RUSH

FOR LAB USE ONLY
Project: 09-267 Approved By: ______
Date Received: 7/10/09 Rec. By: Lloyd Johnson
Date Analyzed: 7/11/09 Anal. By: Lloyd Johnson
Customer Contact: Phone: ______
Fax: ______
Report Mailed: ______

Customer: Pace Analytical **Date sampled:** 7/9/09

Project Location / Number Ryan - Scherer Workorder / P.O. # 1098927 **Page** 1 **of** 1

Customer ID # / Lab ID #	Sample Location	Sample Description (Include Color)	Layer	% of total sample	Chrysotile	Amosite	Crocidolite	Tremolite	Actinolite	Antho-phyllite	Results / Notes
B-2 / 1317	1-2'	Brown granular	1. 2. 3. 4. 5.								ND
B-6 / 1318	1-2'	Brown-gray granular	1. 2. 3. 4. 5.								ND
			1. 2. 3. 4. 5.								
			1. 2. 3. 4. 5.								
			1. 2. 3. 4. 5.								
			1. 2. 3. 4. 5.								

Samples Collected by: Customer

Released by / Date: ______

Applied Environmental Sciences, Inc.
8441 Wayzata Boulevard, Suite 103
Minneapolis, MN 55426
(763) 545-5510, Fax (763) 545-7883

* = Composite result. Please note asbestos content by layer.

ND = None Detected
NA = Not Analyzed

Analyzed by Polarized Light Microscopy, EPA Method 600/R-93/116

* RUSH *

Chain of Custody

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Workorder: 1098927 **Workorder Name:** Ryan-Scherer **Results Requested** 7/13/2009

Report / Invoice To	Subcontract To
Carol Davy Pace Analytical Minnesota 1700 Elm Street Suite 200 Minneapolis, MN 55414 Phone (612)607-1700 Email: carol.davy@pacelabs.com	P.O. 1098927

Item	Sample ID	Collect Date/Time	Lab ID	Matrix	Preserved Containers: Unpreserved	Requested Analysis: Bulk Asbestos	LAB USE ONLY
1	B-2 1-2'	7/9/2009 09:00	1098927002	Solid	1	X	
2	B-6 1-2'	7/9/2009 12:00	1098927003	Solid	1	X	
3							
4							
5							

Transfers	Released By	Date/Time	Received By	Date/Time
1	David Davy / Pace MN	7/9/09 1100		
2				
3				
4				
5				

Comments

CHAIN-OF-CUSTODY / Analytical Request Document

The Chain-of-Custody is a LEGAL DOCUMENT. All relevant fields must be completed accurately.

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1098927

Page: 1 of 1

1203216

Section A Required Client Information:

- Company: Liesch Associates
- Address: 13400 15th Ave N, Plymouth, MN
- Email To: Mark Miller
- Phone: 763-489-3125 Fax: 489-3101
- Requested Due Date/TAT: Monday July 13

Section B Required Project Information:

- Report To: Mark Miller
- Copy To: John Lichter
- Purchase Order No.:
- Project Name: Ryan-Scherer
- Project Number:

Section C Invoice Information:

- Attention: Melody Aintzen
- Company Name: Liesch
- Address: Same
- Pace Quote Reference:
- Pace Project Manager:
- Pace Profile #:

REGULATORY AGENCY

☐ NPDES ☐ GROUND WATER ☐ DRINKING WATER
☐ UST ☐ RCRA ☐ OTHER

Site Location STATE: MN

Section D Required Client Information

Matrix Codes (MATRIX / CODE): Drinking Water DW, Water WT, Waste Water WW, Product P, Soil/Solid SL, Oil OL, Wipe WP, Air AR, Tissue TS, Other OT

SAMPLE ID (A-Z, 0-9 / ,-) Sample IDs MUST BE UNIQUE

Collected: COMPOSITE START / COMPOSITE END/GRAB (GRAB circled)

ITEM #	SAMPLE ID	MATRIX CODE	SAMPLE TYPE (G=GRAB C=COMP)	Composite Start Date	Composite Start Time	End/Grab Date	End/Grab Time	SAMPLE TEMP AT COLLECTION	# OF CONTAINERS	Unpreserved	H_2SO_4	HNO_3	HCl	NaOH	$Na_2S_2O_3$	Methanol	Other	Asbestos	VOC	GRO	DRO	RCRA Metals	% Solids	Residual Chlorine (Y/N)	Pace Project No./ Lab I.D.
1	B-2 6'-8'	SL	G			7-9-09	0900		8	4						4			2	2	2	1	1		1098927001
2	B-2 1'-2'	SL	G			7-9-09	0900		1	1								1							002
3	B-6 1-2	SL	G			7-9-09	1200		1	1								1							003
4	B-6 2'-4'	SL	G			7-9-09	1200		2	4						4			2	2	2	1	1		004
5	VOC Blank																		1						005
6																									
7																									
8																									
9																									
10																									
11																									
12																									

ADDITIONAL COMMENTS	RELINQUISHED BY / AFFILIATION	DATE	TIME	ACCEPTED BY / AFFILIATION	DATE	TIME	Temp in °C	Received on Ice (Y/N)	Custody Sealed Cooler (Y/N)	Samples Intact (Y/N)
Rush 2 day turn!	Tom Johnson - Liesch	7-9-09	1435	O Hunter / Pace	7/9/09	1435	3.0	Y	N	Y

ORIGINAL

SAMPLER NAME AND SIGNATURE

- PRINT Name of SAMPLER: Tom Johnson
- SIGNATURE of SAMPLER: [signature]
- DATE Signed (MM/DD/YY): 7/9/09 1435

*Important Note: By signing this form you are accepting Pace's NET 30 day payment terms and agreeing to late charges of 1.5% per month for any invoices not paid within 30 days.

F-ALL-Q-020rev.07, 15-May-2007

Sample Condition Upon Receipt

Pace Analytical

Client Name: Lesch Project # 1098927

Courier: ☐ Fed Ex ☐ UPS ☐ USPS ☑ Client ☐ Commercial ☐ Pace Other _____

Tracking #: _____ [redacted]

Custody Seal on Cooler/Box Present: ☐ yes ☑ no Seals intact: ☐ yes ☐ no

Packing Material: ☐ Bubble Wrap ☑ Bubble Bags ☐ None ☐ Other _____ Temp Blank: Yes ✓ No _____

Thermometer Used 80344042, 179425 Type of Ice: (Wet) Blue None ☐ Samples on Ice, cooling process has begun

Cooler Temperature 3.0 Biological Tissue is Frozen: Yes No

Date and Initials of person examining contents: 7/9/09 BH

Temp should be above freezing to 6°C Comments:

Chain of Custody Present:	☑Yes ☐No ☐N/A	1.
Chain of Custody Filled Out:	☑Yes ☐No ☐N/A	2.
Chain of Custody Relinquished:	☑Yes ☐No ☐N/A	3.
Sampler Name & Signature on COC:	☑Yes ☐No ☐N/A	4.
Samples Arrived within Hold Time:	☑Yes ☐No ☐N/A	5.
Short Hold Time Analysis (<72hr):	☐Yes ☑No ☐N/A	6.
Rush Turn Around Time Requested:	☑Yes ☐No ☐N/A	7. 7/12
Sufficient Volume:	☑Yes ☐No ☐N/A	8.
Correct Containers Used:	☑Yes ☐No ☐N/A	9.
-Pace Containers Used:	☑Yes ☐No ☐N/A	
Containers Intact:	☑Yes ☐No ☐N/A	10.
Filtered volume received for Dissolved tests	☐Yes ☑No ☐N/A	11.
Sample Labels match COC:	☐Yes ☑No ☐N/A	12. B-6 1-2 on the COC B 6 2-4 on the cont
-Includes date/time/ID/Analysis Matrix: SL		
All containers needing acid/base preservation have been checked. Noncompliance are noted in 13.	☐Yes ☑No ☐N/A	13. Asbestos
All containers needing preservation are found to be in compliance with EPA recommendation.	☐Yes ☑No ☐N/A	
Exceptions: VOA,Coliform, TOC, Oil and Grease, WI-DRO (water)	☐Yes ☐No	Initial when completed / Lot # of added preservative
Samples checked for dechlorination:	☐Yes ☐No ☑N/A	14.
Headspace in VOA Vials (>6mm):	☐Yes ☐No ☑N/A	15.
Trip Blank Present:	☑Yes ☐No ☐N/A	16. 1 TB
Trip Blank Custody Seals Present	☑Yes ☐No ☐N/A	
Pace Trip Blank Lot # (if purchased): 052509-3		

Client Notification/ Resolution: Field Data Required? Y / N

Person Contacted: Tom Brunner Date/Time: 7-10-09 1320

Comments/ Resolution:

Should be B-6 1-2'

Project Manager Review: AMD **Date:** 7-10-09

REV 7/9/09 BH

Note: Whenever there is a discrepancy affecting North Carolina compliance samples, a copy of this form will be sent to the North Carolina DEHNR Certification Office (i.e out of hold, incorrect preservative, out of temp, incorrect containers)

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July 14, 2009

Tom Johnson
Liesch Associates, Inc.
13400 15th Avenue South
Plymouth, MN 55441

RE: Project: RYAN SCHERER
Pace Project No.: 1099028

Dear Tom Johnson:
Enclosed are the analytical results for sample(s) received by the laboratory on July 10, 2009. The results relate only to the samples included in this report. Results reported herein conform to the most current NELAC standards, where applicable, unless otherwise narrated in the body of the report.

If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Carol Davy

Carol Davy

carol.davy@pacelabs.com
Project Manager

Enclosures

REPORT OF LABORATORY ANALYSIS

Pace Analytical Services, Inc.
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CERTIFICATIONS

Project: RYAN SCHERER
Pace Project No.: 1099028

Minnesota Certification IDs

Wisconsin Certification #: 999407970
Washington Certification #: C754
Alaska Certification #: UST-078
Arizona Certification #: AZ-0014
Tennessee Certification #: 02818
Pennsylvania Certification #: 68-00563
Oregon Certification #: MN200001
North Dakota Certification #: R-036
North Carolina Certification #: 530
New York Certification #: 11647
New Jersey Certification #: MN-002
Montana Certification #: MT CERT0092
Minnesota Certification #: 027-053-137
Maine Certification #: 2007029
Louisiana Certification #: LA080009
Louisiana Certification #: 03086
Kansas Certification #: E-10167
Iowa Certification #: 368
Illinois Certification #: 200011
Florida/NELAP Certification #: E87605
California Certification #: 01155CA

Montana Certification IDs

Montana Certification #: MT CERT0040
Idaho Certification #: MT00012
EPA Region 8 Certification #: 8TMS-Q

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SAMPLE SUMMARY

Project: RYAN SCHERER
Pace Project No.: 1099028

Lab ID	Sample ID	Matrix	Date Collected	Date Received
1099028001	B-4 1'-2'	Solid	07/10/09 10:00	07/10/09 12:02
1099028002	B-4 7'-9'	Solid	07/10/09 10:00	07/10/09 12:02
1099028003	TRIP BLANK	Solid	07/10/09 00:00	07/10/09 12:02

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SAMPLE ANALYTE COUNT

Project: RYAN SCHERER
Pace Project No.: 1099028

Lab ID	Sample ID	Method	Analysts	Analytes Reported
1099028002	**B-4 7'-9'**	% Moisture	MWD	1
		EPA 6010	IP	7
		EPA 7471	RJS	1
		EPA 8260	DJT	71
		EPA 8270	JLR	77
		WI MOD DRO	JLR	2
		WI MOD GRO	AMS1	2
1099028003	**TRIP BLANK**	WI MOD GRO	AMS1	2

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ANALYTICAL RESULTS

Project: RYAN SCHERER
Pace Project No.: 1099028

Sample: B-4 7'-9' **Lab ID: 1099028002** Collected: 07/10/09 10:00 Received: 07/10/09 12:02 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
WIDRO GCS Silica Gel	Analytical Method: WI MOD DRO Preparation Method: WI MOD DRO								
Diesel Range Organics	**65.4**	mg/kg	9.9	5.0	1	07/10/09 16:05	07/13/09 20:06		T6
n-Triacontane (S)	66	%	50-150		1	07/10/09 16:05	07/13/09 20:06		
WIGRO GCV	Analytical Method: WI MOD GRO Preparation Method: TPH GRO/PVOC WI ext.								
Gasoline Range Organics	ND	mg/kg	5.8	2.9	1	07/10/09 14:32	07/11/09 02:59		
a,a,a-Trifluorotoluene (S)	95	%	80-125		1	07/10/09 14:32	07/11/09 02:59	98-08-8	
6010 MET ICP	Analytical Method: EPA 6010 Preparation Method: EPA 3050								
Arsenic	**5.5**	mg/kg	0.50	0.28	1	07/10/09 15:36	07/13/09 10:30	7440-38-2	
Barium	**132**	mg/kg	0.50	0.25	1	07/10/09 15:36	07/13/09 10:30	7440-39-3	M0
Cadmium	**0.41**	mg/kg	0.050	0.025	1	07/10/09 15:36	07/13/09 10:30	7440-43-9	
Chromium	**18.9**	mg/kg	0.50	0.25	1	07/10/09 15:36	07/13/09 10:30	7440-47-3	
Lead	**158**	mg/kg	0.30	0.15	1	07/10/09 15:36	07/13/09 10:30	7439-92-1	M0
Selenium	ND	mg/kg	0.75	0.37	1	07/10/09 15:36	07/13/09 10:30	7782-49-2	
Silver	ND	mg/kg	0.50	0.25	1	07/10/09 15:36	07/13/09 10:30	7440-22-4	
7471 Mercury	Analytical Method: EPA 7471 Preparation Method: EPA 7471								
Mercury	**0.54**	mg/kg	0.019	0.0097	1	07/10/09 15:40	07/14/09 13:29	7439-97-6	M1
Dry Weight	Analytical Method: % Moisture								
Percent Moisture	**12.0**	%	0.10	0.10	1		07/10/09 00:00		
8270 MSSV	Analytical Method: EPA 8270 Preparation Method: EPA 3540								
Acenaphthene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	83-32-9	
Acenaphthylene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	208-96-8	
Anthracene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	120-12-7	
Benzidine	ND	mg/kg	9.1	4.5	5	07/10/09 16:06	07/13/09 14:46	92-87-5	L2,SS
Benzo(a)anthracene	**2.3**	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	56-55-3	
Benzo(a)pyrene	**2.7**	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	50-32-8	
Benzo(b)fluoranthene	**3.9**	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	205-99-2	
Benzo(g,h,i)perylene	**2.3**	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	191-24-2	
Benzo(k)fluoranthene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	207-08-9	
Benzoic acid	ND	mg/kg	9.7	4.8	5	07/10/09 16:06	07/13/09 14:46	65-85-0	
Benzyl alcohol	ND	mg/kg	3.8	1.9	5	07/10/09 16:06	07/13/09 14:46	100-51-6	
4-Bromophenylphenyl ether	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	101-55-3	
Butylbenzylphthalate	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	85-68-7	
Carbazole	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	86-74-8	
4-Chloro-3-methylphenol	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	59-50-7	
4-Chloroaniline	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	106-47-8	
bis(2-Chloroethoxy)methane	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	111-91-1	
bis(2-Chloroethyl) ether	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	111-44-4	
bis(2-Chloroisopropyl) ether	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	108-60-1	
2-Chloronaphthalene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	91-58-7	
2-Chlorophenol	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	95-57-8	

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ANALYTICAL RESULTS

Project: RYAN SCHERER
Pace Project No.: 1099028

Sample: B-4 7'-9' **Lab ID: 1099028002** Collected: 07/10/09 10:00 Received: 07/10/09 12:02 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8270 MSSV	Analytical Method: EPA 8270 Preparation Method: EPA 3540								
4-Chlorophenylphenyl ether	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	7005-72-3	
Chrysene	**2.4**	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	218-01-9	
Dibenz(a,h)anthracene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	53-70-3	
Dibenzofuran	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	132-64-9	
1,2-Dichlorobenzene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	95-50-1	
1,3-Dichlorobenzene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	541-73-1	
1,4-Dichlorobenzene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	106-46-7	
3,3'-Dichlorobenzidine	ND	mg/kg	3.8	1.9	5	07/10/09 16:06	07/13/09 14:46	91-94-1	
2,4-Dichlorophenol	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	120-83-2	
Diethylphthalate	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	84-66-2	
2,4-Dimethylphenol	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	105-67-9	
Dimethylphthalate	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	131-11-3	
Di-n-butylphthalate	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	84-74-2	
4,6-Dinitro-2-methylphenol	ND	mg/kg	9.7	4.8	5	07/10/09 16:06	07/13/09 14:46	534-52-1	
2,4-Dinitrophenol	ND	mg/kg	9.7	4.8	5	07/10/09 16:06	07/13/09 14:46	51-28-5	
2,4-Dinitrotoluene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	121-14-2	
2,6-Dinitrotoluene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	606-20-2	
Di-n-octylphthalate	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	117-84-0	
1,2-Diphenylhydrazine	ND	mg/kg	9.7	4.8	5	07/10/09 16:06	07/13/09 14:46	122-66-7	
bis(2-Ethylhexyl)phthalate	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	117-81-7	
Fluoranthene	**4.5**	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	206-44-0	
Fluorene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	86-73-7	
Hexachloro-1,3-butadiene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	87-68-3	
Hexachlorobenzene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	118-74-1	
Hexachlorocyclopentadiene	ND	mg/kg	9.7	0.94	5	07/10/09 16:06	07/13/09 14:46	77-47-4	
Hexachloroethane	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	67-72-1	
Indeno(1,2,3-cd)pyrene	**1.8**	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	193-39-5	
Isophorone	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	78-59-1	
1-Methylnaphthalene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	90-12-0	
2-Methylnaphthalene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	91-57-6	
2-Methylphenol(o-Cresol)	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	95-48-7	
3&4-Methylphenol	ND	mg/kg	3.8	1.9	5	07/10/09 16:06	07/13/09 14:46		
Naphthalene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	91-20-3	
2-Nitroaniline	ND	mg/kg	9.7	4.8	5	07/10/09 16:06	07/13/09 14:46	88-74-4	
3-Nitroaniline	ND	mg/kg	9.7	4.8	5	07/10/09 16:06	07/13/09 14:46	99-09-2	
4-Nitroaniline	ND	mg/kg	9.7	4.8	5	07/10/09 16:06	07/13/09 14:46	100-01-6	
Nitrobenzene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	98-95-3	
2-Nitrophenol	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	88-75-5	
4-Nitrophenol	ND	mg/kg	9.7	4.8	5	07/10/09 16:06	07/13/09 14:46	100-02-7	
N-Nitrosodimethylamine	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	62-75-9	
N-Nitroso-di-n-propylamine	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	621-64-7	
N-Nitrosodiphenylamine	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	86-30-6	
Pentachlorophenol	ND	mg/kg	9.7	4.8	5	07/10/09 16:06	07/13/09 14:46	87-86-5	
Phenanthrene	**3.5**	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	85-01-8	
Phenol	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	108-95-2	

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ANALYTICAL RESULTS

Project: RYAN SCHERER
Pace Project No.: 1099028

Sample: B-4 7'-9' **Lab ID: 1099028002** Collected: 07/10/09 10:00 Received: 07/10/09 12:02 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8270 MSSV	Analytical Method: EPA 8270 Preparation Method: EPA 3540								
Pyrene	**4.0**	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	129-00-0	
Pyridine	ND	mg/kg	9.7	4.8	5	07/10/09 16:06	07/13/09 14:46	110-86-1	
1,2,4-Trichlorobenzene	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	120-82-1	
2,4,5-Trichlorophenol	ND	mg/kg	9.7	4.8	5	07/10/09 16:06	07/13/09 14:46	95-95-4	
2,4,6-Trichlorophenol	ND	mg/kg	1.9	0.94	5	07/10/09 16:06	07/13/09 14:46	88-06-2	
Nitrobenzene-d5 (S)	63	%	46-139		5	07/10/09 16:06	07/13/09 14:46	4165-60-0	D4
2-Fluorobiphenyl (S)	72	%	59-130		5	07/10/09 16:06	07/13/09 14:46	321-60-8	
Terphenyl-d14 (S)	76	%	58-147		5	07/10/09 16:06	07/13/09 14:46	1718-51-0	
Phenol-d6 (S)	68	%	49-125		5	07/10/09 16:06	07/13/09 14:46	13127-88-3	
2-Fluorophenol (S)	63	%	43-126		5	07/10/09 16:06	07/13/09 14:46	367-12-4	
2,4,6-Tribromophenol (S)	65	%	30-150		5	07/10/09 16:06	07/13/09 14:46	118-79-6	
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Acetone	ND	ug/kg	573	286	1	07/10/09 13:03	07/10/09 21:34	67-64-1	
Allyl chloride	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	107-05-1	
Benzene	ND	ug/kg	57.3	28.6	1	07/10/09 13:03	07/10/09 21:34	71-43-2	
Bromobenzene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	108-86-1	
Bromochloromethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	74-97-5	
Bromodichloromethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	75-27-4	
Bromoform	ND	ug/kg	1150	229	1	07/10/09 13:03	07/10/09 21:34	75-25-2	
Bromomethane	ND	ug/kg	573	286	1	07/10/09 13:03	07/10/09 21:34	74-83-9	
2-Butanone (MEK)	ND	ug/kg	573	286	1	07/10/09 13:03	07/10/09 21:34	78-93-3	
n-Butylbenzene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	104-51-8	
sec-Butylbenzene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	135-98-8	
tert-Butylbenzene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	98-06-6	
Carbon tetrachloride	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	56-23-5	
Chlorobenzene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	108-90-7	
Chloroethane	ND	ug/kg	573	115	1	07/10/09 13:03	07/10/09 21:34	75-00-3	
Chloroform	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	67-66-3	
Chloromethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	74-87-3	
2-Chlorotoluene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	95-49-8	
4-Chlorotoluene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	106-43-4	
1,2-Dibromo-3-chloropropane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	96-12-8	
Dibromochloromethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	124-48-1	
1,2-Dibromoethane (EDB)	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	106-93-4	
Dibromomethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	74-95-3	
1,2-Dichlorobenzene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	95-50-1	
1,3-Dichlorobenzene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	541-73-1	
1,4-Dichlorobenzene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	106-46-7	
Dichlorodifluoromethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	75-71-8	
1,1-Dichloroethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	75-34-3	
1,2-Dichloroethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	107-06-2	
1,1-Dichloroethene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	75-35-4	
cis-1,2-Dichloroethene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	156-59-2	
trans-1,2-Dichloroethene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	156-60-5	

