Wickham, Jerry, Env. Health

From: Peter Sims [psims@ninyoandmoore.com]
Sent: Wednesday, March 05, 2014 2:22 PM
To: Wickham, Jerry, Env. Health
Subject: RE: Ashland Housing Project
Attachments: Lab Report SP-1, -2, -3.pdf; Stockpile and Source Locations.pdf

Jerry, I have answered your questions below. The attached figures describe locations of the fill source and stockpile IDs/locations.

Peter D. Sims, LEED AP
Project Environmental Geologist
Ninyo & Moore
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Experience * Quality * Commitment

-----Original Message-----
From: Wickham, Jerry, Env. Health [mailto:jerry.wickham@acgov.org]
Sent: Tuesday, March 04, 2014 9:01 AM
To: Peter Sims
Subject: RE: Ashland Housing Project

Peter,

Here is the information I would need to go with analytical results in order to review the fill for reuse:

1) A map or aerial photo showing the general area where the fill came from.
See attached. Stockpiles SP1 through SP3 came from trenching in Kent Avenue. Stockpiles SP4 through SP7 came from trenching in E 14th Street.

2) The volume of the stockpiles and volume that each sample represents and which sample goes with which stockpile
SP1-1 through SP1-4 were collected from stockpile SP1 (approximately 48 cubic yards) each sample represents approximately 12 cubic yards.
SP2-1 through SP2-4 were collected from stockpile SP2 (approximately 10 cubic yards) each sample represents approximately 2.5

cubic yards.
SP3-1 through SP3-4 were collected from stockpile SP3 (approximately 45 cubic yards) each sample represents approximately 11 cubic yards.
SP4-1 through SP4-4 were collected from stockpile SP4 (approximately 28 cubic yards) each sample represents approximately 7 cubic yards.
SP5-1 through SP5-4 were collected from stockpile SP5 (approximately 47 cubic yards) each sample represents approximately 12 cubic yards.
SP6-1 through SP6-4 were collected from stockpile SP6 (approximately 8 cubic yards) each sample represents 2 cubic yards.
SP7-1 through SP7-4 were collected from stockpile SP7 (approximately 5 cubic yards)each sample represents approximately 1 cubic yard.

3) The type of samples - composite or discrete
Discrete samples were collected and composited by the laboratory. VOC and SVOC analyses were performed on discrete samples. All other analyses were performed on composite samples.

4) The type of fill and the heterogeneity
The fill was described as generally homogenous silty sand.

5) Whether the fill contains any debris or construction material
Debris or construction material were not observed in the stockpiles at the time of the sampling. Some construction material (broken concrete) had been removed from stockpile SP7.

6) Whether any staining or odor was observed
Staining and odor were not observed in the stockpiled fill.

7) Where the soil is to be reused - In this case, will the soil be used in housing areas or under a street?
The site is made up of housing/communal areas and driveway/parking areas. The stockpiled soil is currently planned to be used across the entire site. However, if certain stockpiles could only be used under parking/driveway areas then the grading plan could be modified to accommodate.

8) Whether this is a variance from the Work Plan
Stockpile sampling was performed in accordance with the Interim Remedial Action Plan.

9) Laboratory analytical results
Lab results for stockpiles SP1, SP2, and SP3 are attached. Results for SP4 through SP7 will be provided when they are completed by the laboratory.

Regards,
Jerry Wickham
Alameda County Environmental Health
1131 Harbor Bay Parkway
Alameda, CA 94502-6577
phone: 510-567-6791
jerry.wickham@acgov.org

-----Original Message-----
From: Peter Sims [mailto:psims@ninyoandmoore.com]
Sent: Monday, March 03, 2014 12:18 PM
To: Wickham, Jerry, Env. Health
Subject: RE: Ashland Housing Project

That's right, thanks for the reminder. Attached are the lab results for the three soil stockpiles that originated from trenching activities in Kent Avenue.

Peter D. Sims, LEED AP
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-----Original Message-----
From: Wickham, Jerry, Env. Health [mailto:jerry.wickham@acgov.org]
Sent: Monday, March 03, 2014 11:55 AM
To: Peter Sims
Subject: Re: Ashland Housing Project

Our 12/11/2013 approval of the IRAP requested that analytical results for reuse of stockpiles be submitted to ACEH for approval prior to reuse on site. There are other factors in addition to cleanup goals that could enter into decisions on reuse.

Jerry Wickham
Alameda County Environmental Health
Sent from my iPad

> On Mar 3, 2014, at 11:22 AM, "Peter Sims" <psims@ninyoandmoore.com>
> wrote:
>
> Will do, samples from the stockpile of unknown origin (hereafter known

> as SP-7), will be analyzed for the full suite of analyses as detailed
> in the IRAP.
>
> I had previously thought that we would be using the May 2013 Tier 1
> ESLs as our screening levels for on-site reuse of stockpiled soil as

> well as cleanup goals. Should we be using different numbers for
> on-site reuse screening and cleanup goals?
>
> Thanks,
>
> Peter D. Sims, LEED AP
> Project Environmental Geologist
> Ninyo & Moore
> Geotechnical & Environmental Sciences Consultants
> 1956 Webster Street, Suite 400
> Oakland, California 94612
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> -----Original Message-----
> From: Wickham, Jerry, Env. Health [mailto:jerry.wickham@acgov.org]
> Sent: Monday, March 03, 2014 10:02 AM
> To: Peter Sims
> Subject: Re: Ashland Housing Project
>
>
> Peter,
>
> Given the conditions and time that has passed for the stockpile of
> unknown origin, it should not be treated the same as any other
> stockpile generated during the project. In addition to the analyses
> proposed below, please include PAHs by Method 8270 and PCBs by Method
> 8082.
>
> I do not see a need to revise the cleanup goal of 500 mg/kg for TPHmo
> at this time. However, the ceiling value may be considered along with

> other factors in making decisions on reuse of soil.
>
> Regards,
> Jerry Wickham
> Alameda County Environmental Health
>
>
> Sent from my iPad
>
> On Feb 28, 2014, at 11:45 AM, "Peter Sims"
> <psims@ninyoandmoore.com<mailto:psims@ninyoandmoore.com>> wrote:
>
> Hi Jerry,
>

> The stockpile of unknown origin at the site has been identified.
> According to the remediation contractor and site owner, it was
> generated during utility trenching in East 14th Street. As such, I'd
> like to treat it the same as any other soil stockpiled on site from
> trenching in adjacent streets. The stockpile would be sampled for
> on-site reuse at a rate of one 4-point composite per 50 cubic yards.
> The composite sample would be analyzed for TPHg, TPHd, TPHmo, Title 22

> Metals, and BTEX. Is this acceptable?
>
> The new Tier 1 ESL (December, 2013) for TPHo is 100 mg/kg (based on
> Ceiling Value) which is lower than the previous ESL (May, 2013) for
> TPHo of 500mg/kg which is our proposed cleanup goal for TPHo. Since
> the residential direct exposure ESL for TPHo is 1,000 mg/kg and
> impacts to groundwater have shown to not be a concern, I believe the
> 500mg/kg cleanup goal will be sufficient for the planned site use.
> What's your take?
>
> Thanks,
>
>
> Peter D. Sims, LEED AP
> Project Environmental Geologist
> Ninyo & Moore
> Geotechnical & Environmental Sciences Consultants
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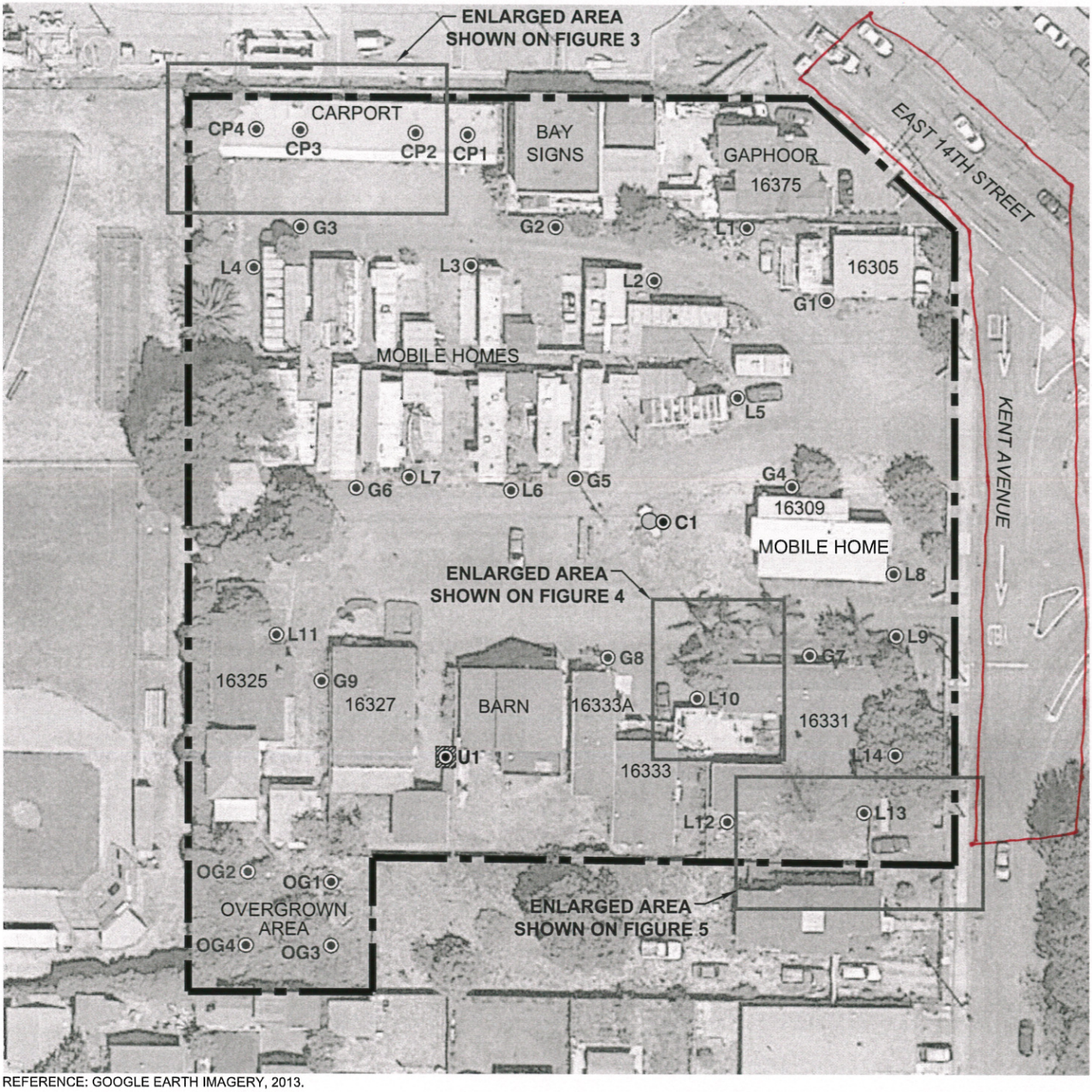


REFERENCE: GOOGLE EARTH IMAGERY, 2013.

Fill Source from utility trenching in E 14th St. and Kent Ave.

N

SCALE IN FEET

0 60 120

NOTE: DIMENSIONS, DIRECTIONS AND LOCATIONS ARE APPROXIMATE.

LEGEND

- SITE BOUNDARY
- L13 SOIL SAMPLE LOCATION COLLECTED 5/23/13
- U1 SOIL SAMPLE LOCATION COLLECTED 9/25/13
- CP2 PREVIOUS SOIL AND GROUNDWATER SAMPLE LOCATION
- APPROXIMATE LOCATION OF 2-FOOT DIAMETER WATER CISTERN
- FORMER KNOWN UST TANK PIT

Ninyo & Moore

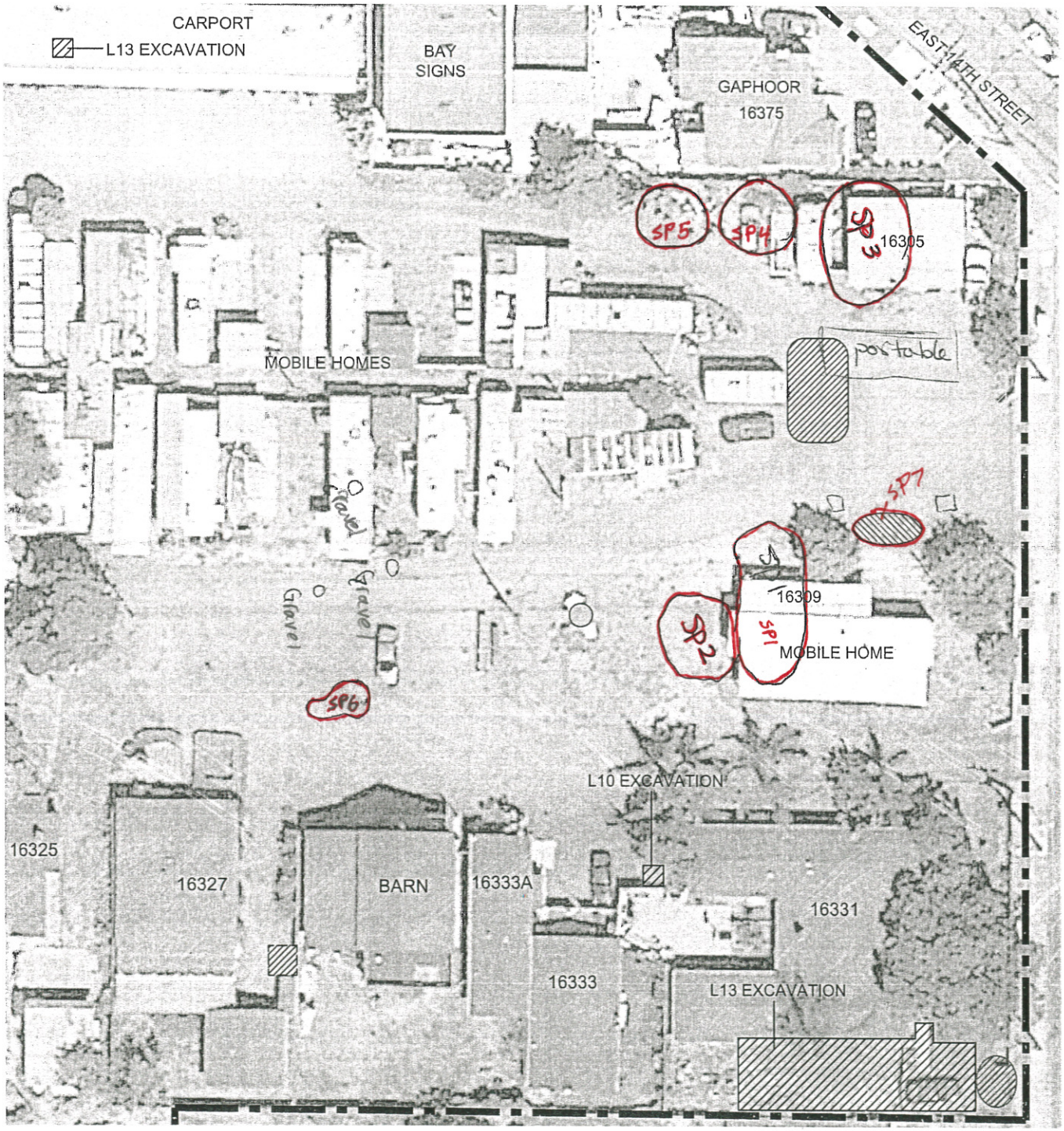
PREVIOUS SAMPLE LOCATIONS

FIGURE 2

PROJECT NO.	DATE
402090002	11/13

ASHLAND HOUSING PROJECT
16305,16309,16325,16327,16331, AND 16333 KENT AVENUE AND 16375 EAST 14TH STREET
ASHLAND, CALIFORNIA

402090002-PSL-2.dwg, Nov 21, 2013, 1:36pm, SN



REFERENCE: GOOGLE EARTH IMAGERY, 2013.