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ANALYTICAL RESULTS

Project: RYAN SCHERER
Pace Project No.: 1099028

Sample: B-4 7'-9' **Lab ID: 1099028002** Collected: 07/10/09 10:00 Received: 07/10/09 12:02 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Dichlorofluoromethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	75-43-4	
1,2-Dichloropropane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	78-87-5	
1,3-Dichloropropane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	142-28-9	
2,2-Dichloropropane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	594-20-7	
1,1-Dichloropropene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	563-58-6	
cis-1,3-Dichloropropene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	10061-01-5	
trans-1,3-Dichloropropene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	10061-02-6	
Diethyl ether (Ethyl ether)	ND	ug/kg	573	286	1	07/10/09 13:03	07/10/09 21:34	60-29-7	
Ethylbenzene	ND	ug/kg	57.3	28.6	1	07/10/09 13:03	07/10/09 21:34	100-41-4	
Hexachloro-1,3-butadiene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	87-68-3	
Isopropylbenzene (Cumene)	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	98-82-8	
p-Isopropyltoluene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	99-87-6	
Methylene Chloride	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	ug/kg	573	286	1	07/10/09 13:03	07/10/09 21:34	108-10-1	
Methyl-tert-butyl ether	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	1634-04-4	
Naphthalene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	91-20-3	
n-Propylbenzene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	103-65-1	
Styrene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	100-42-5	
1,1,1,2-Tetrachloroethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	630-20-6	
1,1,2,2-Tetrachloroethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	79-34-5	
Tetrachloroethene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	127-18-4	
Tetrahydrofuran	ND	ug/kg	2290	1150	1	07/10/09 13:03	07/10/09 21:34	109-99-9	
Toluene	ND	ug/kg	57.3	28.6	1	07/10/09 13:03	07/10/09 21:34	108-88-3	
1,2,3-Trichlorobenzene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	87-61-6	
1,2,4-Trichlorobenzene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	120-82-1	
1,1,1-Trichloroethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	71-55-6	
1,1,2-Trichloroethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	79-00-5	
Trichloroethene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	79-01-6	
Trichlorofluoromethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	75-69-4	
1,2,3-Trichloropropane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	96-18-4	
1,1,2-Trichlorotrifluoroethane	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	76-13-1	
1,2,4-Trimethylbenzene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	95-63-6	
1,3,5-Trimethylbenzene	ND	ug/kg	229	115	1	07/10/09 13:03	07/10/09 21:34	108-67-8	
Vinyl chloride	ND	ug/kg	57.3	28.6	1	07/10/09 13:03	07/10/09 21:34	75-01-4	
Xylene (Total)	ND	ug/kg	172	85.9	1	07/10/09 13:03	07/10/09 21:34	1330-20-7	
Dibromofluoromethane (S)	103	%	61-139		1	07/10/09 13:03	07/10/09 21:34	1868-53-7	
1,2-Dichloroethane-d4 (S)	100	%	68-136		1	07/10/09 13:03	07/10/09 21:34	17060-07-0	
Toluene-d8 (S)	114	%	68-133		1	07/10/09 13:03	07/10/09 21:34	2037-26-5	
4-Bromofluorobenzene (S)	112	%	68-126		1	07/10/09 13:03	07/10/09 21:34	460-00-4	

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ANALYTICAL RESULTS

Project: RYAN SCHERER
Pace Project No.: 1099028

Sample: TRIP BLANK **Lab ID: 1099028003** Collected: 07/10/09 00:00 Received: 07/10/09 12:02 Matrix: Solid

Results reported on a "wet-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
WIGRO GCV	Analytical Method: WI MOD GRO Preparation Method: TPH GRO/PVOC WI ext.								
Gasoline Range Organics	ND	mg/kg	5.0	2.5	1	07/10/09 14:32	07/11/09 01:05		
a,a,a-Trifluorotoluene (S)	95	%	80-125		1	07/10/09 14:32	07/11/09 01:05	98-08-8	

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QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

QC Batch: MSV/12637 Analysis Method: EPA 8260
QC Batch Method: EPA 5035/5030B Analysis Description: 8260 MSV 5030 Med Level
Associated Lab Samples: 1099028002

METHOD BLANK: 648305 Matrix: Solid
Associated Lab Samples: 1099028002

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
1,1,1,2-Tetrachloroethane	ug/kg	ND	200	07/10/09 15:48	
1,1,1-Trichloroethane	ug/kg	ND	200	07/10/09 15:48	
1,1,2,2-Tetrachloroethane	ug/kg	ND	200	07/10/09 15:48	
1,1,2-Trichloroethane	ug/kg	ND	200	07/10/09 15:48	
1,1,2-Trichlorotrifluoroethane	ug/kg	ND	200	07/10/09 15:48	
1,1-Dichloroethane	ug/kg	ND	200	07/10/09 15:48	
1,1-Dichloroethene	ug/kg	ND	200	07/10/09 15:48	
1,1-Dichloropropene	ug/kg	ND	200	07/10/09 15:48	
1,2,3-Trichlorobenzene	ug/kg	ND	200	07/10/09 15:48	
1,2,3-Trichloropropane	ug/kg	ND	200	07/10/09 15:48	
1,2,4-Trichlorobenzene	ug/kg	ND	200	07/10/09 15:48	
1,2,4-Trimethylbenzene	ug/kg	ND	200	07/10/09 15:48	
1,2-Dibromo-3-chloropropane	ug/kg	ND	200	07/10/09 15:48	
1,2-Dibromoethane (EDB)	ug/kg	ND	200	07/10/09 15:48	
1,2-Dichlorobenzene	ug/kg	ND	200	07/10/09 15:48	
1,2-Dichloroethane	ug/kg	ND	200	07/10/09 15:48	
1,2-Dichloropropane	ug/kg	ND	200	07/10/09 15:48	
1,3,5-Trimethylbenzene	ug/kg	ND	200	07/10/09 15:48	
1,3-Dichlorobenzene	ug/kg	ND	200	07/10/09 15:48	
1,3-Dichloropropane	ug/kg	ND	200	07/10/09 15:48	
1,4-Dichlorobenzene	ug/kg	ND	200	07/10/09 15:48	
2,2-Dichloropropane	ug/kg	ND	200	07/10/09 15:48	
2-Butanone (MEK)	ug/kg	ND	500	07/10/09 15:48	
2-Chlorotoluene	ug/kg	ND	200	07/10/09 15:48	
4-Chlorotoluene	ug/kg	ND	200	07/10/09 15:48	
4-Methyl-2-pentanone (MIBK)	ug/kg	ND	500	07/10/09 15:48	
Acetone	ug/kg	ND	500	07/10/09 15:48	
Allyl chloride	ug/kg	ND	200	07/10/09 15:48	
Benzene	ug/kg	ND	50.0	07/10/09 15:48	
Bromobenzene	ug/kg	ND	200	07/10/09 15:48	
Bromochloromethane	ug/kg	ND	200	07/10/09 15:48	
Bromodichloromethane	ug/kg	ND	200	07/10/09 15:48	
Bromoform	ug/kg	ND	1000	07/10/09 15:48	
Bromomethane	ug/kg	ND	500	07/10/09 15:48	
Carbon tetrachloride	ug/kg	ND	200	07/10/09 15:48	
Chlorobenzene	ug/kg	ND	200	07/10/09 15:48	
Chloroethane	ug/kg	ND	500	07/10/09 15:48	
Chloroform	ug/kg	ND	200	07/10/09 15:48	
Chloromethane	ug/kg	ND	200	07/10/09 15:48	
cis-1,2-Dichloroethene	ug/kg	ND	200	07/10/09 15:48	
cis-1,3-Dichloropropene	ug/kg	ND	200	07/10/09 15:48	
Dibromochloromethane	ug/kg	ND	200	07/10/09 15:48	
Dibromomethane	ug/kg	ND	200	07/10/09 15:48	

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QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

METHOD BLANK: 648305 Matrix: Solid

Associated Lab Samples: 1099028002

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Dichlorodifluoromethane	ug/kg	ND	200	07/10/09 15:48	
Dichlorofluoromethane	ug/kg	ND	200	07/10/09 15:48	
Diethyl ether (Ethyl ether)	ug/kg	ND	500	07/10/09 15:48	
Ethylbenzene	ug/kg	ND	50.0	07/10/09 15:48	
Hexachloro-1,3-butadiene	ug/kg	ND	200	07/10/09 15:48	
Isopropylbenzene (Cumene)	ug/kg	ND	200	07/10/09 15:48	
Methyl-tert-butyl ether	ug/kg	ND	200	07/10/09 15:48	
Methylene Chloride	ug/kg	ND	200	07/10/09 15:48	
n-Butylbenzene	ug/kg	ND	200	07/10/09 15:48	
n-Propylbenzene	ug/kg	ND	200	07/10/09 15:48	
Naphthalene	ug/kg	ND	200	07/10/09 15:48	
p-Isopropyltoluene	ug/kg	ND	200	07/10/09 15:48	
sec-Butylbenzene	ug/kg	ND	200	07/10/09 15:48	
Styrene	ug/kg	ND	200	07/10/09 15:48	
tert-Butylbenzene	ug/kg	ND	200	07/10/09 15:48	
Tetrachloroethene	ug/kg	ND	200	07/10/09 15:48	
Tetrahydrofuran	ug/kg	ND	2000	07/10/09 15:48	
Toluene	ug/kg	ND	50.0	07/10/09 15:48	
trans-1,2-Dichloroethene	ug/kg	ND	200	07/10/09 15:48	
trans-1,3-Dichloropropene	ug/kg	ND	200	07/10/09 15:48	
Trichloroethene	ug/kg	ND	200	07/10/09 15:48	
Trichlorofluoromethane	ug/kg	ND	200	07/10/09 15:48	
Vinyl chloride	ug/kg	ND	50.0	07/10/09 15:48	
Xylene (Total)	ug/kg	ND	150	07/10/09 15:48	
1,2-Dichloroethane-d4 (S)	%	108	68-136	07/10/09 15:48	
4-Bromofluorobenzene (S)	%	126	68-126	07/10/09 15:48	
Dibromofluoromethane (S)	%	113	61-139	07/10/09 15:48	
Toluene-d8 (S)	%	125	68-133	07/10/09 15:48	

LABORATORY CONTROL SAMPLE & LCSD: 648306 648307

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
1,1,1,2-Tetrachloroethane	ug/kg	1000	1100	1120	110	112	75-125	2	20	
1,1,1-Trichloroethane	ug/kg	1000	1090	1080	109	108	75-130	1	20	
1,1,2,2-Tetrachloroethane	ug/kg	1000	1010	1020	101	102	70-139	1	20	
1,1,2-Trichloroethane	ug/kg	1000	1010	1010	101	101	75-125	0	20	
1,1,2-Trichlorotrifluoroethane	ug/kg	1000	1430	1460	143	146	58-142	2	20	L3
1,1-Dichloroethane	ug/kg	1000	1040	1030	104	103	75-126	1	20	
1,1-Dichloroethene	ug/kg	1000	1180	1170	118	117	71-127	0	20	
1,1-Dichloropropene	ug/kg	1000	1150	1160	115	116	75-125	1	20	
1,2,3-Trichlorobenzene	ug/kg	1000	1000	970	100	97	75-133	3	20	
1,2,3-Trichloropropane	ug/kg	1000	1040	1040	104	104	75-126	0	20	
1,2,4-Trichlorobenzene	ug/kg	1000	1080	1050	108	105	75-134	3	20	
1,2,4-Trimethylbenzene	ug/kg	1000	1150	1110	115	111	75-136	3	20	
1,2-Dibromo-3-chloropropane	ug/kg	1000	952	958	95	96	69-136	1	20	

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QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

LABORATORY CONTROL SAMPLE & LCSD: 648306 648307

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
1,2-Dibromoethane (EDB)	ug/kg	1000	1030	1050	103	105	75-125	2	20	
1,2-Dichlorobenzene	ug/kg	1000	1090	1090	109	109	75-125	0	20	
1,2-Dichloroethane	ug/kg	1000	950	943	95	94	75-135	1	20	
1,2-Dichloropropane	ug/kg	1000	1090	1070	109	107	75-125	2	20	
1,3,5-Trimethylbenzene	ug/kg	1000	1150	1110	115	111	75-136	3	20	
1,3-Dichlorobenzene	ug/kg	1000	1140	1110	114	111	75-125	3	20	
1,3-Dichloropropane	ug/kg	1000	1040	1070	104	107	75-125	2	20	
1,4-Dichlorobenzene	ug/kg	1000	1130	1100	113	110	75-125	2	20	
2,2-Dichloropropane	ug/kg	1000	941	1030	94	103	30-150	9	20	
2-Butanone (MEK)	ug/kg	1000	1050	1050	105	105	49-149	0	20	
2-Chlorotoluene	ug/kg	1000	1120	1100	112	110	75-125	2	20	
4-Chlorotoluene	ug/kg	1000	1120	1090	112	109	75-126	3	20	
4-Methyl-2-pentanone (MIBK)	ug/kg	1000	901	942	90	94	73-134	4	20	
Acetone	ug/kg	2500	2770	2660	111	107	57-150	4	20	
Allyl chloride	ug/kg	1000	813	975	81	97	69-139	18	20	
Benzene	ug/kg	1000	1060	1060	106	106	75-130	0	20	
Bromobenzene	ug/kg	1000	1120	1130	112	113	75-125	1	20	
Bromochloromethane	ug/kg	1000	1020	1030	102	103	75-125	1	20	
Bromodichloromethane	ug/kg	1000	1040	1030	104	103	75-130	1	20	
Bromoform	ug/kg	2000	2020	2090	101	105	75-128	4	20	
Bromomethane	ug/kg	1000	824	880	82	88	47-150	7	20	
Carbon tetrachloride	ug/kg	1000	1130	1160	113	116	67-138	2	20	
Chlorobenzene	ug/kg	1000	1110	1120	111	112	75-125	1	20	
Chloroethane	ug/kg	1000	920	907	92	91	54-150	1	20	
Chloroform	ug/kg	1000	979	1000	98	100	75-131	3	20	
Chloromethane	ug/kg	1000	894	915	89	91	65-126	2	20	
cis-1,2-Dichloroethene	ug/kg	1000	1030	1050	103	105	75-125	2	20	
cis-1,3-Dichloropropene	ug/kg	1000	1080	1080	108	108	75-125	0	20	
Dibromochloromethane	ug/kg	1000	1060	1090	106	109	75-125	2	20	
Dibromomethane	ug/kg	1000	986	1010	99	101	75-125	2	20	
Dichlorodifluoromethane	ug/kg	1000	961	996	96	100	37-125	4	20	
Dichlorofluoromethane	ug/kg	1000	1030	1040	103	104	30-150	1	20	
Diethyl ether (Ethyl ether)	ug/kg	1000	972	995	97	100	67-135	2	20	
Ethylbenzene	ug/kg	1000	1130	1140	113	114	75-125	0	20	
Hexachloro-1,3-butadiene	ug/kg	1000	1200	1250	120	125	75-150	4	20	
Isopropylbenzene (Cumene)	ug/kg	1000	1160	1160	116	116	75-125	0	20	
Methyl-tert-butyl ether	ug/kg	1000	910	951	91	95	75-133	4	20	
Methylene Chloride	ug/kg	1000	1010	1010	101	101	75-130	1	20	
n-Butylbenzene	ug/kg	1000	1150	1100	115	110	75-138	5	20	
n-Propylbenzene	ug/kg	1000	1190	1160	119	116	75-129	2	20	
Naphthalene	ug/kg	1000	898	890	90	89	73-128	1	20	
p-Isopropyltoluene	ug/kg	1000	1170	1150	117	115	75-134	2	20	
sec-Butylbenzene	ug/kg	1000	1220	1200	122	120	75-133	2	20	
Styrene	ug/kg	1000	1090	1090	109	109	75-125	0	20	
tert-Butylbenzene	ug/kg	1000	1130	1120	113	112	75-130	1	20	
Tetrachloroethene	ug/kg	1000	1200	1200	120	120	75-125	0	20	
Tetrahydrofuran	ug/kg	10000	8860	9210	89	92	75-133	4	20	
Toluene	ug/kg	1000	1140	1150	114	115	75-125	1	20	

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QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

LABORATORY CONTROL SAMPLE & LCSD: 648306 648307

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
trans-1,2-Dichloroethene	ug/kg	1000	1080	1080	108	108	75-125	0	20	
trans-1,3-Dichloropropene	ug/kg	1000	1020	1040	102	104	65-129	3	20	
Trichloroethene	ug/kg	1000	1120	1120	112	112	75-132	0	20	
Trichlorofluoromethane	ug/kg	1000	1120	1160	112	116	30-150	3	20	
Vinyl chloride	ug/kg	1000	987	999	99	100	75-125	1	20	
Xylene (Total)	ug/kg	3000	3360	3390	112	113	75-125	1	20	
1,2-Dichloroethane-d4 (S)	%				94	92	68-136			
4-Bromofluorobenzene (S)	%				105	105	68-126			
Dibromofluoromethane (S)	%				99	100	61-139			
Toluene-d8 (S)	%				111	111	68-133			

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QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

QC Batch: OEXT/11095 Analysis Method: EPA 8270
QC Batch Method: EPA 3540 Analysis Description: 8270 Solid MSSV
Associated Lab Samples: 1099028002

METHOD BLANK: 648086 Matrix: Solid
Associated Lab Samples: 1099028002

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
1,2,4-Trichlorobenzene	mg/kg	ND	0.33	07/13/09 17:39	
1,2-Dichlorobenzene	mg/kg	ND	0.33	07/13/09 17:39	
1,2-Diphenylhydrazine	mg/kg	ND	1.7	07/13/09 17:39	
1,3-Dichlorobenzene	mg/kg	ND	0.33	07/13/09 17:39	
1,4-Dichlorobenzene	mg/kg	ND	0.33	07/13/09 17:39	
1-Methylnaphthalene	mg/kg	ND	0.33	07/13/09 17:39	
2,4,5-Trichlorophenol	mg/kg	ND	1.7	07/13/09 17:39	
2,4,6-Trichlorophenol	mg/kg	ND	0.33	07/13/09 17:39	
2,4-Dichlorophenol	mg/kg	ND	0.33	07/13/09 17:39	
2,4-Dimethylphenol	mg/kg	ND	0.33	07/13/09 17:39	
2,4-Dinitrophenol	mg/kg	ND	1.7	07/13/09 17:39	
2,4-Dinitrotoluene	mg/kg	ND	0.33	07/13/09 17:39	
2,6-Dinitrotoluene	mg/kg	ND	0.33	07/13/09 17:39	
2-Chloronaphthalene	mg/kg	ND	0.33	07/13/09 17:39	
2-Chlorophenol	mg/kg	ND	0.33	07/13/09 17:39	
2-Methylnaphthalene	mg/kg	ND	0.33	07/13/09 17:39	
2-Methylphenol(o-Cresol)	mg/kg	ND	0.33	07/13/09 17:39	
2-Nitroaniline	mg/kg	ND	1.7	07/13/09 17:39	
2-Nitrophenol	mg/kg	ND	0.33	07/13/09 17:39	
3&4-Methylphenol	mg/kg	ND	0.66	07/13/09 17:39	
3,3'-Dichlorobenzidine	mg/kg	ND	0.67	07/13/09 17:39	
3-Nitroaniline	mg/kg	ND	1.7	07/13/09 17:39	
4,6-Dinitro-2-methylphenol	mg/kg	ND	1.7	07/13/09 17:39	
4-Bromophenylphenyl ether	mg/kg	ND	0.33	07/13/09 17:39	
4-Chloro-3-methylphenol	mg/kg	ND	0.33	07/13/09 17:39	
4-Chloroaniline	mg/kg	ND	0.33	07/13/09 17:39	
4-Chlorophenylphenyl ether	mg/kg	ND	0.33	07/13/09 17:39	
4-Nitroaniline	mg/kg	ND	1.7	07/13/09 17:39	
4-Nitrophenol	mg/kg	ND	1.7	07/13/09 17:39	
Acenaphthene	mg/kg	ND	0.33	07/13/09 17:39	
Acenaphthylene	mg/kg	ND	0.33	07/13/09 17:39	
Anthracene	mg/kg	ND	0.33	07/13/09 17:39	
Benzidine	mg/kg	ND	1.6	07/13/09 17:39	SS
Benzo(a)anthracene	mg/kg	ND	0.33	07/13/09 17:39	
Benzo(a)pyrene	mg/kg	ND	0.33	07/13/09 17:39	
Benzo(b)fluoranthene	mg/kg	ND	0.33	07/13/09 17:39	
Benzo(g,h,i)perylene	mg/kg	ND	0.33	07/13/09 17:39	
Benzo(k)fluoranthene	mg/kg	ND	0.33	07/13/09 17:39	
Benzoic acid	mg/kg	ND	1.7	07/13/09 17:39	
Benzyl alcohol	mg/kg	ND	0.66	07/13/09 17:39	
bis(2-Chloroethoxy)methane	mg/kg	ND	0.33	07/13/09 17:39	
bis(2-Chloroethyl) ether	mg/kg	ND	0.33	07/13/09 17:39	
bis(2-Chloroisopropyl) ether	mg/kg	ND	0.33	07/13/09 17:39	

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QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