N

SCALE IN FEET

0 40 80

NOTE: DIMENSIONS, DIRECTIONS AND LOCATIONS ARE APPROXIMATE.

LEGEND

- SITE BOUNDARY
- PROPOSED STOCKPILE LOCATION FOR KENT AVENUE UTILITY TRENCHING
- PROPOSED STOCKPILE LOCATION FOR L13 EXCAVATION
- APPROXIMATE EXISTING STOCKPILE
- APPROXIMATE EXCAVATION LOCATION
- PROPOSED DECONTAMINATION AREA
- APPROXIMATE LOCATION OF 2-FOOT DIAMETER WATER CISTERN
- FORMER KNOWN UST TANK PIT

Ninyo & Moore

STOCKPILE AND EXCAVATION LOCATIONS

FIGURE 6

PROJECT NO.	DATE
402090002	11/13

ASHLAND HOUSING PROJECT
16305,16309,16325,16327,16331, AND 16333 KENT AVENUE AND 16375 EAST 14TH STREET
ASHLAND, CALIFORNIA

ADVANCED TECHNOLOGY LABORATORIES

February 27, 2014

ELAP No.: 1838
NELAP No.: 02107CA
CSDLAC No.: 10196
ORELAP No.: CA300003
TCEQ No.: T104704502

Peter Sims
Ninyo & Moore
1956 Webster Street, Suite 400
Oakland, CA 94612
Tel: (510) 633-5640
Fax:(510) 633-5646

Re: ATL Work Order Number : 1400508
Client Reference : Ashland

Enclosed are the results for sample(s) received on February 20, 2014 by Advanced Technology Laboratories. The sample(s) are tested for the parameters as indicated on the enclosed chain of custody in accordance with applicable laboratory certifications. The laboratory results contained in this report specifically pertains to the sample(s) submitted.

Thank you for the opportunity to serve the needs of your company. If you have any questions, please feel free to contact me or your Project Manager.

Sincerely,

for

Eddie Rodriguez
Laboratory Director

Certificate of Analysis

Ninyo & Moore	Project Number : Ashland
1956 Webster Street, Suite 400	Report To : Peter Sims
Oakland , CA 94612	Reported : 02/27/2014

SUMMARY OF SAMPLES

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
SP1-4	1400508-04	Soil	2/19/14 8:50	2/20/14 8:30
SP2-2	1400508-06	Soil	2/19/14 9:00	2/20/14 8:30
SP3-1	1400508-09	Soil	2/19/14 9:22	2/20/14 8:30
Comp-1	1400508-13	Soil	2/19/14 0:00	2/20/14 8:30
Comp-2	1400508-14	Soil	2/19/14 0:00	2/20/14 8:30
Comp-3	1400508-15	Soil	2/19/14 0:00	2/20/14 8:30

Certificate of Analysis

Ninyo & Moore	Project Number : Ashland
1956 Webster Street, Suite 400	Report To : Peter Sims
Oakland , CA 94612	Reported : 02/27/2014

Client Sample ID SP1-4

Lab ID: 1400508-04

BTEX/MTBE by EPA 8021 **Analyst: TP**

Analyte	Result (ug/kg)	PQL (ug/kg)	MDL (ug/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
Benzene	ND	5.0	NA	1	B4B0305	02/20/2014	02/20/14 14:31	
Toluene	ND	5.0	NA	1	B4B0305	02/20/2014	02/20/14 14:31	
Ethylbenzene	ND	5.0	NA	1	B4B0305	02/20/2014	02/20/14 14:31	
m,p-Xylene	ND	10	NA	1	B4B0305	02/20/2014	02/20/14 14:31	
o-Xylene	ND	5.0	NA	1	B4B0305	02/20/2014	02/20/14 14:31	
Surrogate: 4-Bromofluorobenzene	*90.2 %*	*53 - 144*			B4B0305	02/20/2014	*02/20/14 14:31*	

Certificate of Analysis

Ninyo & Moore	Project Number : Ashland
1956 Webster Street, Suite 400	Report To : Peter Sims
Oakland , CA 94612	Reported : 02/27/2014

Client Sample ID SP2-2

Lab ID: 1400508-06

BTEX/MTBE by EPA 8021 **Analyst: TP**

Analyte	Result (ug/kg)	PQL (ug/kg)	MDL (ug/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
Benzene	ND	5.0	NA	1	B4B0305	02/20/2014	02/20/14 14:47	
Toluene	ND	5.0	NA	1	B4B0305	02/20/2014	02/20/14 14:47	
Ethylbenzene	ND	5.0	NA	1	B4B0305	02/20/2014	02/20/14 14:47	
m,p-Xylene	ND	10	NA	1	B4B0305	02/20/2014	02/20/14 14:47	
o-Xylene	ND	5.0	NA	1	B4B0305	02/20/2014	02/20/14 14:47	
Surrogate: 4-Bromofluorobenzene	*81.2 %*	*53 - 144*			B4B0305	02/20/2014	*02/20/14 14:47*	

Certificate of Analysis

Ninyo & Moore	Project Number : Ashland
1956 Webster Street, Suite 400	Report To : Peter Sims
Oakland , CA 94612	Reported : 02/27/2014

Client Sample ID SP3-1

Lab ID: 1400508-09

BTEX/MTBE by EPA 8021 **Analyst: TP**

Analyte	Result (ug/kg)	PQL (ug/kg)	MDL (ug/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
Benzene	ND	5.0	NA	1	B4B0305	02/20/2014	02/20/14 15:03	
Toluene	ND	5.0	NA	1	B4B0305	02/20/2014	02/20/14 15:03	
Ethylbenzene	ND	5.0	NA	1	B4B0305	02/20/2014	02/20/14 15:03	
m,p-Xylene	ND	10	NA	1	B4B0305	02/20/2014	02/20/14 15:03	
o-Xylene	ND	5.0	NA	1	B4B0305	02/20/2014	02/20/14 15:03	
Surrogate: 4-Bromofluorobenzene	*86.9 %*		*53 - 144*		B4B0305	02/20/2014	*02/20/14 15:03*	

Certificate of Analysis

Ninyo & Moore	Project Number : Ashland
1956 Webster Street, Suite 400	Report To : Peter Sims
Oakland , CA 94612	Reported : 02/27/2014

Client Sample ID Comp-1

Lab ID: 1400508-13

Title 22 Metals by ICP-AES EPA 6010B

Analyst: CB

Analyte	Result (mg/kg)	PQL (mg/kg)	MDL (mg/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
Antimony	ND	2.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Arsenic	**4.1**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Barium	**99**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Beryllium	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Cadmium	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Chromium	**24**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Cobalt	**7.3**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Copper	**14**	2.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Lead	**6.5**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Molybdenum	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Nickel	**28**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Selenium	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Silver	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Thallium	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Vanadium	**23**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	
Zinc	**40**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:51	

Mercury by AA (Cold Vapor) EPA 7471A

Analyst: SB

Analyte	Result (mg/kg)	PQL (mg/kg)	MDL (mg/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
Mercury	ND	0.10	NA	1	B4B0419	02/26/2014	02/26/14 17:39	