METHOD BLANK: 648086 Matrix: Solid

Associated Lab Samples: 1099028002

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
bis(2-Ethylhexyl)phthalate	mg/kg	ND	0.33	07/13/09 17:39	
Butylbenzylphthalate	mg/kg	ND	0.33	07/13/09 17:39	
Carbazole	mg/kg	ND	0.33	07/13/09 17:39	
Chrysene	mg/kg	ND	0.33	07/13/09 17:39	
Di-n-butylphthalate	mg/kg	ND	0.33	07/13/09 17:39	
Di-n-octylphthalate	mg/kg	ND	0.33	07/13/09 17:39	
Dibenz(a,h)anthracene	mg/kg	ND	0.33	07/13/09 17:39	
Dibenzofuran	mg/kg	ND	0.33	07/13/09 17:39	
Diethylphthalate	mg/kg	ND	0.33	07/13/09 17:39	
Dimethylphthalate	mg/kg	ND	0.33	07/13/09 17:39	
Fluoranthene	mg/kg	ND	0.33	07/13/09 17:39	
Fluorene	mg/kg	ND	0.33	07/13/09 17:39	
Hexachloro-1,3-butadiene	mg/kg	ND	0.33	07/13/09 17:39	
Hexachlorobenzene	mg/kg	ND	0.33	07/13/09 17:39	
Hexachlorocyclopentadiene	mg/kg	ND	1.7	07/13/09 17:39	
Hexachloroethane	mg/kg	ND	0.33	07/13/09 17:39	
Indeno(1,2,3-cd)pyrene	mg/kg	ND	0.33	07/13/09 17:39	
Isophorone	mg/kg	ND	0.33	07/13/09 17:39	
N-Nitroso-di-n-propylamine	mg/kg	ND	0.33	07/13/09 17:39	
N-Nitrosodimethylamine	mg/kg	ND	0.33	07/13/09 17:39	
N-Nitrosodiphenylamine	mg/kg	ND	0.33	07/13/09 17:39	
Naphthalene	mg/kg	ND	0.33	07/13/09 17:39	
Nitrobenzene	mg/kg	ND	0.33	07/13/09 17:39	
Pentachlorophenol	mg/kg	ND	1.7	07/13/09 17:39	
Phenanthrene	mg/kg	ND	0.33	07/13/09 17:39	
Phenol	mg/kg	ND	0.33	07/13/09 17:39	
Pyrene	mg/kg	ND	0.33	07/13/09 17:39	
Pyridine	mg/kg	ND	1.7	07/13/09 17:39	
2,4,6-Tribromophenol (S)	%	64	30-150	07/13/09 17:39	
2-Fluorobiphenyl (S)	%	63	59-130	07/13/09 17:39	
2-Fluorophenol (S)	%	62	43-126	07/13/09 17:39	
Nitrobenzene-d5 (S)	%	64	46-139	07/13/09 17:39	
Phenol-d6 (S)	%	62	49-125	07/13/09 17:39	
Terphenyl-d14 (S)	%	73	58-147	07/13/09 17:39	

LABORATORY CONTROL SAMPLE: 648087

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
1,2,4-Trichlorobenzene	mg/kg	1.7	1.2	70	56-125	
1,2-Dichlorobenzene	mg/kg	1.7	1.1	68	53-125	
1,2-Diphenylhydrazine	mg/kg	1.7	1.3J	77	52-134	
1,3-Dichlorobenzene	mg/kg	1.7	1.1	68	49-125	
1,4-Dichlorobenzene	mg/kg	1.7	1.1	69	51-125	
1-Methylnaphthalene	mg/kg	1.7	1.2	71	59-125	
2,4,5-Trichlorophenol	mg/kg	1.7	1.3J	77	64-125	

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QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

LABORATORY CONTROL SAMPLE: 648087

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
2,4,6-Trichlorophenol	mg/kg	1.7	1.3	76	59-125	
2,4-Dichlorophenol	mg/kg	1.7	1.2	73	60-125	
2,4-Dimethylphenol	mg/kg	1.7	1.2	69	30-129	
2,4-Dinitrophenol	mg/kg	1.7	1J	61	30-126	
2,4-Dinitrotoluene	mg/kg	1.7	1.2	74	62-127	
2,6-Dinitrotoluene	mg/kg	1.7	1.2	73	65-125	
2-Chloronaphthalene	mg/kg	1.7	1.2	72	64-125	
2-Chlorophenol	mg/kg	1.7	1.2	70	57-125	
2-Methylnaphthalene	mg/kg	1.7	1.2	75	62-125	
2-Methylphenol(o-Cresol)	mg/kg	1.7	1.2	70	50-125	
2-Nitroaniline	mg/kg	1.7	1.3J	80	30-138	
2-Nitrophenol	mg/kg	1.7	1.3	75	60-125	
3&4-Methylphenol	mg/kg	1.7	1.2	71	56-125	
3,3'-Dichlorobenzidine	mg/kg	1.7	1.1	65	30-125	
3-Nitroaniline	mg/kg	1.7	1.1J	68	58-128	
4,6-Dinitro-2-methylphenol	mg/kg	1.7	1.2J	71	39-125	
4-Bromophenylphenyl ether	mg/kg	1.7	1.3	77	66-125	
4-Chloro-3-methylphenol	mg/kg	1.7	1.3	78	59-125	
4-Chloroaniline	mg/kg	1.7	0.72	43	30-125	
4-Chlorophenylphenyl ether	mg/kg	1.7	1.2	74	64-125	
4-Nitroaniline	mg/kg	1.7	1.3J	78	48-130	
4-Nitrophenol	mg/kg	1.7	1.5J	89	48-130	
Acenaphthene	mg/kg	1.7	1.2	74	64-125	
Acenaphthylene	mg/kg	1.7	1.2	74	58-125	
Anthracene	mg/kg	1.7	1.3	78	65-125	
Benzidine	mg/kg	1.7	ND	15	30-125	L0,SS
Benzo(a)anthracene	mg/kg	1.7	1.3	77	66-125	
Benzo(a)pyrene	mg/kg	1.7	1.3	77	58-125	
Benzo(b)fluoranthene	mg/kg	1.7	1.3	79	60-125	
Benzo(g,h,i)perylene	mg/kg	1.7	1.2	74	60-125	
Benzo(k)fluoranthene	mg/kg	1.7	1.3	77	60-125	
Benzoic acid	mg/kg	1.7	1.2J	74	30-125	
Benzyl alcohol	mg/kg	1.7	1.5	87	50-125	
bis(2-Chloroethoxy)methane	mg/kg	1.7	1.2	69	62-125	
bis(2-Chloroethyl) ether	mg/kg	1.7	1.1	67	51-125	
bis(2-Chloroisopropyl) ether	mg/kg	1.7	1.1	68	37-127	
bis(2-Ethylhexyl)phthalate	mg/kg	1.7	1.4	85	63-137	
Butylbenzylphthalate	mg/kg	1.7	1.4	81	60-132	
Carbazole	mg/kg	1.7	1.3	78	59-125	
Chrysene	mg/kg	1.7	1.3	77	66-125	
Di-n-butylphthalate	mg/kg	1.7	1.3	80	65-137	
Di-n-octylphthalate	mg/kg	1.7	1.4	85	54-140	
Dibenz(a,h)anthracene	mg/kg	1.7	1.3	77	60-125	
Dibenzofuran	mg/kg	1.7	1.3	76	64-125	
Diethylphthalate	mg/kg	1.7	1.3	77	62-125	
Dimethylphthalate	mg/kg	1.7	1.3	76	66-125	
Fluoranthene	mg/kg	1.7	1.3	76	66-125	
Fluorene	mg/kg	1.7	1.3	77	64-125	

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QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

LABORATORY CONTROL SAMPLE: 648087

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Hexachloro-1,3-butadiene	mg/kg	1.7	1.2	69	49-126	
Hexachlorobenzene	mg/kg	1.7	1.3	77	64-125	
Hexachlorocyclopentadiene	mg/kg	1.7	1.2J	71	30-125	
Hexachloroethane	mg/kg	1.7	1.1	68	45-125	
Indeno(1,2,3-cd)pyrene	mg/kg	1.7	1.3	75	59-126	
Isophorone	mg/kg	1.7	1.2	71	56-127	
N-Nitroso-di-n-propylamine	mg/kg	1.7	1.2	71	54-125	
N-Nitrosodimethylamine	mg/kg	1.7	1.2	70	31-130	
N-Nitrosodiphenylamine	mg/kg	1.7	1.3	77	56-125	
Naphthalene	mg/kg	1.7	1.2	71	57-125	
Nitrobenzene	mg/kg	1.7	1.1	68	54-125	
Pentachlorophenol	mg/kg	1.7	1.1J	66	39-125	
Phenanthrene	mg/kg	1.7	1.3	78	67-125	
Phenol	mg/kg	1.7	1.2	71	60-125	
Pyrene	mg/kg	1.7	1.3	80	63-127	
Pyridine	mg/kg	1.7	ND	49	30-125	
2,4,6-Tribromophenol (S)	%			78	30-150	
2-Fluorobiphenyl (S)	%			68	59-130	
2-Fluorophenol (S)	%			67	43-126	
Nitrobenzene-d5 (S)	%			68	46-139	
Phenol-d6 (S)	%			66	49-125	
Terphenyl-d14 (S)	%			75	58-147	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 648088 648089

Parameter	Units	1098840001 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
1,2,4-Trichlorobenzene	mg/kg	ND	2	2	1.4J	1.5J	72	79	46-125		30	
1,2-Dichlorobenzene	mg/kg	ND	2	2	1.4J	1.4J	70	73	42-125		30	
1,2-Diphenylhydrazine	mg/kg	ND	2	2	ND	ND	79	85	50-138		30	
1,3-Dichlorobenzene	mg/kg	ND	2	2	1.3J	1.4J	69	71	37-125		30	
1,4-Dichlorobenzene	mg/kg	ND	2	2	1.3J	1.4J	69	75	31-125		30	
1-Methylnaphthalene	mg/kg	ND	2	2	1.9	2.0	98	105	47-130		30	
2,4,5-Trichlorophenol	mg/kg	ND	2	2	ND	ND	72	78	33-142		30	
2,4,6-Trichlorophenol	mg/kg	ND	2	2	1.4J	1.5J	72	79	46-133		30	
2,4-Dichlorophenol	mg/kg	ND	2	2	1.4J	1.6J	73	81	43-128		30	
2,4-Dimethylphenol	mg/kg	ND	2	2	1.5J	1.6J	78	85	30-138		30	
2,4-Dinitrophenol	mg/kg	ND	2	2	ND	ND	84	86	30-150		30	
2,4-Dinitrotoluene	mg/kg	ND	2	2	1.3J	1.4J	67	74	41-138		30	
2,6-Dinitrotoluene	mg/kg	ND	2	2	1.4J	1.4J	72	74	38-135		30	
2-Chloronaphthalene	mg/kg	ND	2	2	1.5J	1.6J	75	80	56-125		30	
2-Chlorophenol	mg/kg	ND	2	2	1.4J	1.5J	74	78	45-125		30	
2-Methylnaphthalene	mg/kg	ND	2	2	1.9	2.1	99	107	46-136		30	
2-Methylphenol(o-Cresol)	mg/kg	ND	2	2	1.5J	1.5J	75	80	45-125		30	
2-Nitroaniline	mg/kg	ND	2	2	ND	ND	76	81	30-150		30	
2-Nitrophenol	mg/kg	ND	2	2	1.4J	1.5J	74	79	30-129		30	
3&4-Methylphenol	mg/kg	ND	2	2	ND	ND	75	82	44-126		30	

REPORT OF LABORATORY ANALYSIS

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(612)607-1700

QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 648088 648089

Parameter	Units	1098840001 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
3,3'-Dichlorobenzidine	mg/kg	ND	2	2	ND	ND	57	67	30-137		30	
3-Nitroaniline	mg/kg	ND	2	2	ND	ND	72	81	43-140		30	
4,6-Dinitro-2-methylphenol	mg/kg	ND	2	2	ND	ND	89	88	30-150		30	
4-Bromophenylphenyl ether	mg/kg	ND	2	2	1.4J	1.6J	74	82	53-132		30	
4-Chloro-3-methylphenol	mg/kg	ND	2	2	1.5J	1.6J	76	84	47-134		30	
4-Chloroaniline	mg/kg	ND	2	2	1.7J	1.8	90	95	30-125		30	
4-Chlorophenylphenyl ether	mg/kg	ND	2	2	1.5J	1.5J	76	79	59-125		30	
4-Nitroaniline	mg/kg	ND	2	2	ND	ND	76	82	30-150		30	
4-Nitrophenol	mg/kg	ND	2	2	ND	ND	76	84	36-149		30	
Acenaphthene	mg/kg	ND	2	2	2.8	2.8	80	79	30-150	0	30	
Acenaphthylene	mg/kg	ND	2	2	1.6J	1.7J	82	88	52-136		30	
Anthracene	mg/kg	2.2	2	2	4.0	3.8	92	84	30-150	4	30	
Benzidine	mg/kg	ND	2	2	ND	ND	13	16	30-125		30	M0,SS
Benzo(a)anthracene	mg/kg	3.2	2	2	5.9	5.4	139	113	30-150	9	30	
Benzo(a)pyrene	mg/kg	4.2	2	2	6.6	6.6	124	123	30-150	1	30	
Benzo(b)fluoranthene	mg/kg	6.0	2	2	8.2	8.6	114	133	30-150	4	30	
Benzo(g,h,i)perylene	mg/kg	3.7	2	2	5.6	5.9	103	118	30-150	5	30	
Benzo(k)fluoranthene	mg/kg	1.9	2	2	4.6	4.3	140	127	30-150	5	30	
Benzoic acid	mg/kg	ND	2	2	ND	ND	111	113	30-150		30	
Benzyl alcohol	mg/kg	ND	2	2	ND	ND	90	95	30-143		30	
bis(2-Chloroethoxy)methane	mg/kg	ND	2	2	1.5J	1.5J	76	79	38-127		30	
bis(2-Chloroethyl) ether	mg/kg	ND	2	2	1.4J	1.4J	72	74	33-125		30	
bis(2-Chloroisopropyl) ether	mg/kg	ND	2	2	1.5J	1.5J	76	79	44-125		30	
bis(2-Ethylhexyl)phthalate	mg/kg	ND	2	2	2.0	2.1	103	108	40-150	4	30	
Butylbenzylphthalate	mg/kg	ND	2	2	1.9	2.1	100	107	33-148	7	30	
Carbazole	mg/kg	ND	2	2	1.7J	1.9	88	98	62-133		30	
Chrysene	mg/kg	3.6	2	2	6.5	5.9	150	115	30-150	11	30	
Di-n-butylphthalate	mg/kg	ND	2	2	1.6J	1.7J	81	89	45-150		30	
Di-n-octylphthalate	mg/kg	ND	2	2	1.5J	1.8	78	94	42-144		30	
Dibenz(a,h)anthracene	mg/kg	ND	2	2	2.6	2.7	136	140	30-150	3	30	
Dibenzofuran	mg/kg	ND	2	2	2.3	2.5	69	80	56-136	9	30	
Diethylphthalate	mg/kg	ND	2	2	1.5J	1.6J	78	83	53-134		30	
Dimethylphthalate	mg/kg	ND	2	2	1.5J	1.6J	77	81	52-129		30	
Fluoranthene	mg/kg	6.3	2	2	10.8	8.9	235	133	30-150	20	30	M0
Fluorene	mg/kg	ND	2	2	3.1	3.3	66	76	54-139	6	30	
Hexachloro-1,3-butadiene	mg/kg	ND	2	2	1.4J	1.5J	71	75	33-134		30	
Hexachlorobenzene	mg/kg	ND	2	2	1.3J	1.4J	68	75	51-130		30	
Hexachlorocyclopentadiene	mg/kg	ND	2	2	ND	ND	49	47	30-137		30	
Hexachloroethane	mg/kg	ND	2	2	1.3J	1.4J	67	72	30-125		30	
Indeno(1,2,3-cd)pyrene	mg/kg	2.9	2	2	4.8	5.1	103	114	30-150	4	30	
Isophorone	mg/kg	ND	2	2	1.4J	1.5J	72	78	43-129		30	
N-Nitroso-di-n-propylamine	mg/kg	ND	2	2	1.4J	1.5J	75	79	40-129		30	
N-Nitrosodimethylamine	mg/kg	ND	2	2	1.3J	1.4J	69	71	30-135		30	
N-Nitrosodiphenylamine	mg/kg	ND	2	2	1.6J	1.7J	83	88	50-133		30	
Naphthalene	mg/kg	ND	2	2	1.7J	1.8J	86	92	49-125		30	
Nitrobenzene	mg/kg	ND	2	2	1.4J	1.5J	73	77	44-125		30	
Pentachlorophenol	mg/kg	ND	2	2	ND	ND	86	90	30-138		30	

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QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 648088 648089

Parameter	Units	1098840001 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Phenanthrene	mg/kg	8.5	2	2	8.4	9.6	-4	57	30-150	13	30	M0
Phenol	mg/kg	ND	2	2	1.5J	1.5J	76	80	51-125		30	
Pyrene	mg/kg	6.0	2	2	10.3	8.4	223	124	30-150	20	30	M0
Pyridine	mg/kg	ND	2	2	ND	ND	49	51	30-125		30	
2,4,6-Tribromophenol (S)	%						70	77	30-150			
2-Fluorobiphenyl (S)	%						72	77	59-130			
2-Fluorophenol (S)	%						67	73	43-126			
Nitrobenzene-d5 (S)	%						69	75	46-139			D4
Phenol-d6 (S)	%						71	75	49-125			
Terphenyl-d14 (S)	%						70	78	58-147			

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QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

QC Batch: MPRP/16388
QC Batch Method: % Moisture
Analysis Method: % Moisture
Analysis Description: Dry Weight/Percent Moisture
Associated Lab Samples: 1099028002

SAMPLE DUPLICATE: 648605

Parameter	Units	1098977001 Result	Dup Result	RPD	Max RPD	Qualifiers
Percent Moisture	%	3.8	3.8	1	30	

SAMPLE DUPLICATE: 648606

Parameter	Units	1099028002 Result	Dup Result	RPD	Max RPD	Qualifiers
Percent Moisture	%	12.0	11.1	8	30	

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QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

QC Batch: GCV/6264
QC Batch Method: TPH GRO/PVOC WI ext.
Analysis Method: WI MOD GRO
Analysis Description: WIGRO Solid GCV
Associated Lab Samples: 1099028002, 1099028003

METHOD BLANK: 648528 Matrix: Solid
Associated Lab Samples: 1099028002, 1099028003

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Gasoline Range Organics	mg/kg	ND	5.0	07/11/09 00:42	
a,a,a-Trifluorotoluene (S)	%	95	80-125	07/11/09 00:42	

LABORATORY CONTROL SAMPLE & LCSD: 648529 648530

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
Gasoline Range Organics	mg/kg	50	56.3	55.0	113	110	80-120	2	20	
a,a,a-Trifluorotoluene (S)	%				99	98	80-125			

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QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

QC Batch: MPRP/16387
QC Batch Method: EPA 3050
Analysis Method: EPA 6010
Analysis Description: 6010 MET
Associated Lab Samples: 1099028002

METHOD BLANK: 648559 Matrix: Solid
Associated Lab Samples: 1099028002

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Arsenic	mg/kg	ND	0.46	07/13/09 10:22	
Barium	mg/kg	ND	0.46	07/13/09 10:22	
Cadmium	mg/kg	ND	0.046	07/13/09 10:22	
Chromium	mg/kg	ND	0.46	07/13/09 10:22	
Lead	mg/kg	ND	0.28	07/13/09 10:22	
Selenium	mg/kg	ND	0.69	07/13/09 10:22	
Silver	mg/kg	ND	0.46	07/13/09 10:22	

LABORATORY CONTROL SAMPLE: 648560

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Arsenic	mg/kg	45.9	42.9	94	80-120	
Barium	mg/kg	45.9	45.9	100	80-120	
Cadmium	mg/kg	45.9	44.0	96	80-120	
Chromium	mg/kg	45.9	46.3	101	80-120	
Lead	mg/kg	45.9	45.4	99	80-120	
Selenium	mg/kg	45.9	41.7	91	80-120	
Silver	mg/kg	22.9	22.6	99	80-120	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 648561 648562

Parameter	Units	1099028002 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Arsenic	mg/kg	5.5	50.2	53.1	54.6	59.5	98	102	75-125	9	30	
Barium	mg/kg	132	50.2	53.1	224	273	183	267	75-125	20	30	M0
Cadmium	mg/kg	0.41	50.2	53.1	50.5	53.3	100	100	75-125	5	30	
Chromium	mg/kg	18.9	50.2	53.1	74.8	77.4	111	110	75-125	3	30	
Lead	mg/kg	158	50.2	53.1	374	464	431	577	75-125	21	30	M0
Selenium	mg/kg	ND	50.2	53.1	45.9	49.1	91	92	75-125	7	30	
Silver	mg/kg	ND	25.1	26.6	21.5	24.2	85	91	75-125	12	30	

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QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

QC Batch: OEXT/11101 Analysis Method: WI MOD DRO
QC Batch Method: WI MOD DRO Analysis Description: WIDRO Solid GCV
Associated Lab Samples: 1099028002

METHOD BLANK: 648663 Matrix: Solid
Associated Lab Samples: 1099028002

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Diesel Range Organics	mg/kg	ND	10.0	07/13/09 19:43	
n-Triacontane (S)	%	88	50-150	07/13/09 19:43	

LABORATORY CONTROL SAMPLE & LCSD: 648664 648665

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
Diesel Range Organics	mg/kg	80	59.1	68.4	74	86	70-120	15	20	
n-Triacontane (S)	%				82	87	50-150			

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QUALITY CONTROL DATA

Project: RYAN SCHERER
Pace Project No.: 1099028

QC Batch: MERP/3616
QC Batch Method: EPA 7471
Analysis Method: EPA 7471
Analysis Description: 7471 Mercury
Associated Lab Samples: 1099028002

METHOD BLANK: 648563 Matrix: Solid
Associated Lab Samples: 1099028002

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Mercury	mg/kg	ND	0.019	07/14/09 13:26	

LABORATORY CONTROL SAMPLE: 648564

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Mercury	mg/kg	.47	0.51	109	80-120	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 648565 648566

Parameter	Units	1099028002 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Mercury	mg/kg	0.54	.49	.53	0.88	0.85	70	58	80-120	4	20	M1

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QUALIFIERS

Project: RYAN SCHERER
Pace Project No.: 1099028

DEFINITIONS

DF - Dilution Factor, if reported, represents the factor applied to the reported data due to changes in sample preparation, dilution of the sample aliquot, or moisture content.

ND - Not Detected at or above adjusted reporting limit.

J - Estimated concentration above the adjusted method detection limit and below the adjusted reporting limit.

MDL - Adjusted Method Detection Limit.

S - Surrogate

1,2-Diphenylhydrazine (8270 listed analyte) decomposes to Azobenzene.

Consistent with EPA guidelines, unrounded data are displayed and have been used to calculate % recovery and RPD values.

LCS(D) - Laboratory Control Sample (Duplicate)

MS(D) - Matrix Spike (Duplicate)

DUP - Sample Duplicate

RPD - Relative Percent Difference

NC - Not Calculable.

Pace Analytical is NELAP accredited. Contact your Pace PM for the current list of accredited analytes.

U - Indicates the compound was analyzed for, but not detected.

BATCH QUALIFIERS

Batch: MSV/12638

[M5] A matrix spike/matrix spike duplicate was not performed for this batch due to insufficient sample volume.

Batch: GCV/6265

[M5] A matrix spike/matrix spike duplicate was not performed for this batch due to insufficient sample volume.

ANALYTE QUALIFIERS

D4	Sample was diluted due to the presence of high levels of target analytes.
L0	Analyte recovery in the laboratory control sample (LCS) was outside QC limits.
L2	Analyte recovery in the laboratory control sample (LCS) was below QC limits. Results may be biased low.
L3	Analyte recovery in the laboratory control sample (LCS) exceeded QC limits. Analyte presence below reporting limits in associated samples. Results unaffected by high bias.
M0	Matrix spike recovery was outside laboratory control limits.
M1	Matrix spike recovery exceeded QC limits. Batch accepted based on laboratory control sample (LCS) recovery.
SS	This analyte did not meet the secondary source verification criteria for the initial calibration. The reported result should be considered an estimated value.
T6	High boiling point hydrocarbons are present in the sample.

Chain of Custody

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Workorder: 1099028 **Workorder Name:** RYAN SCHERER **Results Requested** 7/14/2009

Report / Invoice To	Subcontract To
Carol Davy Pace Analytical Minnesota 1700 Elm Street Suite 200 Minneapolis, MN 55414 Phone (612)607-1700 Email: carol.davy@pacelabs.com	P.O. 1099028

Item	Sample ID	Collect Date/Time	Lab ID	Matrix	Preserved Containers: Unpreserved	Requested Analysis: 4 Bulk Asbestos	LAB USE ONLY
1	B-4 1'-2'	7/10/2009 10:00	1099026001	Solid	1		
2							
3							
4							
5							

Transfers	Released By	Date/Time	Received By	Date/Time
1	Ryan Davy Pace	7/10/09 1350	Hoyt Schwan - AES	7/13/09 - 11:45AM
2				
3				
4				
5				

Comments

APPLIED ENVIRONMENTAL SCIENCES, INC.
BULK ASBESTOS LABORATORY WORKSHEET *(Revised August 15, 2007)*

FOR LAB USE ONLY
Project: 09-268 Approved By: Lloyd Johnson
Date Received: 7/13/09 Rec. By: Lloyd Johnson
Date Analyzed: 7/13/09 Anal. By: Lloyd Johnson
Customer Contact: Phone: ______
Fax: ______
Report Mailed: ______

Customer: Pace Analytical **Date sampled:** 7/10/09

Project Location / Number Ryan-Scherer Workorder / P.O.# 1099028 **Page** 1 **of** 1

Customer ID # / Lab ID #	Sample Location	Sample Description (Include Color)	Layer	% of total sample	Chrysotile	Amosite	Crocidolite	Tremolite	Actinolite	Antho-phyllite	Results / Notes
B-4 / 1319	1'-2'	Brown soil	1.								ND
			2.								
			3.								
			4.								
			5.								
			1.								
			2.								
			3.								
			4.								
			5.								
			1.								
			2.								
			3.								
			4.								
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			2.								
			3.								
			4.								
			5.								
			1.								
			2.								
			3.								
			4.								
			5.								

Samples Collected by: Customer

Released by / Date: ______

Applied Environmental Sciences, Inc.
8441 Wayzata Boulevard, Suite 103
Minneapolis, MN 55426
(763) 545-5510, Fax (763) 545-7883

* = Composite result. Please note asbestos content by layer.

ND = None Detected
NA = Not Analyzed

Analyzed by Polarized Light Microscopy, EPA Method 600/R-93/116

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RUSH CHAIN-OF-CUSTODY / Analytical Request Document

The Chain-of-Custody is a LEGAL DOCUMENT. All relevant fields must be completed accurately.

109 9028

Page: 1 of 1

1290231

Section A Required Client Information:

- Company: Liesch Assoc.
- Address: 13400 15th Ave N, Plymouth, mn
- Email To: Mark Miller
- Phone: 763-489-3125 Fax: 489-3101
- Requested Due Date/TAT: 48 HR turn

Section B Required Project Information:

- Report To: Mark Miller
- Copy To: John Lichter
- Purchase Order No.:
- Project Name: Ryan-Scherer
- Project Number:

Section C Invoice Information:

- Attention: Melody Hintzen
- Company Name: Liesch
- Address:
- Pace Quote Reference:
- Pace Project Manager:
- Pace Profile #:

REGULATORY AGENCY

- ☐ NPDES ☐ GROUND WATER ☐ DRINKING WATER
- ☐ UST ☐ RCRA ☐ OTHER

Site Location STATE: MN

Section D Required Client Information

Matrix Codes MATRIX / CODE: Drinking Water DW, Water WT, Waste Water WW, Product P, Soil/Solid SL, Oil OL, Wipe WP, Air AR, Tissue TS, Other OT

SAMPLE ID (A-Z, 0-9 / ,-) Sample IDs MUST BE UNIQUE

Requested Analysis Filtered (Y/N)

ITEM #	SAMPLE ID	MATRIX CODE (see valid codes to left)	SAMPLE TYPE (G=GRAB C=COMP)	COMPOSITE START DATE	COMPOSITE START TIME	COMPOSITE END/GRAB DATE	COMPOSITE END/GRAB TIME	SAMPLE TEMP AT COLLECTION	# OF CONTAINERS	Unpreserved	H_2SO_4	HNO_3	HCl	NaOH	$Na_2S_2O_3$	Methanol	Other	Analysis Test	Asbestos	DRO	GRO	VOC	RCRA metals	% Solids	SVOC's					Residual Chlorine (Y/N)	Pace Project No./ Lab I.D.
1	B-4 1'-2'	SL	G			7/10/09	1000		1	1									1												001
2																															
3	B-4 7'-9'	SL	G			7/10/09	1000		9	5						4				2	2	2	1	1	1						002
4																															
5																															
6																															
7																															
8																															
9																															
10																															
11																															
12																															

ADDITIONAL COMMENTS	RELINQUISHED BY / AFFILIATION	DATE	TIME	ACCEPTED BY / AFFILIATION	DATE	TIME	Temp in °C	Received on Ice (Y/N)	Custody Sealed Cooler (Y/N)	Samples Intact (Y/N)
Rush turnaround 2-day turn	Tom Johnson Liesch	7/10/09	12:02	SHunter / Pace	7/10/09	1202	3.6	Y	N	Y

SAMPLE CONDITIONS

ORIGINAL

SAMPLER NAME AND SIGNATURE

- PRINT Name of SAMPLER: Tom Johnson
- SIGNATURE of SAMPLER: [signature] DATE Signed (MM/DD/YY): 7/10/09

*Important Note: By signing this form you are accepting Pace's NET 30 day payment terms and agreeing to late charges of 1.5% per month for any invoices not paid within 30 days.

F-ALL-Q-020rev.07, 15-May-2007

Sample Condition Upon Receipt

Pace Analytical

Client Name: Wesch Assoc. Project # 1094028

Courier: ☐ Fed Ex ☐ UPS ☐ USPS ☒ Client ☐ Commercial ☐ Pace Other _____

Tracking #: _____ [redacted]

Custody Seal on Cooler/Box Present: ☐ yes ☒ no Seals intact: ☐ yes ☒ no

Packing Material: ☐ Bubble Wrap ☒ Bubble Bags ☐ None ☐ Other _____ Temp Blank: Yes ☒ No _____

Thermometer Used 80344042, 179425 Type of Ice: (Wet) Blue None ☐ Samples on ice, cooling process has begun

Cooler Temperature 3.6 Biological Tissue is Frozen: Yes No

Temp should be above freezing to 6°C

Comments:

Date and Initials of person examining contents: _____

Chain of Custody Present:	☒Yes	☐No	☐N/A	1.
Chain of Custody Filled Out:	☒Yes	☐No	☐N/A	2.
Chain of Custody Relinquished:	☒Yes	☐No	☐N/A	3.
Sampler Name & Signature on COC:	☒Yes	☐No	☐N/A	4.
Samples Arrived within Hold Time:	☒Yes	☐No	☐N/A	5.
Short Hold Time Analysis (<72hr):	☐Yes	☒No	☐N/A	6.
Rush Turn Around Time Requested:	☒Yes	☐No	☐N/A	7. 48 hr TAT
Sufficient Volume:	☒Yes	☐No	☐N/A	8.
Correct Containers Used:	☒Yes	☐No	☐N/A	9.
-Pace Containers Used:	☒Yes	☐No	☐N/A	
Containers Intact:	☒Yes	☐No	☐N/A	10.
Filtered volume received for Dissolved tests	☐Yes	☐No	☒N/A	11.
Sample Labels match COC:	☒Yes	☐No	☐N/A	12.
-Includes date/time/ID/Analysis Matrix: SOIL				
All containers needing acid/base preservation have been checked. Noncompliance are noted in 13.	☐Yes	☐No	☒N/A	13.
All containers needing preservation are found to be in compliance with EPA recommendation.	☐Yes	☐No	☒N/A	
Exceptions: VOA,Coliform, TOC, Oil and Grease, WI-DRO (water)	☐Yes	☒No		Initial when completed / Lot # of added preservative
Samples checked for dechlorination:	☐Yes	☐No	☒N/A	14.
Headspace in VOA Vials (>6mm):	☐Yes	☐No	☒N/A	15.
Trip Blank Present:	☒Yes	☐No	☐N/A	16. TB noted COC
Trip Blank Custody Seals Present	☒Yes	☐No	☐N/A	
Pace Trip Blank Lot # (if purchased) 052509-3				

Client Notification/ Resolution: Field Data Required? Y / N

Person Contacted: _____ Date/Time: _____

Comments/ Resolution: _____

Project Manager Review: CAO Date: 7/10/09

Verified CAO 7-10-09

Note: Whenever there is a discrepancy affecting North Carolina compliance samples, a copy of this form will be sent to the North Carolina DEHNR Certification Office (i.e out of hold, incorrect preservative, out of temp, incorrect containers)

Pace Analytical Services, Inc.
1700 Elm Street - Suite 200
Minneapolis, MN 55414
(612)607-1700

July 14, 2009

Tom Johnson
Liesch Associates, Inc.
13400 15th Avenue South
Plymouth, MN 55441

RE: Project: Ryan-Scherer
Pace Project No.: 1098840

Dear Tom Johnson:
Enclosed are the analytical results for sample(s) received by the laboratory on July 08, 2009. The results relate only to the samples included in this report. Results reported herein conform to the most current NELAC standards, where applicable, unless otherwise narrated in the body of the report.

If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Carol Davy

carol.davy@pacelabs.com
Project Manager

Enclosures

Pace Analytical Services, Inc.
1700 Elm Street - Suite 200
Minneapolis, MN 55414
(612)607-1700

CERTIFICATIONS

Project: Ryan-Scherer
Pace Project No.: 1098840

Minnesota Certification IDs

Wisconsin Certification #: 999407970
Washington Certification #: C754
Alaska Certification #: UST-078
Arizona Certification #: AZ-0014
Tennessee Certification #: 02818
Pennsylvania Certification #: 68-00563
Oregon Certification #: MN200001
North Dakota Certification #: R-036
North Carolina Certification #: 530
New York Certification #: 11647
New Jersey Certification #: MN-002
Montana Certification #: MT CERT0092
Minnesota Certification #: 027-053-137
Maine Certification #: 2007029
Louisiana Certification #: LA080009
Louisiana Certification #: 03086
Kansas Certification #: E-10167
Iowa Certification #: 368
Illinois Certification #: 200011
Florida/NELAP Certification #: E87605
California Certification #: 01155CA

Montana Certification IDs

Montana Certification #: MT CERT0040
Idaho Certification #: MT00012
EPA Region 8 Certification #: 8TMS-Q

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SAMPLE SUMMARY

Project: Ryan-Scherer
Pace Project No.: 1098840

Lab ID	Sample ID	Matrix	Date Collected	Date Received
1098840001	B-3 7-9'	Solid	07/07/09 10:30	07/08/09 15:35

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SAMPLE ANALYTE COUNT

Project: Ryan-Scherer
Pace Project No.: 1098840

Lab ID	Sample ID	Method	Analysts	Analytes Reported
1098840001	B-3 7-9'	% Moisture	MWD	1
		EPA 8270	JLR	77

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098840

Sample: B-3 7-9' **Lab ID: 1098840001** Collected: 07/07/09 10:30 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
Dry Weight	Analytical Method: % Moisture								
Percent Moisture	**13.7**	%	0.10	0.10	1		07/09/09 00:00		
8270 MSSV	Analytical Method: EPA 8270 Preparation Method: EPA 3540								
Acenaphthene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	83-32-9	
Acenaphthylene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	208-96-8	
Anthracene	**2.2**	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	120-12-7	
Benzidine	ND	mg/kg	9.3	4.6	5	07/10/09 16:06	07/13/09 14:17	92-87-5	L2,M0, SS
Benzo(a)anthracene	**3.2**	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	56-55-3	
Benzo(a)pyrene	**4.2**	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	50-32-8	
Benzo(b)fluoranthene	**6.0**	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	205-99-2	
Benzo(g,h,i)perylene	**3.7**	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	191-24-2	
Benzo(k)fluoranthene	**1.9**	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	207-08-9	
Benzoic acid	ND	mg/kg	9.8	4.9	5	07/10/09 16:06	07/13/09 14:17	65-85-0	
Benzyl alcohol	ND	mg/kg	3.8	1.9	5	07/10/09 16:06	07/13/09 14:17	100-51-6	
4-Bromophenylphenyl ether	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	101-55-3	
Butylbenzylphthalate	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	85-68-7	
Carbazole	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	86-74-8	
4-Chloro-3-methylphenol	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	59-50-7	
4-Chloroaniline	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	106-47-8	
bis(2-Chloroethoxy)methane	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	111-91-1	
bis(2-Chloroethyl) ether	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	111-44-4	
bis(2-Chloroisopropyl) ether	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	108-60-1	
2-Chloronaphthalene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	91-58-7	
2-Chlorophenol	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	95-57-8	
4-Chlorophenylphenyl ether	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	7005-72-3	
Chrysene	**3.6**	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	218-01-9	
Dibenz(a,h)anthracene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	53-70-3	
Dibenzofuran	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	132-64-9	
1,2-Dichlorobenzene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	95-50-1	
1,3-Dichlorobenzene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	541-73-1	
1,4-Dichlorobenzene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	106-46-7	
3,3'-Dichlorobenzidine	ND	mg/kg	3.9	1.9	5	07/10/09 16:06	07/13/09 14:17	91-94-1	
2,4-Dichlorophenol	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	120-83-2	
Diethylphthalate	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	84-66-2	
2,4-Dimethylphenol	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	105-67-9	
Dimethylphthalate	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	131-11-3	
Di-n-butylphthalate	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	84-74-2	
4,6-Dinitro-2-methylphenol	ND	mg/kg	9.8	4.9	5	07/10/09 16:06	07/13/09 14:17	534-52-1	
2,4-Dinitrophenol	ND	mg/kg	9.8	4.9	5	07/10/09 16:06	07/13/09 14:17	51-28-5	
2,4-Dinitrotoluene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	121-14-2	
2,6-Dinitrotoluene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	606-20-2	
Di-n-octylphthalate	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	117-84-0	
1,2-Diphenylhydrazine	ND	mg/kg	9.8	4.9	5	07/10/09 16:06	07/13/09 14:17	122-66-7	
bis(2-Ethylhexyl)phthalate	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	117-81-7	

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ANALYTICAL RESULTS

Project: Ryan-Scherer
Pace Project No.: 1098840

Sample: B-3 7-9' **Lab ID: 1098840001** Collected: 07/07/09 10:30 Received: 07/08/09 15:35 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8270 MSSV	Analytical Method: EPA 8270 Preparation Method: EPA 3540								
Fluoranthene	**6.3**	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	206-44-0	M0
Fluorene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	86-73-7	
Hexachloro-1,3-butadiene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	87-68-3	
Hexachlorobenzene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	118-74-1	
Hexachlorocyclopentadiene	ND	mg/kg	9.8	0.96	5	07/10/09 16:06	07/13/09 14:17	77-47-4	
Hexachloroethane	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	67-72-1	
Indeno(1,2,3-cd)pyrene	**2.9**	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	193-39-5	
Isophorone	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	78-59-1	
1-Methylnaphthalene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	90-12-0	
2-Methylnaphthalene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	91-57-6	
2-Methylphenol(o-Cresol)	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	95-48-7	
3&4-Methylphenol	ND	mg/kg	3.8	1.9	5	07/10/09 16:06	07/13/09 14:17		
Naphthalene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	91-20-3	
2-Nitroaniline	ND	mg/kg	9.8	4.9	5	07/10/09 16:06	07/13/09 14:17	88-74-4	
3-Nitroaniline	ND	mg/kg	9.8	4.9	5	07/10/09 16:06	07/13/09 14:17	99-09-2	
4-Nitroaniline	ND	mg/kg	9.8	4.9	5	07/10/09 16:06	07/13/09 14:17	100-01-6	
Nitrobenzene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	98-95-3	
2-Nitrophenol	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	88-75-5	
4-Nitrophenol	ND	mg/kg	9.8	4.9	5	07/10/09 16:06	07/13/09 14:17	100-02-7	
N-Nitrosodimethylamine	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	62-75-9	
N-Nitroso-di-n-propylamine	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	621-64-7	
N-Nitrosodiphenylamine	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	86-30-6	
Pentachlorophenol	ND	mg/kg	9.8	4.9	5	07/10/09 16:06	07/13/09 14:17	87-86-5	
Phenanthrene	**8.5**	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	85-01-8	M0
Phenol	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	108-95-2	
Pyrene	**6.0**	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	129-00-0	M0
Pyridine	ND	mg/kg	9.8	4.9	5	07/10/09 16:06	07/13/09 14:17	110-86-1	
1,2,4-Trichlorobenzene	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	120-82-1	
2,4,5-Trichlorophenol	ND	mg/kg	9.8	4.9	5	07/10/09 16:06	07/13/09 14:17	95-95-4	
2,4,6-Trichlorophenol	ND	mg/kg	1.9	0.96	5	07/10/09 16:06	07/13/09 14:17	88-06-2	
Nitrobenzene-d5 (S)	65	%	46-139		5	07/10/09 16:06	07/13/09 14:17	4165-60-0	D4
2-Fluorobiphenyl (S)	70	%	59-130		5	07/10/09 16:06	07/13/09 14:17	321-60-8	
Terphenyl-d14 (S)	71	%	58-147		5	07/10/09 16:06	07/13/09 14:17	1718-51-0	
Phenol-d6 (S)	67	%	49-125		5	07/10/09 16:06	07/13/09 14:17	13127-88-3	
2-Fluorophenol (S)	65	%	43-126		5	07/10/09 16:06	07/13/09 14:17	367-12-4	
2,4,6-Tribromophenol (S)	64	%	30-150		5	07/10/09 16:06	07/13/09 14:17	118-79-6	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098840

QC Batch: OEXT/11095 Analysis Method: EPA 8270
QC Batch Method: EPA 3540 Analysis Description: 8270 Solid MSSV
Associated Lab Samples: 1098840001