Gasoline Range Organics by EPA 8015B (Modified)

Analyst: TP

Analyte	Result (mg/kg)	PQL (mg/kg)	MDL (mg/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
Gasoline Range Organics	ND	1.0	NA	1	B4B0305	02/20/2014	02/20/14 15:19	
Surrogate: 4-Bromofluorobenzene	*108 %*	*48 - 137*			B4B0305	02/20/2014	*02/20/14 15:19*	

Diesel Range Organics by EPA 8015B

Analyst: CR

Analyte	Result (mg/kg)	PQL (mg/kg)	MDL (mg/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
DRO	**22**	1.0	NA	1	B4B0408	02/26/2014	02/27/14 11:20	
ORO	**55**	1.0	NA	1	B4B0408	02/26/2014	02/27/14 11:20	
Surrogate: p-Terphenyl	*80.7 %*	*26 - 145*			B4B0408	02/26/2014	*02/27/14 11:20*	

Certificate of Analysis

Ninyo & Moore	Project Number : Ashland
1956 Webster Street, Suite 400	Report To : Peter Sims
Oakland , CA 94612	Reported : 02/27/2014

Client Sample ID Comp-2

Lab ID: 1400508-14

Title 22 Metals by ICP-AES EPA 6010B

Analyst: CB

Analyte	Result (mg/kg)	PQL (mg/kg)	MDL (mg/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
Antimony	ND	2.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Arsenic	**4.1**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Barium	**99**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Beryllium	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Cadmium	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Chromium	**25**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Cobalt	**7.3**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Copper	**16**	2.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Lead	**6.8**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Molybdenum	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Nickel	**29**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Selenium	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Silver	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Thallium	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Vanadium	**24**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	
Zinc	**39**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:57	

Mercury by AA (Cold Vapor) EPA 7471A

Analyst: SB

Analyte	Result (mg/kg)	PQL (mg/kg)	MDL (mg/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
Mercury	ND	0.10	NA	1	B4B0419	02/26/2014	02/26/14 17:49	

Gasoline Range Organics by EPA 8015B (Modified)

Analyst: TP

Analyte	Result (mg/kg)	PQL (mg/kg)	MDL (mg/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
Gasoline Range Organics	ND	1.0	NA	1	B4B0305	02/20/2014	02/20/14 15:35	
Surrogate: 4-Bromofluorobenzene	*108 %*	*48 - 137*			B4B0305	02/20/2014	*02/20/14 15:35*	

Diesel Range Organics by EPA 8015B

Analyst: CR

Analyte	Result (mg/kg)	PQL (mg/kg)	MDL (mg/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
DRO	**170**	20	NA	10	B4B0408	02/26/2014	02/26/14 19:17	
ORO	**560**	20	NA	10	B4B0408	02/26/2014	02/26/14 19:17	
Surrogate: p-Terphenyl	*96.7 %*	*26 - 145*			B4B0408	02/26/2014	*02/26/14 19:17*	

Certificate of Analysis

Ninyo & Moore	Project Number : Ashland
1956 Webster Street, Suite 400	Report To : Peter Sims
Oakland , CA 94612	Reported : 02/27/2014

Client Sample ID Comp-3

Lab ID: 1400508-15

Title 22 Metals by ICP-AES EPA 6010B

Analyst: CB

Analyte	Result (mg/kg)	PQL (mg/kg)	MDL (mg/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
Antimony	ND	2.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Arsenic	**3.4**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Barium	**83**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Beryllium	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Cadmium	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Chromium	**19**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Cobalt	**6.3**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Copper	**13**	2.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Lead	**8.5**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Molybdenum	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Nickel	**23**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Selenium	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Silver	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Thallium	ND	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Vanadium	**22**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	
Zinc	**44**	1.0	NA	1	B4B0417	02/26/2014	02/27/14 11:58	

Mercury by AA (Cold Vapor) EPA 7471A

Analyst: SB

Analyte	Result (mg/kg)	PQL (mg/kg)	MDL (mg/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
Mercury	ND	0.10	NA	1	B4B0419	02/26/2014	02/26/14 17:51	

Gasoline Range Organics by EPA 8015B (Modified)

Analyst: TP

Analyte	Result (mg/kg)	PQL (mg/kg)	MDL (mg/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
Gasoline Range Organics	ND	1.0	NA	1	B4B0305	02/20/2014	02/20/14 15:50	
Surrogate: 4-Bromofluorobenzene	*113 %*	*48 - 137*			B4B0305	02/20/2014	*02/20/14 15:50*	

Diesel Range Organics by EPA 8015B

Analyst: CR

Analyte	Result (mg/kg)	PQL (mg/kg)	MDL (mg/kg)	Dilution	Batch	Prepared	Date/Time Analyzed	Notes
DRO	**44**	2.0	NA	1	B4B0408	02/26/2014	02/27/14 08:54	
ORO	**150**	2.0	NA	1	B4B0408	02/26/2014	02/27/14 08:54	
Surrogate: p-Terphenyl	*102 %*	*26 - 145*			B4B0408	02/26/2014	*02/27/14 08:54*	

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QUALITY CONTROL SECTION

Title 22 Metals by ICP-AES EPA 6010B - Quality Control

Analyte	Result (mg/kg)	PQL (mg/kg)	Spike Level	Source Result	% Rec	% Rec Limits	RPD	RPD Limit	Notes
Batch B4B0417 - EPA 3050B									
Blank (B4B0417-BLK1)				Prepared: 2/26/2014 Analyzed: 2/27/2014					
Antimony	ND	2.0			NR				
Arsenic	ND	1.0			NR				
Barium	ND	1.0			NR				
Beryllium	ND	1.0			NR				
Cadmium	ND	1.0			NR				
Chromium	ND	1.0			NR				
Cobalt	ND	1.0			NR				
Copper	ND	2.0			NR				
Lead	ND	1.0			NR				
Molybdenum	ND	1.0			NR				
Nickel	ND	1.0			NR				
Selenium	ND	1.0			NR				
Silver	ND	1.0			NR				
Thallium	ND	1.0			NR				
Vanadium	ND	1.0			NR				
Zinc	ND	1.0			NR				
LCS (B4B0417-BS1)				Prepared: 2/26/2014 Analyzed: 2/27/2014					
Antimony	47.9090	2.0	50.0000		95.8	80 - 120			
Arsenic	47.5351	1.0	50.0000		95.1	80 - 120			
Barium	48.2890	1.0	50.0000		96.6	80 - 120			
Beryllium	49.4977	1.0	50.0000		99.0	80 - 120			
Cadmium	47.7998	1.0	50.0000		95.6	80 - 120			
Chromium	49.6922	1.0	50.0000		99.4	80 - 120			
Cobalt	48.4904	1.0	50.0000		97.0	80 - 120			
Copper	49.8959	2.0	50.0000		99.8	80 - 120			
Lead	49.6634	1.0	50.0000		99.3	80 - 120			
Molybdenum	51.5006	1.0	50.0000		103	80 - 120			
Nickel	47.7733	1.0	50.0000		95.5	80 - 120			
Selenium	44.7414	1.0	50.0000		89.5	80 - 120			
Silver	48.8798	1.0	50.0000		97.8	80 - 120			
Thallium	48.5605	1.0	50.0000		97.1	80 - 120			
Vanadium	49.7912	1.0	50.0000		99.6	80 - 120			
Zinc	51.8237	1.0	50.0000		104	80 - 120			
Duplicate (B4B0417-DUP1)		**Source: 1400508-13**		Prepared: 2/26/2014 Analyzed: 2/27/2014					
Antimony	ND	2.0		ND	NR			20	
Arsenic	4.45285	1.0		4.07976	NR		8.75	20	
Barium	95.4760	1.0		98.5394	NR		3.16	20	
Beryllium	0.301616	1.0		0.306200	NR		1.51	20	