METHOD BLANK: 648086 Matrix: Solid
Associated Lab Samples: 1098840001

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
1,2,4-Trichlorobenzene	mg/kg	ND	0.33	07/13/09 17:39	
1,2-Dichlorobenzene	mg/kg	ND	0.33	07/13/09 17:39	
1,2-Diphenylhydrazine	mg/kg	ND	1.7	07/13/09 17:39	
1,3-Dichlorobenzene	mg/kg	ND	0.33	07/13/09 17:39	
1,4-Dichlorobenzene	mg/kg	ND	0.33	07/13/09 17:39	
1-Methylnaphthalene	mg/kg	ND	0.33	07/13/09 17:39	
2,4,5-Trichlorophenol	mg/kg	ND	1.7	07/13/09 17:39	
2,4,6-Trichlorophenol	mg/kg	ND	0.33	07/13/09 17:39	
2,4-Dichlorophenol	mg/kg	ND	0.33	07/13/09 17:39	
2,4-Dimethylphenol	mg/kg	ND	0.33	07/13/09 17:39	
2,4-Dinitrophenol	mg/kg	ND	1.7	07/13/09 17:39	
2,4-Dinitrotoluene	mg/kg	ND	0.33	07/13/09 17:39	
2,6-Dinitrotoluene	mg/kg	ND	0.33	07/13/09 17:39	
2-Chloronaphthalene	mg/kg	ND	0.33	07/13/09 17:39	
2-Chlorophenol	mg/kg	ND	0.33	07/13/09 17:39	
2-Methylnaphthalene	mg/kg	ND	0.33	07/13/09 17:39	
2-Methylphenol(o-Cresol)	mg/kg	ND	0.33	07/13/09 17:39	
2-Nitroaniline	mg/kg	ND	1.7	07/13/09 17:39	
2-Nitrophenol	mg/kg	ND	0.33	07/13/09 17:39	
3&4-Methylphenol	mg/kg	ND	0.66	07/13/09 17:39	
3,3'-Dichlorobenzidine	mg/kg	ND	0.67	07/13/09 17:39	
3-Nitroaniline	mg/kg	ND	1.7	07/13/09 17:39	
4,6-Dinitro-2-methylphenol	mg/kg	ND	1.7	07/13/09 17:39	
4-Bromophenylphenyl ether	mg/kg	ND	0.33	07/13/09 17:39	
4-Chloro-3-methylphenol	mg/kg	ND	0.33	07/13/09 17:39	
4-Chloroaniline	mg/kg	ND	0.33	07/13/09 17:39	
4-Chlorophenylphenyl ether	mg/kg	ND	0.33	07/13/09 17:39	
4-Nitroaniline	mg/kg	ND	1.7	07/13/09 17:39	
4-Nitrophenol	mg/kg	ND	1.7	07/13/09 17:39	
Acenaphthene	mg/kg	ND	0.33	07/13/09 17:39	
Acenaphthylene	mg/kg	ND	0.33	07/13/09 17:39	
Anthracene	mg/kg	ND	0.33	07/13/09 17:39	
Benzidine	mg/kg	ND	1.6	07/13/09 17:39	SS
Benzo(a)anthracene	mg/kg	ND	0.33	07/13/09 17:39	
Benzo(a)pyrene	mg/kg	ND	0.33	07/13/09 17:39	
Benzo(b)fluoranthene	mg/kg	ND	0.33	07/13/09 17:39	
Benzo(g,h,i)perylene	mg/kg	ND	0.33	07/13/09 17:39	
Benzo(k)fluoranthene	mg/kg	ND	0.33	07/13/09 17:39	
Benzoic acid	mg/kg	ND	1.7	07/13/09 17:39	
Benzyl alcohol	mg/kg	ND	0.66	07/13/09 17:39	
bis(2-Chloroethoxy)methane	mg/kg	ND	0.33	07/13/09 17:39	
bis(2-Chloroethyl) ether	mg/kg	ND	0.33	07/13/09 17:39	
bis(2-Chloroisopropyl) ether	mg/kg	ND	0.33	07/13/09 17:39	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098840

METHOD BLANK: 648086 Matrix: Solid

Associated Lab Samples: 1098840001

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
bis(2-Ethylhexyl)phthalate	mg/kg	ND	0.33	07/13/09 17:39	
Butylbenzylphthalate	mg/kg	ND	0.33	07/13/09 17:39	
Carbazole	mg/kg	ND	0.33	07/13/09 17:39	
Chrysene	mg/kg	ND	0.33	07/13/09 17:39	
Di-n-butylphthalate	mg/kg	ND	0.33	07/13/09 17:39	
Di-n-octylphthalate	mg/kg	ND	0.33	07/13/09 17:39	
Dibenz(a,h)anthracene	mg/kg	ND	0.33	07/13/09 17:39	
Dibenzofuran	mg/kg	ND	0.33	07/13/09 17:39	
Diethylphthalate	mg/kg	ND	0.33	07/13/09 17:39	
Dimethylphthalate	mg/kg	ND	0.33	07/13/09 17:39	
Fluoranthene	mg/kg	ND	0.33	07/13/09 17:39	
Fluorene	mg/kg	ND	0.33	07/13/09 17:39	
Hexachloro-1,3-butadiene	mg/kg	ND	0.33	07/13/09 17:39	
Hexachlorobenzene	mg/kg	ND	0.33	07/13/09 17:39	
Hexachlorocyclopentadiene	mg/kg	ND	1.7	07/13/09 17:39	
Hexachloroethane	mg/kg	ND	0.33	07/13/09 17:39	
Indeno(1,2,3-cd)pyrene	mg/kg	ND	0.33	07/13/09 17:39	
Isophorone	mg/kg	ND	0.33	07/13/09 17:39	
N-Nitroso-di-n-propylamine	mg/kg	ND	0.33	07/13/09 17:39	
N-Nitrosodimethylamine	mg/kg	ND	0.33	07/13/09 17:39	
N-Nitrosodiphenylamine	mg/kg	ND	0.33	07/13/09 17:39	
Naphthalene	mg/kg	ND	0.33	07/13/09 17:39	
Nitrobenzene	mg/kg	ND	0.33	07/13/09 17:39	
Pentachlorophenol	mg/kg	ND	1.7	07/13/09 17:39	
Phenanthrene	mg/kg	ND	0.33	07/13/09 17:39	
Phenol	mg/kg	ND	0.33	07/13/09 17:39	
Pyrene	mg/kg	ND	0.33	07/13/09 17:39	
Pyridine	mg/kg	ND	1.7	07/13/09 17:39	
2,4,6-Tribromophenol (S)	%	64	30-150	07/13/09 17:39	
2-Fluorobiphenyl (S)	%	63	59-130	07/13/09 17:39	
2-Fluorophenol (S)	%	62	43-126	07/13/09 17:39	
Nitrobenzene-d5 (S)	%	64	46-139	07/13/09 17:39	
Phenol-d6 (S)	%	62	49-125	07/13/09 17:39	
Terphenyl-d14 (S)	%	73	58-147	07/13/09 17:39	

LABORATORY CONTROL SAMPLE: 648087

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
1,2,4-Trichlorobenzene	mg/kg	1.7	1.2	70	56-125	
1,2-Dichlorobenzene	mg/kg	1.7	1.1	68	53-125	
1,2-Diphenylhydrazine	mg/kg	1.7	1.3J	77	52-134	
1,3-Dichlorobenzene	mg/kg	1.7	1.1	68	49-125	
1,4-Dichlorobenzene	mg/kg	1.7	1.1	69	51-125	
1-Methylnaphthalene	mg/kg	1.7	1.2	71	59-125	
2,4,5-Trichlorophenol	mg/kg	1.7	1.3J	77	64-125	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098840

LABORATORY CONTROL SAMPLE: 648087

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
2,4,6-Trichlorophenol	mg/kg	1.7	1.3	76	59-125	
2,4-Dichlorophenol	mg/kg	1.7	1.2	73	60-125	
2,4-Dimethylphenol	mg/kg	1.7	1.2	69	30-129	
2,4-Dinitrophenol	mg/kg	1.7	1J	61	30-126	
2,4-Dinitrotoluene	mg/kg	1.7	1.2	74	62-127	
2,6-Dinitrotoluene	mg/kg	1.7	1.2	73	65-125	
2-Chloronaphthalene	mg/kg	1.7	1.2	72	64-125	
2-Chlorophenol	mg/kg	1.7	1.2	70	57-125	
2-Methylnaphthalene	mg/kg	1.7	1.2	75	62-125	
2-Methylphenol(o-Cresol)	mg/kg	1.7	1.2	70	50-125	
2-Nitroaniline	mg/kg	1.7	1.3J	80	30-138	
2-Nitrophenol	mg/kg	1.7	1.3	75	60-125	
3&4-Methylphenol	mg/kg	1.7	1.2	71	56-125	
3,3'-Dichlorobenzidine	mg/kg	1.7	1.1	65	30-125	
3-Nitroaniline	mg/kg	1.7	1.1J	68	58-128	
4,6-Dinitro-2-methylphenol	mg/kg	1.7	1.2J	71	39-125	
4-Bromophenylphenyl ether	mg/kg	1.7	1.3	77	66-125	
4-Chloro-3-methylphenol	mg/kg	1.7	1.3	78	59-125	
4-Chloroaniline	mg/kg	1.7	0.72	43	30-125	
4-Chlorophenylphenyl ether	mg/kg	1.7	1.2	74	64-125	
4-Nitroaniline	mg/kg	1.7	1.3J	78	48-130	
4-Nitrophenol	mg/kg	1.7	1.5J	89	48-130	
Acenaphthene	mg/kg	1.7	1.2	74	64-125	
Acenaphthylene	mg/kg	1.7	1.2	74	58-125	
Anthracene	mg/kg	1.7	1.3	78	65-125	
Benzidine	mg/kg	1.7	ND	15	30-125	L0,SS
Benzo(a)anthracene	mg/kg	1.7	1.3	77	66-125	
Benzo(a)pyrene	mg/kg	1.7	1.3	77	58-125	
Benzo(b)fluoranthene	mg/kg	1.7	1.3	79	60-125	
Benzo(g,h,i)perylene	mg/kg	1.7	1.2	74	60-125	
Benzo(k)fluoranthene	mg/kg	1.7	1.3	77	60-125	
Benzoic acid	mg/kg	1.7	1.2J	74	30-125	
Benzyl alcohol	mg/kg	1.7	1.5	87	50-125	
bis(2-Chloroethoxy)methane	mg/kg	1.7	1.2	69	62-125	
bis(2-Chloroethyl) ether	mg/kg	1.7	1.1	67	51-125	
bis(2-Chloroisopropyl) ether	mg/kg	1.7	1.1	68	37-127	
bis(2-Ethylhexyl)phthalate	mg/kg	1.7	1.4	85	63-137	
Butylbenzylphthalate	mg/kg	1.7	1.4	81	60-132	
Carbazole	mg/kg	1.7	1.3	78	59-125	
Chrysene	mg/kg	1.7	1.3	77	66-125	
Di-n-butylphthalate	mg/kg	1.7	1.3	80	65-137	
Di-n-octylphthalate	mg/kg	1.7	1.4	85	54-140	
Dibenz(a,h)anthracene	mg/kg	1.7	1.3	77	60-125	
Dibenzofuran	mg/kg	1.7	1.3	76	64-125	
Diethylphthalate	mg/kg	1.7	1.3	77	62-125	
Dimethylphthalate	mg/kg	1.7	1.3	76	66-125	
Fluoranthene	mg/kg	1.7	1.3	76	66-125	
Fluorene	mg/kg	1.7	1.3	77	64-125	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098840

LABORATORY CONTROL SAMPLE: 648087

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Hexachloro-1,3-butadiene	mg/kg	1.7	1.2	69	49-126	
Hexachlorobenzene	mg/kg	1.7	1.3	77	64-125	
Hexachlorocyclopentadiene	mg/kg	1.7	1.2J	71	30-125	
Hexachloroethane	mg/kg	1.7	1.1	68	45-125	
Indeno(1,2,3-cd)pyrene	mg/kg	1.7	1.3	75	59-126	
Isophorone	mg/kg	1.7	1.2	71	56-127	
N-Nitroso-di-n-propylamine	mg/kg	1.7	1.2	71	54-125	
N-Nitrosodimethylamine	mg/kg	1.7	1.2	70	31-130	
N-Nitrosodiphenylamine	mg/kg	1.7	1.3	77	56-125	
Naphthalene	mg/kg	1.7	1.2	71	57-125	
Nitrobenzene	mg/kg	1.7	1.1	68	54-125	
Pentachlorophenol	mg/kg	1.7	1.1J	66	39-125	
Phenanthrene	mg/kg	1.7	1.3	78	67-125	
Phenol	mg/kg	1.7	1.2	71	60-125	
Pyrene	mg/kg	1.7	1.3	80	63-127	
Pyridine	mg/kg	1.7	ND	49	30-125	
2,4,6-Tribromophenol (S)	%			78	30-150	
2-Fluorobiphenyl (S)	%			68	59-130	
2-Fluorophenol (S)	%			67	43-126	
Nitrobenzene-d5 (S)	%			68	46-139	
Phenol-d6 (S)	%			66	49-125	
Terphenyl-d14 (S)	%			75	58-147	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 648088 648089

Parameter	*Units*	1098840001 *Result*	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
1,2,4-Trichlorobenzene	mg/kg	ND	2	2	1.4J	1.5J	72	79	46-125		30	
1,2-Dichlorobenzene	mg/kg	ND	2	2	1.4J	1.4J	70	73	42-125		30	
1,2-Diphenylhydrazine	mg/kg	ND	2	2	ND	ND	79	85	50-138		30	
1,3-Dichlorobenzene	mg/kg	ND	2	2	1.3J	1.4J	69	71	37-125		30	
1,4-Dichlorobenzene	mg/kg	ND	2	2	1.3J	1.4J	69	75	31-125		30	
1-Methylnaphthalene	mg/kg	ND	2	2	1.9	2.0	98	105	47-130		30	
2,4,5-Trichlorophenol	mg/kg	ND	2	2	ND	ND	72	78	33-142		30	
2,4,6-Trichlorophenol	mg/kg	ND	2	2	1.4J	1.5J	72	79	46-133		30	
2,4-Dichlorophenol	mg/kg	ND	2	2	1.4J	1.6J	73	81	43-128		30	
2,4-Dimethylphenol	mg/kg	ND	2	2	1.5J	1.6J	78	85	30-138		30	
2,4-Dinitrophenol	mg/kg	ND	2	2	ND	ND	84	86	30-150		30	
2,4-Dinitrotoluene	mg/kg	ND	2	2	1.3J	1.4J	67	74	41-138		30	
2,6-Dinitrotoluene	mg/kg	ND	2	2	1.4J	1.4J	72	74	38-135		30	
2-Chloronaphthalene	mg/kg	ND	2	2	1.5J	1.6J	75	80	56-125		30	
2-Chlorophenol	mg/kg	ND	2	2	1.4J	1.5J	74	78	45-125		30	
2-Methylnaphthalene	mg/kg	ND	2	2	1.9	2.1	99	107	46-136		30	
2-Methylphenol(o-Cresol)	mg/kg	ND	2	2	1.5J	1.5J	75	80	45-125		30	
2-Nitroaniline	mg/kg	ND	2	2	ND	ND	76	81	30-150		30	
2-Nitrophenol	mg/kg	ND	2	2	1.4J	1.5J	74	79	30-129		30	
3&4-Methylphenol	mg/kg	ND	2	2	ND	ND	75	82	44-126		30	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098840

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 648088 648089

Parameter	Units	1098840001 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
3,3'-Dichlorobenzidine	mg/kg	ND	2	2	ND	ND	57	67	30-137		30	
3-Nitroaniline	mg/kg	ND	2	2	ND	ND	72	81	43-140		30	
4,6-Dinitro-2-methylphenol	mg/kg	ND	2	2	ND	ND	89	88	30-150		30	
4-Bromophenylphenyl ether	mg/kg	ND	2	2	1.4J	1.6J	74	82	53-132		30	
4-Chloro-3-methylphenol	mg/kg	ND	2	2	1.5J	1.6J	76	84	47-134		30	
4-Chloroaniline	mg/kg	ND	2	2	1.7J	1.8	90	95	30-125		30	
4-Chlorophenylphenyl ether	mg/kg	ND	2	2	1.5J	1.5J	76	79	59-125		30	
4-Nitroaniline	mg/kg	ND	2	2	ND	ND	76	82	30-150		30	
4-Nitrophenol	mg/kg	ND	2	2	ND	ND	76	84	36-149		30	
Acenaphthene	mg/kg	ND	2	2	2.8	2.8	80	79	30-150	0	30	
Acenaphthylene	mg/kg	ND	2	2	1.6J	1.7J	82	88	52-136		30	
Anthracene	mg/kg	2.2	2	2	4.0	3.8	92	84	30-150	4	30	
Benzidine	mg/kg	ND	2	2	ND	ND	13	16	30-125		30	M0, SS
Benzo(a)anthracene	mg/kg	3.2	2	2	5.9	5.4	139	113	30-150	9	30	
Benzo(a)pyrene	mg/kg	4.2	2	2	6.6	6.6	124	123	30-150	1	30	
Benzo(b)fluoranthene	mg/kg	6.0	2	2	8.2	8.6	114	133	30-150	4	30	
Benzo(g,h,i)perylene	mg/kg	3.7	2	2	5.6	5.9	103	118	30-150	5	30	
Benzo(k)fluoranthene	mg/kg	1.9	2	2	4.6	4.3	140	127	30-150	5	30	
Benzoic acid	mg/kg	ND	2	2	ND	ND	111	113	30-150		30	
Benzyl alcohol	mg/kg	ND	2	2	ND	ND	90	95	30-143		30	
bis(2-Chloroethoxy)methane	mg/kg	ND	2	2	1.5J	1.5J	76	79	38-127		30	
bis(2-Chloroethyl) ether	mg/kg	ND	2	2	1.4J	1.4J	72	74	33-125		30	
bis(2-Chloroisopropyl) ether	mg/kg	ND	2	2	1.5J	1.5J	76	79	44-125		30	
bis(2-Ethylhexyl)phthalate	mg/kg	ND	2	2	2.0	2.1	103	108	40-150	4	30	
Butylbenzylphthalate	mg/kg	ND	2	2	1.9	2.1	100	107	33-148	7	30	
Carbazole	mg/kg	ND	2	2	1.7J	1.9	88	98	62-133		30	
Chrysene	mg/kg	3.6	2	2	6.5	5.9	150	115	30-150	11	30	
Di-n-butylphthalate	mg/kg	ND	2	2	1.6J	1.7J	81	89	45-150		30	
Di-n-octylphthalate	mg/kg	ND	2	2	1.5J	1.8	78	94	42-144		30	
Dibenz(a,h)anthracene	mg/kg	ND	2	2	2.6	2.7	136	140	30-150	3	30	
Dibenzofuran	mg/kg	ND	2	2	2.3	2.5	69	80	56-136	9	30	
Diethylphthalate	mg/kg	ND	2	2	1.5J	1.6J	78	83	53-134		30	
Dimethylphthalate	mg/kg	ND	2	2	1.5J	1.6J	77	81	52-129		30	
Fluoranthene	mg/kg	6.3	2	2	10.8	8.9	235	133	30-150	20	30	M0
Fluorene	mg/kg	ND	2	2	3.1	3.3	66	76	54-139	6	30	
Hexachloro-1,3-butadiene	mg/kg	ND	2	2	1.4J	1.5J	71	75	33-134		30	
Hexachlorobenzene	mg/kg	ND	2	2	1.3J	1.4J	68	75	51-130		30	
Hexachlorocyclopentadiene	mg/kg	ND	2	2	ND	ND	49	47	30-137		30	
Hexachloroethane	mg/kg	ND	2	2	1.3J	1.4J	67	72	30-125		30	
Indeno(1,2,3-cd)pyrene	mg/kg	2.9	2	2	4.8	5.1	103	114	30-150	4	30	
Isophorone	mg/kg	ND	2	2	1.4J	1.5J	72	78	43-129		30	
N-Nitroso-di-n-propylamine	mg/kg	ND	2	2	1.4J	1.5J	75	79	40-129		30	
N-Nitrosodimethylamine	mg/kg	ND	2	2	1.3J	1.4J	69	71	30-135		30	
N-Nitrosodiphenylamine	mg/kg	ND	2	2	1.6J	1.7J	83	88	50-133		30	
Naphthalene	mg/kg	ND	2	2	1.7J	1.8J	86	92	49-125		30	
Nitrobenzene	mg/kg	ND	2	2	1.4J	1.5J	73	77	44-125		30	
Pentachlorophenol	mg/kg	ND	2	2	ND	ND	86	90	30-138		30	

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098840

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 648088 648089

Parameter	Units	1098840001 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Phenanthrene	mg/kg	8.5	2	2	8.4	9.6	-4	57	30-150	13	30	M0
Phenol	mg/kg	ND	2	2	1.5J	1.5J	76	80	51-125		30	
Pyrene	mg/kg	6.0	2	2	10.3	8.4	223	124	30-150	20	30	M0
Pyridine	mg/kg	ND	2	2	ND	ND	49	51	30-125		30	
2,4,6-Tribromophenol (S)	%						70	77	30-150			
2-Fluorobiphenyl (S)	%						72	77	59-130			
2-Fluorophenol (S)	%						67	73	43-126			
Nitrobenzene-d5 (S)	%						69	75	46-139			D4
Phenol-d6 (S)	%						71	75	49-125			
Terphenyl-d14 (S)	%						70	78	58-147			

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QUALITY CONTROL DATA

Project: Ryan-Scherer
Pace Project No.: 1098840

QC Batch: MPRP/16363
QC Batch Method: % Moisture
Associated Lab Samples: 1098840001

Analysis Method: % Moisture
Analysis Description: Dry Weight/Percent Moisture

SAMPLE DUPLICATE: 647404

Parameter	Units	1098629010 Result	Dup Result	RPD	Max RPD	Qualifiers
Percent Moisture	%	17.8	20.2	13	30	

SAMPLE DUPLICATE: 647405

Parameter	Units	1098625003 Result	Dup Result	RPD	Max RPD	Qualifiers
Percent Moisture	%	18.0	18.7	4	30	

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QUALIFIERS

Project: Ryan-Scherer
Pace Project No.: 1098840

DEFINITIONS

DF - Dilution Factor, if reported, represents the factor applied to the reported data due to changes in sample preparation, dilution of the sample aliquot, or moisture content.

ND - Not Detected at or above adjusted reporting limit.

J - Estimated concentration above the adjusted method detection limit and below the adjusted reporting limit.

MDL - Adjusted Method Detection Limit.

S - Surrogate

1,2-Diphenylhydrazine (8270 listed analyte) decomposes to Azobenzene.

Consistent with EPA guidelines, unrounded data are displayed and have been used to calculate % recovery and RPD values.

LCS(D) - Laboratory Control Sample (Duplicate)

MS(D) - Matrix Spike (Duplicate)

DUP - Sample Duplicate

RPD - Relative Percent Difference

NC - Not Calculable.

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U - Indicates the compound was analyzed for, but not detected.

WORKORDER QUALIFIERS

WO: 1098840

[1] The samples were received outside of required temperature range. Analysis was completed upon client approval.

ANALYTE QUALIFIERS

D4 Sample was diluted due to the presence of high levels of target analytes.

L0 Analyte recovery in the laboratory control sample (LCS) was outside QC limits.

L2 Analyte recovery in the laboratory control sample (LCS) was below QC limits. Results may be biased low.

M0 Matrix spike recovery was outside laboratory control limits.

SS This analyte did not meet the secondary source verification criteria for the initial calibration. The reported result should be considered an estimated value.

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CHAIN-OF-CUSTODY / Analytical Request Document

The Chain-of-Custody is a LEGAL DOCUMENT. All relevant fields must be completed accurately.

1098840

Page: 1 of 1

1203215

Section A Required Client Information:

Company: Liesch Assoc.
Address: 13400 15th Ave N
Plymouth, MN
Email To: Mark Miller
Phone: 763 489-3125 Fax: 489-3101
Requested Due Date/TAT: Friday/Monday

Section B Required Project Information:

Report To: Mark Miller
Copy To: John Lichter
Purchase Order No.:
Project Name: Ryan-Scherer
Project Number:

Section C Invoice Information:

Attention: Melody Hintzen
Company Name: Liesch
Address: Same
Pace Quote Reference:
Pace Project Manager:
Pace Profile #:

REGULATORY AGENCY

☐ NPDES ☐ GROUND WATER ☐ DRINKING WATER
☐ UST ☐ RCRA ☐ OTHER

Site Location STATE: MN

Section D Required Client Information

Matrix Codes MATRIX / CODE: Drinking Water DW, Water WT, Waste Water WW, Product P, Soil/Solid SL, Oil OL, Wipe WP, Air AR, Tissue TS, Other OT

SAMPLE ID (A-Z, 0-9 / ,-) Sample IDs MUST BE UNIQUE

ITEM #	SAMPLE ID	MATRIX CODE	SAMPLE TYPE (G=GRAB C=COMP)	Composite Start DATE	Composite Start TIME	Composite End/Grab DATE	Composite End/Grab TIME	SAMPLE TEMP AT COLLECTION	# OF CONTAINERS	Unpreserved	H_2SO_4	HNO_3	HCl	NaOH	$Na_2S_2O_3$	Methanol	Other	Analysis Test Y/N	SVOC-Full list	Asbestos	GRO	DRO	VOC	RCRA Metals	% Solids	Residual Chlorine (Y/N)	Pace Project No./ Lab I.D.
1	B-3 7-9'	SL	G			7-7-09	1030		1	X									/		← 5 day turn						001
2	B-9 1.5'-2'	SL	G			7-8-09	1130		1	X										1							
3	B-9 3-5'	SL	G			7-8-09	1130		8	4						4					Z	Z	Z	1	1		
4	B-8 1-2'	SL	G			7-8-09	1200		1	X									/	1							
5	B-8 3-5'	SL	G			7-8-09	1200		8	4						4					Z	Z	Z	1	1		
6	B-5 1.5-2'	SL	G			7-8-09	1300		1	1										1							
7	B-5 4-6'	SL	G			7-8-09	1300		8	4						4					Z	Z	Z	1	1		
8	B-7 1'-2'	SL	G			7-8-09	1400		1	1										1							
9	B-7 1'-3'	SL	G			7-8-09	1400		8	4						4					Z	Z	Z	1	1		
10	B-10 1'-2'	SL	G			7-8-09	1500		1	1										1							
11	B-10 4-6'	SL	G			7-8-09	1500		8	4						4					Z	Z	Z	1	1		
12																											

ADDITIONAL COMMENTS	RELINQUISHED BY / AFFILIATION	DATE	TIME	ACCEPTED BY / AFFILIATION	DATE	TIME	Temp in °C	Received on Ice (Y/N)	Custody Sealed Cooler (Y/N)	Samples Intact (Y/N)
Rush 2-day turn	Tom Johnson Liesch	7-8-09	1535	[signature]	7/8/09	1535	6.4	Y	N	Y

15 of 16

3

SAMPLER NAME AND SIGNATURE

PRINT Name of SAMPLER: Tom Johnson

SIGNATURE of SAMPLER: [signature] DATE Signed (MM/DD/YY): 7/8/09 1535

*Important Note: By signing this form you are accepting Pace's NET 30 day payment terms and agreeing to late charges of 1.5% per month for any invoices not paid within 30 days.

F-ALL-Q-020rev.07, 15-May-2007

Sample Condition Upon Receipt

Pace Analytical

Client Name: Gesch   Project # 1088840

[redacted]

Courier: [ ] Fed Ex [ ] UPS [ ] USPS [x] Client [ ] Commercial [ ] Pace Other ______

Tracking #: ______

Custody Seal on Cooler/Box Present: [ ] yes [x] no   Seals intact: [ ] yes [x] no

Packing Material: [ ] Bubble Wrap [x] Bubble Bags [ ] None [ ] Other ______   Temp Blank: Yes ✓ No ______

Thermometer Used ~~80344042~~, 179425   **Type of Ice:** (Wet) Blue None   [ ] Samples on ice, cooling process has begun

Cooler Temperature 6.4   **Biological Tissue is Frozen:** Yes No

Temp should be above freezing to 6°C

Date and Initials of person examining contents: 7/8/09

				Comments:
Chain of Custody Present:	[x] Yes	[ ] No	[ ] N/A	1.
Chain of Custody Filled Out:	[x] Yes	[ ] No	[ ] N/A	2.
Chain of Custody Relinquished:	[x] Yes	[ ] No	[ ] N/A	3.
Sampler Name & Signature on COC:	[x] Yes	[ ] No	[ ] N/A	4.
Samples Arrived within Hold Time:	[x] Yes	[ ] No	[ ] N/A	5.
Short Hold Time Analysis (<72hr):	[ ] Yes	[ ] No	[x] N/A	6.
Rush Turn Around Time Requested:	[x] Yes	[ ] No	[ ] N/A	7. 2 day
Sufficient Volume:	[x] Yes	[ ] No	[ ] N/A	8.
Correct Containers Used:	[x] Yes	[ ] No	[ ] N/A	9.
-Pace Containers Used:	[x] Yes	[ ] No	[ ] N/A	
Containers Intact:	[x] Yes	[ ] No	[ ] N/A	10.
Filtered volume received for Dissolved tests	[ ] Yes	[ ] No	[x] N/A	11.
Sample Labels match COC:	[x] Yes	[ ] No	[ ] N/A	12.
-Includes date/time/ID/Analysis Matrix: SL				
All containers needing acid/base preservation have been checked. Noncompliance are noted in 13.	[ ] Yes	[ ] No	[x] N/A	13.
All containers needing preservation are found to be in compliance with EPA recommendation.	[ ] Yes	[ ] No	[x] N/A	
Exceptions: VOA, Coliform, TOC, Oil and Grease, WI-DRO (water)	[ ] Yes	[x] No		Initial when completed — / Lot # of added preservative
Samples checked for dechlorination:	[ ] Yes	[ ] No	[x] N/A	14.
Headspace in VOA Vials (>6mm):	[ ] Yes	[ ] No	[x] N/A	15.
Trip Blank Present:	[ ] Yes	[ ] No	[x] N/A	16.
Trip Blank Custody Seals Present	[ ] Yes	[ ] No	[x] N/A	
Pace Trip Blank Lot # (if purchased):				

Client Notification/ Resolution: Field Data Required? Y / N

Person Contacted: Tara Thompson   Date/Time: 7-8-09

Comments/ Resolution: proceed with though some samples collected ?? not at temp. (Sample 001)

Project Manager Review: GAP   **Date:** 7-8-09

RLW 7/8/09 95m

Note: Whenever there is a discrepancy affecting North Carolina compliance samples, a copy of this form will be sent to the North Carolina DEHNR Certification Office (i.e out of hold, incorrect preservative, out of temp, incorrect containers)

F-ALLC003rev.5, 5Aug2008

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July 15, 2009

Mr. Mark Miller
Liesch Associates, Inc.
13400 15th Avenue North
Plymouth, MN 55441

RE: Project: RYAN-SCHERER
Pace Project No.: 1099131

Dear Mr. Miller:
Enclosed are the analytical results for sample(s) received by the laboratory on July 13, 2009. The results relate only to the samples included in this report. Results reported herein conform to the most current NELAC standards, where applicable, unless otherwise narrated in the body of the report.

If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Carol Davy

carol.davy@pacelabs.com
Project Manager

Enclosures

REPORT OF LABORATORY ANALYSIS

Pace Analytical Services, Inc.
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CERTIFICATIONS

Project: RYAN-SCHERER
Pace Project No.: 1099131

Minnesota Certification IDs
Wisconsin Certification #: 999407970
Washington Certification #: C754
Alaska Certification #: UST-078
Arizona Certification #: AZ-0014
Tennessee Certification #: 02818
Pennsylvania Certification #: 68-00563
Oregon Certification #: MN200001
North Dakota Certification #: R-036
North Carolina Certification #: 530
New York Certification #: 11647
New Jersey Certification #: MN-002
Montana Certification #: MT CERT0092
Minnesota Certification #: 027-053-137
Maine Certification #: 2007029
Louisiana Certification #: LA080009
Louisiana Certification #: 03086
Kansas Certification #: E-10167
Iowa Certification #: 368
Illinois Certification #: 200011
Florida/NELAP Certification #: E87605
California Certification #: 01155CA

Montana Certification IDs
Montana Certification #: MT CERT0040
Idaho Certification #: MT00012
EPA Region 8 Certification #: 8TMS-Q

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SAMPLE SUMMARY

Project: RYAN-SCHERER
Pace Project No.: 1099131

Lab ID	Sample ID	Matrix	Date Collected	Date Received
1099131001	B-10 9'-11'	Solid	07/08/09 15:00	07/13/09 10:34
1099131002	B-11 12'-13'	Solid	07/13/09 10:00	07/13/09 10:34

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SAMPLE ANALYTE COUNT

Project: RYAN-SCHERER
Pace Project No.: 1099131

Lab ID	Sample ID	Method	Analysts	Analytes Reported
1099131001	**B-10 9'-11'**	% Moisture	MWD	1
		EPA 6010	IP	7
		EPA 7471	RJS	1
		EPA 8260	RTP	71
		WI MOD DRO	JLR	2
		WI MOD GRO	AMS1	2
1099131002	**B-11 12'-13'**	% Moisture	MWD	1
		EPA 6010	IP	7
		EPA 7471	RJS	1
		EPA 8260	RTP	71
		WI MOD DRO	JLR	2
		WI MOD GRO	AMS1	2

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ANALYTICAL RESULTS

Project: RYAN-SCHERER
Pace Project No.: 1099131

Sample: B-10 9'-11' **Lab ID: 1099131001** Collected: 07/08/09 15:00 Received: 07/13/09 10:34 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
WIDRO GCS Silica Gel	Analytical Method: WI MOD DRO Preparation Method: WI MOD DRO								
Diesel Range Organics	ND	mg/kg	12.6	6.3	1	07/13/09 10:40	07/14/09 16:58		L2
n-Triacontane (S)	75	%	50-150		1	07/13/09 10:40	07/14/09 16:58		
WIGRO GCV	Analytical Method: WI MOD GRO Preparation Method: TPH GRO/PVOC WI ext.								
Gasoline Range Organics	ND	mg/kg	6.4	3.2	1	07/13/09 12:58	07/14/09 00:57		
a,a,a-Trifluorotoluene (S)	95	%	80-125		1	07/13/09 12:58	07/14/09 00:57	98-08-8	
6010 MET ICP	Analytical Method: EPA 6010 Preparation Method: EPA 3050								
Arsenic	**10.1**	mg/kg	0.54	0.30	1	07/13/09 15:10	07/13/09 18:51	7440-38-2	
Barium	**115**	mg/kg	0.54	0.27	1	07/13/09 15:10	07/13/09 18:51	7440-39-3	
Cadmium	**0.077**	mg/kg	0.054	0.027	1	07/13/09 15:10	07/13/09 18:51	7440-43-9	
Chromium	**17.6**	mg/kg	0.54	0.27	1	07/13/09 15:10	07/13/09 18:51	7440-47-3	
Lead	**8.0**	mg/kg	0.32	0.16	1	07/13/09 15:10	07/13/09 18:51	7439-92-1	
Selenium	**2.3**	mg/kg	0.81	0.41	1	07/13/09 15:10	07/13/09 18:51	7782-49-2	
Silver	ND	mg/kg	0.54	0.27	1	07/13/09 15:10	07/13/09 18:51	7440-22-4	
7471 Mercury	Analytical Method: EPA 7471 Preparation Method: EPA 7471								
Mercury	**0.032**	mg/kg	0.023	0.011	1	07/15/09 11:01	07/15/09 14:38	7439-97-6	
Dry Weight	Analytical Method: % Moisture								
Percent Moisture	**22.4**	%	0.10	0.10	1		07/13/09 00:00		
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Acetone	ND	mg/kg	0.64	0.32	1	07/13/09 12:59	07/13/09 19:37	67-64-1	
Allyl chloride	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	107-05-1	
Benzene	ND	mg/kg	0.064	0.032	1	07/13/09 12:59	07/13/09 19:37	71-43-2	
Bromobenzene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	108-86-1	
Bromochloromethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	74-97-5	
Bromodichloromethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	75-27-4	
Bromoform	ND	mg/kg	1.3	0.26	1	07/13/09 12:59	07/13/09 19:37	75-25-2	
Bromomethane	ND	mg/kg	0.64	0.32	1	07/13/09 12:59	07/13/09 19:37	74-83-9	
2-Butanone (MEK)	ND	mg/kg	0.64	0.32	1	07/13/09 12:59	07/13/09 19:37	78-93-3	
n-Butylbenzene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	104-51-8	
sec-Butylbenzene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	135-98-8	
tert-Butylbenzene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	98-06-6	
Carbon tetrachloride	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	56-23-5	
Chlorobenzene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	108-90-7	
Chloroethane	ND	mg/kg	0.64	0.13	1	07/13/09 12:59	07/13/09 19:37	75-00-3	
Chloroform	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	67-66-3	
Chloromethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	74-87-3	
2-Chlorotoluene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	95-49-8	
4-Chlorotoluene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	106-43-4	
1,2-Dibromo-3-chloropropane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	96-12-8	
Dibromochloromethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	124-48-1	

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ANALYTICAL RESULTS

Project: RYAN-SCHERER
Pace Project No.: 1099131

Sample: B-10 9'-11' **Lab ID: 1099131001** Collected: 07/08/09 15:00 Received: 07/13/09 10:34 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
1,2-Dibromoethane (EDB)	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	106-93-4	
Dibromomethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	74-95-3	
1,2-Dichlorobenzene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	95-50-1	
1,3-Dichlorobenzene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	541-73-1	
1,4-Dichlorobenzene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	106-46-7	
Dichlorodifluoromethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	75-71-8	
1,1-Dichloroethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	75-34-3	
1,2-Dichloroethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	107-06-2	
1,1-Dichloroethene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	75-35-4	
cis-1,2-Dichloroethene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	156-59-2	
trans-1,2-Dichloroethene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	156-60-5	
Dichlorofluoromethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	75-43-4	
1,2-Dichloropropane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	78-87-5	
1,3-Dichloropropane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	142-28-9	
2,2-Dichloropropane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	594-20-7	
1,1-Dichloropropene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	563-58-6	
cis-1,3-Dichloropropene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	10061-01-5	
trans-1,3-Dichloropropene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	10061-02-6	
Diethyl ether (Ethyl ether)	ND	mg/kg	0.64	0.32	1	07/13/09 12:59	07/13/09 19:37	60-29-7	
Ethylbenzene	ND	mg/kg	0.064	0.032	1	07/13/09 12:59	07/13/09 19:37	100-41-4	
Hexachloro-1,3-butadiene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	87-68-3	
Isopropylbenzene (Cumene)	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	98-82-8	
p-Isopropyltoluene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	99-87-6	
Methylene Chloride	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	mg/kg	0.64	0.32	1	07/13/09 12:59	07/13/09 19:37	108-10-1	
Methyl-tert-butyl ether	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	1634-04-4	
Naphthalene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	91-20-3	
n-Propylbenzene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	103-65-1	
Styrene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	100-42-5	
1,1,1,2-Tetrachloroethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	630-20-6	
1,1,2,2-Tetrachloroethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	79-34-5	
Tetrachloroethene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	127-18-4	
Tetrahydrofuran	ND	mg/kg	2.6	1.3	1	07/13/09 12:59	07/13/09 19:37	109-99-9	
Toluene	ND	mg/kg	0.064	0.032	1	07/13/09 12:59	07/13/09 19:37	108-88-3	
1,2,3-Trichlorobenzene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	87-61-6	
1,2,4-Trichlorobenzene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	120-82-1	
1,1,1-Trichloroethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	71-55-6	
1,1,2-Trichloroethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	79-00-5	
Trichloroethene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	79-01-6	
Trichlorofluoromethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	75-69-4	
1,2,3-Trichloropropane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	96-18-4	
1,1,2-Trichlorotrifluoroethane	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	76-13-1	
1,2,4-Trimethylbenzene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	95-63-6	
1,3,5-Trimethylbenzene	ND	mg/kg	0.26	0.13	1	07/13/09 12:59	07/13/09 19:37	108-67-8	
Vinyl chloride	ND	mg/kg	0.064	0.032	1	07/13/09 12:59	07/13/09 19:37	75-01-4	

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ANALYTICAL RESULTS

Project: RYAN-SCHERER
Pace Project No.: 1099131

Sample: B-10 9'-11' **Lab ID: 1099131001** Collected: 07/08/09 15:00 Received: 07/13/09 10:34 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Xylene (Total)	ND	mg/kg	0.19	0.097	1	07/13/09 12:59	07/13/09 19:37	1330-20-7	
Dibromofluoromethane (S)	95	%	61-139		1	07/13/09 12:59	07/13/09 19:37	1868-53-7	
1,2-Dichloroethane-d4 (S)	93	%	68-136		1	07/13/09 12:59	07/13/09 19:37	17060-07-0	
Toluene-d8 (S)	108	%	68-133		1	07/13/09 12:59	07/13/09 19:37	2037-26-5	
4-Bromofluorobenzene (S)	105	%	68-126		1	07/13/09 12:59	07/13/09 19:37	460-00-4	

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ANALYTICAL RESULTS

Project: RYAN-SCHERER
Pace Project No.: 1099131

Sample: B-11 12'-13' **Lab ID: 1099131002** Collected: 07/13/09 10:00 Received: 07/13/09 10:34 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
WIDRO GCS Silica Gel	Analytical Method: WI MOD DRO Preparation Method: WI MOD DRO								
Diesel Range Organics	ND	mg/kg	10.0	5.0	1	07/13/09 10:40	07/14/09 17:06		L2
n-Triacontane (S)	73	%	50-150		1	07/13/09 10:40	07/14/09 17:06		
WIGRO GCV	Analytical Method: WI MOD GRO Preparation Method: TPH GRO/PVOC WI ext.								
Gasoline Range Organics	ND	mg/kg	5.6	2.8	1	07/13/09 12:58	07/14/09 01:20		
a,a,a-Trifluorotoluene (S)	95	%	80-125		1	07/13/09 12:58	07/14/09 01:20	98-08-8	
6010 MET ICP	Analytical Method: EPA 6010 Preparation Method: EPA 3050								
Arsenic	**1.9**	mg/kg	0.43	0.24	1	07/13/09 15:10	07/13/09 18:57	7440-38-2	
Barium	**11.0**	mg/kg	0.43	0.22	1	07/13/09 15:10	07/13/09 18:57	7440-39-3	
Cadmium	**0.29**	mg/kg	0.043	0.022	1	07/13/09 15:10	07/13/09 18:57	7440-43-9	
Chromium	**9.9**	mg/kg	0.43	0.22	1	07/13/09 15:10	07/13/09 18:57	7440-47-3	
Lead	**1.8**	mg/kg	0.26	0.13	1	07/13/09 15:10	07/13/09 18:57	7439-92-1	
Selenium	ND	mg/kg	0.65	0.33	1	07/13/09 15:10	07/13/09 18:57	7782-49-2	
Silver	ND	mg/kg	0.43	0.22	1	07/13/09 15:10	07/13/09 18:57	7440-22-4	
7471 Mercury	Analytical Method: EPA 7471 Preparation Method: EPA 7471								
Mercury	ND	mg/kg	0.020	0.010	1	07/15/09 11:01	07/15/09 14:39	7439-97-6	
Dry Weight	Analytical Method: % Moisture								
Percent Moisture	**8.0**	%	0.10	0.10	1		07/13/09 00:00		
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Acetone	ND	mg/kg	0.55	0.27	1	07/13/09 12:59	07/13/09 19:57	67-64-1	
Allyl chloride	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	107-05-1	
Benzene	ND	mg/kg	0.055	0.027	1	07/13/09 12:59	07/13/09 19:57	71-43-2	
Bromobenzene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	108-86-1	
Bromochloromethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	74-97-5	
Bromodichloromethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	75-27-4	
Bromoform	ND	mg/kg	1.1	0.22	1	07/13/09 12:59	07/13/09 19:57	75-25-2	
Bromomethane	ND	mg/kg	0.55	0.27	1	07/13/09 12:59	07/13/09 19:57	74-83-9	
2-Butanone (MEK)	ND	mg/kg	0.55	0.27	1	07/13/09 12:59	07/13/09 19:57	78-93-3	
n-Butylbenzene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	104-51-8	
sec-Butylbenzene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	135-98-8	
tert-Butylbenzene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	98-06-6	
Carbon tetrachloride	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	56-23-5	
Chlorobenzene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	108-90-7	
Chloroethane	ND	mg/kg	0.55	0.11	1	07/13/09 12:59	07/13/09 19:57	75-00-3	
Chloroform	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	67-66-3	
Chloromethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	74-87-3	
2-Chlorotoluene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	95-49-8	
4-Chlorotoluene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	106-43-4	
1,2-Dibromo-3-chloropropane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	96-12-8	
Dibromochloromethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	124-48-1	