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Title 22 Metals by ICP-AES EPA 6010B - Quality Control (cont'd)

Analyte	Result (mg/kg)	PQL (mg/kg)	Spike Level	Source Result	% Rec	% Rec Limits	RPD	RPD Limit	Notes
Batch B4B0417 - EPA 3050B (continued)									
Duplicate (B4B0417-DUP1) - Continued		**Source: 1400508-13**		Prepared: 2/26/2014 Analyzed: 2/27/2014					
Cadmium	0.073881	1.0		0.08337	NR		12.1	20	
Chromium	25.0067	1.0		23.7922	NR		4.98	20	
Cobalt	7.00694	1.0		7.28444	NR		3.88	20	
Copper	15.6736	2.0		14.0512	NR		10.9	20	
Lead	6.54819	1.0		6.50522	NR		0.658	20	
Molybdenum	0.548632	1.0		0.266034	NR		69.4	20	R
Nickel	27.6892	1.0		27.8150	NR		0.453	20	
Selenium	ND	1.0		ND	NR			20	
Silver	ND	1.0		ND	NR			20	
Thallium	ND	1.0		ND	NR			20	
Vanadium	33.6896	1.0		23.3459	NR		36.3	20	R
Zinc	38.8840	1.0		40.2821	NR		3.53	20	
Duplicate (B4B0417-DUP2)		**Source: 1400508-13RE1**		Prepared: 2/26/2014 Analyzed: 2/27/2014					
Antimony	0.459654	4.0		ND	NR			20	
Arsenic	4.69227	2.0		4.36970	NR		7.12	20	
Barium	106.715	2.0		110.386	NR		3.38	20	
Beryllium	0.331660	2.0		0.334590	NR		0.880	20	
Cadmium	0.079573	2.0		0.087235	NR		9.19	20	
Chromium	27.5929	2.0		26.5211	NR		3.96	20	
Cobalt	7.66028	2.0		8.04038	NR		4.84	20	
Copper	17.2324	4.0		15.6223	NR		9.80	20	
Lead	7.22197	2.0		7.29606	NR		1.02	20	
Molybdenum	0.656084	2.0		0.256459	NR		87.6	20	R
Nickel	32.6182	2.0		32.9120	NR		0.897	20	
Selenium	ND	2.0		ND	NR			20	
Silver	ND	2.0		ND	NR			20	
Thallium	ND	2.0		ND	NR			20	
Vanadium	37.1448	2.0		25.7618	NR		36.2	20	R
Zinc	43.1297	2.0		45.1691	NR		4.62	20	
Matrix Spike (B4B0417-MS1)		**Source: 1400508-13**		Prepared: 2/26/2014 Analyzed: 2/27/2014					
Antimony	83.3406	2.0	125.000	ND	66.7	21 - 109			
Arsenic	103.581	1.0	125.000	4.07976	79.6	55 - 102			
Barium	192.310	1.0	125.000	98.5394	75.0	40 - 130			
Beryllium	102.574	1.0	125.000	0.306200	81.8	60 - 104			
Cadmium	94.1258	1.0	125.000	0.08337	75.2	52 - 100			
Chromium	126.962	1.0	125.000	23.7922	82.5	53 - 113			
Cobalt	102.268	1.0	125.000	7.28444	76.0	53 - 104			
Copper	122.965	2.0	125.000	14.0512	87.1	51 - 122			
Lead	100.957	1.0	125.000	6.50522	75.6	51 - 106			
Molybdenum	99.2634	1.0	125.000	0.266034	79.2	55 - 103			

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Title 22 Metals by ICP-AES EPA 6010B - Quality Control (cont'd)

Analyte	Result (mg/kg)	PQL (mg/kg)	Spike Level	Source Result	% Rec	% Rec Limits	RPD	RPD Limit	Notes
Batch B4B0417 - EPA 3050B (continued)									
Matrix Spike (B4B0417-MS1) - Continued		**Source: 1400508-13**		Prepared: 2/26/2014 Analyzed: 2/27/2014					
Nickel	120.816	1.0	125.000	27.8150	74.4	48 - 112			
Selenium	94.3711	1.0	125.000	ND	75.5	53 - 104			
Silver	104.841	1.0	125.000	ND	83.9	61 - 109			
Thallium	93.2072	1.0	125.000	ND	74.6	44 - 103			
Vanadium	131.514	1.0	125.000	23.3459	86.5	55 - 115			
Zinc	133.642	1.0	125.000	40.2821	74.7	24 - 130			
Matrix Spike (B4B0417-MS2)		**Source: 1400508-13RE1**		Prepared: 2/26/2014 Analyzed: 2/27/2014					
Antimony	90.5078	4.0	125.000	ND	72.4	21 - 109			
Arsenic	113.694	2.0	125.000	4.36970	87.5	55 - 102			
Barium	211.554	2.0	125.000	110.386	80.9	40 - 130			
Beryllium	111.277	2.0	125.000	0.334590	88.8	60 - 104			
Cadmium	106.779	2.0	125.000	0.087235	85.4	52 - 100			
Chromium	140.393	2.0	125.000	26.5211	91.1	53 - 113			
Cobalt	116.088	2.0	125.000	8.04038	86.4	53 - 104			
Copper	130.912	4.0	125.000	15.6223	92.2	51 - 122			
Lead	115.894	2.0	125.000	7.29606	86.9	51 - 106			
Molybdenum	110.588	2.0	125.000	0.256459	88.3	55 - 103			
Nickel	137.659	2.0	125.000	32.9120	83.8	48 - 112			
Selenium	104.189	2.0	125.000	ND	83.4	53 - 104			
Silver	112.512	2.0	125.000	ND	90.0	61 - 109			
Thallium	106.667	2.0	125.000	ND	85.3	44 - 103			
Vanadium	142.215	2.0	125.000	25.7618	93.2	55 - 115			
Zinc	150.992	2.0	125.000	45.1691	84.7	24 - 130			
Matrix Spike Dup (B4B0417-MSD1)		**Source: 1400508-13**		Prepared: 2/26/2014 Analyzed: 2/27/2014					
Antimony	83.7042	2.0	125.628	ND	66.6	21 - 109	0.435	20	
Arsenic	101.801	1.0	125.628	4.07976	77.8	55 - 102	1.73	20	
Barium	196.006	1.0	125.628	98.5394	77.6	40 - 130	1.90	20	
Beryllium	102.315	1.0	125.628	0.306200	81.2	60 - 104	0.253	20	
Cadmium	94.5829	1.0	125.628	0.08337	75.2	52 - 100	0.484	20	
Chromium	123.414	1.0	125.628	23.7922	79.3	53 - 113	2.83	20	
Cobalt	102.021	1.0	125.628	7.28444	75.4	53 - 104	0.241	20	
Copper	122.942	2.0	125.628	14.0512	86.7	51 - 122	0.0185	20	
Lead	100.824	1.0	125.628	6.50522	75.1	51 - 106	0.132	20	
Molybdenum	98.4344	1.0	125.628	0.266034	78.1	55 - 103	0.839	20	
Nickel	123.461	1.0	125.628	27.8150	76.1	48 - 112	2.17	20	
Selenium	94.2639	1.0	125.628	ND	75.0	53 - 104	0.114	20	
Silver	104.690	1.0	125.628	ND	83.3	61 - 109	0.144	20	
Thallium	92.7946	1.0	125.628	ND	73.9	44 - 103	0.444	20	
Vanadium	131.857	1.0	125.628	23.3459	86.4	55 - 115	0.261	20	
Zinc	135.956	1.0	125.628	40.2821	76.2	24 - 130	1.72	20	