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ANALYTICAL RESULTS

Project: RYAN-SCHERER
Pace Project No.: 1099131

Sample: B-11 12'-13' **Lab ID: 1099131002** Collected: 07/13/09 10:00 Received: 07/13/09 10:34 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
1,2-Dibromoethane (EDB)	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	106-93-4	
Dibromomethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	74-95-3	
1,2-Dichlorobenzene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	95-50-1	
1,3-Dichlorobenzene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	541-73-1	
1,4-Dichlorobenzene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	106-46-7	
Dichlorodifluoromethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	75-71-8	
1,1-Dichloroethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	75-34-3	
1,2-Dichloroethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	107-06-2	
1,1-Dichloroethene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	75-35-4	
cis-1,2-Dichloroethene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	156-59-2	
trans-1,2-Dichloroethene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	156-60-5	
Dichlorofluoromethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	75-43-4	
1,2-Dichloropropane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	78-87-5	
1,3-Dichloropropane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	142-28-9	
2,2-Dichloropropane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	594-20-7	
1,1-Dichloropropene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	563-58-6	
cis-1,3-Dichloropropene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	10061-01-5	
trans-1,3-Dichloropropene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	10061-02-6	
Diethyl ether (Ethyl ether)	ND	mg/kg	0.55	0.27	1	07/13/09 12:59	07/13/09 19:57	60-29-7	
Ethylbenzene	ND	mg/kg	0.055	0.027	1	07/13/09 12:59	07/13/09 19:57	100-41-4	
Hexachloro-1,3-butadiene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	87-68-3	
Isopropylbenzene (Cumene)	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	98-82-8	
p-Isopropyltoluene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	99-87-6	
Methylene Chloride	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	75-09-2	
4-Methyl-2-pentanone (MIBK)	ND	mg/kg	0.55	0.27	1	07/13/09 12:59	07/13/09 19:57	108-10-1	
Methyl-tert-butyl ether	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	1634-04-4	
Naphthalene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	91-20-3	
n-Propylbenzene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	103-65-1	
Styrene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	100-42-5	
1,1,1,2-Tetrachloroethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	630-20-6	
1,1,2,2-Tetrachloroethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	79-34-5	
Tetrachloroethene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	127-18-4	
Tetrahydrofuran	ND	mg/kg	2.2	1.1	1	07/13/09 12:59	07/13/09 19:57	109-99-9	
Toluene	ND	mg/kg	0.055	0.027	1	07/13/09 12:59	07/13/09 19:57	108-88-3	
1,2,3-Trichlorobenzene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	87-61-6	
1,2,4-Trichlorobenzene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	120-82-1	
1,1,1-Trichloroethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	71-55-6	
1,1,2-Trichloroethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	79-00-5	
Trichloroethene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	79-01-6	
Trichlorofluoromethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	75-69-4	
1,2,3-Trichloropropane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	96-18-4	
1,1,2-Trichlorotrifluoroethane	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	76-13-1	
1,2,4-Trimethylbenzene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	95-63-6	
1,3,5-Trimethylbenzene	ND	mg/kg	0.22	0.11	1	07/13/09 12:59	07/13/09 19:57	108-67-8	
Vinyl chloride	ND	mg/kg	0.055	0.027	1	07/13/09 12:59	07/13/09 19:57	75-01-4	

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ANALYTICAL RESULTS

Project: RYAN-SCHERER
Pace Project No.: 1099131

Sample: B-11 12'-13' **Lab ID: 1099131002** Collected: 07/13/09 10:00 Received: 07/13/09 10:34 Matrix: Solid

Results reported on a "dry-weight" basis

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
8260 MSV 5030 Med Level	Analytical Method: EPA 8260 Preparation Method: EPA 5035/5030B								
Xylene (Total)	ND	mg/kg	0.16	0.082	1	07/13/09 12:59	07/13/09 19:57	1330-20-7	
Dibromofluoromethane (S)	90	%	61-139		1	07/13/09 12:59	07/13/09 19:57	1868-53-7	
1,2-Dichloroethane-d4 (S)	87	%	68-136		1	07/13/09 12:59	07/13/09 19:57	17060-07-0	
Toluene-d8 (S)	100	%	68-133		1	07/13/09 12:59	07/13/09 19:57	2037-26-5	
4-Bromofluorobenzene (S)	97	%	68-126		1	07/13/09 12:59	07/13/09 19:57	460-00-4	

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QUALITY CONTROL DATA

Project: RYAN-SCHERER
Pace Project No.: 1099131

QC Batch: MERP/3617 Analysis Method: EPA 7471
QC Batch Method: EPA 7471 Analysis Description: 7471 Mercury
Associated Lab Samples: 1099131001, 1099131002

METHOD BLANK: 649978 Matrix: Solid
Associated Lab Samples: 1099131001, 1099131002

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Mercury	mg/kg	ND	0.017	07/15/09 14:21	

LABORATORY CONTROL SAMPLE: 649979

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Mercury	mg/kg	.48	0.50	104	80-120	

MATRIX SPIKE SAMPLE: 649980

Parameter	Units	1098856001 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
Mercury	mg/kg	ND	.56	0.56	100	80-120	

MATRIX SPIKE SAMPLE: 649981

Parameter	Units	1099244001 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
Mercury	mg/kg	ND	.45	0.51	110	80-120	

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QUALITY CONTROL DATA

Project: RYAN-SCHERER
Pace Project No.: 1099131

QC Batch: MSV/12644 Analysis Method: EPA 8260
QC Batch Method: EPA 5035/5030B Analysis Description: 8260 MSV 5030 Med Level
Associated Lab Samples: 1099131001, 1099131002

METHOD BLANK: 649100 Matrix: Solid
Associated Lab Samples: 1099131001, 1099131002

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
1,1,1,2-Tetrachloroethane	mg/kg	ND	0.20	07/13/09 15:12	
1,1,1-Trichloroethane	mg/kg	ND	0.20	07/13/09 15:12	
1,1,2,2-Tetrachloroethane	mg/kg	ND	0.20	07/13/09 15:12	
1,1,2-Trichloroethane	mg/kg	ND	0.20	07/13/09 15:12	
1,1,2-Trichlorotrifluoroethane	mg/kg	ND	0.20	07/13/09 15:12	
1,1-Dichloroethane	mg/kg	ND	0.20	07/13/09 15:12	
1,1-Dichloroethene	mg/kg	ND	0.20	07/13/09 15:12	
1,1-Dichloropropene	mg/kg	ND	0.20	07/13/09 15:12	
1,2,3-Trichlorobenzene	mg/kg	ND	0.20	07/13/09 15:12	
1,2,3-Trichloropropane	mg/kg	ND	0.20	07/13/09 15:12	
1,2,4-Trichlorobenzene	mg/kg	ND	0.20	07/13/09 15:12	
1,2,4-Trimethylbenzene	mg/kg	ND	0.20	07/13/09 15:12	
1,2-Dibromo-3-chloropropane	mg/kg	ND	0.20	07/13/09 15:12	
1,2-Dibromoethane (EDB)	mg/kg	ND	0.20	07/13/09 15:12	
1,2-Dichlorobenzene	mg/kg	ND	0.20	07/13/09 15:12	
1,2-Dichloroethane	mg/kg	ND	0.20	07/13/09 15:12	
1,2-Dichloropropane	mg/kg	ND	0.20	07/13/09 15:12	
1,3,5-Trimethylbenzene	mg/kg	ND	0.20	07/13/09 15:12	
1,3-Dichlorobenzene	mg/kg	ND	0.20	07/13/09 15:12	
1,3-Dichloropropane	mg/kg	ND	0.20	07/13/09 15:12	
1,4-Dichlorobenzene	mg/kg	ND	0.20	07/13/09 15:12	
2,2-Dichloropropane	mg/kg	ND	0.20	07/13/09 15:12	
2-Butanone (MEK)	mg/kg	ND	0.50	07/13/09 15:12	
2-Chlorotoluene	mg/kg	ND	0.20	07/13/09 15:12	
4-Chlorotoluene	mg/kg	ND	0.20	07/13/09 15:12	
4-Methyl-2-pentanone (MIBK)	mg/kg	ND	0.50	07/13/09 15:12	
Acetone	mg/kg	ND	0.50	07/13/09 15:12	
Allyl chloride	mg/kg	ND	0.20	07/13/09 15:12	
Benzene	mg/kg	ND	0.050	07/13/09 15:12	
Bromobenzene	mg/kg	ND	0.20	07/13/09 15:12	
Bromochloromethane	mg/kg	ND	0.20	07/13/09 15:12	
Bromodichloromethane	mg/kg	ND	0.20	07/13/09 15:12	
Bromoform	mg/kg	ND	1.0	07/13/09 15:12	
Bromomethane	mg/kg	ND	0.50	07/13/09 15:12	
Carbon tetrachloride	mg/kg	ND	0.20	07/13/09 15:12	
Chlorobenzene	mg/kg	ND	0.20	07/13/09 15:12	
Chloroethane	mg/kg	ND	0.50	07/13/09 15:12	
Chloroform	mg/kg	ND	0.20	07/13/09 15:12	
Chloromethane	mg/kg	ND	0.20	07/13/09 15:12	
cis-1,2-Dichloroethene	mg/kg	ND	0.20	07/13/09 15:12	
cis-1,3-Dichloropropene	mg/kg	ND	0.20	07/13/09 15:12	
Dibromochloromethane	mg/kg	ND	0.20	07/13/09 15:12	
Dibromomethane	mg/kg	ND	0.20	07/13/09 15:12	

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QUALITY CONTROL DATA

Project: RYAN-SCHERER
Pace Project No.: 1099131

METHOD BLANK: 649100 Matrix: Solid

Associated Lab Samples: 1099131001, 1099131002

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Dichlorodifluoromethane	mg/kg	ND	0.20	07/13/09 15:12	
Dichlorofluoromethane	mg/kg	ND	0.20	07/13/09 15:12	
Diethyl ether (Ethyl ether)	mg/kg	ND	0.50	07/13/09 15:12	
Ethylbenzene	mg/kg	ND	0.050	07/13/09 15:12	
Hexachloro-1,3-butadiene	mg/kg	ND	0.20	07/13/09 15:12	
Isopropylbenzene (Cumene)	mg/kg	ND	0.20	07/13/09 15:12	
Methyl-tert-butyl ether	mg/kg	ND	0.20	07/13/09 15:12	
Methylene Chloride	mg/kg	ND	0.20	07/13/09 15:12	
n-Butylbenzene	mg/kg	ND	0.20	07/13/09 15:12	
n-Propylbenzene	mg/kg	ND	0.20	07/13/09 15:12	
Naphthalene	mg/kg	ND	0.20	07/13/09 15:12	
p-Isopropyltoluene	mg/kg	ND	0.20	07/13/09 15:12	
sec-Butylbenzene	mg/kg	ND	0.20	07/13/09 15:12	
Styrene	mg/kg	ND	0.20	07/13/09 15:12	
tert-Butylbenzene	mg/kg	ND	0.20	07/13/09 15:12	
Tetrachloroethene	mg/kg	ND	0.20	07/13/09 15:12	
Tetrahydrofuran	mg/kg	ND	2.0	07/13/09 15:12	
Toluene	mg/kg	ND	0.050	07/13/09 15:12	
trans-1,2-Dichloroethene	mg/kg	ND	0.20	07/13/09 15:12	
trans-1,3-Dichloropropene	mg/kg	ND	0.20	07/13/09 15:12	
Trichloroethene	mg/kg	ND	0.20	07/13/09 15:12	
Trichlorofluoromethane	mg/kg	ND	0.20	07/13/09 15:12	
Vinyl chloride	mg/kg	ND	0.050	07/13/09 15:12	
Xylene (Total)	mg/kg	ND	0.15	07/13/09 15:12	
1,2-Dichloroethane-d4 (S)	%	94	68-136	07/13/09 15:12	
4-Bromofluorobenzene (S)	%	110	68-126	07/13/09 15:12	
Dibromofluoromethane (S)	%	100	61-139	07/13/09 15:12	
Toluene-d8 (S)	%	110	68-133	07/13/09 15:12	

LABORATORY CONTROL SAMPLE & LCSD: 649101 649102

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
1,1,1,2-Tetrachloroethane	mg/kg	1	1.1	1.1	111	112	75-125	1	20	
1,1,1-Trichloroethane	mg/kg	1	1.0	1.0	102	101	75-130	1	20	
1,1,2,2-Tetrachloroethane	mg/kg	1	1.0	1.0	102	103	70-139	2	20	
1,1,2-Trichloroethane	mg/kg	1	1.0	1.0	102	102	75-125	1	20	
1,1,2-Trichlorotrifluoroethane	mg/kg	1	1.1	1.0	106	102	58-142	4	20	
1,1-Dichloroethane	mg/kg	1	1.0	1.0	103	102	75-126	1	20	
1,1-Dichloroethene	mg/kg	1	1.1	1.0	107	105	71-127	2	20	
1,1-Dichloropropene	mg/kg	1	1.0	1.1	104	106	75-125	2	20	
1,2,3-Trichlorobenzene	mg/kg	1	0.98	1.0	98	102	75-133	3	20	
1,2,3-Trichloropropane	mg/kg	1	1.1	1.0	107	100	75-126	7	20	
1,2,4-Trichlorobenzene	mg/kg	1	1.0	1.1	105	109	75-134	4	20	
1,2,4-Trimethylbenzene	mg/kg	1	1.1	1.1	109	113	75-136	4	20	
1,2-Dibromo-3-chloropropane	mg/kg	1	0.96	1.0	96	103	69-136	7	20	

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QUALITY CONTROL DATA

Project: RYAN-SCHERER
Pace Project No.: 1099131

LABORATORY CONTROL SAMPLE & LCSD: 649101 649102

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
1,2-Dibromoethane (EDB)	mg/kg	1	1.0	1.1	103	107	75-125	3	20	
1,2-Dichlorobenzene	mg/kg	1	1.1	1.1	109	112	75-125	3	20	
1,2-Dichloroethane	mg/kg	1	0.95	0.96	95	96	75-135	0	20	
1,2-Dichloropropane	mg/kg	1	1.1	1.1	105	105	75-125	0	20	
1,3,5-Trimethylbenzene	mg/kg	1	1.1	1.1	108	111	75-136	3	20	
1,3-Dichlorobenzene	mg/kg	1	1.1	1.1	110	114	75-125	4	20	
1,3-Dichloropropane	mg/kg	1	1.0	1.1	104	106	75-125	2	20	
1,4-Dichlorobenzene	mg/kg	1	1.1	1.1	108	111	75-125	2	20	
2,2-Dichloropropane	mg/kg	1	0.95	0.96	95	96	30-150	1	20	
2-Butanone (MEK)	mg/kg	1	1.1	1.0	112	102	49-149	10	20	
2-Chlorotoluene	mg/kg	1	1.1	1.1	106	110	75-125	3	20	
4-Chlorotoluene	mg/kg	1	1.1	1.1	106	110	75-126	3	20	
4-Methyl-2-pentanone (MIBK)	mg/kg	1	0.92	0.94	92	94	73-134	2	20	
Acetone	mg/kg	2.5	3.2	2.8	130	112	57-150	14	20	
Allyl chloride	mg/kg	1	0.84	0.86	84	86	69-139	2	20	
Benzene	mg/kg	1	1.0	1.0	102	103	75-130	1	20	
Bromobenzene	mg/kg	1	1.1	1.1	113	114	75-125	0	20	
Bromochloromethane	mg/kg	1	1.0	1.0	104	103	75-125	1	20	
Bromodichloromethane	mg/kg	1	1.0	1.1	103	105	75-130	2	20	
Bromoform	mg/kg	2	2.1	2.1	107	107	75-128	0	20	
Bromomethane	mg/kg	1	0.97	0.95	97	95	47-150	2	20	
Carbon tetrachloride	mg/kg	1	1.1	1.1	106	105	67-138	1	20	
Chlorobenzene	mg/kg	1	1.1	1.1	108	111	75-125	3	20	
Chloroethane	mg/kg	1	0.95	0.90	95	90	54-150	5	20	
Chloroform	mg/kg	1	0.99	0.98	99	98	75-131	1	20	
Chloromethane	mg/kg	1	0.93	0.91	93	91	65-126	3	20	
cis-1,2-Dichloroethene	mg/kg	1	1.0	1.0	103	101	75-125	2	20	
cis-1,3-Dichloropropene	mg/kg	1	1.1	1.1	107	108	75-125	1	20	
Dibromochloromethane	mg/kg	1	1.1	1.1	108	108	75-125	0	20	
Dibromomethane	mg/kg	1	1.0	1.0	101	100	75-125	1	20	
Dichlorodifluoromethane	mg/kg	1	0.80	0.78	80	78	37-125	3	20	
Dichlorofluoromethane	mg/kg	1	0.99	0.98	99	98	30-150	1	20	
Diethyl ether (Ethyl ether)	mg/kg	1	1.0	0.99	101	99	67-135	2	20	
Ethylbenzene	mg/kg	1	1.1	1.1	107	108	75-125	2	20	
Hexachloro-1,3-butadiene	mg/kg	1	1.0	1.2	103	118	75-150	13	20	
Isopropylbenzene (Cumene)	mg/kg	1	1.1	1.1	108	108	75-125	0	20	
Methyl-tert-butyl ether	mg/kg	1	0.94	0.95	94	95	75-133	1	20	
Methylene Chloride	mg/kg	1	1.0	1.0	100	100	75-130	1	20	
n-Butylbenzene	mg/kg	1	1.1	1.1	107	109	75-138	2	20	
n-Propylbenzene	mg/kg	1	1.1	1.1	109	112	75-129	3	20	
Naphthalene	mg/kg	1	0.90	0.96	90	96	73-128	7	20	
p-Isopropyltoluene	mg/kg	1	1.1	1.1	107	111	75-134	4	20	
sec-Butylbenzene	mg/kg	1	1.1	1.1	109	113	75-133	4	20	
Styrene	mg/kg	1	1.1	1.1	107	109	75-125	1	20	
tert-Butylbenzene	mg/kg	1	1.0	1.1	104	108	75-130	4	20	
Tetrachloroethene	mg/kg	1	1.1	1.1	110	113	75-125	2	20	
Tetrahydrofuran	mg/kg	10	9.7	9.1	97	91	75-133	7	20	
Toluene	mg/kg	1	1.1	1.1	107	110	75-125	2	20	

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QUALITY CONTROL DATA

Project: RYAN-SCHERER
Pace Project No.: 1099131

LABORATORY CONTROL SAMPLE & LCSD: 649101 649102

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
trans-1,2-Dichloroethene	mg/kg	1	1.1	1.0	107	103	75-125	3	20	
trans-1,3-Dichloropropene	mg/kg	1	1.0	1.1	104	106	65-129	2	20	
Trichloroethene	mg/kg	1	1.0	1.0	104	104	75-132	0	20	
Trichlorofluoromethane	mg/kg	1	1.0	0.97	100	97	30-150	3	20	
Vinyl chloride	mg/kg	1	0.98	0.94	98	94	75-125	3	20	
Xylene (Total)	mg/kg	3	3.2	3.3	107	109	75-125	2	20	
1,2-Dichloroethane-d4 (S)	%				84	75	68-136			
4-Bromofluorobenzene (S)	%				94	84	68-126			
Dibromofluoromethane (S)	%				90	81	61-139			
Toluene-d8 (S)	%				96	86	68-133			

MATRIX SPIKE SAMPLE: 649103

Parameter	Units	1099080003 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
1,1,1,2-Tetrachloroethane	mg/kg	ND	1.1	1.1	98	74-133	
1,1,1-Trichloroethane	mg/kg	ND	1.1	0.97	87	73-150	
1,1,2,2-Tetrachloroethane	mg/kg	ND	1.1	1.3	114	65-145	
1,1,2-Trichloroethane	mg/kg	ND	1.1	1.1	98	71-145	
1,1,2-Trichlorotrifluoroethane	mg/kg	ND	1.1	1.0	90	30-150	
1,1-Dichloroethane	mg/kg	ND	1.1	1.0	92	71-150	
1,1-Dichloroethene	mg/kg	ND	1.1	1.0	89	75-150	
1,1-Dichloropropene	mg/kg	ND	1.1	1.0	91	30-150	
1,2,3-Trichlorobenzene	mg/kg	ND	1.1	1.1	96	30-150	
1,2,3-Trichloropropane	mg/kg	ND	1.1	1.0	91	30-150	
1,2,4-Trichlorobenzene	mg/kg	ND	1.1	1.2	108	75-145	
1,2,4-Trimethylbenzene	mg/kg	9.1	1.1	17.1	714	71-150	E,P6
1,2-Dibromo-3-chloropropane	mg/kg	ND	1.1	1.2	104	65-136	
1,2-Dibromoethane (EDB)	mg/kg	ND	1.1	1.1	95	75-145	
1,2-Dichlorobenzene	mg/kg	ND	1.1	1.1	98	75-140	
1,2-Dichloroethane	mg/kg	ND	1.1	0.93	83	73-146	
1,2-Dichloropropane	mg/kg	ND	1.1	1.1	97	75-147	
1,3,5-Trimethylbenzene	mg/kg	3.0	1.1	6.7	327	70-150	M0
1,3-Dichlorobenzene	mg/kg	ND	1.1	1.1	99	75-141	
1,3-Dichloropropane	mg/kg	ND	1.1	1.0	90	30-150	
1,4-Dichlorobenzene	mg/kg	ND	1.1	1.1	96	75-139	
2,2-Dichloropropane	mg/kg	ND	1.1	0.55	49	30-150	
2-Butanone (MEK)	mg/kg	ND	1.1	0.69	62	41-150	
2-Chlorotoluene	mg/kg	ND	1.1	1.0	90	30-150	
4-Chlorotoluene	mg/kg	ND	1.1	1.7	150	30-150	
4-Methyl-2-pentanone (MIBK)	mg/kg	ND	1.1	1.7	154	60-150	M0
Acetone	mg/kg	ND	2.8	3.1	111	51-150	
Allyl chloride	mg/kg	ND	1.1	0.86	77	30-150	
Benzene	mg/kg	0.27	1.1	1.4	103	73-150	
Bromobenzene	mg/kg	ND	1.1	1.1	98	30-150	
Bromochloromethane	mg/kg	ND	1.1	0.99	88	30-150	
Bromodichloromethane	mg/kg	ND	1.1	1.3	119	71-138	
Bromoform	mg/kg	ND	2.3	2.1	94	64-128	