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Title 22 Metals by ICP-AES EPA 6010B - Quality Control (cont'd)

Analyte	Result (mg/kg)	PQL (mg/kg)	Spike Level	Source Result	% Rec	% Rec Limits	RPD	RPD Limit	Notes
Batch B4B0417 - EPA 3050B (continued)									
Matrix Spike Dup (B4B0417-MSD2)		**Source: 1400508-13RE1**		Prepared: 2/26/2014 Analyzed: 2/27/2014					
Antimony	92.7719	4.0	125.628	ND	73.8	21 - 109	2.47	20	
Arsenic	114.725	2.0	125.628	4.36970	87.8	55 - 102	0.903	20	
Barium	216.571	2.0	125.628	110.386	84.5	40 - 130	2.34	20	
Beryllium	111.645	2.0	125.628	0.334590	88.6	60 - 104	0.330	20	
Cadmium	107.122	2.0	125.628	0.087235	85.2	52 - 100	0.321	20	
Chromium	136.447	2.0	125.628	26.5211	87.5	53 - 113	2.85	20	
Cobalt	116.251	2.0	125.628	8.04038	86.1	53 - 104	0.140	20	
Copper	130.635	4.0	125.628	15.6223	91.5	51 - 122	0.212	20	
Lead	117.247	2.0	125.628	7.29606	87.5	51 - 106	1.16	20	
Molybdenum	110.929	2.0	125.628	0.256459	88.1	55 - 103	0.308	20	
Nickel	134.115	2.0	125.628	32.9120	80.6	48 - 112	2.61	20	
Selenium	105.264	2.0	125.628	ND	83.8	53 - 104	1.03	20	
Silver	113.657	2.0	125.628	ND	90.5	61 - 109	1.01	20	
Thallium	107.360	2.0	125.628	ND	85.5	44 - 103	0.648	20	
Vanadium	144.304	2.0	125.628	25.7618	94.4	55 - 115	1.46	20	
Zinc	152.480	2.0	125.628	45.1691	85.4	24 - 130	0.980	20	

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Mercury by AA (Cold Vapor) EPA 7471A - Quality Control

Analyte	Result (mg/kg)	PQL (mg/kg)	Spike Level	Source Result	% Rec	% Rec Limits	RPD	RPD Limit	Notes
Batch B4B0419 - EPA 7471									
Blank (B4B0419-BLK1)				Prepared: 2/26/2014 Analyzed: 2/26/2014					
Mercury	ND	0.10			NR				
LCS (B4B0419-BS1)				Prepared: 2/26/2014 Analyzed: 2/26/2014					
Mercury	0.700702	0.10	0.833333		84.1	80 - 120			
Duplicate (B4B0419-DUP1)		**Source: 1400508-13**		Prepared: 2/26/2014 Analyzed: 2/26/2014					
Mercury	0.046574	0.10		0.051857	NR		10.7	20	
Matrix Spike (B4B0419-MS1)		**Source: 1400508-13**		Prepared: 2/26/2014 Analyzed: 2/26/2014					
Mercury	0.744652	0.10	0.819672	0.051857	84.5	70 - 130			
Matrix Spike Dup (B4B0419-MSD1)		**Source: 1400508-13**		Prepared: 2/26/2014 Analyzed: 2/26/2014					
Mercury	0.724714	0.10	0.819672	0.051857	82.1	70 - 130	2.71	20	
Post Spike (B4B0419-PS1)		**Source: 1400508-13**		Prepared: 2/26/2014 Analyzed: 2/26/2014					
Mercury	5.5702E-3		5.00000E-3	0.000622	99.0	85 - 115			

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Gasoline Range Organics by EPA 8015B (Modified) - Quality Control

Analyte	Result (mg/kg)	PQL (mg/kg)	Spike Level	Source Result	% Rec	% Rec Limits	RPD	RPD Limit	Notes
Batch B4B0305 - GCVOAS									
Blank (B4B0305-BLK1)				Prepared: 2/20/2014 Analyzed: 2/20/2014					
Gasoline Range Organics	ND	1.0			NR				
Surrogate: 4-Bromofluorobenzene	*0.2300*		*0.200000*		*115*	*48 - 137*			
LCS (B4B0305-BS1)				Prepared: 2/20/2014 Analyzed: 2/20/2014					
Gasoline Range Organics	4.94600	1.0	5.00000		98.9	70 - 130			
Surrogate: 4-Bromofluorobenzene	*0.2584*		*0.200000*		*129*	*48 - 137*			
LCS Dup (B4B0305-BSD1)				Prepared: 2/20/2014 Analyzed: 2/20/2014					
Gasoline Range Organics	5.29200	1.0	5.00000		106	70 - 130	6.76	20	
Surrogate: 4-Bromofluorobenzene	*0.2408*		*0.200000*		*120*	*48 - 137*			
Duplicate (B4B0305-DUP1)		**Source: 1400486-01**		Prepared: 2/20/2014 Analyzed: 2/20/2014					
Gasoline Range Organics	ND	1.0		ND	NR			20	
Surrogate: 4-Bromofluorobenzene	*0.2298*		*0.200000*		*115*	*48 - 137*			
Matrix Spike (B4B0305-MS1)		**Source: 1400486-01**		Prepared: 2/20/2014 Analyzed: 2/20/2014					
Gasoline Range Organics	5.26700	1.0	5.00000	ND	105	50 - 122			
Surrogate: 4-Bromofluorobenzene	*0.2210*		*0.200000*		*110*	*48 - 137*			
Matrix Spike Dup (B4B0305-MSD1)		**Source: 1400486-01**		Prepared: 2/20/2014 Analyzed: 2/20/2014					
Gasoline Range Organics	4.53700	1.0	5.00000	ND	90.7	50 - 122	14.9	20	
Surrogate: 4-Bromofluorobenzene	*0.2697*		*0.200000*		*135*	*48 - 137*			

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Diesel Range Organics by EPA 8015B - Quality Control

Analyte	Result (mg/kg)	PQL (mg/kg)	Spike Level	Source Result	% Rec	% Rec Limits	RPD	RPD Limit	Notes
Batch B4B0408 - GCSEMI_DRO_SOIL_LL									
Blank (B4B0408-BLK1)					Prepared: 2/26/2014 Analyzed: 2/26/2014				
DRO	ND	1.0			NR				
ORO	ND	1.0			NR				
Surrogate: p-Terphenyl	*2.108*		*2.66667*		*79.1*	*26 - 145*			
LCS (B4B0408-BS1)					Prepared: 2/26/2014 Analyzed: 2/26/2014				
DRO	31.1467	1.0	33.3333		93.4	28 - 138			
Surrogate: p-Terphenyl	*2.536*		*2.66667*		*95.1*	*26 - 145*			
Matrix Spike (B4B0408-MS1)		**Source: 1400508-13**			Prepared: 2/26/2014 Analyzed: 2/27/2014				
DRO	44.0673	1.0	33.3333	21.9703	66.3	18 - 122			
Surrogate: p-Terphenyl	*2.227*		*2.66667*		*83.5*	*26 - 145*			
Matrix Spike Dup (B4B0408-MSD1)		**Source: 1400508-13**			Prepared: 2/26/2014 Analyzed: 2/27/2014				
DRO	34.6493	1.0	33.3333	21.9703	38.0	18 - 122	23.9	20	R2
Surrogate: p-Terphenyl	*2.499*		*2.66667*		*93.7*	*26 - 145*			

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BTEX/MTBE by EPA 8021 - Quality Control

Analyte	Result (ug/kg)	PQL (ug/kg)	Spike Level	Source Result	% Rec	% Rec Limits	RPD	RPD Limit	Notes
Batch B4B0305 - GCVOAS									
Blank (B4B0305-BLK1)				Prepared: 2/20/2014 Analyzed: 2/20/2014					
Benzene	ND	5.0			NR				
Toluene	ND	5.0			NR				
Ethylbenzene	ND	5.0			NR				
m,p-Xylene	ND	10			NR				
o-Xylene	ND	5.0			NR				
Surrogate: 4-Bromofluorobenzene	*183.5*		*200.000*		*91.7*	*53 - 144*			
LCS (B4B0305-BS2)				Prepared: 2/20/2014 Analyzed: 2/20/2014					
Benzene	78.8830	5.0	100.000		78.9	70 - 130			
Toluene	79.8310	5.0	100.000		79.8	70 - 130			
Ethylbenzene	79.7430	5.0	100.000		79.7	70 - 130			
m,p-Xylene	166.457	10	200.000		83.2	70 - 130			
o-Xylene	82.6640	5.0	100.000		82.7	70 - 130			
Surrogate: 4-Bromofluorobenzene	*178.2*		*200.000*		*89.1*	*53 - 144*			
LCS Dup (B4B0305-BSD2)				Prepared: 2/20/2014 Analyzed: 2/20/2014					
Benzene	82.3320	5.0	100.000		82.3	70 - 130	4.28	20	
Toluene	82.7460	5.0	100.000		82.7	70 - 130	3.59	20	
Ethylbenzene	82.5930	5.0	100.000		82.6	70 - 130	3.51	20	
m,p-Xylene	172.959	10	200.000		86.5	70 - 130	3.83	20	
o-Xylene	84.7920	5.0	100.000		84.8	70 - 130	2.54	20	
Surrogate: 4-Bromofluorobenzene	*174.3*		*200.000*		*87.2*	*53 - 144*			

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BTEX/MTBE by EPA 8021 - Quality Control (cont'd)

Analyte	Result (ug/kg)	PQL (ug/kg)	Spike Level	Source Result	% Rec	% Rec Limits	RPD	RPD Limit	Notes
Batch B4B0305 - GCVOAS (continued)									
Matrix Spike (B4B0305-MS1)		**Source: 1400486-01**		Prepared: 2/20/2014 Analyzed: 2/20/2014					
Benzene	41.4080	5.0	40.7500	ND	102	14 - 146			
Toluene	154.079	5.0	202.250	ND	76.2	33 - 123			
Ethylbenzene	47.1480	5.0	76.0000	ND	62.0	20 - 102			
m,p-Xylene	167.252	10	206.500	ND	81.0	39 - 120			
o-Xylene	62.8100	5.0	73.5000	ND	85.5	34 - 131			
Surrogate: 4-Bromofluorobenzene	*182.3*		*200.000*		*91.1*	*53 - 144*			

Certificate of Analysis

Ninyo & Moore	Project Number : Ashland
1956 Webster Street, Suite 400	Report To : Peter Sims
Oakland , CA 94612	Reported : 02/27/2014

BTEX/MTBE by EPA 8021 - Quality Control (cont'd)

Analyte	Result (ug/kg)	PQL (ug/kg)	Spike Level	Source Result	% Rec	% Rec Limits	RPD	RPD Limit	Notes
Batch B4B0305 - GCVOAS (continued)									
Matrix Spike Dup (B4B0305-MSD1)		**Source: 1400486-01**		Prepared: 2/20/2014 Analyzed: 2/20/2014					
Benzene	36.9300	5.0	40.7500	ND	90.6	14 - 146	11.4	20	
Toluene	144.103	5.0	202.250	ND	71.2	33 - 123	6.69	20	
Ethylbenzene	42.8910	5.0	76.0000	ND	56.4	20 - 102	9.46	20	
m,p-Xylene	155.043	10	206.500	ND	75.1	39 - 120	7.58	20	
o-Xylene	58.8880	5.0	73.5000	ND	80.1	34 - 131	6.45	20	
Surrogate: 4-Bromofluorobenzene	*188.8*		*200.000*		*94.4*	*53 - 144*			

Certificate of Analysis

Ninyo & Moore	Project Number : Ashland
1956 Webster Street, Suite 400	Report To : Peter Sims
Oakland , CA 94612	Reported : 02/27/2014

Notes and Definitions

R2	RPD value outside acceptance criteria due to possible matrix interference.
R	RPD value outside acceptance criteria. Calculation is based on raw values.
ND	Analyte is not detected at or above the Practical Quantitation Limit (PQL). When client requests quantitation against MDL, analyte is not detected at or above the Method Detection Limit (MDL)
PQL	Practical Quantitation Limit
MDL	Method Detection Limit
NR	Not Reported
RPD	Relative Percent Difference
CA1	CA-NELAP (CDPH)
CA2	CA-ELAP (CDPH)
OR1	OR-NELAP (OSPHL)
TX1	TX-NELAP (TCEQ)

Notes:
(1) The reported MDL and PQL are based on prep ratio variation and analytical dilution.
(2) The suffix [2C] of specific analytes signifies that the reported result is taken from the instrument's second column.
(3) Results are wet unless otherwise specified.

CHAIN OF CUSTODY RECORD

ADVANCED TECHNOLOGY LABORATORIES
3275 Walnut Ave., Signal Hill, CA 90755
Tel: (562) 989-4045 • Fax: (562) 989-4040

P.O.#: ______ Quote #: ______

As the authorized agent of the below named company, I hereby purchase testing services from ATL as dictated below and guarantee payment in full.

Submitter (Print):
Signature:

Submitter - Please complete all SHADED areas and include QUOTE # above to ensure proper invoicing.

FOR LABORATORY USE ONLY:

Method of Transport: ☐ Client ☐ ATL ☐ FedEx ☐ OnTrac ☑ GSO ☐ Other: ______

Sample Condition Upon Receipt (1.5°C)

1. CHILLED	Y ☑ N ☐	4. SEALED	Y ☐ N ☐
2. HEADSPACE (VOA)	Y ☐ N ☐	5. # OF SPLS MATCH COC	Y ☐ N ☐
3. CONTAINER INTACT	Y ☐ N ☐	6. PRESERVED	Y ☐ N ☐

Client: Ninyo and Moore
Attn: Peter Sims
Address: 1956 Webster St
City: Oakland State: CA Zip Code: 94612
TEL: 510-343-3000
FAX: 510-343-3001

Project Name: Ashland
Project #:
Sampler: (Printed Name) Sheila Magladry (Signature) Sheila Magladry

Relinquished by: (Signature and Printed Name)	Date	Time	Received by: (Signature and Printed Name)	Date	Time
[signature] Sheila Magladry	2/19/14	11:55	[signature]	2/19/14	11:55
[signature] ~~Peter Sims~~	2/19/14	257p	[signature] Jeff Siegfried	2/19/14	257p
[signature] Jeff Siegfried	2/19/14	322p	GSO	2/19/14	322p

Bill To:
Attn: Peter Sims E-mail: psims@ [Ninyo and Moore].com
Company: Ninyo and Moore
Address: 1956 Webster
City: Oakland State: CA Zip: 94612

Send Report To:
Attn: Same E-mail:
Company:
Address:
City: State: Zip:

Special Instructions/Comments: 2/20/14
Comp-1 = SP1-1, ~~[illegible]~~, SP1-2, SP1-3, SP1-4
Comp-2 = SP2-1, SP2-2, SP2-3, SP2-4
Comp-3 = SP3-1, SP3-2, SP3-3, SP3-4

Sample/Records - Archival & Disposal
Unless otherwise requested by client, all Samples and Hardcopy will be disposed Forty-five(45) days after generation of report - electronic copies retained for five(5) years.
Storage Fees (applies when storage is requested):
- Sample : Forty-five(45) Days Complimentary - $2.00 / sample / mo thereafter.