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QUALITY CONTROL DATA

Project: RYAN-SCHERER
Pace Project No.: 1099131

MATRIX SPIKE SAMPLE: 649103

Parameter	Units	1099080003 Result	Spike Conc.	MS Result	MS % Rec	% Rec Limits	Qualifiers
Bromomethane	mg/kg	ND	1.1	0.77	69	30-150	
Carbon tetrachloride	mg/kg	ND	1.1	0.89	80	67-150	
Chlorobenzene	mg/kg	ND	1.1	1.1	96	74-142	
Chloroethane	mg/kg	ND	1.1	0.79	70	30-150	
Chloroform	mg/kg	0.25	1.1	1.3	94	74-150	
Chloromethane	mg/kg	ND	1.1	1.2	112	50-150	
cis-1,2-Dichloroethene	mg/kg	ND	1.1	0.97	87	75-147	
cis-1,3-Dichloropropene	mg/kg	ND	1.1	1.0	93	68-133	
Dibromochloromethane	mg/kg	ND	1.1	1.0	93	71-128	
Dibromomethane	mg/kg	ND	1.1	0.94	85	69-137	
Dichlorodifluoromethane	mg/kg	ND	1.1	0.73	66	50-150	
Dichlorofluoromethane	mg/kg	ND	1.1	0.97	87	50-150	
Diethyl ether (Ethyl ether)	mg/kg	ND	1.1	0.97	87	30-150	
Ethylbenzene	mg/kg	3.7	1.1	7.6	349	74-150	M0
Hexachloro-1,3-butadiene	mg/kg	ND	1.1	1.4	128	54-150	
Isopropylbenzene (Cumene)	mg/kg	0.41	1.1	1.8	125	75-150	
Methyl-tert-butyl ether	mg/kg	ND	1.1	0.81	73	70-142	
Methylene Chloride	mg/kg	ND	1.1	0.87	78	67-144	
n-Butylbenzene	mg/kg	1.0	1.1	3.1	185	55-150	M0
n-Propylbenzene	mg/kg	1.6	1.1	3.9	210	50-150	M0
Naphthalene	mg/kg	1.3	1.1	3.8	223	64-150	M0
p-Isopropyltoluene	mg/kg	ND	1.1	1.3	109	75-138	
sec-Butylbenzene	mg/kg	ND	1.1	1.4	111	75-144	
Styrene	mg/kg	ND	1.1	1.1	101	75-144	
tert-Butylbenzene	mg/kg	ND	1.1	1.1	95	54-150	
Tetrachloroethene	mg/kg	ND	1.1	1.1	98	75-150	
Tetrahydrofuran	mg/kg	ND	11.2	8.5	76	50-150	
Toluene	mg/kg	0.58	1.1	2.0	127	73-144	
trans-1,2-Dichloroethene	mg/kg	ND	1.1	1.0	90	75-150	
trans-1,3-Dichloropropene	mg/kg	ND	1.1	0.98	88	66-127	
Trichloroethene	mg/kg	ND	1.1	1.2	107	75-150	
Trichlorofluoromethane	mg/kg	ND	1.1	0.88	79	50-150	
Vinyl chloride	mg/kg	ND	1.1	0.88	79	50-150	
Xylene (Total)	mg/kg	7.1	3.4	15.8	260	75-148	M0
1,2-Dichloroethane-d4 (S)	%				70	68-136	
4-Bromofluorobenzene (S)	%				83	68-126	
Dibromofluoromethane (S)	%				74	61-139	
Toluene-d8 (S)	%				83	68-133	

SAMPLE DUPLICATE: 649104

Parameter	Units	1099080005 Result	Dup Result	RPD	Max RPD	Qualifiers
1,1,1,2-Tetrachloroethane	mg/kg	ND	ND		30	
1,1,1-Trichloroethane	mg/kg	ND	ND		30	
1,1,2,2-Tetrachloroethane	mg/kg	ND	ND		30	
1,1,2-Trichloroethane	mg/kg	ND	ND		30	
1,1,2-Trichlorotrifluoroethane	mg/kg	ND	ND		30	

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QUALITY CONTROL DATA

Project: RYAN-SCHERER
Pace Project No.: 1099131

SAMPLE DUPLICATE: 649104

Parameter	Units	1099080005 Result	Dup Result	RPD	Max RPD	Qualifiers
1,1-Dichloroethane	mg/kg	ND	ND		30	
1,1-Dichloroethene	mg/kg	ND	ND		30	
1,1-Dichloropropene	mg/kg	ND	ND		30	
1,2,3-Trichlorobenzene	mg/kg	ND	ND		30	
1,2,3-Trichloropropane	mg/kg	ND	ND		30	
1,2,4-Trichlorobenzene	mg/kg	ND	ND		30	
1,2,4-Trimethylbenzene	mg/kg	2.0	0.57	113	30	R1
1,2-Dibromo-3-chloropropane	mg/kg	ND	ND		30	
1,2-Dibromoethane (EDB)	mg/kg	ND	ND		30	
1,2-Dichlorobenzene	mg/kg	ND	ND		30	
1,2-Dichloroethane	mg/kg	ND	ND		30	
1,2-Dichloropropane	mg/kg	ND	ND		30	
1,3,5-Trimethylbenzene	mg/kg	0.96	0.31	103	30	R1
1,3-Dichlorobenzene	mg/kg	ND	ND		30	
1,3-Dichloropropane	mg/kg	ND	ND		30	
1,4-Dichlorobenzene	mg/kg	ND	ND		30	
2,2-Dichloropropane	mg/kg	ND	ND		30	
2-Butanone (MEK)	mg/kg	ND	ND		30	
2-Chlorotoluene	mg/kg	ND	ND		30	
4-Chlorotoluene	mg/kg	ND	ND		30	
4-Methyl-2-pentanone (MIBK)	mg/kg	ND	ND		30	
Acetone	mg/kg	ND	ND		30	
Allyl chloride	mg/kg	ND	ND		30	
Benzene	mg/kg	ND	ND		30	
Bromobenzene	mg/kg	ND	ND		30	
Bromochloromethane	mg/kg	ND	ND		30	
Bromodichloromethane	mg/kg	ND	ND		30	
Bromoform	mg/kg	ND	ND		30	
Bromomethane	mg/kg	ND	ND		30	
Carbon tetrachloride	mg/kg	ND	ND		30	
Chlorobenzene	mg/kg	ND	ND		30	
Chloroethane	mg/kg	ND	ND		30	
Chloroform	mg/kg	ND	ND		30	
Chloromethane	mg/kg	ND	ND		30	
cis-1,2-Dichloroethene	mg/kg	ND	ND		30	
cis-1,3-Dichloropropene	mg/kg	ND	ND		30	
Dibromochloromethane	mg/kg	ND	ND		30	
Dibromomethane	mg/kg	ND	ND		30	
Dichlorodifluoromethane	mg/kg	ND	ND		30	
Dichlorofluoromethane	mg/kg	ND	ND		30	
Diethyl ether (Ethyl ether)	mg/kg	ND	ND		30	
Ethylbenzene	mg/kg	0.15	0.057	88	30	R1
Hexachloro-1,3-butadiene	mg/kg	ND	ND		30	
Isopropylbenzene (Cumene)	mg/kg	ND	ND		30	
Methyl-tert-butyl ether	mg/kg	ND	ND		30	
Methylene Chloride	mg/kg	ND	ND		30	
n-Butylbenzene	mg/kg	0.52	.17J		30	
n-Propylbenzene	mg/kg	0.51	.16J		30	

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QUALITY CONTROL DATA

Project: RYAN-SCHERER
Pace Project No.: 1099131

SAMPLE DUPLICATE: 649104

Parameter	Units	1099080005 Result	Dup Result	RPD	Max RPD	Qualifiers
Naphthalene	mg/kg	ND	ND		30	
p-Isopropyltoluene	mg/kg	ND	ND		30	
sec-Butylbenzene	mg/kg	ND	ND		30	
Styrene	mg/kg	ND	ND		30	
tert-Butylbenzene	mg/kg	ND	ND		30	
Tetrachloroethene	mg/kg	ND	ND		30	
Tetrahydrofuran	mg/kg	ND	ND		30	
Toluene	mg/kg	ND	ND		30	
trans-1,2-Dichloroethene	mg/kg	ND	ND		30	
trans-1,3-Dichloropropene	mg/kg	ND	ND		30	
Trichloroethene	mg/kg	ND	ND		30	
Trichlorofluoromethane	mg/kg	ND	ND		30	
Vinyl chloride	mg/kg	ND	ND		30	
Xylene (Total)	mg/kg	ND	ND		30	R1
1,2-Dichloroethane-d4 (S)	%		108	20		
4-Bromofluorobenzene (S)	%		121	17		
Dibromofluoromethane (S)	%		111	19		
Toluene-d8 (S)	%		124	16		

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QUALITY CONTROL DATA

Project: RYAN-SCHERER
Pace Project No.: 1099131

QC Batch: MPRP/16401
QC Batch Method: % Moisture
Analysis Method: % Moisture
Analysis Description: Dry Weight/Percent Moisture
Associated Lab Samples: 1099131001, 1099131002

SAMPLE DUPLICATE: 649276

Parameter	Units	1099131001 Result	Dup Result	RPD	Max RPD	Qualifiers
Percent Moisture	%	22.4	21.8	3	30	

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QUALITY CONTROL DATA

Project: RYAN-SCHERER
Pace Project No.: 1099131

QC Batch: OEXT/11107 Analysis Method: WI MOD DRO
QC Batch Method: WI MOD DRO Analysis Description: WIDRO Solid GCV
Associated Lab Samples: 1099131001, 1099131002

METHOD BLANK: 649144 Matrix: Solid
Associated Lab Samples: 1099131001, 1099131002

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Diesel Range Organics	mg/kg	ND	10.0	07/14/09 16:43	
n-Triacontane (S)	%	74	50-150	07/14/09 16:43	

LABORATORY CONTROL SAMPLE & LCSD: 649145 649146

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
Diesel Range Organics	mg/kg	80	55.6	60.0	69	75	70-120	8	20	L0
n-Triacontane (S)	%				81	82	50-150			

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QUALITY CONTROL DATA

Project: RYAN-SCHERER
Pace Project No.: 1099131

QC Batch: GCV/6267 Analysis Method: WI MOD GRO
QC Batch Method: TPH GRO/PVOC WI ext. Analysis Description: WIGRO Solid GCV
Associated Lab Samples: 1099131001, 1099131002

METHOD BLANK: 649141 Matrix: Solid
Associated Lab Samples: 1099131001, 1099131002

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Gasoline Range Organics	mg/kg	ND	5.0	07/13/09 21:55	
a,a,a-Trifluorotoluene (S)	%	96	80-125	07/13/09 21:55	

LABORATORY CONTROL SAMPLE & LCSD: 649142 649143

Parameter	Units	Spike Conc.	LCS Result	LCSD Result	LCS % Rec	LCSD % Rec	% Rec Limits	RPD	Max RPD	Qualifiers
Gasoline Range Organics	mg/kg	50	59.7	57.7	119	115	80-120	4	20	
a,a,a-Trifluorotoluene (S)	%				98	97	80-125			

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QUALITY CONTROL DATA

Project: RYAN-SCHERER
Pace Project No.: 1099131

QC Batch: MPRP/16399
QC Batch Method: EPA 3050
Analysis Method: EPA 6010
Analysis Description: 6010 MET
Associated Lab Samples: 1099131001, 1099131002

METHOD BLANK: 649199 Matrix: Solid
Associated Lab Samples: 1099131001, 1099131002

Parameter	Units	Blank Result	Reporting Limit	Analyzed	Qualifiers
Arsenic	mg/kg	ND	0.44	07/14/09 09:56	
Barium	mg/kg	ND	0.44	07/14/09 09:56	
Cadmium	mg/kg	ND	0.044	07/14/09 09:56	
Chromium	mg/kg	ND	0.44	07/14/09 09:56	
Lead	mg/kg	ND	0.27	07/14/09 09:56	
Selenium	mg/kg	ND	0.66	07/14/09 09:56	
Silver	mg/kg	ND	0.44	07/14/09 09:56	

LABORATORY CONTROL SAMPLE: 649200

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Arsenic	mg/kg	37.3	34.5	93	80-120	
Barium	mg/kg	37.3	36.9	99	80-120	
Cadmium	mg/kg	37.3	36.5	98	80-120	
Chromium	mg/kg	37.3	37.1	100	80-120	
Lead	mg/kg	37.3	35.5	95	80-120	
Selenium	mg/kg	37.3	33.9	91	80-120	
Silver	mg/kg	18.7	17.8	96	80-120	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 649227 649228

Parameter	Units	1099080001 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Arsenic	mg/kg	3.5	47.1	42.1	48.6	44.0	96	96	75-125	10	30	
Barium	mg/kg	70.7	47.1	42.1	107	100	76	70	75-125	6	30	M0
Cadmium	mg/kg	0.88	47.1	42.1	47.4	41.8	99	97	75-125	12	30	
Chromium	mg/kg	13.7	47.1	42.1	61.8	54.3	102	96	75-125	13	30	
Lead	mg/kg	15.6	47.1	42.1	62.9	59.1	100	103	75-125	6	30	
Selenium	mg/kg	1.9	47.1	42.1	44.8	39.5	91	89	75-125	13	30	
Silver	mg/kg	ND	23.6	21.1	22.7	20.3	96	96	75-125	11	30	

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QUALIFIERS

Project: RYAN-SCHERER
Pace Project No.: 1099131

DEFINITIONS

DF - Dilution Factor, if reported, represents the factor applied to the reported data due to changes in sample preparation, dilution of the sample aliquot, or moisture content.

ND - Not Detected at or above adjusted reporting limit.

J - Estimated concentration above the adjusted method detection limit and below the adjusted reporting limit.

MDL - Adjusted Method Detection Limit.

S - Surrogate

1,2-Diphenylhydrazine (8270 listed analyte) decomposes to Azobenzene.

Consistent with EPA guidelines, unrounded data are displayed and have been used to calculate % recovery and RPD values.

LCS(D) - Laboratory Control Sample (Duplicate)

MS(D) - Matrix Spike (Duplicate)

DUP - Sample Duplicate

RPD - Relative Percent Difference

NC - Not Calculable.

Pace Analytical is NELAP accredited. Contact your Pace PM for the current list of accredited analytes.

U - Indicates the compound was analyzed for, but not detected.

WORKORDER QUALIFIERS

WO: 1099131

[1] No trip blanks were recevied with these samples.

BATCH QUALIFIERS

Batch: GCV/6268

[M5] A matrix spike/matrix spike duplicate was not performed for this batch due to insufficient sample volume.

ANALYTE QUALIFIERS

E	Analyte concentration exceeded the calibration range. The reported result is estimated.
L0	Analyte recovery in the laboratory control sample (LCS) was outside QC limits.
L2	Analyte recovery in the laboratory control sample (LCS) was below QC limits. Results may be biased low.
M0	Matrix spike recovery was outside laboratory control limits.
P6	Matrix spike recovery was outside laboratory control limits due to a parent sample concentration notably higher than the spike level.
R1	RPD value was outside control limits.

Pace Analytical®
www.pacelabs.com

RUSH!

CHAIN-OF-CUSTODY / Analytical Request Document

The Chain-of-Custody is a LEGAL DOCUMENT. All relevant fields must be completed accurately.

1134
1049131

Page: 1 of 1

1290234

Section A
Required Client Information:

Company: Liesch Assoc
Address: 13400 15th Ave N
Plymouth, MN
Email To: MarkMiller
Phone: 763-489-3125 Fax: 489-3101
Requested Due Date/TAT: 2 Day TAT

Section B
Required Project Information:

Report To: MarkMiller
Copy To: John Lichter
Purchase Order No.:
Project Name: Ryan-Scherer
Project Number:

Section C
Invoice Information:

Attention: Melody Hinton
Company Name: Liesch
Address: Same
Pace Quote Reference:
Pace Project Manager:
Pace Profile #:

REGULATORY AGENCY

☐ NPDES ☐ GROUND WATER ☐ DRINKING WATER
☐ UST ☐ RCRA ☐ OTHER

Site Location STATE: MN

Section D
Required Client Information

SAMPLE ID
(A-Z, 0-9 / ,-)
Sample IDs MUST BE UNIQUE

Matrix Codes (MATRIX / CODE)

Drinking Water	DW
Water	WT
Waste Water	WW
Product	P
Soil/Solid	SL
Oil	OL
Wipe	WP
Air	AR
Tissue	TS
Other	OT

ITEM #	SAMPLE ID	MATRIX CODE (see valid codes to left)	SAMPLE TYPE (G=GRAB C=COMP)	COLLECTED COMPOSITE START DATE	COLLECTED COMPOSITE START TIME	COLLECTED COMPOSITE END/GRAB DATE	COLLECTED COMPOSITE END/GRAB TIME	SAMPLE TEMP AT COLLECTION	# OF CONTAINERS	Preservatives: Unpreserved	H_2SO_4	HNO_3	HCl	NaOH	$Na_2S_2O_3$	Methanol	Other	Requested Analysis Filtered (Y/N) Y/N	Analysis Test: VOC	GRO	DRO	RCRA Metals	% moisture	Residual Chlorine (Y/N)	Pace Project No./ Lab I.D.
1	B-10 9'-11'	SL	G	7-8-09	1500				3	3						4			Z	Z	Z	1	1		001
2																									
3	B-11 12-13'	SL	G	7-7-09	1000				3	4						4			Z	Z	Z	1	1		002
4																									
5																									
6																									
7																									
8																									
9																									
10																									
11																									
12																									

ADDITIONAL COMMENTS	RELINQUISHED BY / AFFILIATION	DATE	TIME	ACCEPTED BY / AFFILIATION	DATE	TIME	SAMPLE CONDITIONS
24 hr TAT		7-8-09	1600				
25		7-8-09	1034		7-13-09	1034	2.0 X N Y

ORIGINAL

SAMPLER NAME AND SIGNATURE

PRINT Name of SAMPLER: Tony C Johnson

SIGNATURE of SAMPLER:

DATE Signed (MM/DD/YY): 7-8-09

Temp in °C | Received on Ice (Y/N) | Custody Sealed Cooler (Y/N) | Samples Intact (Y/N)

*Important Note: By signing this form you are accepting Pace's NET 30 day payment terms and agreeing to late charges of 1.5% per month for any invoices not paid within 30 days.

Sample Condition Upon Receipt

Pace Analytical

Client Name: Leach ass. Project # 1004131

Courier: ☐ Fed Ex ☐ UPS ☐ USPS ☒ Client ☐ Commercial ☐ Pace Other _____

Tracking #: _____

Custody Seal on Cooler/Box Present: ☐ yes ☒ no Seals intact: ☐ yes ☒ no

Packing Material: ☐ Bubble Wrap ☒ Bubble Bags ☐ None ☐ Other _____ Temp Blank: Yes ____ No X

Thermometer Used 80344042, 179425 Type of Ice: (Wet) Blue None ☐ Samples on ice, cooling process has begun

Cooler Temperature 2.0°c Biological Tissue is Frozen: Yes No

Temp should be above freezing to 6°C

Comments:

Date and initials of person examining contents: BD 7-13-09

Chain of Custody Present:	☒Yes ☐No ☐N/A	1.
Chain of Custody Filled Out:	☒Yes ☐No ☐N/A	2.
Chain of Custody Relinquished:	☒Yes ☐No ☐N/A	3.
Sampler Name & Signature on COC:	☒Yes ☐No ☐N/A	4.
Samples Arrived within Hold Time:	☒Yes ☐No ☐N/A	5.
Short Hold Time Analysis (<72hr):	☐Yes ☒No ☐N/A	6.
Rush Turn Around Time Requested:	☒Yes ☐No ☐N/A	7.
Sufficient Volume:	☒Yes ☐No ☐N/A	8.
Correct Containers Used:	☒Yes ☐No ☐N/A	9.
-Pace Containers Used:	☒Yes ☐No ☐N/A	
Containers Intact:	☒Yes ☐No ☐N/A	10.
Filtered volume received for Dissolved tests	☐Yes ☒No ☐N/A	11.
Sample Labels match COC:	☐Yes ☒No ☐N/A	12. 1 vial B-6 9'11'
-Includes date/time/ID/Analysis Matrix: SL		3 vials B-11 2-13'
All containers needing acid/base preservation have been checked. Noncompliance are noted in 13.	☐Yes ☐No ☒N/A	13.
All containers needing preservation are found to be in compliance with EPA recommendation.	☐Yes ☐No ☒N/A	
Exceptions: VOA,Coliform, TOC, Oil and Grease, WI-DRO (water)	☐Yes ☒No	Initial when completed BD / Lot # of added preservative
Samples checked for dechlorination:	☐Yes ☒No ☐N/A	14.
Headspace in VOA Vials (>6mm):	☐Yes ☐No ☒N/A	15.
Trip Blank Present:	☐Yes ☒No ☐N/A	16.
Trip Blank Custody Seals Present	☐Yes ☐No ☒N/A	
Pace Trip Blank Lot # (if purchased):		

Client Notification/ Resolution: Field Data Required? Y / N

Person Contacted: _____ Date/Time: _____

Comments/ Resolution: _____

Project Manager Review: _____ **Date:** 7-13-09

VEL 7/13/0984

Note: Whenever there is a discrepancy affecting North Carolina compliance samples, a copy of this form will be sent to the North Carolina DEHNR Certification Office (i.e out of hold, incorrect preservative, out of temp, incorrect containers)