Hardcopy Reports $17.50 per report.

CIRCLE or Write IN Analyses Needed: 8260-624 (Volatiles); ~~8015B (GRO)~~; TO-15 / TO-14 / TO-3 / RSK-175; 8270B-625(BNA) / 8310(PAHs); 8015B(DRO)/8015B(HCID); 8081 OrgCl / 8141 OrgPO4 Pest; 8082 PCBs; 6010B-200.7 CAM Metals; 6010B-200.7 Metals; 6020B-200.8-1640 Metals; 7199-218.6 (Hex. Chromium); 300(Anions) / 314 (Perchlorate)

CIRCLE APPROPRIATE MATRIX: SOIL/SEDIMENT/SLUDGE; SOLIDS/WIPES/FILTERS; WATER-DRINKING/GROUND; WATER-STORM/WASTE; AQUEOUS/LAYERED-OIL

BUSINESS HOURS 8:30 am to 5:30 pm

ITEM	Lab No.	Sample I.D. / Location	Date	Time	8260-624 (Volatiles)	Matrix	TAT	Container(s) #	Type	PRESERVATION	REMARKS
1	1400508-1	SP1-1	2/19	8:41		SOIL	10	1	5 1	4	
2	-2	SP1-2	2/19	8:45		↓	↓	1	5 1	4	
3	-3	SP1-3	2/19	8:48				1	5 1	4	
4	-4	SP1-4	2/19	8:50	X			2	5 1	4	
5	-5	SP2-1	2/19	8:55				1	5 1	4	
6	-6	SP2-2	2/19	9:00	X			2	5 1	4	
7	-7	SP2-3	2/19	9:02				1	5 1	4	
8	-8	SP2-4	2/19	9:06				1	5 1	4	
9	-9	SP3-1	2/19	9:22	X			2	5 1	4	
10	-10 ↓	SP3-2	2/19	9:27				1	5 1	4	

QA/QC: RTNE ☐ CT ☐ Legal ☐ SWRCB ☐ Logcode ____ OTHER ____

Samples Submitted AFTER 3:30 PM, are considered received the following business day at 8:30 AM.
Weekend, Holiday, Off Hours Work ASK for QUOTE
Container Types: 1=Tube 2=VOA 3=Liter 4=Pint 5=Jar 6=Tedlar 7=Canister
Material: 1=Glass 2=Plastic 3=Metal
Preservatives: 1=HCl, 2=HNO_3 3=H_2SO_4 4=4°C 5=$Zn(Ac)_2$ 6=NaOH 7=$NA_2S_2O_4$

TAT 0	TAT 1	TAT 2	TAT 3	TAT 4	TAT 5	TAT 10
300% SURCHARGE SAME BUSINESS DAY IF RCV'D BY 9:00 AM	100% SURCHARGE NEXT BUSINESS DAY 5:30 PM	50% SURCHARGE 2ND BUSINESS DAY 5:30 PM	30% SURCHARGE 3RD BUSINESS DAY 5:30 PM	20% SURCHARGE 4TH BUSINESS DAY 5:30 PM	NO SURCHARGE 5-7 BUSINESS DAYS 5:30 PM	10% DISCOUNT 10th BUSINESS DAY 5:30 PM

For RUSH TCLP/STLC, add 2 days to respective TAT.
Subcon. TATs 10-15 business days, Dioxin and Furans 21 business days.

CHAIN OF CUSTODY RECORD

ADVANCED TECHNOLOGY LABORATORIES
3275 Walnut Ave., Signal Hill, CA 90755
Tel: (562) 989-4045 • Fax: (562) 989-4040

P.O.#: _____ Quote #: _____

As the authorized agent of the below named company, I hereby purchase testing services from ATL as dictated below and guarantee payment in full.

Submitter (Print):

Signature:

Submitter - Please complete all SHADED areas and include QUOTE # above to ensure proper invoicing.

Method of Transport
☐ Client ☐ ATL
☐ FedEx ☐ OnTrac
☑ GSO
☐ Other: _____

FOR LABORATORY USE ONLY:

Sample Condition Upon Receipt
1. CHILLED Y☑ N☐ 4. SEALED Y☐ N☐
2. HEADSPACE (VOA) Y☐ N☐ 5. # OF SPLS MATCH COC Y☐ N☐
3. CONTAINER INTACT Y☐ N☐ 6. PRESERVED Y☐ N☐

Client: Ninyo and Moore
Attn: Peter Sims
Address: 1956 Webster
City: Oakland State: CA Zip Code: 94612
TEL: 510-343-3000
FAX: 510-343-3001

Project Name: Ashland
Project #:
Sampler: (Printed Name) Sheila Magladry (Signature) Sheila Magladry

Relinquished by: (Signature and Printed Name)	Date:	Time:	Received by: (Signature and Printed Name)	Date:	Time:
Sheila Magladry Sheila Magladry	2/19/14	11:55	Jeff Siegfried	2/19/14	11:55
Peter Sims	2/19/14	1457	Jeff Siegfried	2/19/14	257p
Jeff Siegfried	2/19/14	322p	GSO Courier	2/19/14	322p

Bill To:
Attn: Peter Sims E-mail: psims@
Company: Ninyo and Moore .com
Address: 1956 Webster
City: Oakland State: CA Zip: 94612

Send Report To: Same
Attn: E-mail:
Company:
Address:
City: State: Zip:

Special Instructions/Comments:
Comp-3 = SP3-1, SP3-2, SP3-3, SP3-4

Sample/Records - Archival & Disposal
Unless otherwise requested by client, all Samples and Hardcopy will be disposed Forty-five(45) Days after generation of report - electronic copies retained for five(5) years.
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CIRCLE APPROPRIATE MATRIX: SOIL/SEDIMENT/SLUDGE; SOLIDS/WIPES/FILTERS; WATER-DRINKING/GROUND; WATER-STORM/WASTE; AQUEOUS/LAYERED-OIL

ITEM	BUSINESS HOURS 8:30 am to 5:30 pm Lab No.	Sample Description: Sample I.D. / Location	Date	Time	8260-624 (Volatiles)	8015B (GRO) / ~~8021 (BTEX)~~	TO-15 / TO-14 / TO-3 / RSK-175	8270B-625(BNA) / 8310(PAHs)	8015B(DRO)/~~8015B(OHD)~~ ORO	8081 OrgCl / 8141 OrgPO4 Pest	8082 PCBs	6010B-200.7 CAM Metals Title 22	6010B-200.7 Metals	6020B-200.8-1640 Metals	7199-218.6 (Hex. Chromium)	300(Anions) / 314 (Perchlorate)	TAT	Container(s) #	Container(s) Type	PRESERVATION	REMARKS
1	1400507 -11	SP3-3	2/19	9:34								1					10	1	5	4	
2	-12	SP3-4	2/19	9:38								1						1	5	4	
3	-13	Comp-1			X		X		X												
4	-14	Comp-2			X		X		X												
5	-15	Comp-3			X		X		X												
6																					
7																					
8																					
9																					
10																					

QA/QC
RTNE ☐
CT ☐
Legal ☐
SWRCB ☐ Logcode
OTHER

☐ Samples Submitted AFTER 3:30 PM, are considered received the following business day at 8:30 AM.

Weekend, Holiday, Off Hours Work ASK for QUOTE

Container Types: 1=Tube 2=VOA 3=Liter 4=Pint 5=Jar 6=Tedlar 7= Canister

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TAT 0	TAT 1	TAT 2	TAT 3	TAT 4	TAT 5	TAT 10
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For RUSH TCLP/STLC, add 2 days to respective TAT.

Subcon. TAT is 10-15 business days, Dioxin and Furans 21 business days.